

# Service Manual

**TASKalfa 7353ci / TASKalfa 8353ci**

**BF-730 / BF-9100 /**

**DF-7110 / DF-7130 / MT-730(B) /**

**PF-7120 / PF-7130 / PF-730(B) / PF-740(B) /**

**PH-7A / PH-7C / PH-7D**



**CONFIDENTIAL**

FOR AUTHORIZED KYOCERA ENGINEERS ONLY. DO NOT DISTRIBUTE TO NON-AUTHORIZED PARTIES.

**CAUTION**

RISK OF EXPLOSION IF BATTERY IS REPLACED BY AN INCORRECT TYPE. DISPOSE OF USED BATTERIES ACCORDING TO THE INSTRUCTIONS.

It may be illegal to dispose of this battery into the municipal waste stream. Check with your local solid waste officials for details in your area for proper disposal.

**ATTENTION**

IL Y A UN RISQUE D'EXPLOSION SI LA BATTERIE EST REMPLACÉE PAR UN MODÈLE DE TYPE INCORRECT. METTRE AU REBUT LES BATTERIES UTILISÉES SELON LES INSTRUCTIONS DONNÉES.

Il peut être illégal de jeter les batteries dans des eaux d'égout municipales. Vérifiez avec les fonctionnaires municipaux de votre région pour les détails concernant des déchets solides et une mise au rebut appropriée.

**Notation of products in the manual**

For the purpose of this service manual, products are identified by print speed at A4.

Product name	Print speed	100 V	120 V	220-240 V	Australia
TASKalfa 8353ci	83/70 sheets/min	x	x	x	x
TASKalfa 7353ci	73/65 sheets/min	-	x	x	x

## Revision history

Revision	Date	Pages	Revised contents
2.00	Sep.13 2019	<a href="#">page 1-3</a>	Correction: Typographical errors
3.00	April 28, 2020	<a href="#">page 6-276</a>	Addition: The error code 33 & 34
4.00	Sep. 29 2020	<a href="#">page 7-252</a>	Addition: J7910 - J7935
		<a href="#">page 7-389</a>	Addition: C8600 - C8740
5.0	November 26, 2020	<a href="#">page 6-272</a>	Correction: U469 (Correct the contents of the step for Regist (CH), (MH), (YH))
		<a href="#">page 7-324</a>	Addition: C2820 to C2870



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# Safety precautions

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This booklet provides safety warnings and precautions for our service personnel to ensure the safety of their customers, their machines as well as themselves during maintenance activities. Service personnel are advised to read this booklet carefully to familiarize themselves with the warnings and precautions described here before engaging in maintenance activities.

## Safety warnings and precautions

Various symbols are used to protect our service personnel and customers from physical danger and to prevent damage to their property. These symbols are described below:

**⚠ DANGER:** High risk of serious bodily injury or death may result from insufficient attention to or incorrect compliance with warning messages using this symbol.

**⚠ WARNING:** Serious bodily injury or death may result from insufficient attention to or incorrect compliance with warning messages using this symbol.

**⚠ CAUTION:** Bodily injury or damage to property may result from insufficient attention to or incorrect compliance with warning messages using this symbol.

### Symbols

The triangle (△) symbol indicates a warning including danger and caution. The specific point of attention is shown inside the symbol.



General warning.



Warning of risk of electric shock.



Warning of high temperature.

⊘ indicates a prohibited action. The specific prohibition is shown inside the symbol.



General prohibited action.



Disassembly prohibited.

● indicates that action is required. The specific action required is shown inside the symbol.



General action required.





Remove the power plug from the wall outlet.











Always ground the copier.

# 1. Installation Precautions

## WARNING











- Do not use a power supply with a voltage other than that specified. Avoid multiple connections to one outlet: they may cause fire or electric shock. When using an extension cable, always check that it is adequate for the rated current..... 
- Connect the ground wire to a suitable grounding point. Not grounding the copier may cause fire or electric shock. Connecting the earth wire to an object not approved for the purpose may cause explosion or electric shock. Never connect the ground cable to any of the following: gas pipes, lightning rods, ground cables for telephone lines and water pipes or faucets not approved by the proper authorities..... 

## CAUTION:





- Do not place the copier on an infirm or angled surface: the copier may tip over, causing injury. .... 
- Do not install the copier in a humid or dusty place. This may cause fire or electric shock. .... 
- Do not install the copier near a radiator, heater, other heat source or near flammable material. This may cause fire. .... 
- Allow sufficient space around the copier to allow the ventilation grills to keep the machine as cool as possible. Insufficient ventilation may cause heat buildup and poor copying performance. .... 
- Always handle the machine by the correct locations when moving it. .... 
- Always use anti-toppling and locking devices on copiers so equipped. Failure to do this may cause the copier to move unexpectedly or topple, leading to injury. .... 
- Avoid inhaling toner or developer excessively. Protect the eyes. If toner or developer is accidentally ingested, drink a lot of water to dilute it in the stomach and obtain medical attention immediately. If it gets into the eyes, rinse immediately with copious amounts of water and obtain medical attention. .... 
- Advise customers that they must always follow the safety warnings and precautions in the copier's instruction handbook. .... 












## 2. Precautions for Maintenance

### WARNING

- Always remove the power plug from the wall outlet before starting machine disassembly. .... 
- Always follow the procedures for maintenance described in the service manual and other related brochures. .... 
- Under no circumstances attempt to bypass or disable safety features including safety mechanisms and protective circuits. .... 
- Always use parts having the correct specifications. .... 
- Always use the thermostat or thermal fuse specified in the service manual or other related brochure when replacing them. Using a piece of wire, for example, could lead to fire or other serious accident. .... 
- When the service manual or other serious brochure specifies a distance or gap for installation of a part, always use the correct scale and measure carefully. .... 
- Always check that the copier is correctly connected to an outlet with a ground connection. .... 
- Check that the power cable covering is free of damage. Check that the power plug is dust-free. If it is dirty, clean it to remove the risk of fire or electric shock. .... 
- Never attempt to disassemble the optical unit in machines using lasers. Leaking laser light may damage eyesight. .... 
- Handle the charger sections with care. They are charged to high potentials and may cause electric shock if handled improperly. .... 



### CAUTION

- Wear safe clothing. If wearing loose clothing or accessories such as ties, make sure they are safely secured so they will not be caught in rotating sections. .... 
- Use utmost caution when working on a powered machine. Keep away from chains and belts. .... 
- Handle the fixing section with care to avoid burns as it can be extremely hot. .... 
- Check that the fixing unit thermistor, heat and press rollers are clean. Dirt on them can cause abnormally high temperatures. .... 

- Do not remove the ozone filter, if any, from the copier except for routine replacement. .... 
- Do not pull on the AC power cord or connector wires on high-voltage components when removing them; always hold the plug itself. .... 
- Do not route the power cable where it may be stood on or trapped. If necessary, protect it with a cable cover or other appropriate item. .... 
- Treat the ends of the wire carefully when installing a new charger wire to avoid electric leaks. .... 
- Remove toner completely from electronic components. .... 
- Run wire harnesses carefully so that wires will not be trapped or damaged. .... 
- After maintenance, always check that all the parts, screws, connectors and wires that were removed, have been refitted correctly. Special attention should be paid to any forgotten connector, trapped wire and missing screws. .... 
- Check that all the caution labels that should be present on the machine according to the instruction handbook are clean and not peeling. Replace with new ones if necessary. .... 
- Handle greases and solvents with care by following the instructions below: ..... 
  - Use only a small amount of solvent at a time, being careful not to spill. Wipe spills off completely.
  - Ventilate the room well while using grease or solvents.
  - Allow applied solvents to evaporate completely before refitting the covers or turning the power switch on.
  - Always wash hands afterwards.
- Never dispose of toner or toner bottles in fire. Toner may cause sparks when exposed directly to fire in a furnace, etc. .... 
- Should smoke be seen coming from the copier, remove the power plug from the wall outlet immediately. .... 

### 3. Miscellaneous

 **WARNING**

- Never attempt to heat the drum or expose it to any organic solvents such as alcohol, other than the specified refiner; it may generate toxic gas. .... 
- Keep the machine away from flammable liquids, gases, and aerosols. A fire or an electric shock might occur. .... 





# CONTENTS

<b>1</b>	<b>Specifications .....</b>	<b>1-1</b>
1 - 1	Specifications.....	1-1
(1)	Common function.....	1-1
(2)	Copy Functions.....	1-3
(3)	Printer Functions.....	1-4
(4)	Scanner Functions.....	1-5
(5)	Document Processor.....	1-5
(6)	Option.....	1-6
	(6-1)Side Feeder (500 sheets ×3).....	1-6
	(6-2)Large Capacity Feeder (500sheets, 1,500sheets ×2).....	1-6
	(6-3)Side Feeder (3,000-sheet ×1).....	1-6
	(6-4)4,000-Sheet Finisher.....	1-7
	(6-5)100-Sheet Staple Finisher.....	1-7
	(6-6)Punch Unit (4,000 sheets/100-sheet Staple finisher option).....	1-8
	(6-7)Mailbox (4,000 sheets finisher option).....	1-8
	(6-8)Folding Unit (4,000 sheets finisher option).....	1-8
	(6-9)Folding Unit (100 sheets Staple finisher option).....	1-9
	(6-10)Banner Tray.....	1-10
	(6-11)FAX System.....	1-11
1 - 2	Part Names.....	1-13
(1)	Machine.....	1-13
	(1-1)Exterior.....	1-13
	(1-2)Connectors/Interior.....	1-15
	(1-3)With Optional Equipments Attached.....	1-16
	(1-4)FAX System.....	1-17
	(1-5)Operation Panel Keys.....	1-18
1 - 3	Optional Equipment.....	1-19
(1)	Option.....	1-21
	(1-1)MT-730 (B) "Mailbox".....	1-21
	(1-2)DF-7110 "4,000-sheet Finisher".....	1-21
	(1-3)DF-7130 "100-sheet Staple Finisher".....	1-21
	(1-4)PH-7A, PH-7C, PH-7D "Punch Unit".....	1-21
	(1-5)BF-730 "Folding Unit".....	1-21
	(1-6)BF-9100 "Folding Unit".....	1-21
	(1-7)PF-7130 + PF-730 "Side Feeder (500-sheet×3)".....	1-21
	(1-8)PF-7130 + PF-740 "Large Capacity Side Feeder (500, 1,500-sheet×2)".....	1-21
	(1-9)PF-7120 "Side Feeder (3,000-sheet)".....	1-21
	(1-10)Banner Guide(A) "Banner Tray".....	1-21
	(1-11)Copy tray(D) "Copy tray".....	1-21
	(1-12)NK-7120 "Optional Numeric Keypad".....	1-22
	(1-13)DT-730(B) "Document Table".....	1-22
	(1-14)Keyboard Holder 10 "Keyboard Holder".....	1-22
	(1-15)FAX System 12 "FAX Kit".....	1-22
	(1-16)IB-50 "Network Interface Kit".....	1-22
	(1-17)IB-51 "Wireless Network Interface Kit".....	1-22
	(1-18)IB-35 "Wireless Network Interface Kit".....	1-22
	(1-19)Card Authentication Kit(B) "Card Authentication Kit".....	1-22
	(1-20)Internet FAX Kit(A) "Internet FAX Kit".....	1-22
	(1-21)UG-33 "ThinPrint Option".....	1-22
	(1-22)UG-34 "Emulation Upgrade Kit".....	1-22
	(1-23)USB Keyboard "USB Keyboard".....	1-22
<b>2</b>	<b>Installation .....</b>	<b>2-1</b>
2 - 1	Environment.....	2-1
2 - 2	Installing the main unit.....	2-2
(1)	Unpacking and checking bundled items.....	2-4
	(1-1)Machine.....	2-4
	(1-2)Take out of the machine unit.....	2-4
	(1-3)Take out of fixed tape and cushioning material.....	2-7

(2) Notes on main unit transportation.....	2-7
(3) Change to the operation unit position.....	2-7
(4) Toner collection box attaching.....	2-10
(5) Release the lock of the scanner mirror frame.....	2-12
(6) Release of lift plate stopper.....	2-14
(7) Release the lock of developer waste outlet.....	2-15
(8) Installation of the metal fittings to prevent falling down.....	2-18
(9) Connecting the Interface Cable.....	2-19
(10) Connecting the FAX cable (FAX installation only).....	2-22
(11) Loading Paper.....	2-25
(11-1)Precaution for Loading Paper.....	2-25
(11-2)Set paper in the cassette.....	2-26
(11-3)Set paper in the side feeder.....	2-34
(12) Connecting the Power Cord.....	2-35
(13) Input of the power source.....	2-37
(14) Setting up the Toner Container.....	2-37
(15) Default Setting.....	2-39
(15-1)Setting Date and Time.....	2-40
(15-2)Network Setup (LAN Cable Connection).....	2-40
(15-3)Paper size and media type setting.....	2-41
(16) Installing Software.....	2-41
(17) Image adjusting.....	2-41
(18) Cassette heater control setting (100V model only).....	2-43
(19) Exiting from the maintenance mode.....	2-43
(20) Completion of installing the main unit (Turning the power off).....	2-44
(21) Turn the power on again.....	2-44
2 - 3 Installing the optional equipment.....	2-45
(1) Gigabit Ethernet extension kit (IB-50).....	2-45
(2) Wireless LAN interface kit (IB-51).....	2-48
(3) Wireless LAN interface (IB-35) (120V model standard).....	2-49

### **3 Machine Design ..... 3-1**

3 - 1 Mechanical Configuration.....	3-1
(1) Cross-section view.....	3-1
(2) Document processor cross-section view.....	3-2
3 - 2 Extension device construction (option).....	3-3
(1) Paper feeder cross-section view (PF-730(B)).....	3-3
(2) Paper feeder cross-section view (PF-740(B)).....	3-3
(3) Paper feeder cross-section view (PF-7120).....	3-4
(5) 4000-sheet Finisher cross-section view (DF-7110).....	3-6
(6) Mailbox cross-section view (MT-730(B)).....	3-7
(7) Folding unit cross-section view (BF-730).....	3-8
3 - 3 Paper conveying and Paper detection.....	3-9
(1) Main unit+PF-730(B)+PF-7130+DF-7110+MT-730(B)+BF-730+PH-7.....	3-9
3 - 4 Electric parts.....	3-10
(1) Wire connection.....	3-10
(1-1)(Machine rear side).....	3-10
(2) Electric parts layout.....	3-12
(2-1)PWBs.....	3-12
(3) Part name table (PWB).....	3-14
(4) Sensors and Switches.....	3-16
(4-1)Part name table (Sensors and Switches).....	3-19
(5) Motors.....	3-23
(5-1)Part name table (motor).....	3-25
(6) Fan motor.....	3-28
(6-1)Part name table (fan motor).....	3-29
(7) Others.....	3-31
(7-1)Part name table (other).....	3-32
(8) Document processor.....	3-34

3 - 5	Electric parts (Optional unit) .....	3-36
(1)	Paper feeder (PF-730(B)) .....	3-36
	(1-1)PWBs and Sensors .....	3-36
	(1-2)Motors and others .....	3-37
(2)	Paper feeder (PF-740(B)) .....	3-38
	(2-1)PWBs and Sensors .....	3-38
	(2-2)Motors and others .....	3-39
(3)	Paper feeder (PF-7120).....	3-40
(4)	Paper feeder (PF-7130).....	3-41
(5)	4000-sheet Finisher (DF-7110).....	3-43
(6)	100 sheet staple finisher (DF-7130) .....	3-46
	(6-1)Paper entry and feed-shift and DF tray B exit section .....	3-46
	(6-2)Feed-shift operation to the DF tray B or finishing section .....	3-47
	(6-3)Finishing section .....	3-48
	(6-4)Relief drum operation .....	3-53
	(6-5)DF eject tray .....	3-55
(7)	Mailbox (MT-730(B)).....	3-57
(8)	Punch unit (PH-7) .....	3-58
(9)	Folding unit (BF-730) .....	3-59
3 - 6	Mechanical construction .....	3-61
(1)	Cassette paper feed section .....	3-61
(2)	Large capacity feeder .....	3-63
(3)	MP tray paper feed section .....	3-67
(4)	Conveying section .....	3-69
(5)	Drum section.....	3-71
3 - 7	Developer section .....	3-72
(1)	Optical section .....	3-75
	(1-1)Image scanner section .....	3-75
(2)	Laser scanner unit .....	3-76
(3)	Transfer and separation section .....	3-78
	(3-1)Primary transfer unit .....	3-79
	(3-2)Secondary transfer roller section .....	3-81
(4)	Fuser section .....	3-82
(5)	Feed-shift/switchback section .....	3-83
(6)	Bridge section .....	3-86
(7)	Job separator section .....	3-88
(8)	Duplex conveying section .....	3-89
(9)	Document processor.....	3-91
	(9-1)Original feed section .....	3-91
	(9-2)Original conveying section and eject section .....	3-92
3 - 8	Mechanical construction (option) .....	3-94
(1)	Paper feeder (PF-730(B)).....	3-94
	(1-1)Cassette paper feed section .....	3-94
(2)	Paper feeder (PF-740(B)).....	3-95
	(2-1)Paper deck section .....	3-95
	(2-2)Right cassette section .....	3-96
	(2-3)Left cassette section .....	3-97
	(2-4)Right cassette paper feed .....	3-97
	(2-5)Left cassette paper feed .....	3-99
(3)	Paper feeder (PF-7120).....	3-102
	(3-1)Cassette paper feed section .....	3-102
(4)	Paper feeder (PF-7130).....	3-104
	(4-1)Cassette paper feed section .....	3-104
(5)	4000-sheet Finisher (DF-7110).....	3-106
	(5-1)paper entry and feed-shift and DF tray B eject section .....	3-106
	(5-2)Feed-shift operation to the DF tray B or finishing section .....	3-107
	(5-3)Finishing section .....	3-107
	(5-4)Relief drum operation .....	3-110
	(5-5)Bundle eject operation .....	3-113
(6)	100 sheet staple finisher (DF-7130) .....	3-115

(6-1)Paper entry and feed-shift and DF tray B exit section .....	3-115
(6-2)Feed-shift operation to the DF tray B or finishing section .....	3-117
(6-3)Finishing section .....	3-118
(6-4)Relief drum operation .....	3-122
(6-5)DF eject tray .....	3-124
(7-1)Ejecting to the mailbox tray .....	3-128
(8) Punch unit (PH-7) .....	3-129
(9) Folding unit (BF-730) .....	3-131
(9-1)Paper folding operation (Center-folding, Tri-folding) .....	3-133
(9-2)Tri-folding position adjustment for the folding unit .....	3-136
(10) Booklet Unit (BF-9100) .....	3-141

## **4 Maintenance ..... 4-1**

4 - 1 Precautions for the maintenance .....	4-1
(1) Precautions .....	4-1
(2) Storage and handling of the drum .....	4-1
(3) Storage of the toner container .....	4-1
4 - 2 Maintenance parts .....	4-2
(1) Maintenance kits .....	4-2
(1-1)100V .....	4-2
(1-2)120V .....	4-2
(1-3)220-240V .....	4-3
(2) Executing the maintenance mode after replacing the maintenance kit .....	4-3
4 - 3 Maintenance parts replacement procedures .....	4-6
(1) Cassette paper feed section .....	4-6
(1-1)Detaching and reattaching the forwarding pulley/paper feed pulley/separation pulley .....	4-6
(1-2)Detaching and reattaching the PF forwarding pulley (right)/PF paper feed pulley (right)/ PF separation pulley (right) .....	4-9
(1-3)Detaching and reattaching the PF forwarding pulley (left)/PF paper feed pulley (left)/ PF separation pulley (left) .....	4-12
(2) MP paper feed section .....	4-16
(2-1)Detaching and reattaching the MP tray paper feed unit .....	4-16
(2-2)Detaching and reattaching the MP forwarding pulley/MP paper feed pulley/MP separation pulley .....	4-21
(3) Transfer section .....	4-28
(3-1)Detaching and reattaching the conveying unit .....	4-28
(3-2)Detaching and reattaching the primary transfer unit .....	4-30
(3-3)Detaching and reattaching the cleaning pre-brush .....	4-33
(3-4)Detaching and reattaching the secondary transfer roller unit .....	4-35
(4) Developer section/Drum section .....	4-38
(4-1)Detaching and reattaching the inner unit .....	4-38
(4-2)Detaching and reattaching the developer unit and drum unit .....	4-42
(4-3)Detaching and reattaching the main charge roller unit .....	4-47
(5) Fuser section .....	4-49
(5-1)Detaching and reattaching the fuser unit .....	4-49
(6) Document processor .....	4-51
(6-1)Detaching and reattaching the DP pickup pulley and DP paper feed roller .....	4-51
(6-2)Detaching and reattaching the DP separation pulley .....	4-53
(7) Others .....	4-55
(7-1)Detaching and reattaching the eject filters .....	4-55
(7-2)Detaching and reattaching the left filter .....	4-56
(7-3)Detaching and reattaching the fan filter and PU dust filters .....	4-58
(7-4)Detaching and reattaching the primary transfer belt filters .....	4-59
(7-5)Detaching and reattaching the developer filter .....	4-60
(7-6)Detaching and reattaching the waste toner box .....	4-61
4 - 4 Maintenance parts replacement procedures (option) .....	4-64
(1) Paper feeder (PF-730(B)) .....	4-64
(1-1)Detaching and reattaching the PF forwarding pulley/PF paper feed pulley/PF separation pulley ..	4-64
(2) Paper feeder (PF-740(B)) .....	4-70
(2-1)Detaching and reattaching the PF forwarding pulley (right)/PF paper feed pulley (right)/	

	PF separation pulley (right) .....	4-70
	(2-2)Detaching and reattaching the PF forwarding pulley (left)/PF paper feed pulley (left)/	
	PF separation pulley (left) .....	4-76
(3)	Side feeder (PF-7120) .....	4-79
	(3-1)Detaching and reattaching the pickup pulley and paper feed roller .....	4-79
	(3-2)Detaching and reattaching the retard pulley .....	4-81
(4)	Side Multi Feeder (PF-7130) .....	4-83
	(4-1)Detaching and reattaching the forwarding pulley/paper feed pulley/separation pulley .....	4-83
4 - 5	Adjustment procedures after replacing the maintenance kit .....	4-86
4 - 6	Disassembly and Reassembly procedures .....	4-87
(1)	OUTER COVERS .....	4-87
	(1-1)Detaching and reattaching the rear right cover and rear left cover .....	4-87
	(1-2)Detaching and reattaching the rear lower cover .....	4-89
	(1-3)Detaching and reattaching the conveying cover and PF conveying cover .....	4-91
	(1-4)Detaching and reattaching the right lower rear cover .....	4-93
	(1-5)Detaching and reattaching the right lower front cover .....	4-94
	(1-6)Detaching and reattaching the right cover and DU cover assembly .....	4-95
	(1-7)Detaching and reattaching the front right cover .....	4-97
	(1-8)Detaching and reattaching the ISU right cover, right upper cover and right middle rear cover .....	4-98
	(1-9)Detaching and reattaching the IH PWB cover and IH wire cover .....	4-102
	(1-10)Detaching and reattaching the left upper cover .....	4-102
	(1-11)Detaching and reattaching the front glass cover, ISU right cover and ISU rear cover .....	4-104
	(1-12)Detaching and reattaching the PF rear cover .....	4-105
(2)	Paper feed section .....	4-106
	(2-1)Detaching and reattaching the primary paper feed unit .....	4-106
	(2-2)Detaching and reattaching the PF primary paper feed unit .....	4-113
(3)	Optical section .....	4-116
	(3-1)Detaching and reattaching the LSU .....	4-116
	(3-2)Detaching and reattaching the lens unit .....	4-128
	(3-3)Detaching and reattaching the lamp unit .....	4-132
	(3-4)Detaching and reattaching the scanner wires .....	4-137
(4)	Drive section .....	4-148
	(4-2)Detaching and reattaching the PF drive unit .....	4-161
	(4-3)Detaching and reattaching the drum K drive unit and drum MCY drive unit .....	4-164
	(4-4)Detaching and reattaching the main drive unit .....	4-174
(5)	Others .....	4-175
	(5-1)Detaching and reattaching the SSD .....	4-175
	(5-2)Detaching and reattaching the hard disk unit .....	4-178
	(5-3)Detaching and reattaching the lift motor .....	4-182
	(5-4)Detaching and reattaching the PF lift motor .....	4-183
	(5-5)Detaching and reattaching the IH unit .....	4-185
(6)	Feed-shift/switchback section .....	4-193
	(6-1)Detaching and reattaching the job separator .....	4-193
	(6-2)Detaching and reattaching the eject unit .....	4-197
(7)	PWBs .....	4-200
	(7-1)Detaching and reattaching the engine PWB .....	4-200
	(7-2)Detaching and reattaching the main PWB .....	4-208
	(7-3)Detaching and reattaching the power source PWB .....	4-217
	(7-4)Detaching and reattaching the main high-voltage PWB .....	4-222
	(7-5)Detaching and reattaching the transfer high voltage PWB .....	4-231
	(7-6)Detaching and reattaching the IH PWB .....	4-232
	(7-7)Detaching and reattaching the operation panel PWB .....	4-239
	(7-8)Detaching and reattaching the PF main PWB and PF power source PWB .....	4-244
(8)	Document processor .....	4-248
	(8-1)Detaching and reattaching the document processor .....	4-248
	(8-2)Detaching and reattaching the DP rear cover .....	4-250
	(8-3)Detaching and reattaching the DP main PWB .....	4-251
	(8-4)Detaching and reattaching the CIS .....	4-253
	(8-5)Adjusting the angle of leading edge .....	4-256
	(8-6)Adjusting the angle of trailing edge .....	4-259

(8-7)Adjusting the hinge .....	4-263
4 - 7 Disassembly & Reassembly (option) .....	4-265
(1) Paper feeder (PF-730(B)) .....	4-265
(1-1)Detaching and reattaching the PF main PWB .....	4-265
(1-2)Detaching and reattaching the PF drive unit .....	4-267
(2) Paper feeder (PF-740(B)) .....	4-270
(2-1)Detaching and reattaching the PF main PWB .....	4-270
(2-2)Detaching and reattaching the PF drive unit .....	4-272
(2-3)Detaching and reattaching the PF lift motor .....	4-274
(3) Side feeder (PF-7120) .....	4-275
(3-1)Detaching and reattaching the PF drive unit .....	4-275
(3-2)Detaching and reattaching the PF lift motor .....	4-276
(3-3)Detaching and reattaching the PF main PWB .....	4-278
(4) Side Multi Feeder (PF-7130) .....	4-280
(4-1)Detaching and reattaching the PF drive unit .....	4-280
(4-2)Detaching and reattaching the lift motor .....	4-282
(4-3)Detaching and reattaching the PF main PWB .....	4-283
(5) 4000-sheet Finisher (DF-7110).....	4-285
(5-1)Detaching and reattaching the staple unit .....	4-285
(5-2)Detaching and reattaching the DF main PWB .....	4-287
(6) 100 sheet staple finisher (DF-7130) .....	4-289
(6-1)Separation of enhancement units .....	4-289
(6-2)Detaching and attaching the front cover .....	4-289
4 - 8 Periodic maintenance Procedures .....	4-298
(1) Main body .....	4-298
(2) Option .....	4-304
(2-1)PF-730(B) .....	4-304
(2-2)PF-740(B) .....	4-305
(2-3)PF-7120 .....	4-306
(2-4)PF-7130 .....	4-307
(2-5)DF-7110 .....	4-308
(2-6)DF-7130 .....	4-310
(2-7)BF-730 .....	4-312
(2-8)BF-9100 .....	4-314
(2-9)MT-730(B) .....	4-316
(2-10)PH-7A/7B/7C/7D .....	4-316
<b>5 Firmware .....</b>	<b>5-1</b>
5 - 1 Firmware update .....	5-1
<b>6 Maintenance mode .....</b>	<b>6-1</b>
6 - 1 Maintenance mode .....	6-1
(1) Procedure of the maintenance mode execution .....	6-1
(2) Maintenance modes list .....	6-2
(2-1)Content of the maintenance mode .....	6-8
(3) Detail of Event Log .....	6-10
(3-1)Contents of Event Log .....	6-12
(4) Detail of the service status page.....	6-17
<b>7 Troubleshooting .....</b>	<b>7-1</b>
7 - 1 Image formation problems .....	7-1
(1) Isolate the place of image failure .....	7-1
(2) Scanner Factors (when scanning from DP).....	7-2
(2-1)Abnormal image .....	7-4
(2-2)Colored background .....	7-5
(2-3)Black or color spots appear on the image .....	7-7
(2-4)Blurred characters .....	7-9

(2-5)Original center and copy image center are mismatched .....	7-10
(2-6)Horizontal black streaks .....	7-11
(2-7)Vertical black / color streaks or band .....	7-12
(2-8)There is a regular difference between the image leading edges of the original and copy .....	7-15
(2-9)Vertical white streaks or band .....	7-16
(2-11)Blank image or entirely black image .....	7-17
(2-12)Partly dark or light image .....	7-19
(2-13)Blurred image .....	7-20
(2-14)Part of the image is not copied .....	7-21
(2-15)Color shift .....	7-23
(2-16)Skewed image .....	7-24
(2-17)The entire image is too light .....	7-25
(3) Scanner Factors (when scanning on the contact glass).....	7-28
(3-1)Abnormal image .....	7-30
(3-2)Colored background .....	7-30
(3-3)Black or color spots appear on the image .....	7-31
(3-4)Blurred characters / Color Shift .....	7-32
(3-5)Original center and copy image center are mismatched .....	7-33
(3-6)Horizontal black streaks .....	7-33
(3-7)Vertical black / color streaks or band .....	7-34
(3-8)There is a regular difference between the image leading edges of the original and copy .....	7-35
(3-9)Vertical white streaks or band .....	7-35
(3-10)Moire .....	7-36
(3-11)Blank image or entirely black image .....	7-36
(3-12)Partly dark or light image .....	7-37
(3-13)Blurred image .....	7-38
(3-14)Part of the image is not copied .....	7-39
(3-15)Skewed image .....	7-40
(3-16)The entire image is too light .....	7-40
(4) Engine Factors (Paper conveying cause: Transfer, Fuser and Separation).....	7-41
(4-1)Colored background .....	7-44
(4-2)Black or color spots appear on the image .....	7-45
(4-3)Phenomenon1 .....	7-45
(4-4)Blank image .....	7-46
(4-5)Phenomenon1 .....	7-47
(4-6)Color shift in the main scanning direction .....	7-47
(4-7)Color shift in the sub scanning direction .....	7-47
(4-8)Paper creases .....	7-48
(4-9)Dirty reverse side .....	7-49
(4-10)The entire image is too light .....	7-49
(4-11)Horizontal streaks or band (white/black/color) .....	7-50
(4-12)The irregular misalignment occurs between the leading edges of the original and copy image (Variation of paper leading edge timing) .....	7-51
(4-13)Blurred characters .....	7-51
(4-14)Offset .....	7-51
(4-15)Poor color reproduction .....	7-53
(4-16)Fusing failure .....	7-54
(4-17)Paper skew at the trailing edge .....	7-54
(4-18)Uneven transfer .....	7-55
(4-19)Blurred image .....	7-56
(4-20)Vertical white streaks or band .....	7-56
(4-21)Vertical black / color streaks or band .....	7-57
(5) Engine Factors (Image forming cause).....	7-58
(5-1)Colored background .....	7-60
(5-2)Blank image .....	7-61
(5-3)Black spots appear on the image .....	7-62
(5-4)Entire black image .....	7-63
(5-5)Horizontal streaks or band (white/black) .....	7-64
(5-6)Irregular horizontal white spreads or spots appear on the image .....	7-65
(5-7)Horizontal uneven density .....	7-66



	(5-8)The entire image is too light .....	7-67
	(5-9)Part of the image is not copied .....	7-69
	(5-10)Offset .....	7-69
	(5-11)Poor gray scale reproduction .....	7-70
	(5-12)Blurred image .....	7-70
	(5-13)Vertical black streaks or band .....	7-70
	(5-14)Vertical uneven density .....	7-71
	(5-15)Vertical white streaks or band .....	7-71
7 - 2	Feeding/Conveying Failures .....	7-73
(1)	Prior standard check items .....	7-73
	(1-1)Paper jam due to the cover-open detection .....	7-73
	(1-2)Paper jam due to the wave or curl in the fuser section of the damp paper .....	7-74
	(1-3)Paper jam due to the dog-ear, paper skew, paper creases, fusing failure or the paper curl .....	7-74
	(1-4)Paper jam caused by the conveying guide, paper entry guide or the feedshift guide .....	7-74
	(1-5)Paper jam caused by improperly loaded paper in the cassette or the paper deck .....	7-75
	(1-6)Paper jam due to the inferior paper .....	7-75
	(1-7)Paper jam caused by the conveying rollers or the paper feed pulleys .....	7-75
	(1-8)Paper jam due to the sensor .....	7-76
	(1-9)Paper jam due to the setting / detection failure .....	7-76
	(1-10)Paper jam due to the static electricity .....	7-77
	(1-11)Paper jam caused by the installation environment (Papers inside the cassette are always damp.) .....	7-77
(2)	Paper misfeed detection .....	7-78
	(2-1)Paper misfeed indication .....	7-78
	(2-2)Paper misfeed detection condition .....	7-80
(3)	Jam Codes .....	7-84
7 - 3	Self Diagnostic .....	7-282
(1)	Self diagnostic error codes .....	7-282
(2)	Content of Self Diagnostic .....	7-287
(3)	System Error (Fxxx) Outline (1) .....	7-402
(4)	System Error (Fxxx) Outline (2) .....	7-408
7 - 4	FAX Related Errors .....	7-423
(1)	FAX Related Errors .....	7-423
	(1-1)The login fails with other than the ID card. ....	7-423
	(1-2)C0030: FAX PWB system error .....	7-423
	(1-3)C0070: FAX PWB incompatible detection error .....	7-423
	(1-4)C0650: FAX image storage pair-check error .....	7-424
	(1-5)C0830: FAX PWB flash program area checksum error .....	7-424
	(1-6)C0870: PC FAX Image data transmission error .....	7-425
	(1-7)C0920: FAX file system error .....	7-425
	(1-8)C0950: FAX job stay error .....	7-426
	(1-9)F14D: FAX control error .....	7-426
	(1-10)FAX cannot be sent. ....	7-426
	(1-11)The beep sounds when the copying or printing is finished. ....	7-427
	(1-12)When the data of the A3 or B4 size originals is transmitted, all of it is transmitted as the A4 size data. ....	7-427
(2)	Communication Errors .....	7-427
(3)	Communication Error codes .....	7-427
(4)	Communication Errors .....	7-446
(5)	Communication Error codes .....	7-446
7 - 5	Send Related Errors .....	7-466
(1)	Send Related Errors .....	7-466
	(1-1)The sending error 2101 does not disappear even if changing the host name or the security software settings. ....	7-466
	(1-2)Sending error 2203 does not disappear. ....	7-466
	(1-3)The scanning data from the contact glass is automatically sent. ....	7-466
(2)	Sending Errors (Error Codes) .....	7-466
	(2-1)Scan to E-mail Error Codes .....	7-466
	(2-2)Scan to FTP Error Codes .....	7-470

7 - 6	Print Errors.....	7-475
(1)	The paper loading message appears .....	7-476
(2)	The paper direction is incorrect .....	7-477
(3)	Paper is fed from the MP tray. ....	7-477
(4)	Garbled characters .....	7-478
(5)	Paper is not fed from the MP tray.....	7-478
(6)	The same data is repeatedly printed out .....	7-478
(7)	PC window shows [Print job error] or [Standby], or [Printer unavailable] is indicated on the printer properties.....	7-478
(8)	Processing and Memory lamps are lit while the printer standby message is indicated .....	7-479
(9)	Data is not printed out in Sleep mode due to the main unit startup error. Processing/ Memory lamp is turned on. ....	7-479
(10)	Print stops after printing several pages and locks up. Processing and Memory lamps on operation panel are lit.....	7-479
(11)	Print output is unavailable due to the network factor .....	7-480
(12)	Print output is unavailable due to the network factor .....	7-480
(13)	Print output is unavailable due to the network factor .....	7-480
(14)	Print output is unavailable due to the network factor .....	7-481
(15)	Print output is unavailable due to the network factor .....	7-481
(16)	Print output is unavailable due to the network factor .....	7-482
(17)	Print output is unavailable due to the network factor .....	7-482
(18)	Data is not printed out due to the printer driver setting .....	7-483
(19)	Data is not printed out due to the printer driver setting .....	7-483
(20)	Data is not printed out due to the printer driver setting .....	7-483
(21)	Data is not printed out due to the printer driver setting .....	7-483
(22)	Data is not printed out due to the printer driver setting .....	7-484
(23)	Data is not printed out due to the printer driver setting .....	7-484
(24)	Data is not printed out due to the printer driver setting .....	7-484
(25)	The printed image is partly missing .....	7-484
(26)	"Paper Mismatch Error" appears .....	7-485
7 - 7	Abnormal Noise .....	7-486
(1)	Abnormal sound occurs (Basic Measures) .....	7-486
(2)	Abnormal sounds from the paper conveying section .....	7-487
(3)	Abnormal sound from the developer section .....	7-487
(4)	Phenomenon 1 .....	7-487
(5)	Abnormal sound from the eject section .....	7-488
(6)	Fan rotating sounds are noisy .....	7-488
(7)	Abnormal sound from the primary paper feed section .....	7-488
(8)	Abnormal sound from the machine front side .....	7-488
(9)	Abnormal sound from the lower side than the fuser eject section .....	7-489
(10)	Abnormal sound from the upper side of the fuser eject section.....	7-489
(11)	Abnormal sound from the fuser section .....	7-489
(12)	Abnormal sound from inside the machine .....	7-490
(13)	Abnormal sound from inside the machine .....	7-490
(14)	Abnormal sound from inside the machine .....	7-490
(15)	The drive sounds are noisy during printing.....	7-490
7 - 8	Malfunction .....	7-491
(1)	The cassette paper size is misdetected.....	7-491
(2)	The paper size loaded in the paper deck of the large capacity feeder is misdetected. ....	7-492
(3)	The MP tray paper size is misdetected.....	7-492
(4)	The controller fan motor does not rotate.....	7-493
(5)	The developer fan motor does not rotate.....	7-493
(6)	The main unit malfunctions even if turning on the power switch .....	7-493
(7)	Toner falls over the paper conveying section .....	7-494
<b>8</b>	<b>PWBs .....</b>	<b>8-1</b>
8 - 1	Description for PWB .....	8-1
(1)	Main PWB .....	8-1
(2)	Engine PWB .....	8-10

(3) Main high-voltage PWB .....	8-37
(4) Transfer high-voltage PWB .....	8-40
(5) Power source PWB .....	8-42
(6) Front PWB .....	8-46
(7) Feed PWB .....	8-57
(8) Retainer PWB .....	8-66
(9) Relay PWB .....	8-68
(10) Motor relay PWB .....	8-73
(11) LSU relay PWB .....	8-78
(12) Operation panel main PWB .....	8-86
(13) IH PWB .....	8-91
(14) Fuser high-voltage PWB .....	8-93
(15) PF main PWB .....	8-94
(16) BR PWB .....	8-98
(17) DP main PWB .....	8-101
(18) DP relay PWB .....	8-106
8 - 2 Description for PWB (OPTION) .....	8-109
(1) PF main PWB (PF-730(B)) .....	8-109
(2) PF main PWB (PF-740(B)) .....	8-114
(3) PF main PWB (PF-7120) .....	8-119
(4) PF main PWB (PF-7130) .....	8-122
(5) DF main PWB (DF-7110) .....	8-126
(6) DF PWB (DF-7130) .....	8-134
(7) MT main PWB (MT-730(B)) .....	8-145
(8) BF main PWB (BF-730) .....	8-147
(9) BF PWB (BF-9100) .....	8-151
(10) PH main PWB (PH-7) .....	8-155

## **9 Appendixes ..... 9-1**

9 - 1 Repetitive defects gauge .....	9-1
9 - 2 Firmware environment commands .....	9-2
9 - 3 Inner Cleaning .....	9-10
(1) Cleaning the paper conveying plate .....	9-10
(2) Cleaning the separator .....	9-11
9 - 4 Chart of image adjustment procedures .....	9-12
9 - 5 Wiring diagram .....	9-16
(1) Engine PWB .....	9-16
(2) Laser Scanner .....	9-17
(3) Front PWB (1) .....	9-18
(4) Front PWB (2) .....	9-19
(5) Front PWB (3) .....	9-20
(6) Fuser .....	9-21
(7) Feed PWB (1) .....	9-22
(8) Feed PWB (2) .....	9-23
(9) Feed PWB (3) .....	9-24
(10) Motor relay PWB .....	9-25
(11) Power source PWB / High-voltage PWB (100V) .....	9-26
(12) CCD / Engine PWB .....	9-29
(13) Operation panel main PWB .....	9-30
(14) Main PWB .....	9-31
(15) Document processor .....	9-32
(16) PF main PWB .....	9-33
9 - 6 Wiring diagram (Options) .....	9-34
(1) Paper feeder (PF-730(B)) wiring diagram .....	9-34
(2) Paper feeder (PF-740(B)) wiring diagram .....	9-35
(3) Paper feeder (PF-7120) wiring diagram .....	9-36
(4) Paper feeder (PF-7130) wiring diagram .....	9-37
(5) Finisher (DF-7110) wiring diagram .....	9-38
(6) Mailbox (MT-730(B)) wiring diagram: for DF-7110 .....	9-39

(7) Booklet folder (BF-730) wiring diagram: for DF-7110 .....	9-40
(8) Punch unit (PH-7) wiring diagram: for DF-7110 .....	9-41
9 - 7 Installation Guide .....	9-42
(1) PF-7120 .....	9-42
(2) PF-7130+PF-730(B)/PF-740(B) .....	9-69
(3) DF-7110 .....	9-89
(4) DF-7130 .....	9-110
(5) MT-730(B) .....	9-129
(6) BF-730 .....	9-144
(7) BF-9100 .....	9-162
(8) PH-7A/B/C/D .....	9-178
(9) FAX System 12 .....	9-199

# 1 Specifications

## 1 - 1 Specifications

### (1)Common function

Items		Description
<b>Type</b>		Console
<b>Printing Method</b>		Electrophotography by semiconductor laser
<b>Paper Weight</b>	<b>Cassette</b>	60 to 256 g/m <sup>2</sup>
	<b>Multi Purpose Tray</b>	60 to 300 g/m <sup>2</sup>
<b>Paper type</b>	<b>Cassette</b>	Plain, Rough, Vellum, Recycled, Preprinted, Bond, Color Prepunched, Letterhead, Thick, High Quality, Custom (Duplex: Same as Simplex)
	<b>Multi Purpose Tray</b>	Plain, Transparency (OHP film), Rough, Vellum, Labels, Recycled, Preprinted, Bond, Hagaki (Cardstock), Color, Prepunched, Letterhead, Envelope, Thick, High Quality, Coated, Index Tab Dividers, Custom 1 to 8
<b>Paper Size</b>	<b>Cassette 1, 2</b>	A3, A4, A5, B4, B5, 216×340 mm, Ledger, Letter, Legal, Statement, 12×18", Oficio II, Folio, 8K, 16K Custom 1 to 4 (140 ×182 mm to 304 ×457 mm)
	<b>Cassette 3, 4</b>	A4, B5, Letter
	<b>Multi Purpose Tray</b>	A3, A4, A5, A6, B4, B5, B6, 216x340 mm, Ledger, Letter, Legal, Statement, Executive, 12×18", Oficio II, Folio, 8K, 16K, ISO B5, Envelope #10, Envelope #9, Envelope #6, Envelope Monarch, Envelope DL, Envelope C5, Envelope C4, Hagaki (Cardstock), Oufuku Hagaki (Return postcard), Youkei 4, Youkei 2, Custom 1 to 4 (98 ×148 mm to 304 ×457 mm) 1 sheet (Banner sheet (210 ×470.1 to 304.8 ×1,220 mm / 8.26" ×18.5" to 12" ×48"))
<b>Printable Area</b>		Print margin for top, bottom and both sides is 4.2 mm
<b>Warm-up Time (23°C/73.4°F, 60%)</b>	<b>Power on</b>	Within 44.0 seconds
	<b>Low Power</b>	10 seconds or less
	<b>Sleep</b>	Within 39.0 seconds
<b>Paper Capacity</b>	<b>Cassette 1, 2</b>	500 sheets (80 g/m <sup>2</sup> )*1
	<b>Cassette 3, 4</b>	1,500 sheets (80 g/m <sup>2</sup> )*1
	<b>Multi Purpose Tray</b>	150 sheets (A4/Letter or smaller)(80 g/m <sup>2</sup> ) 50 sheets (larger than A4/Letter)(80 g/m <sup>2</sup> ) 1 sheet (Banner sheet (210 ×488.1 to 304.8 ×1,220 mm / 8.26" ×19.22" to 12" ×48.03")), (136 to 163 g/m <sup>2</sup> )
<b>Output Tray Capacity</b>	<b>Left lower tray</b>	250 Sheets (80 g/m <sup>2</sup> )
	<b>Left upper tray</b>	100 Sheets (80 g/m <sup>2</sup> )
	<b>Right tray</b>	70 sheets (80 g/m <sup>2</sup> )
<b>Image Write System</b>		Semiconductor laser and electrophotography
<b>Light source</b>		LED array
<b>Scanning method</b>		Flat surface scanning by the CCD image sensor

Items		Description
<b>Photoconductor</b>		a-Si drum (diameter 40mm)
<b>Charging system</b>		Contact charger roller method
<b>Developer system</b>		Touch down developing system Developer: 2-component Toner replenishing: Automatic from the toner container
<b>Transfer system</b>		Transfer belt + roller system
<b>Separation system</b>		Small diameter separation + separation needle
<b>Cleaning system</b>	<b>Drum</b>	Counter blade + cleaning roller
	<b>Primary transfer</b>	Fur brush cleaning + Pre-brush system
<b>Charge erasing system</b>		Exposure by cleaning lamp (LED)
<b>Fusing system</b>		Sliding IH fuser system Heat source: IH, halogen heater (press roller) Abnormally high temperature protection devices: thermostat
<b>Memory</b>		4.5 GB
<b>Large capacity storage</b>		SSD 8 GB / Hard Disk 320 GB
<b>Interface</b>	<b>Standard</b>	USB Interface Connector: 1 (Hi-Speed USB) Network interface: 1 (10 BASE-T/100 BASE-TX/1000 BASE-T (IPv6, IPv4, IPSec), 802.3az supported) USB Port: 4 (Hi-Speed USB)
	<b>Option</b>	eKUIO: 2*2 Fax: 2*3 Wireless LAN: 1*4
<b>Operating Environment</b>	<b>Temperature</b>	10 to 32.5°C/50 to 90.5°F
	<b>Humidity</b>	10 to 80 %
	<b>Altitude</b>	3,500 m/11,482 ft maximum
	<b>Brightness</b>	1,500 lux maximum
<b>Dimension (W ×D ×H)</b>		29.53" × 32.37" × 48.59" 750 ×822 ×1,234 mm
<b>Weight</b>		Approx. 330.7 lb / Approx. 150 kg/ (without toner container)
<b>Space Required (W ×D)</b>		39.97" × 32.37"/ 1,015 × 822 mm/ (Using multi purpose tray)
<b>Power source</b>		120 V Specification Model: 120 V ~ 60 Hz 16 A 230 V Specification Model: 220 to 240 V ~ 50/60 Hz 10 A

\*1: Up to upper limit height line in the cassette.

\*2: When two optional interface are installed, a fax line can not be installed.

\*3: When IB-50 or IB-51 is installed, only one fax line can be installed.

\*4: This is standard in South and North America.

**(2)Copy Functions**

Items		Description		
Copy Speed	73 ppm model	A4/Letter A4-R/Letter-R A3/Ledger B4/Legal B5 B5-R A5-R	Black and White Copying 73 sheets/min 51 sheets/min 36 sheets/min 43 sheets/min 73 sheets/min 51 sheets/min 36 sheets/min	Full Color Copying 65 sheets/min 45 sheets/min 32 sheets/min 39 sheets/min 65 sheets/min 45 sheets/min 32 sheets/min
	83 ppm model	A4/Letter A4-R/Letter-R A3/Ledger B4/Legal B5 B5-R A5-R	Black and White Copying 83 sheets/min 58 sheets/min 41 sheets/min 49 sheets/min 83 sheets/min 58 sheets/min 41 sheets/min	Full Color Copying 70 sheets/min 49 sheets/min 35 sheets/min 42 sheets/min 70 sheets/min 49 sheets/min 35 sheets/min
First Copy Time (A4, place on the platen, feed from Cassette)	Black and White	73 ppm model: 5.4 seconds or less 83 ppm model: 4.8 seconds or less		
Zoom Level	Manual mode: 25 to 400%, 1% increments Auto mode: Preset Zoom			
Continuous Copying	1 to 9,999 sheets			
Resolution	1200 ×1200 dpi (multi-bit)			
Supported Original Types	Sheet, Book, 3-dimensional objects (maximum original size: A3/Ledger)			
Original Feed System	Fixed			

**(3)Printer Functions**

Items		Description		
Printing Speed	73 ppm model	12x18"	Black and White Printing 36 sheets/min	Full Color Printing 32 sheets/min
	83 ppm model	12x18"	41 sheets/min	45 sheets/min
		Other than the above size, specifications are the same as those of Copy Speed.		
First Print Time (A4)	Black and White	73 ppm model: 5.3 seconds or less 83 ppm model: 4.9 seconds or less		
	Color	73 ppm model: 6.3 seconds or less 83 ppm model: 6.1 seconds or less		
Resolution		1200 ×1200 dpi (multi-bit)		
Operating System		Windows 7, Windows 8.1, Windows 10, Windows Server 2008/R2, Windows Server 2012/R2, Windows Server 2016, Windows Server 2019, Mac OS ×v10.9 or Higher		
Interface		USB Interface Connector: 1 (Hi-Speed USB) Network interface: 1 (10 BASE-T/100 BASE-TX/1000 BASE-T (IPv6, IPv4, IPSec), 802.3az supported) Optional Interface (Option): 2 (For IB-50/IB-51 mounting) Wireless LAN (Option): 1 (For IB-35 mounting)*1		
Page Description Language		PRESCRIBE		
Emulations		PCL6 (PCL-XL/PCL-5e), KPDL3 (PostScript3 compatible), PDF, XPS, Open XPS, PPML		

\*1:This is standard in South and North America.



**(4)Scanner Functions**

Items		Description
<b>Resolution</b>		600 dpi ×600 dpi, 400 dpi ×400 dpi, 200 dpi ×400 dpi, 300 dpi ×300 dpi, 200 dpi ×200 dpi, 200 dpi ×100 dpi
<b>File Format</b>		TIFF, JPEG, XPS, Open XPS, PDF (MMR/JPEG compression/High compressive PDF/OCR Text Recognition), MS Office file
<b>Scanning Speed*1 (A4 landscape, 300 dpi, Image quality: Text/Photo original)</b>	<b>73 ppm model</b>	1-sided: B/W 120 images/min, Color 120 Images/min 2-sided: B/W 220 Images/min, Color 220 Images/min
	<b>83 ppm model</b>	1-sided: B/W 120 images/min, Color 120 Images/min 2-sided: B/W 220 Images/min, Color 220 Images/min
<b>Interface</b>		Ethernet (10 BASE-T/100 BASE-TX/1000 BASE-T)
<b>Transmission System</b>		SMB, SMTP, FTP, FTP over SSL, TWAIN*2, WIA*2, WSD

\*1 When using the document processor (Dual Scan with Skewed and Multifeed Detection) (except TWAIN and WIA scanning)

\*2 Available Operating System: Windows Server 2008/Windows Server 2008 R2/Windows 7/Windows 8.1/Windows 10/Windows Server 2012/Windows Server 2012 R2/Windows Server 2016/Windows Server 2019

**(5)Document Processor**

Items	Description
<b>Document feed method</b>	Automatic feed
<b>Supported Original Types</b>	Sheet originals
<b>Paper Size</b>	Maximum: A3/Ledger 11.69"x17"/297 ×432 mm (Long-sized: 11.69"x86.62"/297 ×2,200 mm)
	Minimum: A6-R/Statement-R 4.13" x 5.82/105 ×148 mm
<b>Paper Weight</b>	1-sided: 35 to 220 g/m <sup>2</sup> 2-sided: 50 to 220 g/m <sup>2</sup> Sizes smaller than B6-R are 50 to 105 g/m <sup>2</sup> (1-side/duplex)
<b>Loading Capacity</b>	270 sheets maximum (50 to 80 g/m <sup>2</sup> )*1
<b>Dimensions (W ×D ×H)</b>	23.63" × 20.20" × 6.70"/ 600 ×513 ×170mm
<b>Weight</b>	Approx. 32.0 lbs./ Approx. 14.5 kg

\*1 Up to upper limit height line in the document processor.

**(6)Option****(6-1)Side Feeder (500 sheets ×3)**

Items	Description
<b>Paper Supply Method</b>	Feed & reverse roller method (No. Sheets: 550 sheets(64 g/m <sup>2</sup> )×3 cassettes / 500(80g/m <sup>2</sup> )×3 cassettes)
<b>Paper Size</b>	A3, A4-R, A4, A5-R, B4, B5-R, B5, 216×340 mm, Ledger, Letter-R, Letter, Legal, Statement-R, 12×18", Oficio II, Folio, 8K, 16K-R, 16K
<b>Supported Paper</b>	Paper weight: 60 to 256 g/m <sup>2</sup> Paper types: Plain, Recycled, Thick, Coated* <sup>1</sup>
<b>Dimension (W ×D ×H)</b>	23.55" × 28.35" × 21.11" 598 × 720 × 536 mm
<b>Weight</b>	Approx. 114.7 lbs. / Approx. 52 kg

\*<sup>1</sup> usable only cassette 5**(6-2)Large Capacity Feeder (500sheets, 1,500sheets ×2)**

Items	Description
<b>Paper Supply Method</b>	Feed & reverse roller method (No. Sheets: 550(64 g/m <sup>2</sup> )×1 cassette / 1,750(64g/m <sup>2</sup> )×2 cassettes) 550sheets(80 g/m <sup>2</sup> )×1 cassette / 1,500sheets(80g/m <sup>2</sup> )×2 cassettes)
<b>Paper Size</b>	<b>Cassette 5</b> A3, A4-R, A4, A5-R, B4, B5-R, B5, 216×340 mm, Ledger, Letter-R, Letter, Legal, Statement-R, 12×18", Oficio II, Folio, 8K, 16K-R, 16K
	<b>Cassette 6, 7</b> A4, B5, Letter
<b>Supported Paper</b>	Paper weight: 60 to 256 g/m <sup>2</sup> Paper types: Plain, Recycled, Thick, Coated paper* <sup>1</sup>
<b>Dimension (W ×D ×H)</b>	23.55" × 28.35" × 21.11" 598 ×720 ×536mm
<b>Weight</b>	Approx. 112.5 lbs. / Approx. 51 kg

\*<sup>1</sup> Only Cassette 5 can be used.**(6-3)Side Feeder (3,000-sheet ×1)**

Items	Specifications
<b>Paper Supply Method</b>	Feed & reverse roller method (No. Sheets: 3,500 sheets(64 g/m <sup>2</sup> )×1 cassette / 3,000sheets(80g/m <sup>2</sup> )×1 cassette)
<b>Paper Size</b>	A4, B5, Letter
<b>Supported Paper</b>	Paper weight: 52 to 300 g/m <sup>2</sup> Media types: Plain, Recycled, Special paper
<b>Dimension (W ×D ×H)</b>	13.82" × 23.04" × 18.47" 351 × 585 × 469 mm
<b>Weight</b>	Approx. 58.5 lbs. / Approx. 26.5 kg

**(6-4)4,000-Sheet Finisher**

Items		Description	
<b>Number of Trays</b>		3 tray	
<b>Paper Size (80 g/m<sup>2</sup>)</b>	<b>Tray A (Non-Stapling)</b>	A3, B4, B5-R, 216×340 mm, Ledger, Legal, Executive, 12×18", Oficio II, Folio, 8K, 16K-R: 1,500 sheets A4-R, A4, B5, Letter-R, Letter, 16K: 4,000 sheets A5-R, B6-R, Statement-R: 500 sheets	
	<b>Tray B</b>	A3, A4-R, A4, A5-R, A6-R, B4, B5-R, B5, B6-R, 216×340 mm, Ledger, Letter-R, Letter, Legal, Statement-R, Executive, 12×18", Oficio II, Folio, 8K, 16K-R, 16K, ISO B5, Envelope C4, Hagaki (Cardstock), Oufuku hagaki (Return postcard): 200 sheets	
<b>Paper Weight</b>		Stapling: 90 g/m <sup>2</sup> or less	
<b>Stapling</b>	<b>Number of sheets to limit</b>	A3, B4, 216×340 mm, Ledger, Legal, 12×18", Oficio II, 8K,	30 sheets (52 to 105 g/m <sup>2</sup> ) 2 cover sheet only (106 to 300 g/m <sup>2</sup> )
		A4-R, A4, B5-R, B5, Letter-R, Letter, 16K-R, 16K	65 sheets (52 to 90 g/m <sup>2</sup> ) 55 sheets (91 to 105 g/m <sup>2</sup> ) 2 cover sheet only (106 to 300 g/m <sup>2</sup> )
	<b>Paper type</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Thick, Coated, High Quality, Custom	
<b>Dimensions Dimension (W ×D ×H)</b>		23.91" × 26.32" × 41.79" 607.2 ×668.5 ×1,061.3 mm/	
<b>Weight</b>		Approx. 88.2 lbs/ Approx. 40 kg	
<b>Space Required (W ×D)</b>		725 ×668.5 mm / 28.55" ×26.32" (When pulling the tray)	

**(6-5)100-Sheet Staple Finisher**

Items		Description	
<b>Number of Trays</b>		2 trays	
<b>Paper Size (80 g/m<sup>2</sup>)</b>	<b>Tray A (Non-Stapling)</b>	A3, B4, B5-R, 216×340 mm, Ledger, Legal, Executive, 12×18", Oficio II, Folio, 8K: Height 227 mm (Equivalent to 1,500 sheets) A4-R, A4, B5, Letter-R, Letter, 16K-R, 16K: Height 512 mm (Equivalent to 4,000 sheets) A5-R, B6-R, Statement-R: Height 91 mm (Equivalent to 500 sheets)	
	<b>Tray B</b>	A3, A4-R, A4, A5-R, A6-R, B4, B5-R, B5, B6-R, 216×340 mm, Ledger, Letter-R, Letter, Legal, Statement-R, Executive, 12×18", Oficio II, Folio, 8K, 16K-R, 16K, ISO B5, Envelope #10, Envelope #9, Envelope #6, Envelope Monarch, Envelope DL, Envelope C5, Envelope C4, Hagaki (Cardstock), Oufuku hagaki (Return postcard), Kakugata 2, Youkei 4, Youkei2, Younaga 3, Nagagata 3: Height 45 mm (Equivalent to 200 sheets)	
<b>Paper Weight</b>		Stapling: 90 g/m <sup>2</sup> or less	
<b>Stapling</b>	<b>Number of sheets to limit</b>	A3, B4, 216×340 mm, Ledger, Legal, 12×18", Oficio II, 8K,	50 sheets (52 to 90 g/m <sup>2</sup> ) 35 sheets (91 to 105 g/m <sup>2</sup> ) 2 cover sheet only (106 to 300 g/m <sup>2</sup> )
		A4-R, A4, B5-R, B5, Letter-R, Letter, 16K-R, 16K	100 sheets (52 to 90 g/m <sup>2</sup> ) 70 sheets (91 to 105 g/m <sup>2</sup> ) 2 cover sheet only (106 to 300 g/m <sup>2</sup> )
	<b>Paper type</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Thick, Coated, High Quality, Custom 1 to 8	
<b>Dimensions Dimension (W ×D ×H)</b>		29.55" × 26.18" × 43.68" 750.5 ×665 ×1,109.5 mm/	

Items	Description
Weight	Approx. 124.6 lbs / Approx. 56.5 kg
Space Required (W xD)	867.6 x687 mm / 34.16" x 26.18" (When pulling the tray)

**(6-6)Punch Unit (4,000 sheets/100-sheet Staple finisher option)**

Items			Description
Paper Size	Inch	2 Hole	A3, A4-R, A4, A5-R, B4, B5-R, B5, Ledger, Letter-R, Letter, Legal, Statement-R, 12x18", Folio, 8K, 16K, 16K-R
		3 Hole	A3, A4, Letter, Ledger, 12x18", 8K, 16K
	cm	2 Hole	A3, A4-R, A4, A5-R, B4, B5-R, B5, Ledger, Letter-R, Letter, Legal, Statement-R, 12x18", Folio, 8K, 16K, 16K-R
		4 Hole	A3, A4, Letter, Ledger, 12x18", 8K, 16K
Paper Weight			45 to 300 g/m <sup>2</sup>
Paper type			Plain, Rough, Recycled, Preprinted, Bond, Color, Letterhead, Thick, Coated, High Quality, Custom 1 to 8

**(6-7)Mailbox (4,000 sheets finisher option)**

Items	Specification
Number of Trays	7 trays
Paper Size(80 g/m <sup>2</sup> )	A3, B4, Ledger, Legal, 8K: 50 sheets A4-R, A4, A5-R, B5-R, B5, 216x340 mm, Letter-R, Letter, Statement-R, Executive, Oficio II, Folio, 16K-R, 16K: 100 sheets
Dimensions Dimension (W xD xH)	20.08" x 15.75" x 18.51" 510 x 400 x 470 mm
Weight	Approx. 22.1 lbs. / Approx. 10 kg

**(6-8)Folding Unit (4,000 sheets finisher option)**

Items		Specification
Fold possibility Size	Bi-Fold	A3, B4, A4-R, Ledger, Letter-R, Legal, Oficio II, 8K
	Saddle Stitch	A3, B4, A4-R, Ledger, Letter-R, Legal, Oficio II, 8K
	Tri-Fold	A4-R, Letter-R
Number of Sheets	Bi-Fold	5 sheets (60 to 90 g/m <sup>2</sup> ) 3 sheets (91 to 120 g/m <sup>2</sup> ) 1 sheet (121 to 256 g/m <sup>2</sup> )
	Saddle Stitch	20 sheets (60 to 90 g/m <sup>2</sup> ) 13 sheets (91 to 120 g/m <sup>2</sup> ) 1 cover sheet only (106 g/m <sup>2</sup> or heavier)
	Tri-Fold	5 sheets (60 to 90 g/m <sup>2</sup> ) 3 sheets (91 to 120 g/m <sup>2</sup> )

Items		Specification
<b>Maximum Number for Storage (80 g/m<sup>2</sup>)</b>	<b>Bi-Fold</b>	5 sheets or less per set: 30 sets or more 6 to 10 sheets per set: 20 sets or more 11 to 20 sheets per set: 10 sets or more
	<b>Saddle Stitch</b>	5 sheets or less per set: 30 sets or more 6 to 10 sheets per set: 20 sets or more 11 to 20 sheets per set: 10 sets or more
	<b>Tri-Fold</b>	1 sheet per set: 30 sets or more 2 to 5 sheets per set: 5 sets or more
<b>Media types</b>	<b>Bi-Fold</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Thick, Coated, High Quality, Custom 1 to 8
	<b>Saddle Stitch</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Thick, Coated, High Quality, Custom 1 to 8
	<b>Tri-Fold</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Coated, High Quality, Custom 1 to 8

**(6-9)Folding Unit (100 sheets Staple finisher option)**

Items		Specification
<b>Fold possibility Size</b>	<b>Bi-Fold</b>	A3, B4, A4-R, Ledger, Letter-R, Legal, Oficio II, 8K, 12x18"
	<b>Saddle Stitch</b>	A3, B4, A4-R, Ledger, Letter-R, Legal, Oficio II, 8K, 12x18"
	<b>Tri-Fold</b>	A4-R, Letter-R
<b>Number of Sheets</b>	<b>Bi-Fold</b>	5 sheets (52 to 90 g/m <sup>2</sup> ) 3 sheets (91 to 105 g/m <sup>2</sup> ) 1 sheet (106 to 256 g/m <sup>2</sup> )
	<b>Saddle Stitch</b>	20 sheets (52 to 90 g/m <sup>2</sup> ) 13 sheets (91 to 105 g/m <sup>2</sup> ) 1 cover sheet only (106 g/m <sup>2</sup> or heavier)
	<b>Tri-Fold</b>	5 sheets (52 to 90 g/m <sup>2</sup> ) 3 sheets (91 to 120 g/m <sup>2</sup> )
<b>Maximum Number for Storage (80 g/m<sup>2</sup>)</b>	<b>Bi-Fold</b>	5 sheets or less per set: 20 sets 6 to 10 sheets per set: 10 sets 11 to 20 sheets per set: 10 sets
	<b>Saddle Stitch</b>	5 sheets or less per set: 25 sets 6 to 10 sheets per set: 20 sets 11 to 20 sheets per set: 10 sets
	<b>Tri-Fold</b>	1 sheet per set: 50 sets 2 to 5 sheets per set: 25 sets
<b>Media types</b>	<b>Bi-Fold</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Thick, Coated, High Quality, Custom 1 to 8
	<b>Saddle Stitch</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Thick, Coated, High Quality, Custom 1 to 8
	<b>Tri-Fold</b>	Plain, Recycled, Preprinted, Bond, Color, Prepunched, Letterhead, Coated, High Quality, Custom 1 to 8

**(6-10)Banner Tray**

Items	Description
<b>Max. number of sheets</b>	10 sheets (Multi Purpose tray)
<b>Paper width</b>	210 to 304.8 mm (8.26" to 12")
<b>Paper length</b>	Max. 1220.0 mm (48")
<b>Supported Paper</b>	Paper weight: 136 to 163 g/m <sup>2</sup> Media types: Heavy 2
<b>Dimensions</b> <b>Dimension (W xD xH)</b>	9.85" x 14.73" x 5.99" 250 x 374 x 152 mm
<b>Weight</b>	Approx. 0.8 lbs. / Approx. 0.352 kg

**(6-11)FAX System****FAX function**

Items	Description
<b>Compatibility</b>	G3
<b>Communication Line</b>	Subscriber telephone line
<b>Transmission Time</b>	Less than 3 seconds (33600 bps, JBIG, ITU-T A4-R #1 chart)
<b>Transmission Speed</b>	33600/31200/28800/26400/24000/21600/19200/16800/14400/12000/ 9600/7200/4800/2400 bps
<b>Coding Scheme</b>	JBIG/MMR/MR/MH
<b>Error Correction</b>	ECM
<b>Original Size</b>	Maximum width: 297 mm, maximum length: 1,600 mm
<b>Number of originals to auto feed</b>	Max. 270 sheets (with optional document processor)
<b>Resolution</b>	Scan: 200 ×100 dpi Normal (8 dot/mm ×3.85 line/mm) 200 ×200 dpi Fine (8 dot/mm ×7.7 line/mm) 200 ×400 dpi Super (Super Fine) (8 dot/mm ×15.4 line/mm) 400 ×400 dpi Ultra (Ultra Fine) (16 dot/mm ×15.4 line/mm) 600 ×600 dpi Print: 600 ×600 dpi
<b>Gradations</b>	256 shades (Error diffusion)
<b>One Touch Key</b>	1,000 keys
<b>Multi-Station Transmission</b>	Max. 500 destinations (Maximum number of stations: 500, maximum of 100 stations for i-Fax)
<b>Substitute Memory Reception</b>	7000 sheets or more (when using ITU-T A4 #1)
<b>Image Memory Capacity</b>	170MB
<b>Report Output</b>	Send result report, FAX Rx-result report, Activity report, Status page
<b>Option</b>	Dual port, internet FAX kit

**Network FAX functions**

Items	Description
<b>Hardware</b>	IBM PC-AT compatible computer
<b>Interface</b>	10BASE-T, 100BASE-TX, 1000BASE-T, 802.3a corresponded
<b>Operating system</b>	Windows 7, Windows 8.1 and Windows 10, Windows Server 2008/R2, Windows Server 2012/R2, Windows Server 2016, Windows Server 2019
<b>Transmission Resolution</b>	Ultra fine (400 ×400dpi), Fine (200 ×200dpi), Normal (100 ×200dpi), 600 ×600dpi
<b>Document Size</b>	Letter, Legal, Ledger (11x17), Statement, A3, A4, A5, Folio, B4, B5(JIS)
<b>FAX Delayed Transmission</b>	Based on settings in the Network Fax Driver (setting is possible to any 1 minute increment within the subsequent 24 hour period)
<b>Transmit and Print</b>	FAX transmission and print out at the machine is available
<b>Broadcast Transmission</b>	Max. 500 destinations (Maximum number of stations: 500, maximum of 100 stations for i-Fax)

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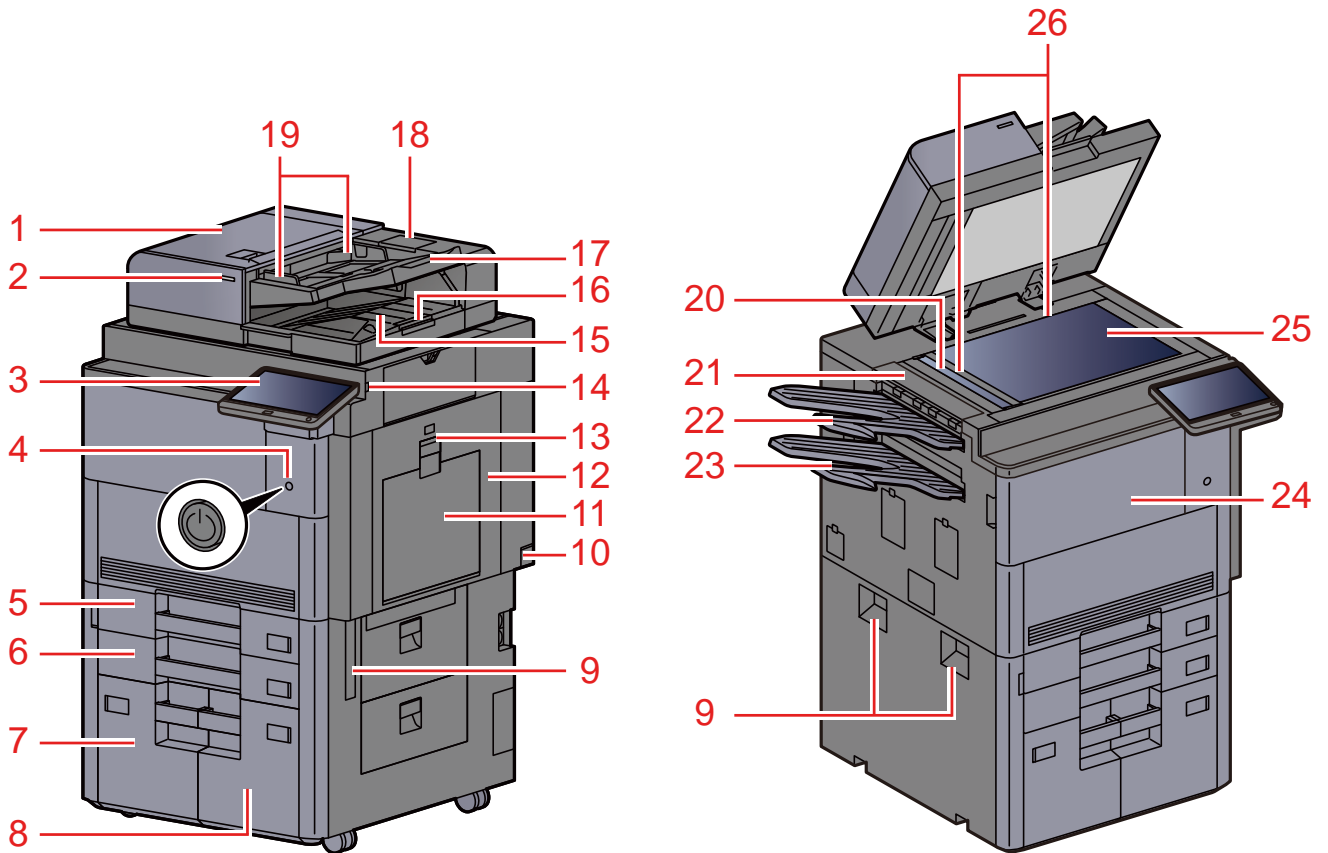
Items	Description
<b>Job Accounting</b>	Requires the input of a Login User Name and Password in the Network FAX Driver when User Login, is turn ON in the FAX machine. Requires the input of an Account ID in the Network FAX Driver when Job Accounting, is turned ON in the FAX machine.
<b>Cover Page</b>	A format can be selected using the Network FAX Driver or a template can be created.



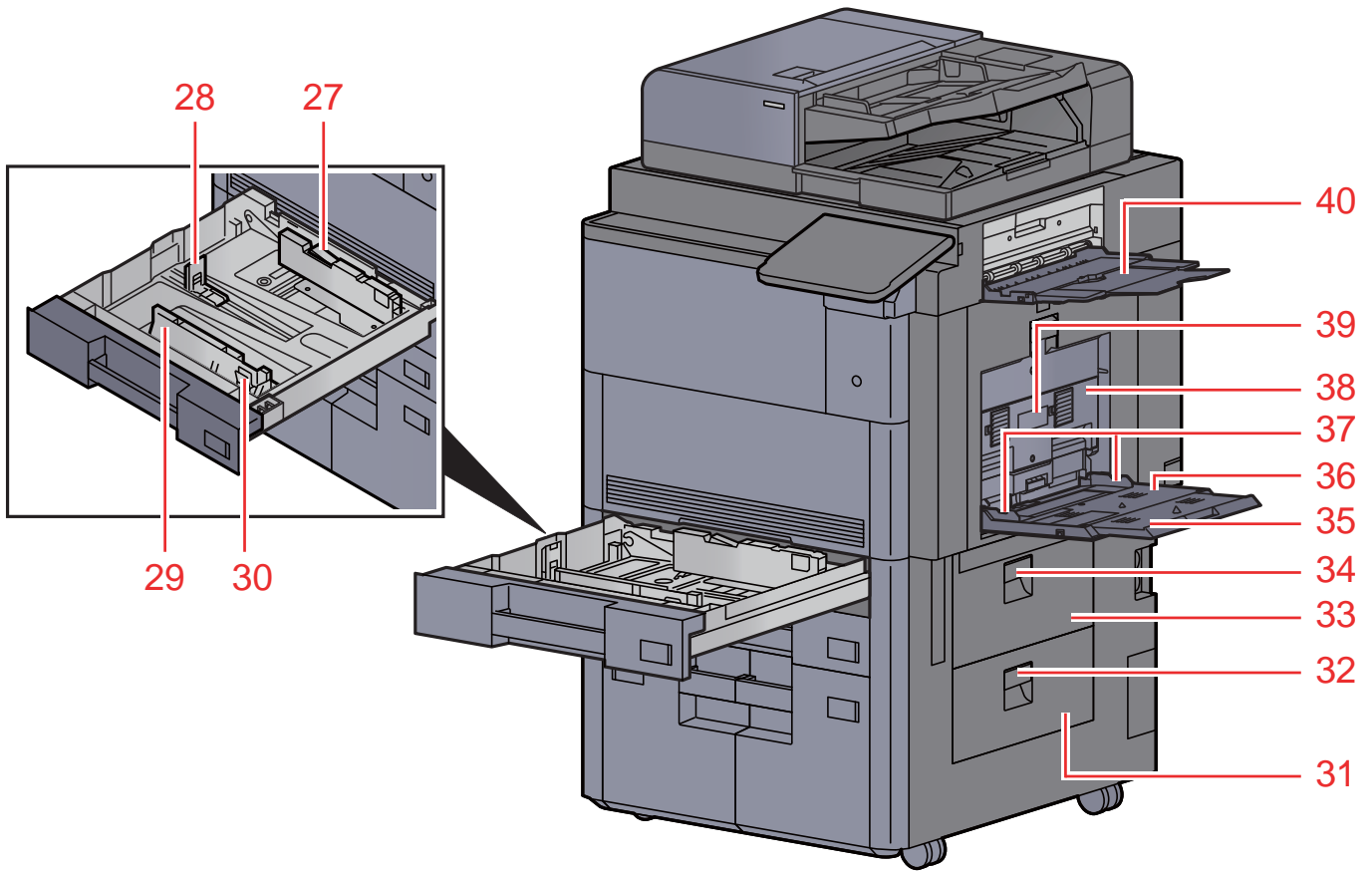
# 1 - 2 Part Names

## (1)Machine

### (1-1)Exterior



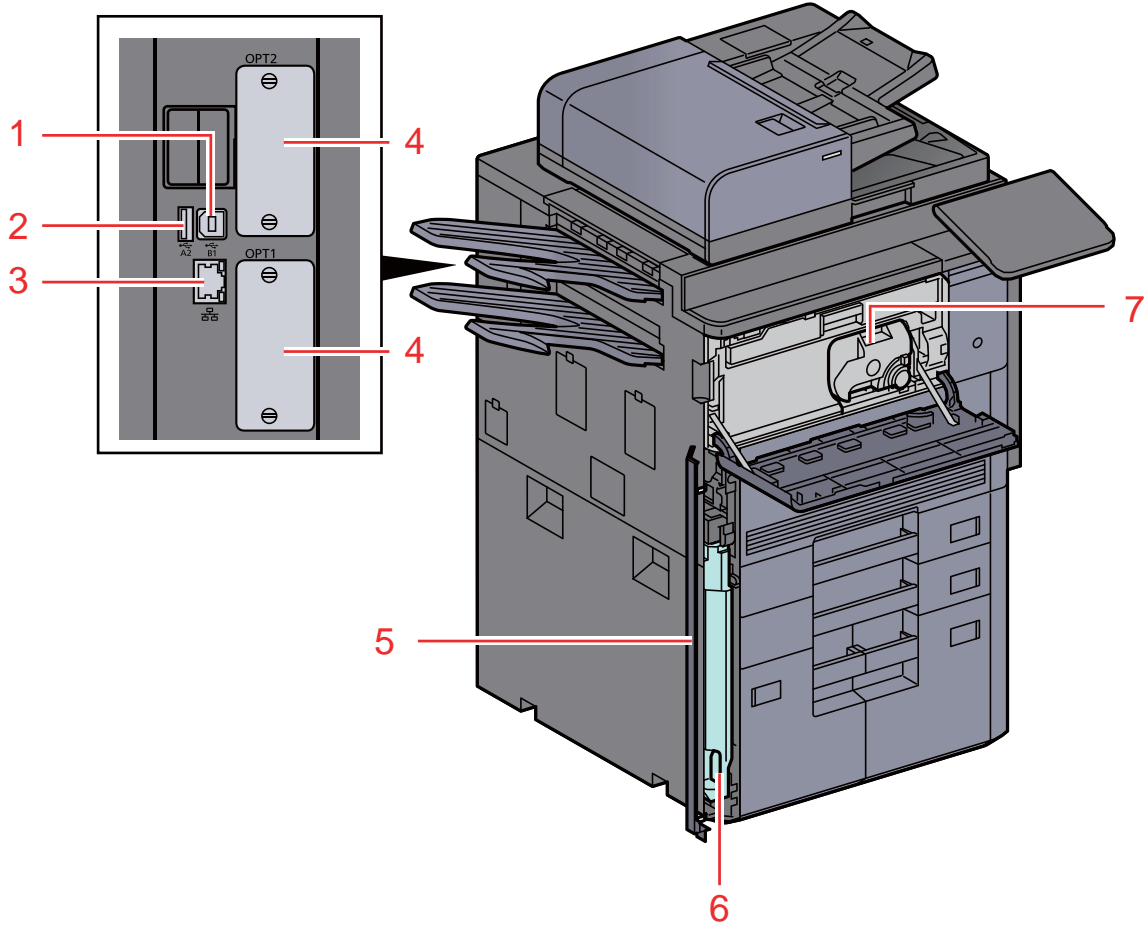
- |                        |                                    |
|------------------------|------------------------------------|
| 1 Document Processor   | 14 USB Memory Slot                 |
| 2 Original set lamp    | 15 Original Eject Table            |
| 3 Operation Panel      | 16 Original Stopper                |
| 4 Power Switch         | 17 Original Table                  |
| 5 Cassette 1           | 18 Cloth case for cleaning         |
| 6 Cassette 2           | 19 Original Width Guides           |
| 7 Cassette 4           | 20 Slit Glass                      |
| 8 Cassette 3           | 21 Left upper cover                |
| 9 Handles              | 22 Left upper tray                 |
| 10 Main Power Switch   | 23 Left lower tray                 |
| 11 Multi Purpose Tray  | 24 Front Cover                     |
| 12 Right Cover 1       | 25 Platen                          |
| 13 Right Cover 1 Lever | 26 Original size instruction plate |



- 27 (Paper Width Guides) lock
- 28 Paper Length Guide
- 29 Paper Width Guides
- 30 Paper Width Adjusting Tab
- 31 Right Cover 4
- 32 Right Cover 4 Lever
- 33 Right Cover 3

- 34 Right Cover 3 Lever
- 35 Support Tray Section of the Multi Purpose Tray
- 36 Multi Purpose Tray
- 37 Paper Width Guides
- 38 Right Cover 2
- 39 Right Cover 2 handle
- 40 Right tray

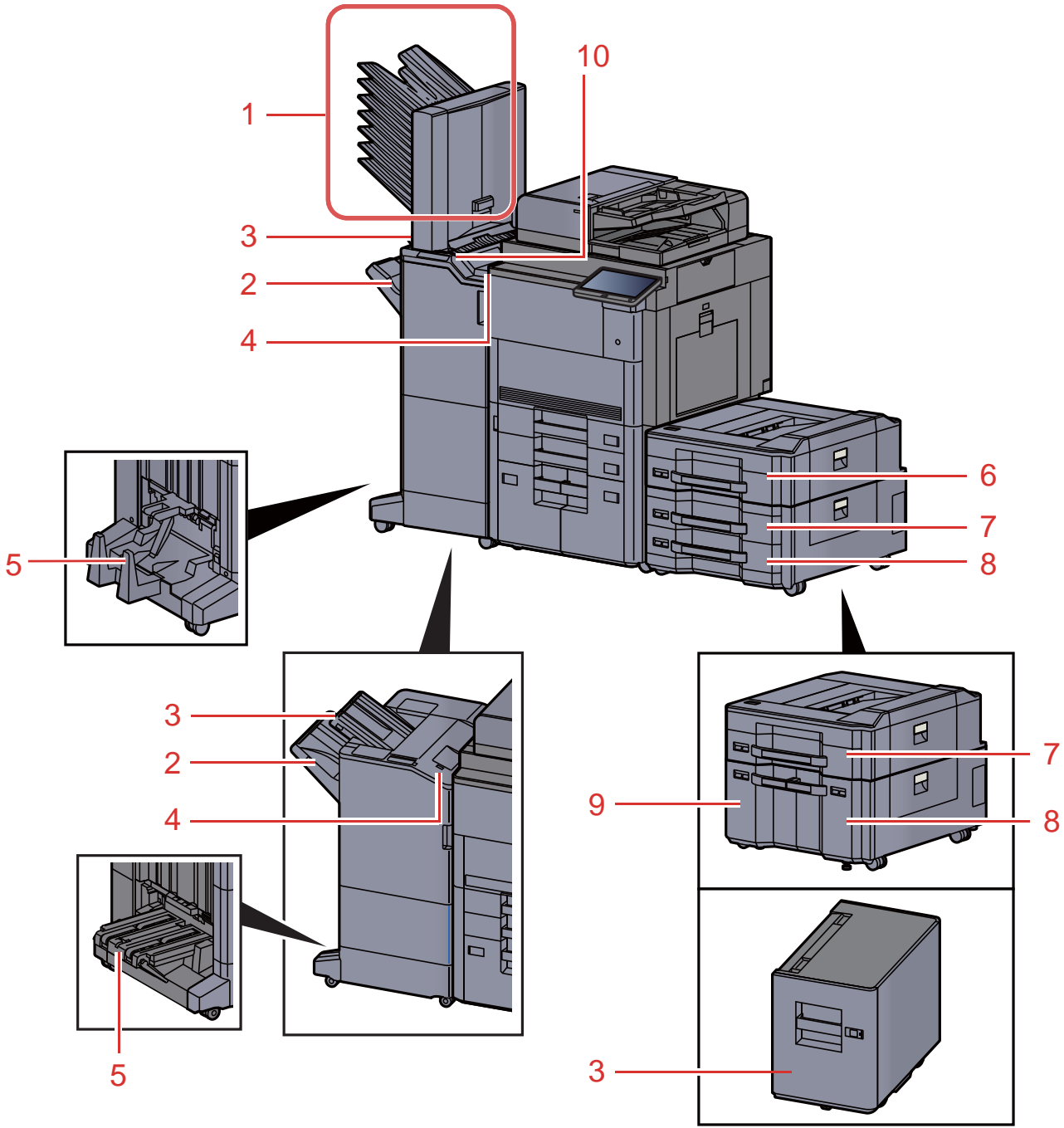
**(1-2)Connectors/Interior**



- 1 USB Interface Connector
- 2 USB port
- 3 Network Interface Connector
- 4 Option Interface Slot

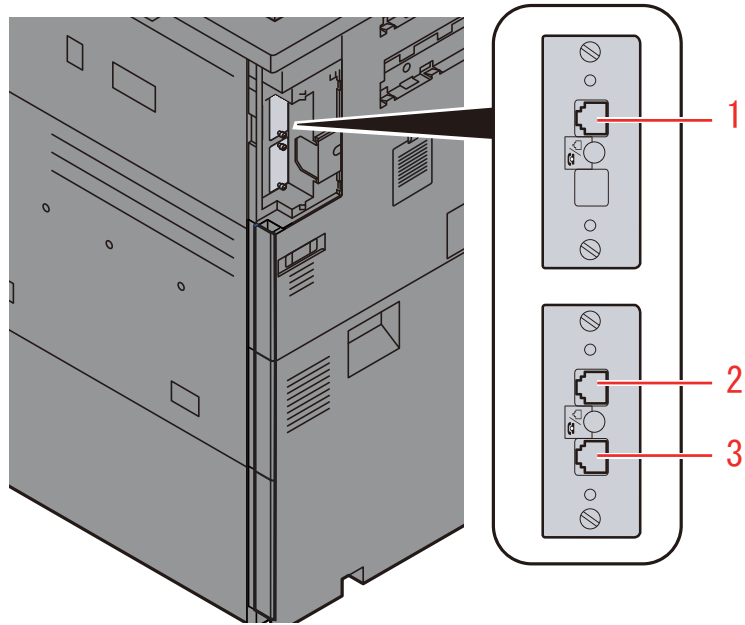
- 5 Waste Toner Box Cover
- 6 Waste Toner Box
- 7 Toner Container (Black)

**(1-3)With Optional Equipments Attached**



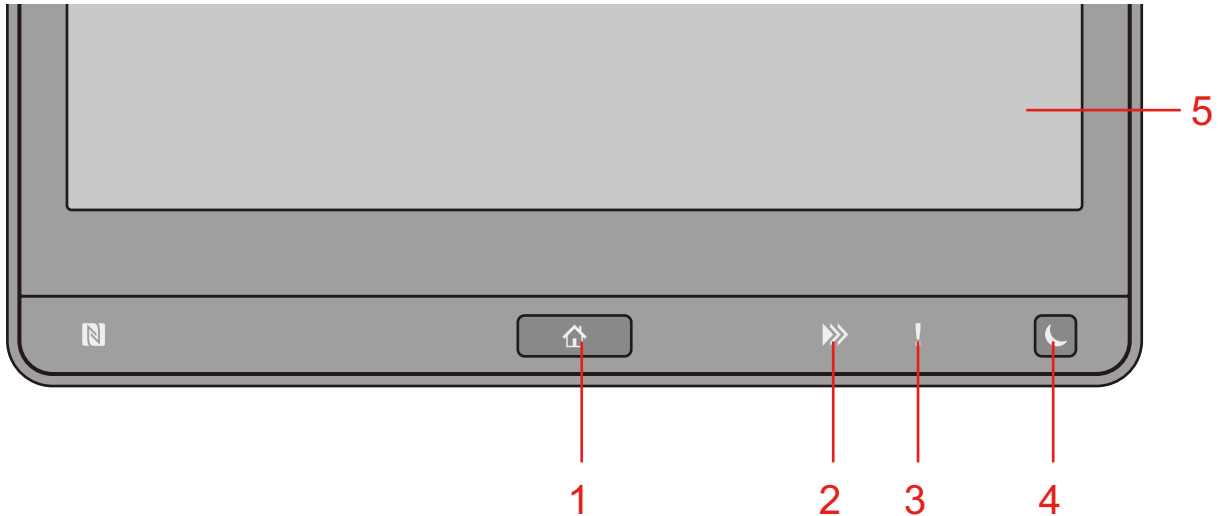
- 1 Tray 1 to 7 (tray 1 is the top tray)
- 2 Tray A
- 3 Tray B
- 4 Tray C
- 5 Folded in the middle

- 6 Side Feeder Top Tray
- 7 Cassette 5
- 8 Cassette 6
- 9 Cassette 7
- 10 Control Section of the Finisher

**(1-4)FAX System**

- 1 LINE Connector (L2): If installing 2 FAX kits, 2 ports are available. Connect the modular cords for telephone line.
- 2 LINE Connector (L1): Connect the modular cords for telephone line. This connector is port 1.
- 3 TEL Connector (T1): When using an optional handset or available telephone, connect it here.

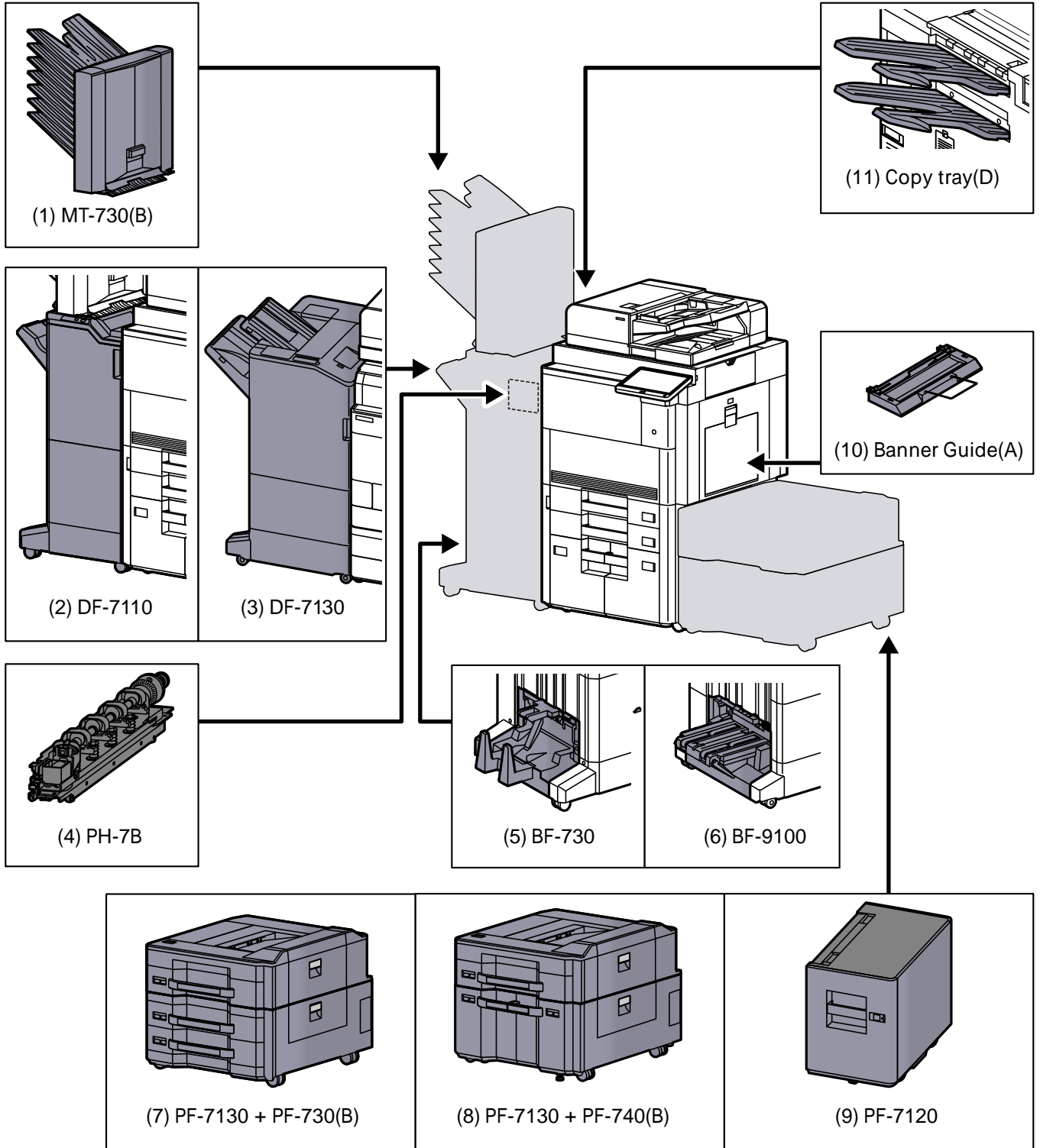
## (1-5) Operation Panel Keys

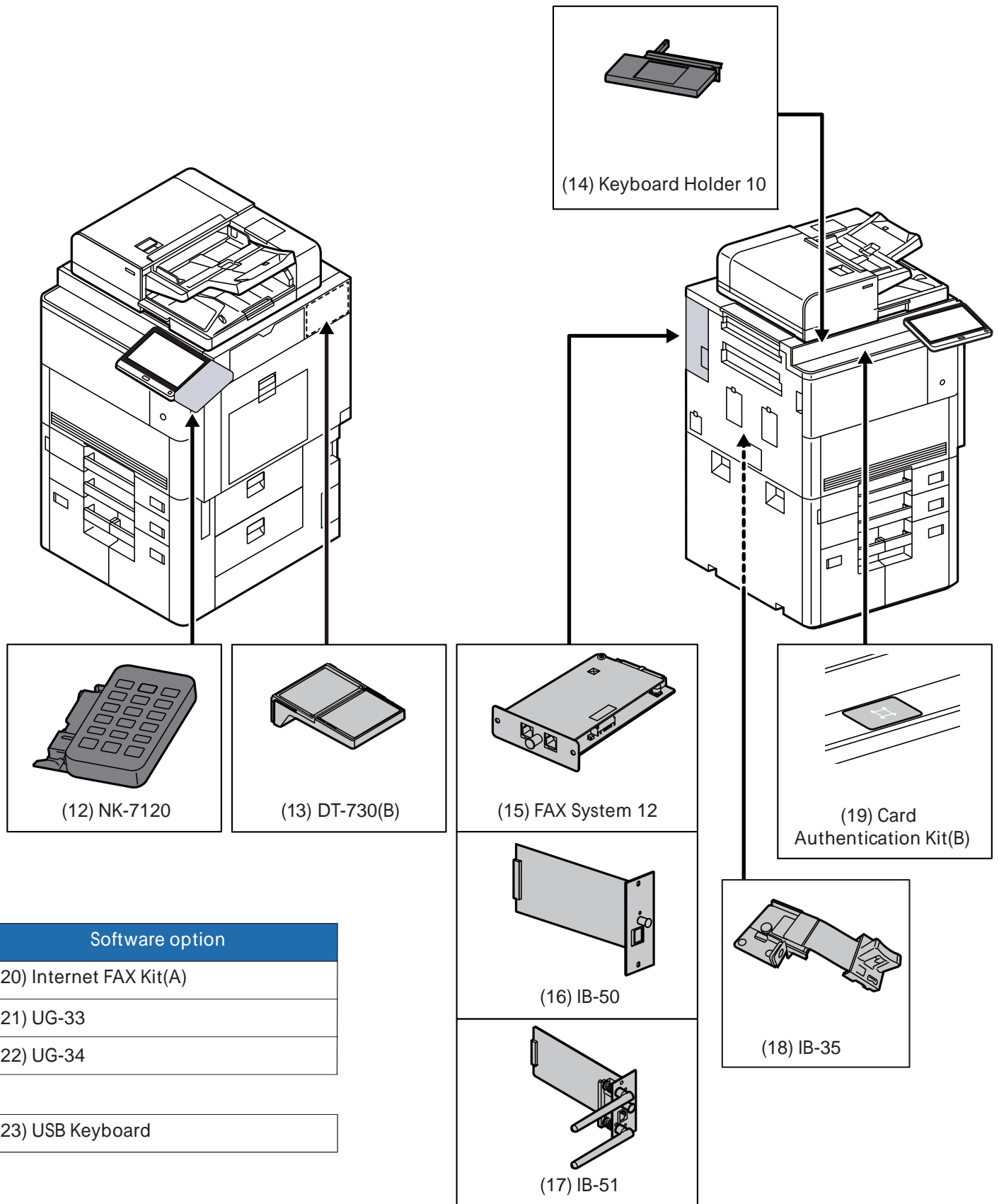


- 1 **[Home]** (🏠) key: Displays the Home screen.
- 2 **[Data]** (▶▶▶) indicator: Blinks while the machine is printing or sending/receiving, or accessing the hard disk/SSD. Also, it lights when there is a sending job FAX using delayed transmission.
- 3 **[Attention]** ( ! ) indicator: Lights or blinks when an error occurs and a job is stopped.
- 4 **[Energy Saver]** (🌙) key: Puts the machine into Sleep Mode. Recovers from Sleep if in Sleep Mode.
- 5 Touch Panel: Displays icons for configuring machine settings.

# 1 - 3 Optional Equipment

The following options are available for this machine.







**(1)Option****(1-1)MT-730 (B) "Mailbox"**

Makes it easy to sort output into separate trays. Installing this option adds 7 output trays. When multiple computer users share the printer, each user can print to a specified tray. Installs on the 4,000-sheet Finisher.

**(1-2)DF-7110 "4,000-sheet Finisher"**

This is a large-capacity 4,000-sheet Finisher capable of holding large print runs and of separating and offsetting multiple copies of a printout into individual copies. It can also staple or hole-punch (optional) the offset printouts.

**(1-3)DF-7130 "100-sheet Staple Finisher"**

This is a large-capacity 4,000-sheet Finisher capable of holding large print runs and of separating and offsetting multiple copies of a printout into individual copies. It can also staple or hole-punch (optional) the offset printouts.

**(1-4)PH-7A, PH-7C, PH-7D "Punch Unit"**

Attaches to the Document Finisher and is used to punch holes.

**(1-5)BF-730 "Folding Unit"**

Folds printed output at the center or in tri-fold to enable the creation of simple booklets. Installs on the 4,000-sheet Finisher.

**(1-6)BF-9100 "Folding Unit"**

Folds printed output at the center or in tri-fold to enable the creation of simple booklets. Installs on the 100-sheet Staple Finisher.

**(1-7)PF-7130 + PF-730 "Side Feeder (500-sheet×3)"****PF-7130 "Multimedia Side Tray (500-sheet)"**

Same type of cassette as Cassette 1 on the machine, and is attached to the Paper Feeder (500-sheet×2) or Large Capacity Feeder (1,500-sheet×2).

**PF-730 "Paper Feeder (500-sheet×2)"**

Two additional cassettes identical to the machine's cassette can be installed in the machine. Paper capacity and loading method are the same as the standard cassettes.

**(1-8)PF-7130 + PF-740 "Large Capacity Side Feeder (500, 1,500-sheet×2)"****PF-7130 "Multimedia Side Tray (500-sheet)"**

Same type of cassette as Cassette 1 on the machine, and is attached to the Paper Feeder (500-sheet×2) or Large Capacity Feeder (1,500-sheet×2).

**PF-740 "Large Capacity Feeder (1,500-sheet×2)"**

In addition to the machine's cassettes, you can also install an optional large capacity feeder (1,500-sheet×2) capable of holding up to 3,000 sheets of A4, B5 or Letter paper

**(1-9)PF-7120 "Side Feeder (3,000-sheet)"**

In addition to the machine's cassettes, you can also install an optional side feeder (3,000-sheet) capable of holding up to 3,000 sheets of A4, B5 or Letter paper.

**(1-10)Banner Guide(A) "Banner Tray"**

This tray enables continuous feeding of banner paper. Up to 10 sheets of banner paper can be loaded. To attach the tray and load paper, refer to the following:

**(1-11)Copy tray(D) "Copy tray"**

These are attached to the left side of the machine when the optional 4,000-sheet Finisher is not used. There are two trays: the Upper Left Tray and the Lower Left Tray.

**(1-12)NK-7120 "Optional Numeric Keypad"**

The numeric keypad is added to the operation panel. If the optional numeric keypad is installed, numeric keys do not appear on the touch panel.

**(1-13)DT-730(B) "Document Table"**

Place original or other documents when using the machine.

**(1-14)Keyboard Holder 10 "Keyboard Holder"**

A USB keyboard connected to the machine can be placed here.

**(1-15)FAX System 12 "FAX Kit"**

By installing the FAX kit, fax send/receive is enabled. Also, it is possible to use it as a network fax, by using it with a computer. When two FAX kits are installed, the units can be connected to two different telephone lines which will enable quicker message transmission to a number of recipients. If one of the lines is dedicated to receiving, the busy line time can be reduced.

FAX Operation Guide

**(1-16)IB-50 "Network Interface Kit"**

The Network Interface Kit provides a high-speed connection for the Gigabit-per-second interface. This kit supports traditional protocols such as AppleTalk, Netware and so on.

It also supports only the least functions in the standard utilities.

**(1-17)IB-51 "Wireless Network Interface Kit"**

This is a wireless LAN interface card which supports the wireless LAN specifications IEEE802.11n (Max 300 Mbps) and 11 g/b. This supports traditional protocols such as AppleTalk, Netware and so on.

It also supports only the least functions in the standard utilities.

The IB-51 Setup utility supports Windows OS and Mac OS X.

**(1-18)IB-35 "Wireless Network Interface Kit"**

This is a wireless LAN interface card which supports the wireless LAN specifications IEEE802.11n (Max 65 Mbps) and IEEE802.11 g/b. In addition, network printing is possible without using the wireless LAN router because Wi-Fi Direct is supported. IB-35 is standard in South America and North America.

**(1-19)Card Authentication Kit(B) "Card Authentication Kit"**

User login administration can be performed using ID cards. To do so, it is necessary to register ID card information on the previously registered local user list. For more information about how to register this information, refer to the following:

**(1-20)Internet FAX Kit(A) "Internet FAX Kit"**

Activating the Internet FAX Kit sends and receives faxes via the Internet without using a phone line. It can only be added when the FAX Kit is installed.

**(1-21)UG-33 "ThinPrint Option"**

This application allows print data to be printed directly without a print driver.

**(1-22)UG-34 "Emulation Upgrade Kit"**

Enables emulation whereby the machine operates using commands for other printers. Installing this option enables IBM Proprinter, Line Printer, and EPSON LQ-850 emulation.

**(1-23)USB Keyboard "USB Keyboard"**

A USB keyboard can be used to enter information into the text fields on the operation panel. A special mount is also available to install the keyboard on the machine. Please contact your dealer or service representative for information on keyboards that are compatible with your machine before you purchase one.

## 2 Installation

### 2 - 1 Environment

#### Installation environment

1. Temperature: 50 to 90.5°F (10 to 32.5°C) (But humidity should be 70% or less when the temperature is 90.5°F (32.5°C).)
2. Humidity: 10 to 80% (But the temperature should be 86°F (30°C) or less when humidity is 80%.)
3. Power requirements:
 

AC100 V	50/60Hz	15A or more (73ppm model, 83ppm model)
AC110 V	60Hz	15A or more
AC120 V	60Hz	16A or more
AC220 to 240V	50Hz	10A or more
4. Frequency fluctuation: 50Hz+/-2% or 60Hz+/-2%

#### Installation location

The operative environmental conditions are as follows:

Adverse environmental conditions may affect the image quality. It is recommended to use the machine as follows:  
Humidity: 36 to 65% Temperature: 60.8 to 80.6°F or less (16 to 27°C).

Avoid the following locations when selecting a site for the machine.

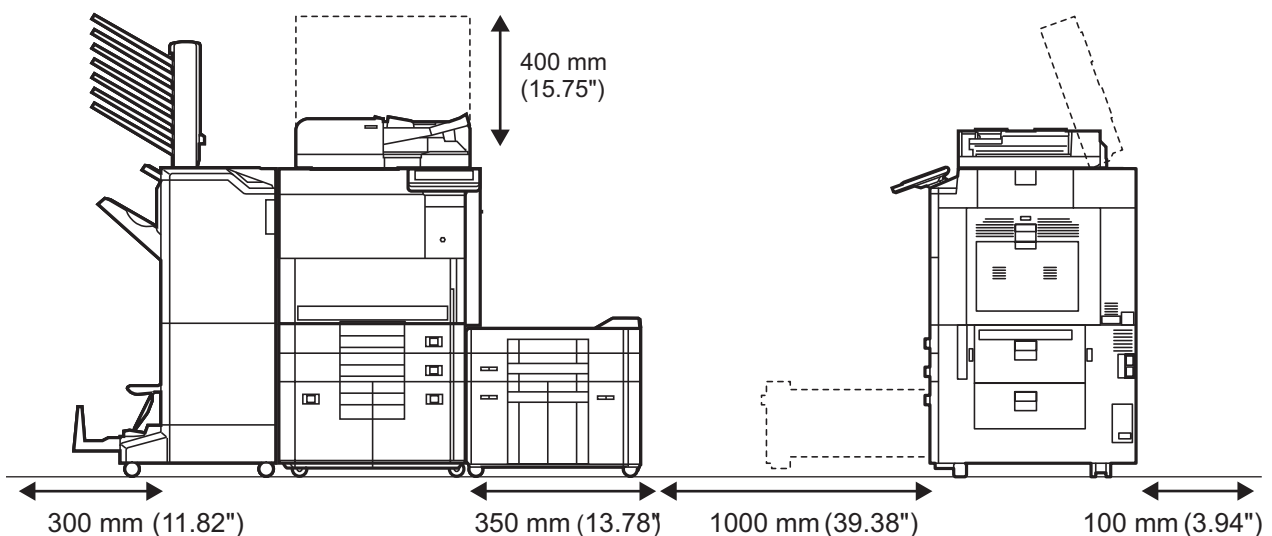
- Avoid locations near a window or with exposure to direct sunlight
- Avoid locations with vibrations
- Avoid locations with rapid temperature fluctuations
- Avoid locations with direct exposure to hot or cold air
- Avoid poorly ventilated locations

If the floor is delicate, when this machine is moved after installation, the floor material may be damaged by the casters.

During operation, some ozone is released, but the amount does not cause any ill effect to one's health.

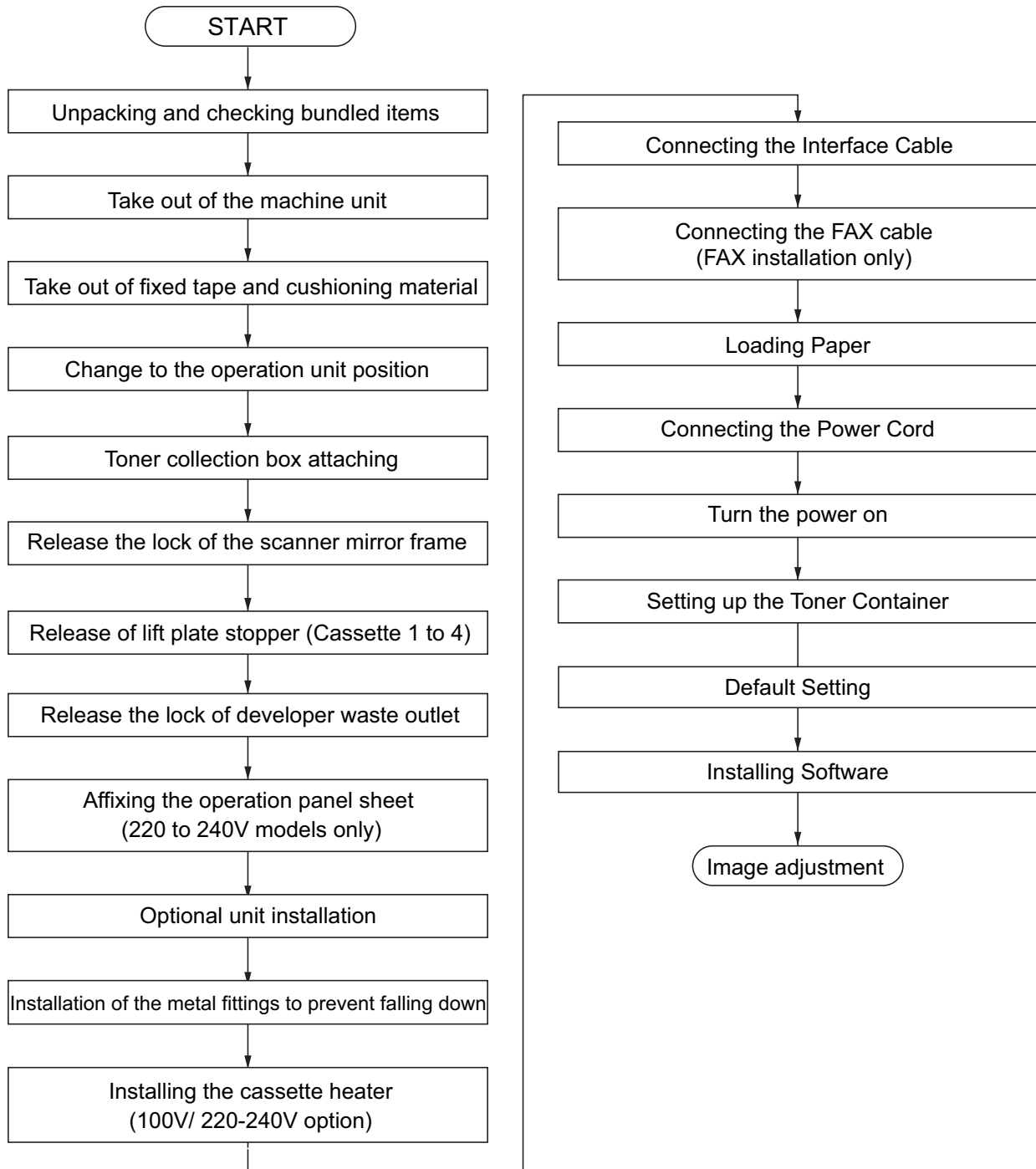
If, however, the machine is used over a long period of time in a poorly ventilated room or when making an extremely large number of copies, the smell may become unpleasant. To maintain the appropriate environment for copy work, it is suggested that the room be properly ventilated.

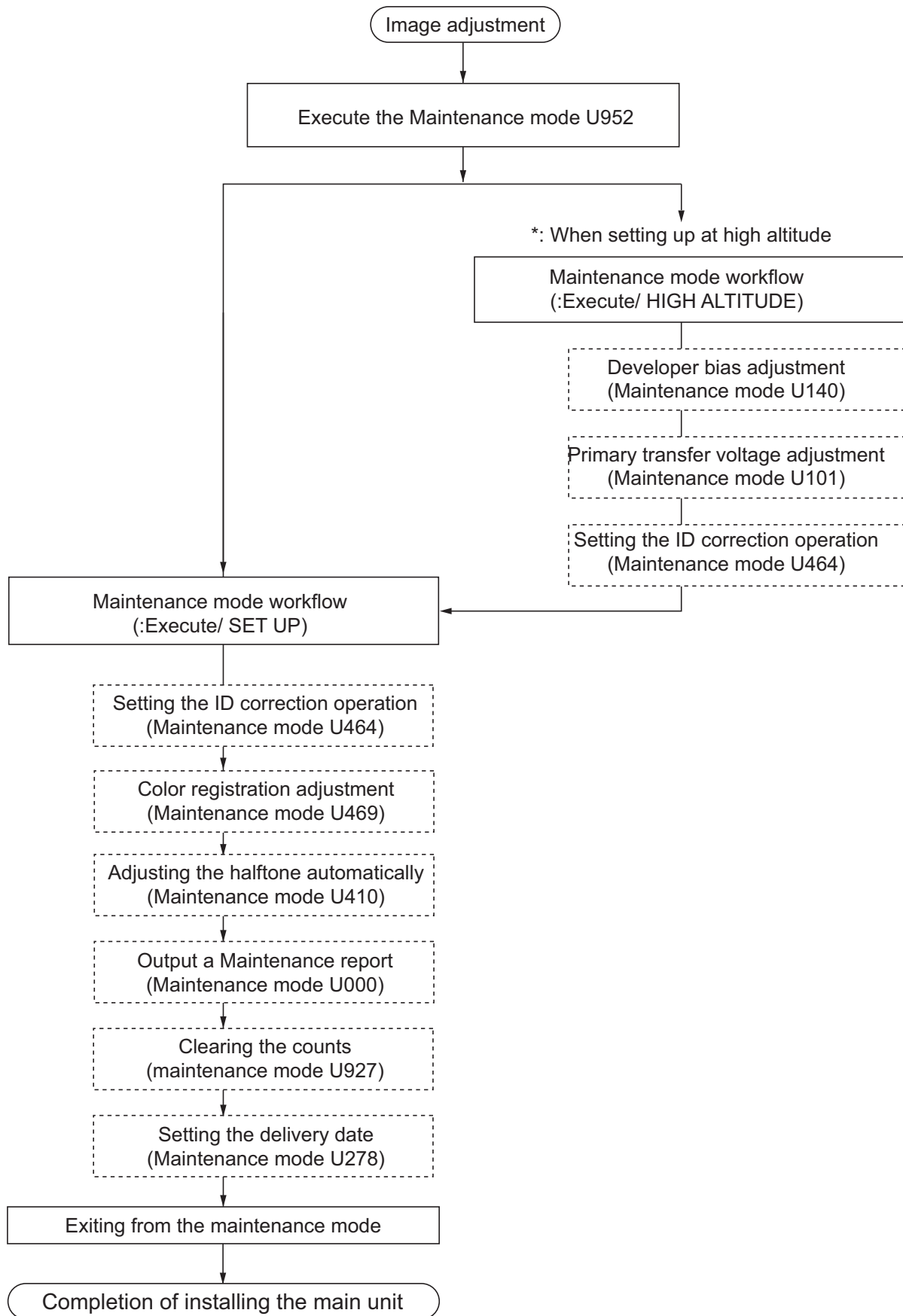
#### Installation space



## 2 - 2 Installing the main unit

### Installation procedures

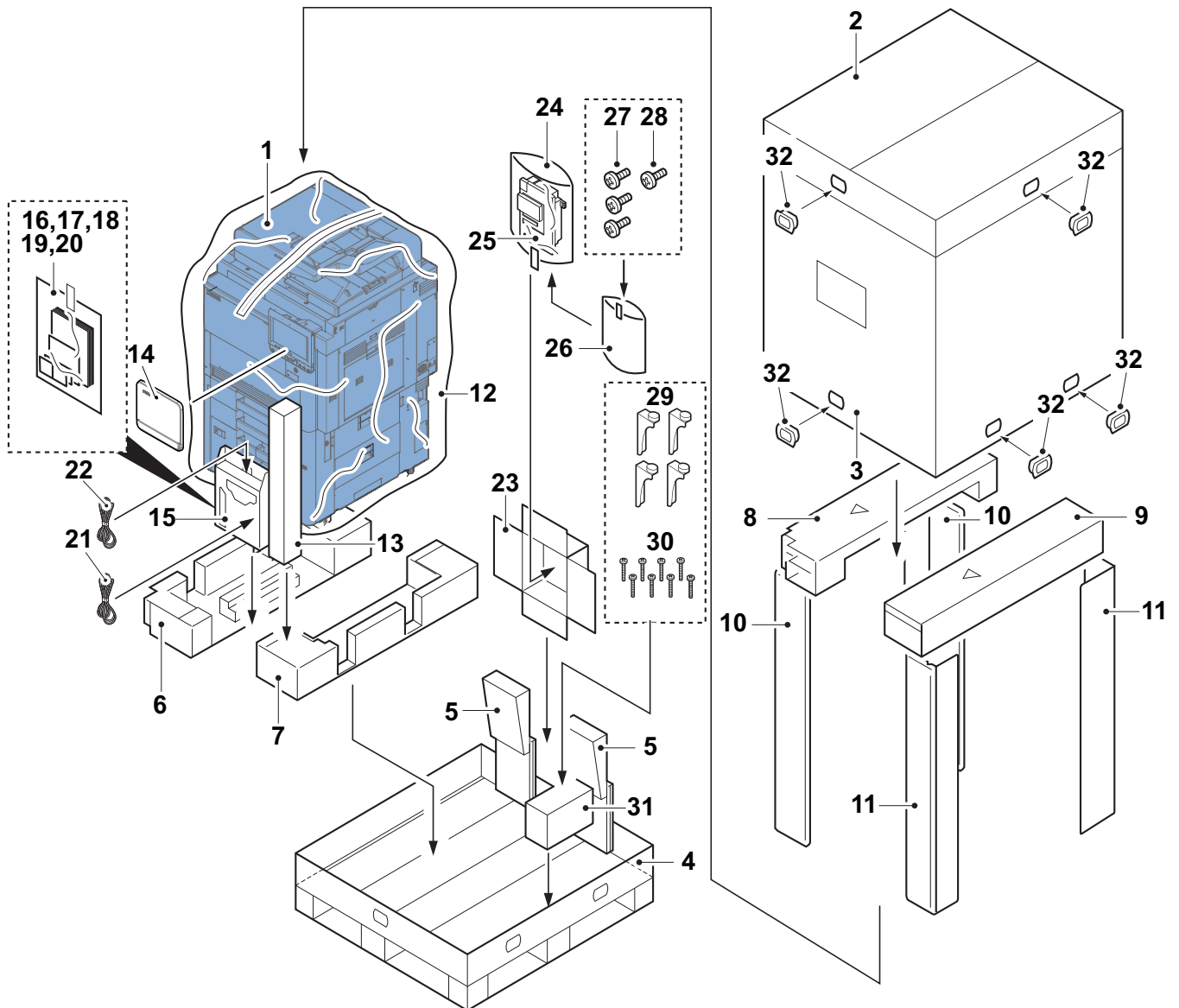




\*: Initial setting time: It takes approx. 2 minutes.  
Also, do not execute the maintenance mode during the initial setting.

## (1)Unpacking and checking bundled items

### (1-1)Machine



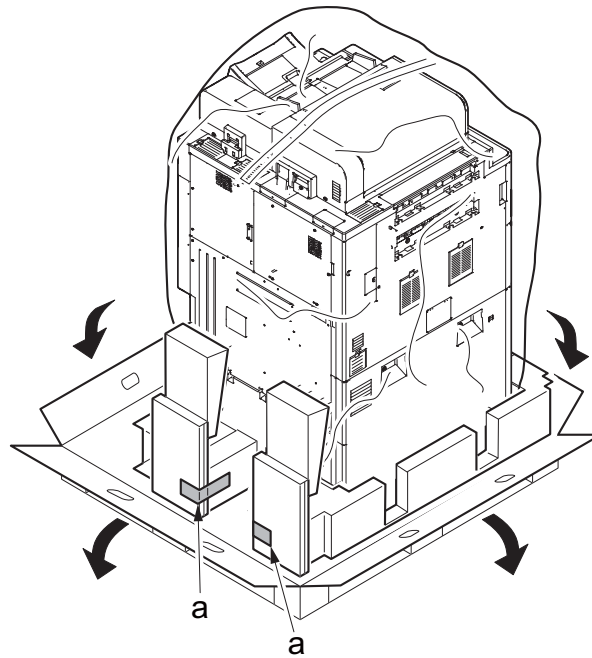
- |                     |                      |                               |
|---------------------|----------------------|-------------------------------|
| 1. Main unit        | 12. Machine cover    | 23. Toner collection box case |
| 2. Upper case       | 13. Front pad        | 24. Air cap bag               |
| 3. Outer case       | 14. Operation cover  | 25. Toner collection box      |
| 4. Skid             | 15. Document tray    | 26. Poly bag                  |
| 5. Slope            | 16. Poly bag         | 27. Screws M3x8 S-tite        |
| 6. Left bottom pad  | 17. Paper size plate | 28. Screws M3x8 P-tite        |
| 7. Right bottom pad | 18. Paper type plate | 29. Support plate             |
| 8. Left upper pad   | 19. DVD              | 30. Screws M4x20              |
| 9. Right upper pad  | 20. Operation guide  | 31. Support plate box         |
| 10. Left stay       | 21. Power cord       | 32. Hinge joint               |
| 11. Right stay      | 22. Power cord*1     |                               |

\*1:100V 80 ppm model only

Make sure to install the main unit on a level surface.

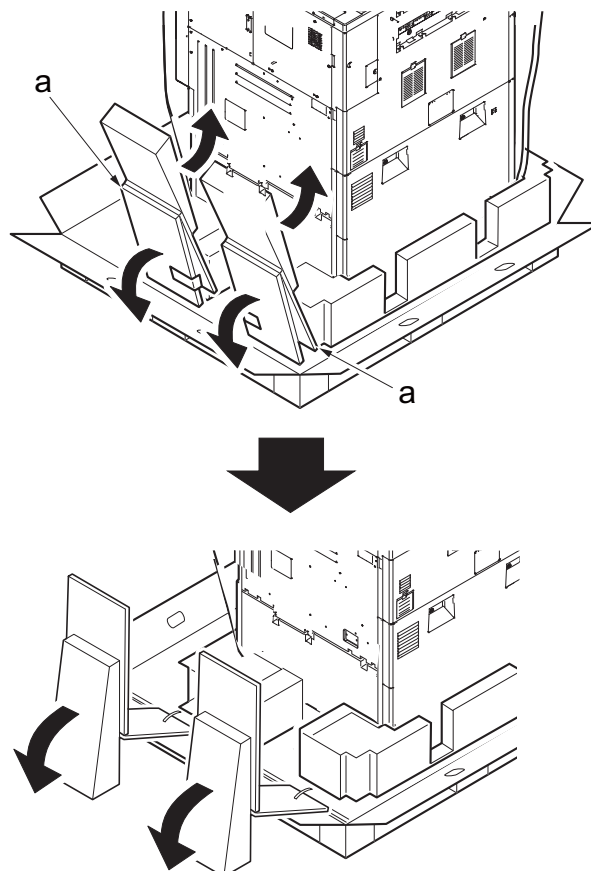
### (1-2)Take out of the machine unit

Take out the main unit and accessories from the packing case.

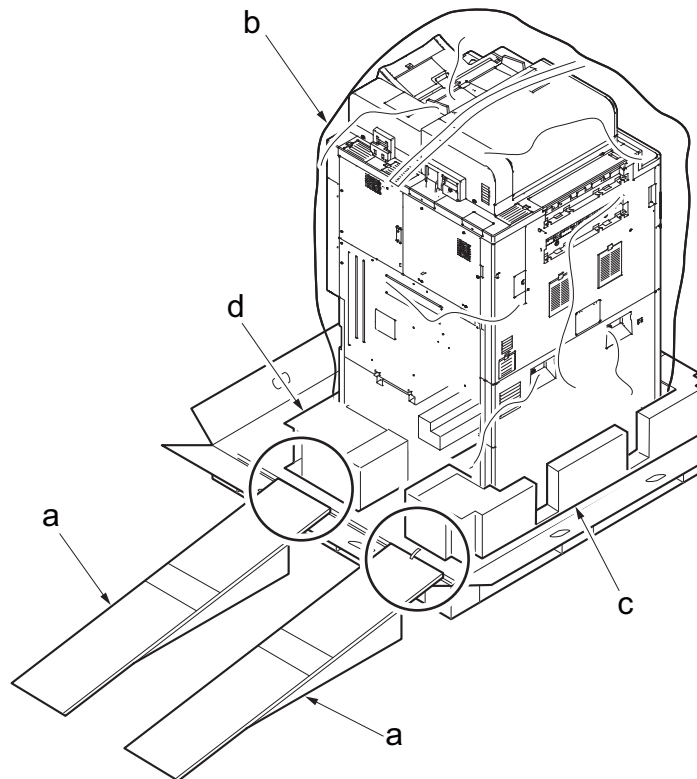


When taking out of the machine unit, it needs about 2m spaces behind the machine.

- 1 Detach the hinge joint, remove outer case, inner case, left upper/right pad, left/right stay, front pad, upper spacer and bottom spacer.
- 2 Cut the fixed tape of the skid corner.
- 3 Cut the tape (a) fixing the slope and left bottom/right pad.



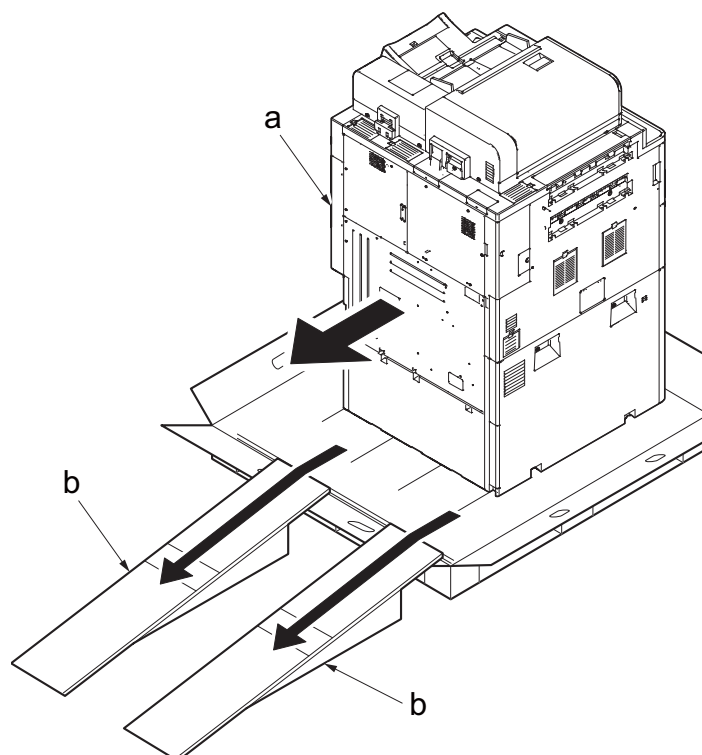
#### 4 Rotate a slope (a) as the diagram and change the slope for the machinery traveling



5 Check that there is no step on a circle frame of slope (a).

6 Open the product cover (b).

7 Lift each left and right machine unit, remove the left bottom pad (c), the right bottom pad (d) and the product cover (b).





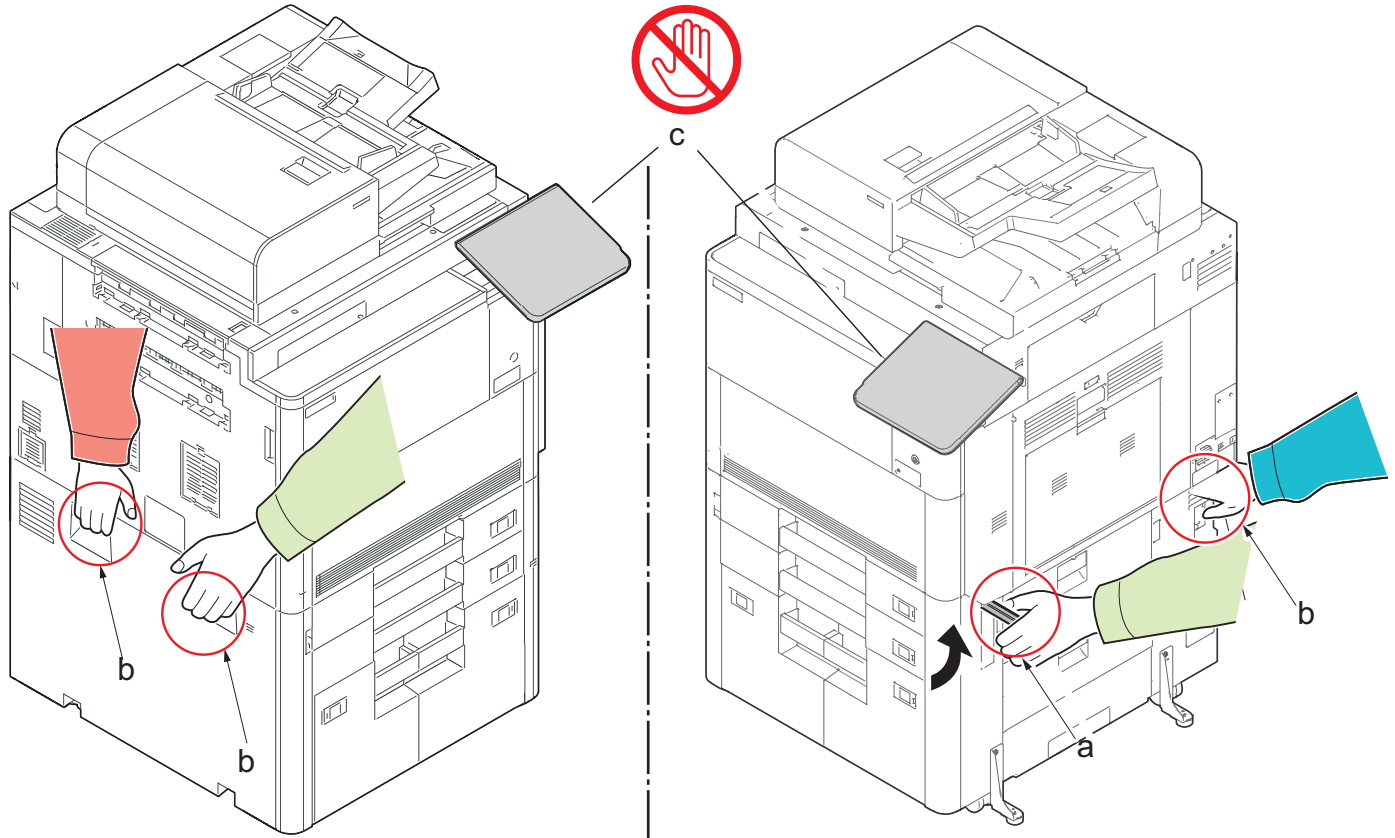
## 8 Travel the machine unit (a) along the slope (b), move to the floor side.

### (1-3) Take out of fixed tape and cushioning material

#### 1 Remove the tape and cushioning materials for packing from the main unit.

#### (2) Notes on main unit transportation

When carrying the main unit, taking out of the machine right lower side of conveying handle (a) and with four people as shown in the figure and hold the conveying handle and three handles (b) Do not hold the operation unit (c) because it will cause damage.

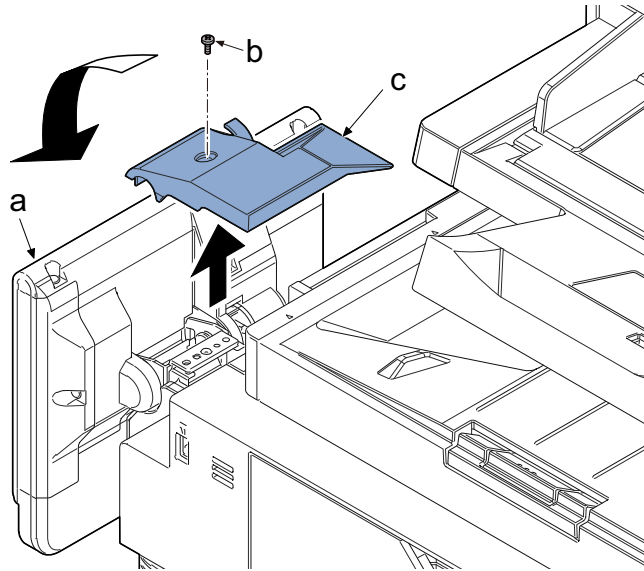


#### (3) Change to the operation unit position

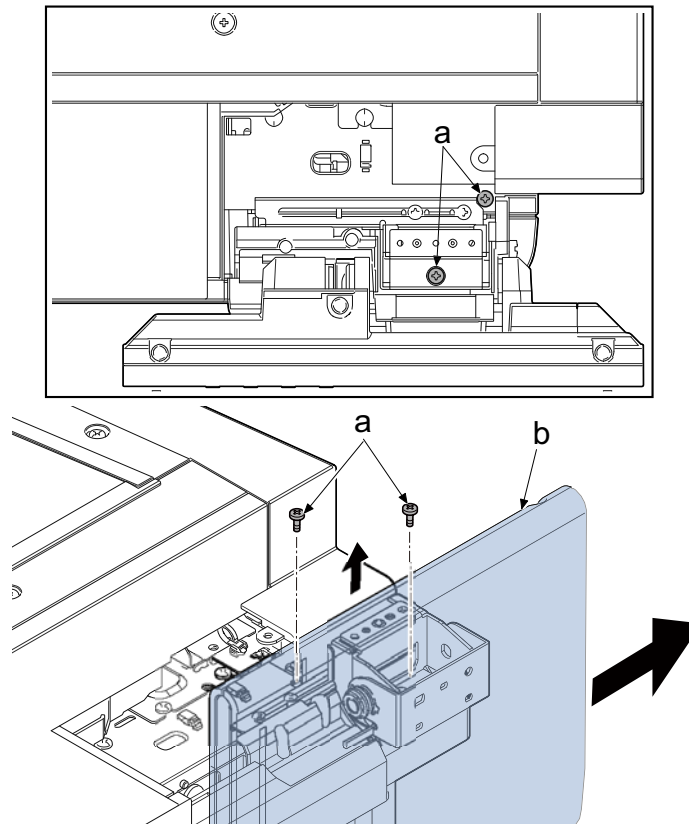
The operation unit position can be set to right side or left side of the machine. When shipping, it is set at the left side.

**When setting the operation unit position to the right side of the machine.**

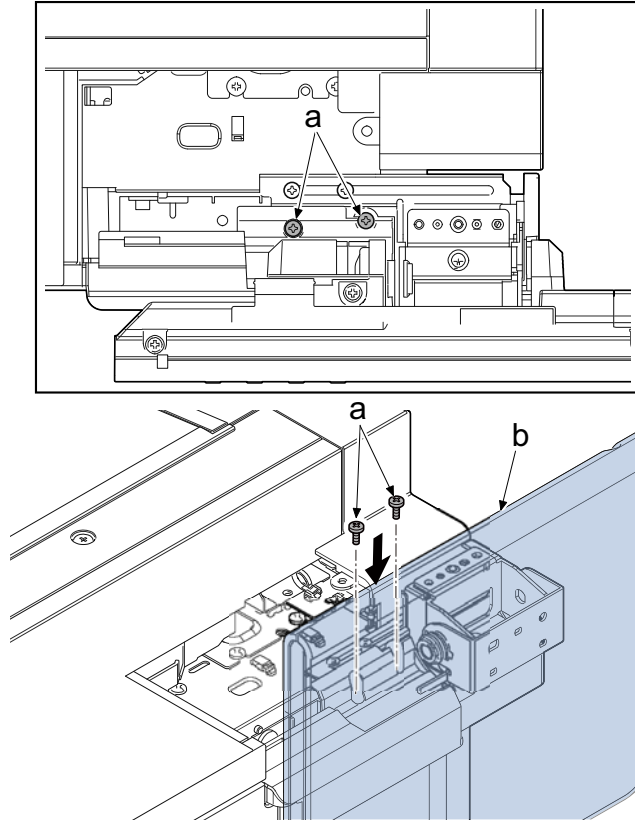
- 1 Pull up the operation unit (a).**
- 2 Remove one screw (b) (M3x8) and then remove the rear operation unit cover (c) in the direction of the arrow**



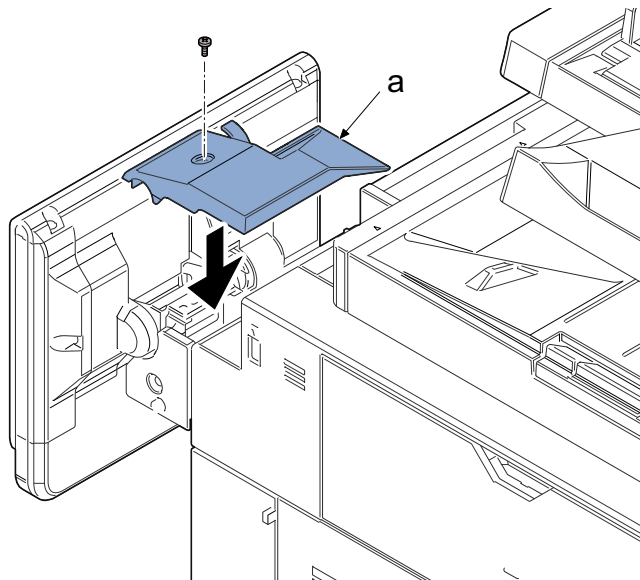
- 3 Remove two pins (a) (M3x8) and then slide the operation unit (b) in the direction of the arrow.**



#### 4 Secure the operation unit (b) by two removed pins (a)

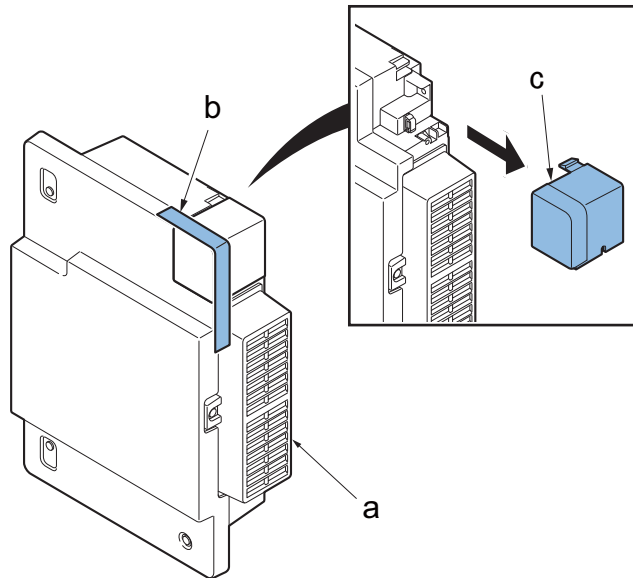


#### 5 Reinstall the rear operation unit cover (a) removed in step 2.

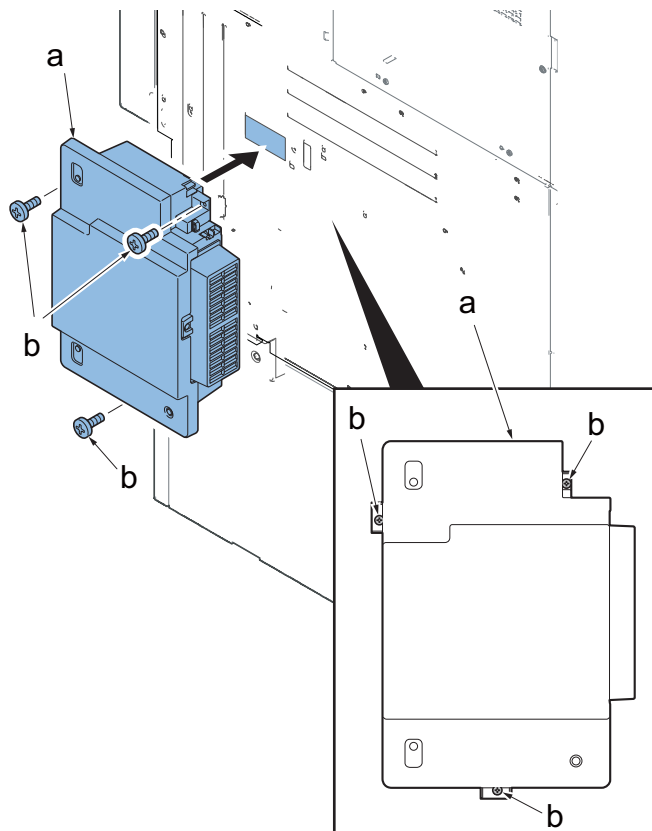


**(4) Toner collection box attaching**

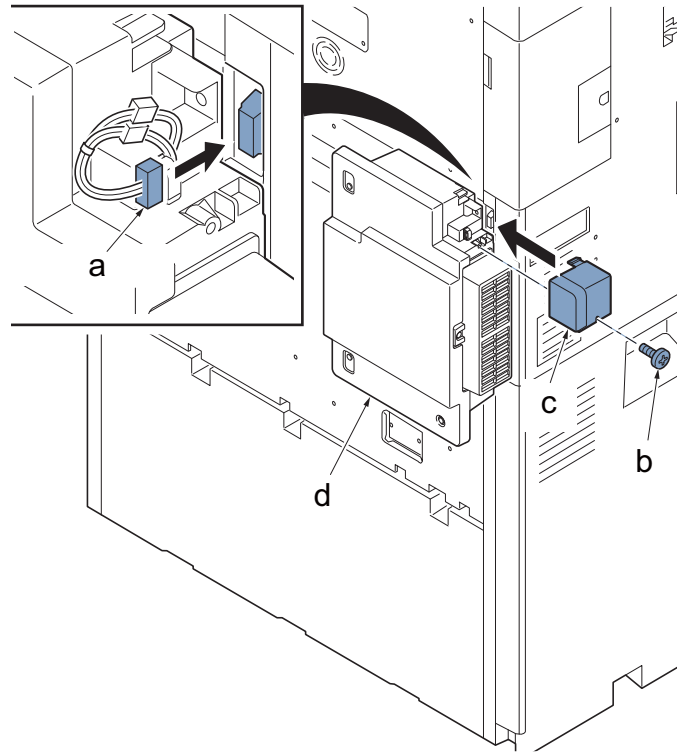
- 1** Detach the tape (b) from the toner collection box (a).
- 2** Detach the cable cover (c).



- 3** Install the toner collection box (a) with three bundled screws (b) (M3×8 S-tite).
- 4** Install the connector (a).



## 5 Install the cable cover (c) with one screw (b) (M3×8 P-tite).



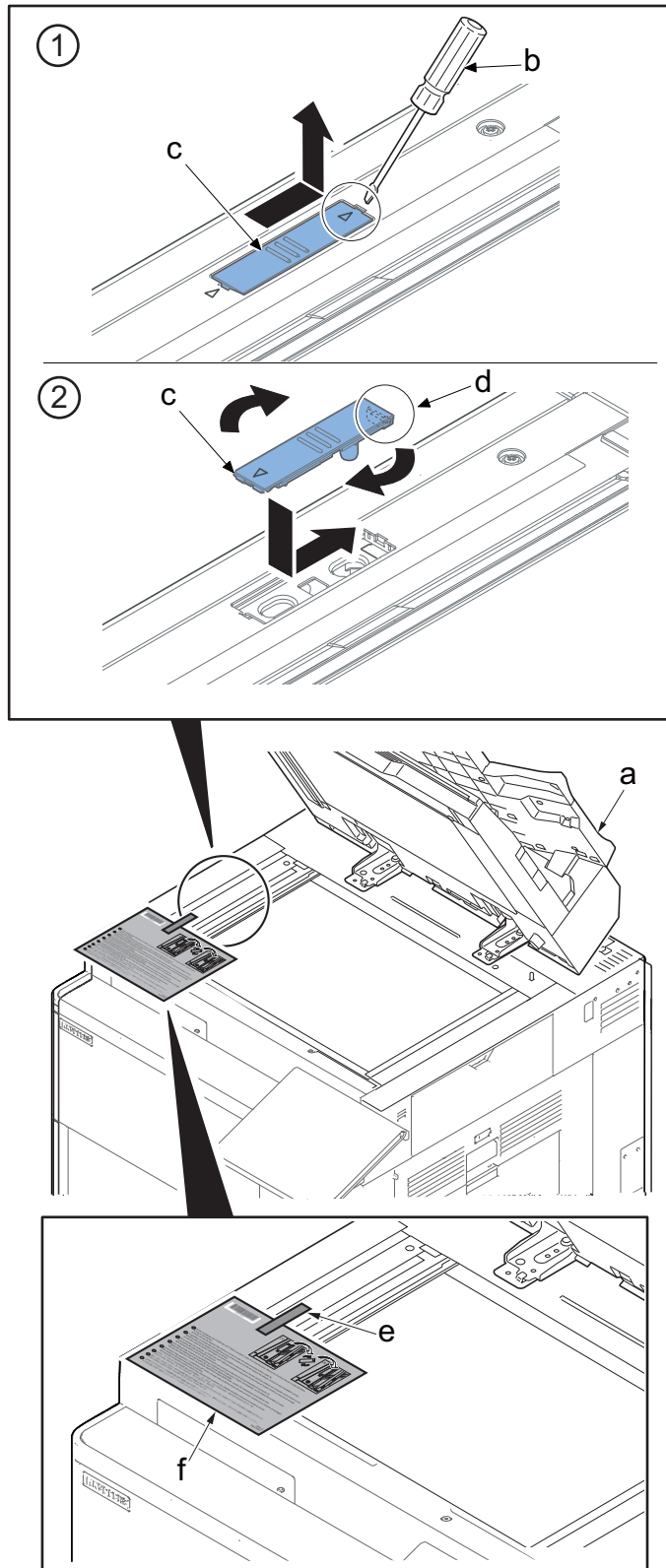
### ✔ IMPORTANT

When switching on without installing the toner collection box (d), it causes the below C call,  
FAN1 disconnection: C7470  
FAN2 disconnection: C7480  
Release the lock of the scanner mirror frame

**(5)Release the lock of the scanner mirror frame**

- 1** Open the document processor (a).
- 2** Detach the tape (e) and then detach the ISU lock leaflet (f).
- 3** Raise the triangle mark side of the optical lock cover (c) with a flat-blade screwdriver (b) and slide it in the direction of the arrow to remove it.
- 4** Place it reversely and put the optical lock cover (c) into the aperture of the hook (d) to fit in the direction of the arrow.

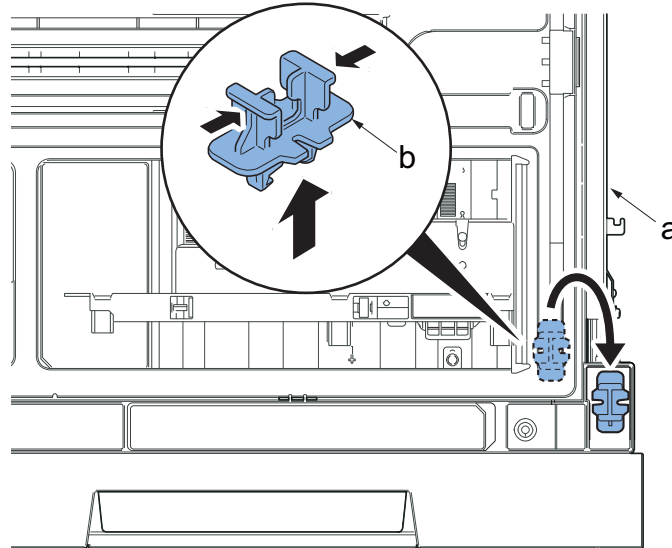
Unless unlocking is performed, C3100 is caused.



**(6) Release of lift plate stopper****Cassette 1,2**

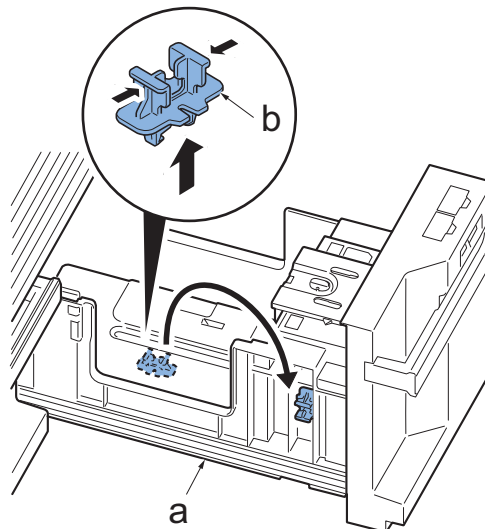
- 1 Pull cassette 1 and 2 (a), remove each lift plate stopper (b) and attach them to the storage location.**

When moving the machine, attach the lift plate in original position.

**Cassette 3,4**

- 2 Pull cassette 3 and 4 (a), remove each lift plate stopper (b) and attach them to the storage location.**

When moving the machine, attach the lift plate stopper in the original position and fix it.





## (7) Release the lock of developer waste outlet

### ✔ IMPORTANT

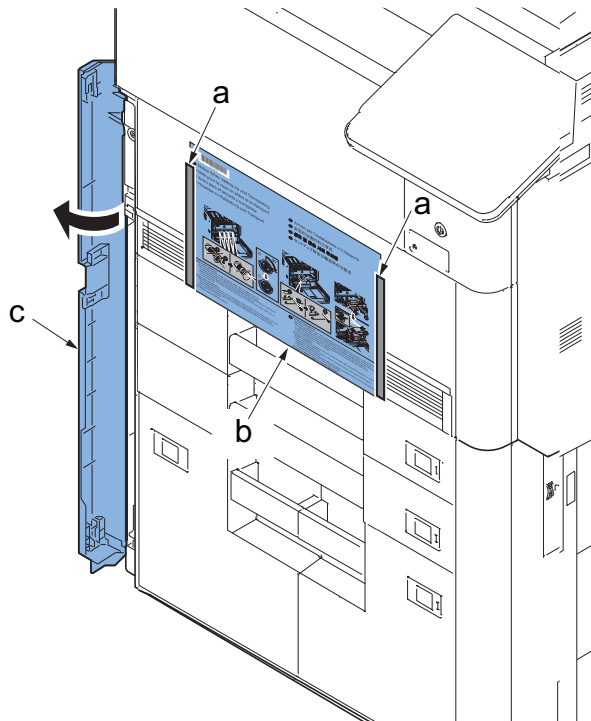
To ease setup, the device was shipped with the developer unit already replenished with developer. Therefore, to prevent developer from spilling during shipping, a developer shutter is equipped with the developer unit.

To disengage the shutter, use the following procedure: Note that if the shutter is not completely disengaged and retained in place, the developer in the developer unit may clog at the outlet causing a damage to the developer unit.

### 1 Remove two tapes (a) and then remove the set up leaflet (b).

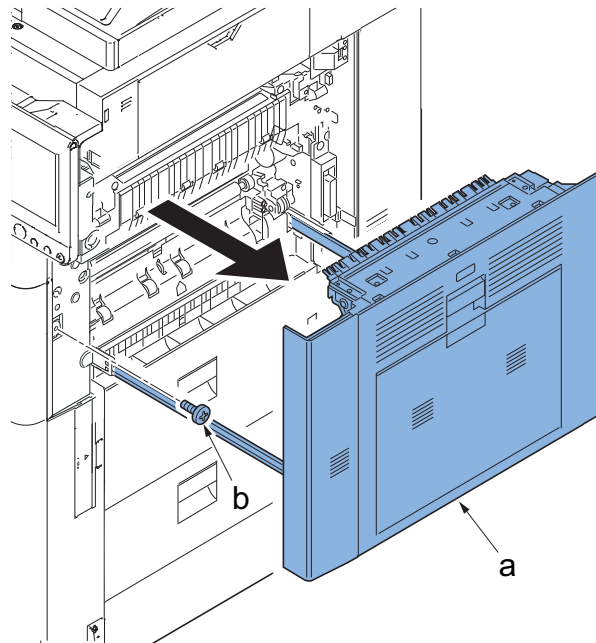
The setup leaflet must be affixed in position before dispatching the machine.

### 2 Open the waste toner box cover (c).



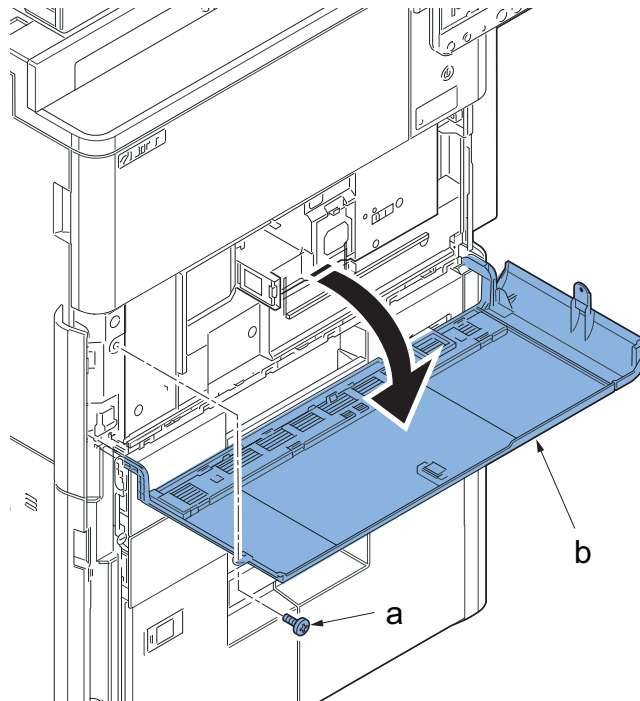
**3 Pull the paper conveying unit (a) out.**

**4 Remove one screw (b) (M4x8).**



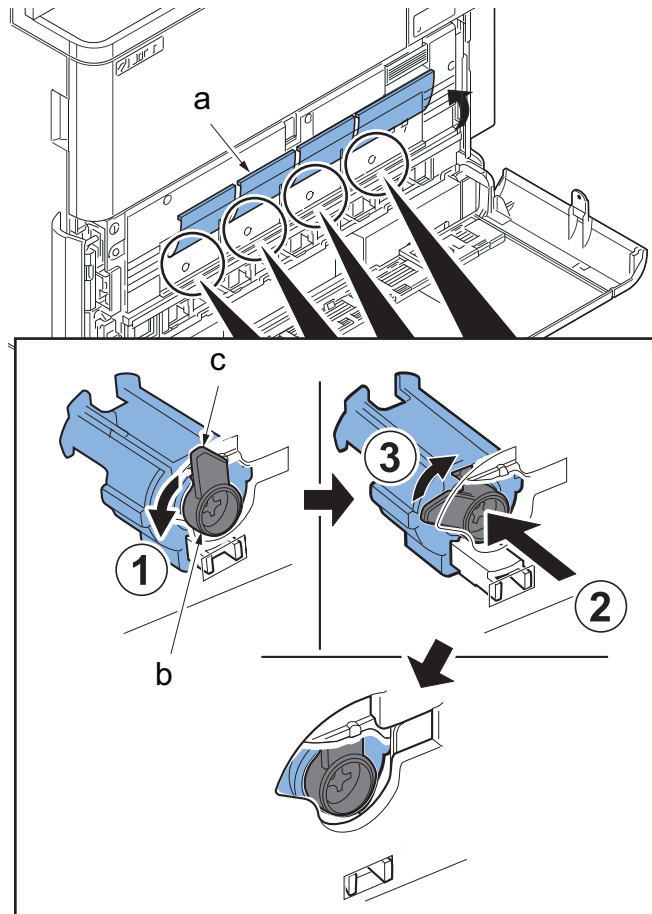
12j0143a

**5 Remove one screw (a) (M4x8) and then open the front middle cover (b).**



**6 Press the fixing pin (a) and rotate.**

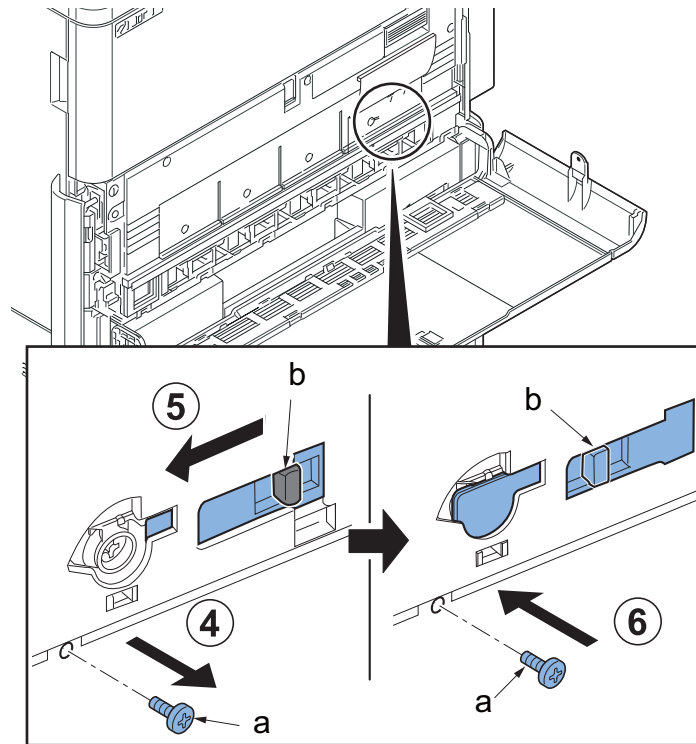
Fully insert the fixing pin (a) with keeping the protrusions (b) vertical and rotate it by 90 degrees clockwise.



- 7 Remove a screw (a) and slide the lever right wards.
- 8 Fix the lever (b) using the screw (a) previously removed at the right screw hole and unlock the developer waste exit.

 **IMPORTANT**

When the device is shipped again or removed, use the reverse procedure to lock in the developer waste exit. Failure to observe this caution could result in deteriorated print quality and/or C call (C7460).



**9** Close the front middle cover and fix the cover using the two screws.

**10** Close the waste toner box cover.

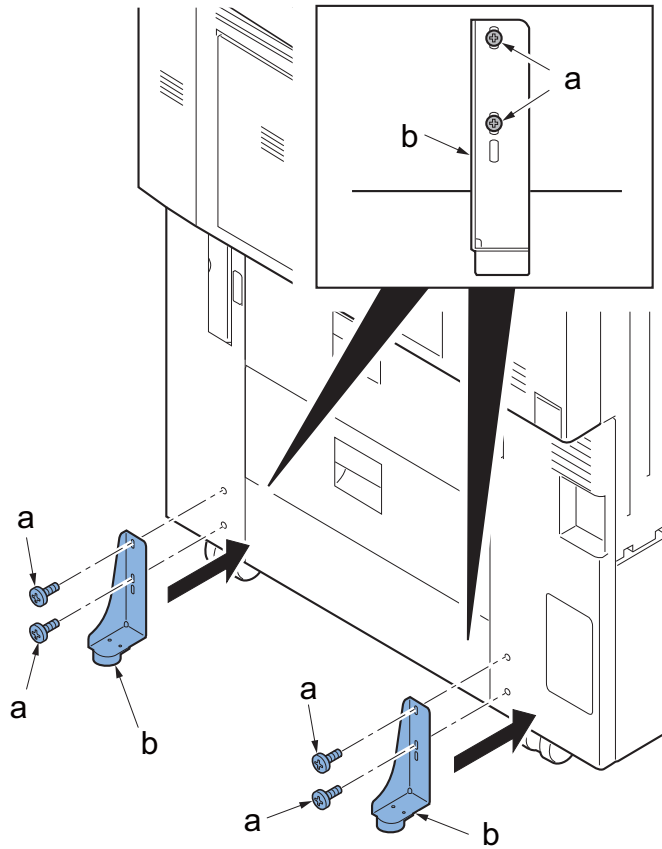
**11** Close the paper conveying unit.

#### (8) Installation of the metal fittings to prevent falling down

When the optional document finisher or the side paper feeder is installed, the stabilizers are not required.

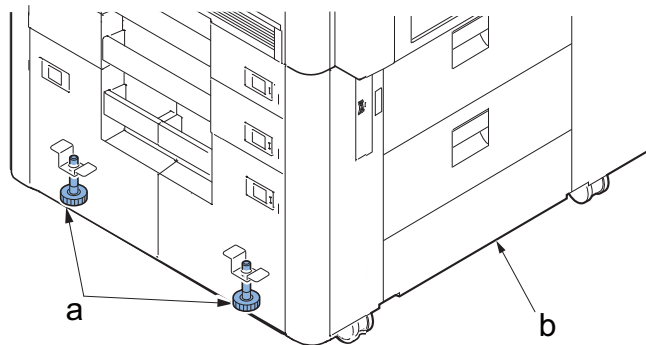
**1** Fix the stabilizers (b) with two screws (a) (M4×20) as shown.

The upper side of screw hole is used.



**NOTE**

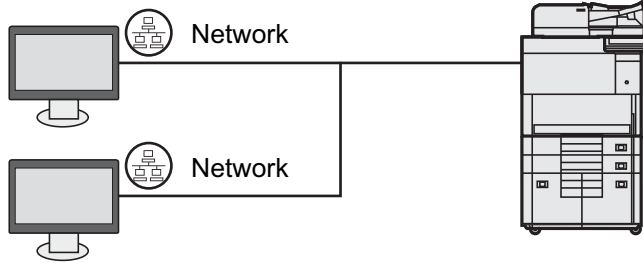
Turn till the position which the adjuster (a) contacts to the floor and then fix the main unit (b).



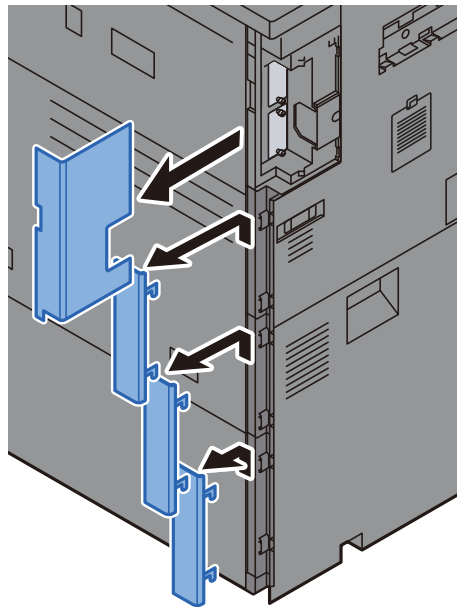
**(9)Connecting the Interface Cable**

Connection Environment	Function	Necessary Cable
Connect a LAN cable to the main unit	Printer/Scanner/Network FAX	LAN Cable (10Base-T, 100Base-TX or 1000Base-T)
Connect a USB cable to the main unit	Printer	USB2.0 compatible cable (Hi-Speed USB compliant, Max. 5.0m long)

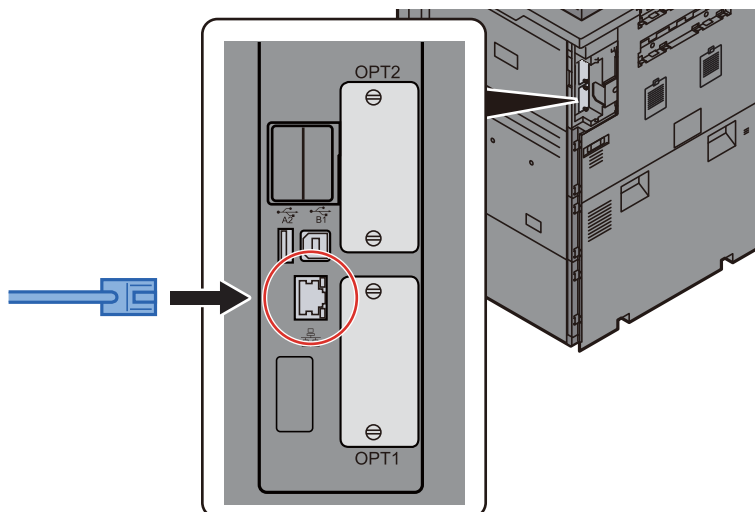
## When Connecting the Machine to the PC on the Network



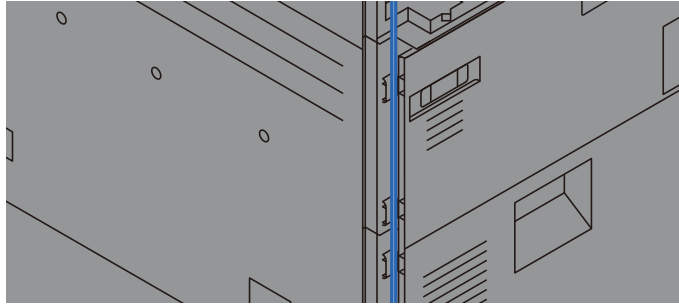
- 1 Detach the main unit cover in order from the top.



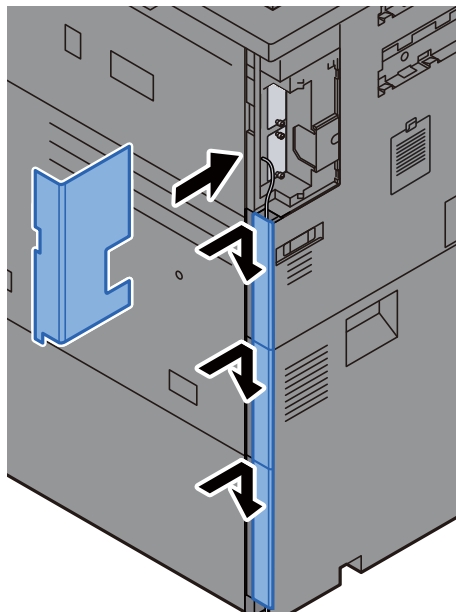
- 2 Connect the LAN cable to the network interface connector.



### 3 Pass the cord through the groove.

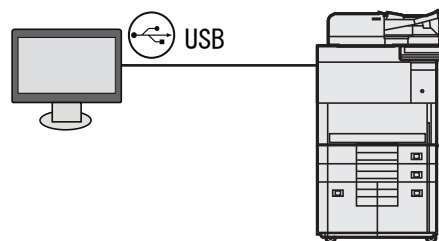


### 4 While taking care not to insert the cord and then install in order from the lower.

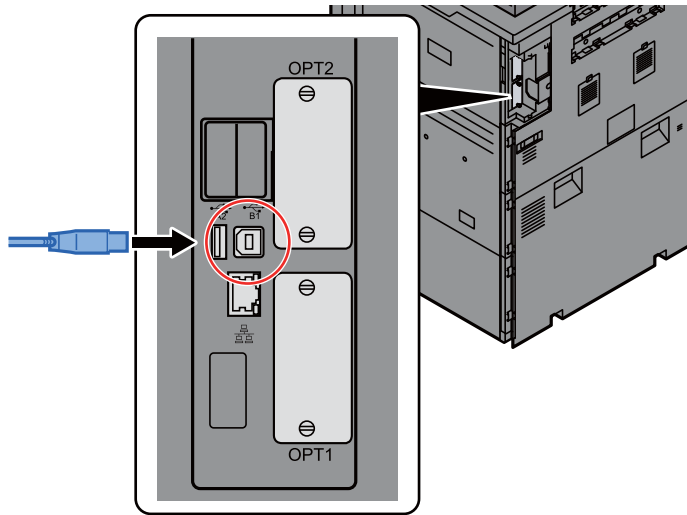


### 5 Connect the other end of the cable to the hub.

#### When Connecting the Machine to the PC via USB



- 1 Connect the **USB cable** to the **USB interface connector** located on the **rear side of the main unit**.



- 2 Connect the other end of the cable to the PC.  
(10)Connecting the FAX cable (FAX installation only)

**General FAX connection example**

**In the case of the general telephone line**

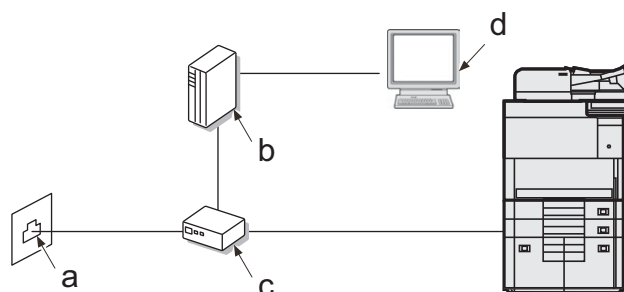
a: Modular jack



**ADSL**

Connect a cord between the **LINE** connector of the main unit and the **PHONE** port of the splitter.

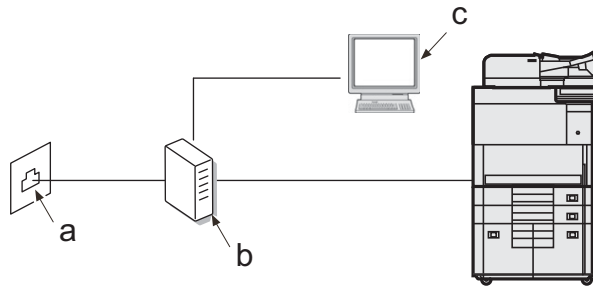
- a Modular jack
- b ADSL modem
- c Splitter (PHONE port)
- d PC





## ISDN

Connect a cord between the LINE connector of the main unit and the analog port of the terminal adapter.

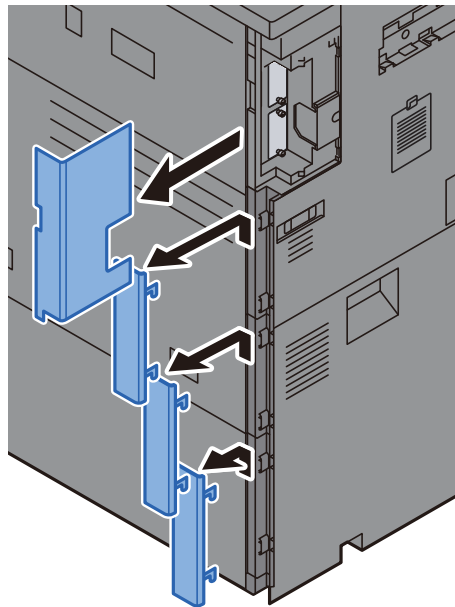


- a Modular jack
- b Terminal adapter (Analog port)
- c PC

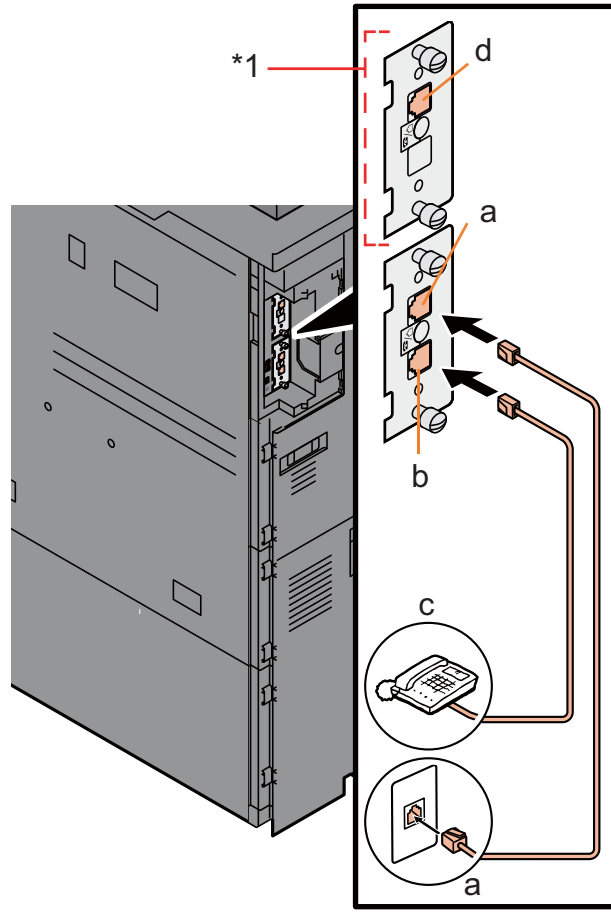
## Modular cord connection

Connect a modular cord to the LINE connector of the main unit. When using a commercially available telephone set, connect a modular cord to the TEL connector of the main unit.

### 1 Detach the main unit cover in order from the top.



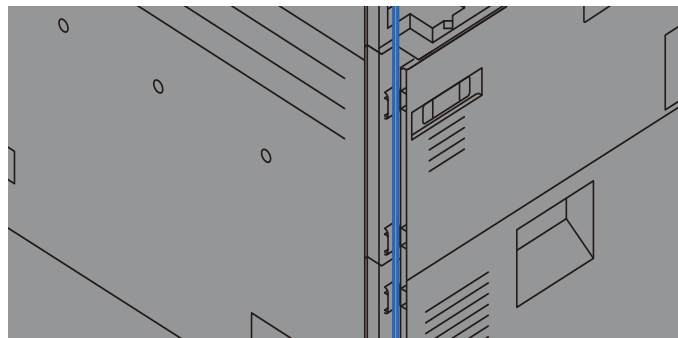
## 2 Connect the modular code to the modular jack.



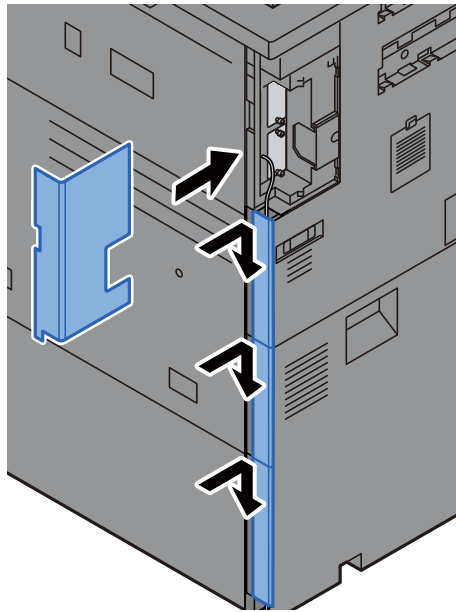
- a Modular jack (line1) \*1
- b Modular jack (Phone)
- c Commercially available telephone
- d Modular jack (line2) \*1

\*1 when two FAX kits are installed

## 3 Pass the cord through the groove.



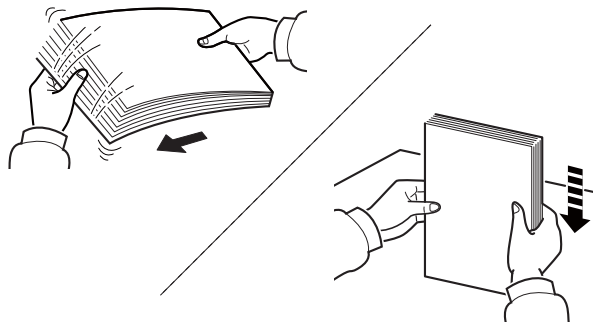
## 4 While taking care not to insert the cord and then install in order from the lower.



### (11) Loading Paper

#### (11-1) Precaution for Loading Paper

Before loading paper in the cassette, fan the paper taken from a new package to separate it in the procedures below.



Fan the paper and align the edges at the flat place.

In addition, note the following points.

If the paper is curled or folded, straighten it before loading. Such paper may cause a jam.

If paper is left under high temperature and high humidity after taking it out of the package, it may cause trouble with paper absorbing moisture. After setting paper in the cassette, seal the rest of the paper in the paper storage bag. Also, seal the paper remaining on the MP tray in the paper storage bag.

If paper is left in the cassette for a long period, heat from the cassette heater may discolor it.

If the machine will not be used for a prolonged period, protect all paper from humidity by removing it from the cassettes and sealing it in the paper storage bag.

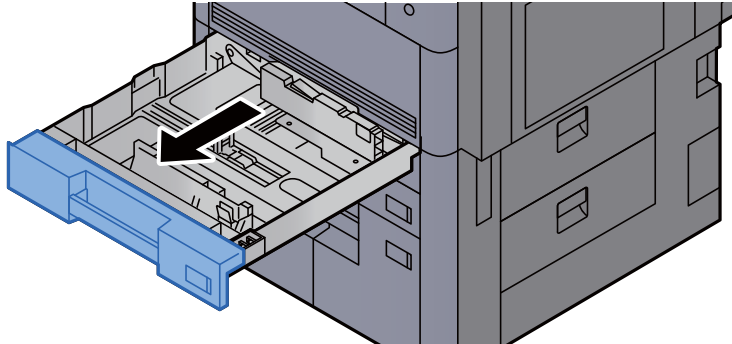
#### ✓ IMPORTANT

If you reuse paper already used for printing, remove staples or clips. Do not use paper with a staple or clip. This may cause poor image quality or malfunctions.

## (11-2) Set paper in the cassette

Set the paper to the cassette 1, cassette 2, optional cassette 5 (PF-7130), cassette 6 (PF-730) and cassette 7 (PF-730). The following procedure is an example for the cassette 1.

### 1 Pull the cassette completely out of the main unit

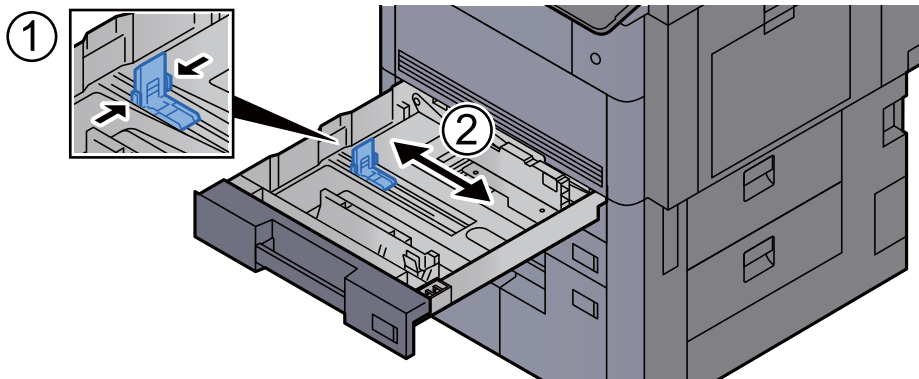


#### NOTE

Do not pull out multiple cassettes simultaneously.

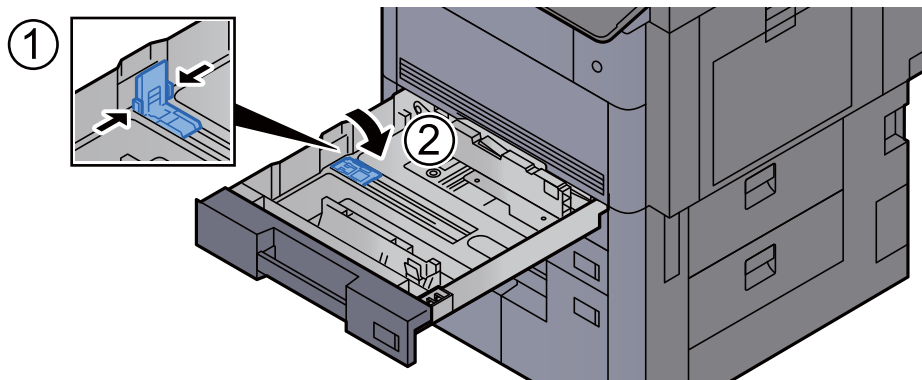
### 2 Adjust the position of the paper length guide.

Press the tab and slide the guides to the paper size to use

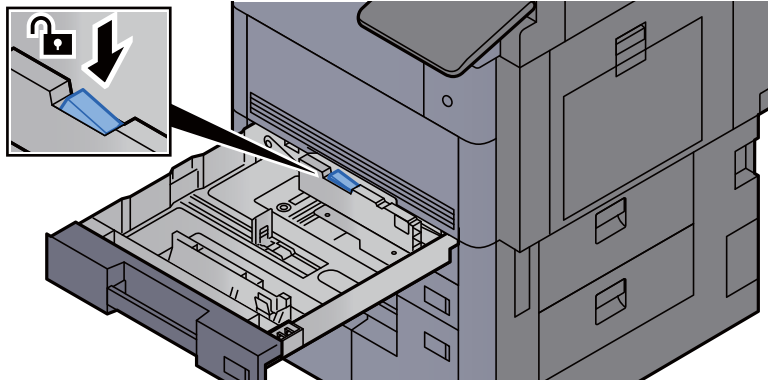


#### NOTE

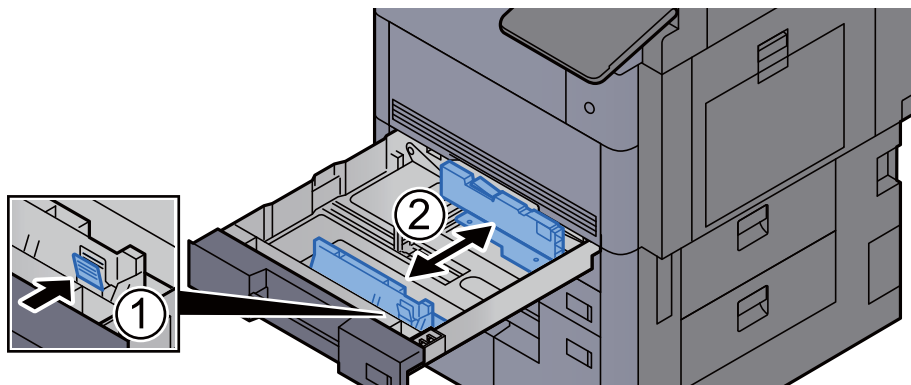
Lay down the paper length guide when using 12x18" in Cassette 1, 2.



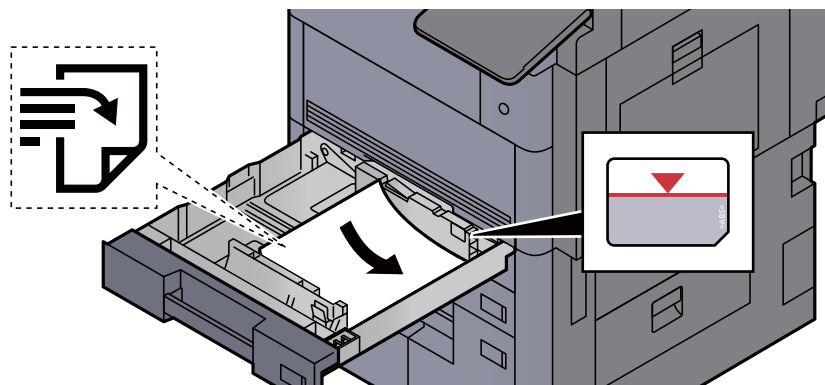
### 3 Release the lock of the paper width guides.



### 4 Adjust the position of the paper width guides



### 5 Load paper



#### ✔ IMPORTANT

Load the paper with the print side facing up.

Before loading paper in the cassette, fan the paper taken from a new package to separate it.

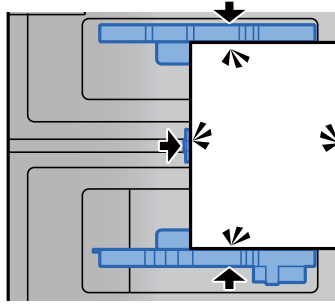
Before loading the paper, be sure that it is not curled or folded. Such paper may cause paper jams.

Make sure that the loaded paper does not exceed the level indicator (see the illustration above).

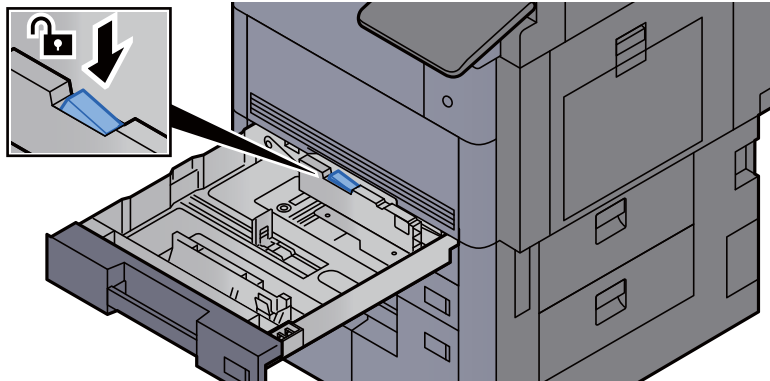
If paper is loaded without adjusting the paper length guide and paper width guides to the paper size to use, the paper may skew or become jammed.

### 6 Check the paper length guide and paper width guide are securely aligned to the paper.

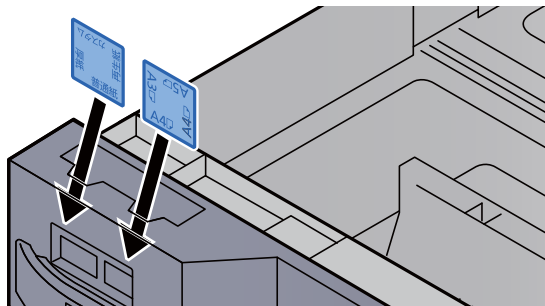
Re-align the paper length guide or paper width guide if gaps are observed.



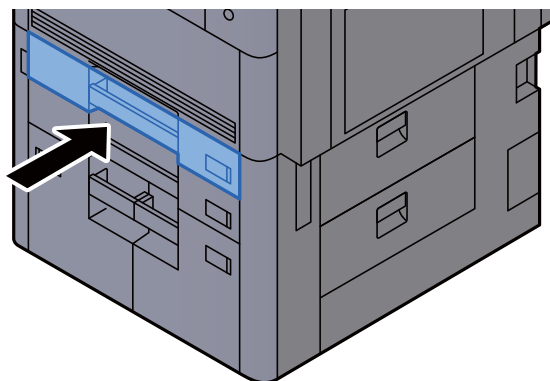
**7** Lock the paper width guide



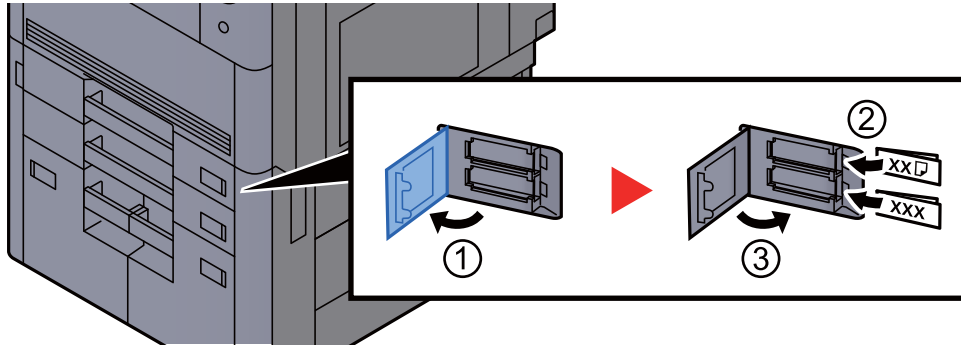
**8** Insert the paper size and media type sheet (cassette 5, cassette 6 and cassette 7 only).



**9** Insert slowly the cassette as far as it will go.



## 10 Insert the paper size and media type sheet (cassette 1 and cassette 2 only).



Set paper in the large capacity feeder

Set the paper to the cassette 3, cassette 4, optional cassette 6 (PF-740) and cassette 7 (PF-740). The following procedure is an example for the 3rd cassette.

The following procedures are for Metric mode. The parts below are necessary to change paper size from Letter to A4/B5 in Inch mode.

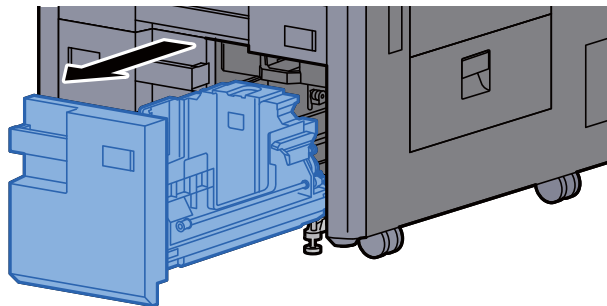
Paper size guide B: 303NF1007\_ CURSOR END DECK, 303NF1041\_ CURSOR END SUB

Paper size guide C: 303NF1052\_ CURSOR END A4

Corresponding paper size sheet is necessary to change to Letter in Metric mode or to A4 or B5 in Inch mode

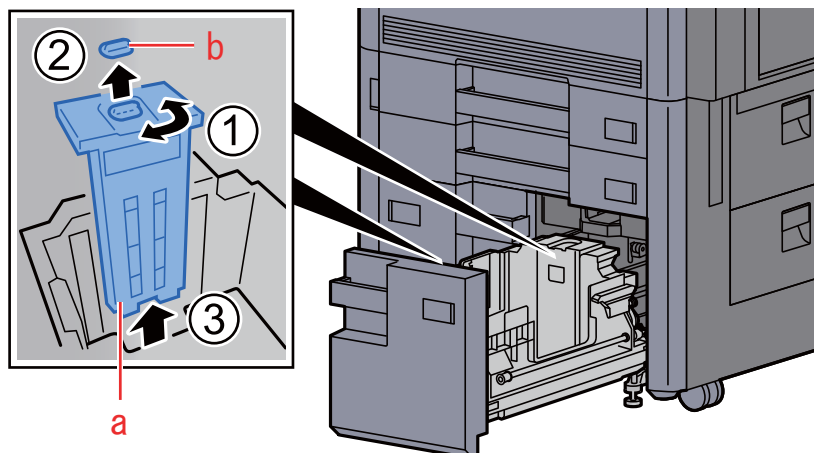
Letter: 303RC34020 SHEET PAPER SIZE I C

### 1 Pull out the cassette in front full.

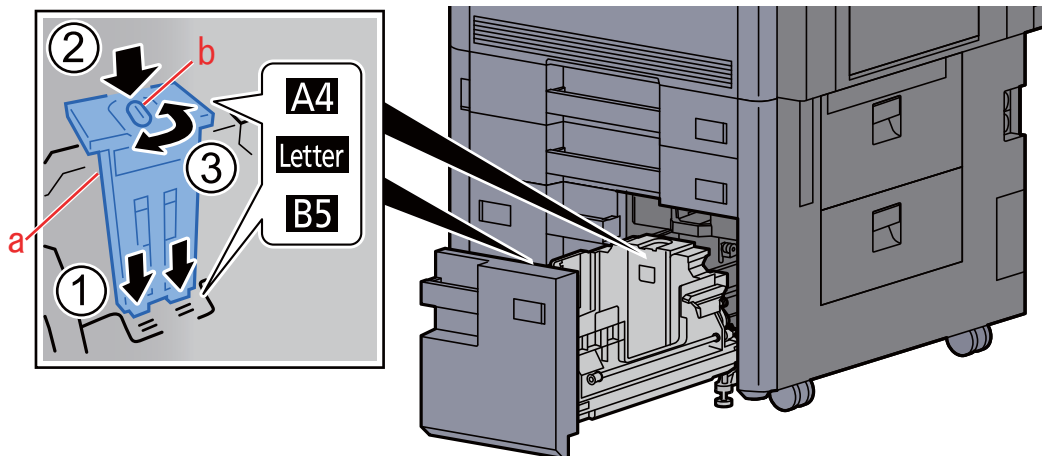


### 2 Adjust the cassette size.

### 3 Detach to turn the fixed material (b) of paper size guide A (a) and then pull out one.

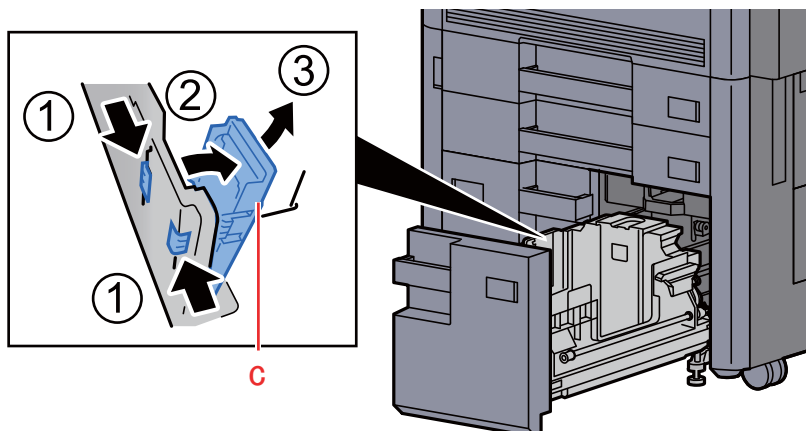


- 4 Match to usable paper size and then insert the groove (the bottom of the tray) which fix the paper size guide A (a).**



Check if the top of paper size guide A (a) matches the usable paper size, install the fixed material (b) and lock turning. Move slightly, check that the paper size guide is fixed.

- 5 With the bottom side of the tray pushing down to the lowest, pushing to detach the hook that there is the side of the paper size guide B (c), pull out it.**



- 6 Match the paper size and then adjust the paper size guide B (c).**

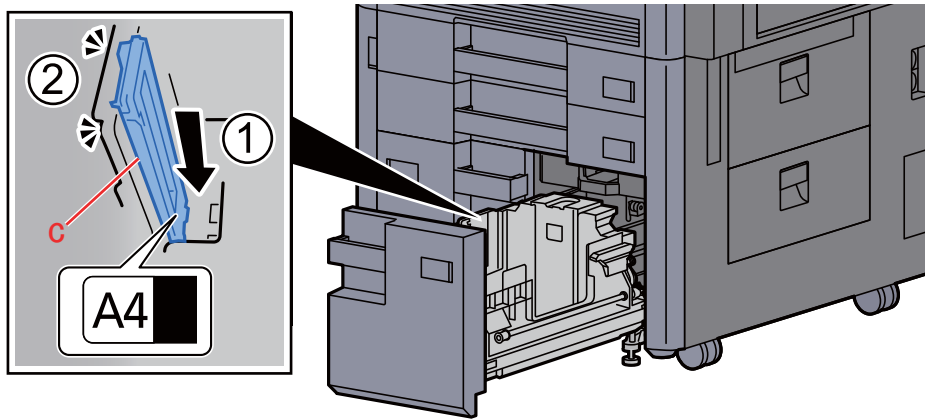
In the case of A4

Insert the paper size B (c) into the A4 marking groove (the bottom of the tray) and then fix the hook.

(When the hook is fixed, it snaps.)

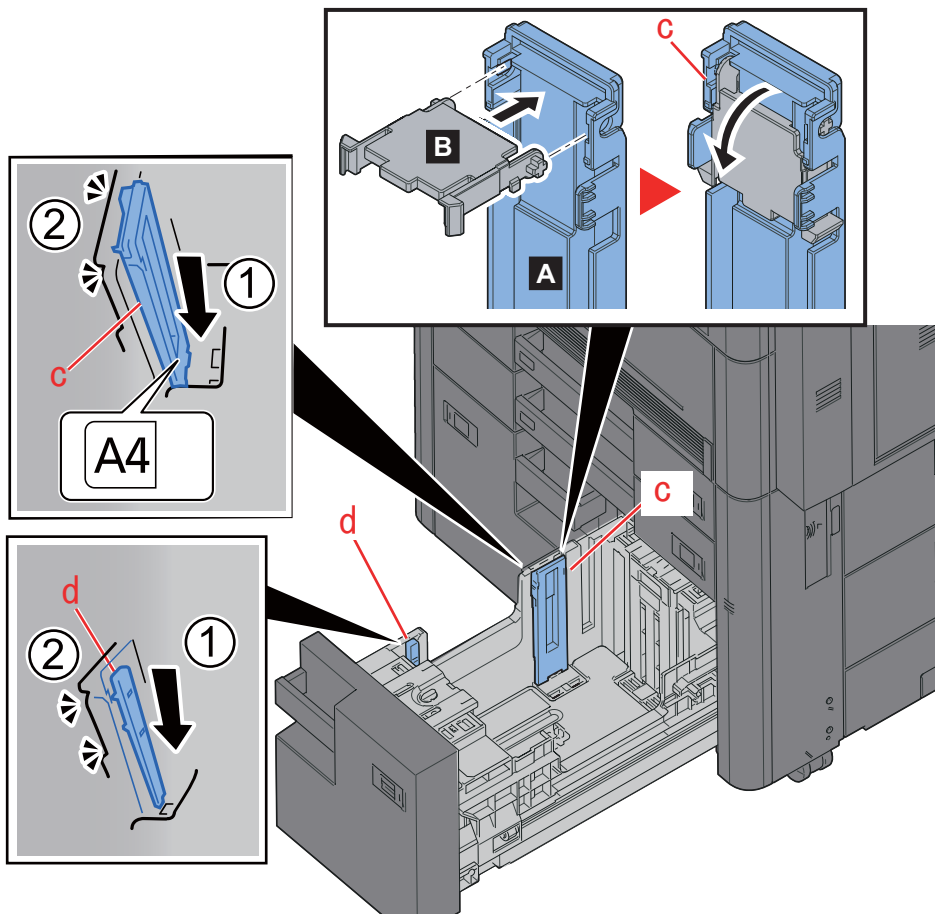
Move slightly, check that the paper size guide is fixed.





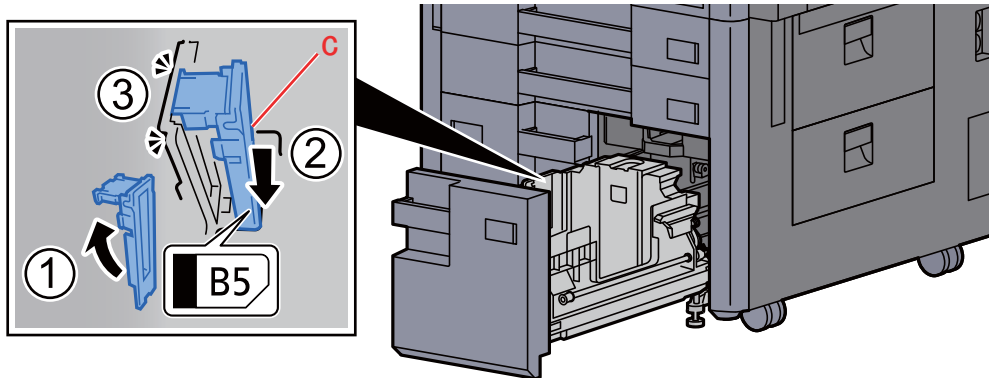
### Inch model (Letter → A4)

- 1 Assemble the paper size guide B (c).
- 2 (Insert the shaft of CURSOR END SUB (B) into the hole of CURSOR END DECK (A) and turn it down.)
- 3 Insert the paper size guide B (c) into the A4 marking groove (the bottom of the tray) and then fix the hook.
- 4 (When the hook is fixed, it snaps.)
- 5 Insert the paper size guide B (c) into the groove (the bottom of the tray) and then fix the hook.
- 6 (When the hook is fixed, it snaps.)
- 7 Move slightly, check that the paper size guide is fixed.



### In the case of B5

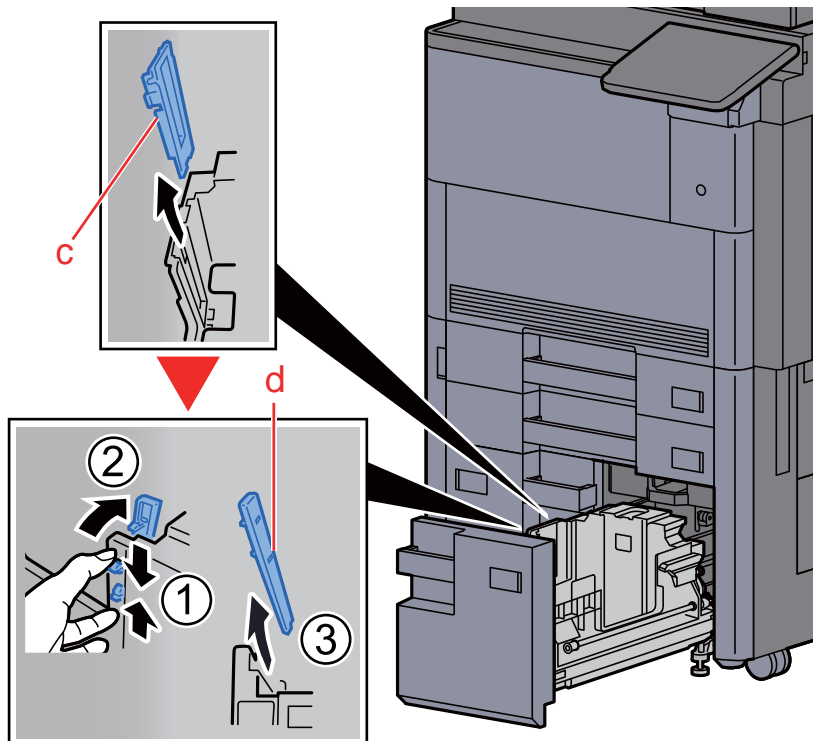
- 1 Open the paper size guide B (c) as shown the diagram, insert the B5 marking groove (the bottom of the tray) and then fix the hook.
- 2 (When the hook is fixed, it snaps.)
- 3 Move slightly, check that the paper size guide is fixed.



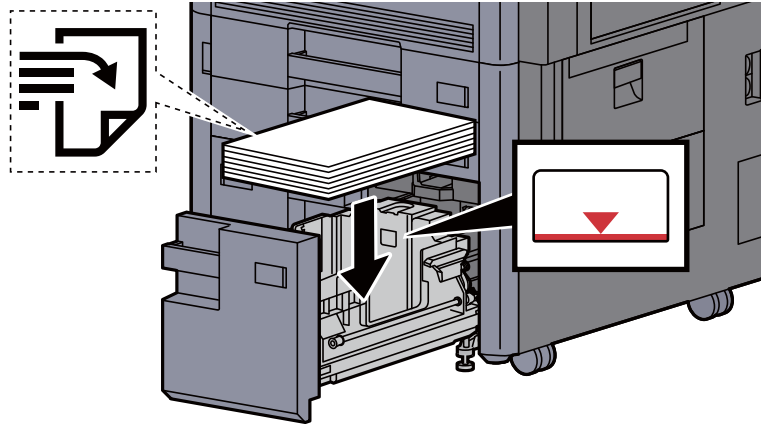
### In the case of letter

The paper size guide B (c) is not installed.

With the bottom side of the tray pushing down to the lowest, pushing to detach the hook that there is the side of the paper size guide C (d), pull out it.



## 7 Load paper.



### NOTE

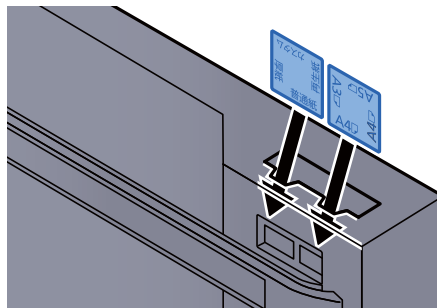
Load the paper with the print side facing up.

Before loading paper in the cassette, fan the paper taken from a new package to separate it.

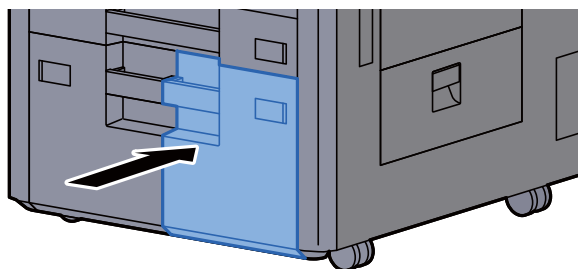
Before loading the paper, be sure that it is not curled or folded. Such paper may cause paper jams.

Make sure that the loaded paper does not exceed the level indicator (see the illustration above).

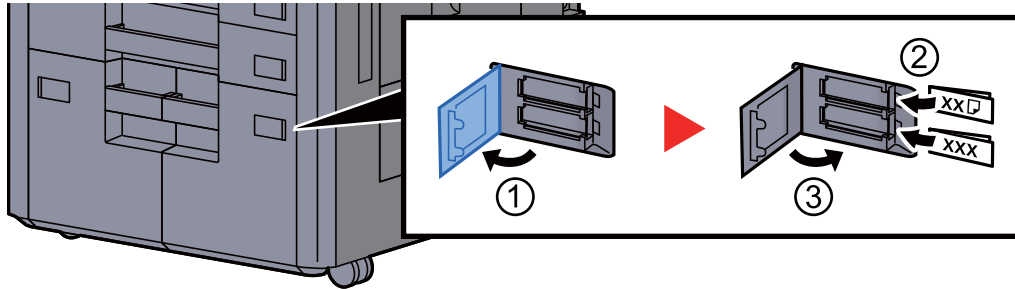
## 8 Insert the paper size and media type sheet (cassette 6 and cassette 7 only).



## 9 Insert slowly the cassette as far as it will go.

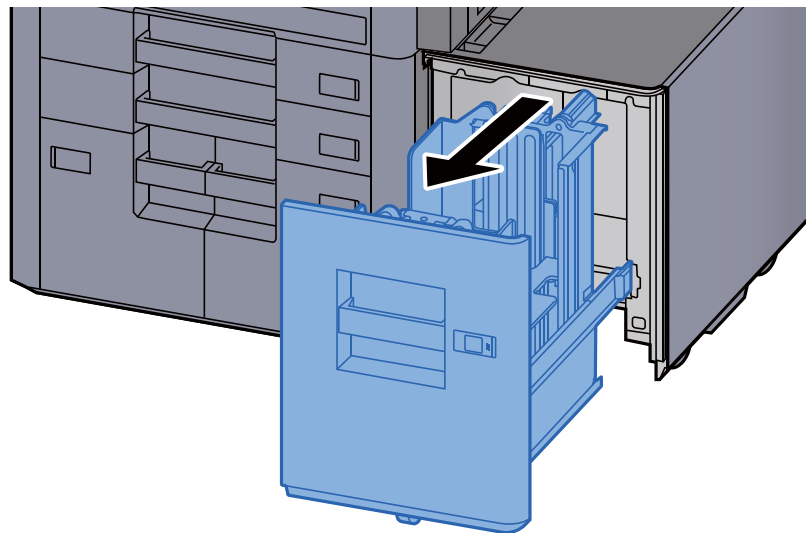


## 10 Insert the paper size and media type sheet (cassette 3 and cassette 4 only).



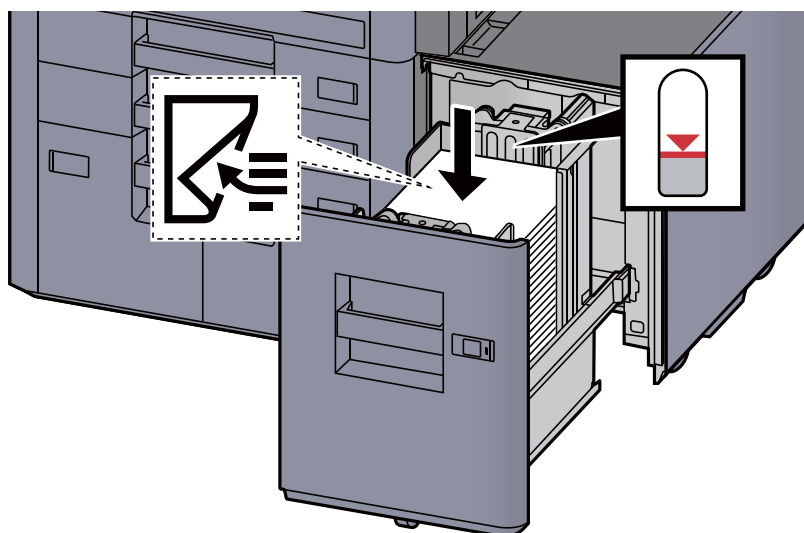
### (11-3) Set paper in the side feeder


#### 1 Pull the cassette completely out of the main unit.



#### 2 Load paper.

Initial paper size is A4. When the paper size is wanted to change B5 or Letter, refer to the installation guide.



 **NOTE**

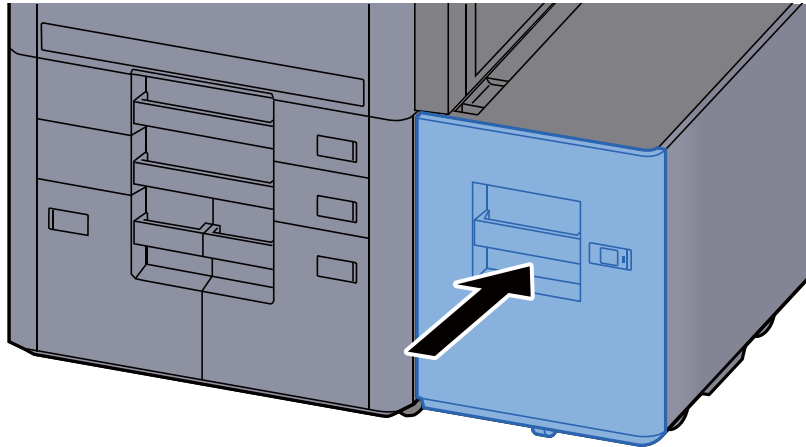
Load the paper with the print side facing up.

Before loading paper in the cassette, fan the paper taken from a new package to separate it.

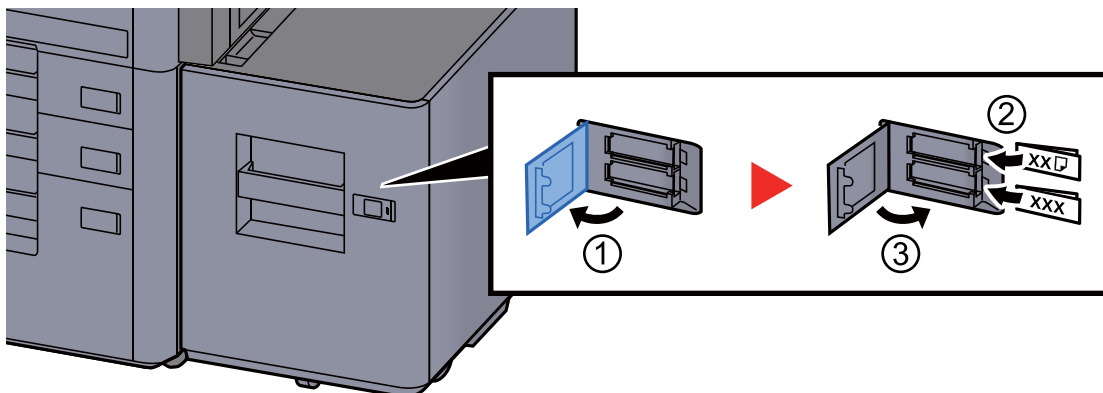
Before loading the paper, be sure that it is not curled or folded. Such paper may cause paper jams.

Make sure that the loaded paper does not exceed the level indicator (see the illustration above).

### 3 Gently insert the cassette all the way.



### 4 Insert the paper size sheet and media type sheet.



## (12) Connecting the Power Cord

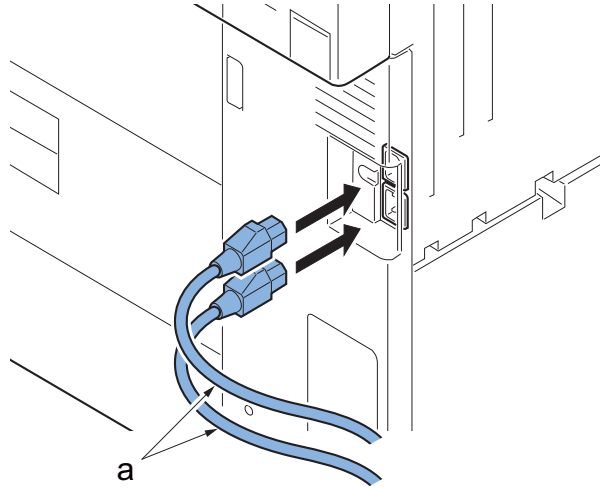
### 1 Connect one end of the supplied power cord (a) to the machine and the other to a power outlet.

Connect the power plug to the another circuit outlet. (100V: 80 ppm model)

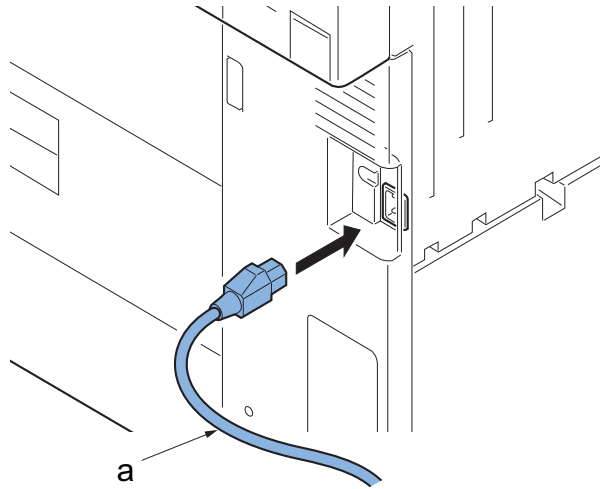
Only use the power cord that comes with the main unit.

A power cord is attached to the 120V machine. Connect it to the power outlet.

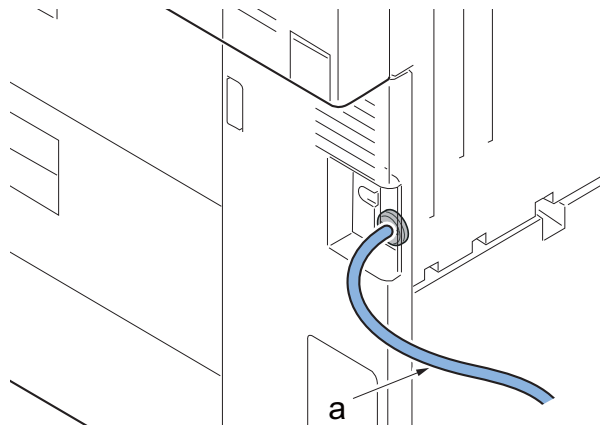
**100V: 80 ppm model**



**100V: 70 ppm model, 220 to 240V: 70/ 80/ 90 ppm model**

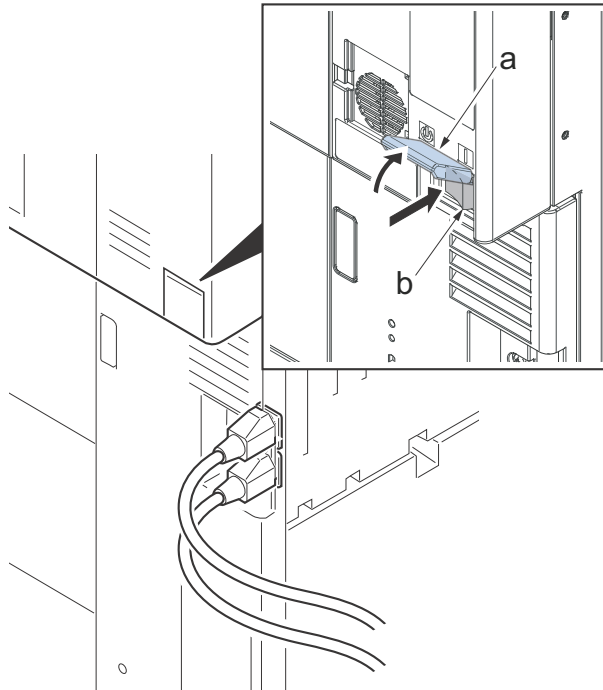


**120V: 70/ 80/ 90 ppm model**



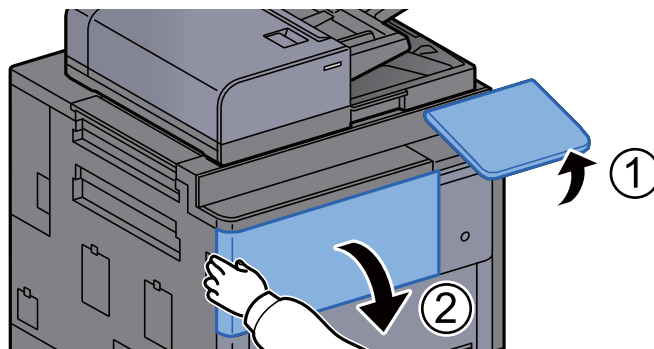
**(13) Input of the power source**

- 1 Open the main switch lid (a) and turn the main switch (b) on.

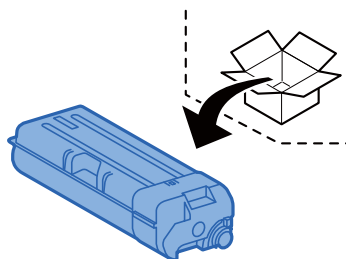
**(14) Setting up the Toner Container**

Set up the toner container.

- 1 Lift the angle of operation panel up to the most top and then open the front cover.

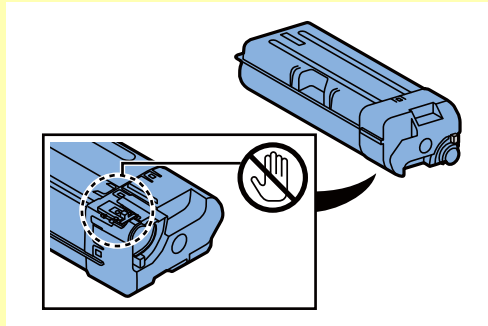
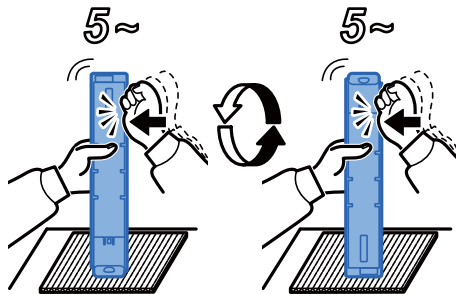
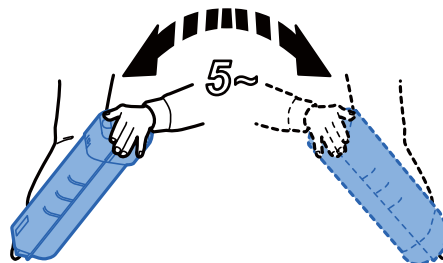
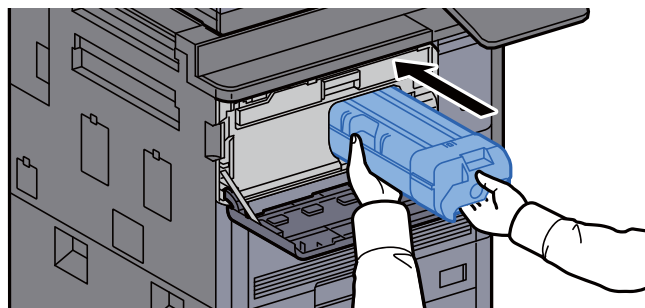


- 2 Take out the toner container.



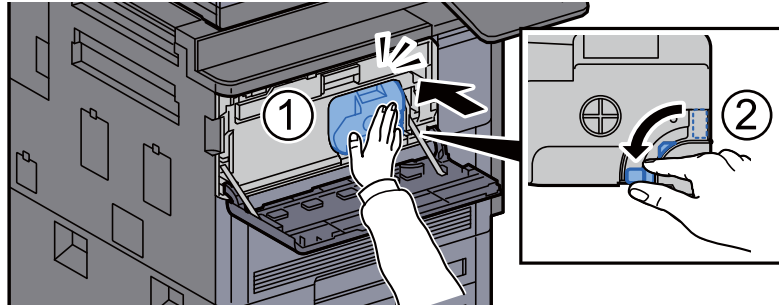
**✔ IMPORTANT**

Do not touch the toner outlet by hand.

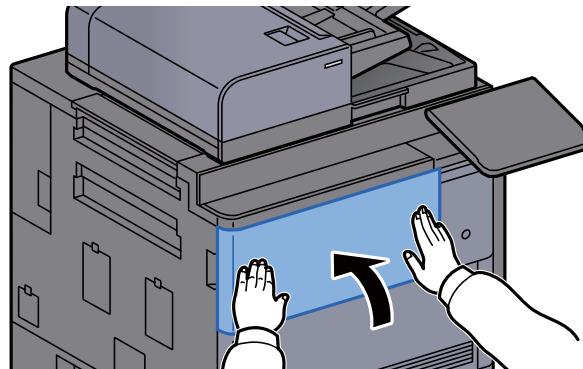
**3 Slightly tap the toner container****4 Shake the toner container.****5 Install the toner container.**



**6 Lock the toner container lever.**



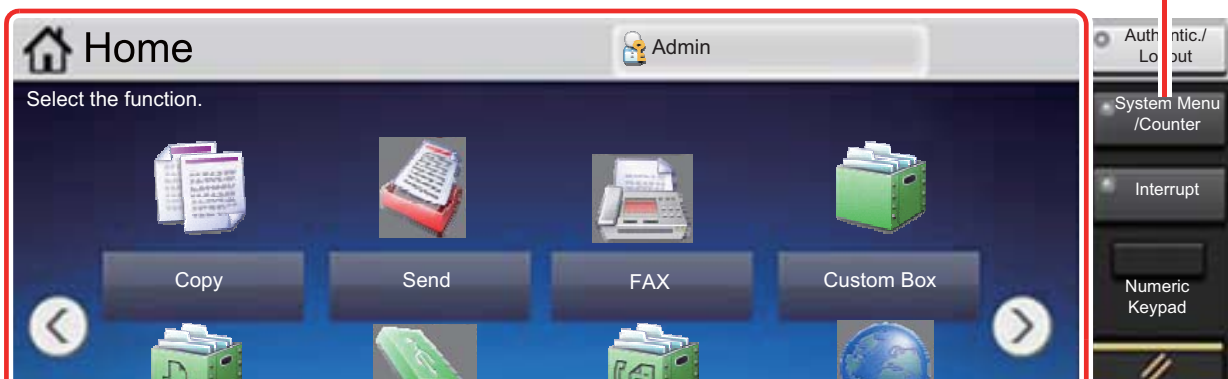
**7 Close the front cover.**



**(15)Default Setting**

The Machine Setup Wizard is launched when the equipment is turned on for the first time after being installed. Available of setting the necessary items. Also, it can beset from System Menu as below.

[System Menu /Counter] key



**(15-1)Setting Date and Time**

Follow the steps below to set the local date and time at the place of installation.

- 1 Display the screen**  
[System Menu/ Counter] key or [System Menu] key > [Date/Timer/Energy Saver]
- 2 Configure the settings**  
[Time Zone] > [Date/Time] > [Date Format]

Item	Description
Time Zone	Set the time difference from GMT. Choose the nearest listed location from the list. If you select a region that utilizes summer time, configure settings for summer time.
Date/Time	Set the date and time for the location where you use the machine. If you perform Send as E-mail, the date and time set here will be displayed on the header. Value: Year (2000 to 2037), Month (1 to 12), Day (1 to 31), Hour (00 to 23), Minute (00 to 59), Second (00 to 59)
Date Format	Select the display format of year, month, and date. The year is displayed in Western notation. Setting: month/day/year, day/month/year, year/month/day

**(15-2)Network Setup (LAN Cable Connection)****TCP/IP (IPv4) Settings**

Set up TCP/IP (IPv4) to connect to the Windows network.  
The default settings are as follows.

- TCP/IP: On
- DHCP: On
- Auto-IP: On
- IP Address: 0.0.0.0
- Subnet Mask: 0.0.0.0
- Default Gateway: 0.0.0.0

**Setting procedures**

- 1 Select [System Menu/Counter] key or [System Menu] key > [System/Network] > [Network] > [TCP/IP Setting] > [Wired Network Settings] > [TCP/IP Setting].**

- 2 Select [IPv4] for setting.**

**When using DHCP server**

- 1 [DHCP]: set to [On]**

**When setting the static IP address**

- 2 [DHCP]: set to [Off]
- 3 [IP Address]: Enter the address.
- 4 [Subnet Mask]: Enter the address.
- 5 [Default Gateway]: Enter the address.
- 6 [Auto IP]: set to [Off]
- 7 When setting Auto IP, set the IP address to 0.0.0.0.

### 3 Restart the network from System Menu, or turn the power off and then on waiting 5 seconds or more.

The factory default login user name and login password are set as shown below.

Model Name	70 ppm model	80 ppm model	90 ppm model
Login User Name	7000	8000	9000
Login Password	7000	8000	9000

### (15-3) Paper size and media type setting

- 1 Select [System Menu/Counter] key > [Cassette/MP tray Settings].
- 2 Select [Cassette 1 (- 7)] or [MP Tray Setting].
- 3 Select [Paper Size] and [Media Type] to set them.

### (16) Installing Software

Install appropriate software in your PC from the bundled DVD (Product Library) if you want to use the printer function of this machine or perform TWAIN / WIA transmission or Network FAX transmission from your PC. (See the Operation Guide supplied with the main unit)

### (17) Image adjusting

#### Execute the image adjusting in the maintenance mode workflow (Maintenance mode U952)

- 1 Input "10871087" using the numeric keypad to enter the maintenance mode.
- 2 Input "952" using the numeric keypad and press the [Start] key.
- 3 Select [Execute].
- 4 Select [Setup] when adjusting the main unit. Select [Setup] after selecting [HIGH ALTITUDE} when installing in the high altitude more than 1,000m.
- 5 When adjusting the optional enhancement, select [EH Setup].
- 6 Select the maintenance mode which is displayed in order from the top, push [Start] key, move to the maintenance mode.
- 7 Execute the below setting procedure of the maintenance mode after moving.
- 8 Press the [Stop] key and back to the original flow after executing.
- 9 Repeat the procedure 5,6,7 and finish the workflow.

When U952 is not executed, enter the maintenance mode with the numeric keypad in following order and execute each setting.

## 1 Set up in a high altitude

When setting up in a high altitude, execute the following.

- 1 Maintenance mode U140 > [AC Calib] > [Calibration] >
- 2 Type: 0 (default), K: ON > [Execute]
- 3 Press the [Start] key.

When the developer leak happens after setting the above.

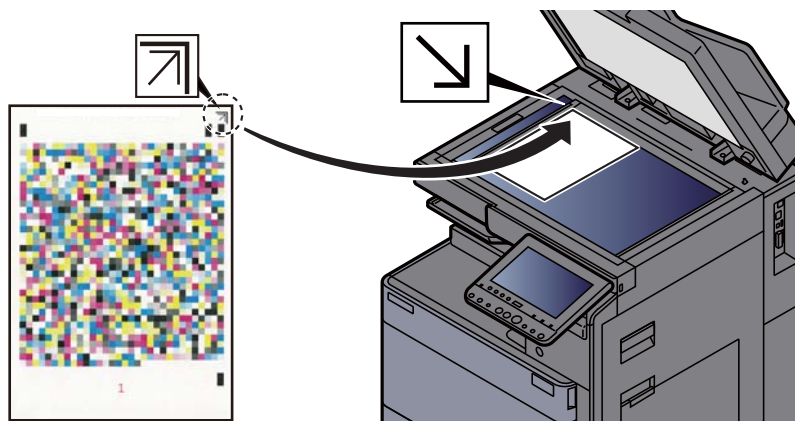
- 4 Select U140 > [AC Calib] > [Magnification] and then lower the K numeric value.

## 2 Setting the ID correction operation (Maintenance mode U464)

- 1 Input "464" using the numeric keypad and press the [Start] key.
- 2 Select [Calib] > [Execute].
- 3 Press the [Start] key.
- 4 Calibration starts.
- 5 Press the [Stop] key.

## 3 Adjusting the halftone automatically (Maintenance mode U410)

- 1 Input "410" using the numeric keys.
- 2 Press the [Start] key.  
Display the execution information screen.  
Test pattern 1, Test pattern 2 and Test pattern 3 are output on the A4/ letter paper.
- 3 Set the test pattern output on the original glass with the arrow facing the rear side and print side face-down.
- 4 Load about 20 sheets of the blank paper on Test Pattern 1.



- 5 Press [Start] key.  
The first auto adjustment is executed.
- 6 Set the output Test Pattern 2 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 2.
- 7 Press [Stop] key.  
The second auto adjustment is executed.

- 8 Set the output Test Pattern 3 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 3.
- 9 Press the [Start] key.  
The third auto adjustment is executed.
- 10 [Finish] appears after normal completion.  
An error code appears when an error occurs.

#### 4 Output Maintenance report (Maintenance mode U000)

- 1 Input "000" using the numeric keypad and press the [Start] key.
- 2 Select [Maintenance] and press the [Start] key to output the maintenance report.
- 3 Press the [Stop] key.

#### 5 Clearing the counts (Maintenance mode U927)

- 1 Input "927" using the numeric keypad and press the [Start] key.
- 2 Select [Execute].
- 3 Press the [Start] key to clear the counter value.
- 4 Press the [Stop] key.

#### 6 Setting the delivery date (Maintenance mode U278)

- 1 Input "278" using the numeric keypad and press the [Start] key.
- 2 Select [Today].
- 3 Press the [Start] key to set the delivery date.
- 4 Press the [Stop] key.

#### (18) Cassette heater control setting (100V model only)

The model which the cassette heater is normally equipped and connecting to the connector in the cassette heater connecting procedure.

If the setting is not executed, the cassette heater is not turned on. (Default setting is OFF)

- 1 Input "327" using the numeric keyboard and press the [Start] key.
- 2 Select [Mode 1] or [Mode 2]
- 3 Press the [Start] key and then set.
- 4 Press the [Stop] key.

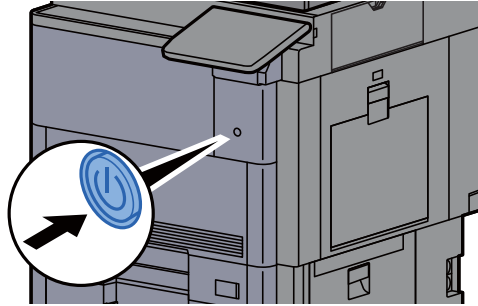
When reflecting the setting, skip the maintenance mode, operate the shut-down from the normal screen and turn the power switch ON/OFF.

#### (19) Exiting from the maintenance mode

- 1 Input "001" using the numeric keypad and press the [Start] key.  
The maintenance mode is exited.

**(20) Completion of installing the main unit (Turning the power off)**

- 1 Turn the power switch off.



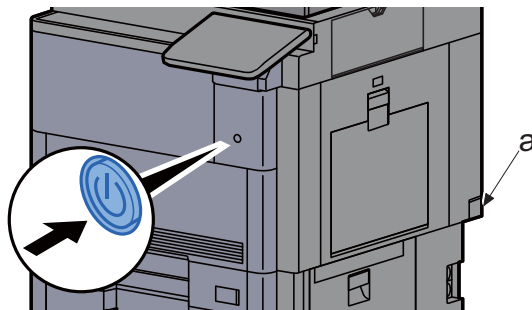
- 2 The confirmation screen of shut down is displayed. Select [Yes] in the confirmation screen.

It takes about 3 minutes to switch the power off.

**(21) Turn the power on again**

- 1 Turn the power switch on.

Check the main power switch (a) is ON when the power is not turned on.

**✔ IMPORTANT**

After turning off the power switch, do not turn on the power switch again immediately. Wait 5 seconds or more, and then turn on the power switch.

## 2 - 3 Installing the optional equipment

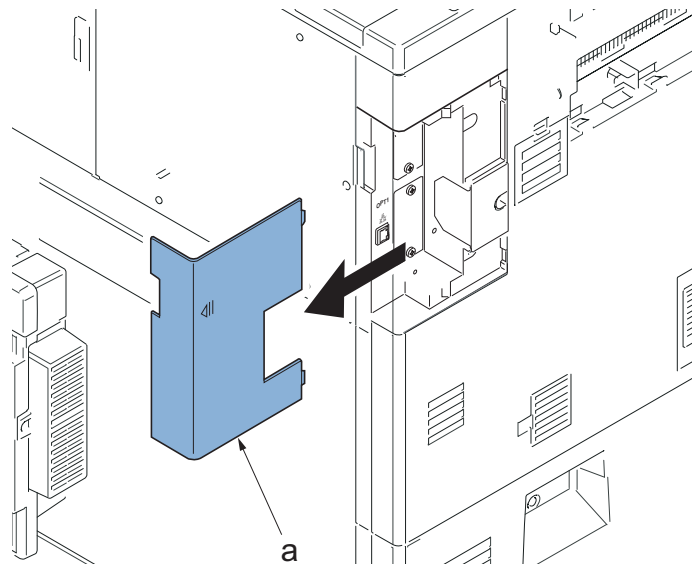
### (1) Gigabit Ethernet extension kit (IB-50)

#### The bundle parts of Gigabit Ethernet extension kit (IB-50) (1505JV0UN0)

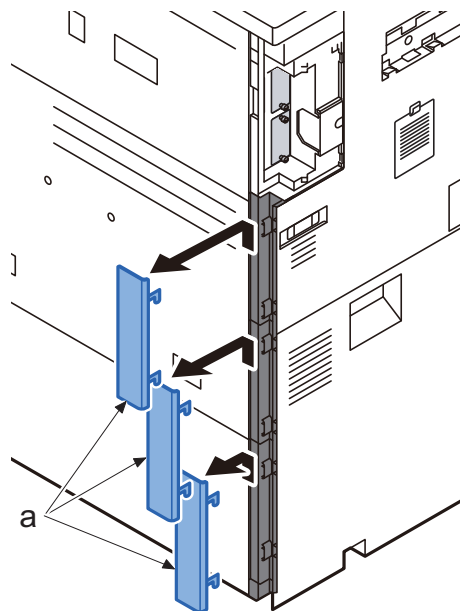
PWB unit 1 pc

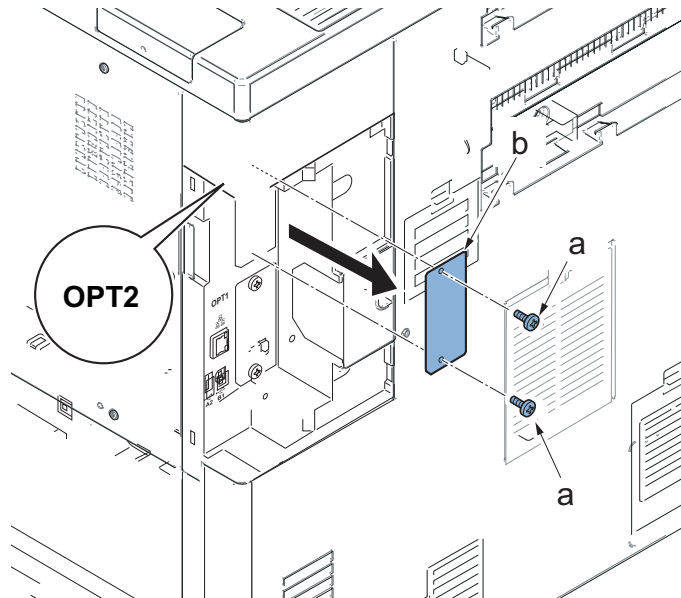
#### Procedures

- 1 Press the power key, after checking that the power lamp and the memory lamp are turned off, switch the main power off and unplug the power plug.
- 2 Detach the controller cover (a).

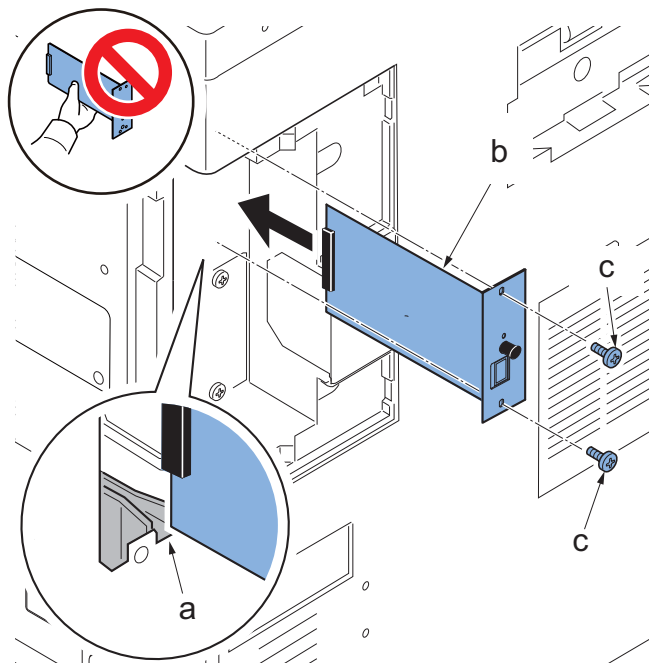


- 3 Detach the main unit cover (a) in order from the top

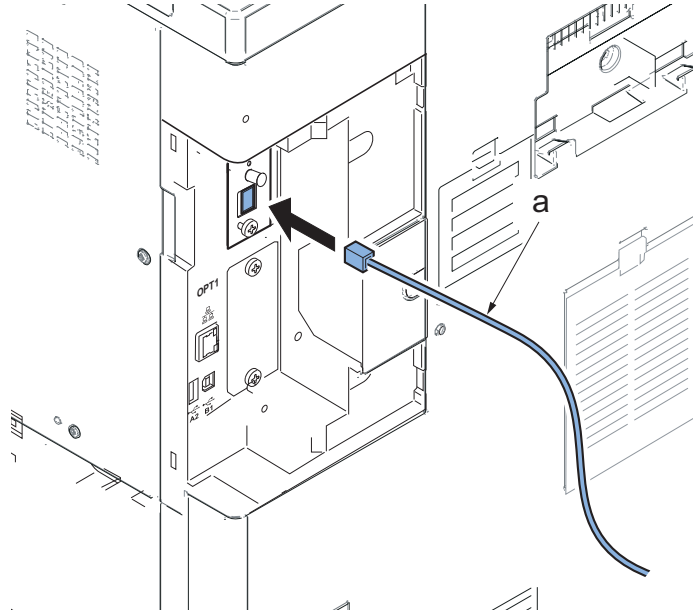
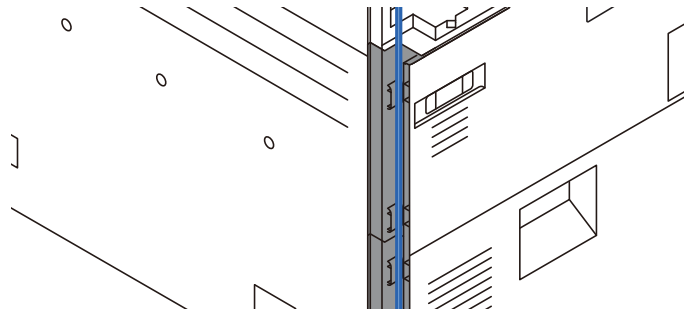
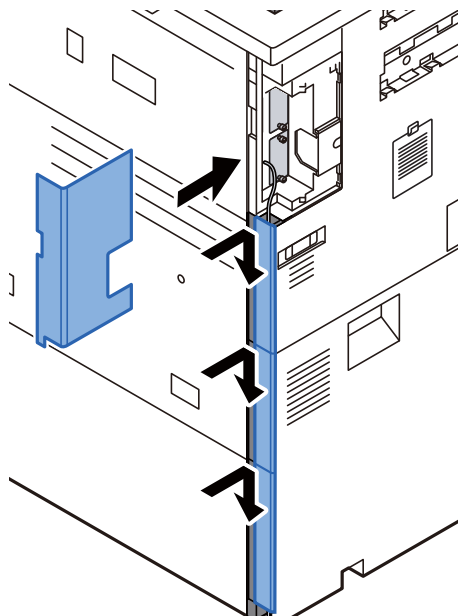


**4 Remove two screws (a) (M3×8) and then remove the OPT2 slot cover (b).****5 Insert the Gigabit Ethernet extension kit (b) along the OPT2 groove (a), fix with two screws (c) (M3×8) which is removed in the procedure 4.**

Don't touch directly the terminal of Gigabit Ethernet extension kit. When inserting Gigabit Ethernet extension kit, you have to hold PWB upper and lower parts or protuberance.





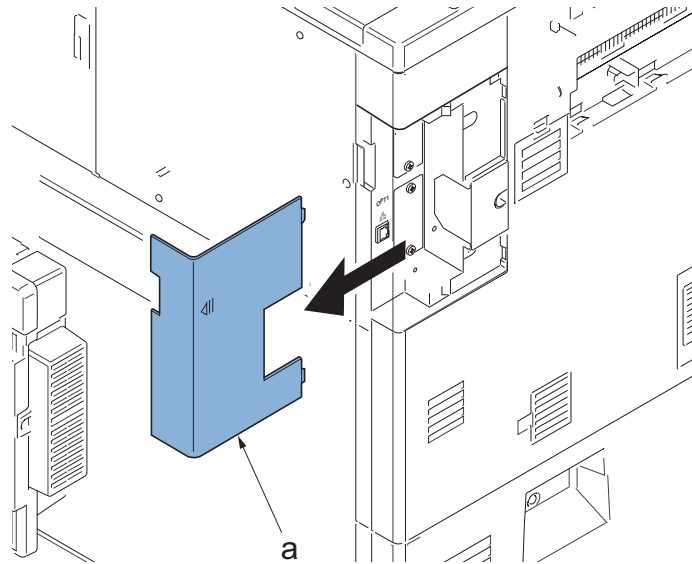
**6 Insert the LAN cable (a) into the connector.****7 Pass the cord through the groove.****8 While taking care not to insert the cord and then install in order from the lower.****9 Insert the bundled CD-ROM into PC, executing "Quick Network Setup" and set the IP address.**

**(2) Wireless LAN interface kit (IB-51)****Bundled parts of Wireless LAN interface kit (IB-51) (1505J50UN0)**

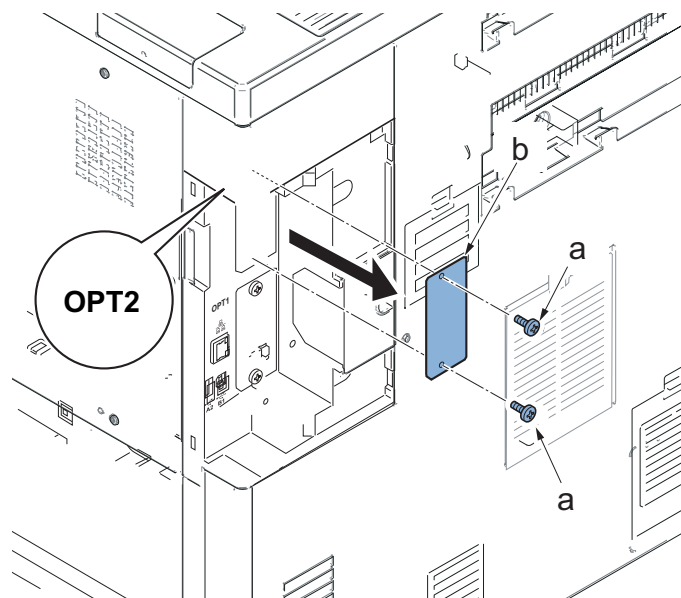
PWB unit 1 pc

**Procedures**

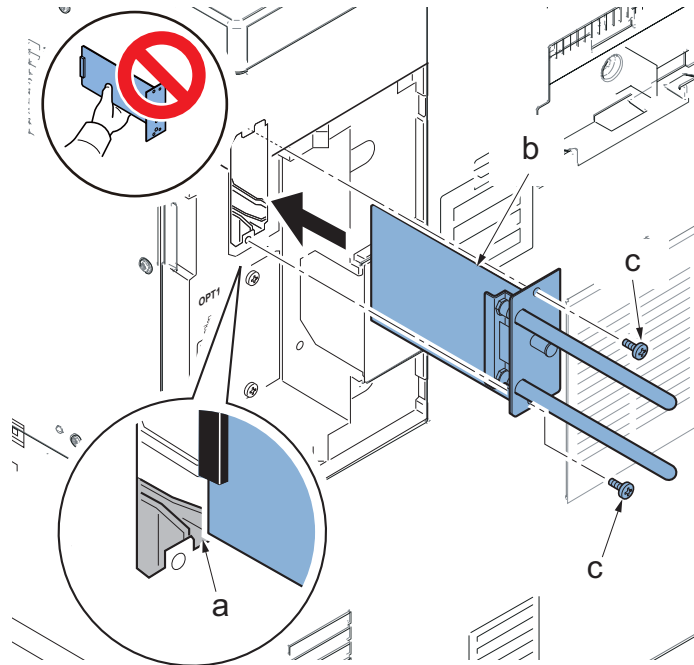
- 1** Press the power key, after checking that the power lamp and the memory lamp are turned off, switch the main power off and unplug the power plug.
- 2** Detach the controller cover (a).



- 3** Remove two screws (a) (M3×8) and then remove the OPT2 slot cover (b).



- 4 Insert the Wireless interface kit (b) along the OPT2 groove (a), fix with two screws (c) (M3×8) which is removed in the procedure 3.
- 5 Don't touch directly the terminal of Wireless interface kit. When inserting Wireless interface kit, you have to hold PWB upper and lower parts or protuberance.



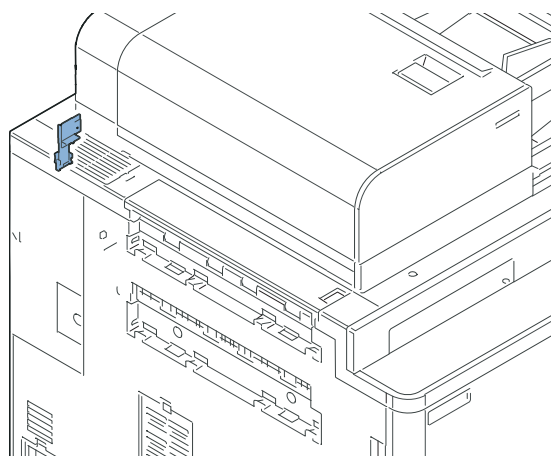
- 6 Insert the bundled CD-ROM into PC, executing "Quick Network Setup" and set the IP address.

(3)Wireless LAN interface (IB-35) (120V model standard)

**Bundled parts of Wireless LAN interface (IB-35) (1503RR0UN0)**

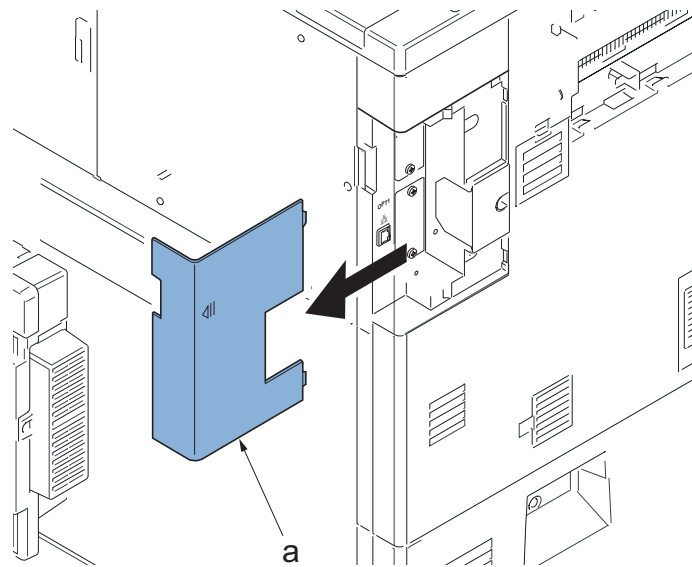
PWB unit 1 pc

Screw (M3x6) 1 pc

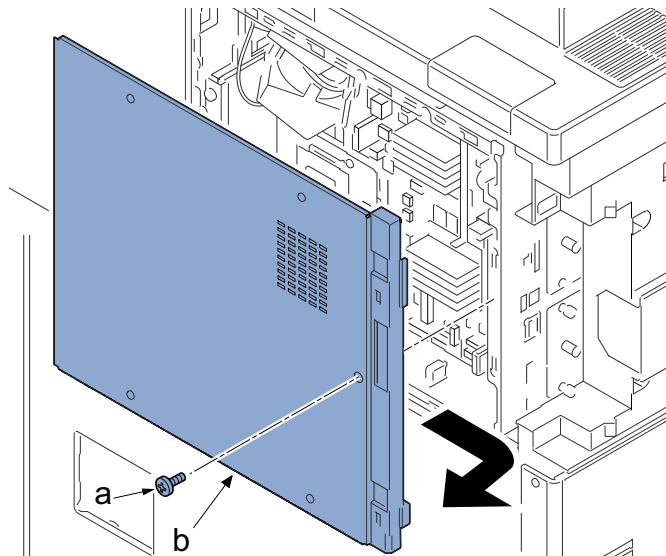


## Procedures

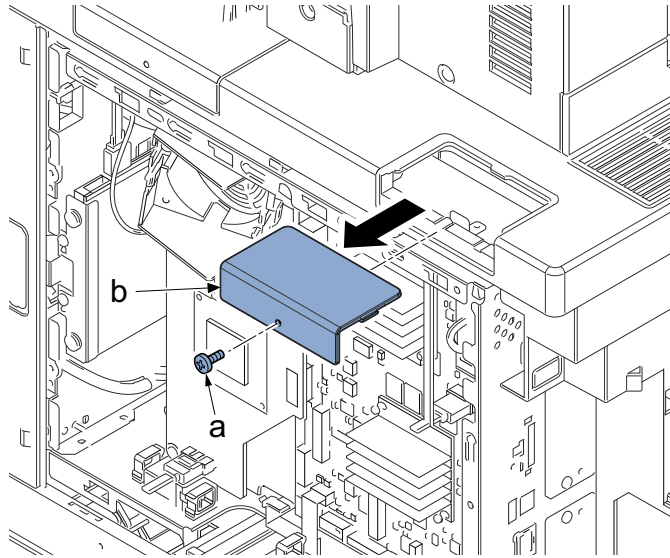
- 1 Turn off the main unit and disconnect the power cord and all interface cables.
- 2 Slide the controller cover (a) in the direction of the arrow and detach it.



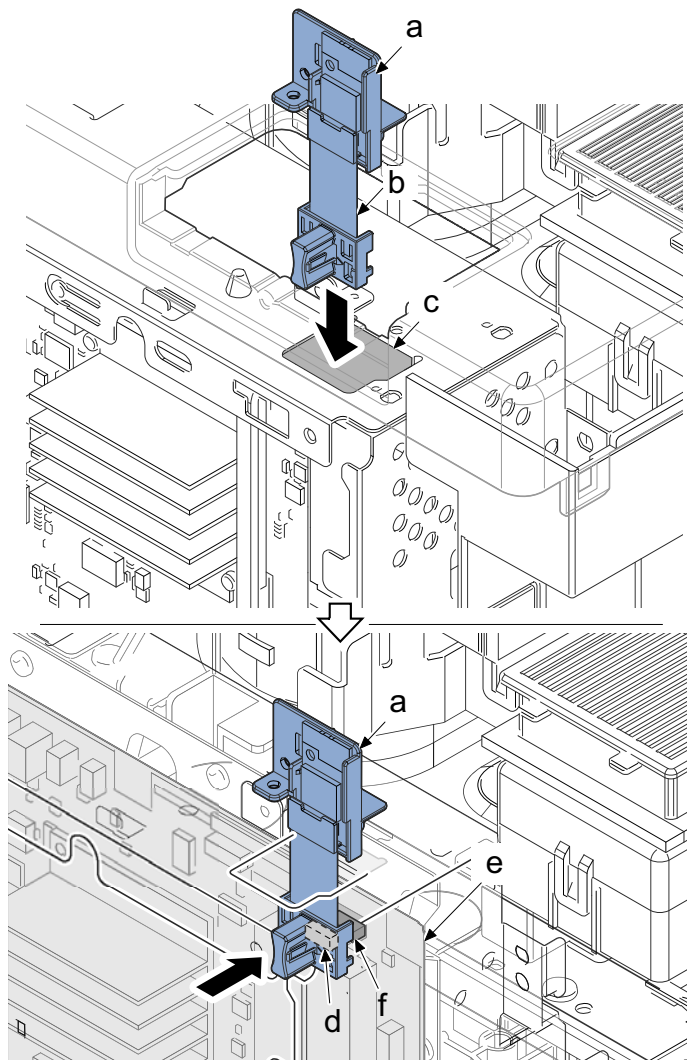
- 3 Remove one screw (a) (M3x8) and then remove the left rear cover (b) by sliding in the direction of the arrow.

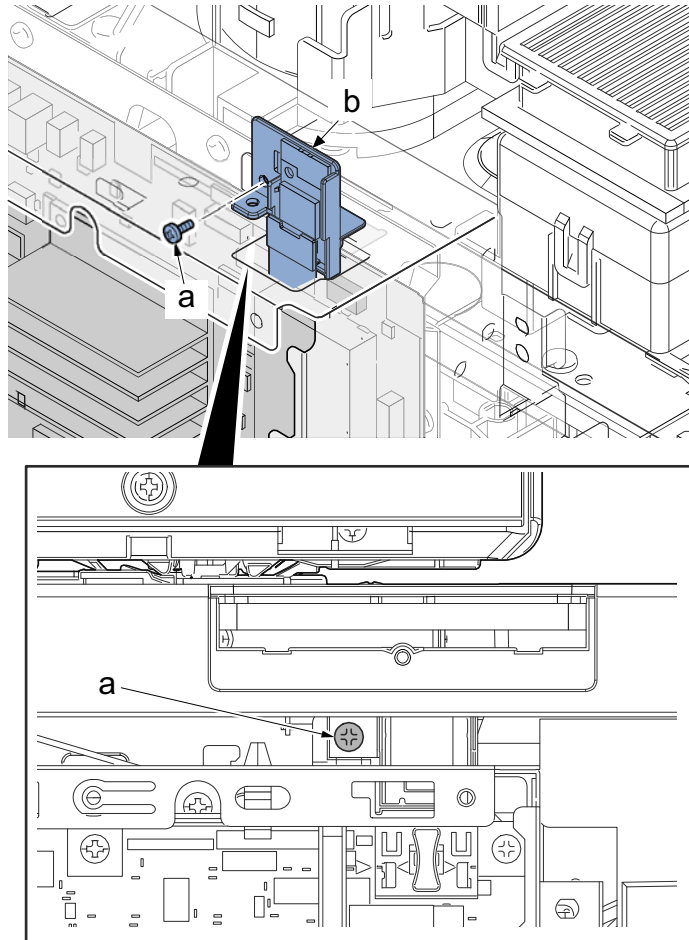
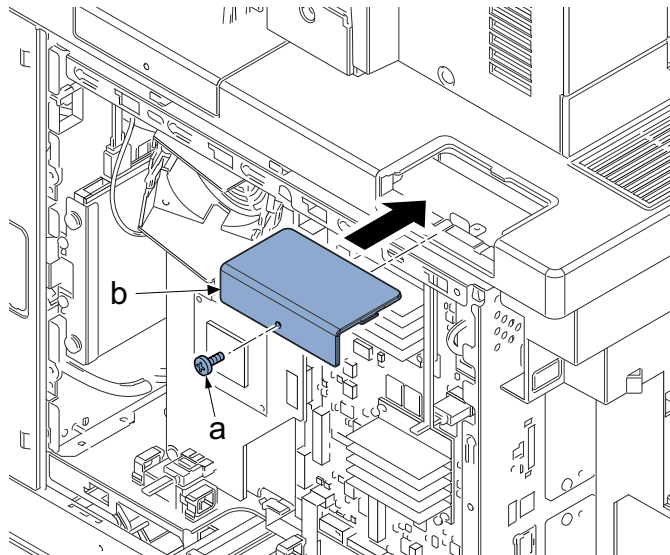


- 4 Remove one screw (a) (M3x8).
- 5 Remove the IF lid (b) in the direction of the arrow.

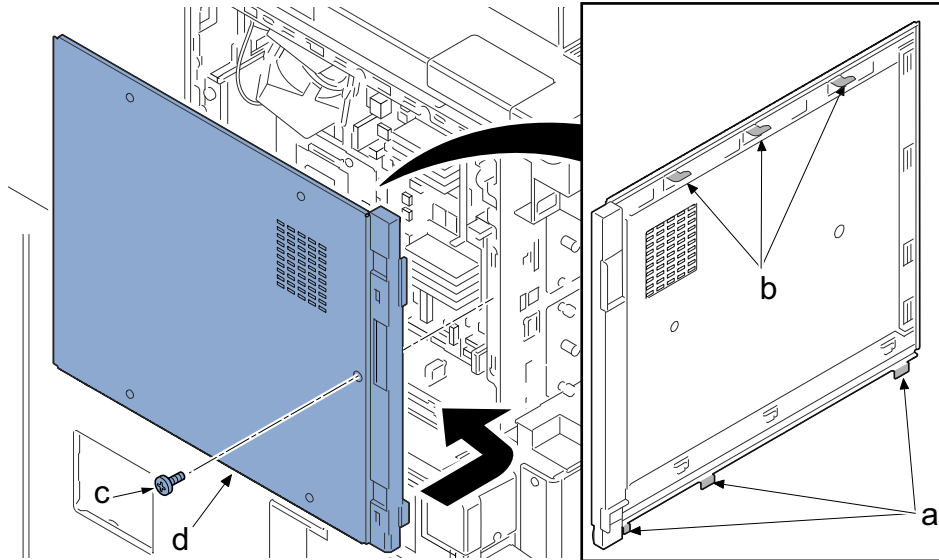


- 6 Insert the FPC (b) of the PWB unit (a) into the aperture (c) of the controller box.
- 7 Connect the connector (d) to the connector (f) of the main PWB (e).

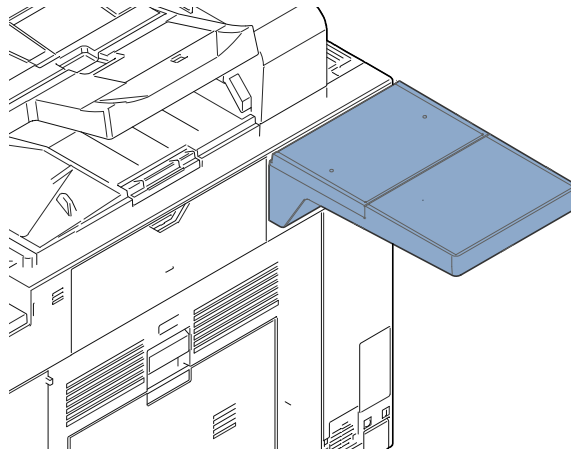


**8 Secure the PWB unit (b) with a screw (a) (M3x6).****9 Reattach IF lid (b) in the original position with one screw (a) (M3x8).**

- 10 Hang the below side of three hooks (a) and then hang the top side of hooks (b) by sliding in the direction of the arrow.
- 11 Reattach the left rear cover (d) in the original position with one screw (c) (M3×8).

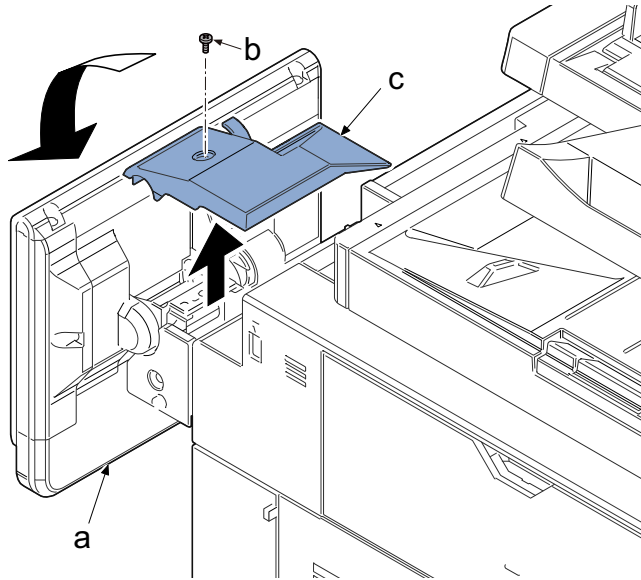


#### (4) Document table (DT-730 (B))

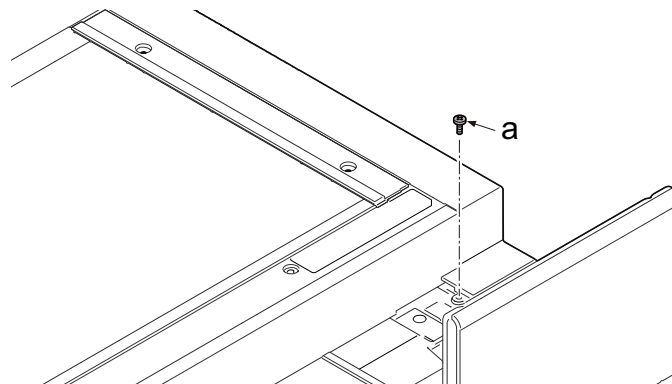


## Procedures

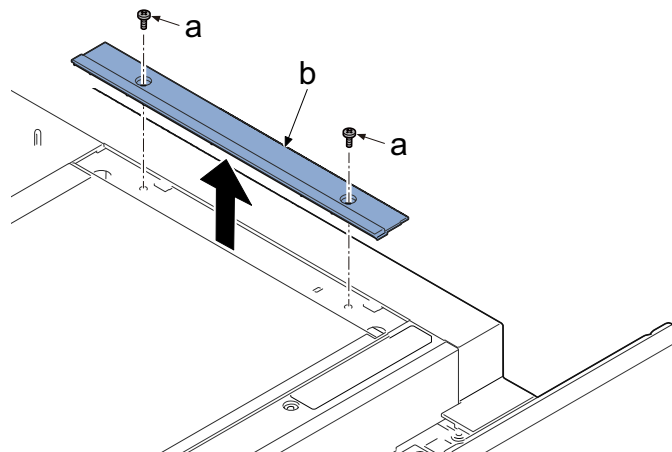
- 1 Turn the power switch off and disconnect the power plug.
- 2 Pull up the operation unit (a).
- 3 Remove one screw (b) (M3x8) and then remove the rear operation unit cover (c) in the direction of the arrow.



- 4 Remove one screw (a) (M4x8).

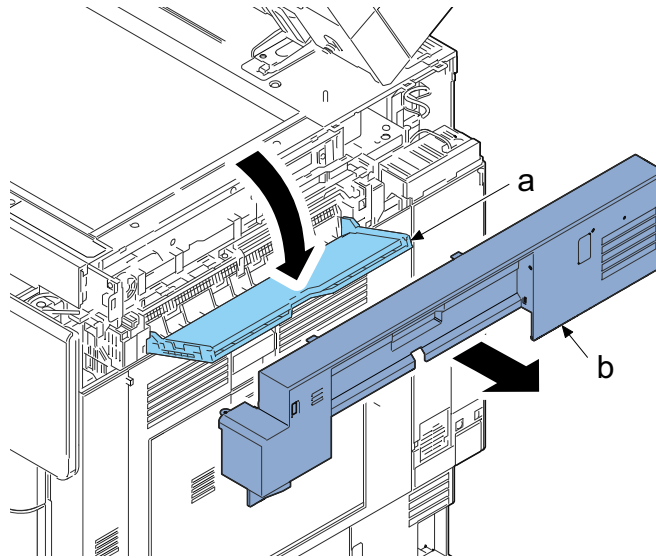


- 5 Remove two screws (a) (M4x8) and then detach the ISU right cover (b) in the direction of the arrow.

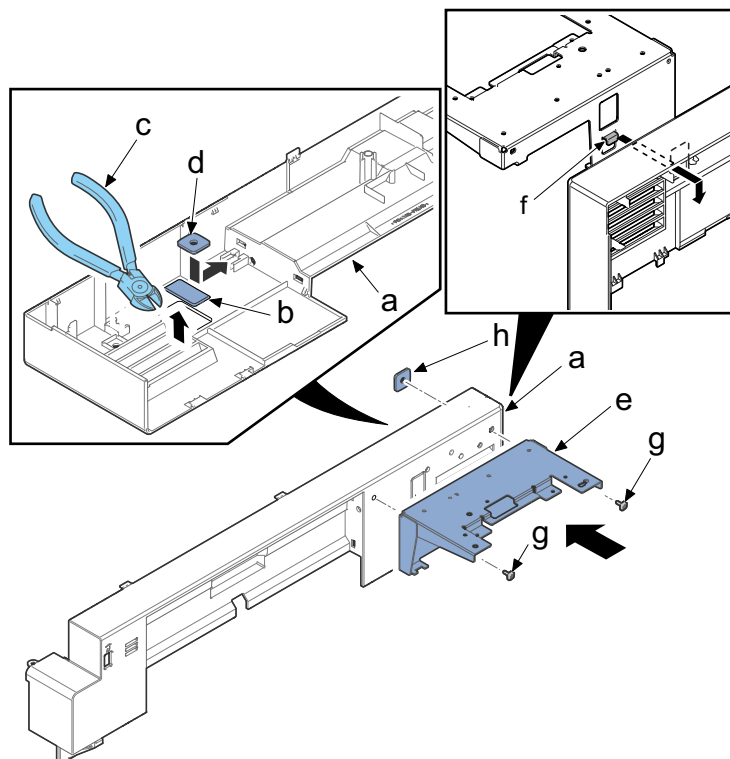




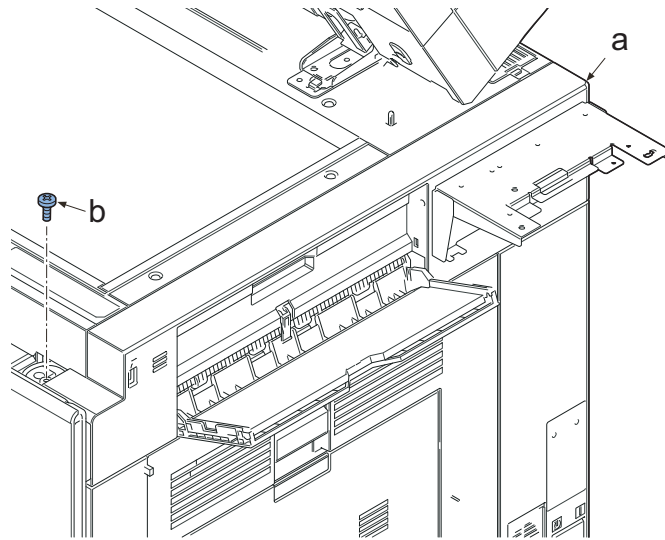
- 6 Open the right tray (a).
- 7 Detach the right upper cover (b).



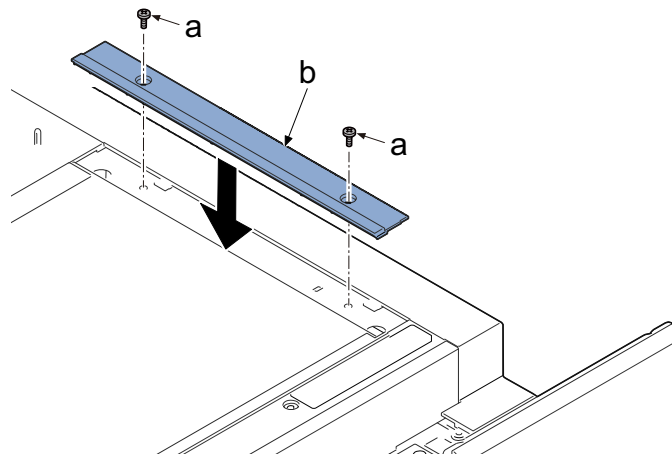
- 8 Cut the separator cover (b) of the right upper cover (a) with nippers (c) etc.
- 9 Insert one nut (d) in the back side of the right upper cover (a).
- 10 Hang the hook (f) of the tray stay (e) on the aperture.
- 11 Attach the tray stay (e) to the right upper cover (a) with one screw (g) (M4×14).
- 12 While pressing the rear side of nuts (h), fasten the screw not to fall it.



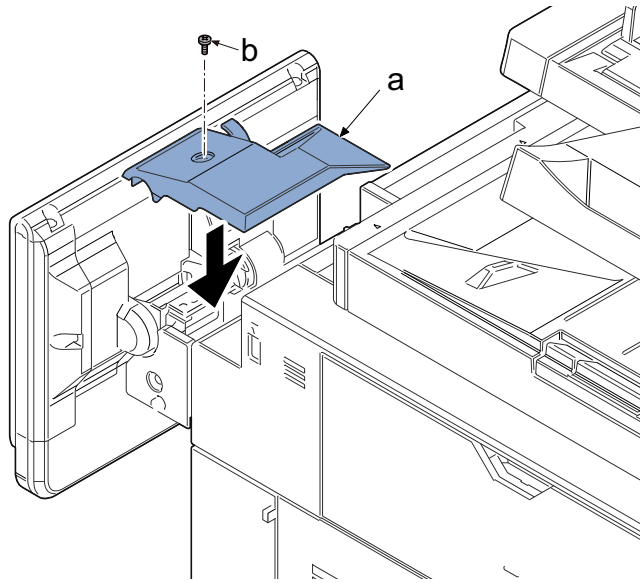
- 13** Reattach the right upper cover (a) to the main unit in the original position, fasten with one screw (b) (M4×8).



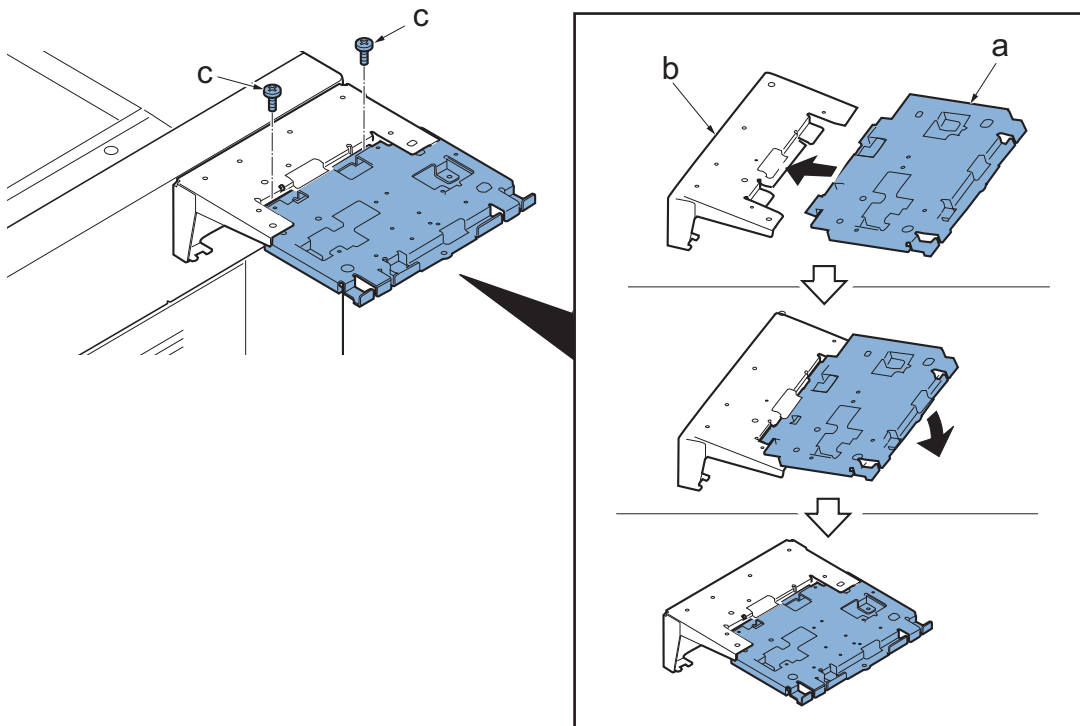
- 14** Reattach the ISU right cover (b) to the direction of the arrow in the original position with two screws (a) (M4×8).



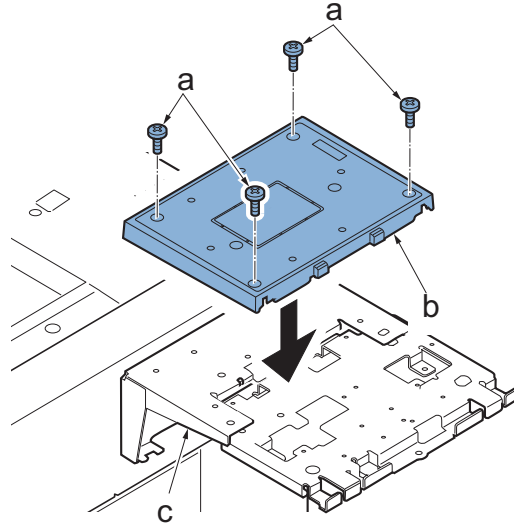
- 15** Reattach the rear operation cover (a) to the direction of the arrow in the original position with one screw (b) (M3×8).



- 16** Insert the mounting plate (a) into the tray stay (B) and secure it with two screws (C) (M4×8).

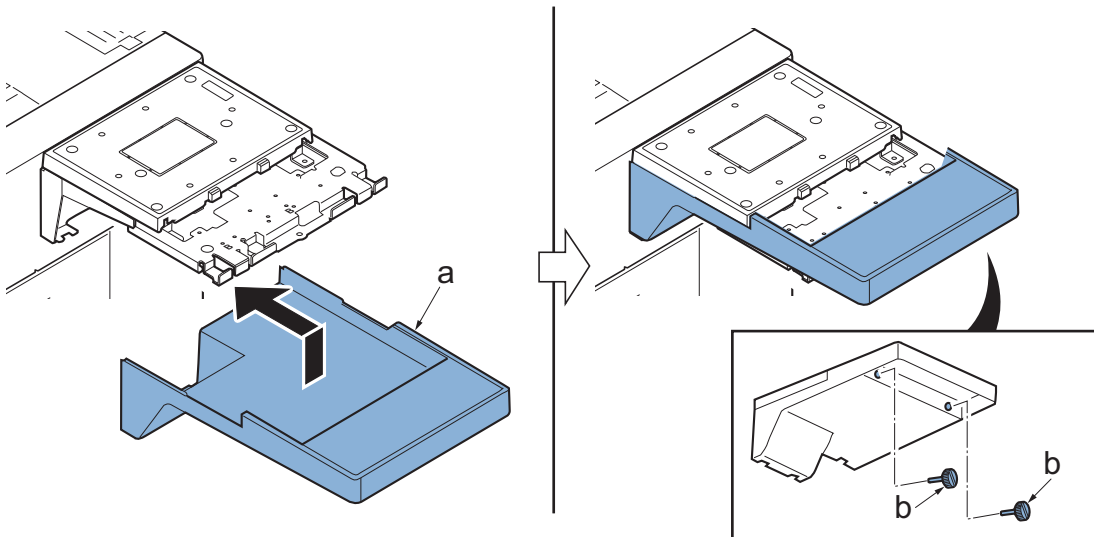


**17 Attach the tray cover (b) to the tray stay (c) with four screws (a) (M4×8).**

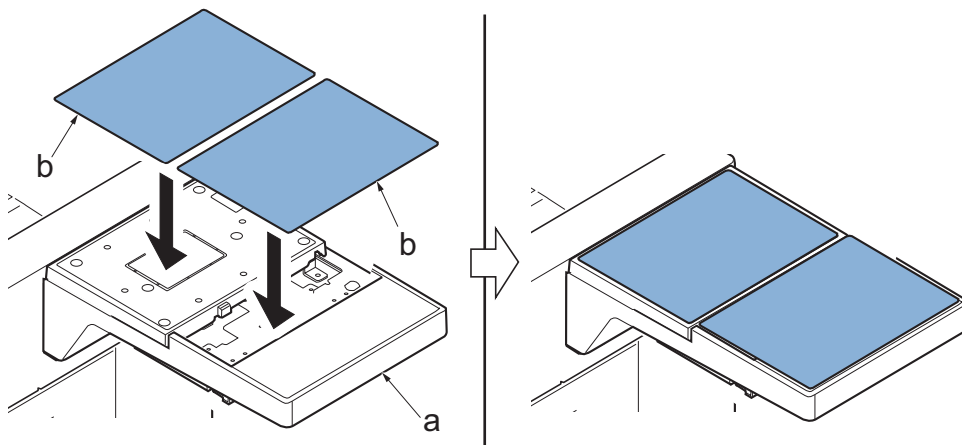


**18 Attach the tray lower cover (a).**

**19 Secure the tray lower cover (a) by two pins (b).**



**20 Affix the two sheet (b) on the document table (a).**



## (5) Numeric keypad (NK-7120 / NK-7130)

### Numeric keypad installation requires the following parts.

Numeric keypad 1 pc

NK-7120 (1903T00UN0):100V/220 to 240V model

NK-7130 (1903T00US0):120V model

### Bundled parts of numeric keypad NK-7120/NK-7130

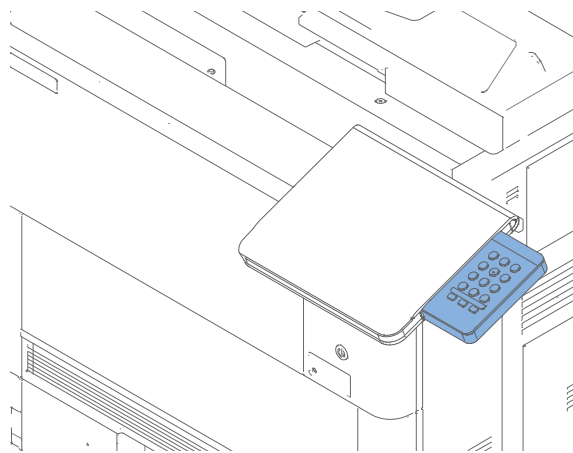
Numeric Keypad 1 pc

Numeric Keypad cover 1 pc

Screw (M3x8) 2 pcs

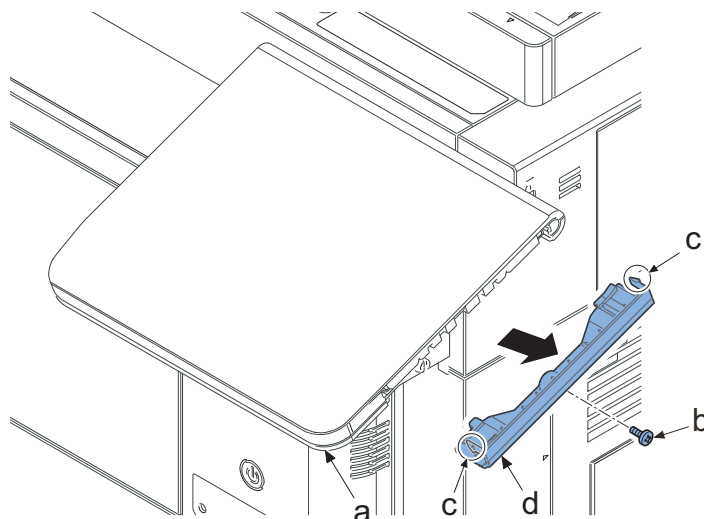
Label 2 pc (NK-7120)

Label 1 pc (NK-7130)

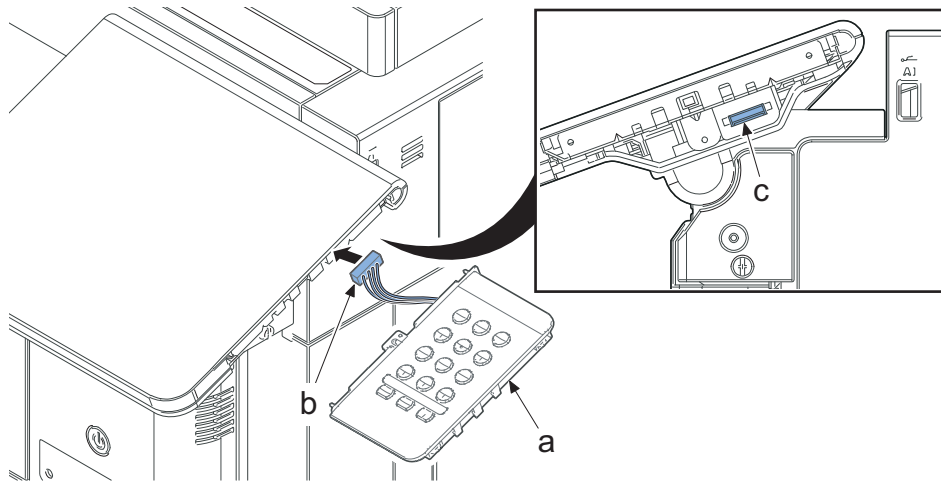


### Procedures

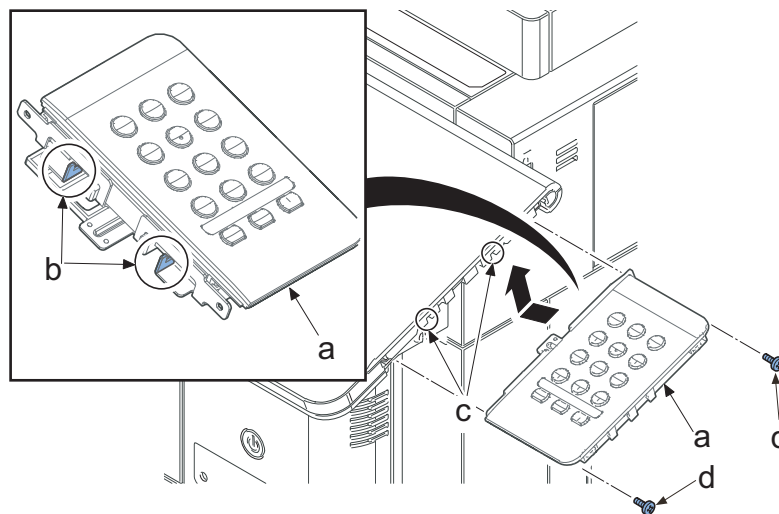
- 1 Turn the power switch off and disconnect the power plug.
- 2 Remove the screw (b) (M3x8) from the operation unit (a).
- 3 Release two hooks (c), and then remove the operation unit lid (d) in the direction of the arrow.



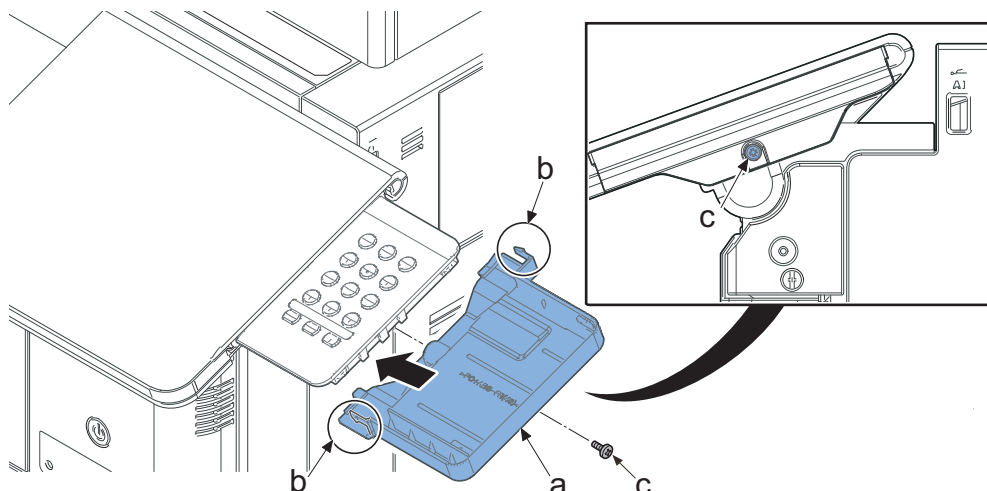
- 4** Connect the connector (b) of the numeric keypad (a) to the connector (c) of the operation unit



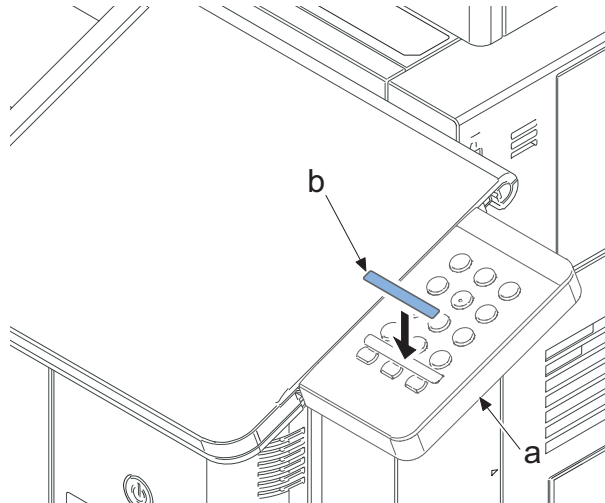
- 5** Latch two hooks (b) on the cut-out (c) of the operation unit, and then attach the numeric keypad (a) with two screws (d) (M3x8).



- 6** Slid the cover (a) in the direction of the arrow and latch two hooks (b), and secure the screw (c) (M3x8) once removed in step 2.



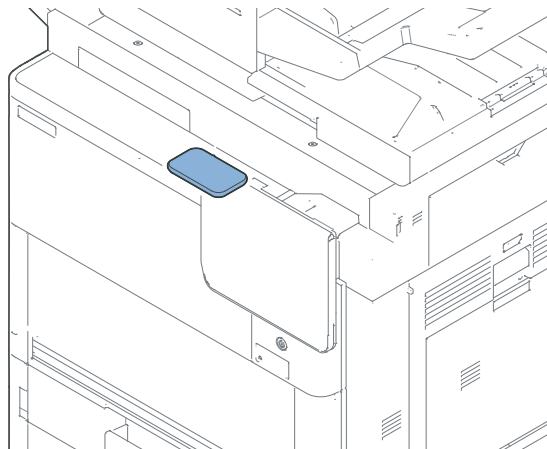
**7 Affix the label (b) on the numeric keypad (a). (Except 120v model)**



**(6) IC card reader**

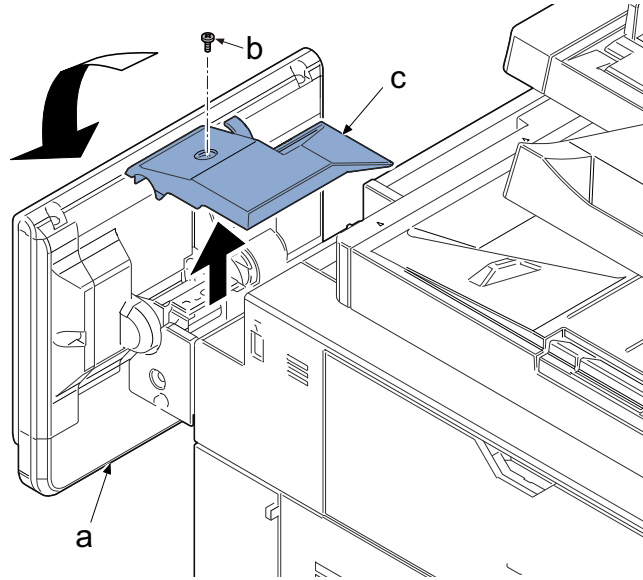
**IC card reader installation requires the following parts.**

IC card reader 1 pc

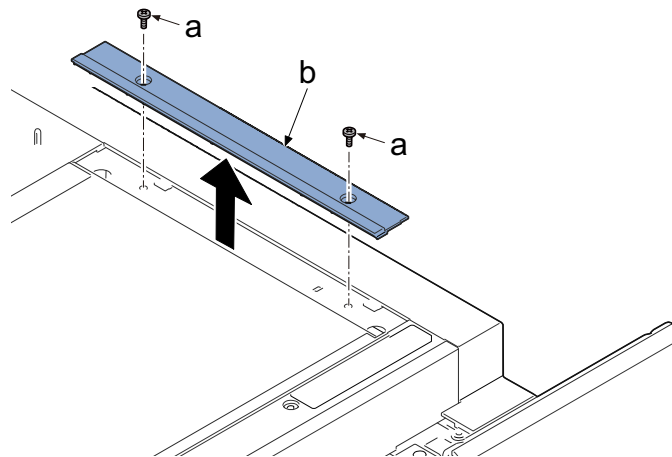


## Procedures

- 1 Turn the power switch off and disconnect the power plug.
- 2 Pull up the operation unit (a).
- 3 When the operation unit attaches to the left side, put the right aside.
- 4 Remove one screw (b) (M3x8) and then remove the rear operation unit cover (c) in the direction of the arrow.

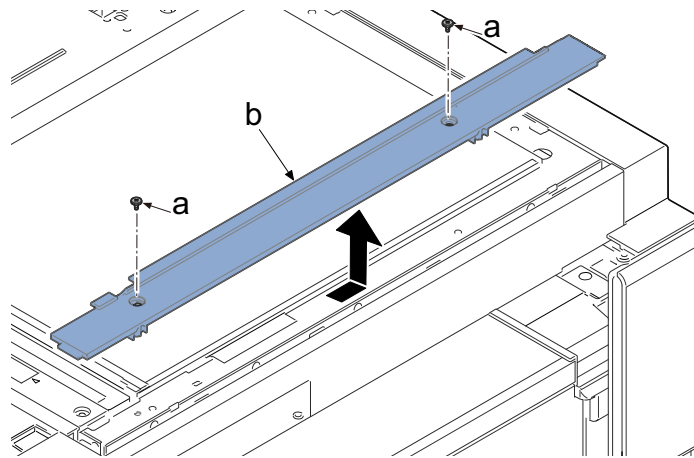


- 5 Open the document processor.
- 6 Remove two screws (a) (M4x8) and then detach the ISU right cover (b) in the direction of the arrow.

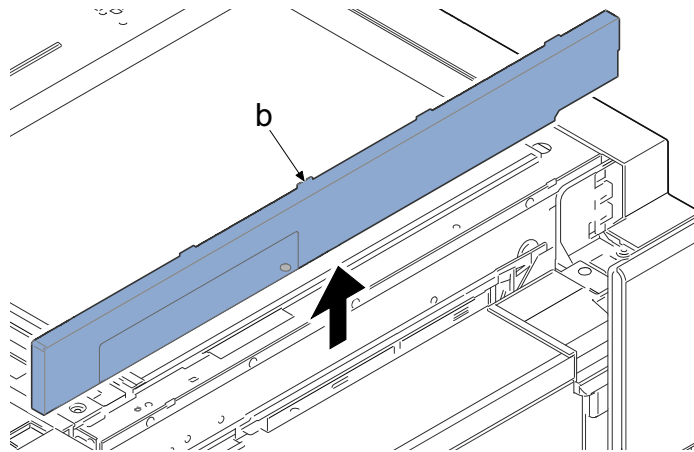




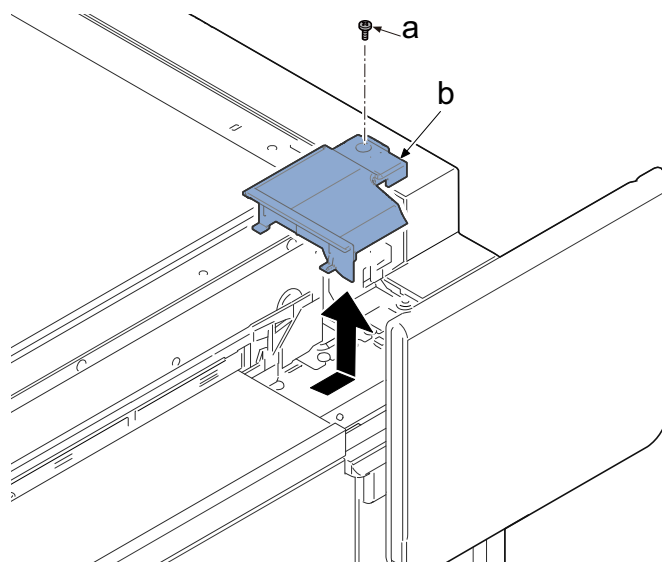
- 7** Remove two pins (a) (M4x6) and then remove the glass front cover (b) by sliding in the direction of the arrow.



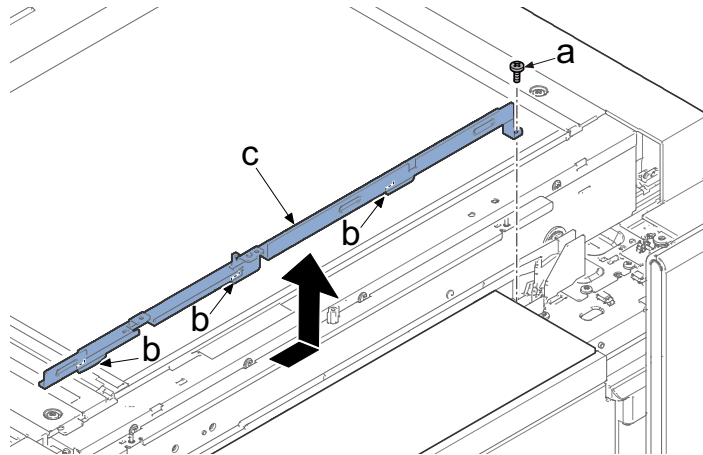
- 8** Remove the ISU front cover (b) in the direction of the arrow.



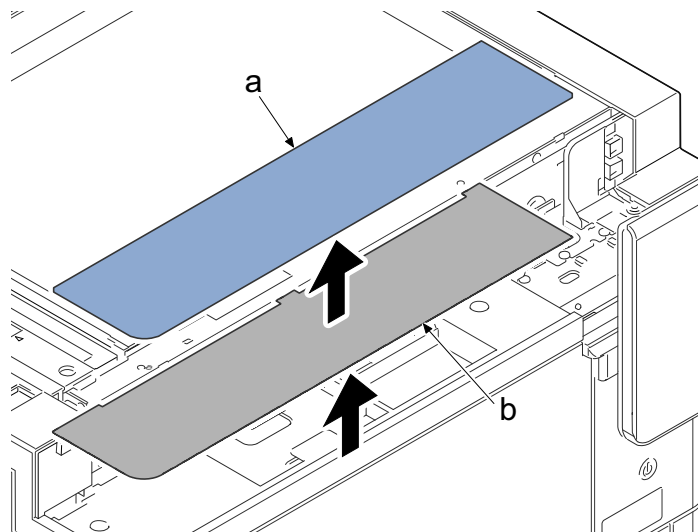
- 9** Remove one screw (a) (M3x8) and then remove the rear operation unit cover B (b) by sliding in the direction of the arrow.



- 10** Remove one screw (a) (M4x8), slide the fixed glass plate (c) in the direction of the arrow, remove the hook and then detach it

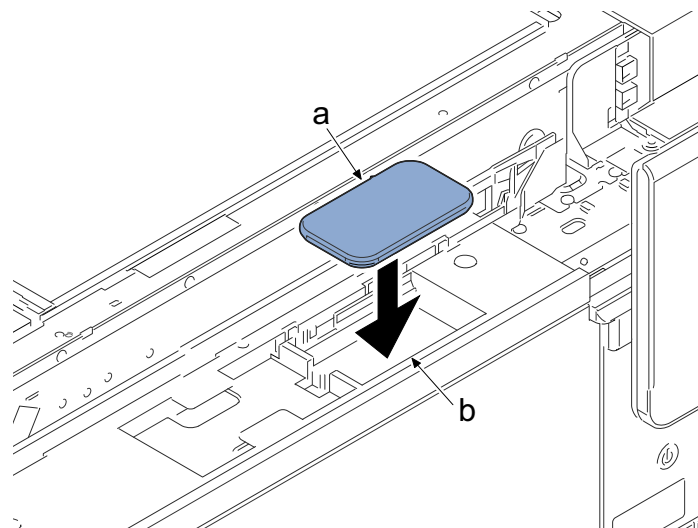


- 11** Remove the table glass (a) and sheet (b).



- 12** Insert IC card reader (a) into the main unit holder (b).

Differ the size by IC card reader.



**NOTE**

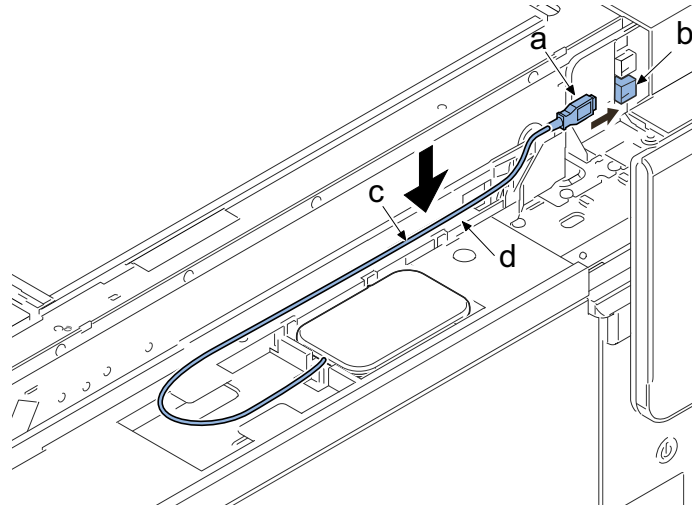
When the outline of IC card reader is smaller than the holder, the receiving parts are positioned in a sheet marking position.

(When it needs to fix, fix with the dual tape etc.)

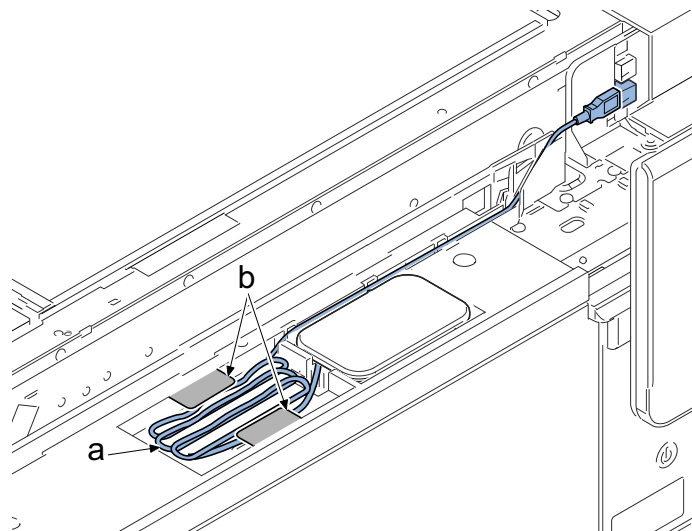
When the thickness of IC card reader is thin and there is far from the table glass, insert the spacer between the holder and then adjust the height (The space is to 5mm extent.)

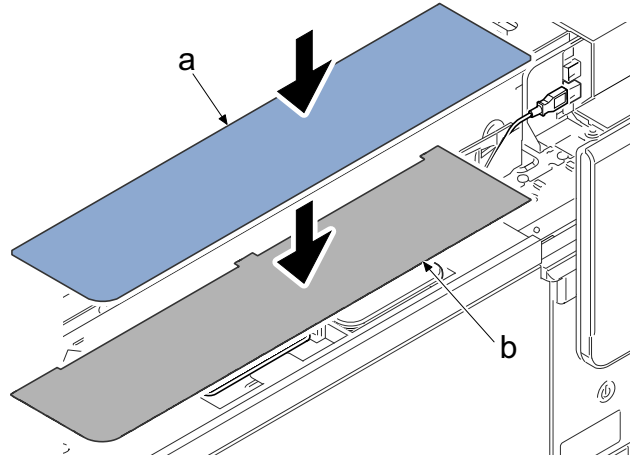
**13** Connect the USB connector (a) to the USB interface slot (b).

**14** Insert the USB cable (c) into the wire guide (d).

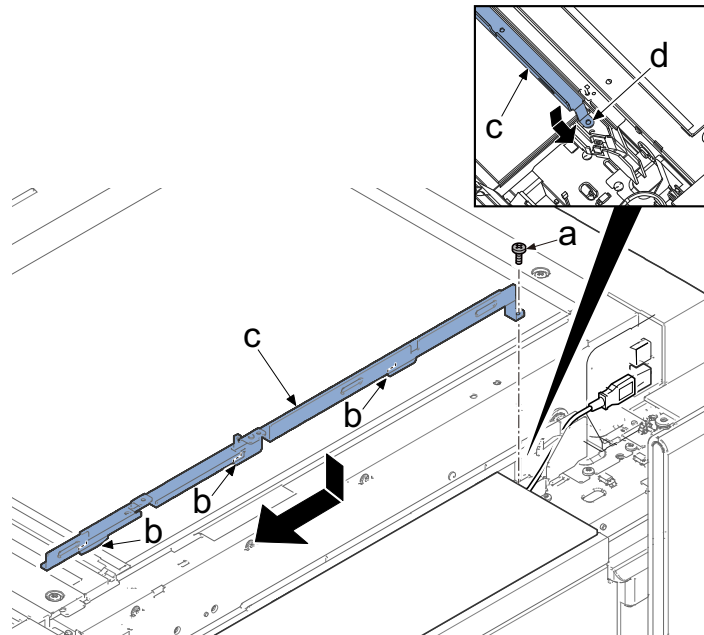


**15** Bundle the surplus length of the cable (a) and hook it on the hook (b) of the main unit.

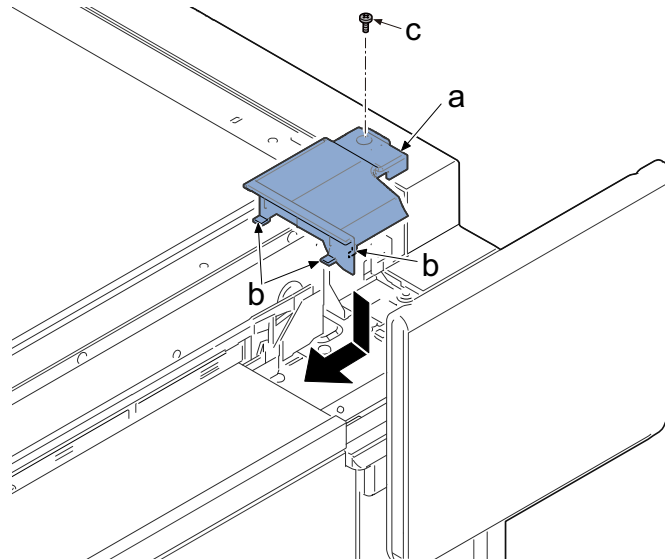


**16 Reattach the table glass (a) and sheet (b) in the original position.****17 Hang three hooks (b) by sliding the fixed glass plate (c) in the direction of the arrow, reattach one screw (a) (M4×8) in the original position.**

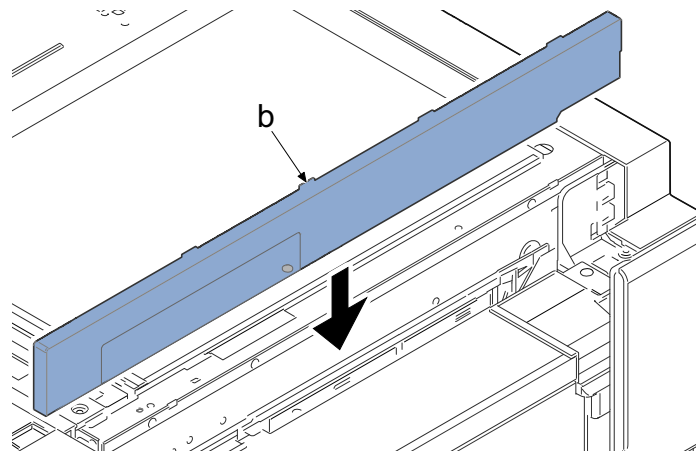
Insert the right side under the wire guide (d) in advance.



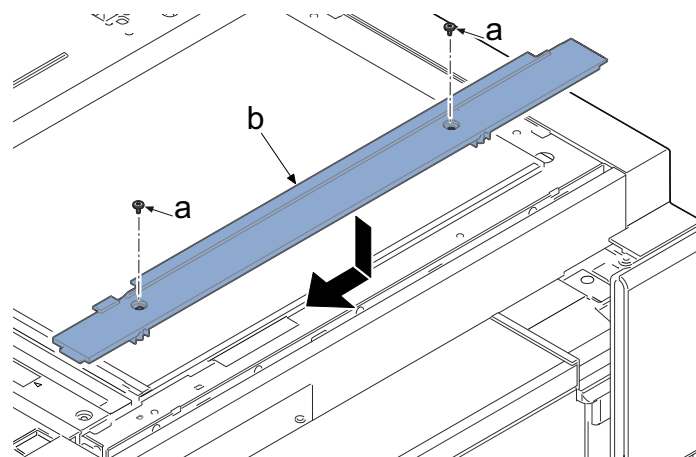
- 18** Hang three hooks (b) by sliding the operation rear cover B (a) in the direction of the arrow, reattach one screw (c) (M3×8) in the original position.



- 19** Reattach the ISU front cover (b) in the direction of the arrow.

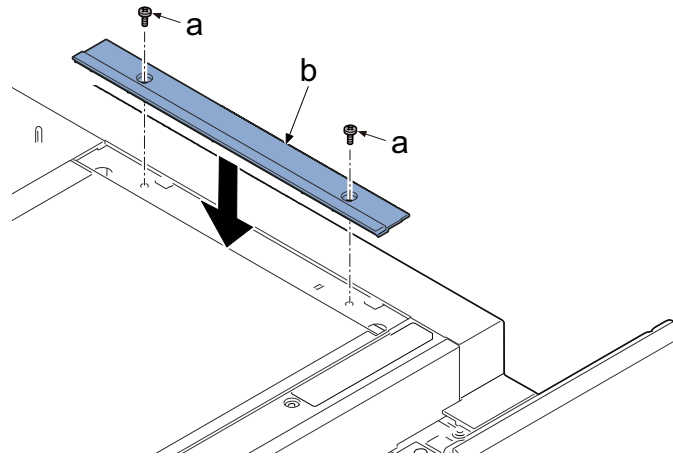


- 20** Slide the glass front cover (b) in the direction of the arrow and then reattach two screws (a) (M4×6) in the original position.



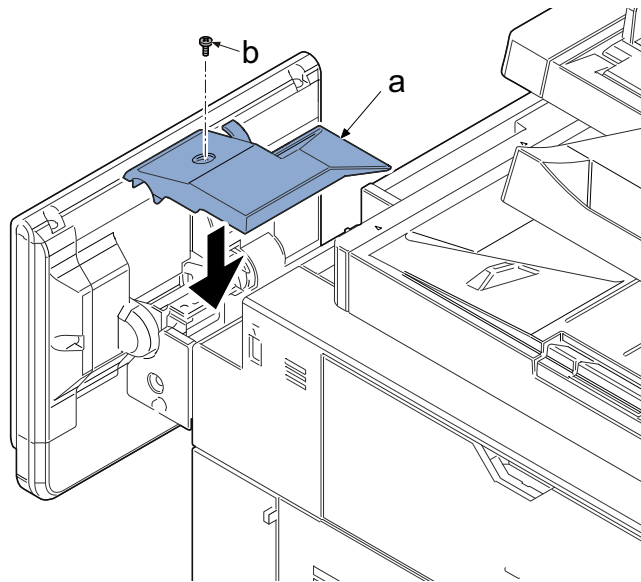
**21** Reattach the ISU right cover (b) to the direction of the arrow in the original position with two screws (a) (M4×8).

**22** Close the document processor



**23** Reattach the rear operation cover (a) to the direction of the arrow in the original position with one screw (b) (M3×8).

When the operation unit is set at the left side, it is moved at the right side.



### Activating Card Authentication

To install the optional function, you need the License Key. Please access the designated website of your dealer or service representative, and register the "Machine No." indicated on your machine and the "Product ID" indicated on the License Certificate supplied with the product to issue the License Key.

Refer to [2-4 Optional Application] when starting the trial. (See [page 2-143](#) )

### (7) USB keyboard (120V /220 to 240V model only)

**USB keyboard installation requires the following parts:**

Keyboard holder 10 (1709AN0UN0)1 pc

USB Keyboard1 pc

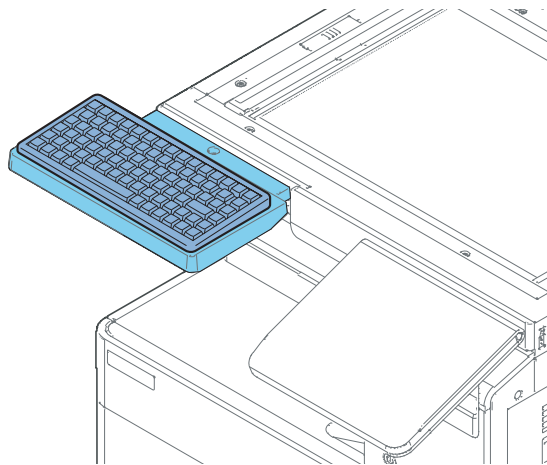
#### Bundled parts of Keyboard holder 10 (1709AN0UN0)

Upper keyboard mounting bracket 1 pc

Lower keyboard mounting bracket 1 pc

Upper keyboard cover 1 pc  
Lower keyboard cover 1 pc  
Upper lid\*1 1 pc  
Lower lid\*1 1 pc  
Hook-and-loop fastener 2 pairs  
Binding band 1 pc  
Screws (M3x8 S-tite) 6 pcs  
Screws (M3x8 S-tite Black)\*1 2 pcs  
Screws (M3x8 P-tite) 2 pcs  
Screws (M4x8 S-tite) \*1 4 pcs  
Screws (M4x14 S-tite)\*1 2 pcs

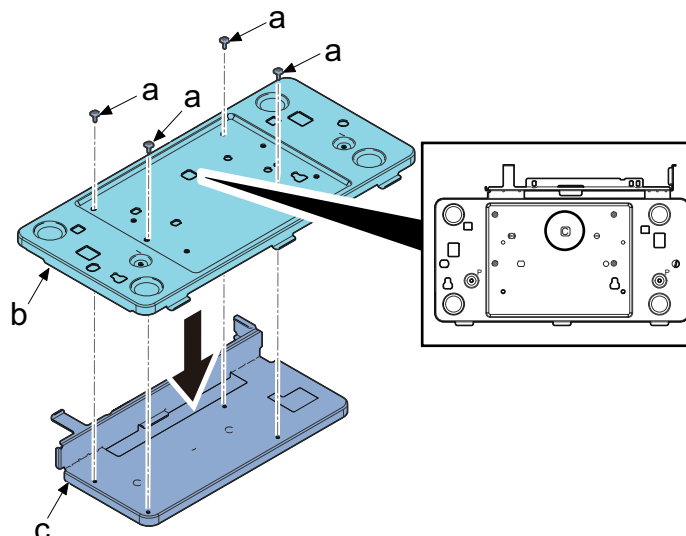
\*1: Not used in this model.



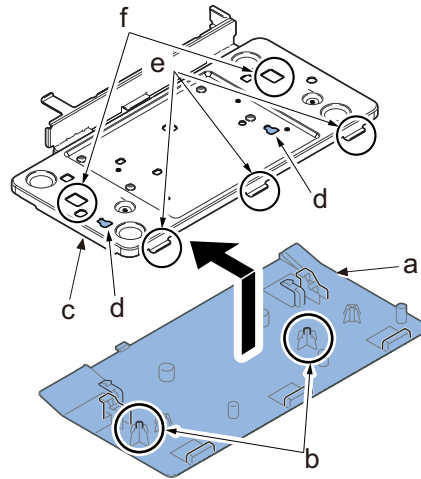
## Procedures

- 1 Turn the power switch off and disconnect the power plug.
- 2 Fix the upper keyboard mounting bracket (b) onto the lower keyboard mounting bracket (c) with the four screws (a) (M3x8).

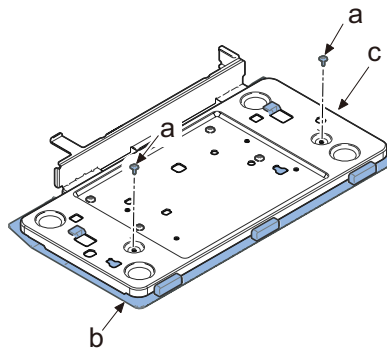
Match at the mark C position and then attach.



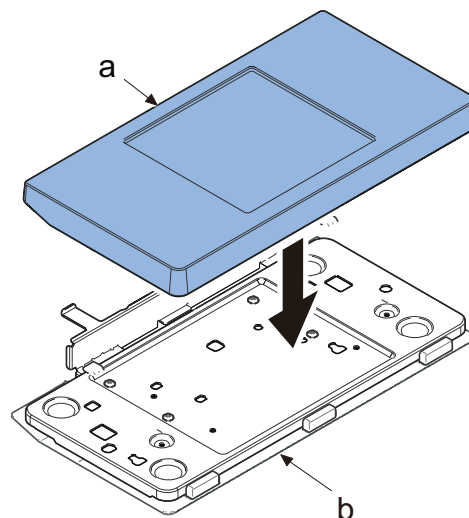
- 3 Insert two positioning pins (b) of lower keyboard cover (a) into the holes (d) of the upper keyboard mounting plate (c) and slide it in the direction of the arrow.
- 4 Insert the lower keyboard cover (a) into three hooks (e) on the keyboard mounting plate (c) and two cutouts (f).



- 5 Fix the lower keyboard mounting bracket (b) onto the upper keyboard mounting bracket (c) with two screws (a) (M3x8 P-tite).



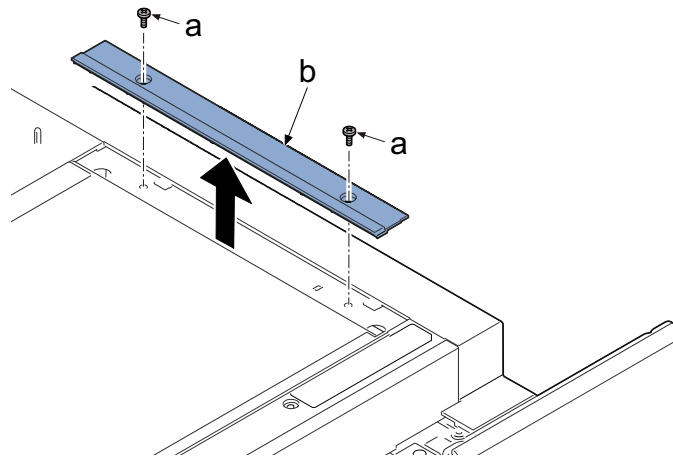
- 6 Insert the upper keyboard cover (a) into the upper keyboard mounting plate (b) to attach it.



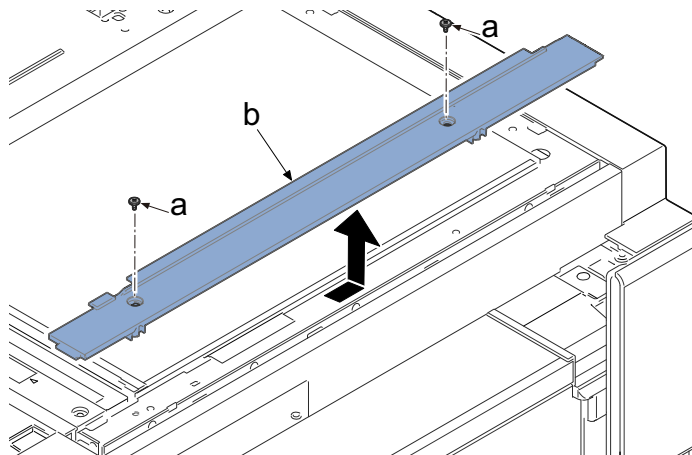


**7** Open the document processor.

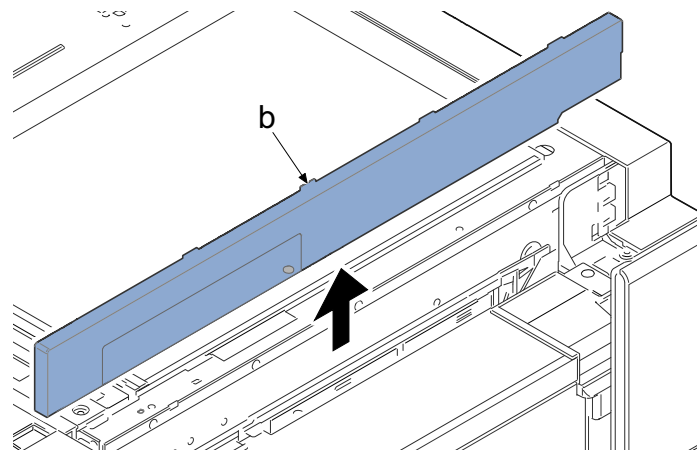
**8** Remove two screws (a) (M4x8) and then detach the ISU right cover (b) in the direction of the arrow.



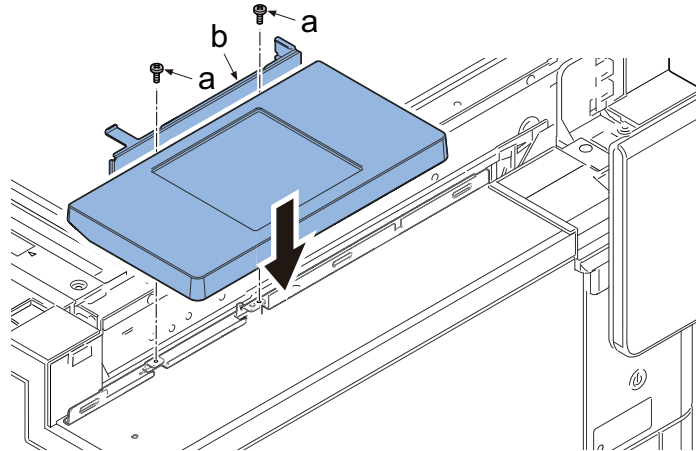
**9** Remove two pins (a) (M4x6) and then detach the glass front cover (b) by sliding in the direction of the arrow.



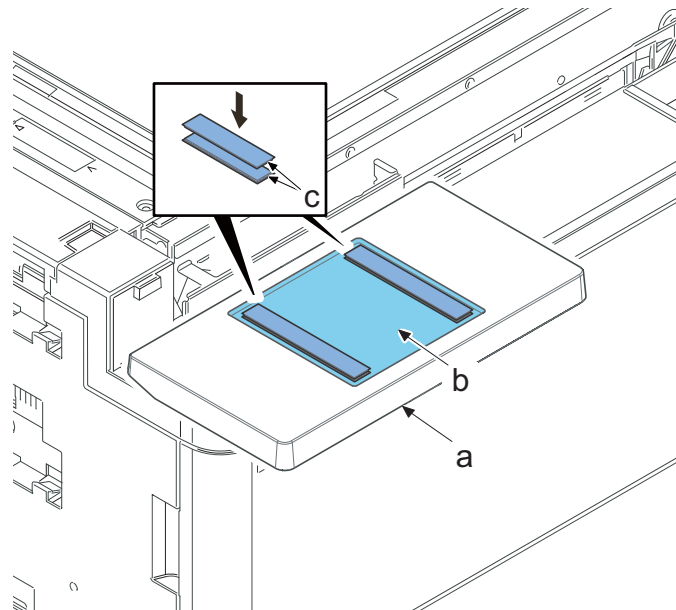
**10** Remove the ISU front cover (b) in the direction of the arrow.



- 11** Reattach the lower keyboard mounting plate (b) with two screws (a) (M3x8).

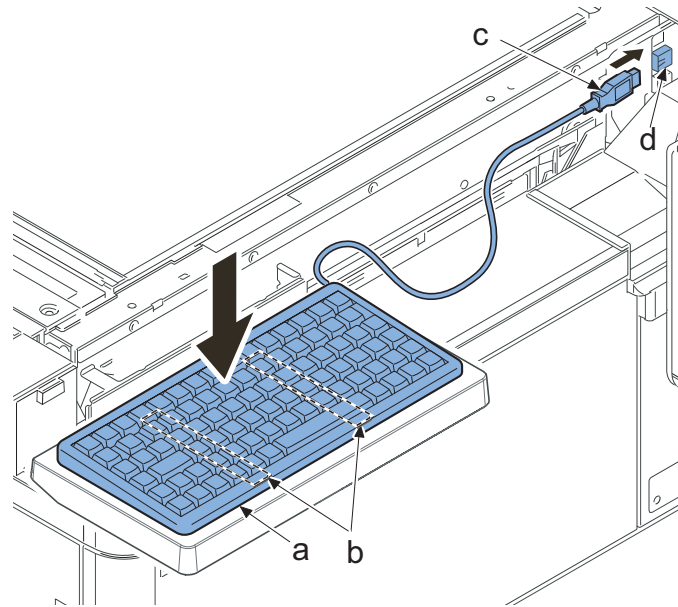


- 12** Affix a pair of hook-and-loop fasteners (c) to the concave (b) of the upper keyboard cover (a).

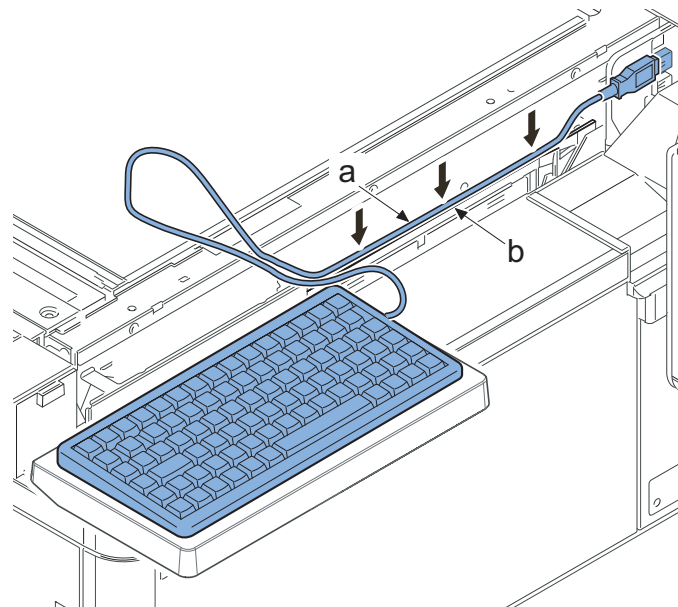


**13** Place the keyboard (a) on the hook-and-loop fastener (b) and press it to fix.

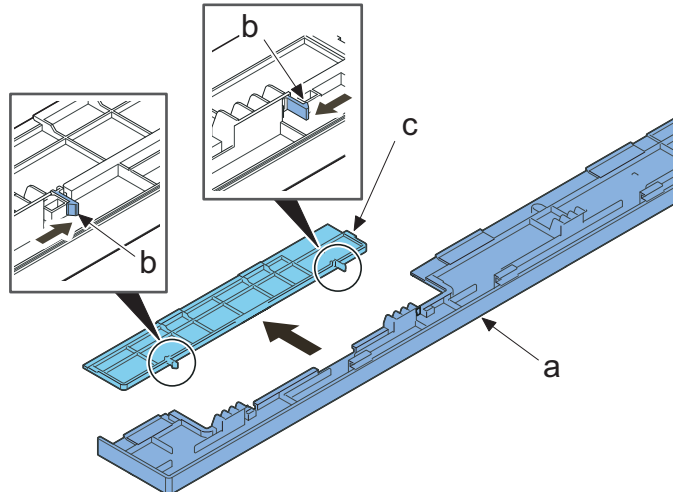
**14** Connect the USB cable (c) with the USB connector (d) on the main unit.



**15** Insert the USB cable (a) into the cable guide (b).

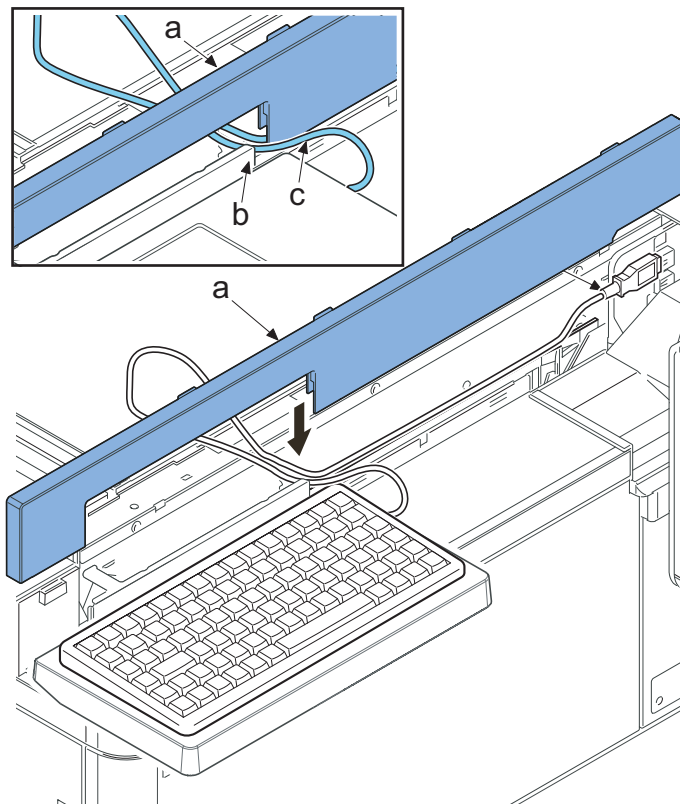


- 16** Release two hooks (b) of the lid (c) from the ISU front cover (a) and then detach them.



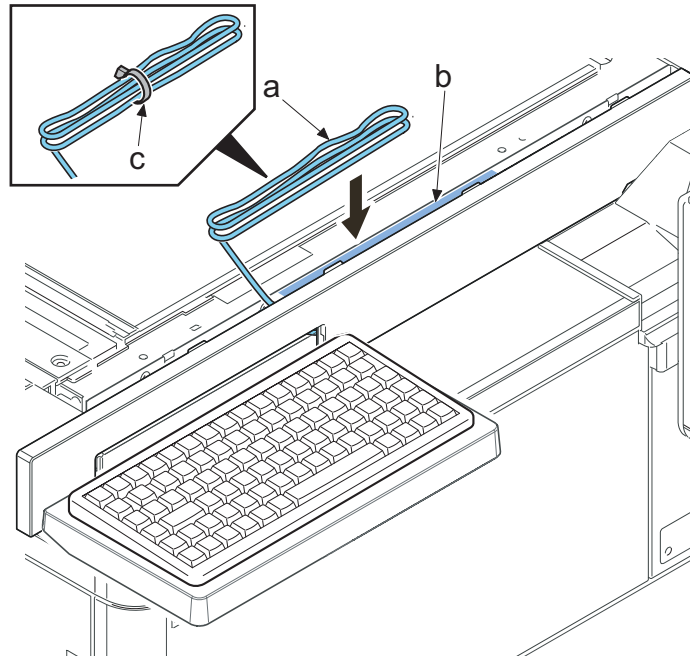
- 17** Reattach the ISU front cover (a) in the original position.

USB keyboard cable (c) passes through the space between ISU front cover (a) and the lower keyboard mounting plate (b).

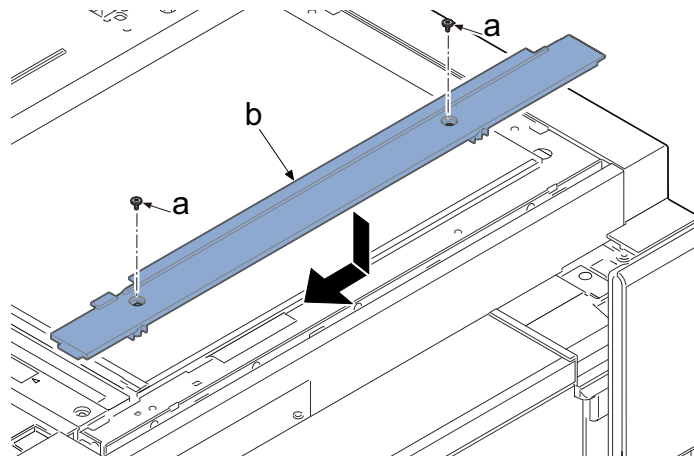


- 18** Bundle the left cable (a) and then insert the space (b) between the main frame and ISU front cover.

Use the bundled cable ties (c) if necessary when tying cables.

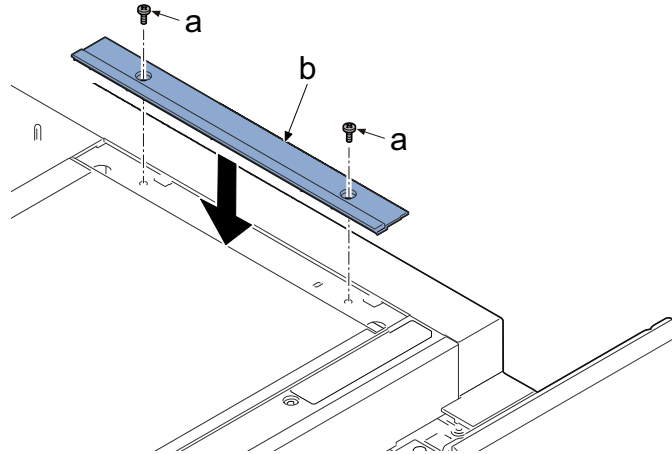


- 19** Slide the glass front cover (b) in the direction of the arrow and then reattach two pins (a) (M4×6) in the original position.



**20** Reattach the ISU right cover (b) to the direction of the arrow in the original position with two screws (a) (M4×8).

**21** Close the document processor.



### (8) Handset (100V model only)

#### (8-1) When attaching the main unit directly

**Handset installation requires the following parts:**

Handset (1909AG9JP0) 1 pc

#### **Bundled parts of handset (1909AC9JP0)**

Handset 1 pc

Handset holder 1 pc

Handset mounting plate 1pc

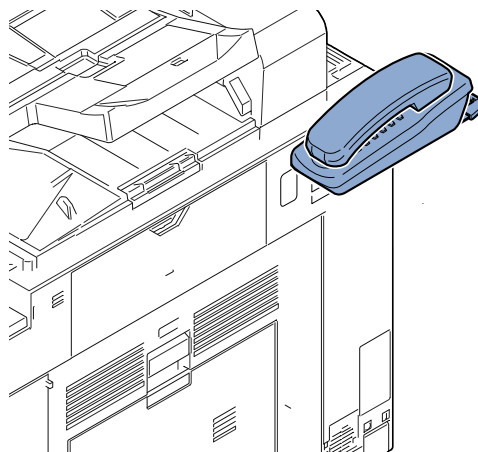
Protection cover 1 pc

Pin 2 pcs

Telephone wire 1 pc

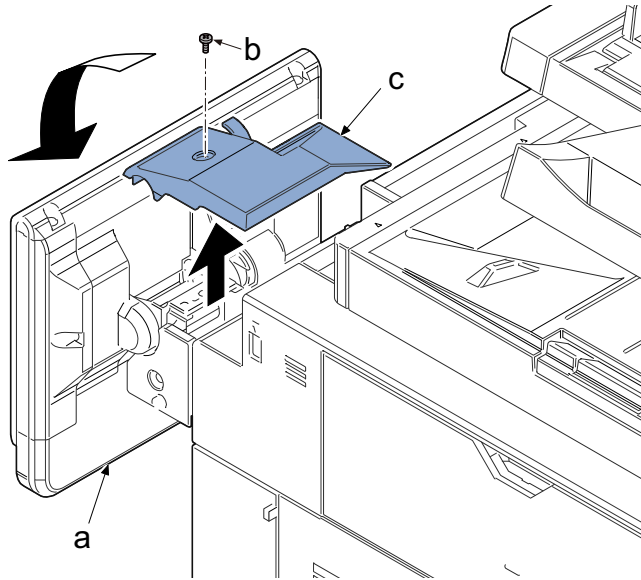
Modular cord 1 pc

Nut M4 2 pcs

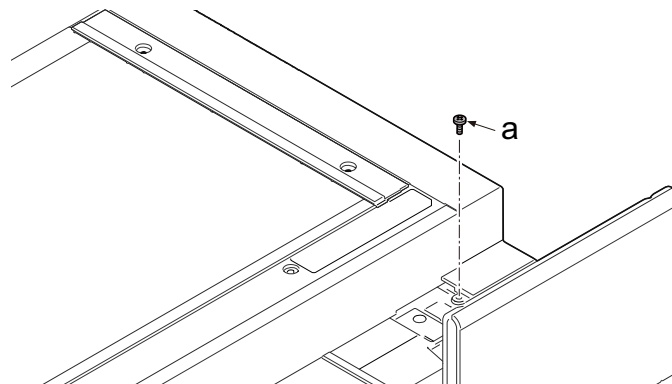


## Procedures

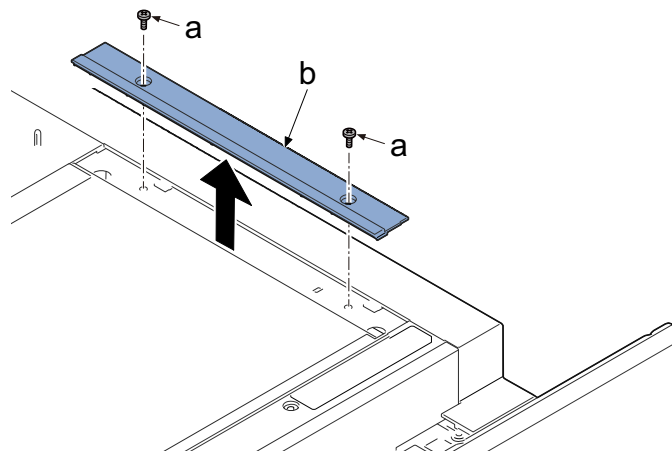
- 1 Turn the power switch off and disconnect the power plug.
- 2 Pull up the operation unit (a).
- 3 Remove one screw (b) (M3x8) and then remove the rear operation unit cover (c) in the direction of the arrow.



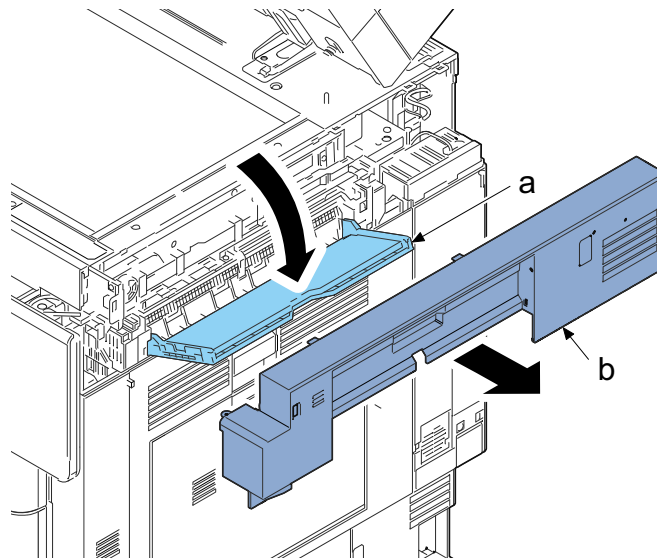
- 4 Remove one screw (a) (M4x8).



- 5 Remove two screws (a) (M4x8) and then detach the ISU right cover (b) in the direction of the arrow.

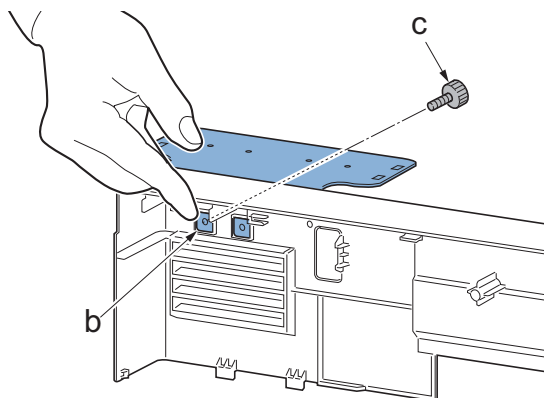
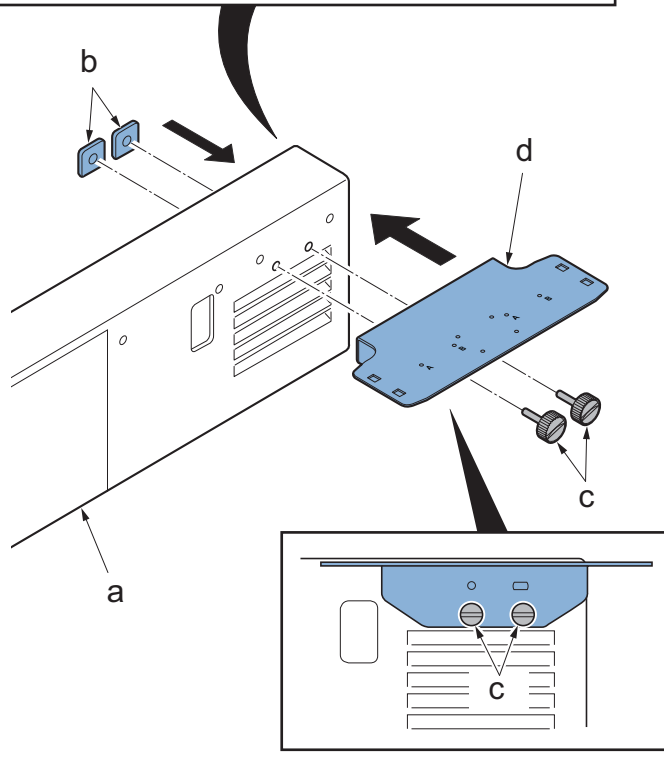
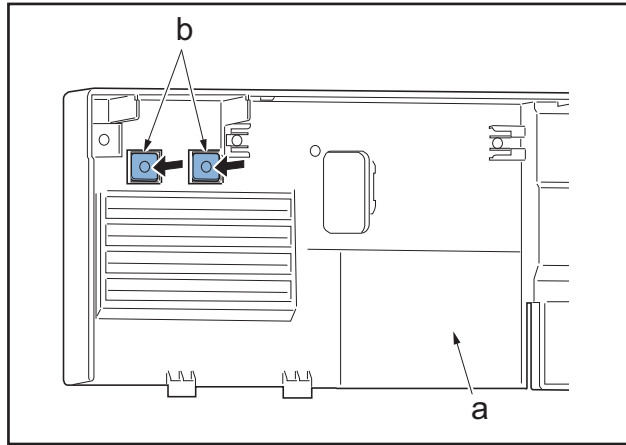


- 6 Open the right tray (a).
- 7 Detach the right upper cover (b).

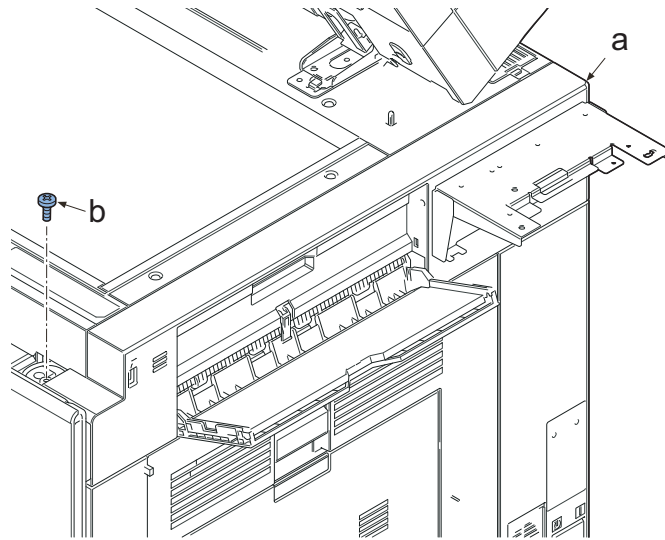


- 8 Insert two nuts (b) in the back side of the right upper cover (a).
- 9 Attach the handset mounting plate (d) to the right upper cover (a) with two screws (c).  
The lower side of screw hole is used.  
While pressing the nuts (e), fasten the screw (c) not to fall them.

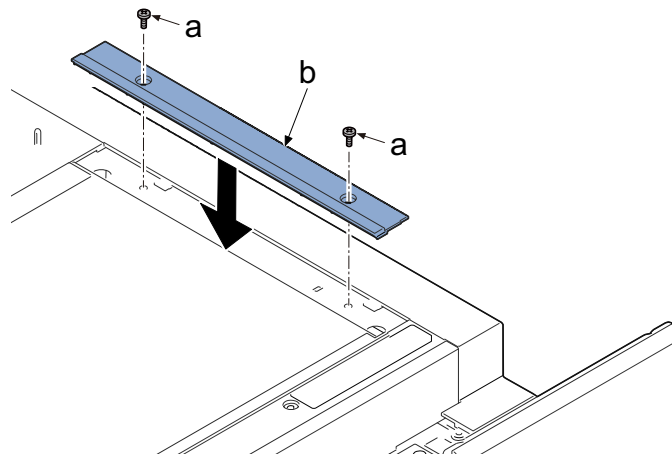




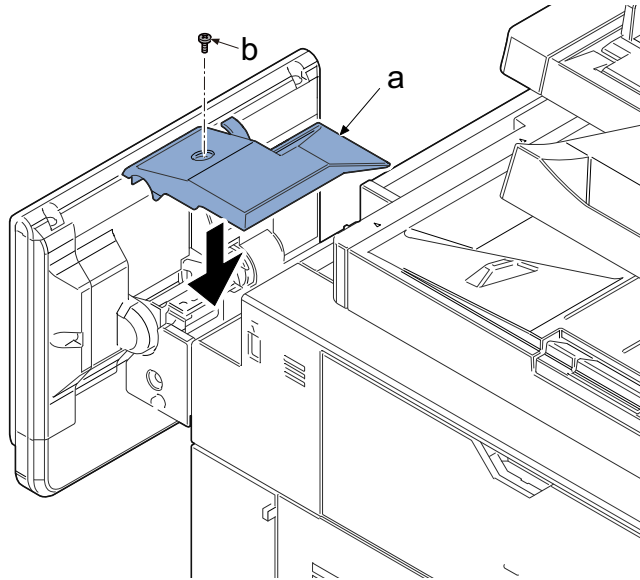
- 10** Reattach the right upper cover (a) to the main unit in the original position, fasten with one screw (b) (M4×8).



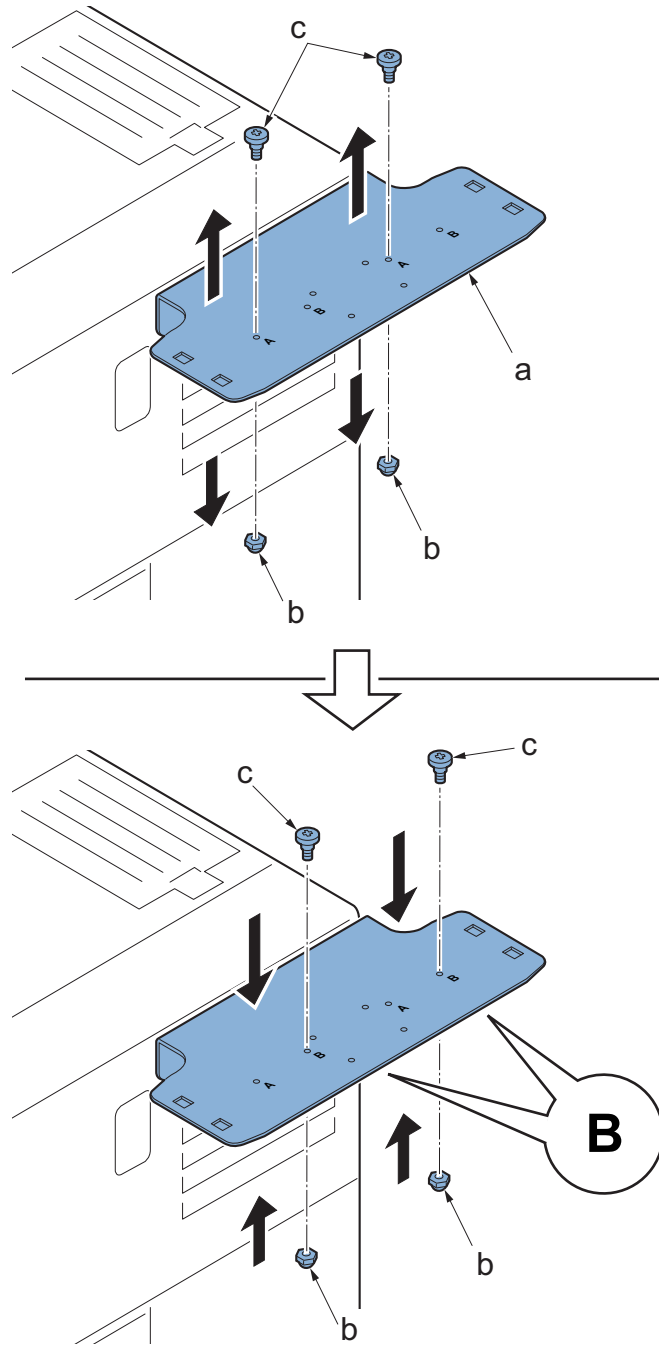
- 11** Reattach the ISU right cover (b) to the direction of the arrow in the original position with two screws (a) (M4×8).



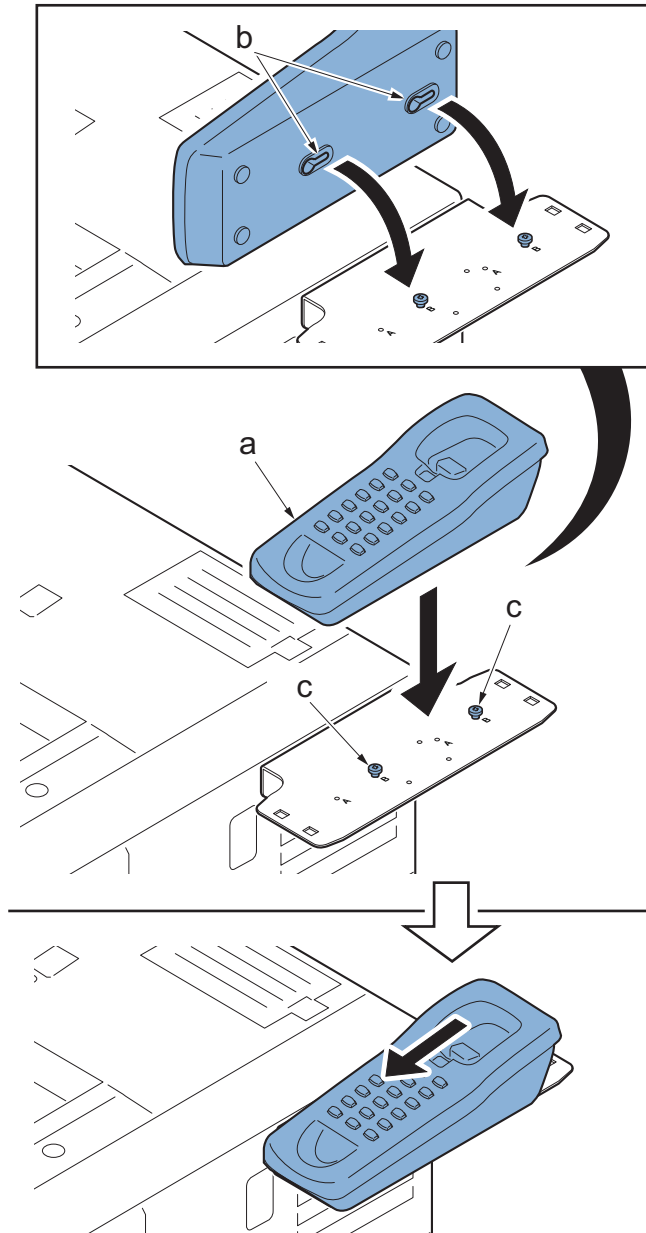
- 12** Reattach the rear operation cover (a) to the direction of the arrow in the original position with one screw (b) (M3×8).

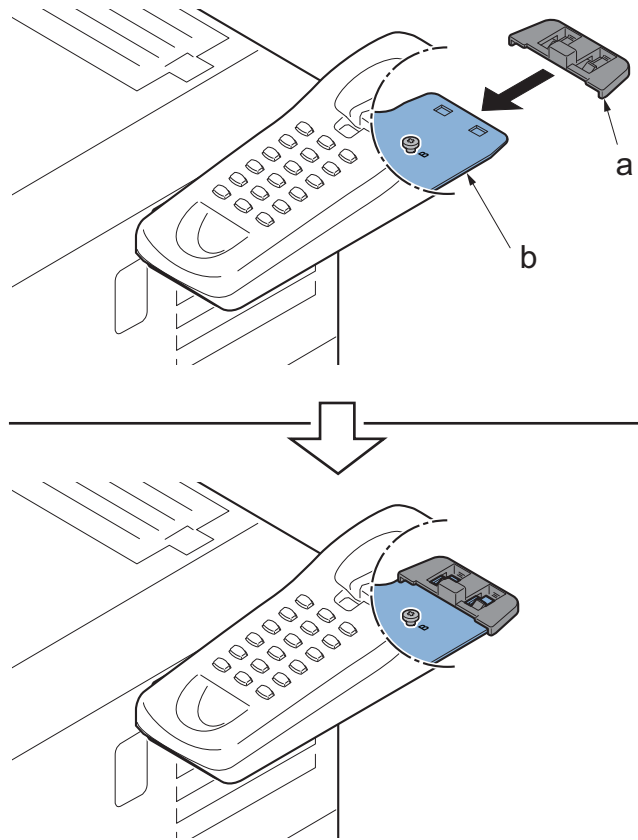
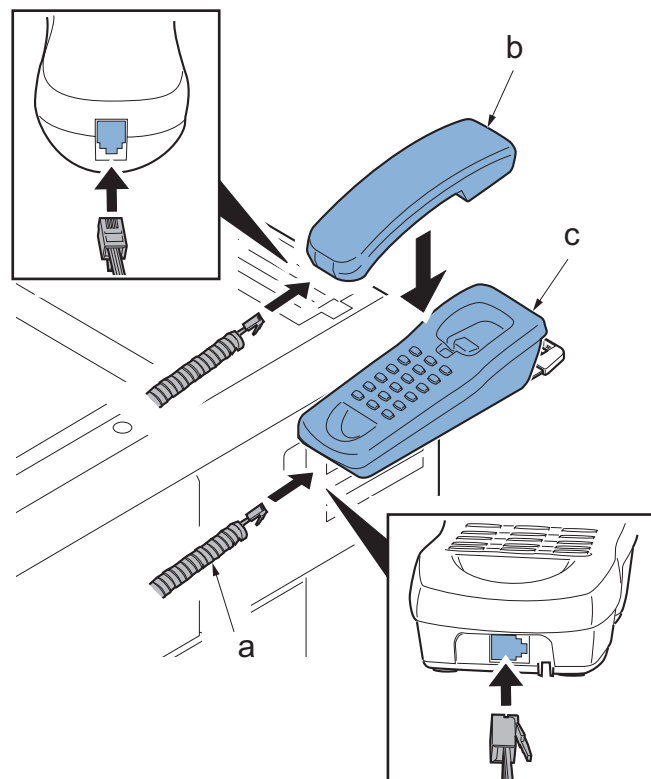


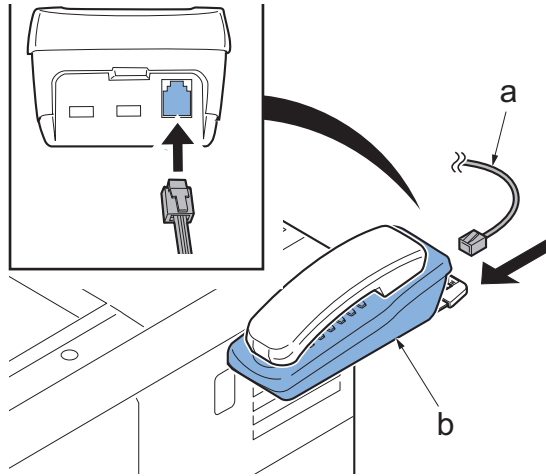
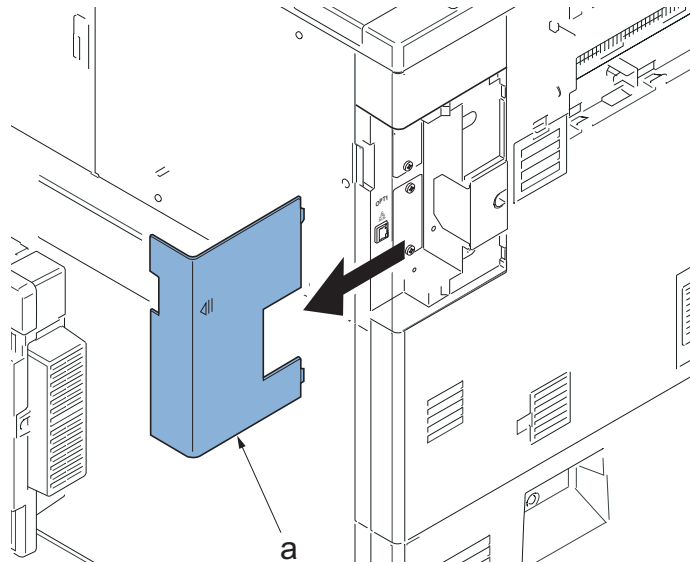
- 13** Remove two nuts (b) and two screws (c) from the handset mounting plate (a), attach the marking B position.



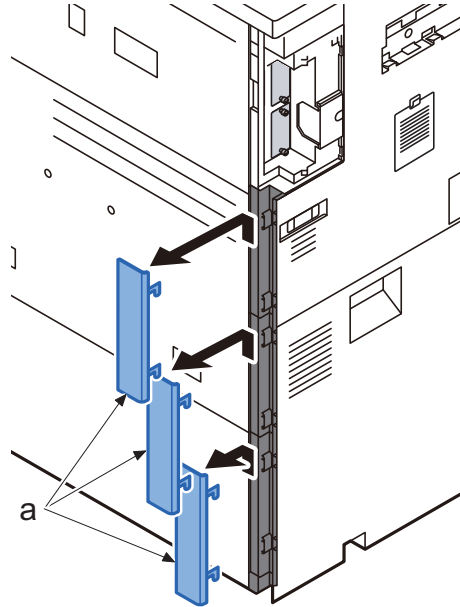
- 14** Put the screws (c) at the backside built-in part (b) of the handset holder (b) and slide it toward you to secure it.



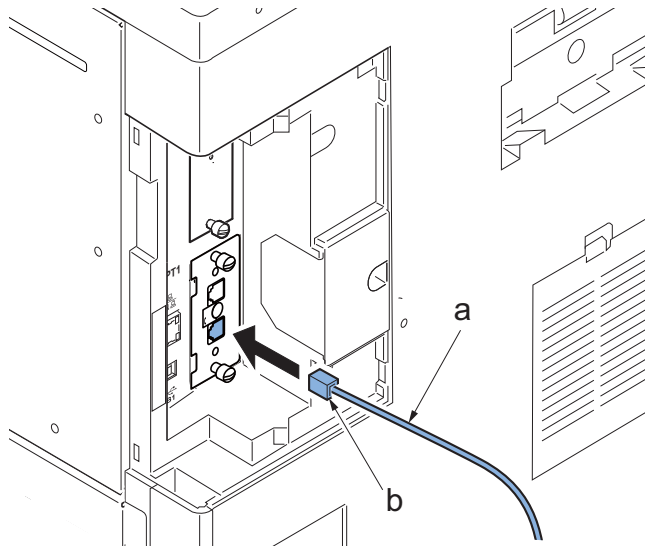
**15 Attach the protection cover (a) to the handset mounting plate (b).****16 Connect the telephone wire (a) to the handset (b) and handset holder (c).**

**17** Connect the modular cord (a) to the handset holder (b).**18** Detach the controller cover (a).

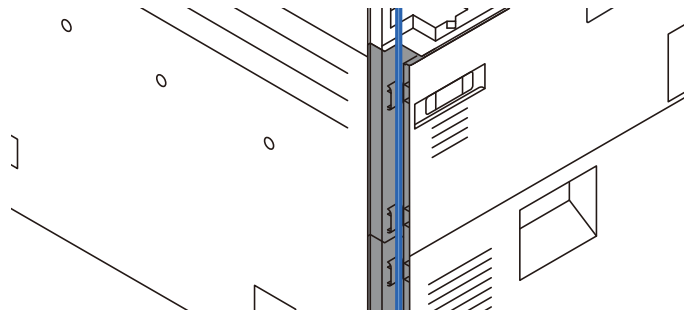
**19** Detach the main unit cover (a) in order from the top.



**20** Connect one end of the connector (b) of the modular cord (a) to the machine left side.

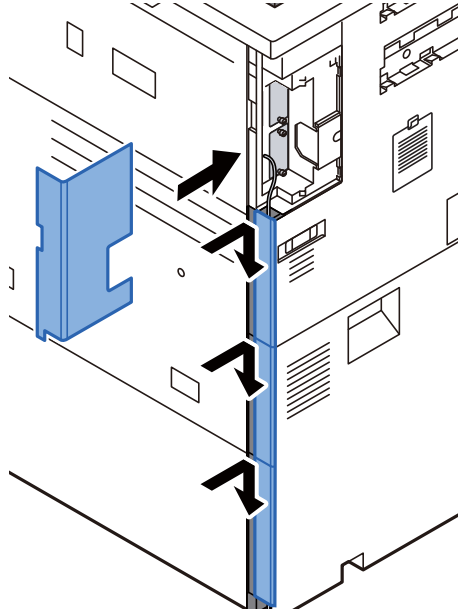


**21** Pass the cord through the groove.





## 22 While taking care not to insert the cord and then install in order from the lower.



### (8-2) In case installing the document table

#### Handset installation requires the following parts:

Handset (1909AG9JP0) 1 pc

Document table DT-5100 (1902LC0UN2) 1 pc

#### Bundled parts of handset (1909AC9JP0)

Handset 1 pc

Handset holder 1 pc

Handset mounting plate\*1 1 pc

Protection cover\*1 1 pc

Pin 2 pcs

Telephone wire 1 pc

Modular cord 1 pc

Nut M4 2 pcs

#### Bundled parts of Document table DT-730 (B) (1902LC0UN2\_)

Tray stay 1 pc

Tray mounting plate 1 pc

Tray cover 1 pc

Tray lower cover 1 pc

Tray fixing plate 1 pc

Sheet\*2 2 pcs

Pin 2 pcs

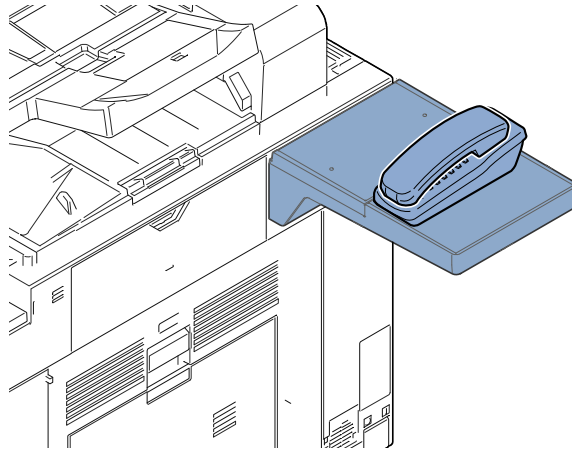
Nut M4 2 pcs

Screw (M4x8 screw with the binding head) 7 pcs

Screw (M4x14 screw with the binding head) 2 pcs

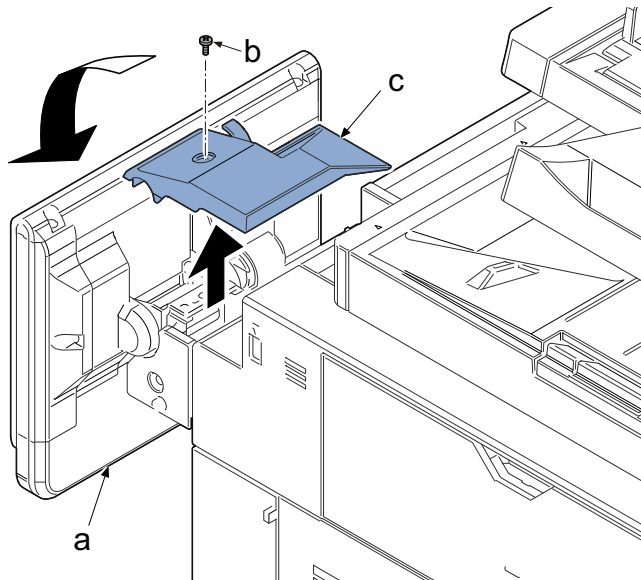
\*1: This model is not used.

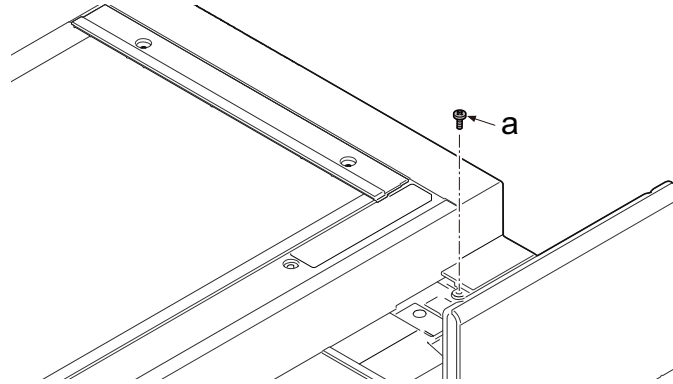
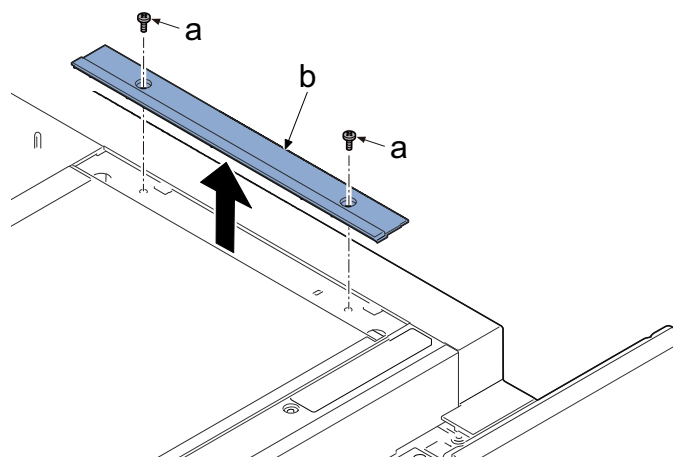
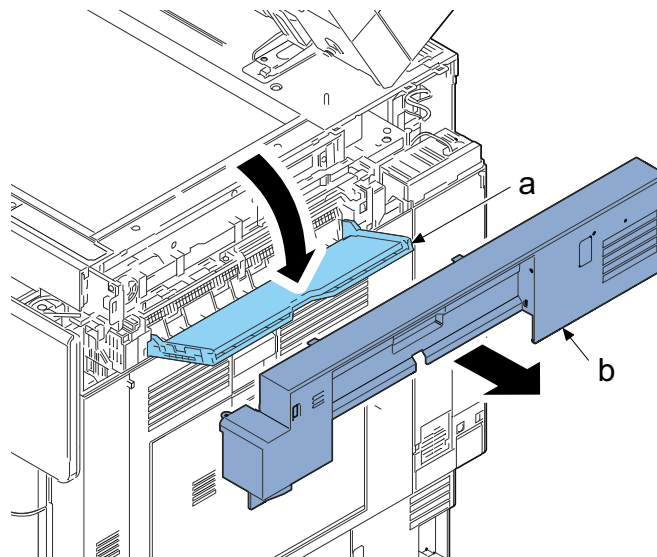
\*2: One sheet is not used.



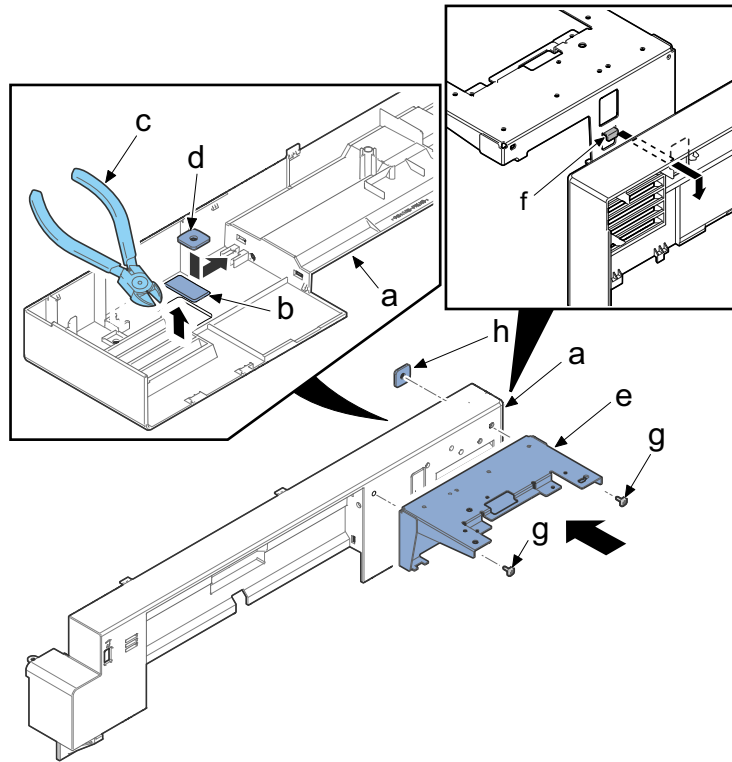
### Procedures

- 1 Turn the power switch off and disconnect the power plug.
- 2 Pull up the operation unit (a).
- 3 Remove one screw (b) (M3x8) and then remove the rear operation unit cover (c) in the direction of the arrow.

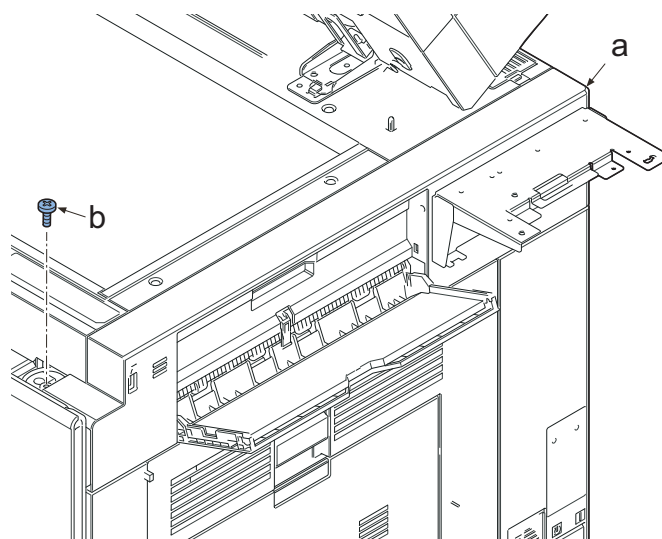


**4 Remove one screw (a) (M4x8).****5 Remove two screws (a) (M4x8) and then detach the ISU right cover (b) in the direction of the arrow.****6 Open the right tray (a).****7 Detach the right upper cover (b).****Figure 2-1**

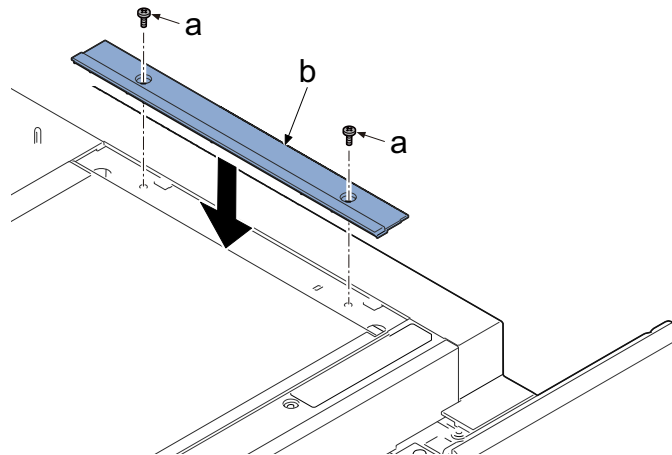
- 8 Take out cutting the separator cover (b) of the right upper cover (a) with nippers, etc.
- 9 Insert one nut (d) in the back side of the right upper cover (a).
- 10 Hang the hook (f) of the tray stay (e) on the aperture.
- 11 Attach the tray stay (e) to the right upper cover (a) with one screw (g) (M4×14).
- 12 While pressing the rear side of nuts (h), fasten the screw not to fall it.



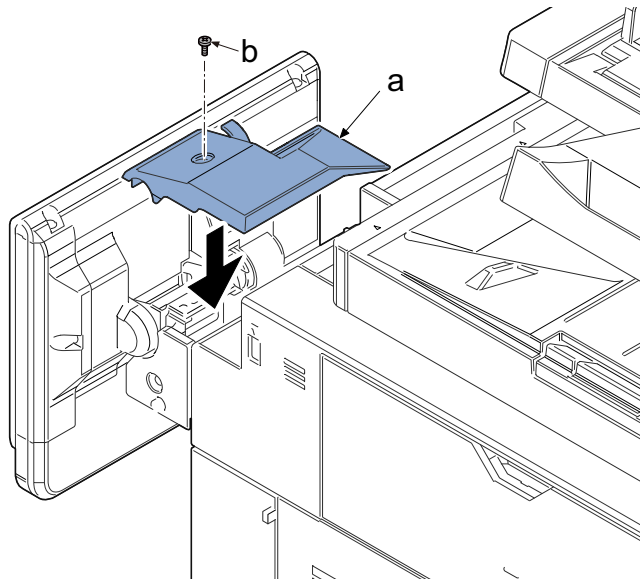
- 13 Reattach the right upper cover (a) to the main unit in the original position, fix with one screw (b) (M4×8).



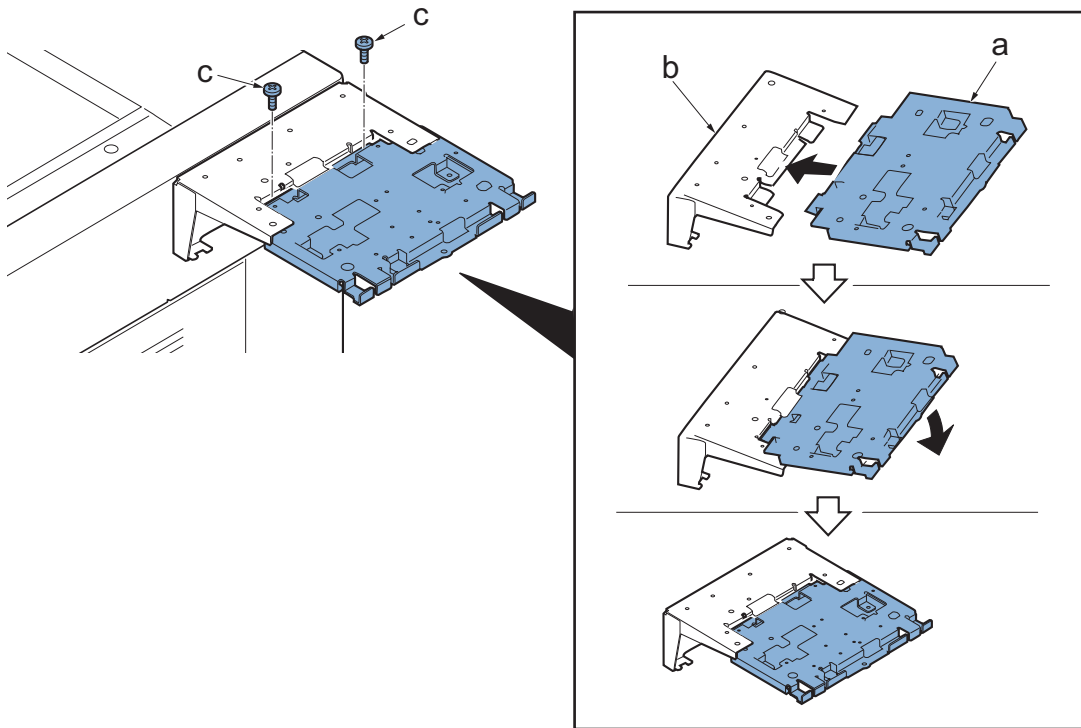
- 14** Reattach the ISU right cover (b) to the direction of the arrow in the original position with two screws (a) (M4×8).



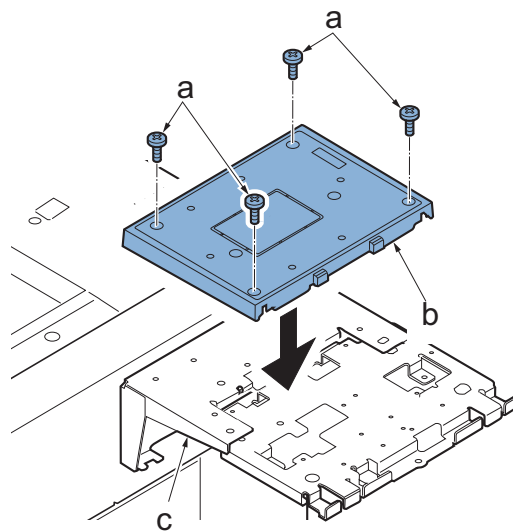
- 15** Reattach the rear operation cover (a) to the direction of the arrow in the original position with one screw (b) (M3×8).



- 16** Insert the mounting plate (a) into the tray stay (B) and secure it with two screws (C) (M4×8).

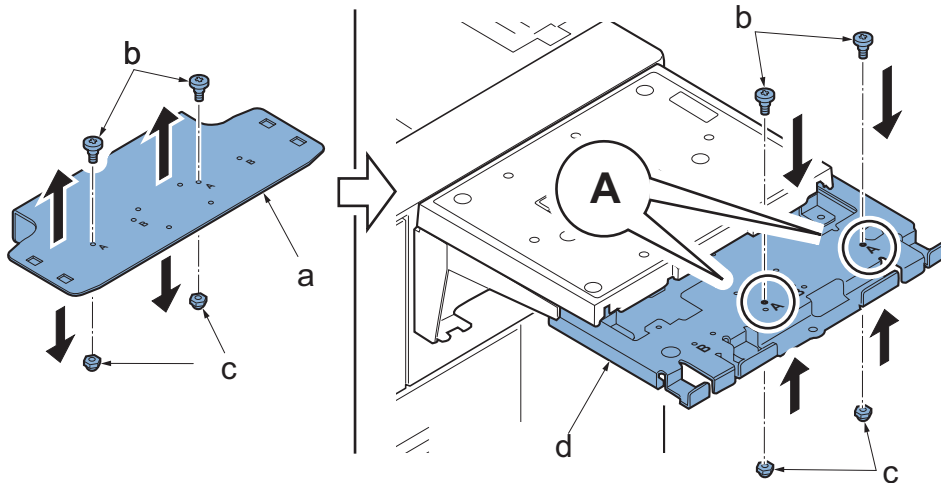


- 17** Attach the tray cover (b) to the tray stay (c) with four screws (a) (M4×8).

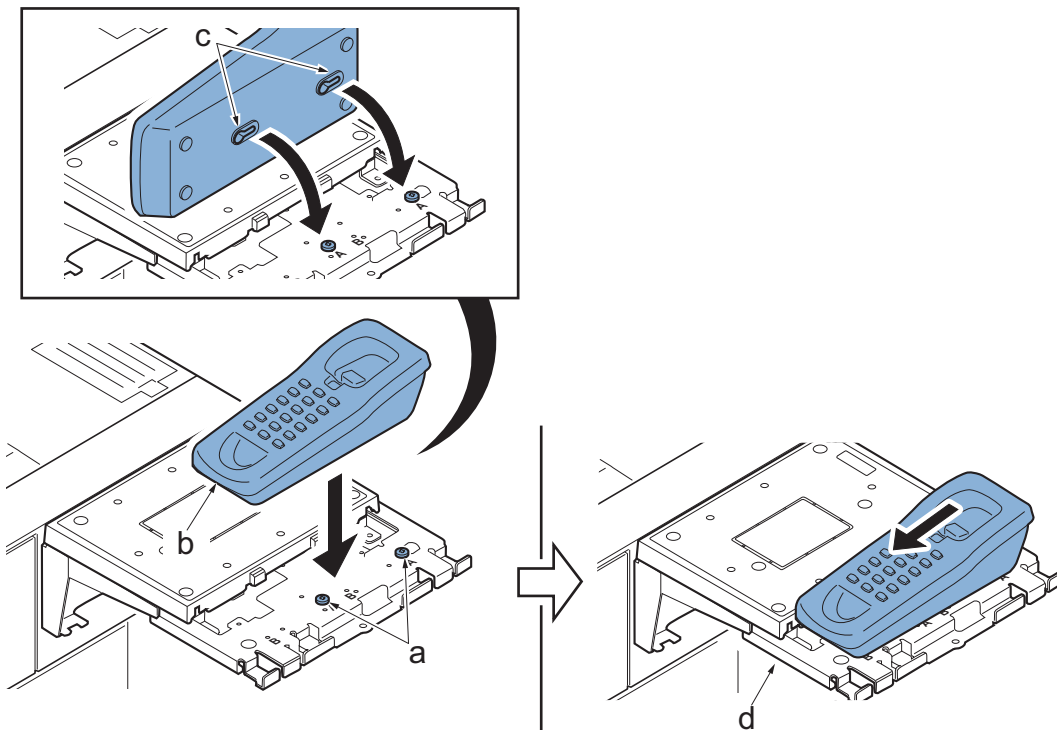


**18** Remove two pins (b) and two nuts (c) from the handset mounting plate (a).

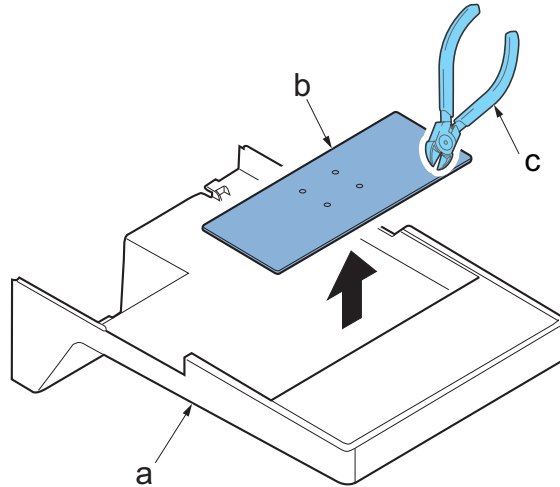
**19** Secure the original tray (d) with two pins and two nuts once removed.



**20** Put two catches (c) at the backside of the handset holder (b) into two pins (a) and slide it toward you to fix it on the document tray (d).

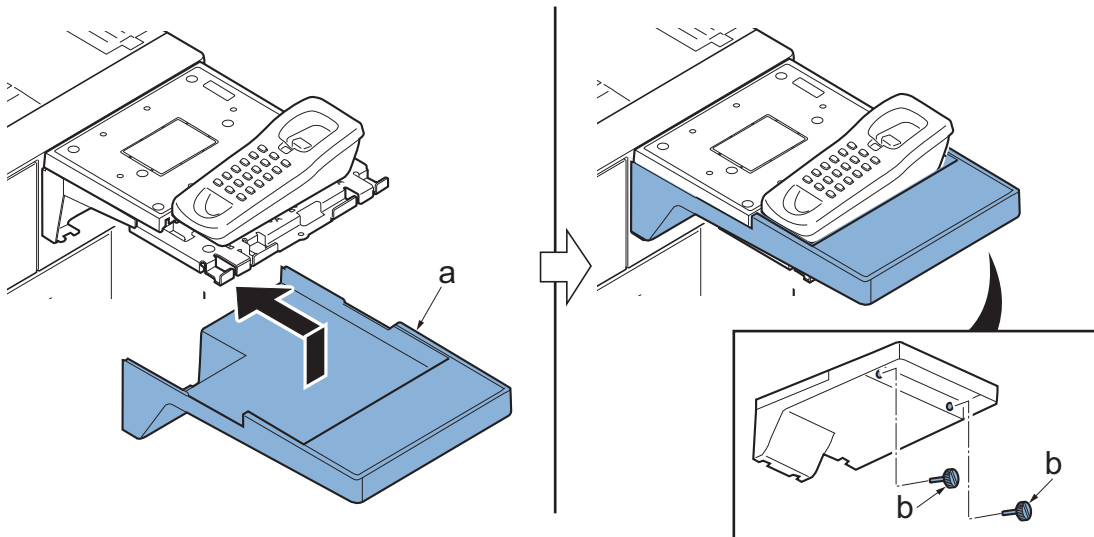


**21** Cut the separator cover (b) of the tray lower cover (a) with nippers, etc.

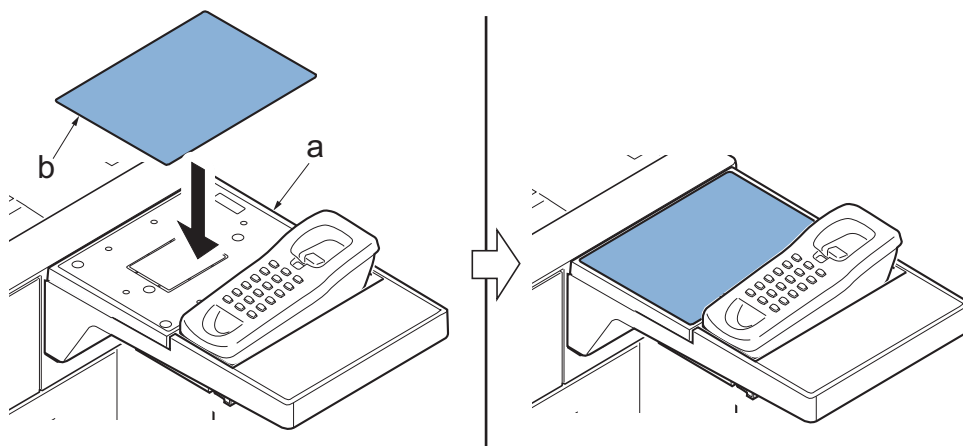


**22** Attach the tray lower cover (a).

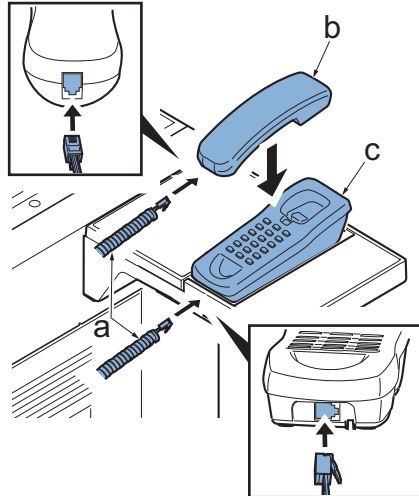
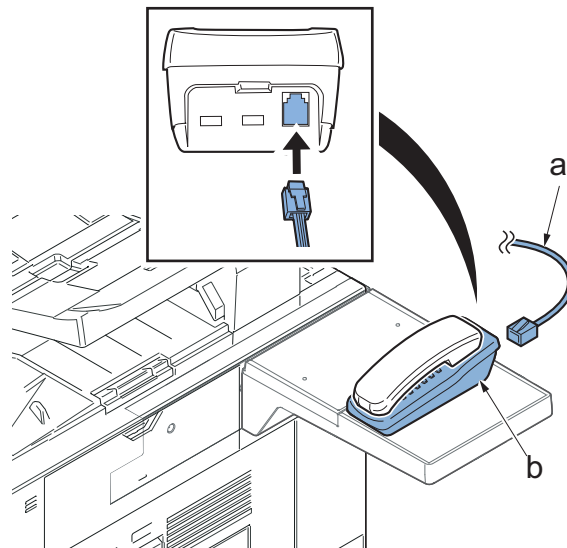
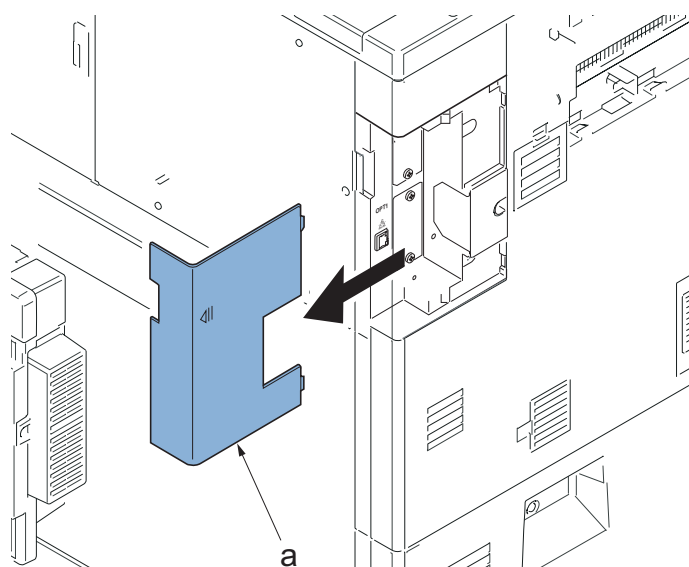
**23** Secure the tray lower cover (a) by two pins (b).



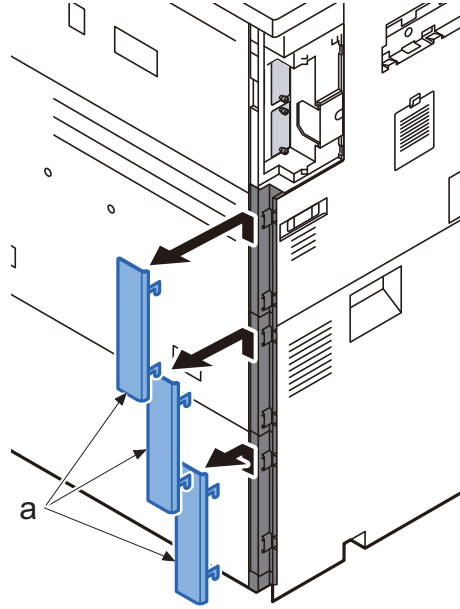
**24** Affix the sheet (b) on the left side of document table (a).



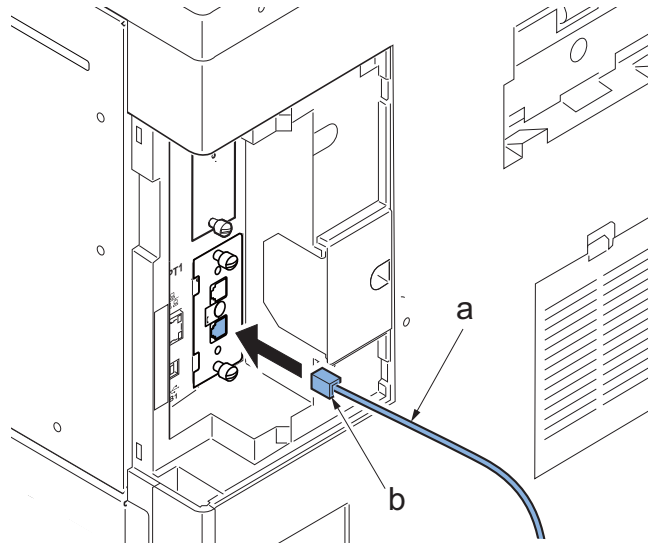


**25 Connect the telephone wire (a) to the handset (b) and handset holder (c).****26 Connect the modular cord (a) to the handset holder (b).****27 Detach the controller cover (a).**

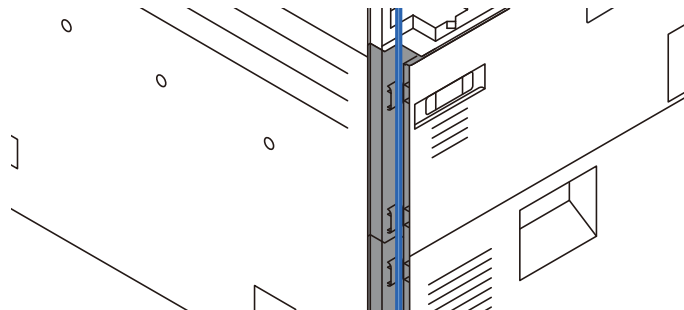
**28** Detach the main unit cover (a) in order from the top.



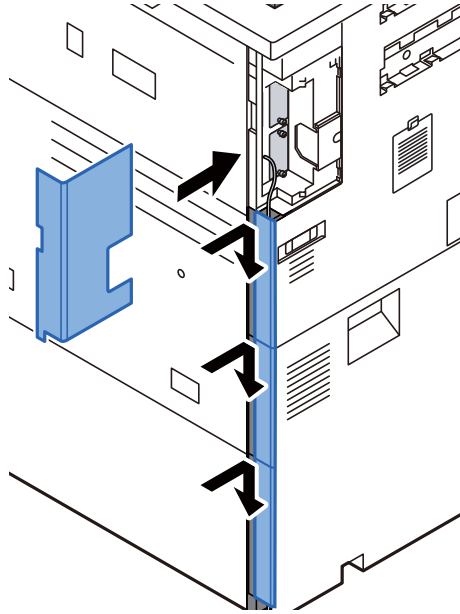
**29** Connect one end of the connector (b) of the modular cord (a) to the machine left side.



**30** Pass the cord through the groove.



### 31 While taking care not to insert the cord and then install in order from the lower

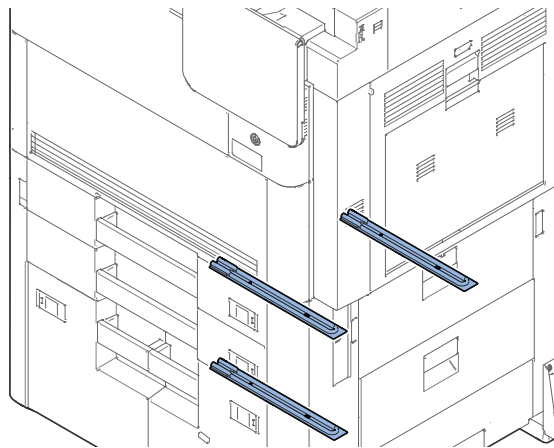


#### (9) Cassette heater

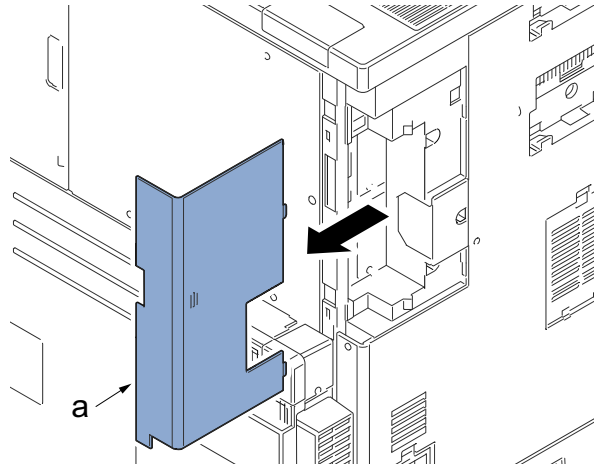
(9-1) In the case of main unit cassette (120V/220 to 240V models only)

#### Cassette heater installed model as standard

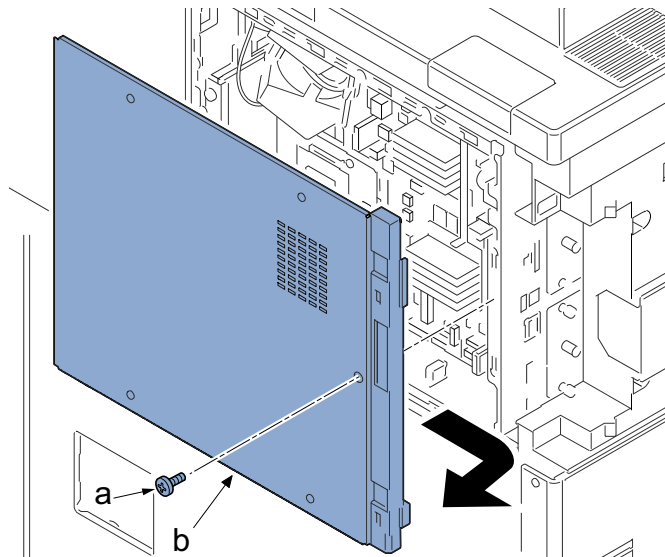
The cassette heater is not connected at factory but connect it according to the procedures below.



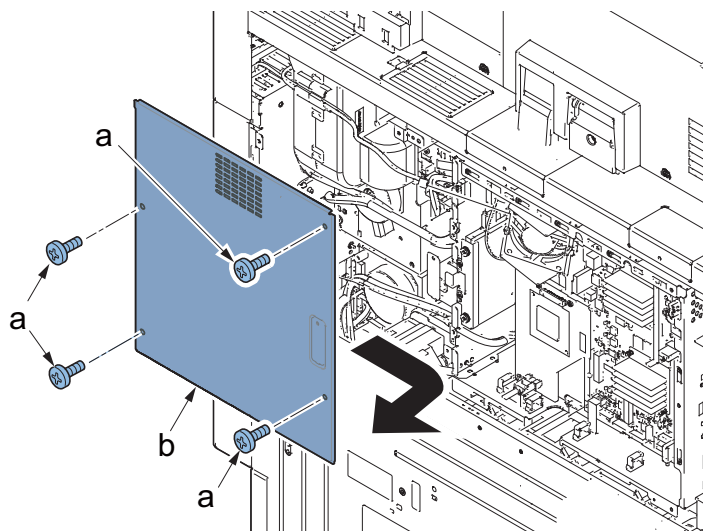
- 1 Slide the controller cover (a) in the direction of the arrow and detach it.



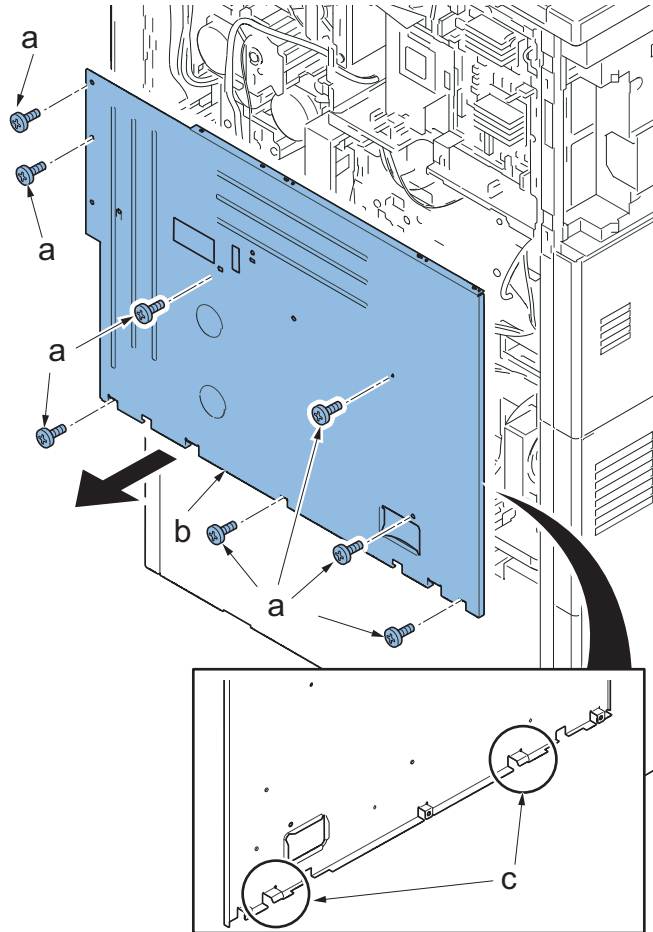
- 2 Remove one screw (a) (M3x8) and then remove the left rear cover (b) by sliding in the direction of the arrow.



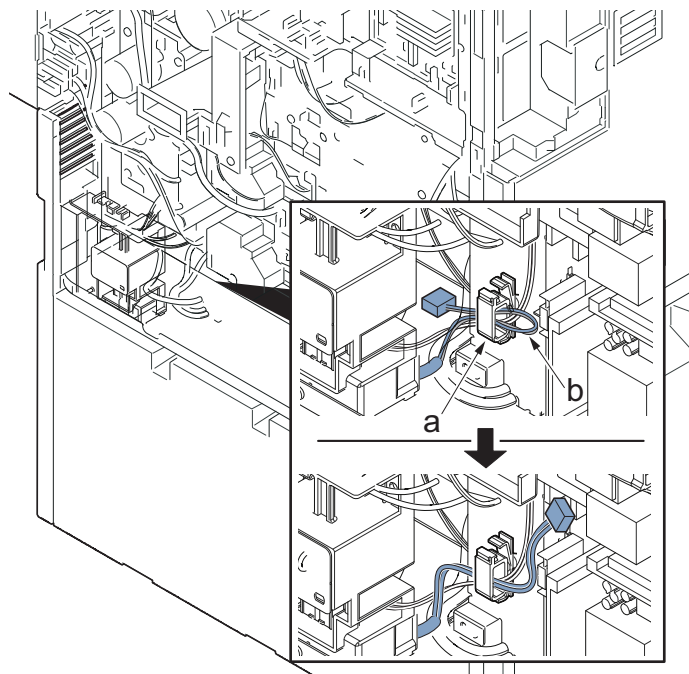
- 3 Remove four screws (a) (M3x8) and the detach right rear cover (b) in the direction of the arrow.



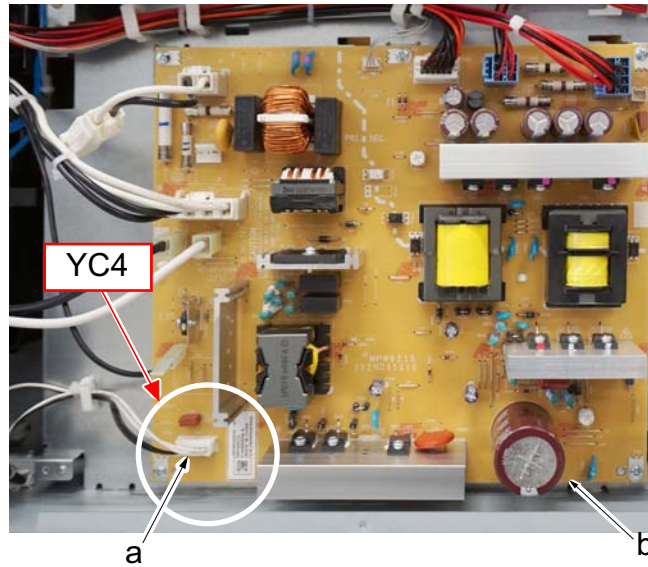
- 4 Remove eight screws (a) (M3x8).
- 5 Remove two low side of hooks (b) and then the lower rear cover (c)



- 6 Remove the cassette heater wire (b) combining from the wire saddle (a) and then fix it again.



## 7 Connect the cassette heater connector (a) to the power source PWB (B) (YC4).



8 Reattach the lower rear cover in the original position.

9 Reattach the right rear cover in the original position.

10 Reattach the left rear cover in the original position.

11 Reattach the controller cover in the original position.

### Cassette heater control setting (100V model only)

The model which the cassette heater is normally equipped and connecting to the connector in the cassette heater connecting procedure.

If the setting is not executed, the cassette heater is not turned on. (Default setting is OFF)

- 1 Input "327" using the numeric keyboard and press the [Start] key.
- 2 Select [Mode 1] or [Mode 2]
- 3 Press the [Start] key and then set.
- 4 Press the [Stop] key.

When reflecting the setting, skip the maintenance mode, operate the shut-down from the normal screen and turn the power switch ON/OFF.

### Cassette heater non-installed model

### Cassette heater installation requires the following parts:120V

Cassette heater set (302NJ9416\_) 1pc

### Bundle parts of cassette heater set (302NJ9416\_)

Cassette heater 120 (302RH4404\_) 2 pcs

Connector cover 2pcs

High temperature caution label 2 pcs

Screws (M3x6 S-tite) 4 pcs

Screws (M4x8 with the binding head) 2 pcs

Wire saddles 8 pcs

**Cassette heater installation requires the following parts:220 to 240V**

Cassette heater set (302NJ9417\_) 1 pc

**Bundle parts of cassette heater set (302NJ9417\_)**

Cassette heater 240 (302RH4405\_) 2 pcs

High temperature caution label 2 pcs

Connector cover 1pc

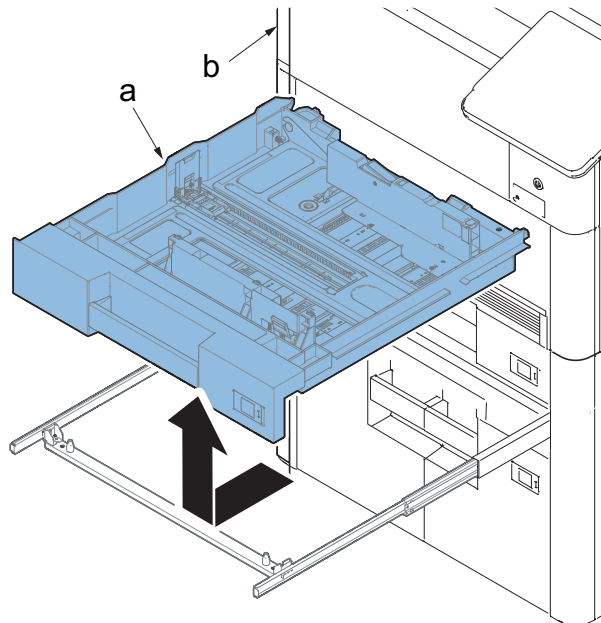
Screws (M3x6 S-tite) 4 pcs

Screws (M4x8 with the binding head) 1 pc

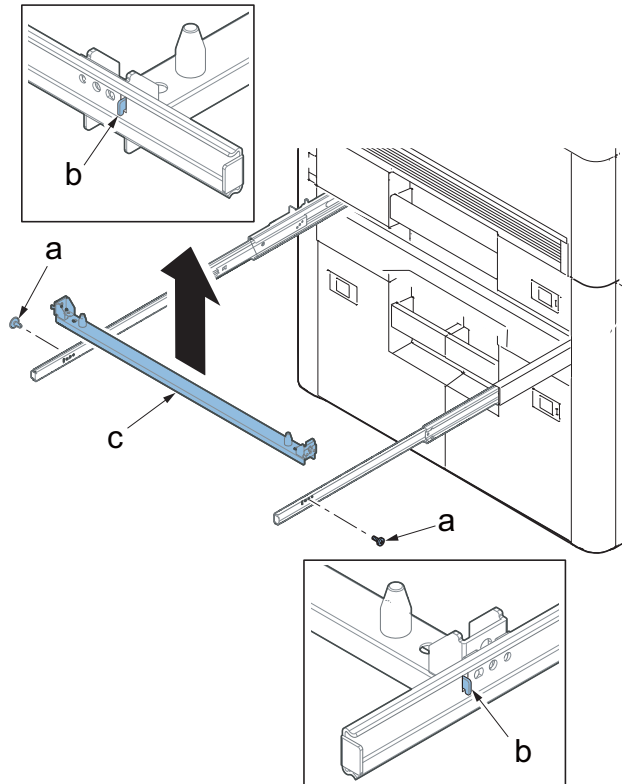
Wire saddles 9 pcs

**Procedures: Cassette 1,2**

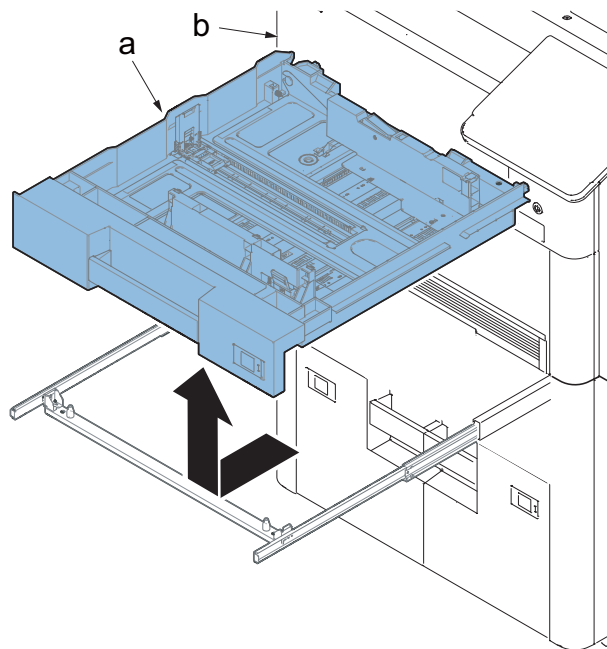
- 1 Turn the power switch off and disconnect the power plug.**
- 2 Pull out the lower cassette (a) from the main unit (b) and remove it in the direction of the arrow.**



- 3** Remove two screws (a) (M3×8), release two hooks (b) and detach the stay (c).

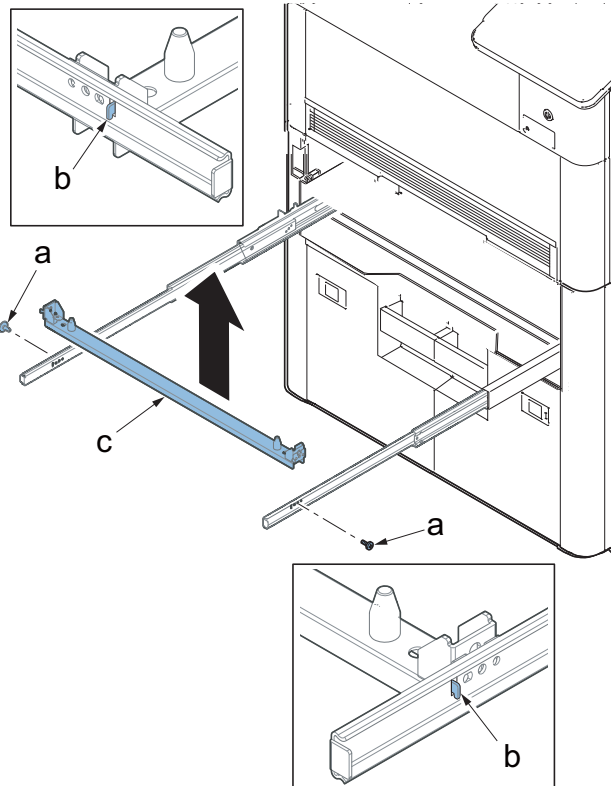


- 4** Pull out the upper cassette (a) from the main unit (b) and remove it in the direction of the arrow.



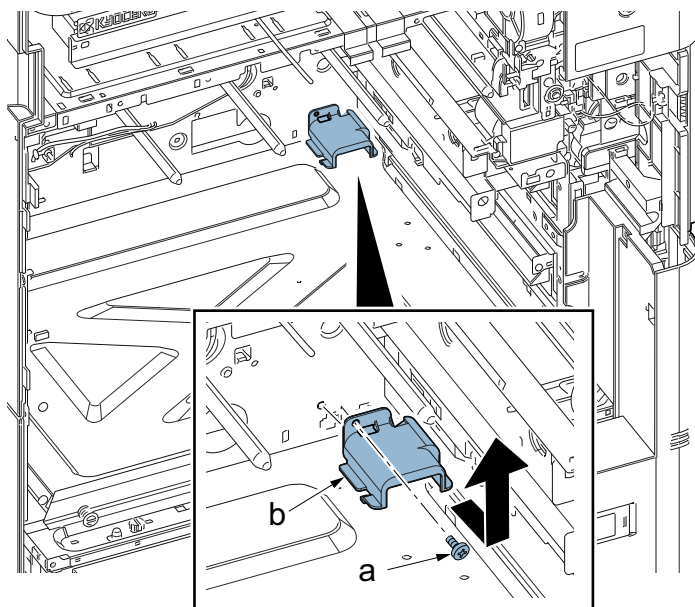


- 5** Remove two screws (a) (M3×8), release two hooks (b) and detach the stay (c).



**200 to 220V models only**

- 6** Remove one screw (a) (M4x8) and detach the connector cover (b) in the direction of the arrow.



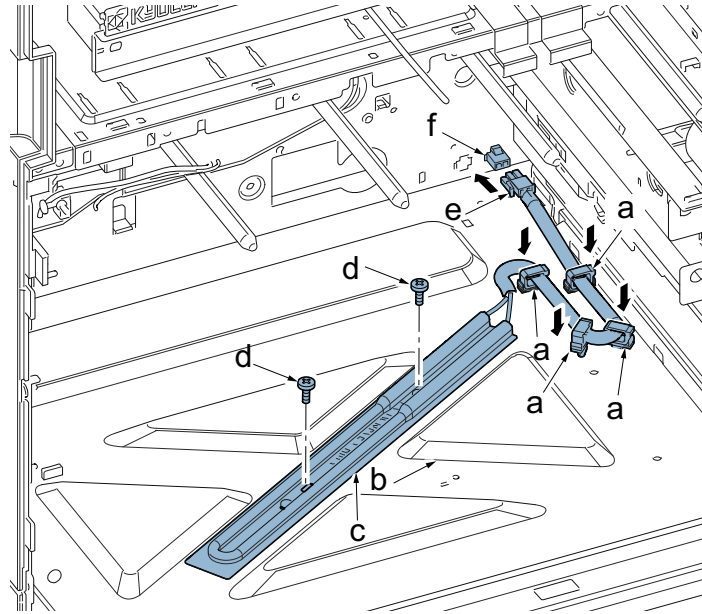
- 7** Reattach four wire saddles (a) to the bottom frame (b).

220 to 240V model is 5pcs.

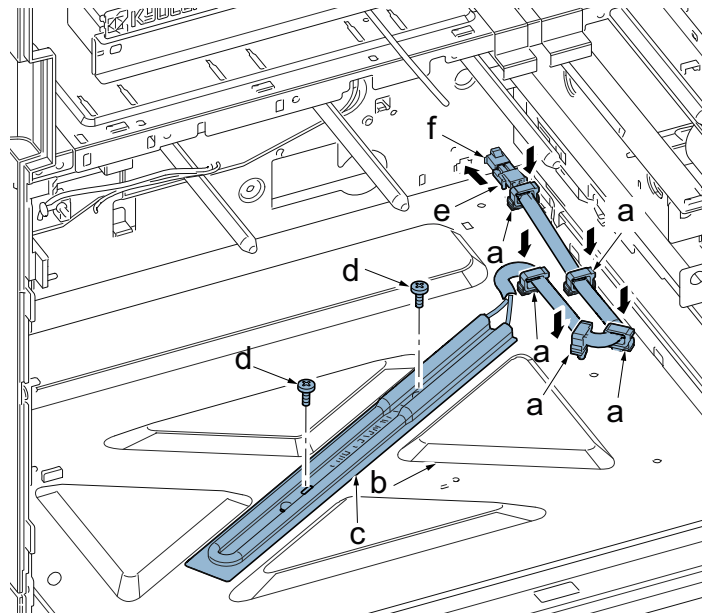
8 Reattach the cassette heater (c) to the base (b) with two screws (d) (M3×6).

9 Connect the heater connector (e) to the main unit side connector (f).

120V

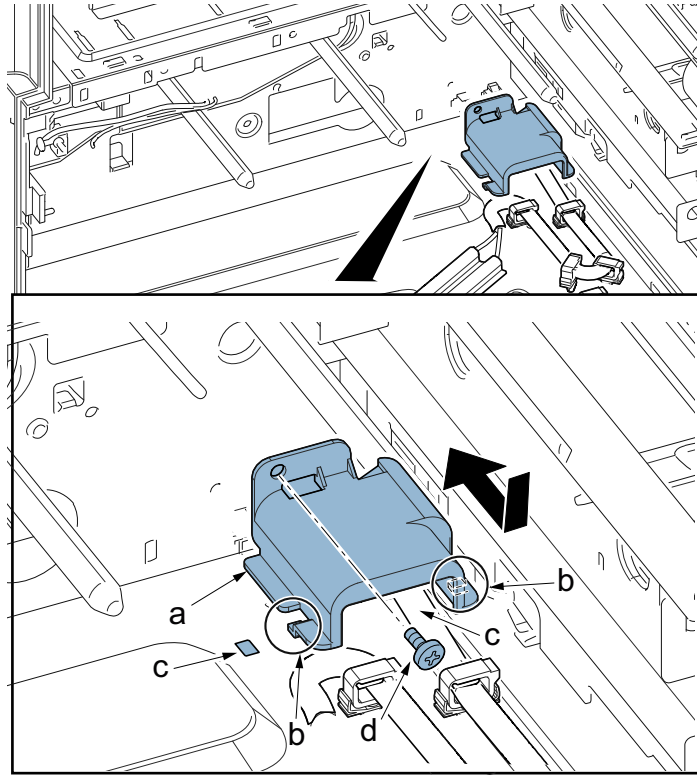


220\_240V

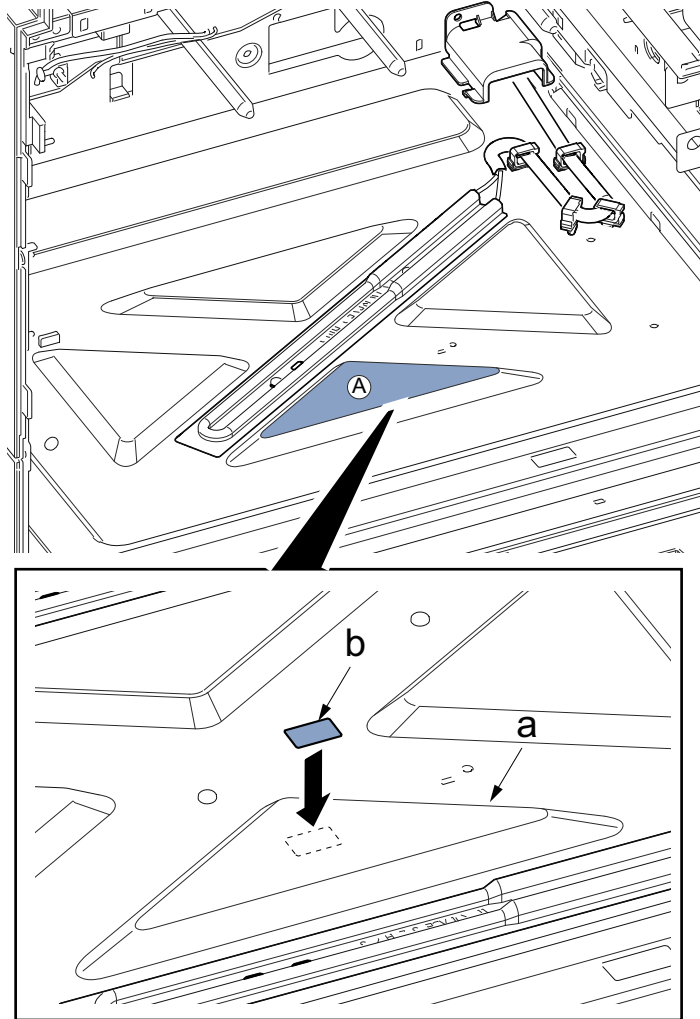


**10** Insert two hooks (b) of the connector cover (a) into the hole (c).

**11** Reattach the connector cover (a) with one screw (d) (M4x8).



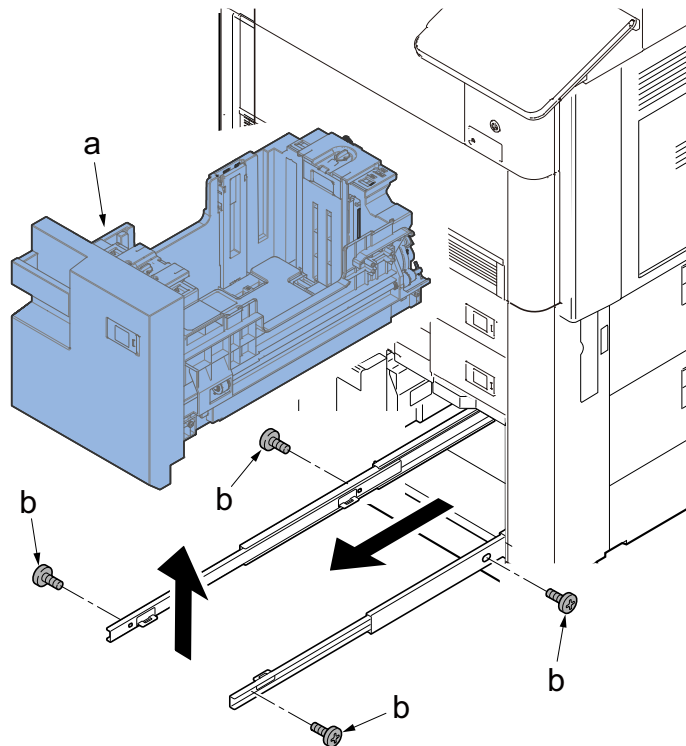
**12** Clean the bottom frame (a) A parts with an alcohol, attach the caution label to it.



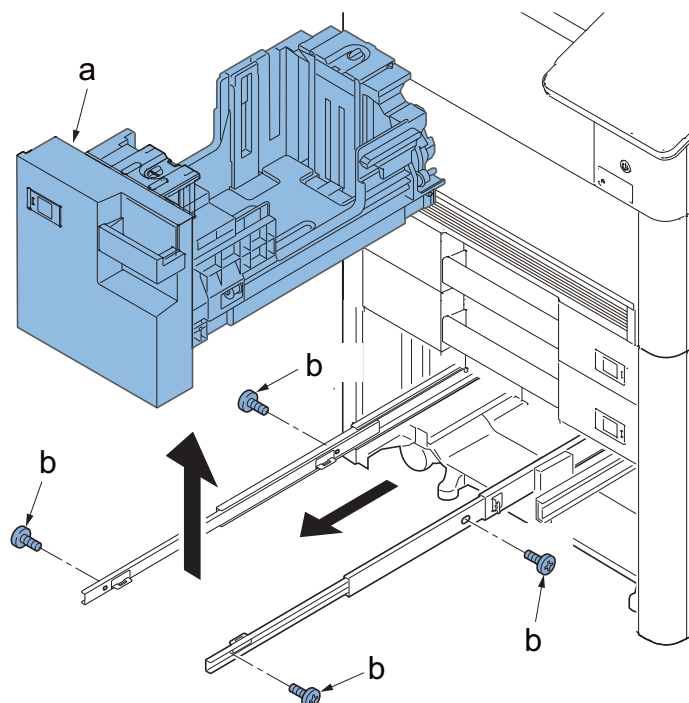
### 13 Reattach the parts in the original position.

#### Installing of cassette 3,4

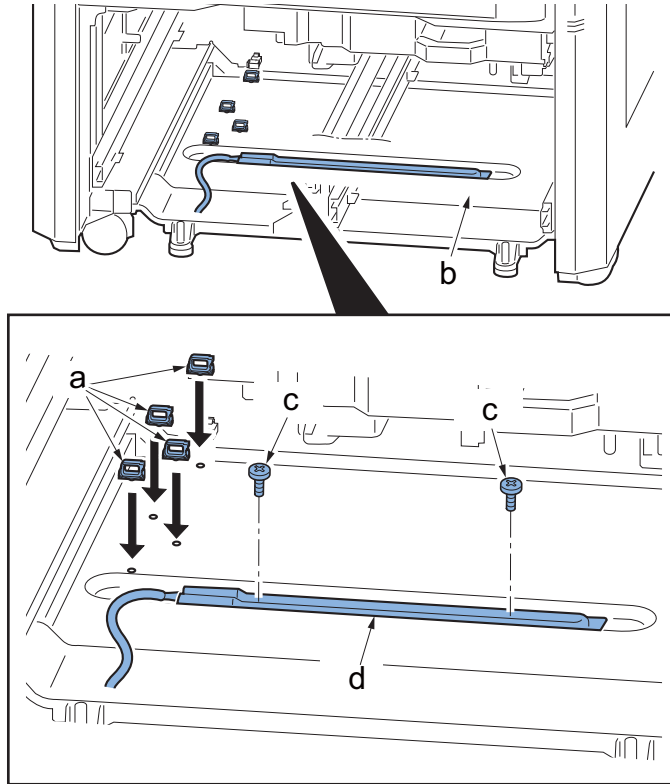
- 1 Turn the power switch off and disconnect the power plug.
- 2 Pull out the right paper deck (a).
- 3 Remove the four screws (b) (M4×8) and detach the right paper deck (a).



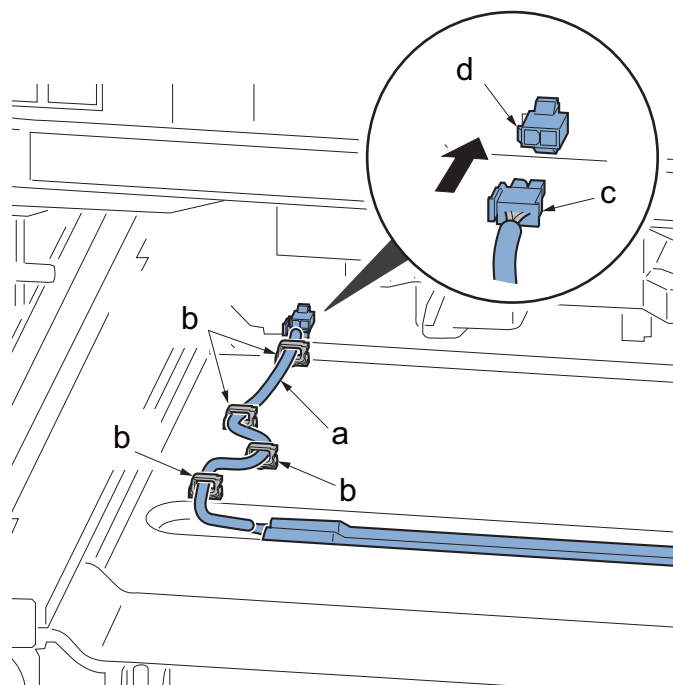
- 4 Pull out the left paper deck (a).
- 5 Remove the four screws (b) (M4×8) and detach the left paper deck (a).



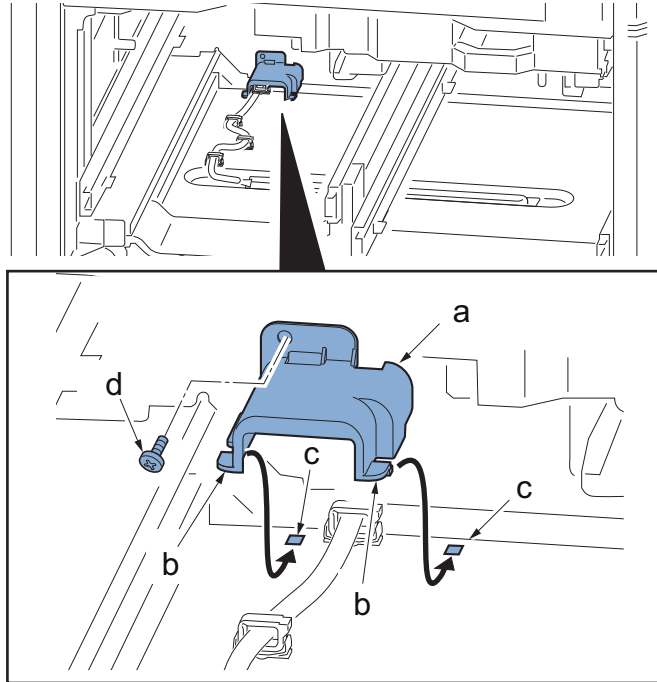
- 6 Reattach four wire saddles (a) to the main unit bottom frame (b).
- 7 Reattach the cassette heater (d) with two screws (c) (M3×8).



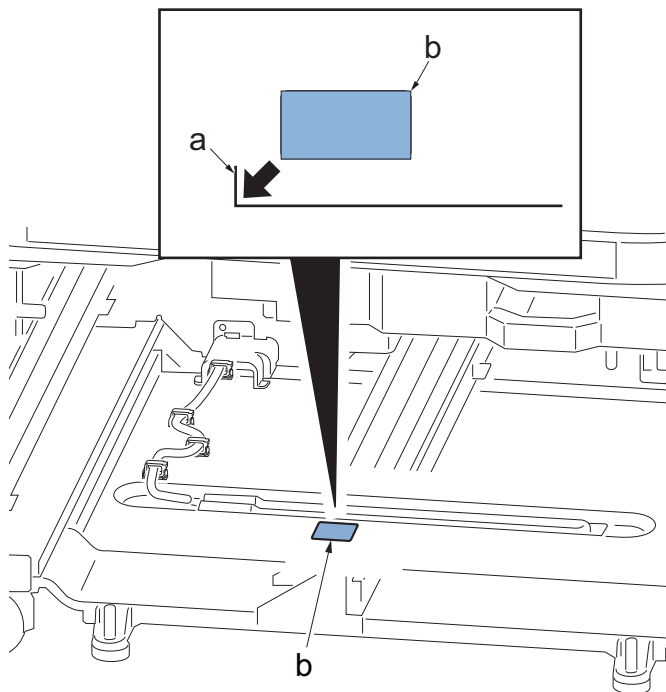
- 8 Pass through the cassette heater wire (a) in four wire saddles (b).
- 9 Connect the connector (c) of the cassette heater to the connector (d) of the main unit rear frame.



- 10** Insert two hooks (b) of the connector cover (a) into the hole (c).
- 11** Reattach the connector cover (a) with one screw (d) (M4x8).



- 12** Clean the bottom frame (a) in front of the cassette heater with an alcohol. Match the corner of the bottom frame marking (a) and attach the high temperature caution label (b).



**13 Reattach the parts in the original position.****14 Turn the power on and set to [mode1/mode2] In maintenance mode U327 [Cassette heater control setting].**

When reflecting the setting, skip the maintenance mode, operate the shut-down from the normal screen and turn the power switch ON/OFF.

IMPORTANT

**✔ IMPORTANT**

When connecting the cassette heater, do not unplug the power cord. (Power is supplied when the power is switched off)

**(9-2) In case of Paper Feeder (PF-730 (B))****Cassette heater installation requires the following parts:**

Cassette heater 100 set (303NJ9406\_) 1 pc

Cassette heater 120 set (303NJ9407\_)

Cassette heater 240 set (303NJ9408\_)

**Bundled parts of cassette heater 100/120/240 set**

Cassette heater 100 (302H74507\_) 1 pc

Cassette heater 120 (302H74509\_)

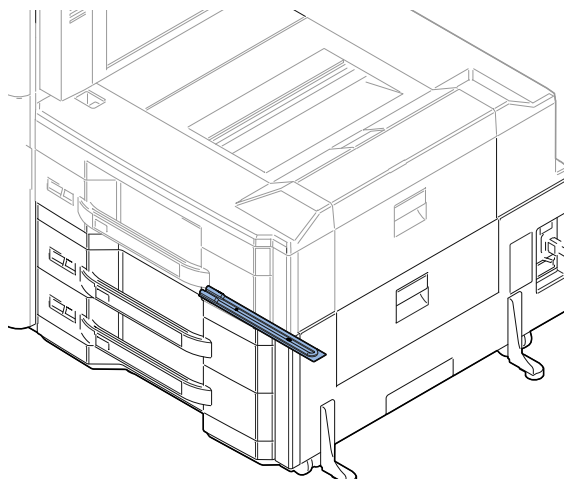
Cassette heater 240 (302H74508\_)

High temperature caution label 1 pc

Wire saddles 3 pcs

Screw (M4x8 S-tite) 3 pcs

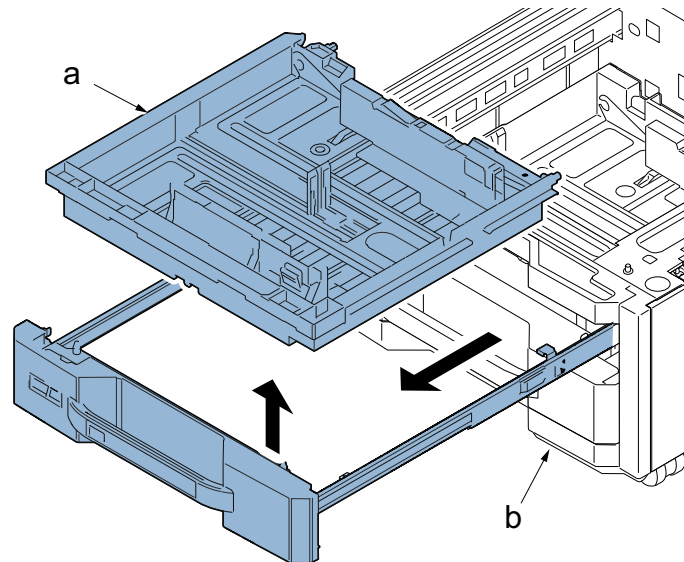
Connector cover 1pc



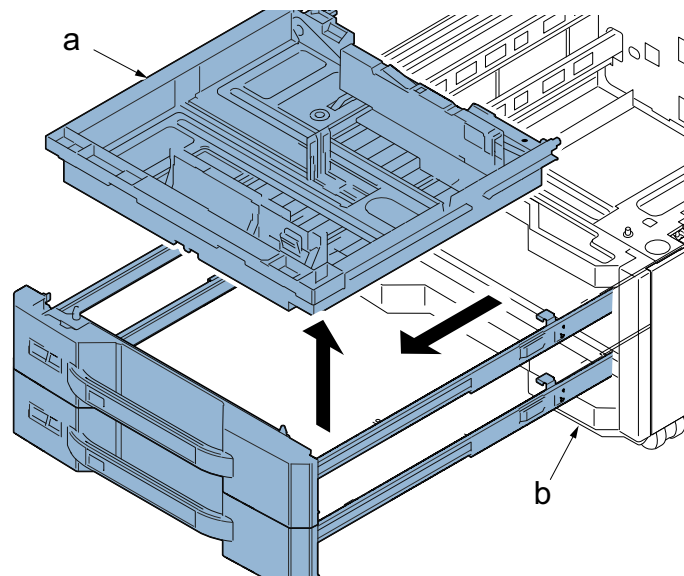


## Procedures

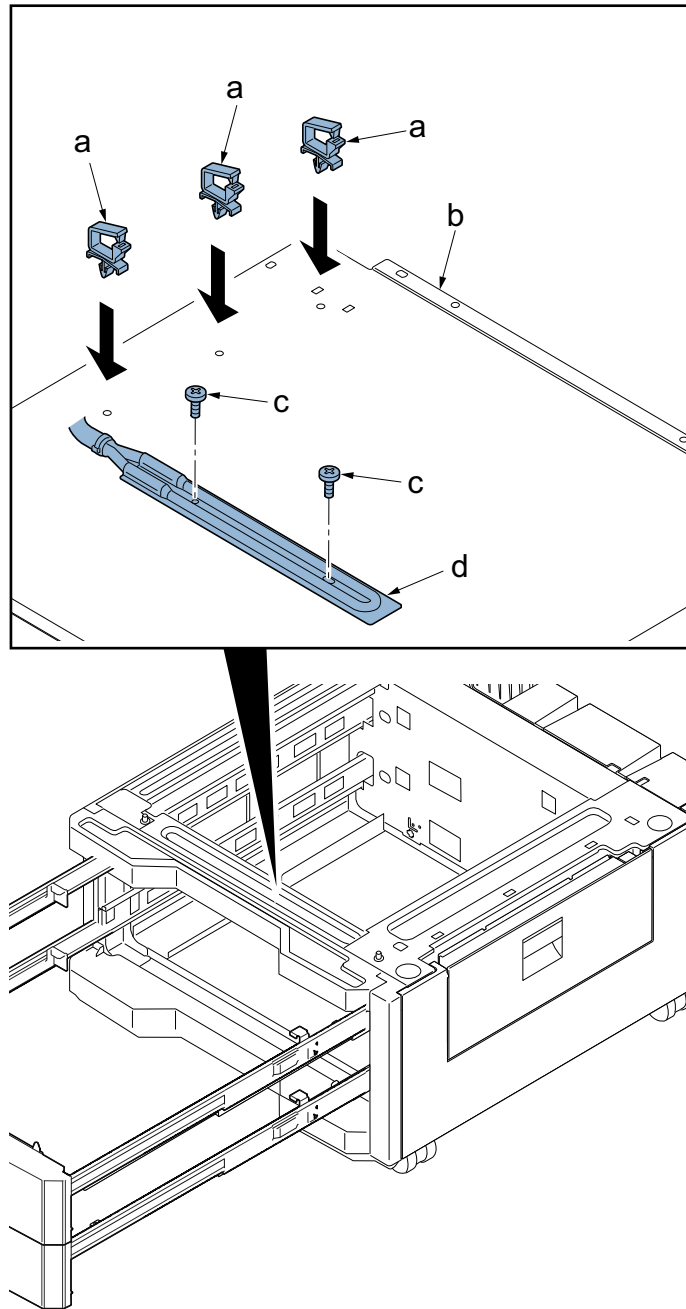
- 1 Turn the power switch off and disconnect the power plug.
- 2 Pull out the upper cassette (a) from the paper feeder (b) and remove it in the direction of the arrow.



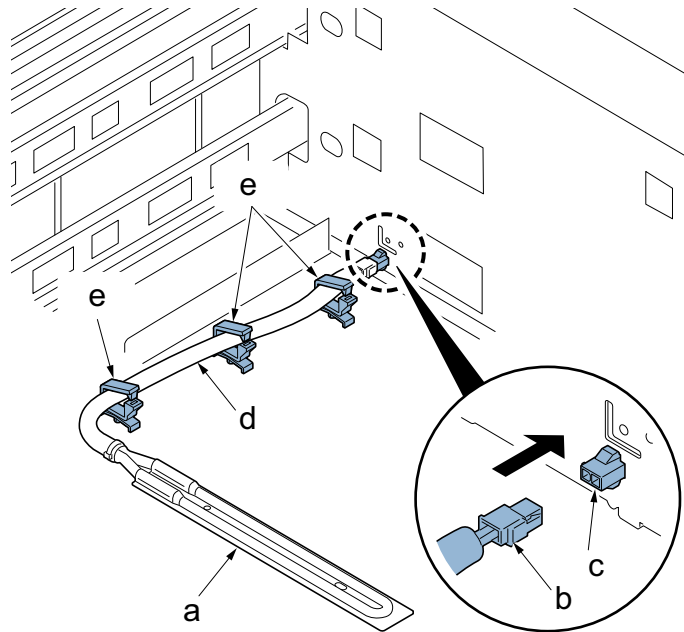
- 3 Pull out the lower cassette (a) from the paper feeder (b) and remove it in the direction of the arrow.



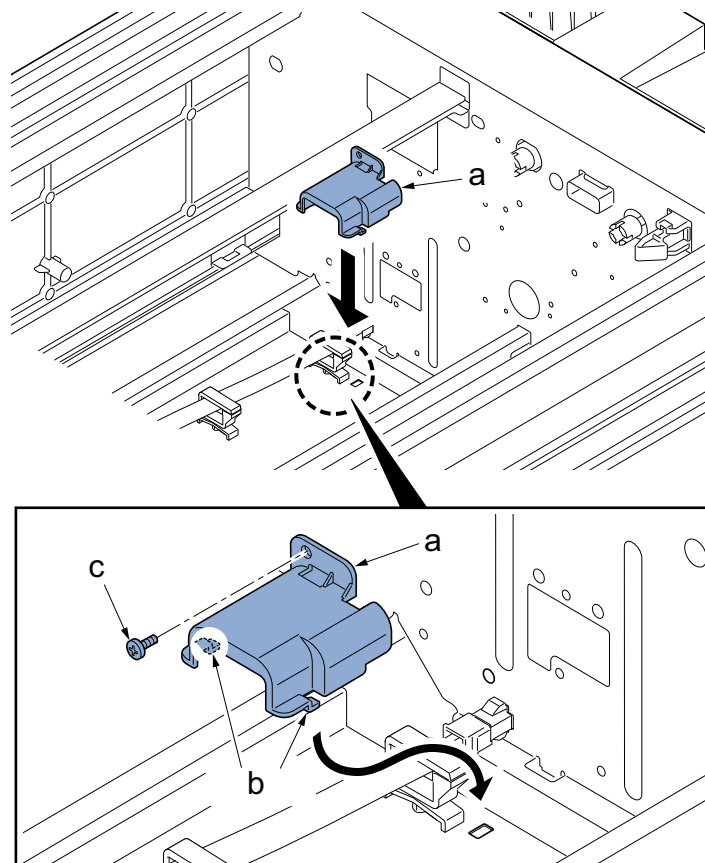
- 4 Reattach three wire saddles (a) to the paper feeder bottom frame (b).
- 5 Reattach the cassette heater (d) with two screws (c) (M4×8).



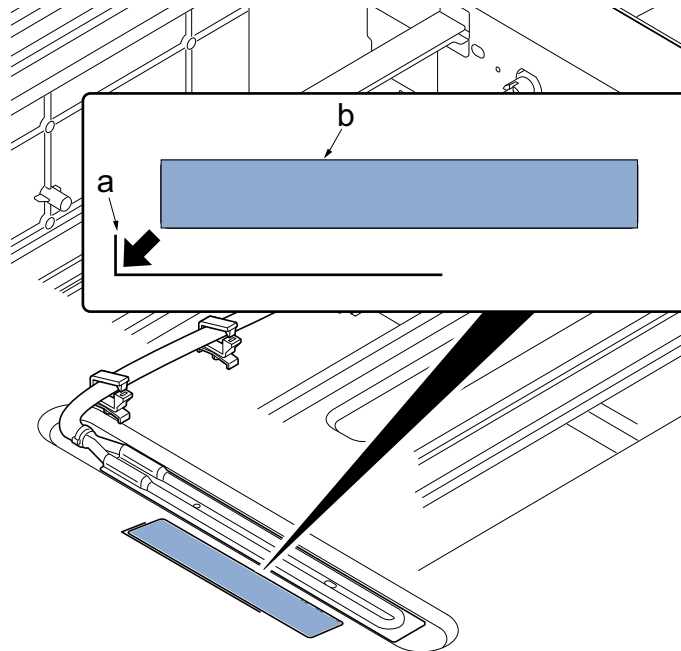
- 6 Connect the connector (b) of the cassette heater (a) to the connector (c) of the paper feeder rear frame.
- 7 Pass through the cassette heater wire (d) in three wire saddles (e).



- 8 Insert two hooks (b) of the heater cover (a) into the hole.
- 9 Reattach the heater cover (a) with one screw (c) (M4x8).



- 10 Clean the bottom frame in front of the cassette heater with an alcohol.
- 11 Match the corner of the bottom frame marking (a) and attach the high temperature caution label (b).



- 12 Reattach the parts in the original position.
- 13 Turn the power on and set to [mode1/mode2] In maintenance mode U327 [Cassette heater control setting].

**✔ IMPORTANT**

When connecting the cassette heater, do not unplug the power cord. (Power is supplied when the power is switched off)

Also, if unplugged for a prolonged time, it may cause blurred images depending on the environment. In this case, execute [System Menu] > [Adjustment/Maintenance] > [Drum Refresh].

**(9-3) In case of Paper Feeder (PF-740 (B))**

**Cassette heater installation requires the following parts:**

Cassette heater 100 set (303NF9412\_) 1 pc

Cassette heater 120 set (303NF9413\_)

Cassette heater 240 set (302NF9414\_)

**Bundled parts of cassette heater 100/120/240 set**

Cassette heater 100 (302H74507\_) 1 pc

Cassette heater 120 (302H74509\_)

Cassette heater 240 (302H74508\_)

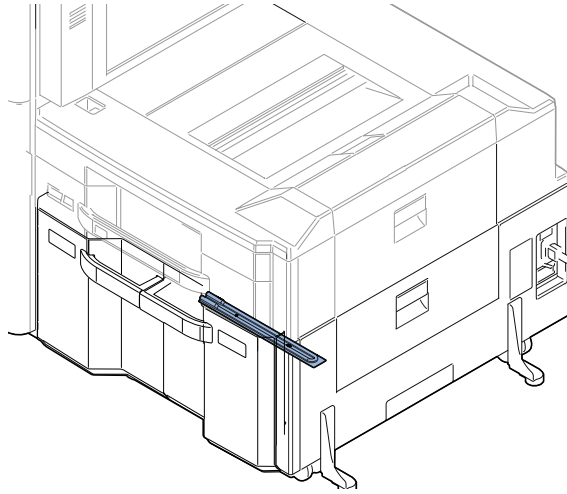
High temperature caution label 1 pc

Wire saddles 3 pcs

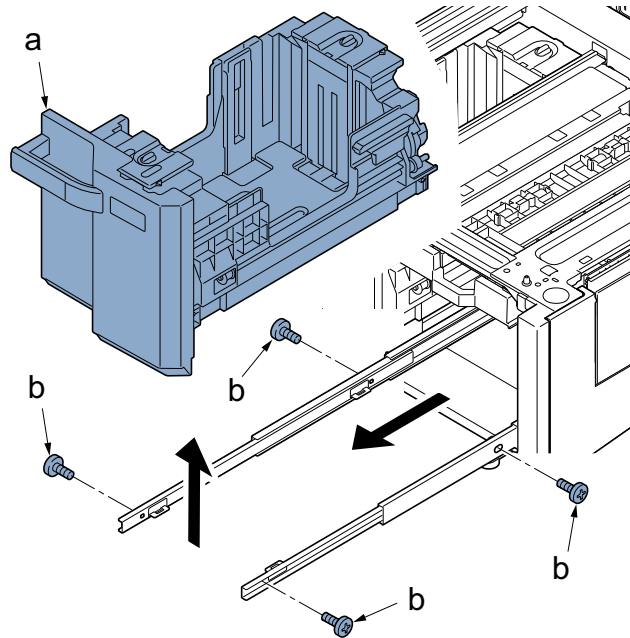
Screws (M3x8 S-tite) 2 pcs

Screw (M4x8 S-tite) 1pc

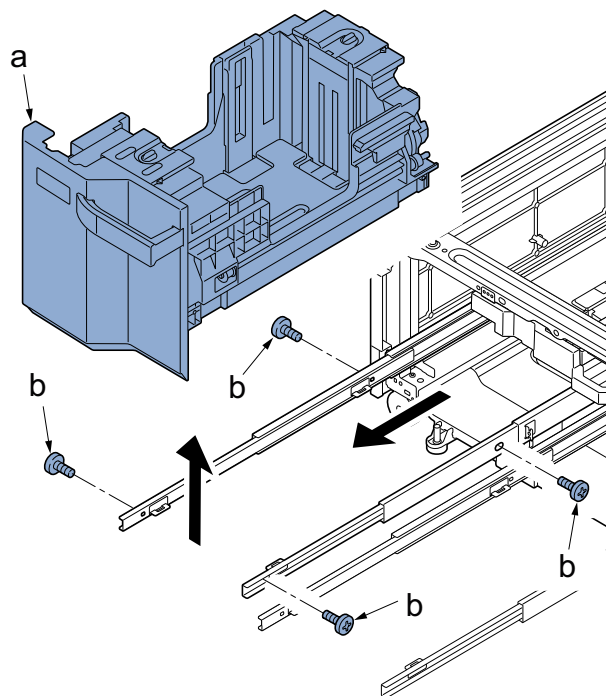
## Connector cover 1pc

**Procedures**

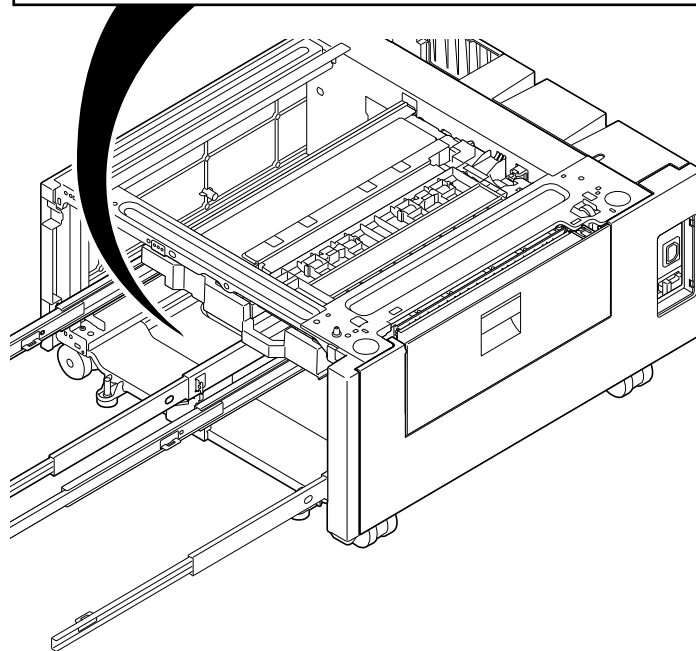
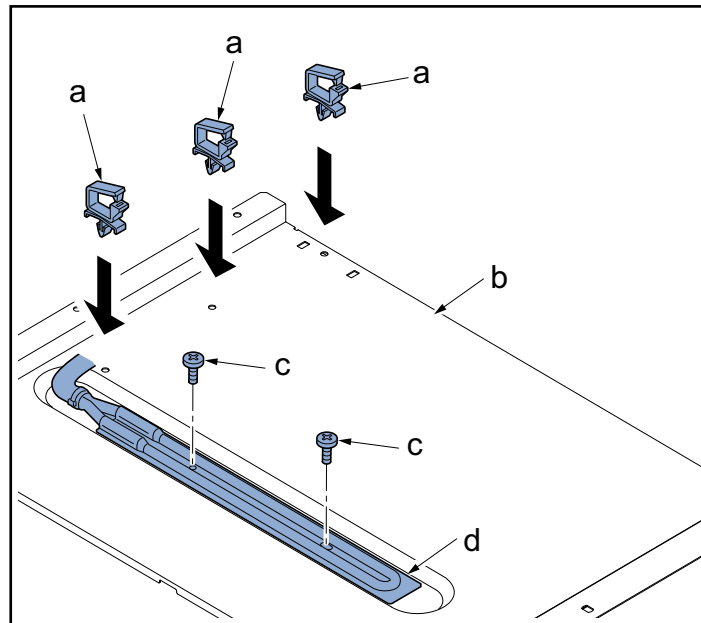
- 1** Turn the power switch off and disconnect the power plug.
- 2** Pull out the right cassette (a).
- 3** Remove the four screws (b) (M4×8) and detach the right cassette (a).



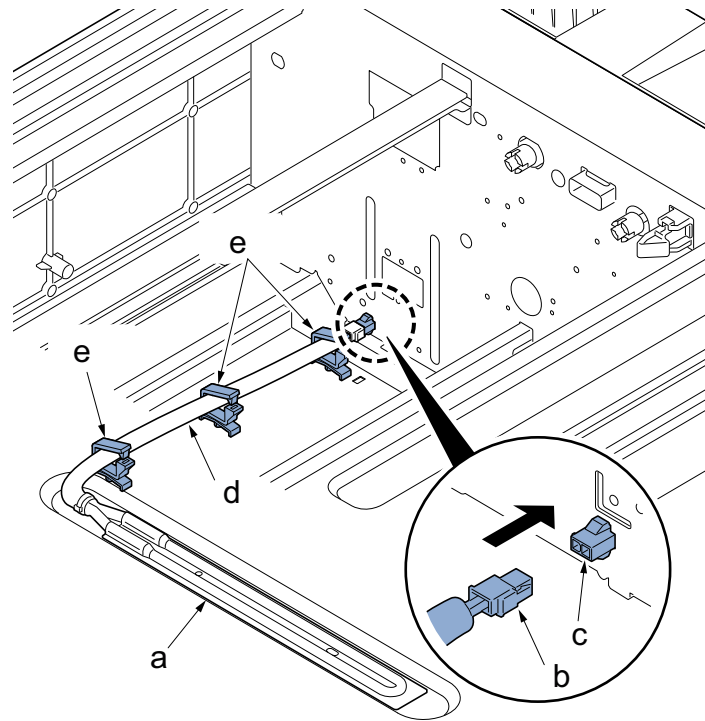
- 4 Pull out the left cassette (a).
- 5 Remove four screws (b) (M4×8) and detach the left cassette (a).



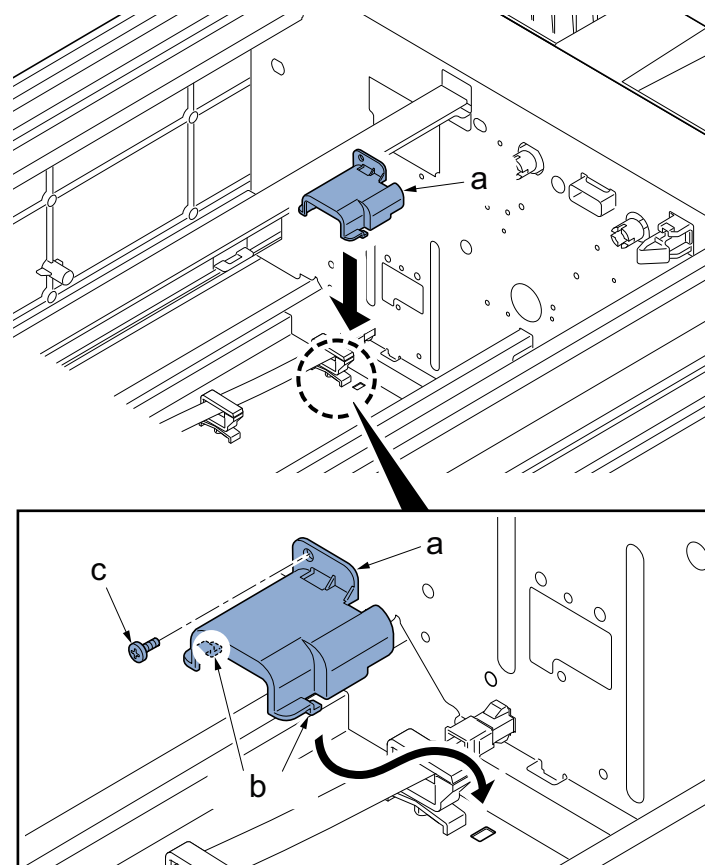
- 6 Reattach three wire saddles (a) to the paper feeder bottom frame (b).
- 7 Reattach the cassette heater (d) with two screws (c) (M3×8).



- 8 Connect the connector (b) of the cassette heater (a) to the connector (c) of the paper feeder rear frame.
- 9 Pass through the cassette heater wire (d) in three wire saddles (e).

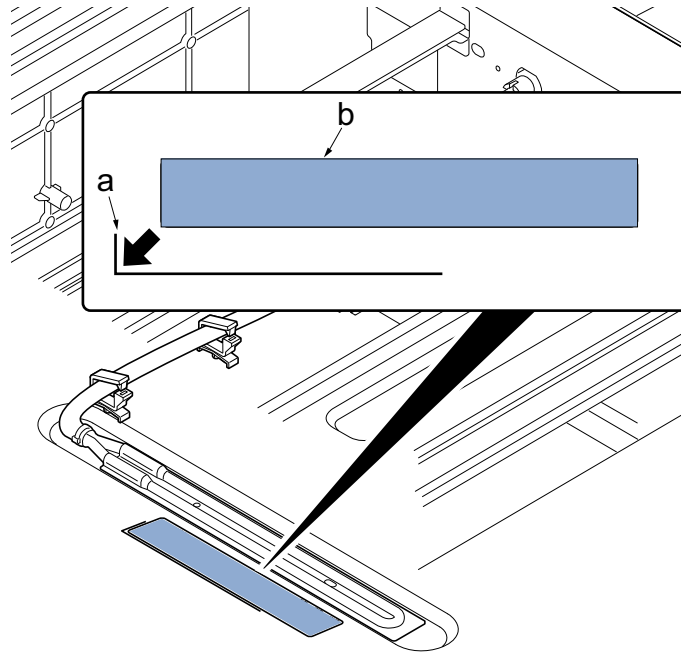


- 10 Insert two hooks (b) of the heater cover (a) into the hole.
- 11 Reattach the heater cover (a) with one screw (c) (M4x8).





- 12** Clean the bottom frame in front of the cassette heater with an alcohol. Match the corner of the bottom frame marking (a) and attach the high temperature caution label (b).



- 13** Reattach the parts in the original position.
- 14** Turn the power on and set to [mode1/mode2] In maintenance mode U327 [Cassette heater control setting].

**✓ IMPORTANT**

When connecting the cassette heater, do not unplug the power cord. (Power is supplied when the power is switched off)

**(9-4) In case of Side Paper Feeder (PF-7120)**

**Cassette heater installation requires the following parts:**

Cassette heater 100 set (303RL9404\_) 1 pc

Cassette heater 120 set (303RL9405\_)

Cassette heater 240 set (303RL9406\_)

**Bundled parts of cassette heater 100/120/240 set**

Cassette heater 100 assembly 1 pc

Cassette heater 120 assembly

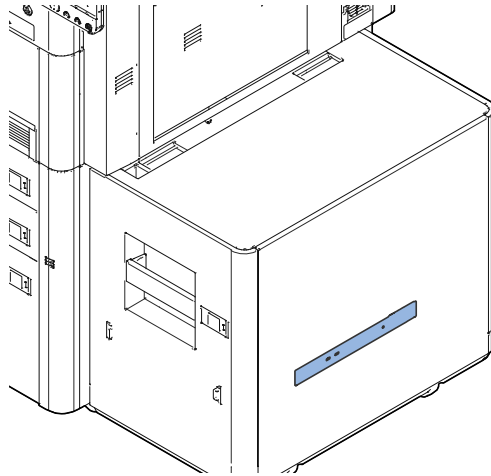
Cassette heater 240 assembly

Wire saddles \*1 2 pcs

Edge saddle 1 pc

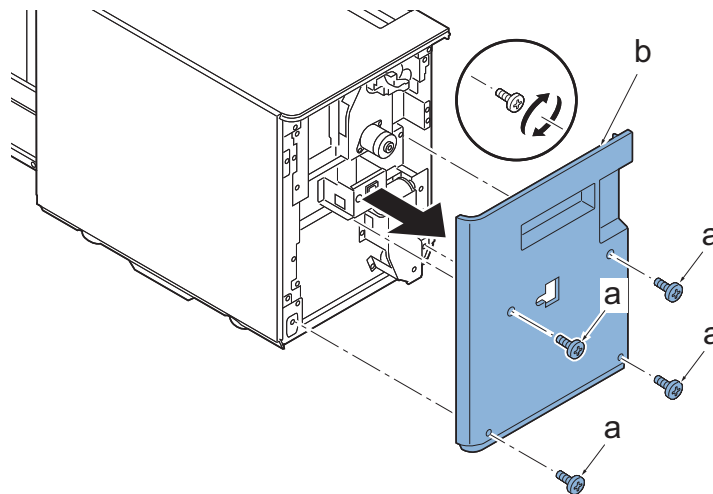
Screws (M3x8 with the binding head) 2 pcs

\*1 Wire saddles 1 pc is not used.

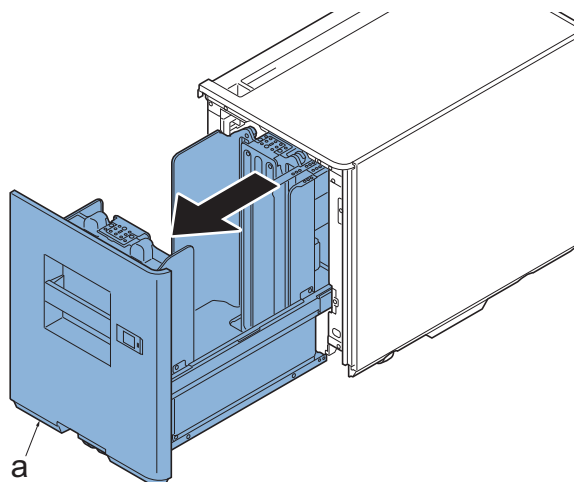


### Procedures: (Side Paper Feeder side)

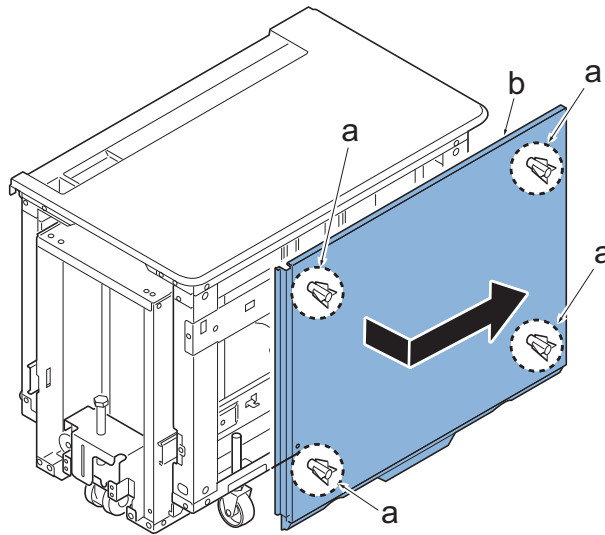
- 1 Turn the power switch off and disconnect the power plug.
- 2 Remove the connector of the paper feeder at the main unit side.
- 3 Remove four screws (a) (M3x8) and then remove the rear cover (b).



- 4 Pull out the cassette (a),

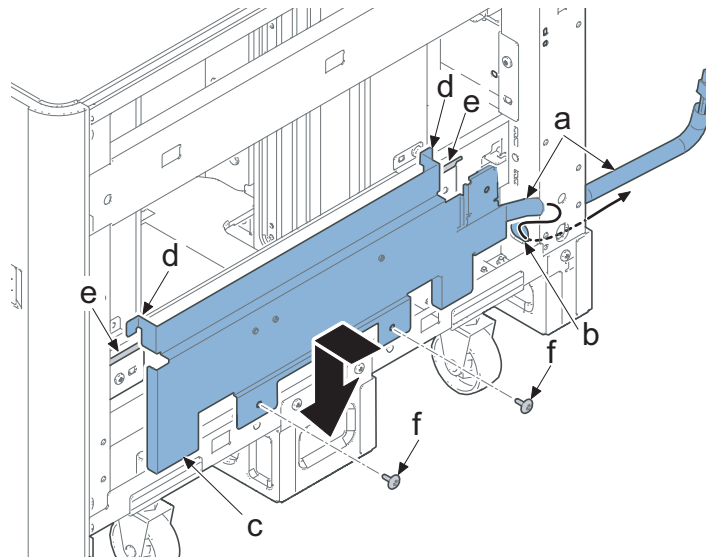


- 5** Release four bosses (a) and remove the right cover (b) while sliding it in the direction of the arrow.

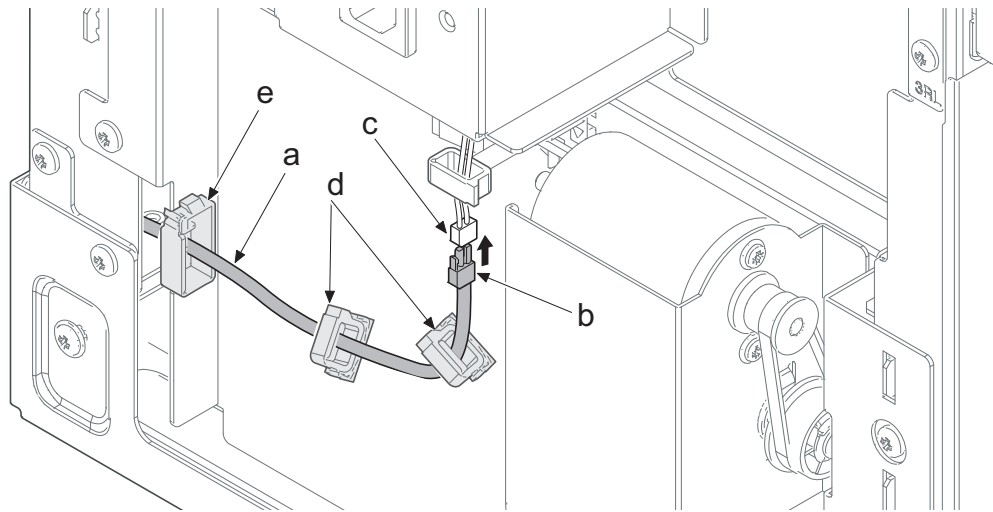


- 6** Pass the heater cassette cable (a) through the aperture.

- 7** Insert the hook (d) of the cassette heater set (c) into two slits (e) and secure it with two screws (M3×8) (f).



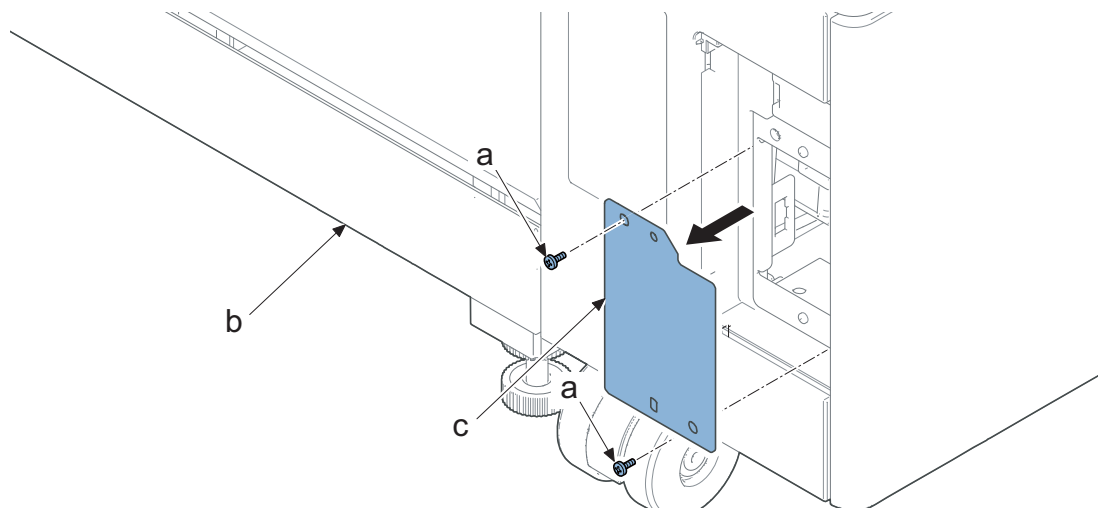
- 8 Connect the connector (b) of cassette heater wire (a) to the connector (c) of the inlet cable.
- 9 Attach two wire saddles (d) and the edge saddles (e) and secure the wire.
- 10 Attach the right cover and the rear cover.



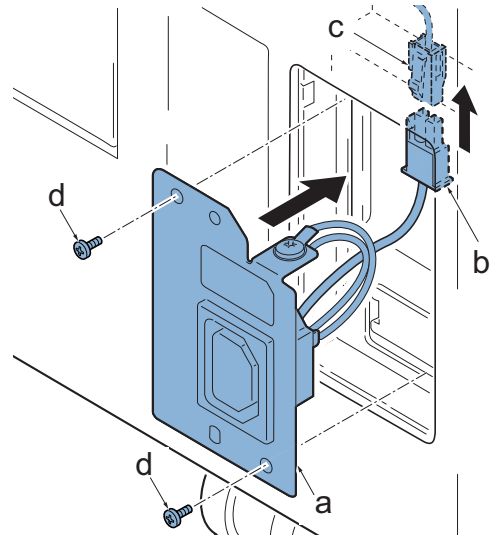
**(Main unit side)**

- 11 Remove two screws (a) (M3×8) and remove the cover plate (c) from the main unit side paper feeder (b).

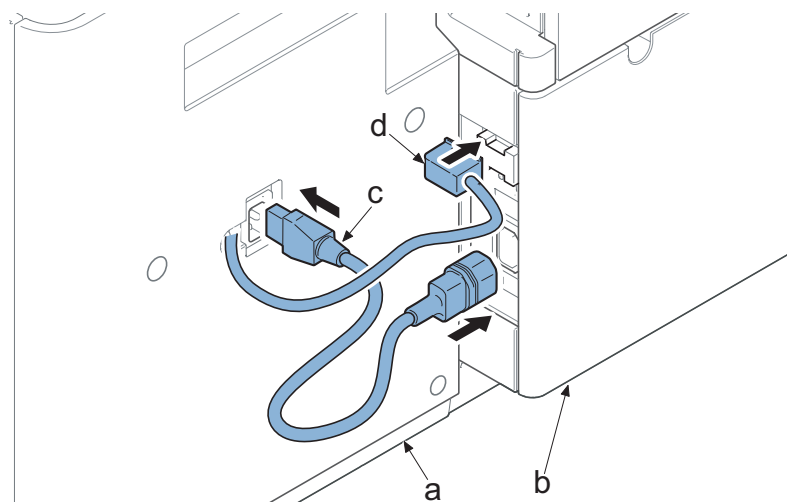
Figure 2-2



- 12** Connect the connector (b) of the heater outlet set (a) to the paper feeder side connector (c).
- 13** Attach the heater outlet set (a) with two screws (d) (M3×8).



- 14** Connect the side feeder (a) to the main unit side paper feeder (b) with the AC cord (c) and the connector wire (d)



- 15** Reattach the parts in the original position.
- 16** Turn the power on and set to [mode1/mode2] In maintenance mode U327 [Cassette heater control setting].

**IMPORTANT**

When connecting the cassette heater, do not unplug the power cord. (Power is supplied when the power is switched off)

**(10) In the case of side multi tray (PF-7130)**

**Cassette heater installation requires the following parts:**

Cassette heater 100 set (303NG9407\_) 1 pc

Cassette heater 120 set (303NG9408\_) 1 pc

Cassette heater 240 set (303NG9409\_)

### Bundled parts of cassette heater 100/120/240 set

Cassette heater 100 1 pc

Cassette heater 120 assembly

Cassette heater 240 assembly

Heater outlet assembly 1pc

AC cord 1pc

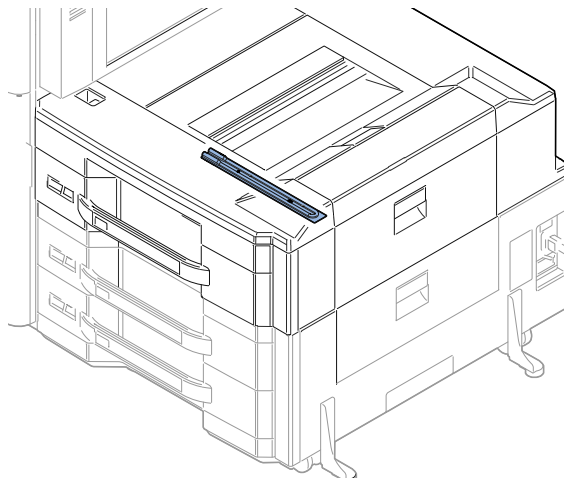
Wire saddles \*1 4 pcs

Edgings 1pc

Screws (M3x8 S-tite) 2 pcs

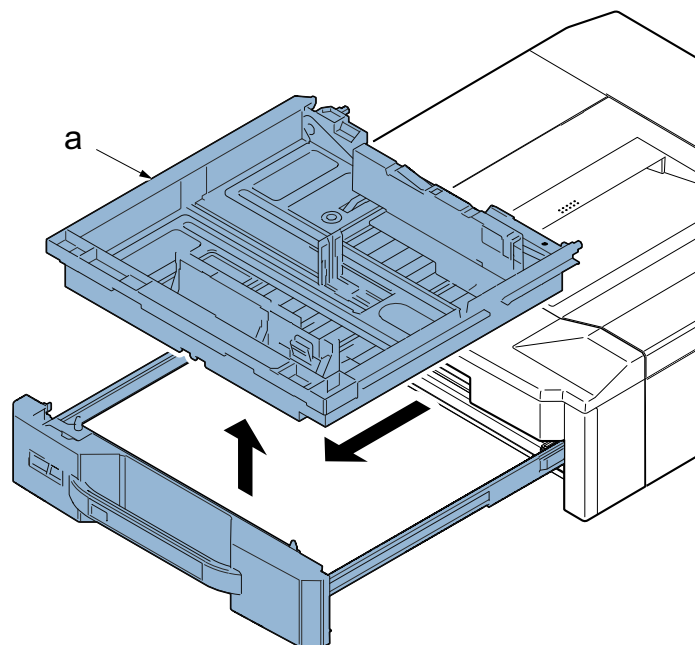
Screws (M4x8 S-tite) 2 pcs

\*1 Wire saddles 1 pc is not used.

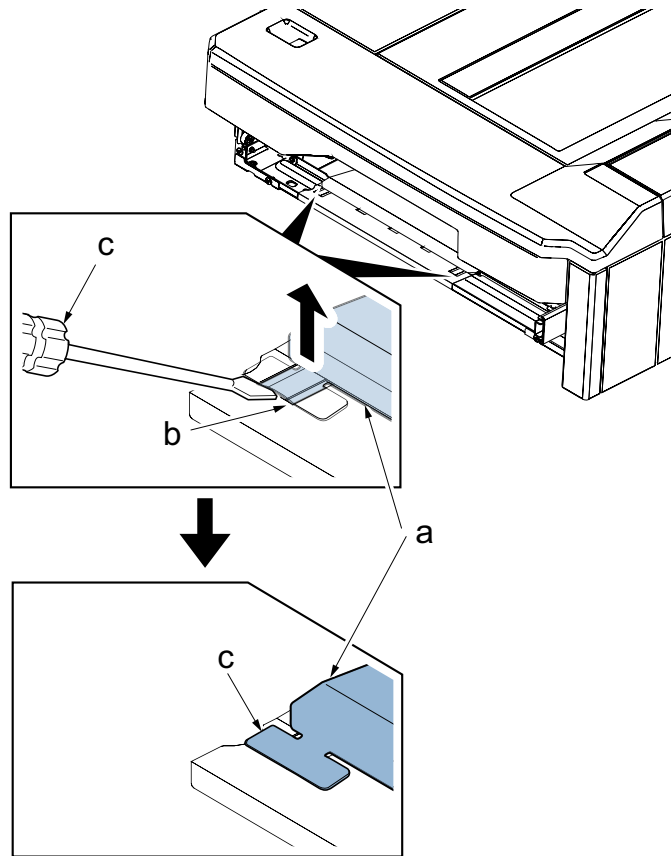


### Procedures: (Side multi tray side)

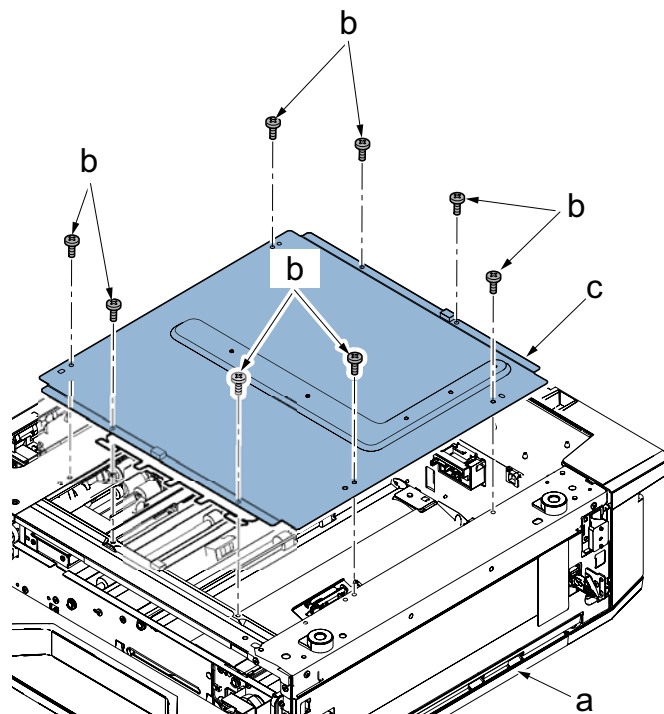
- 1 Pull out the cassette (a) and remove it in the direction of the arrow.



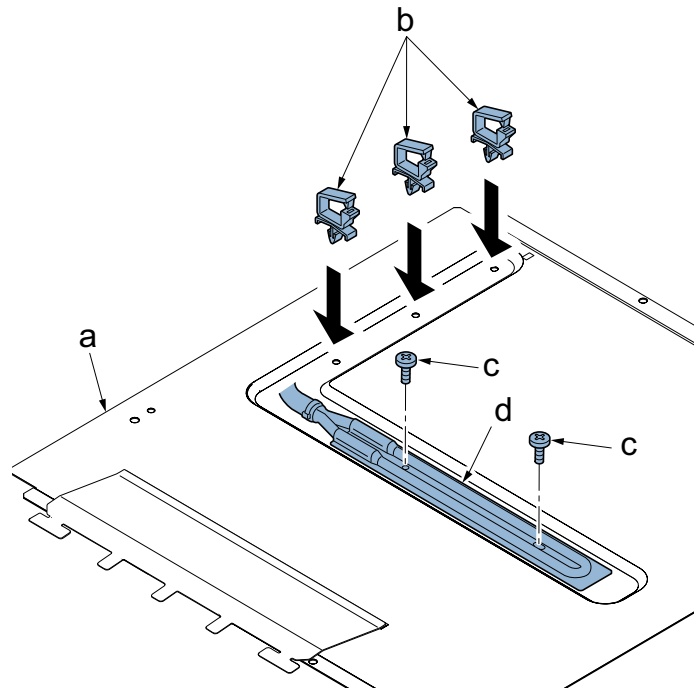
- 2 Insert the flathead screwdriver (c) into two inlays (b) (Left/Right) of the frame film A (a), and then detach to lift the claw to the top.
- 3 Remove four screws and then remove the rear cover.



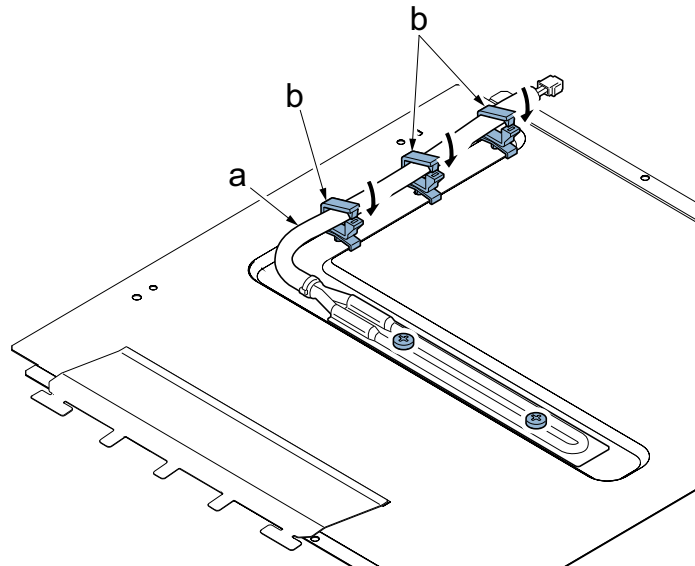
- 4 Reverse upper and lower parts of side multi tray (a).
- 5 Remove the four screws (b) (M3×8) and detach the right cassette (a).



- 6 Inside out the bottom frame (a) and reattach three wire saddles (b).
- 7 Reattach the cassette heater (d) with two screws (c) (M3×8).

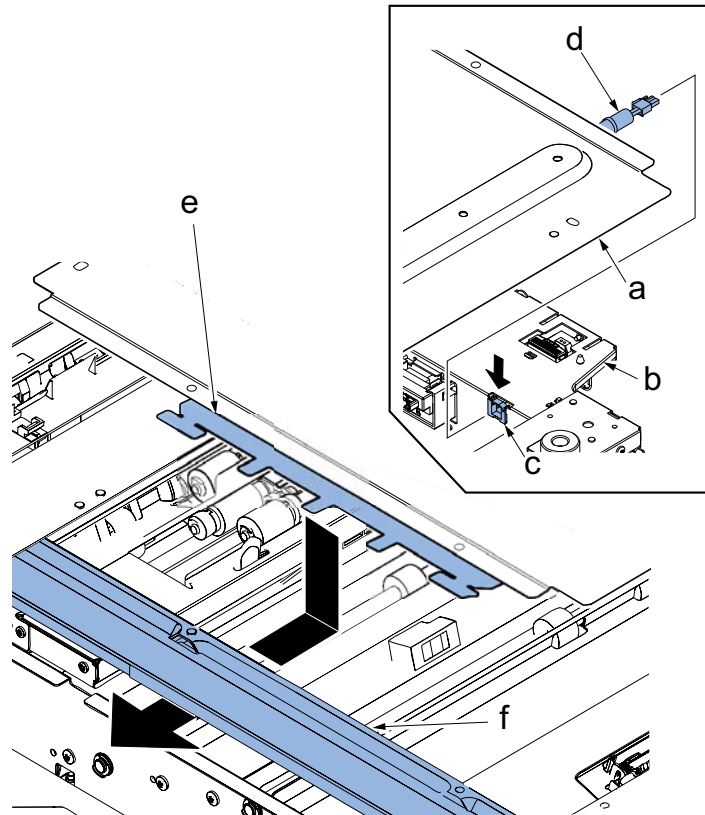


- 8 Pass through the cassette heater wire (a) in three wire saddles (b).

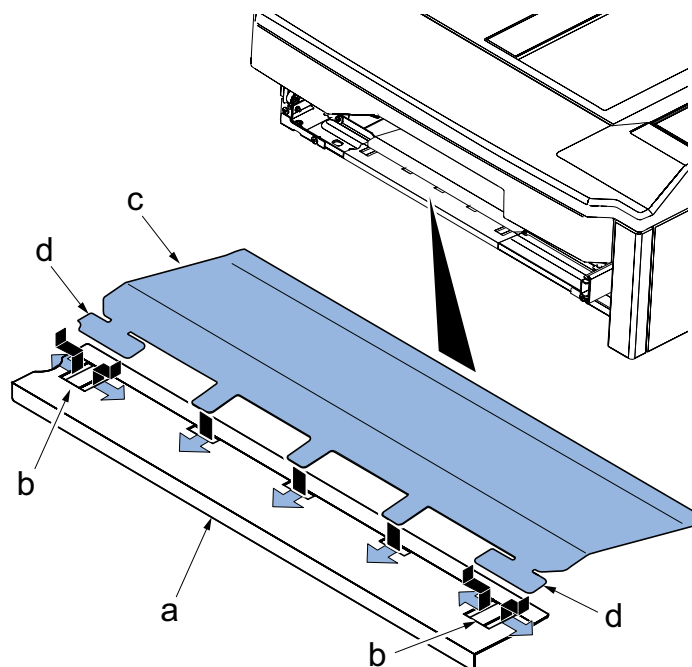




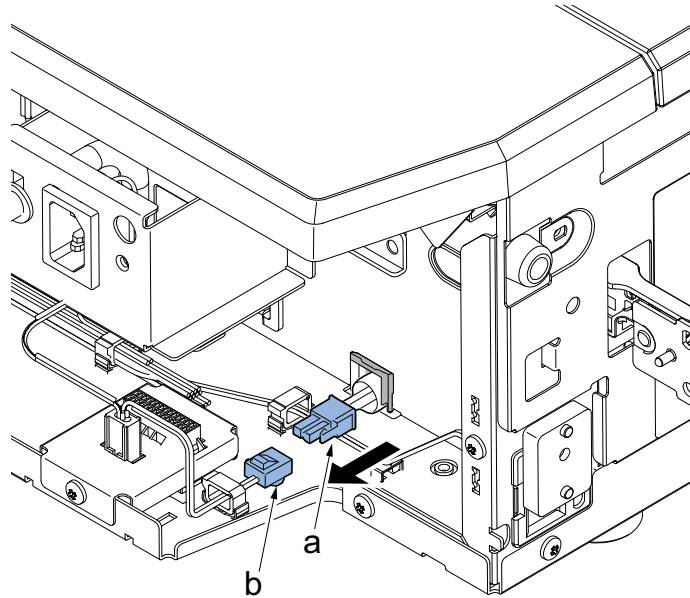
- 9 Inside out the bottom frame (a), reattach the edging saddle (c) to the rear frame (b) and then pass through the cassette heater wire (d).
- 10 Reattach the bottom frame (a) in the original position.
- 11 Do not insert the frame film A (e). Pass through the lower side of the stay frame (f).



- 12 Reverse upper and lower parts of side multi tray.
- 13 Insert the claw (d) of the frame film A (c) into the aperture (b) of the frame film B (a).

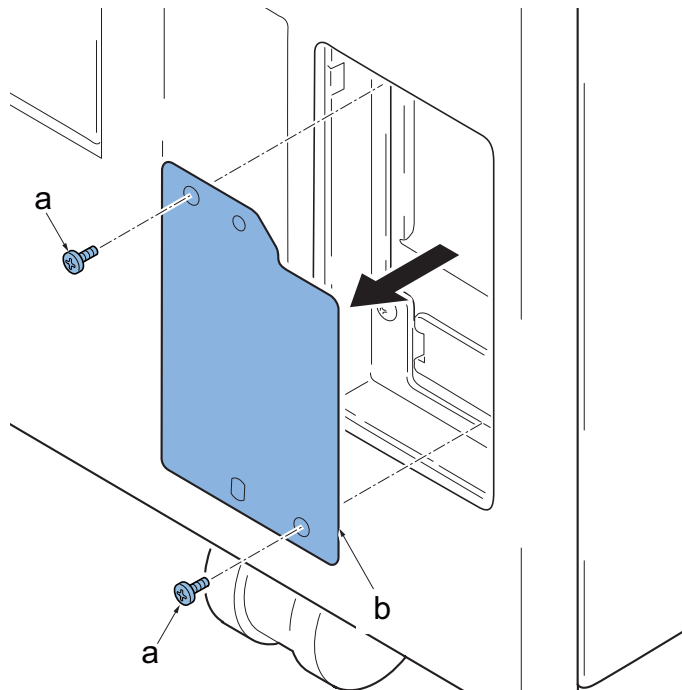


- 14 Insert the connector (a) of the cassette heater into the main unit PF side of connector (b).
- 15 Reattach the rear cover and the cassette in the original position.

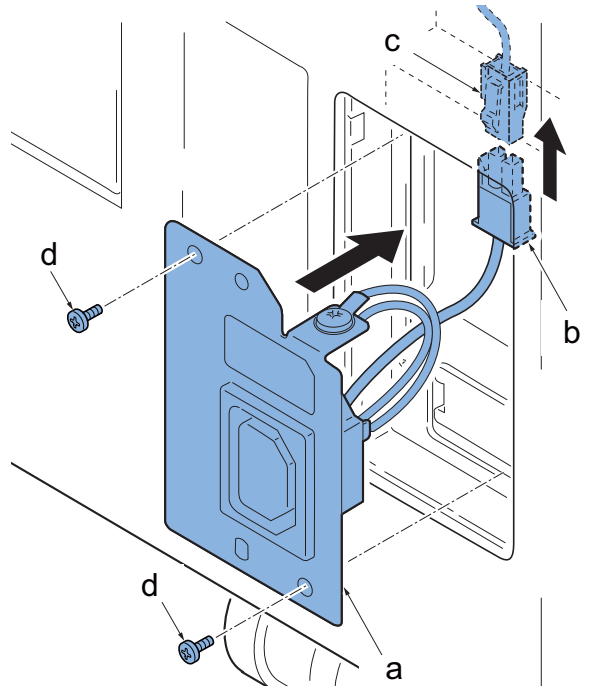


(Main unit paper feeder side)

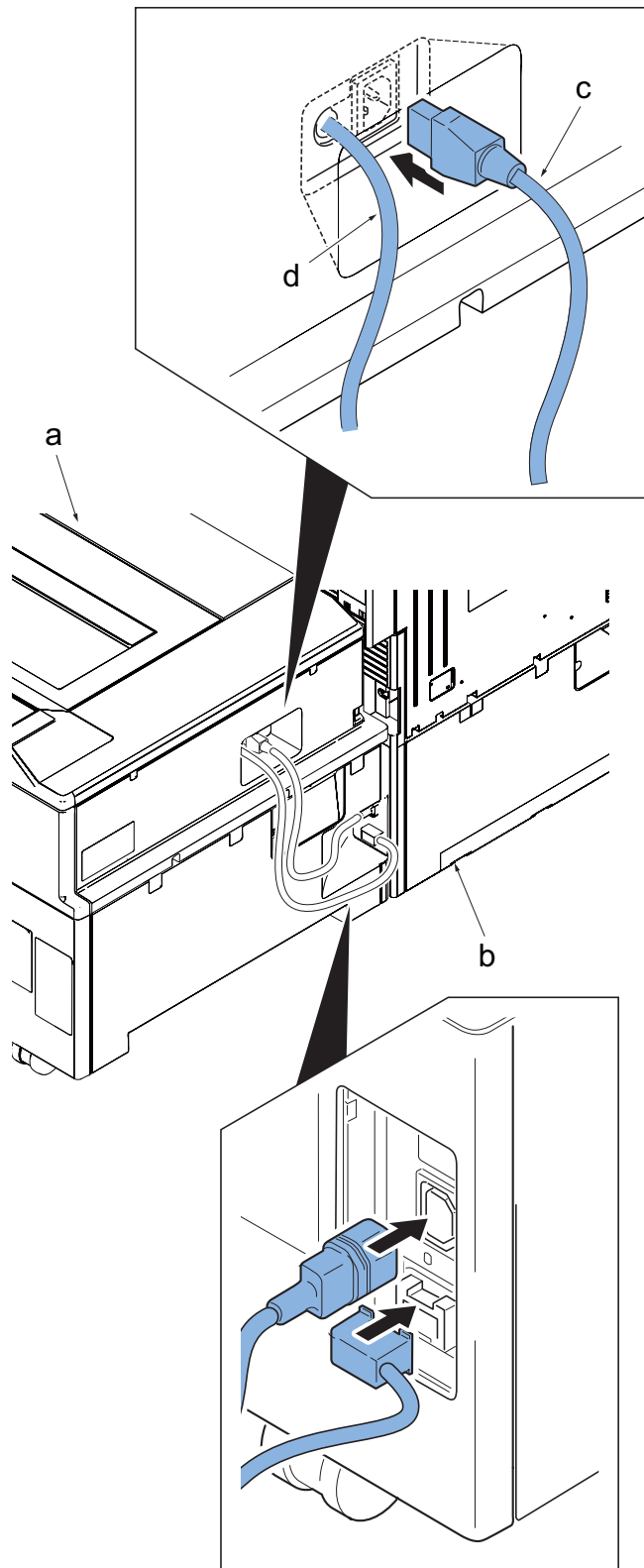
- 16 Remove two screws (a) (M4×8) and remove the cover plate (b) from the main unit side paper feeder.



- 17 Connect the connector (b) of the heater outlet assembly (a) to the paper feeder side connector (c).
- 18 Reattach with two screws (d) (M4×8) which is detached the heater outlet assembly (a).



- 19 Connect to the side multi tray (a) and the main unit side paper feeder (b) with the AC cord (c) and the connector wire (d).
- 20 Turn the power on and set to [mode1/mode2] In maintenance mode U327 [Cassette heater control setting].



**IMPORTANT**

**✔ IMPORTANT**

When connecting the cassette heater, do not unplug the power cord. (Power is supplied when the power is switched off)

**(11)Coin Vendor (100V model only)****Coin vendor installation requires the following parts:**

Coin Vendor (1905H99JP0) 1 pc

Vendor relay wire (302RH4622\_) 1 pc

**Bundled parts of Coin Vendor (1905H99JP0)**

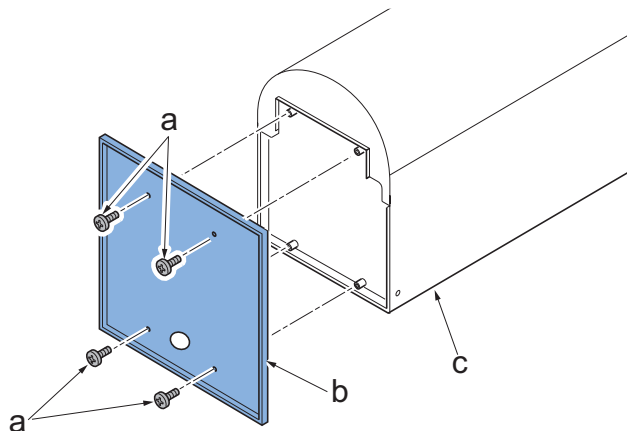
Vendor wire 1 pc

Vender base 1 pc

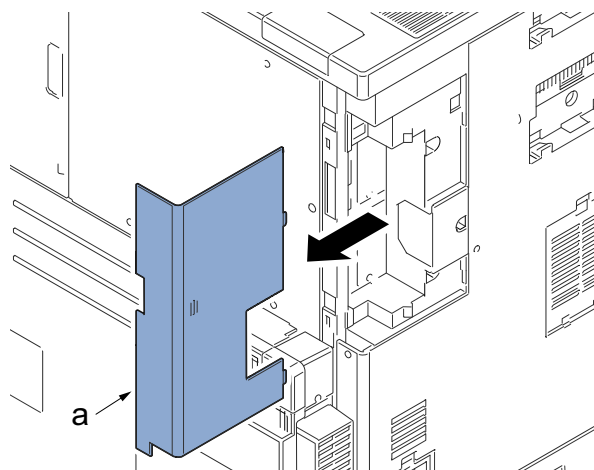
Screws (M4x6) 4 pcs

**Procedures**

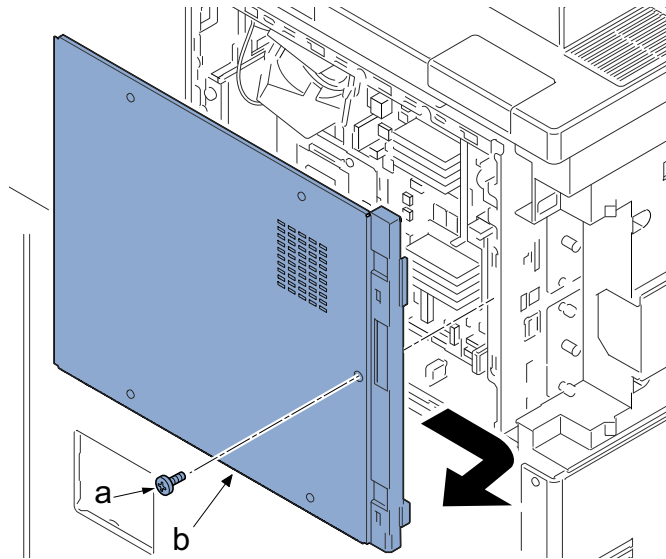
- 1 Turn the power switch off and disconnect the power plug.
- 2 Attach the vendor base (b) to coin vendor (c) with four screws (a) (M4x6).



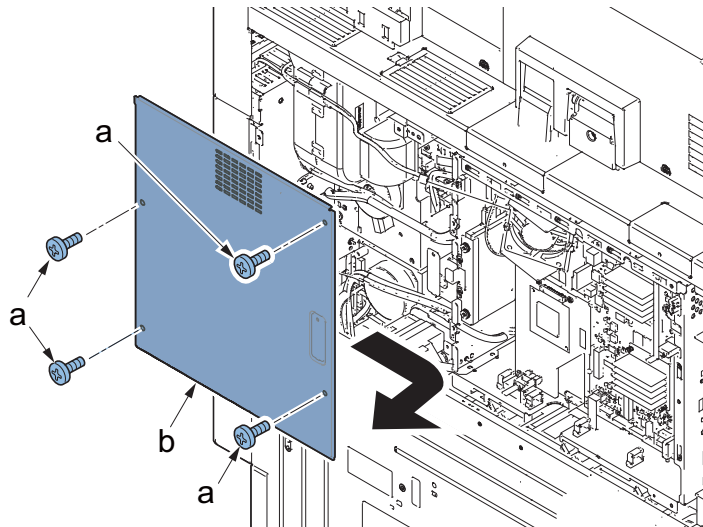
- 3 Slide the controller cover (a) in the direction of the arrow and detach it.



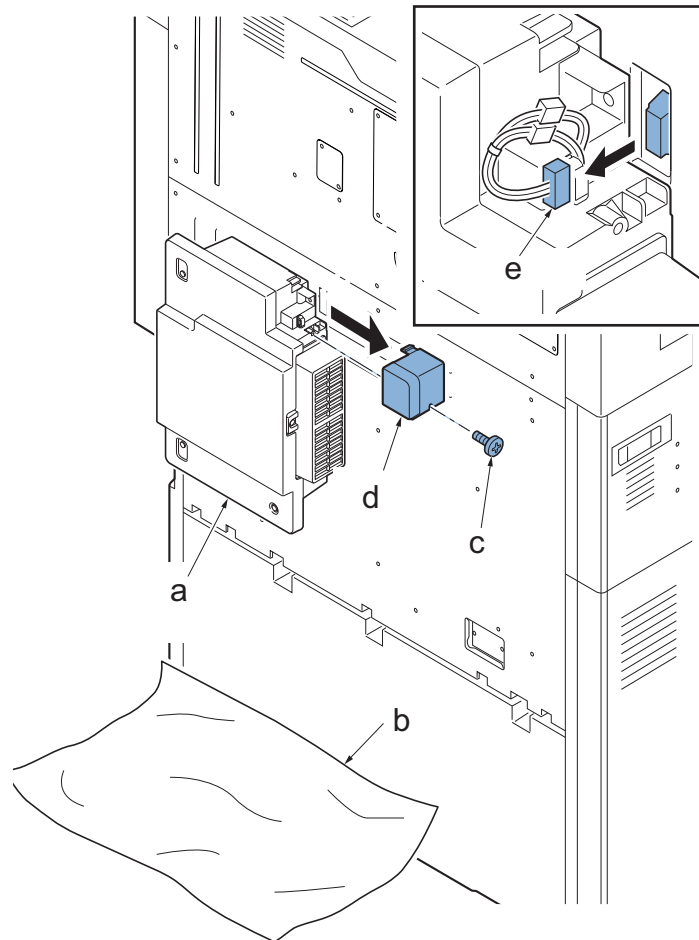
- 4** Remove one screw (a) (M3x8) And then remove the left rear cover (b) by sliding in the direction of the arrow.



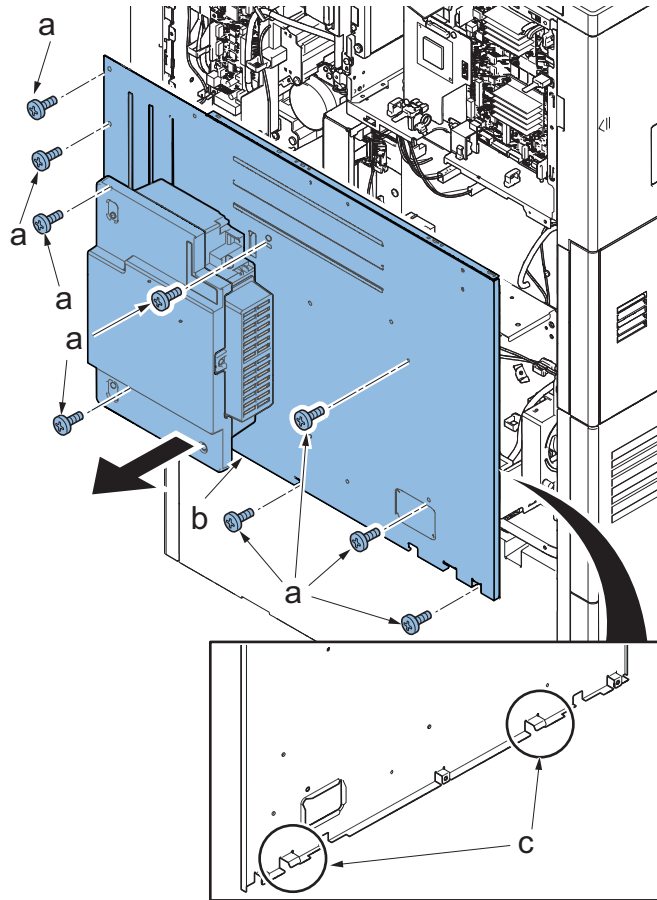
- 5** Remove four screws (a) (M3x8) and the detach right rear cover (b) in the direction of the arrow.



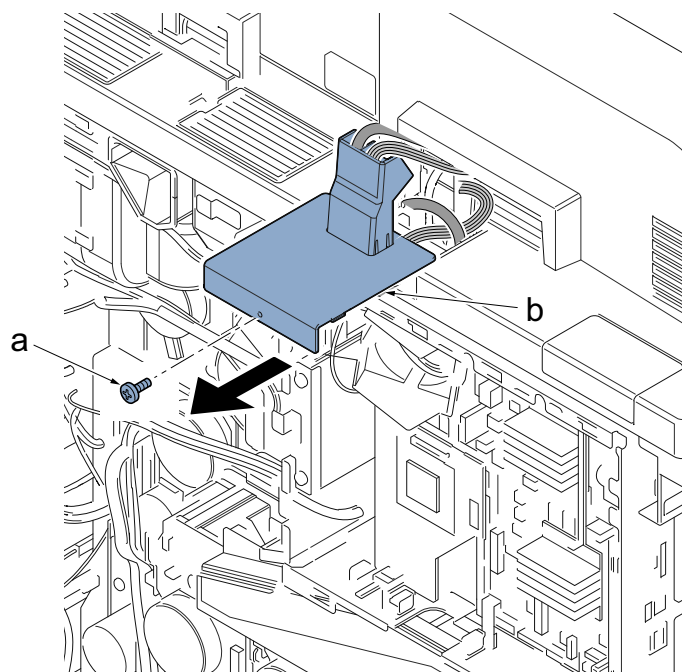
- 6 Due to the prevention of floor dirty and damage by toner falling, the sheet (b) is laid under the toner collection box (a).
- 7 Remove one screw (c) (M3×8) and detach the cable cover (d).
- 8 Detach one connector (e).



- 9 Remove nine screws (a) (M3x8).
- 10 Detach the lower side of two hooks (c) and detach the lower rear cover (b) in the direction of the arrow.

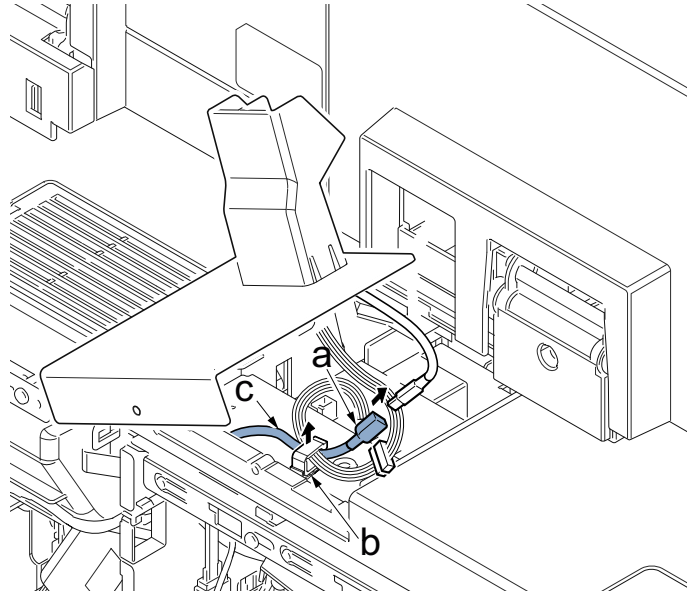


- 11 Remove one screw (a) (M3x8) and detach the DPIF lid (b).

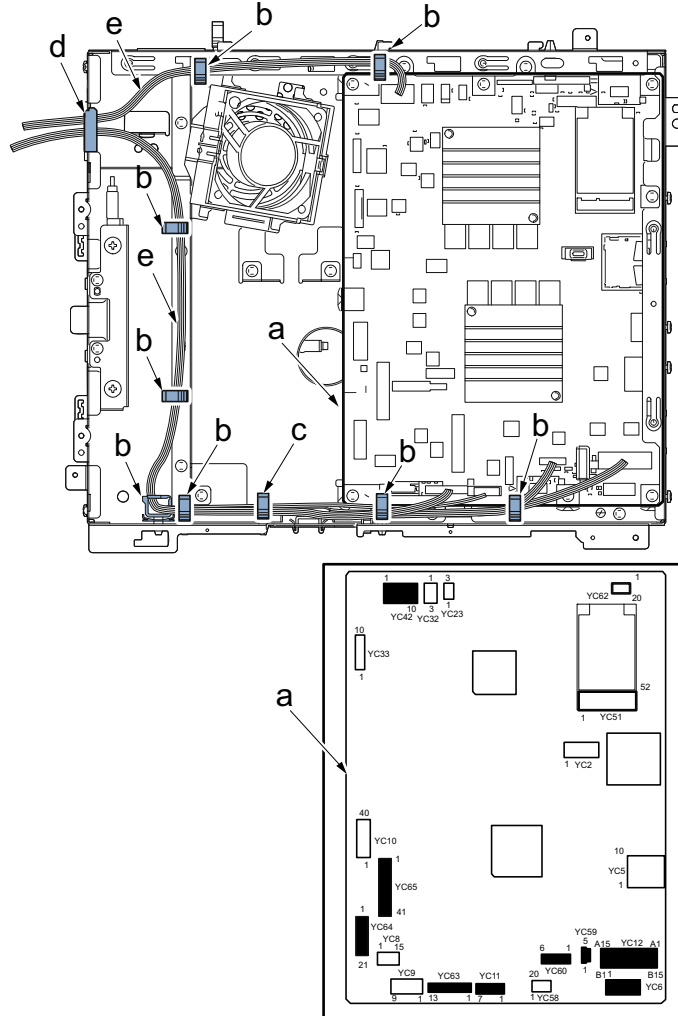




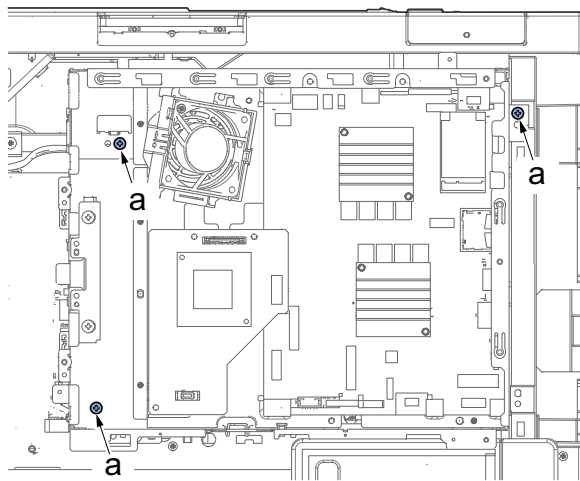
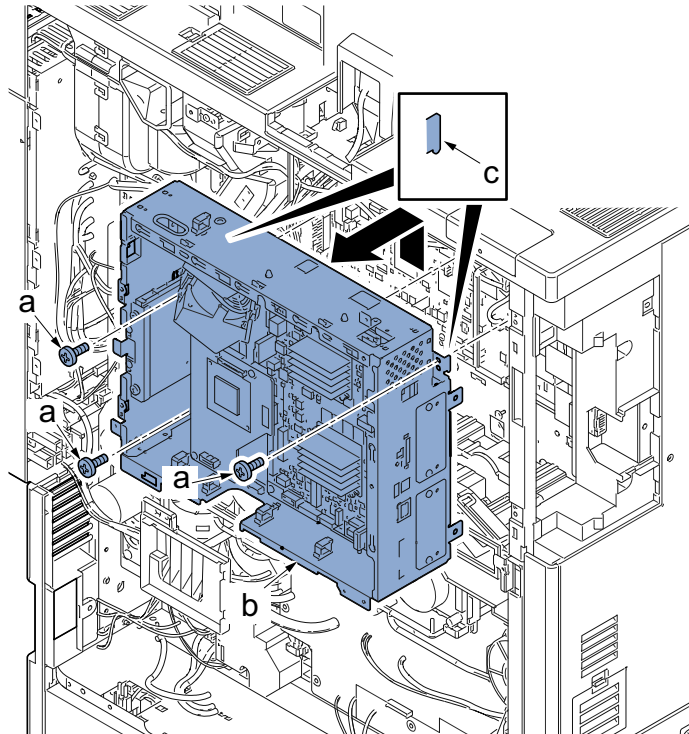
**12** Detach one connector (a), release the wire saddle (b) and then remove the wire (c).



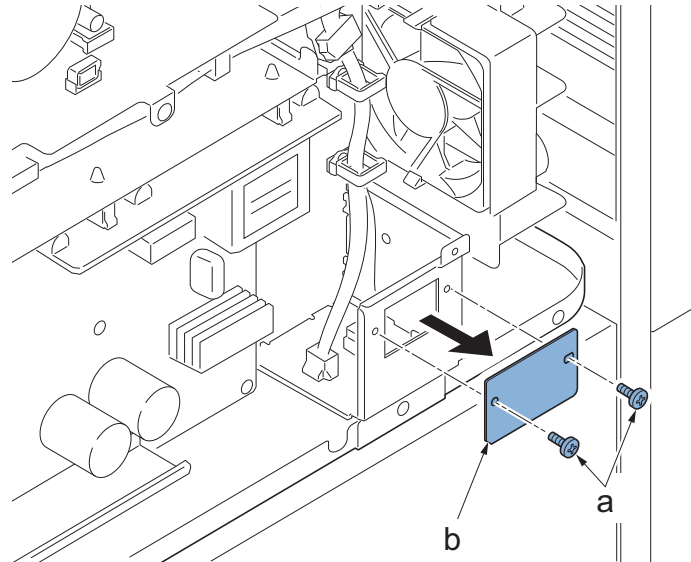
- 13 Detach nine connectors from the main PWB (a).
- 14 Release eight wire saddles (b) and then remove the wire (e).
- 15 Remove the banding (c) with a snap.
- 16 Release the edge saddle (d) and then pull out the wire (e).



- 17 Remove three screws (a) (M4x8) and then detach the controller box (b).
- 18 Release to lift the hook (c).
- 19 When IB-35 is equipped, detach it.



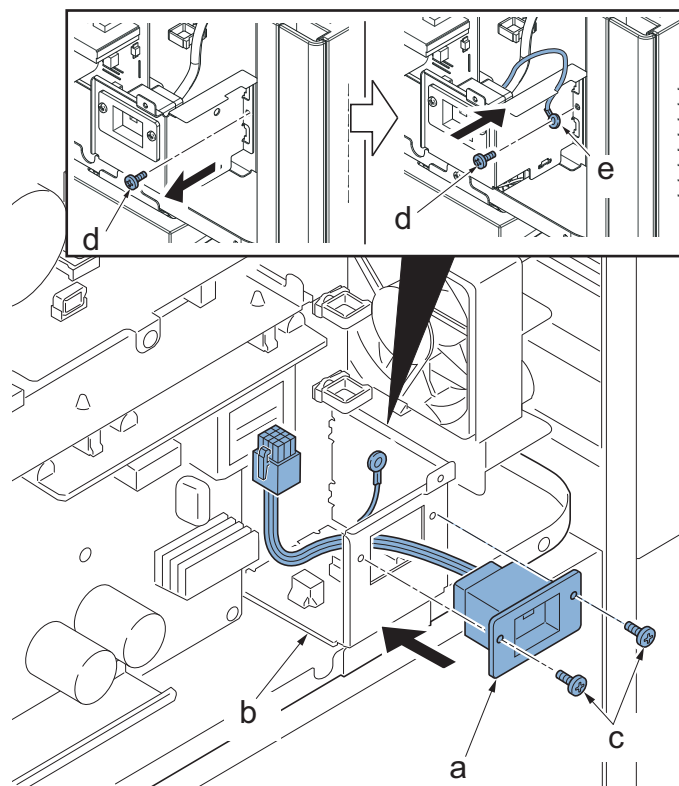
**20** Remove two screws (a) (M3×8) and remove the concealing lid (b).



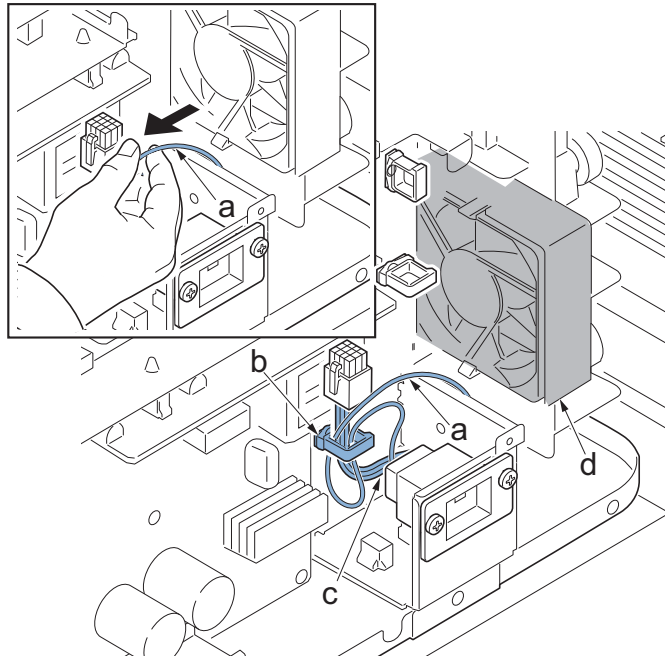
**21** Pass the vendor wire (a) through the aperture of IF mount (b).

**22** Secure the vendor cable (a) with two screws (c) once removed in step 19.

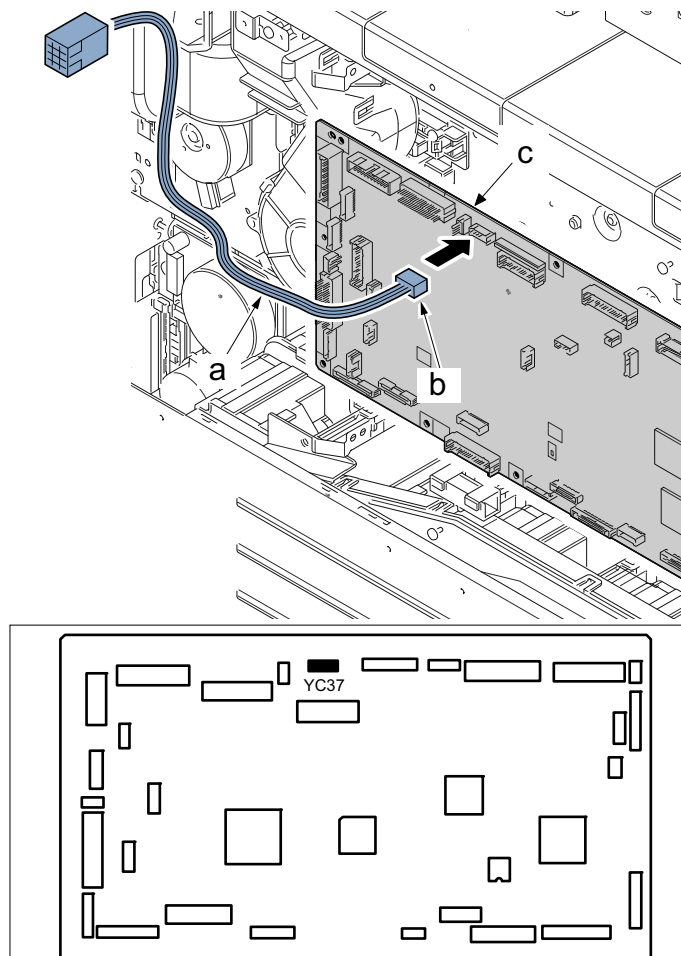
**23** Remove one screw (d) (M3×8) and fasten the earth terminal (e) of the vendor wire.



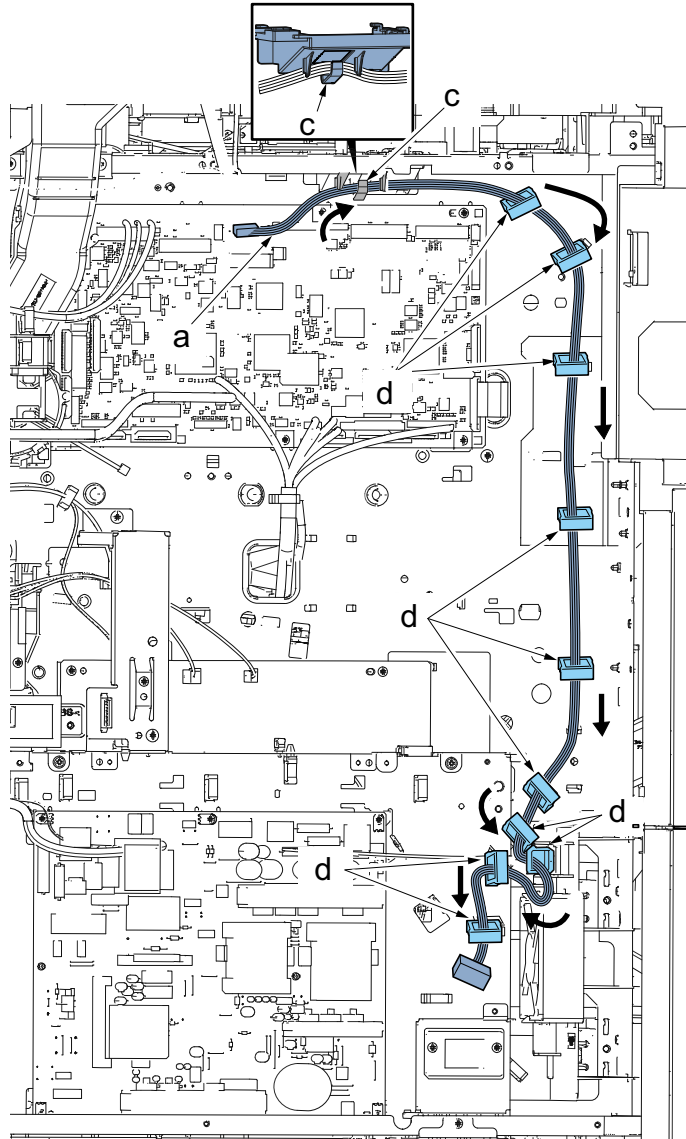
- 24** Pull the earth wire (a) to the side of the wire saddle (b), bundle the extra, fix in the wire saddle (b) with the vendor wire (c).
- 25** Line process so that the earth wire (a) does not touch the fan motor (d).



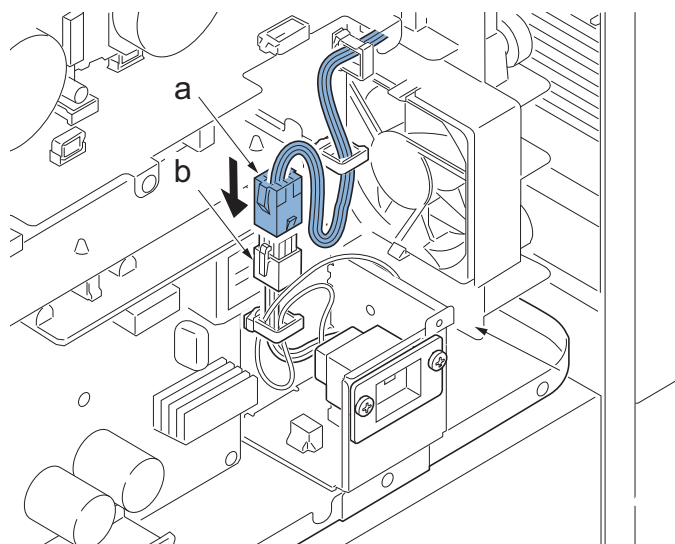
- 26** Connect the connector (b) of the vendor relay wire (a) to YC37 of the engine PWB (c).



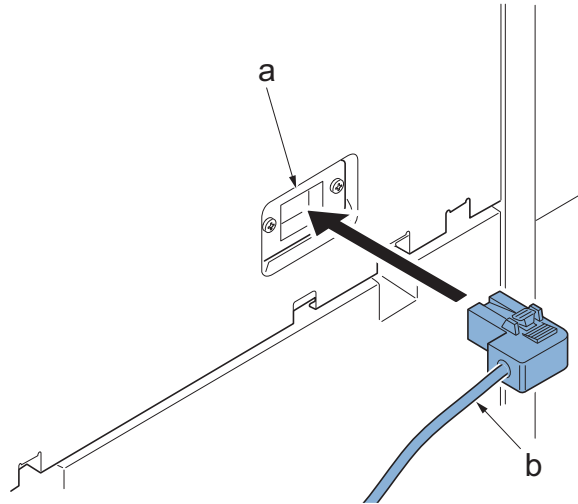
**27** Pass the vendor relay wire (a) in a wire guide (c) and ten wire saddles (d) and then fix it.



**28** Connect the connector (a) of the vendor relay wire to the vendor wire (b).



- 29 Reattach the controller box in the original position.
- 30 Attach the lower rear cover, the right rear cover and the left rear cover in the original position.
- 31 Reattach the controller cover in the original position.
- 32 Connect the signal wire (b) of the coin vendor to the connector (a) of the vendor wire.



- 33 Turn the power switch on and enter the maintenance mode.
- 34 Execute maintenance mode U206 and then set [Coin vendor attachment]. Execute continuously each setting in detail.
- 35 Exiting from the maintenance mode.

## (12)Banner Tray

Installation of banner tray requires the following parts:

Banner Guide 10 (1203RP0UN0) 1 pc

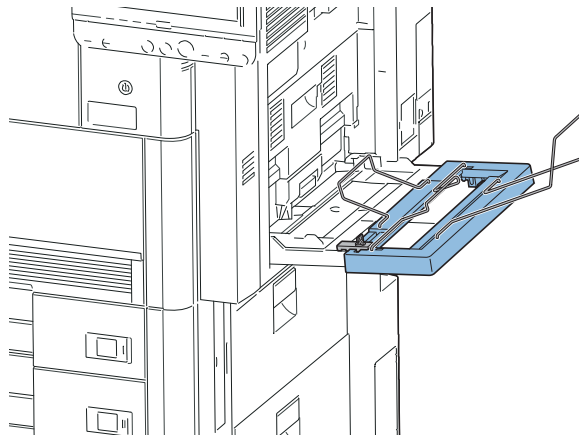
### Bundled parts of Banner Guide 10 (1203RP0UN0)

Tray base 1 pc

paper guide A 1 pc

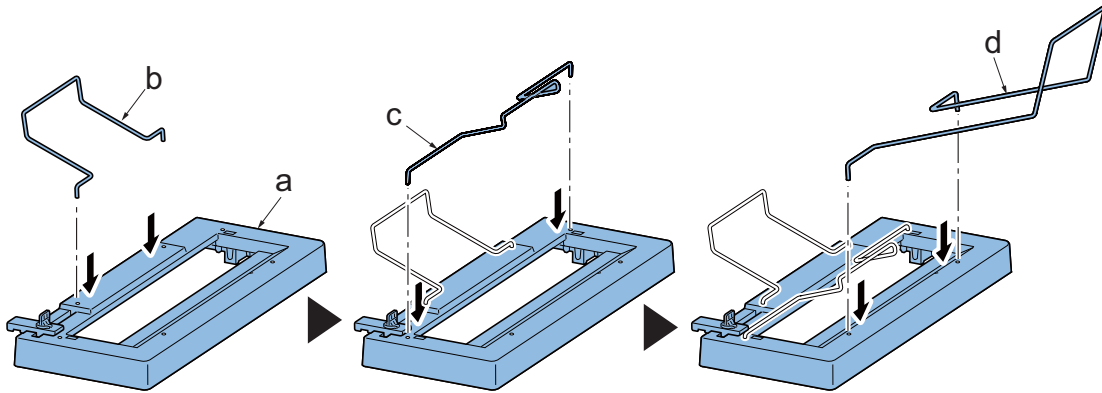
paper guide B 1 pc

paper guide C 1 pc

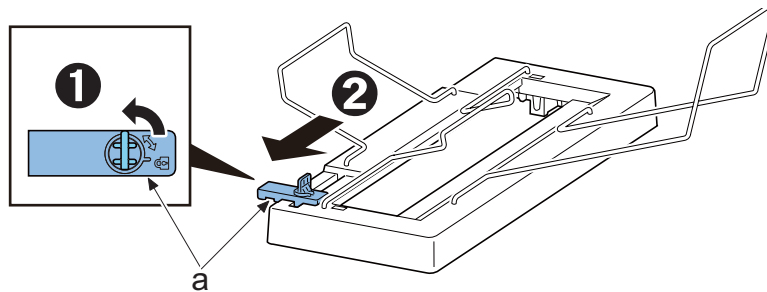


## Procedures

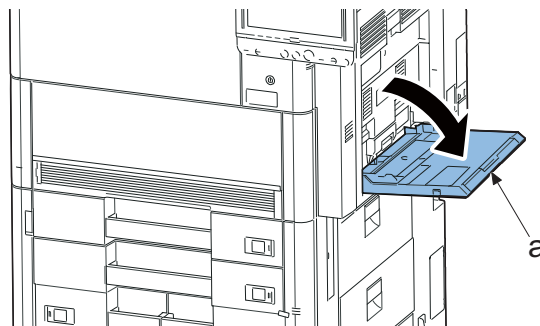
- 1 Attach the paper guide A (b), the paper guide B (c) and the paper guide C (d) to the tray base (a).



- 2 Unlock the stopper (a) and move it outward.

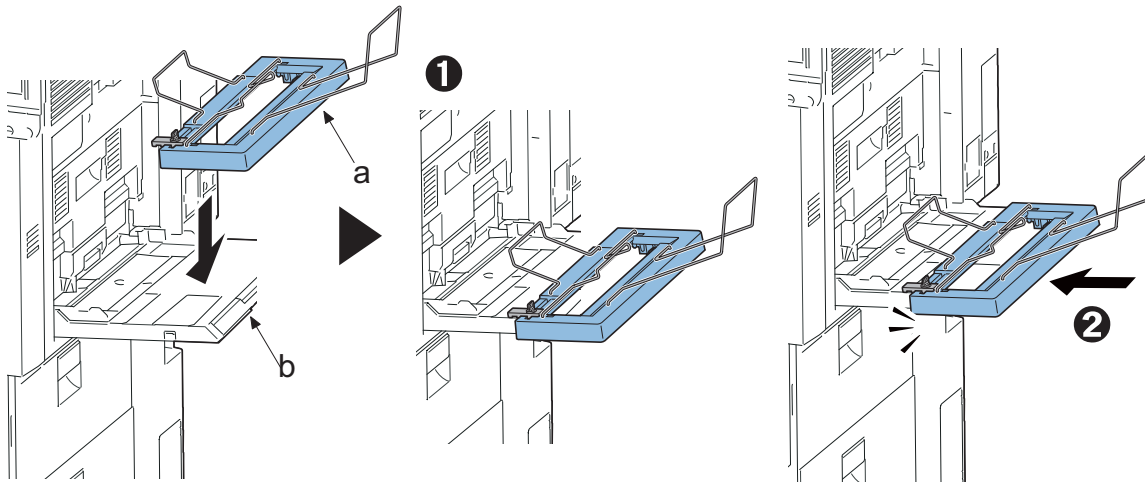


- 3 Open the multi purpose tray (a).





- Put the banner tray (a) on the MP tray (b) and attach sliding in the direction of the arrow till locking.



## 2-4 About Optional Applications

Application		
Data Security Kit		Internet FAX kit
Card Authentication Kit*1		Emulation upgrade kit
ThinPrint Option*1		

\*1: This can be used on a trial basis for a limited time.

Restrictions such as the number of times the application can be used during the trial period differ depending on the application.

If you change the date/time while using the trial version of an application, you will no longer be able to use the application.

### Starting Use of an Application

Use the procedure below to start using an application.

- Select [System Menu/Counter] key > [System/Network] > [Optional Function].

**NOTE**

If the user authentication screen is appeared, enter your login user name and login password and select [Login]. Login with administrator privileges. The factory default login user name and login password are set as shown below.

Model Name	70 ppm model	80 ppm model	90 ppm model
Login User Name	7000	8000	9000
Login Password	7000	8000	9000

- Select the desired application to start use and select [Activate].

You can view detailed information on the selected application by selecting [] or [Details].

Item
Function
License
Trial Counts
Date of Trial
Status

### 3 Select [Official] and enter a license key.

Some applications do not require you to enter a license key. If the license key entry screen does not appear, go to Step 4. To use the application as a trial, select [Trial] without entering the license key.

### 4 Select [Yes] in the confirmation screen. Icons of activated application are displayed in the Home screen.

#### Note

If you started the Security Kit or Thin Print option and entered the license key, turn the power OFF/ON. Icons of activated application are displayed in the Home screen.

## 2-5 Initializing procedures after installing the FAX system

### 1 Connect the power plug of the main unit to the outlet and turn the power on.

### 2 Input "10871087" using the numeric keys to enter the maintenance mode.

### 3 Input "600" using the numeric keys and press the [Start] key.

### 4 Select [Country Code] and enter a destination code using the numeric keys.

Refer to the following destination code list.

### 5 Select [Execute].

### 6 Press the [Start] key to start data initialization.

Press the [Stop] key to cancel the data initialization.

#### Destination code list

Destinati on code	Destination	Destinati on code	Destination
000	Japan	253	CTR21 (European nations)
009	Australia	↑	Italy
126	New Zealand	↑	Germany
156	Pan-Asia	↑	Spain
↑	Singapore	↑	U.K.
↑	India	↑	Netherlands
↑	Thailand	↑	Sweden
↑	Hong Kong	↑	France
↑	Indonesia	↑	Austria
↑	Malaysia	↑	Switzerland
↑	Philippines	↑	Belgium

Destinati on code	Destination	Destinati on code	Destination
181	North America	↑	Denmark
181	South America	↑	Finland
↑	Bolivia	↑	Portugal
↑	Chile	↑	Ireland
↑	Peru	↑	Norway
↑	Argentina	253	Israel
181	Brazil	253	Middle East
254	Taiwan	253	South Africa
097	Korea	253	Turkey
038	China	253	Russia

## 7 After completing installation, execute communication test to check if FAX normally operates.

### IMPORTANT

Note the following points when installing the FAX system in the line via ISDN or PBX.

Check if the line to connect supports the V.34 (Super G3) FAX communication.

Especially, when communicating between extensions in PBX (private line via TDM), only 14400bps or 9600bps of FAX communication speed is guaranteed and communication errors or TX/RX image failure may occur at V.34 communication in such a line.

### Corrective Measures

Set the following maintenance mode if the communication speed guaranteed on the line is 14400bps or less.

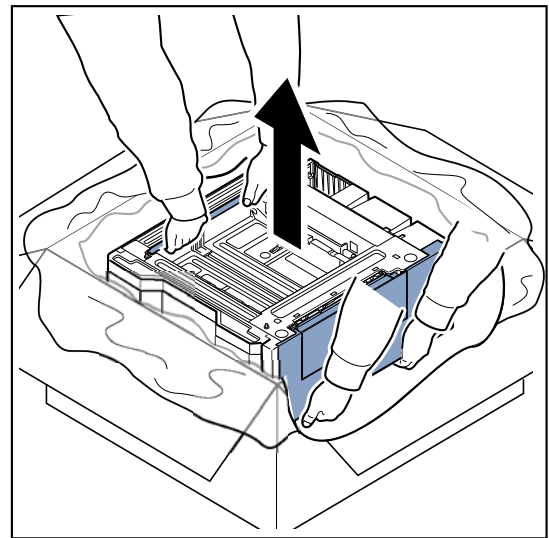
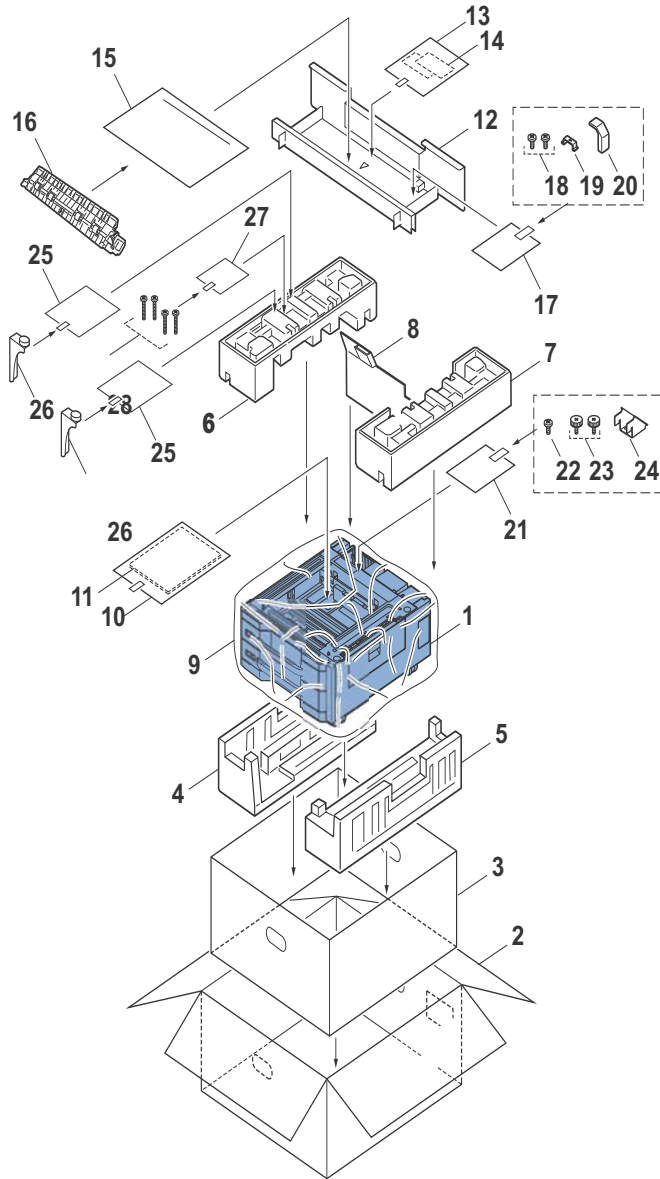
U633 [Enables or disables the V.34 communication]: Off (See [page 6-307](#))

U630 [Setting TX speed and RX speed] (See [page 6-302](#))

## 2-6 Installing the option unit

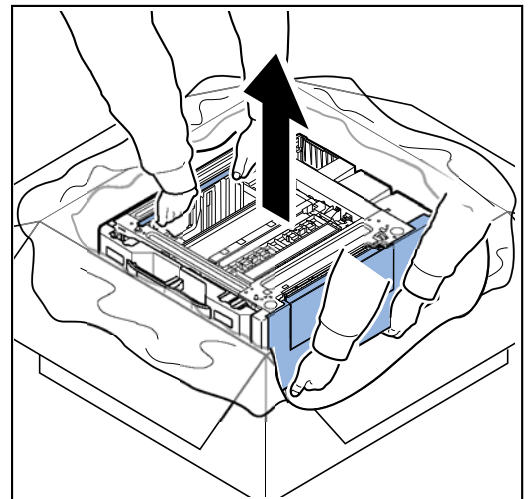
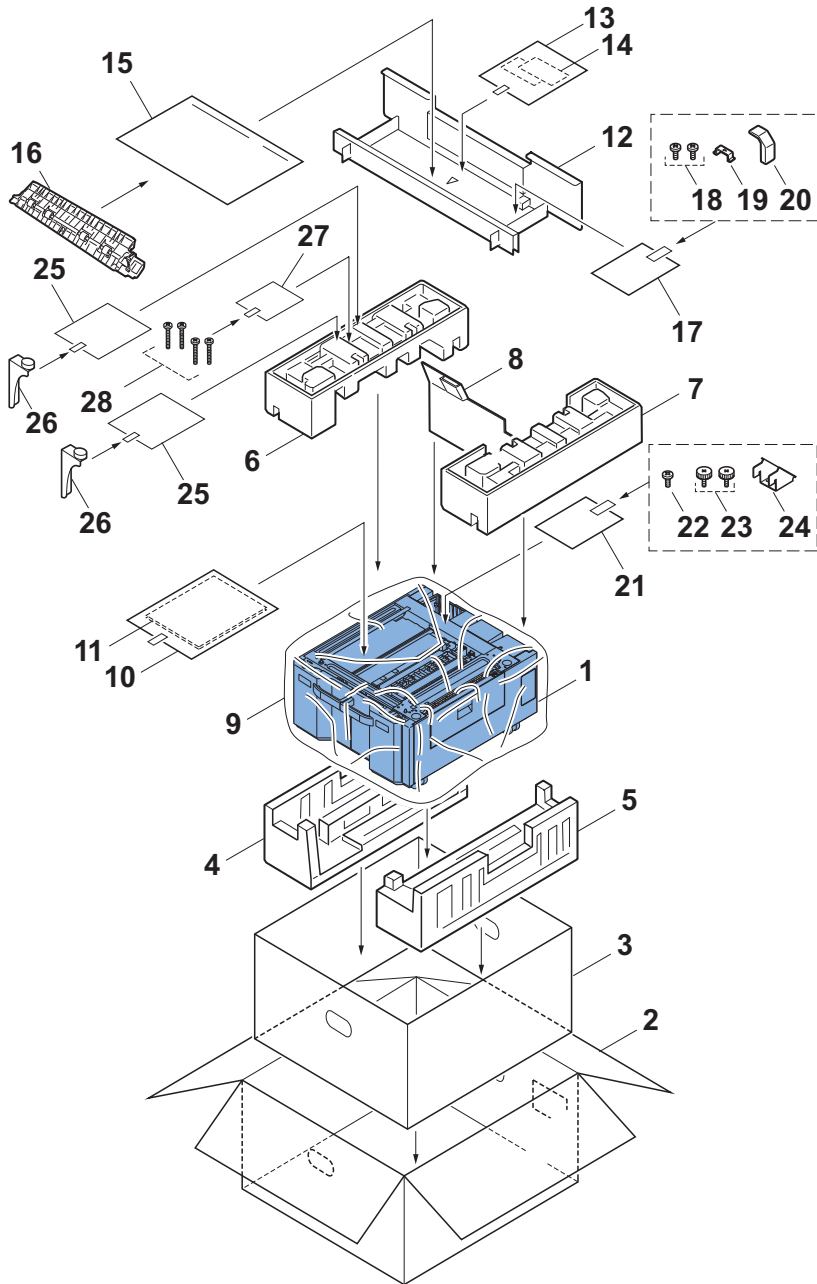
### (1) Unpacking and checking bundled items

#### (1-1) Paper Feeder (PF-730 (B))



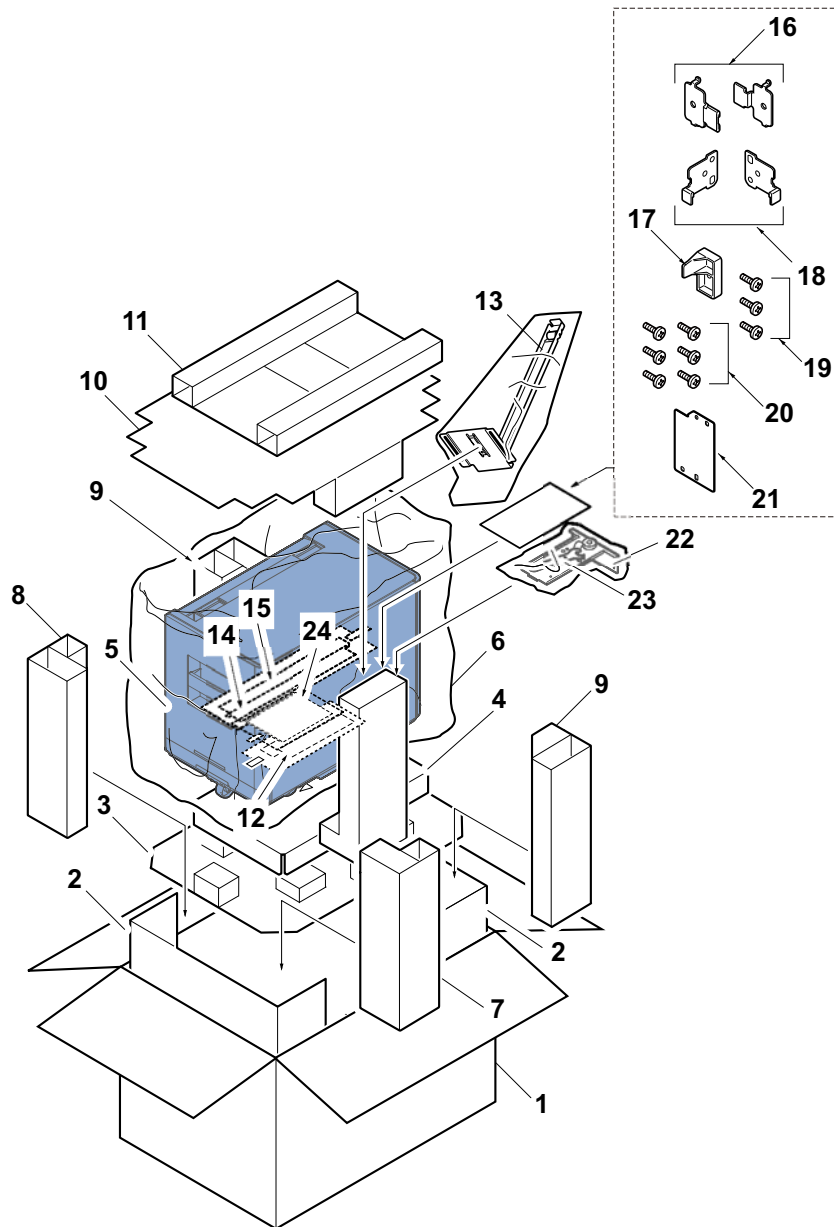
- |                            |                         |                          |
|----------------------------|-------------------------|--------------------------|
| 1 Main unit                | 7 Main unit cover       | 13 Front right upper pad |
| 2 Outer case               | 8 Size label            | 14 Rear right upper pad  |
| 3 Left bottom pad          | 9 Screw                 | 15 Support plate         |
| 4 Right bottom pad         | 10 Pin                  | 16 Screw                 |
| 5 Front of the inner frame | 11 Front left upper pad |                          |
| 6 Rear of the inner frame  | 12 Rear left upper pad  |                          |

**(1-2) Paper Feeder (PF-740 (B))**



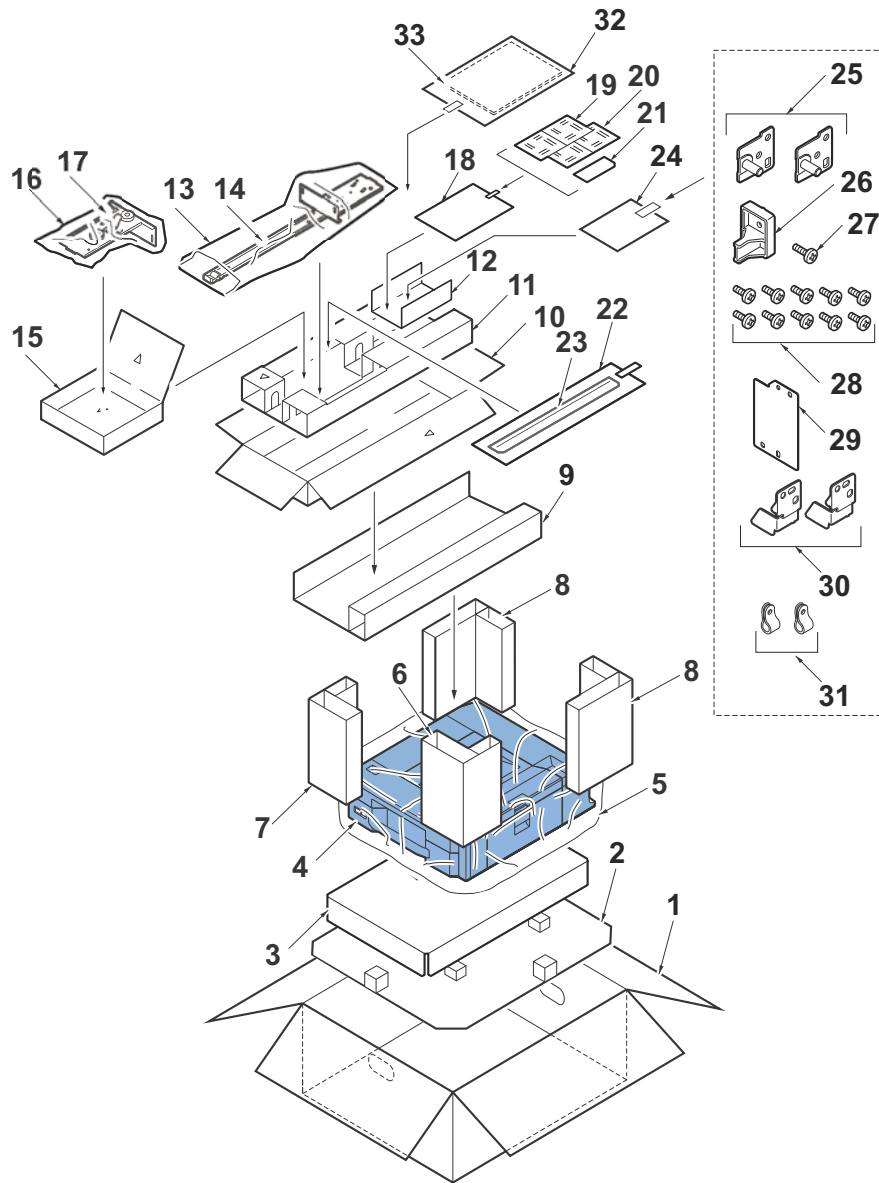
- |                            |                         |                          |
|----------------------------|-------------------------|--------------------------|
| 1 Main unit                | 7 Main unit cover       | 13 Front right upper pad |
| 2 Outer case               | 8 Size label            | 14 Rear right upper pad  |
| 3 Left bottom pad          | 9 Screw                 | 15 Support plate         |
| 4 Right bottom pad         | 10 Pin                  | 16 Screw                 |
| 5 Front of the inner frame | 11 Front left upper pad |                          |
| 6 Rear of the inner frame  | 12 Rear left upper pad  |                          |

**(1-3) Side Paper Feeder (PF-7120)**



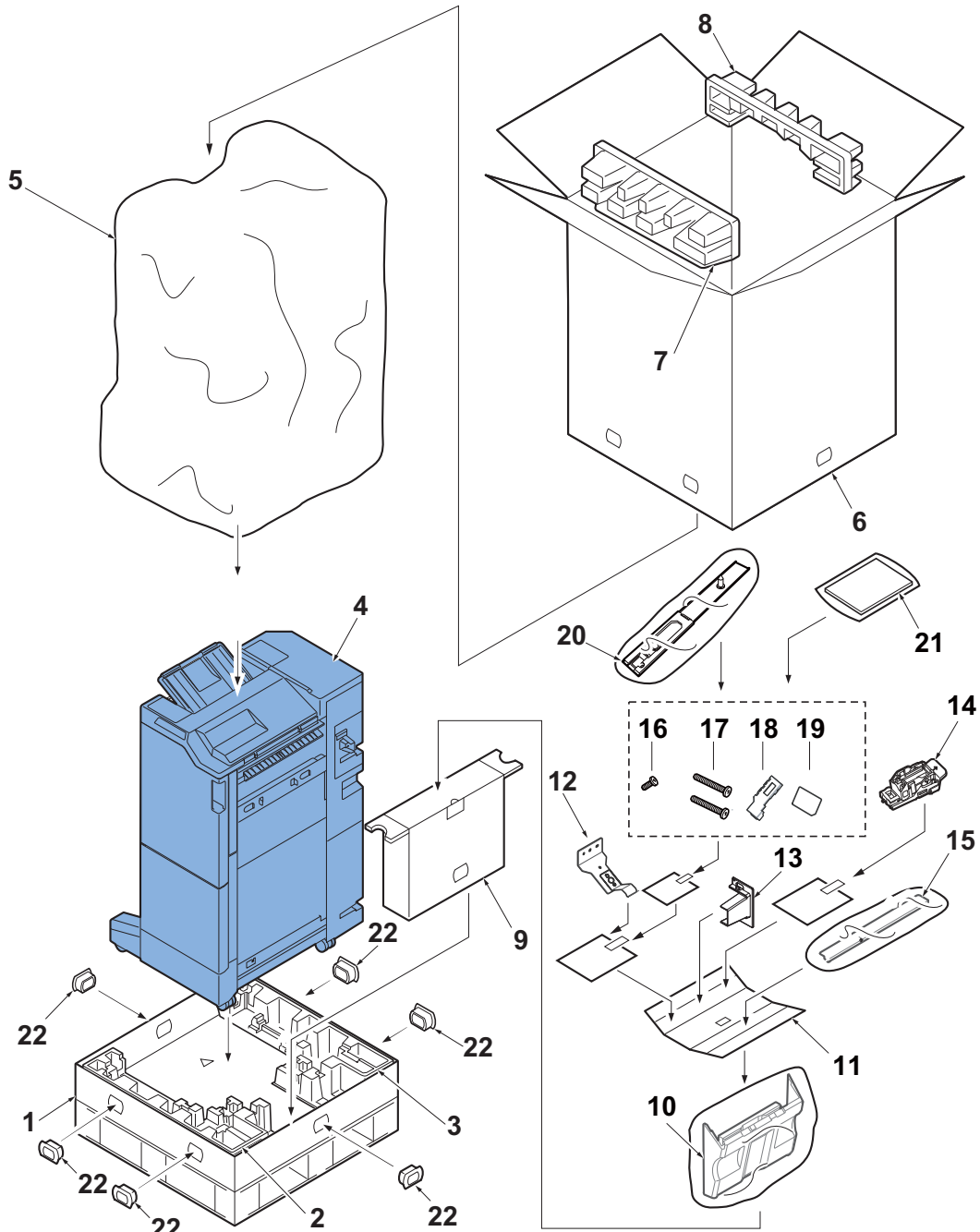
- |                              |                          |                       |
|------------------------------|--------------------------|-----------------------|
| 1 Outer case                 | 11 Upper pad             | 21 Cover plate        |
| 2 Inner frame                | 12 Size label            | 22 Attachment B       |
| 3 Bottom pad                 | 13 Attachment A          | 23 Spanner            |
| 4 Bottom cushioning material | 14 Guide film A          | 24 Installation guide |
| 5 Main unit                  | 15 Guide film B          |                       |
| 6 Main unit cover            | 16 Lock support plate A  |                       |
| 7 Front right stay           | 17 Switch lever          |                       |
| 8 Front left stay            | 18 Lock support plate B  |                       |
| 9 Rear stay                  | 19 Screws ((M4x8 P-tite) |                       |
| 10 Upper sheet               | 20 Screws (M4x8 S-tite)  |                       |

**(1-4) Side multi tray (PF-7130)**



- |                               |                          |                            |
|-------------------------------|--------------------------|----------------------------|
| 1 Outer case                  | 13 Poly bag              | 25 Lock pin                |
| 2 Bottom cushion              | 14 Large base slider     | 26 Switch contacting board |
| 3 Bottom spacer               | 15 Spacer A              | 27 Screw (M4x10)           |
| 4 Side multi tray             | 16 Poly bag              | 28 Screws (M4x8 S-tite)    |
| 5 Product cover               | 17 Small base slider     | 29 Cover plate             |
| 6 Front right stay            | 18 Poly bag              | 30 Stopper                 |
| 7 Front left stay             | 19 Paper size plate      | 31 Clamp                   |
| 8 Rear stay                   | 20 Paper type plate      | 32 Poly bag                |
| 9 Upper cushion material      | 21 Cassette number label | 33 Installation guide      |
| 10 Accessories box            | 22 Poly bag              |                            |
| 11 Accessory cushion material | 23 Film                  |                            |
| 12 Spacer B                   | 24 Poly bag              |                            |

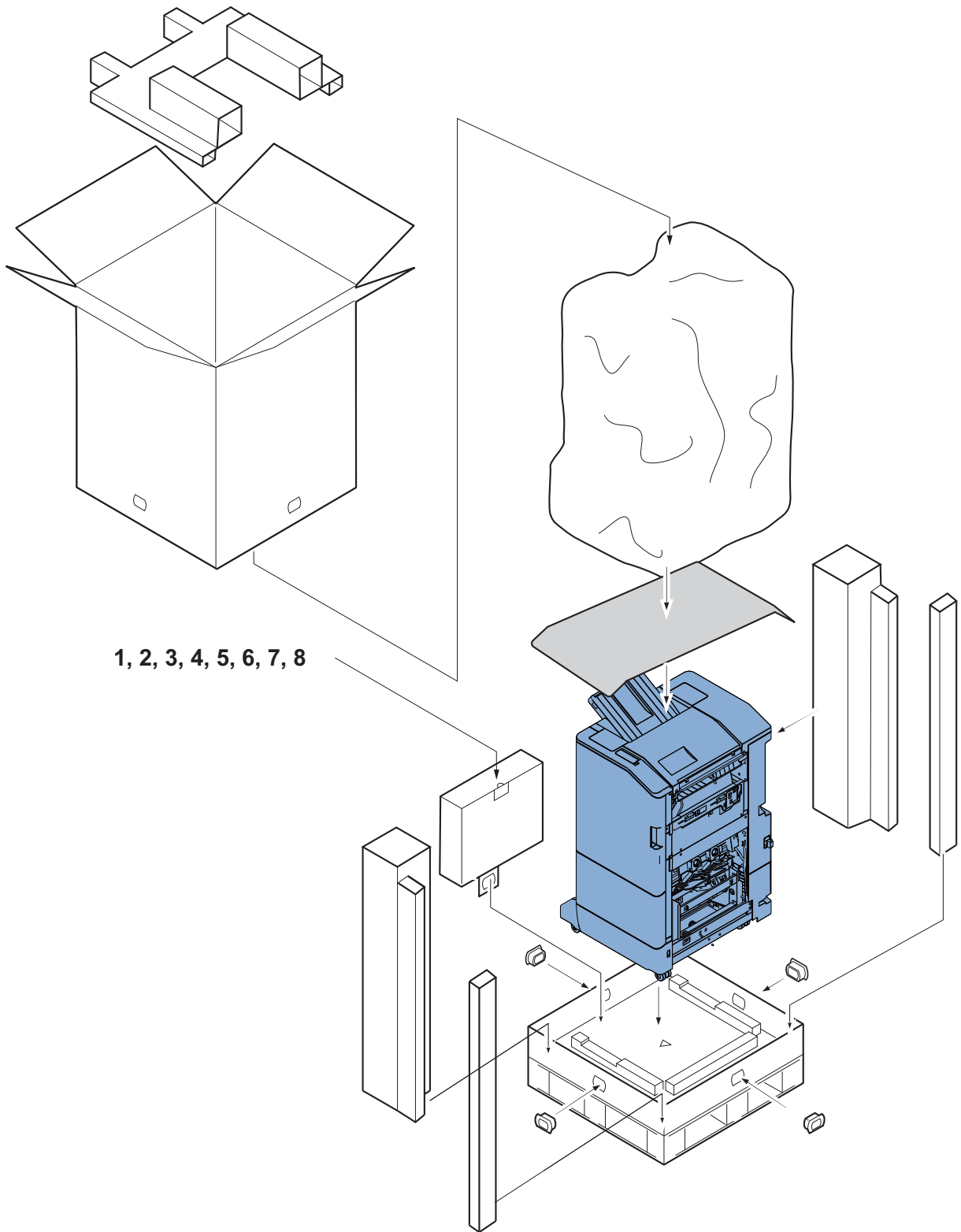
**(1-5) 4,000-sheet Finisher (DF-7110)**



- |                         |                 |                       |
|-------------------------|-----------------|-----------------------|
| 1 Skid                  | 9 Right spacer  | 17 Screw (M4x20)      |
| 2 Front bottom pad      | 10 Main tray    | 18 Connector cover    |
| 3 Rear bottom pad       | 11 Inner pad    | 19 Tray label         |
| 4 4,000-sheets Finisher | 12 Ground plate | 20 Connecting plate   |
| 5 Main unit cover       | 13 Wire guide   | 21 Installation guide |
| 6 Outer case            | 14 Cartridge    | 22 Hinge              |
| 7 Front upper pad       | 15 Eject guide  |                       |
| 8 Rear upper pad        | 16 Screw (M4x8) |                       |

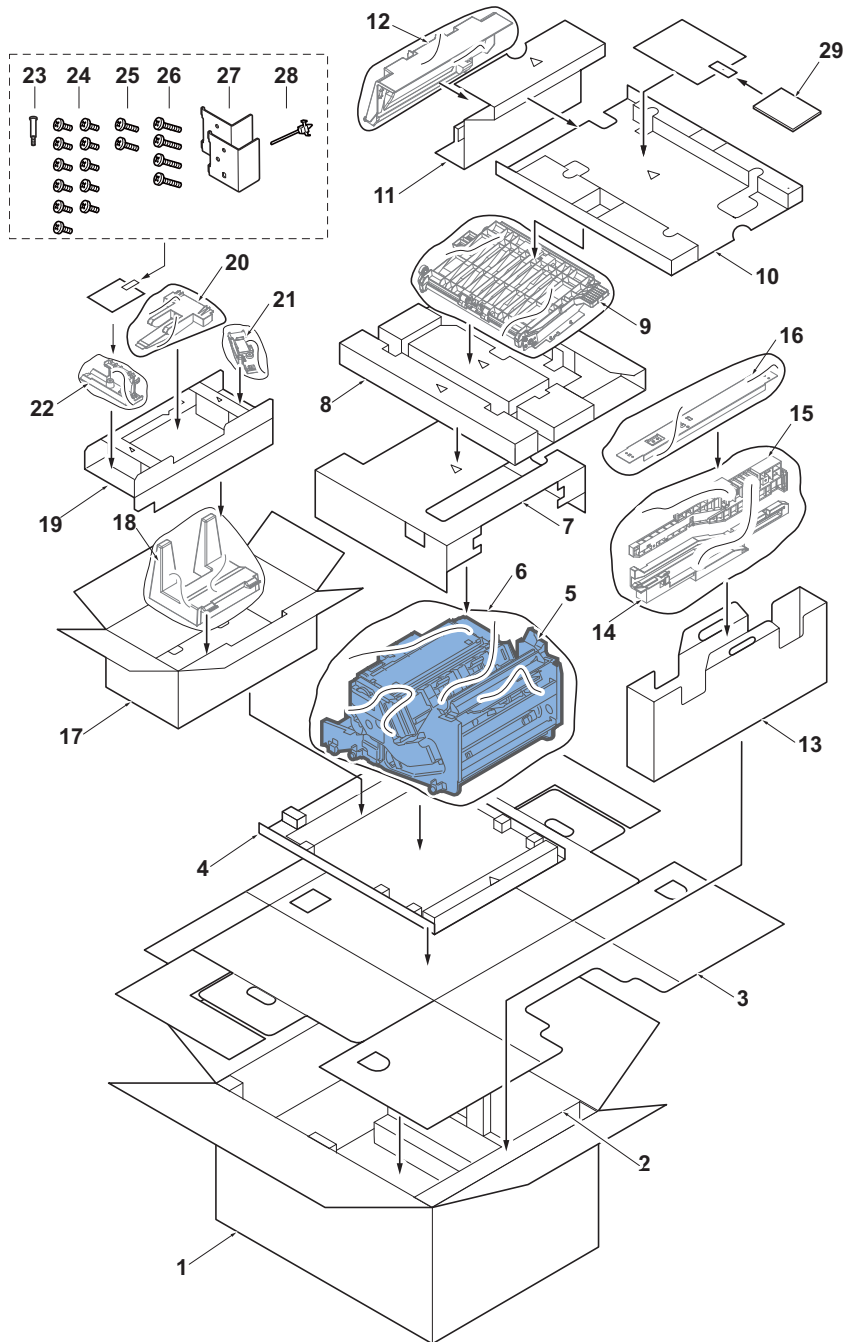


**(1-6) Mailbox (MT-730 (B))**



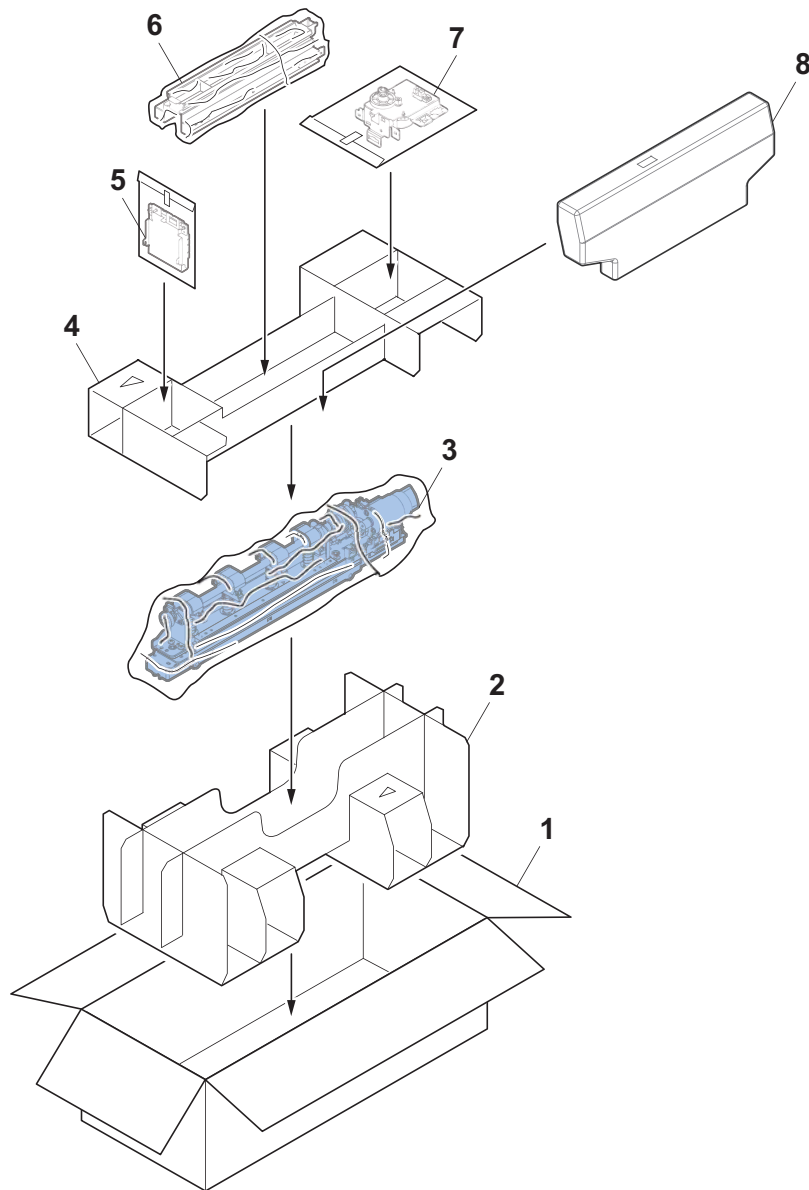
- |                |                     |                       |
|----------------|---------------------|-----------------------|
| 1 Mailbox      | 7 Center bottom pad | 13 Upper front Cover  |
| 2 Outer case   | 8 Side spacer       | 14 Upper rear cover   |
| 3 Inner frame  | 9 Accessory case    | 15 Screw (M4x12)      |
| 4 Bottom pad A | 10 Tray             | 16 Tray name label    |
| 5 Bottom pad B | 11 Poly bag         | 17 Installation guide |
| 6 Poly sheet   | 12 Poly bag         |                       |

**(1-7) Center-Folding Unit (BF-730)**



- |                              |                              |                       |
|------------------------------|------------------------------|-----------------------|
| 1 Outer case                 | 11 Spacer E                  | 21 Front side cover   |
| 2 Bottom spacer              | 12 Center-folding eject tray | 22 Rear side cover    |
| 3 Spacer A                   | 13 Spacer F                  | 23 Pin                |
| 4 Spacer B                   | 14 Front rail                | 24 Screw (M4x8)       |
| 5 Center-folding Unit        | 15 Rear rail                 | 25 Screw (M4x10)      |
| 6 Poly sheet                 | 16 Guide                     | 26 Screw (M3x12)      |
| 7 Top spacer                 | 17 Spacer G                  | 27 Lock plate         |
| 8 Spacer C                   | 18 Output stock tray         | 28 Binding band       |
| 9 Center-folding bridge Unit | 19 Spacer H                  | 29 Installation guide |
| 10 Spacer D                  | 20 Output stopper            |                       |

**(1-8) Punch Unit (PH-7B)**



- |              |                         |                   |
|--------------|-------------------------|-------------------|
| 1 Outer case | 4 Upper pad             | 7 Drive unit      |
| 2 Bottom pad | 5 Punch PWB             | 8 Waste punch box |
| 3 Punch unit | 6 Waste punch box guide |                   |

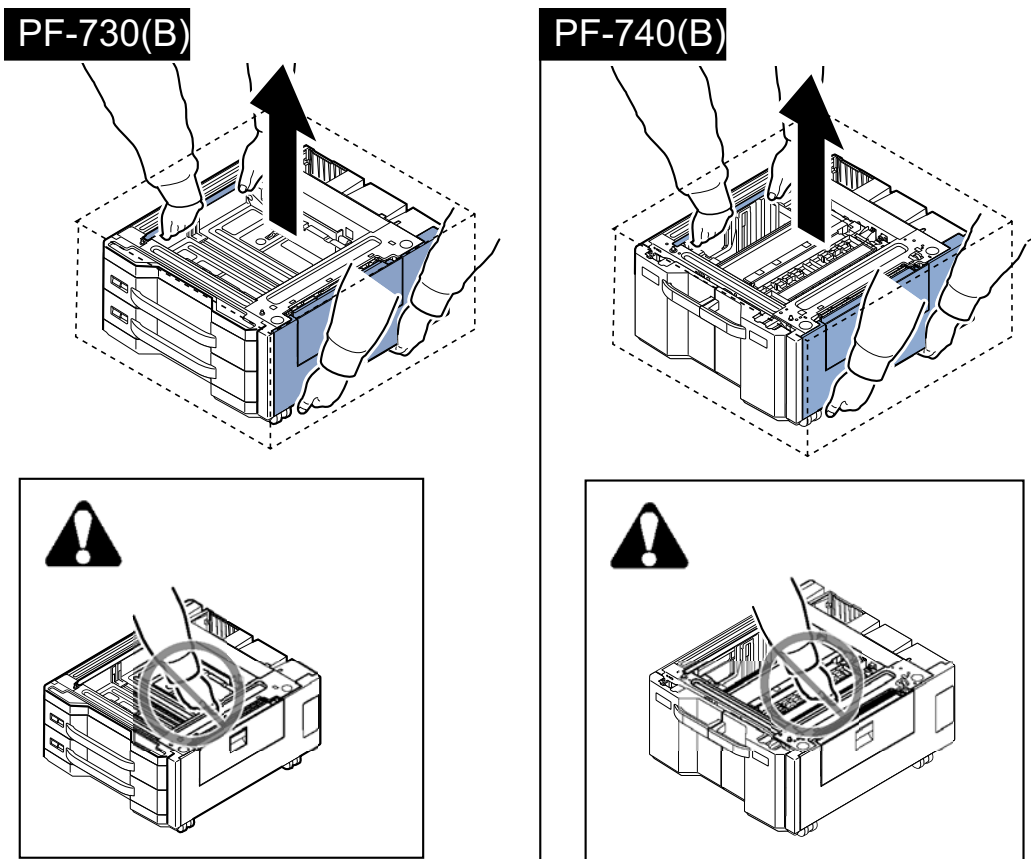
## (2) Optional unit installation

Install necessary optional units in the main unit by Refer ring to the installation procedures.

	Product name	Refer to the installation guide
PF	PF-7130 (Multi media side tray) PF-730 (B) (500x2 Paper Feeder)	<a href="#">PF-7130+PF-730(B)/PF-740(B)</a>
	PF-7130 (Multi media side tray) PF-740 (B) (500x2 Paper Feeder)	
	PF-7120 (3000 Side Paper Feeder)	<a href="#">PF-7120</a>
DF	DF-7110 (4000-sheet Finisher)	<a href="#">DF-7110</a>
	Mailbox (B) (Mailbox)	<a href="#">MT-730(B)</a>
	BF-730 (Center-folding Unit)	<a href="#">BF-730</a>
	PH-7 (Punch unit)	<a href="#">PH-7A/B/C/D</a>
FAX	FAX System 12	<a href="#">FAX System 12</a>

## (3) Notes on optional unit transportation

When carrying the paper feeder (PF-730 (B)/740 (B)), hold the designated parts as shown in the figure.



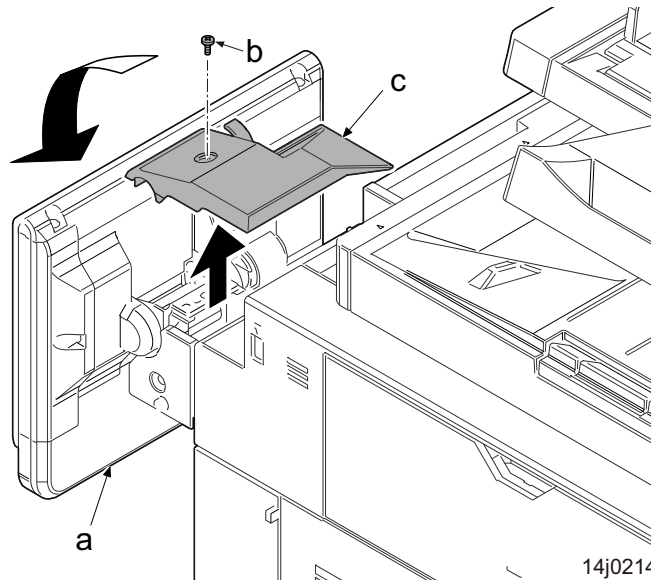
**(4) Attach the optional cable.**

The following parts are necessary in order to attach the optional cable.

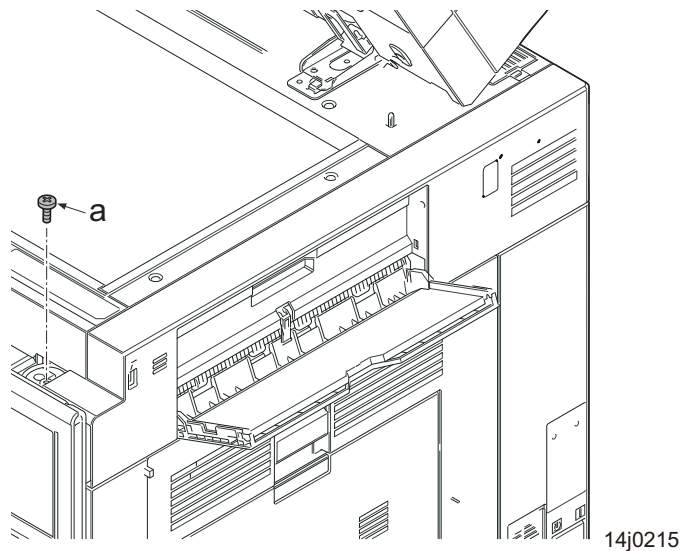
- Key counter wire (302MV4609\_) 1 pc

**Procedures**

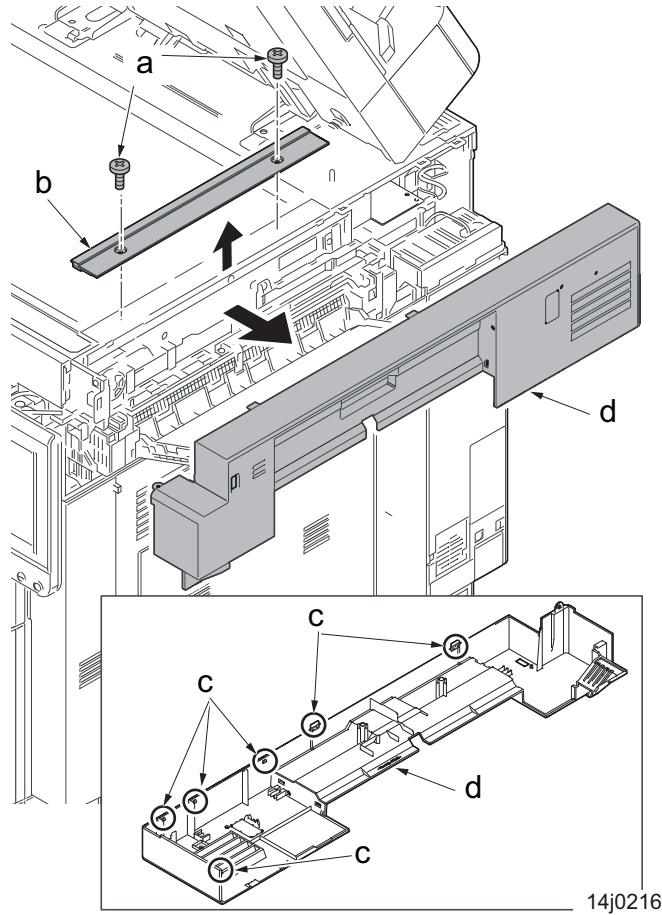
- 1 Turn the power switch off and disconnect the power plug.**
- 2 Tilt up the operation unit (a)**
- 3 Remove the screw (b) (M3x8) and remove the operation unit rear side cover (c) in the direction of the arrow.**



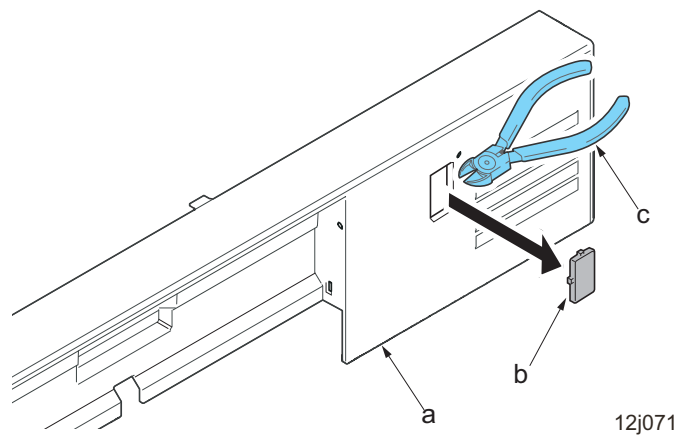
- 4 Remove the screw (a) (M4x8).**



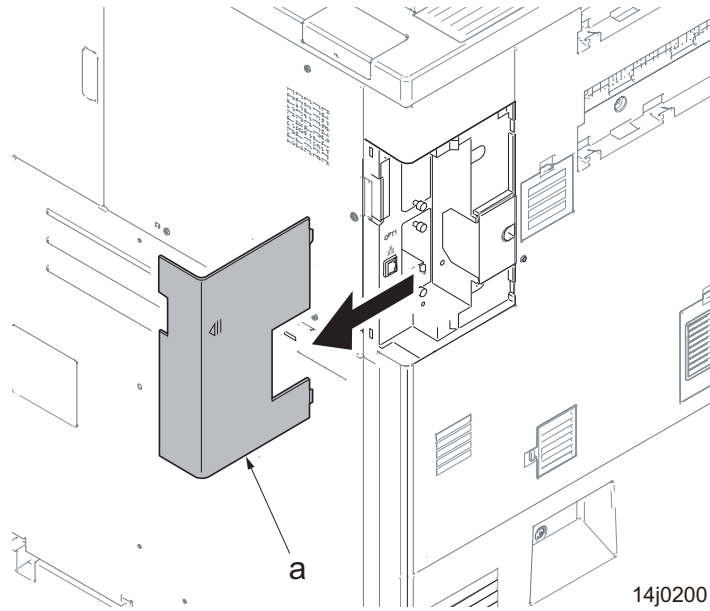
- 5 Remove two screws (a) (M4x8) and then remove the ISU right cover (b).
- 6 Release six hooks (c) and remove the right upper cover (d).



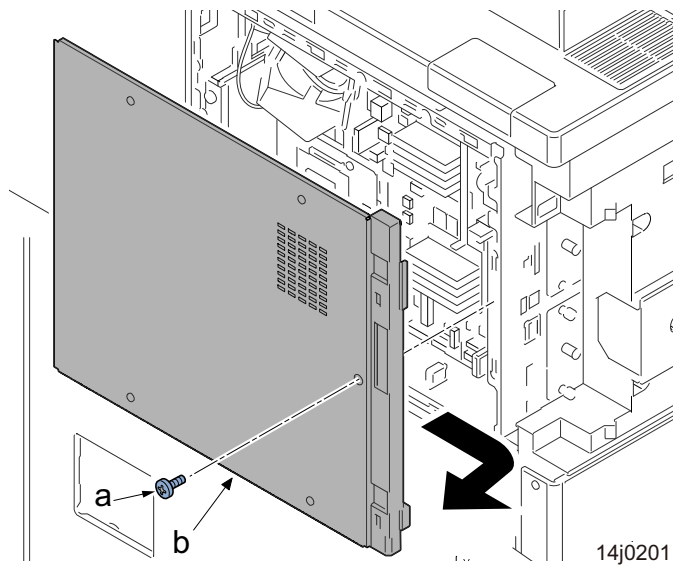
- 7 Take out cutting the separator cover (b) of the right upper cover (a) with nippers, etc.



## 8 Remove the controller cover (a).

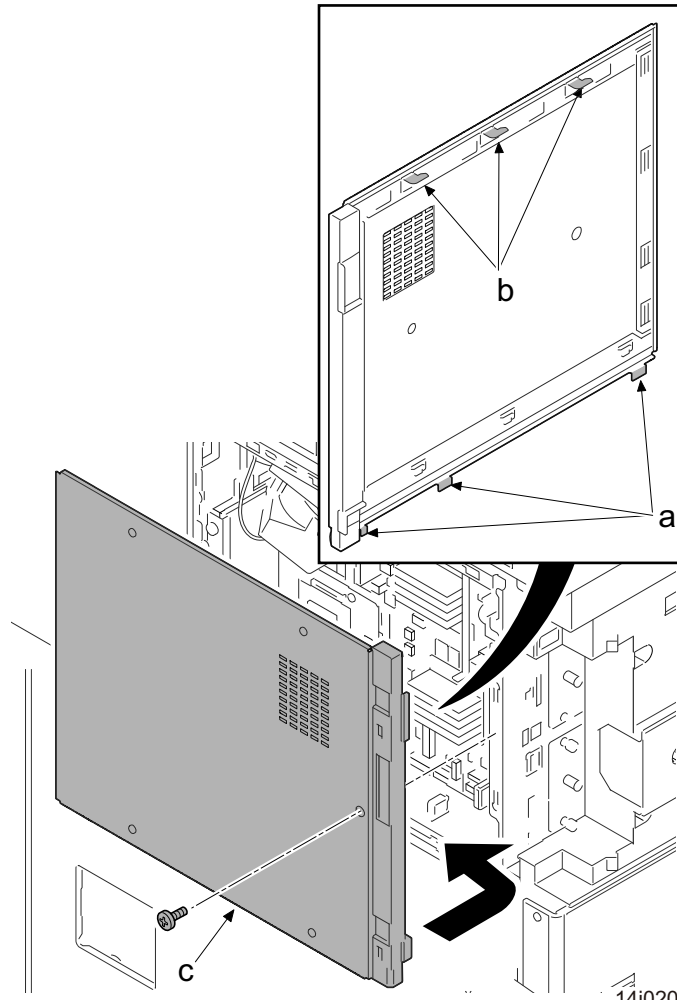


## 9 Remove the screw (a) (M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.



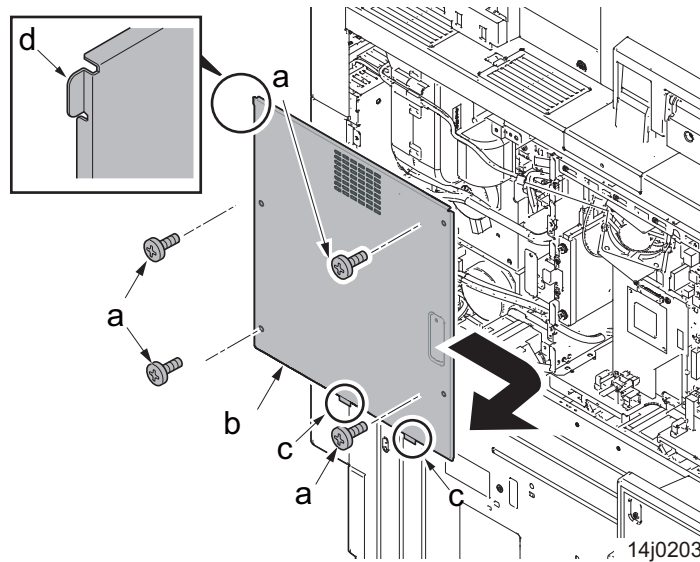
When reattaching the rear left cover (b), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.

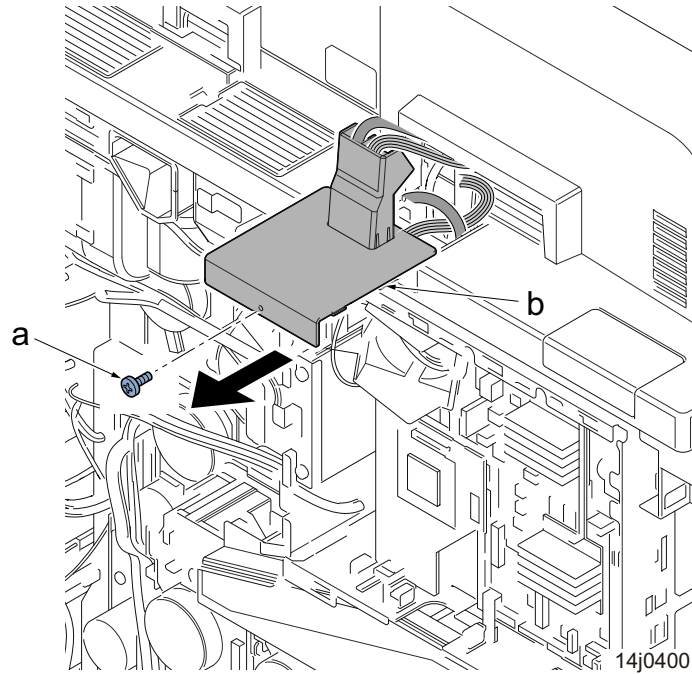
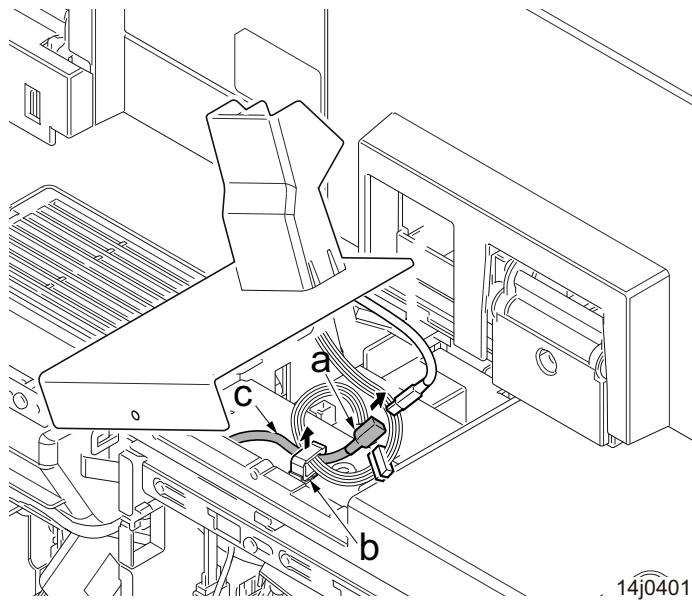




**10** Remove four screws (a) (M3x8) and remove the rear right cover (b) in the direction of the arrow.

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.

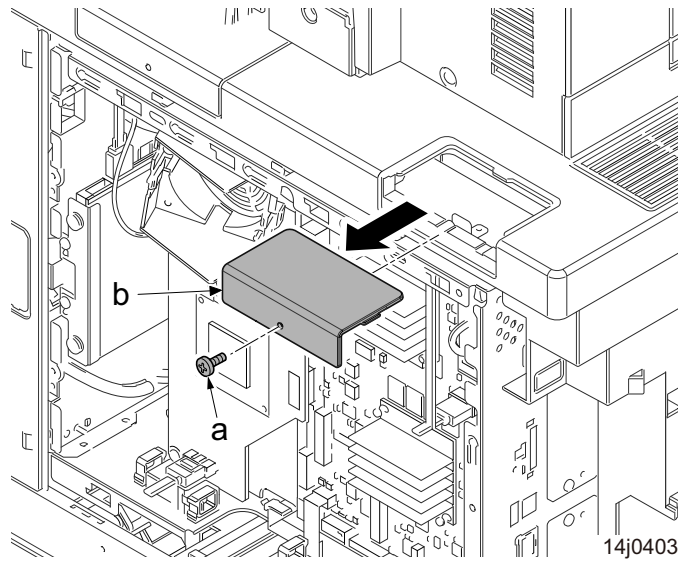


**11 Remove the screw (a) (M3x8) and remove the DPIF lid (b).****12 Disconnect the connector (a) and release the wire saddle (b) to remove the wire (c).**

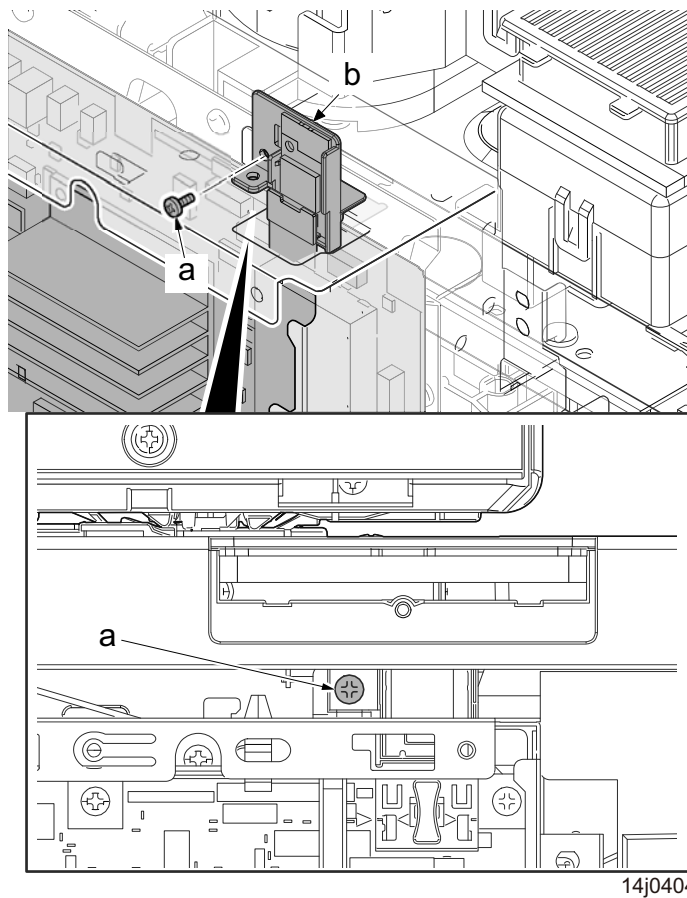
When IB-35 is installed, remove it by the following procedure (steps 6 to 10). Other than that, go to step 11.

**13** Remove the screw (a) (M3x8).

**14** Detach the IF lid (b) in the direction of the arrow.



**15** Remove the screw (a) (M3x6) that secures the PWB unit (b).



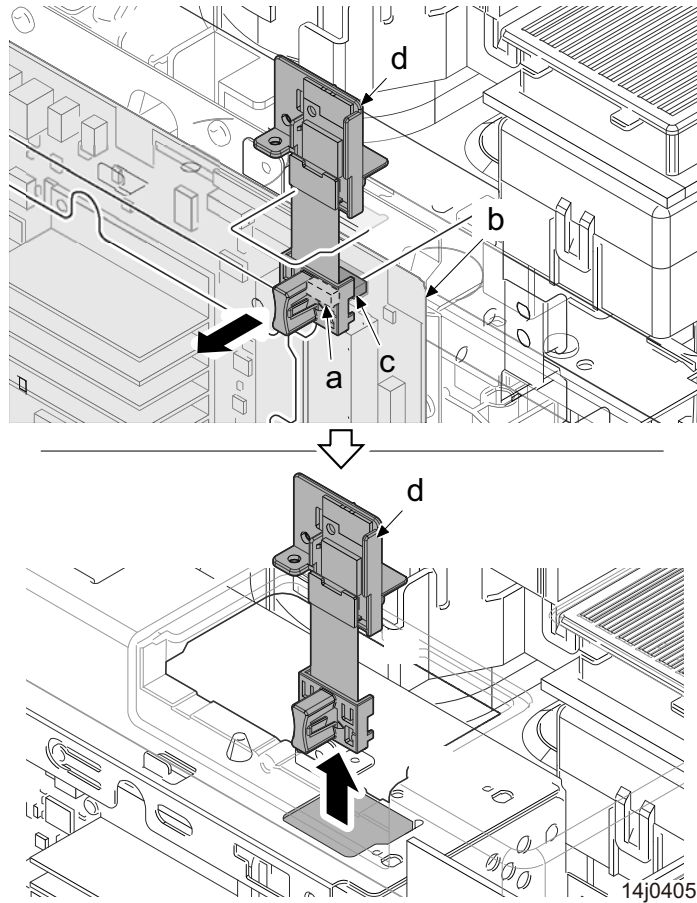
**16** Disconnect the connector (a) from the main PWB connector (c).

**17** Remove the PWB unit (d).

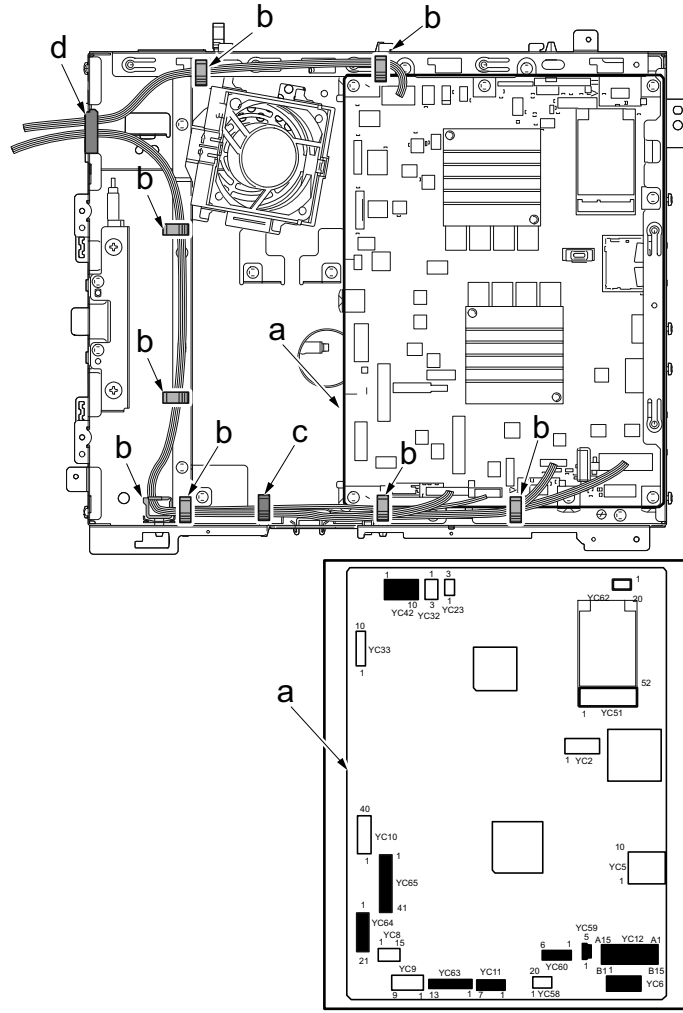
**✔ IMPORTANT**

When disconnect the connector (a) from the connector of main PWB (b), straightly pull out against the main PWB (b) and do not pull out on the skew.

When pulling out on the skew, it causes the damage of FPC (f).

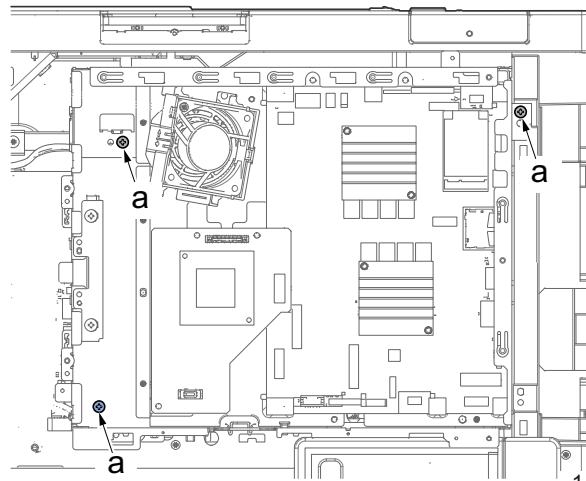
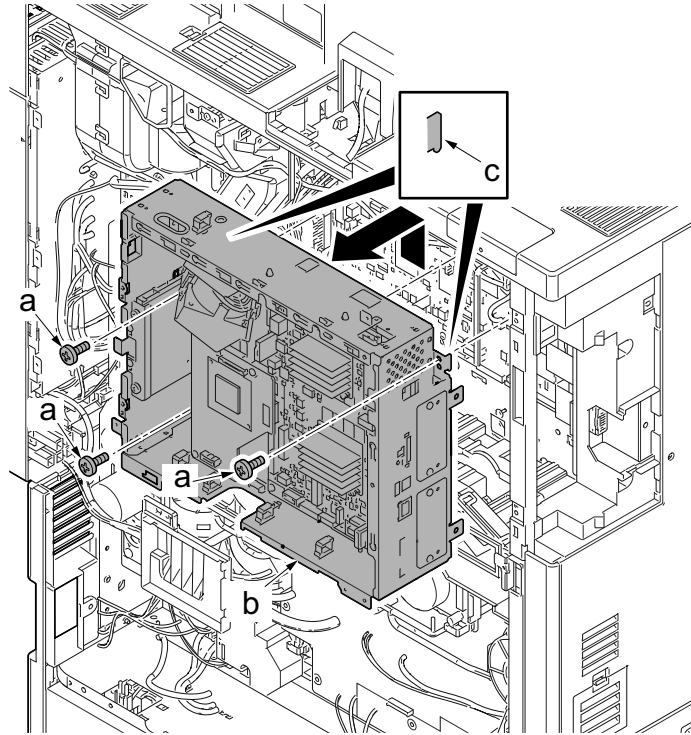


- 18 Disconnect nine connectors from the main PWB (a).
- 19 Release seven wire saddles (b) and remove the wire.
- 20 Release the cable tie with a snap (c).
- 21 Remove the edge saddle (d) and remove the wire.



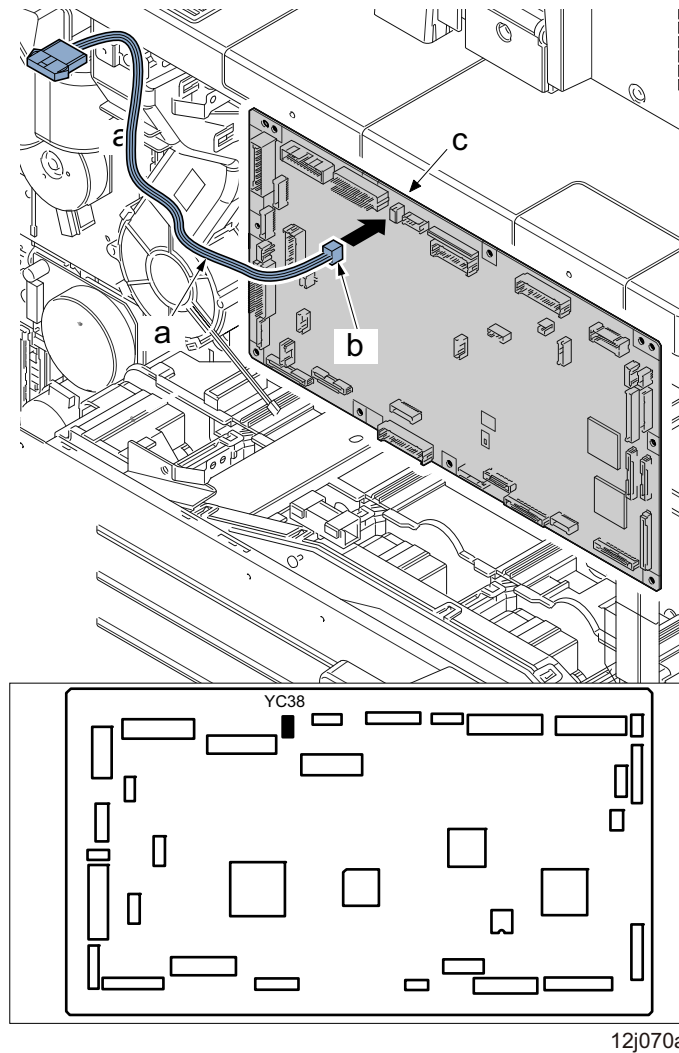
14j0406

- 22 Remove three screws (a) (M4x8) and remove the controller box (b).  
Release the hook (c) by lifting.



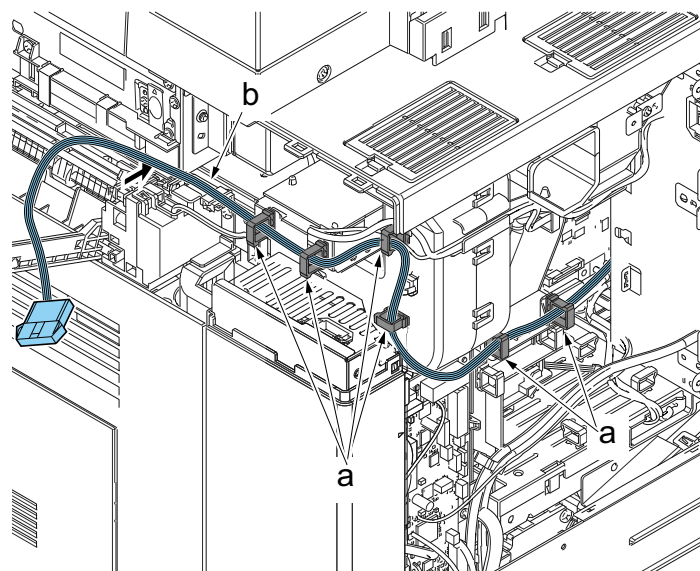
14j0407

- 23** Connect the connector of the key counter wire (a) to the connector (f) (YC38) of the engine PWB (e).

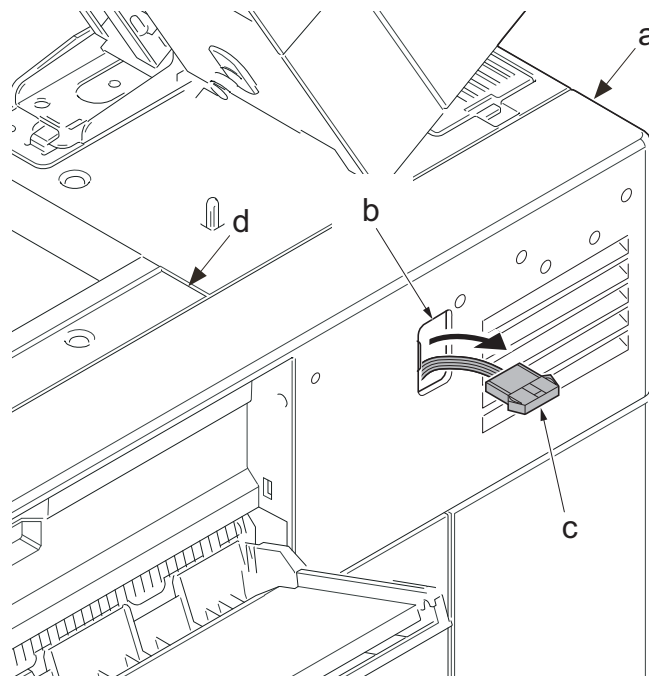


- 24** Release six wire saddles (a).

- 25** Pass the key counter wire (b) through six of the wire saddle (a) and fix it.



- 26 Reattach the controller box in the original position.
- 27 Reattach the right rear cover in the original position.
- 28 Reattach the left rear cover in the original position.
- 29 Reattach the controller cover in the original position.
- 30 Pass the key counter wire connector (c) from the opening (b) of the right upper cover (a).
- 31 Reattach the right upper cover (a) in the original position.
- 32 Reattach the ISU right cover (d) in the original position.

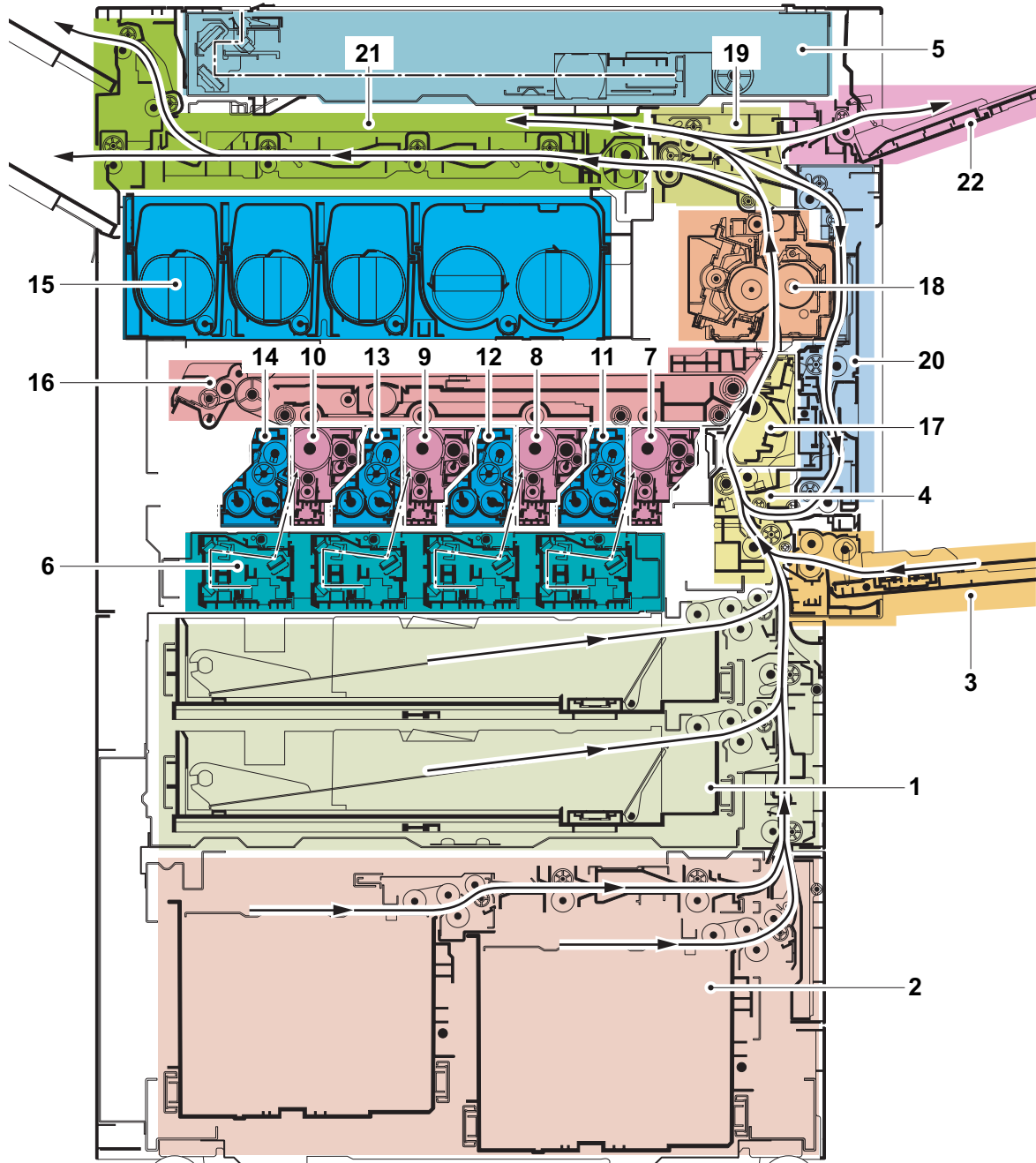




## 3 Machine Design

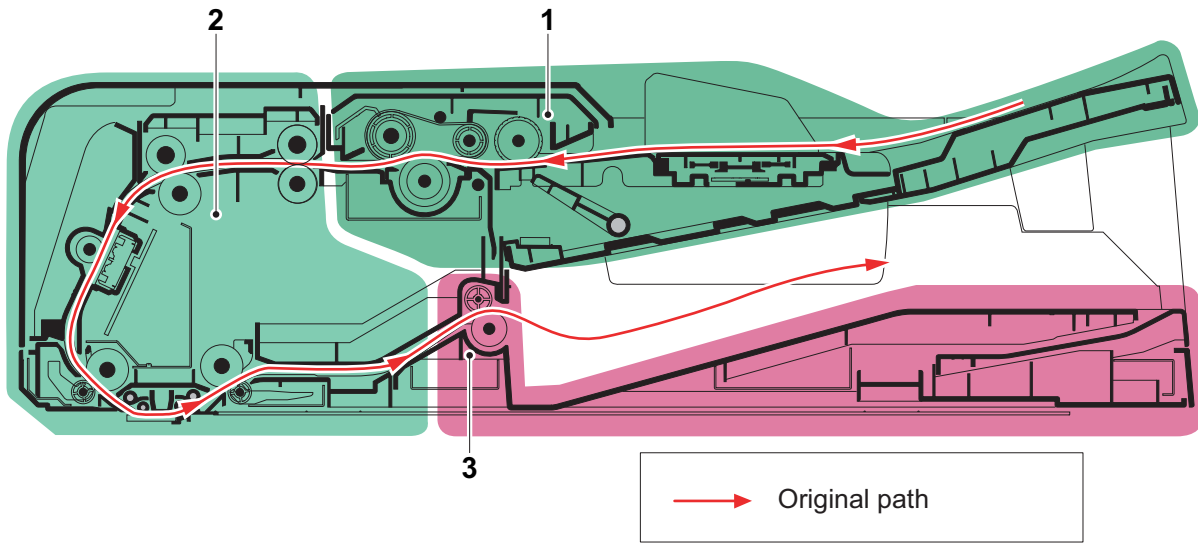
### 3 - 1 Mechanical Configuration

#### (1) Cross-section view



- |  |                             |  |
|--|-----------------------------|--|
| 1 Paper feed section of Cassette 1 and 2 | 8 Drum unit M               | 17 Secondary transfer and separation section |
| 2 Paper feed section of Cassette 3 and 4 | 9 Drum unit C               | 18 Fuser section                             |
| 3 MP paper feed section                  | 10 Drum unit Y              | 19 Feed-shift and eject section              |
| 4 Conveying section                      | 11 Developer unit K         | 20 Duplex section                            |
| 5 Image scanner unit                     | 12 Developer unit M         | 21 Bridge section                            |
| 6 Laser scanner unit                     | 13 Developer unit C         | 22 Job separator section                     |
| 7 Drum unit K                            | 14 Developer unit Y         |  |
|  | 15 Toner container          |  |
|  | 16 Primary transfer section |  |

**(2) Document processor cross-section view**



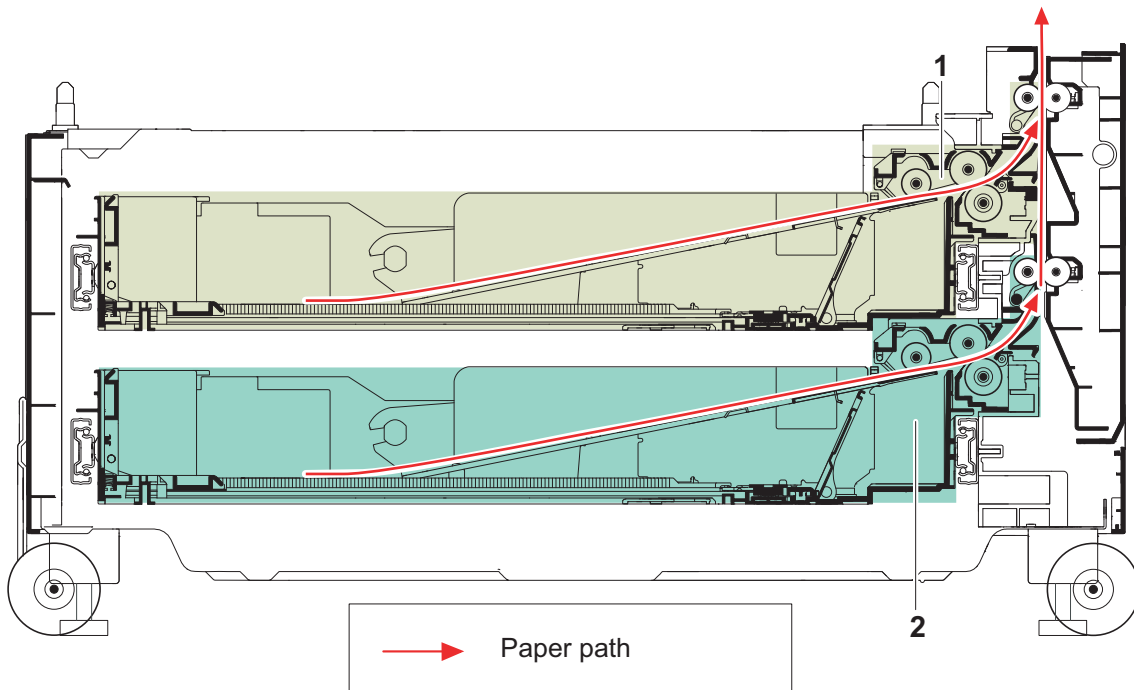
1 DP original feed section

2 DP conveying section

3 DP original eject section

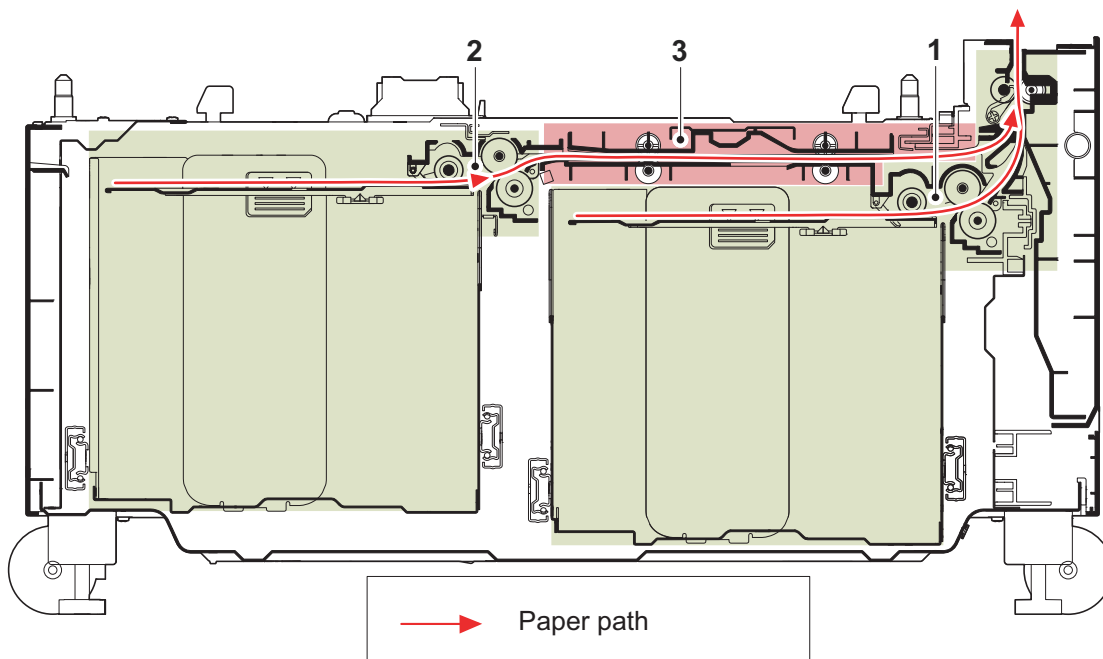
### 3 - 2 Extension device construction (option)

#### (1) Paper feeder cross-section view (PF-730(B))



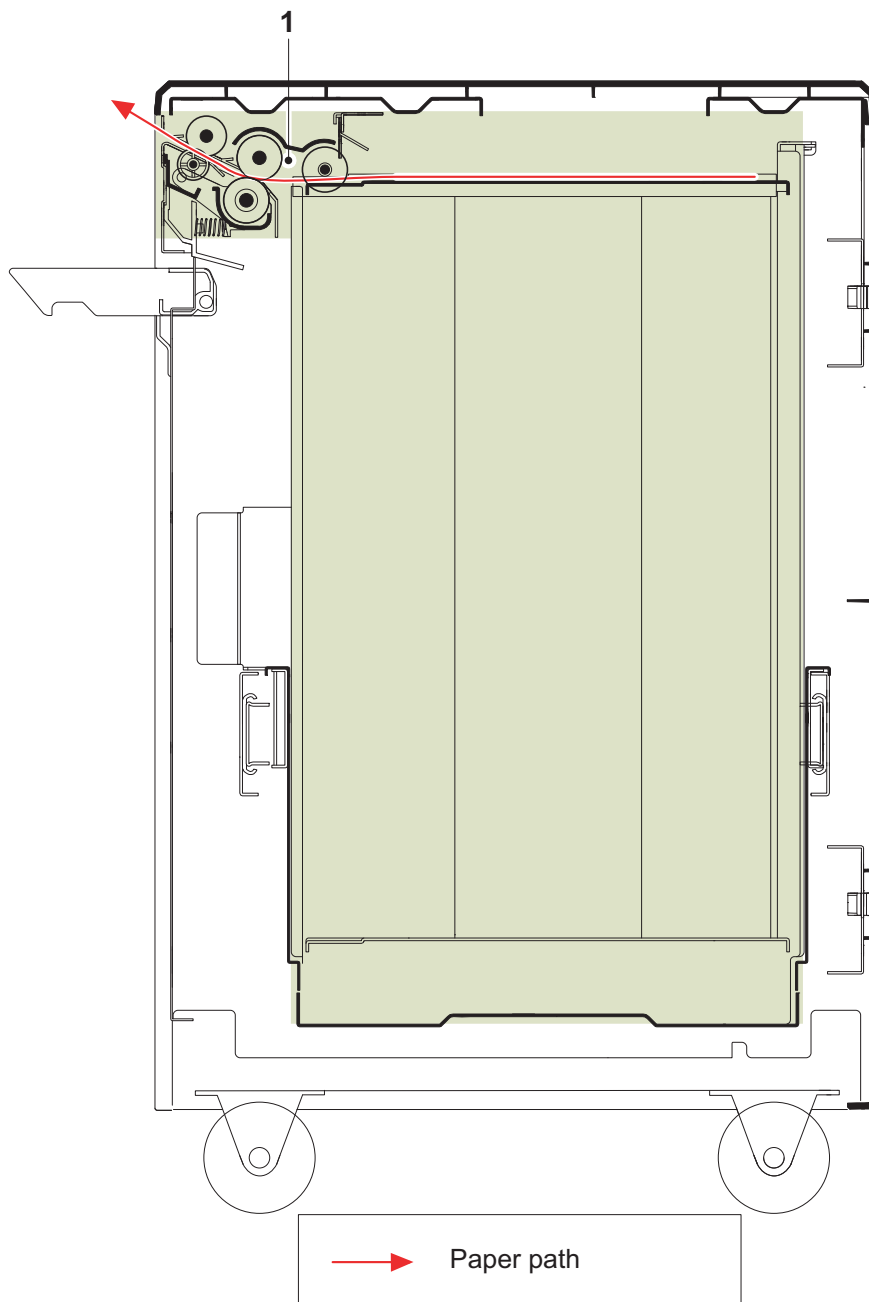
- 1 Cassette paper feed section (Cassette 6)      2 Cassette paper feed section (Cassette 7)

#### (2) Paper feeder cross-section view (PF-740(B))



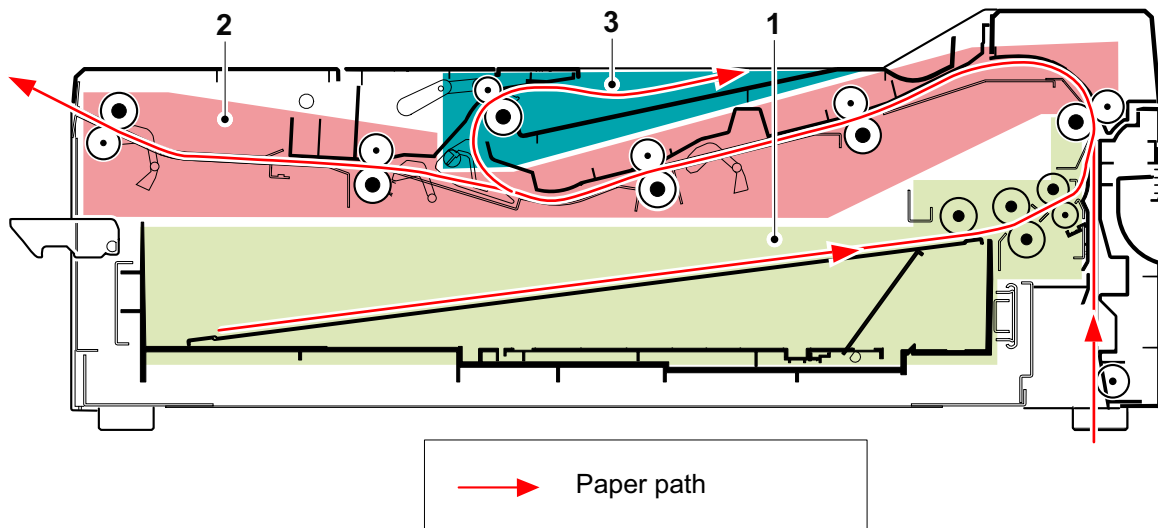
- 1 Right paper feed section (Cassette 6)      3 Conveying section  
2 Left paper feed section (Cassette 7)

**(3)Paper feeder cross-section view (PF-7120)**



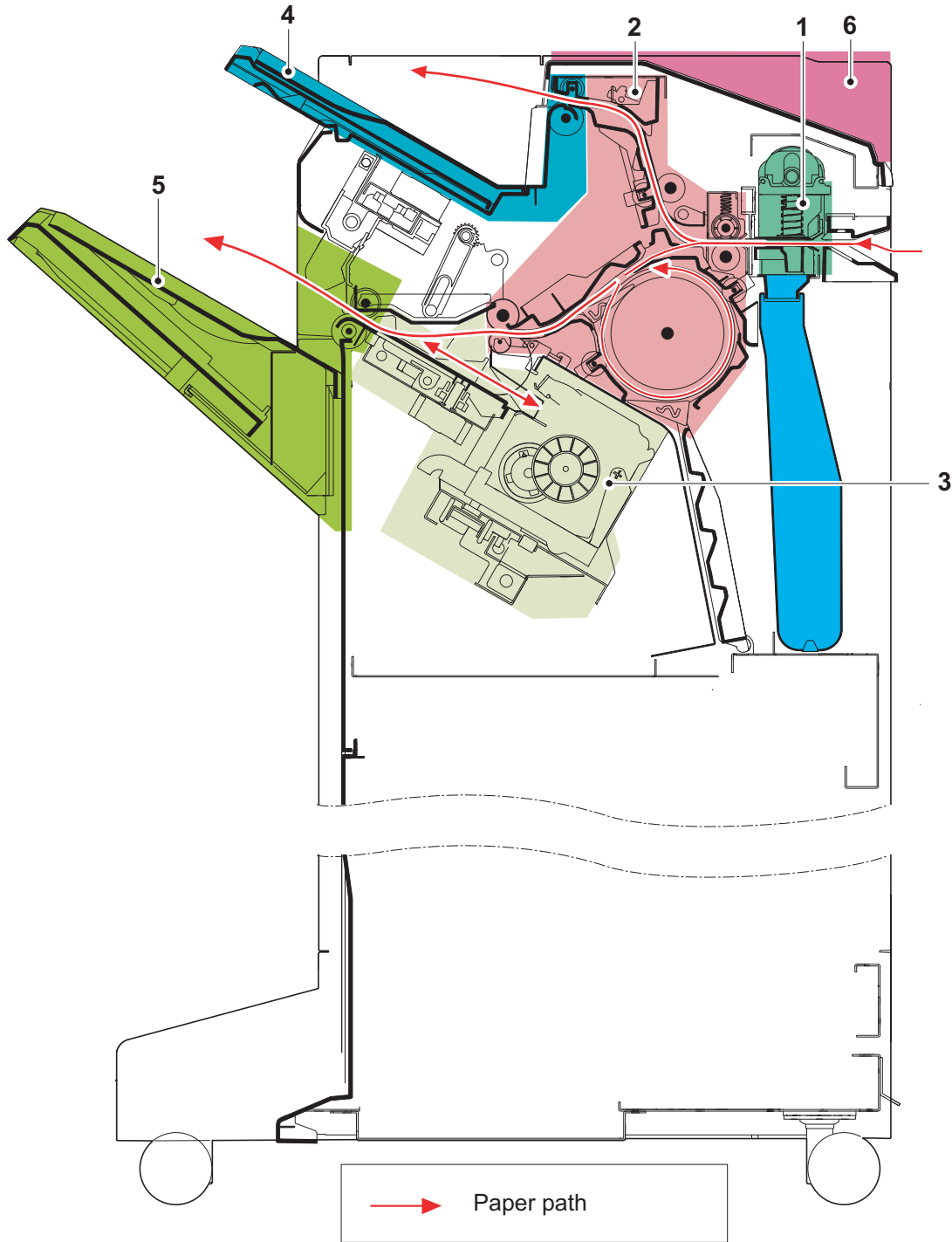
1 Paper deck feed section (Cassette 5)

**(4) Paper feeder cross-section view (PF-7130)**



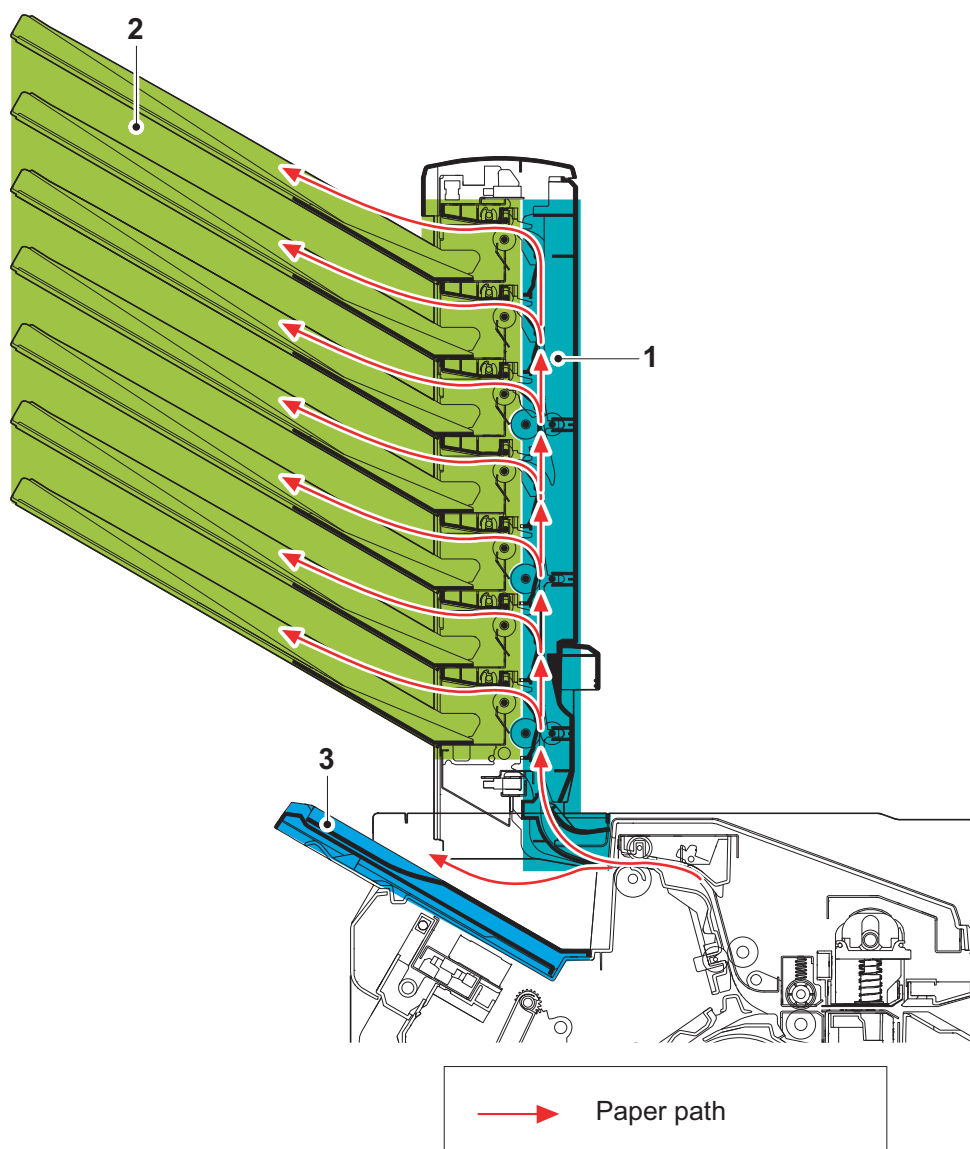
- 1 Cassette paper feed section (Cassette 5)
- 2 Conveying section
- 3 Exit section

**(5)4000-sheet Finisher cross-section view (DF-7110)**

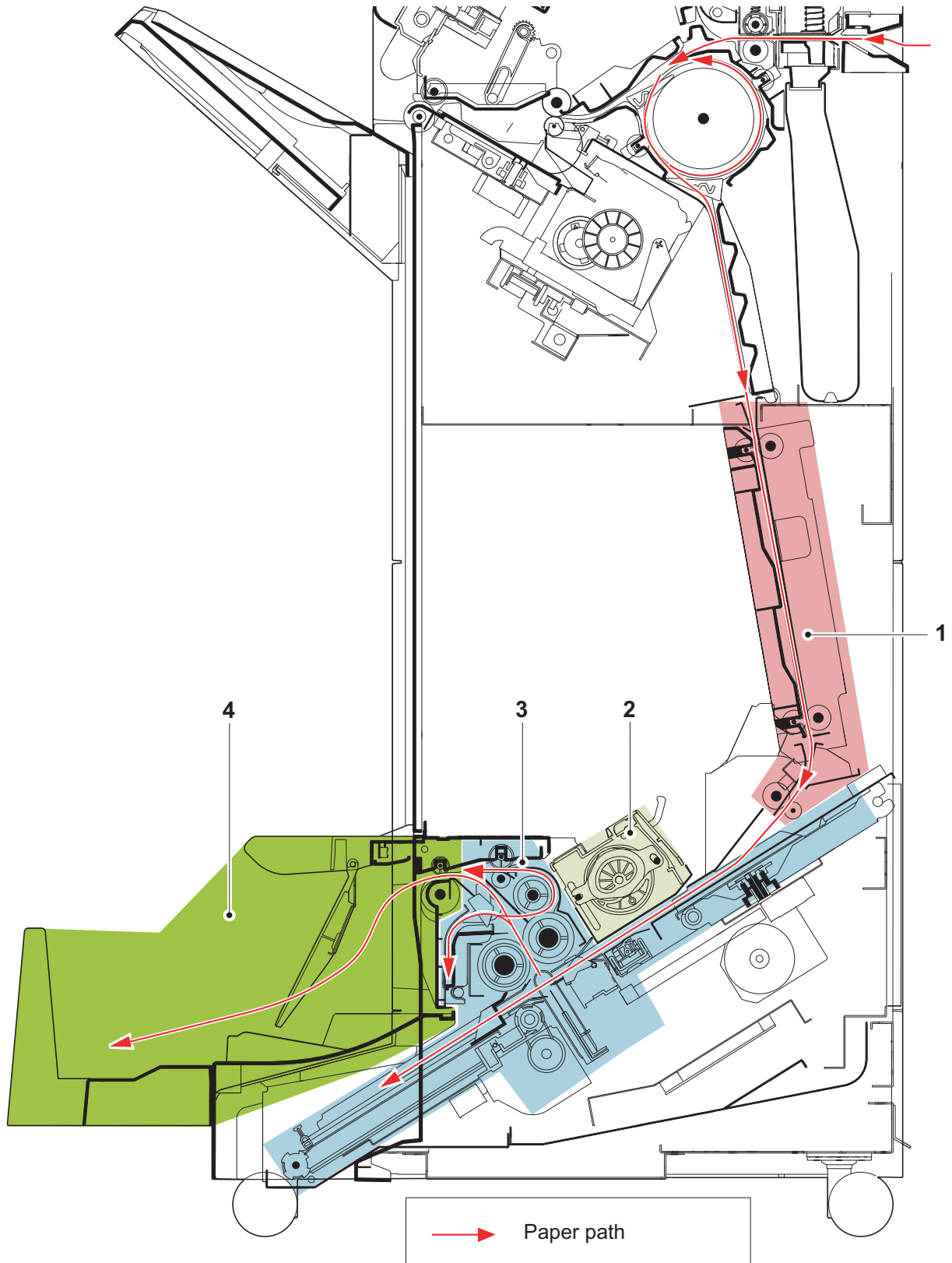


- 1 Punch unit
- 2 Conveying section
- 3 Staple unit

- 4 Eject section (tray B)
- 5 Eject section (tray A)
- 6 Eject section (tray C)

**(6) Mailbox cross-section view (MT-730(B))**

(7)Folding unit cross-section view (BF-730)



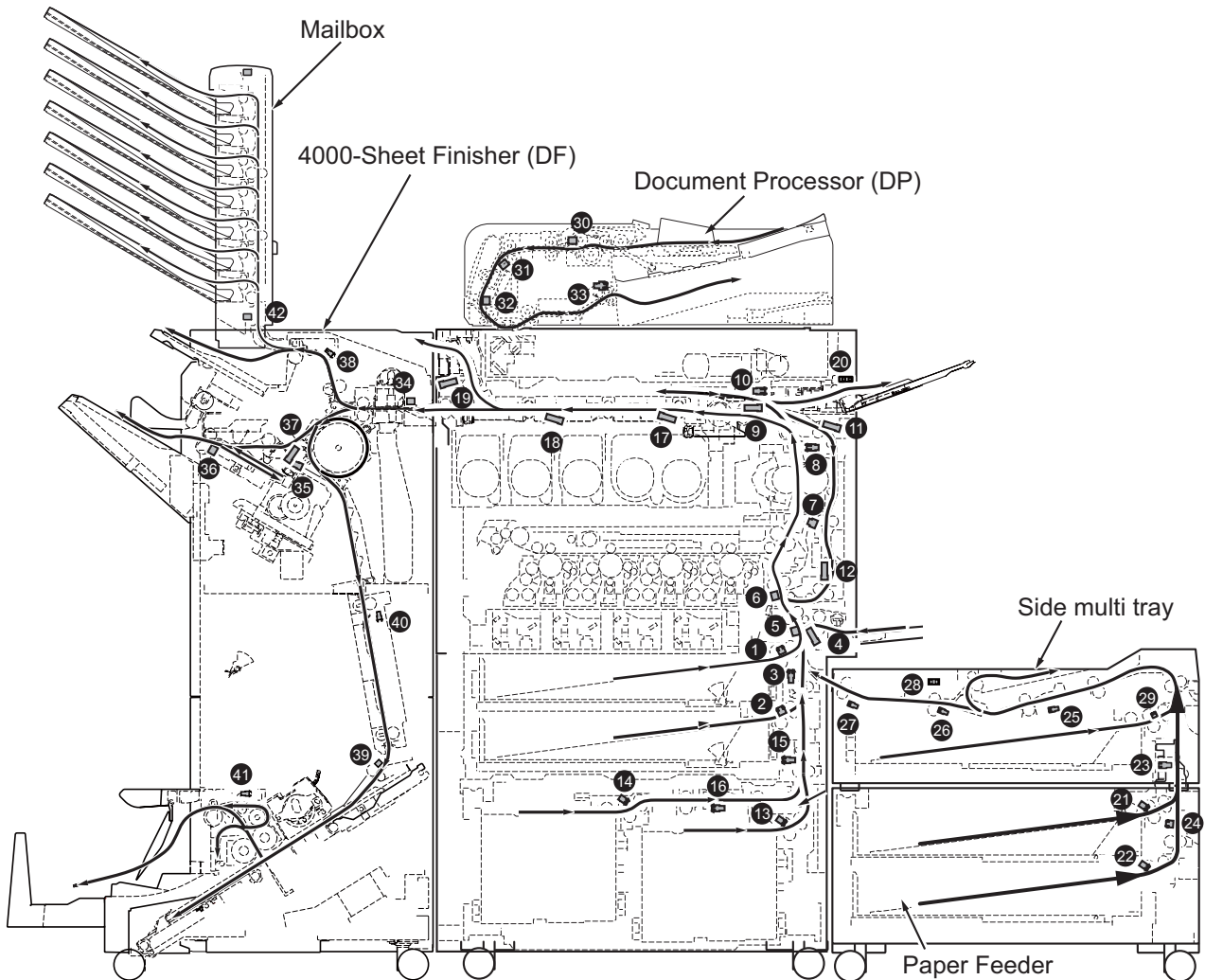
- 1 Conveying section
- 2 Staple unit

- 3 Paper folding section
- 4 Exit section



### 3 - 3 Paper conveying and Paper detection

(1)Main unit+PF-730(B)+PF-7130+DF-7110+MT-730(B)+BF-730+PH-7

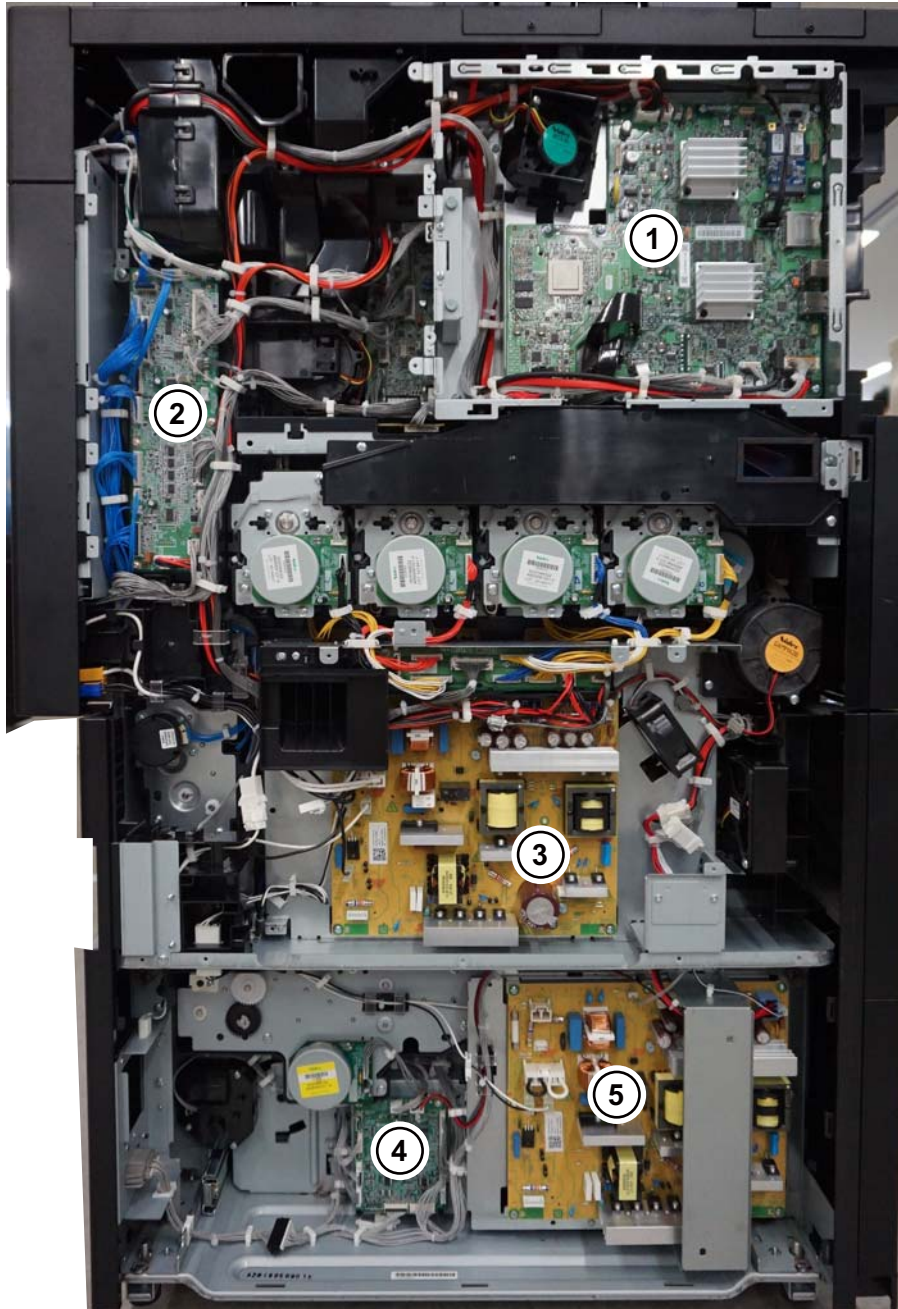


- |                           |                                   |                                 |
|---------------------------|-----------------------------------|---------------------------------|
| 1 Paper feed sensor 1     | 14 PF paper feed sensor 2         | 27 PF conveying sensor 3        |
| 2 Paper feed sensor 2     | 15 PF conveying sensor 1          | 28 PF eject sensor              |
| 3 Conveying sensor        | 16 PF conveying sensor 2          | 29 PF paper feed sensor         |
| 4 MP conveying sensor     | 17 BR conveying sensor 1          | 30 DP original feed sensor      |
| 5 DF middle sensor        | 18 BR conveying sensor 2          | 31 DP backside timing sensor    |
| 6 Registration sensor     | 19 BR eject sensor                | 32 DP timing sensor             |
| 7 Loop sensor             | 20 JS open/close detection sensor | 33 DP eject sensor              |
| 8 Fuser eject sensor      | 21 PF paper feed sensor 1         | 34 DF entry sensor              |
| 9 Eject sensor            | 22 PF paper feed sensor 2         | 35 DF middle sensor             |
| 10 Reversing sensor       | 23 PF conveying sensor 1          | 36 DF eject sensor              |
| 11 Duplex sensor 1        | 24 PF conveying sensor 2          | 37 DF drum sensor               |
| 12 Duplex sensor 2        | 25 PF conveying sensor 1          | 38 DF sub eject sensor          |
| 13 PF paper feed sensor 1 | 26 PF conveying sensor 2          | 39 BF entry sensor              |
|                           |                                   | 40 BF vertical conveying sensor |
|                           |                                   | 41 BR eject sensor              |

### 3 - 4 Electric parts

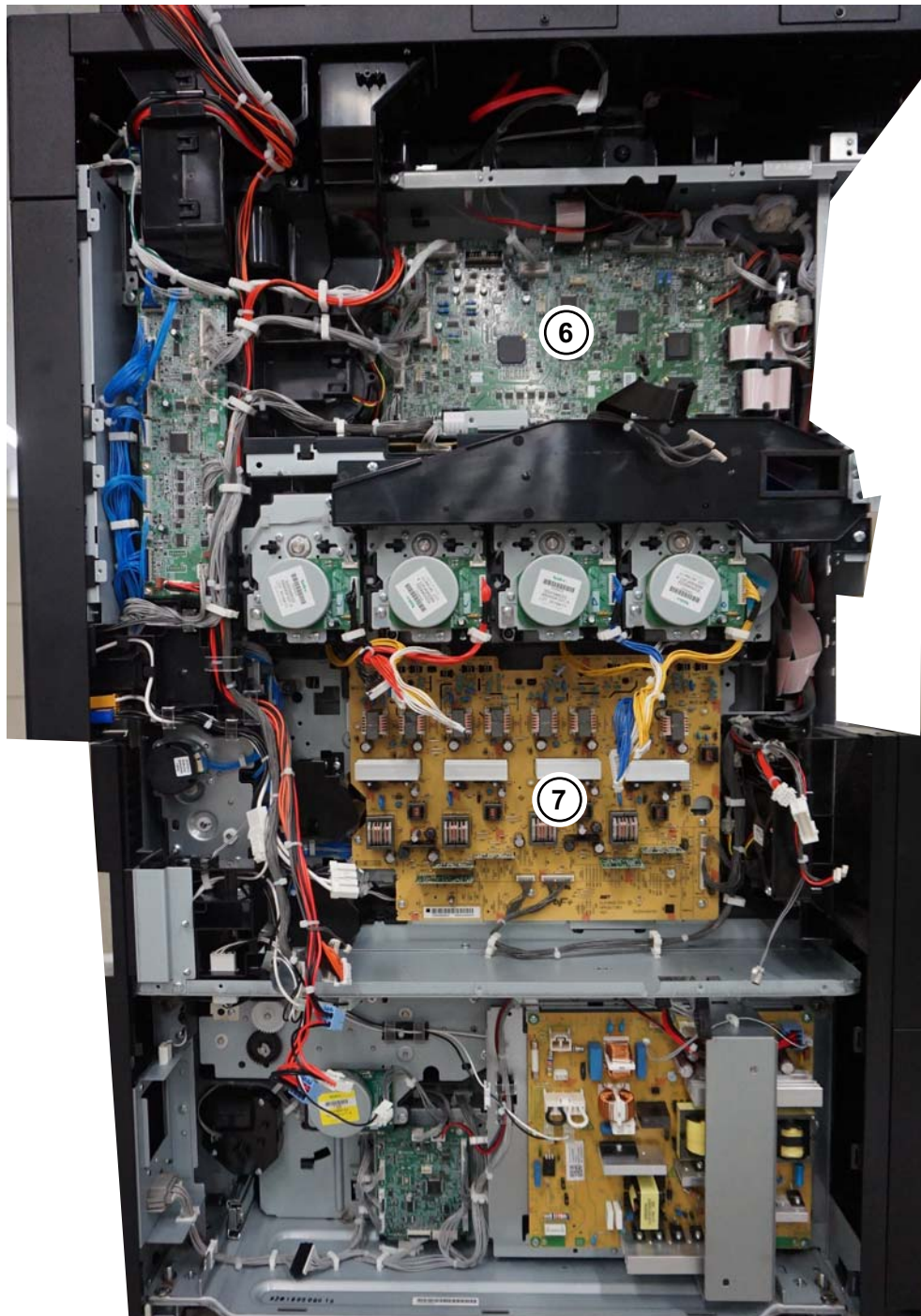
(1)Wire connection

(1-1)(Machine rear side)



- 1 Main PWB
- 2 Feed PWB
- 3 Power source PWB

- 4 PF main PWB
- 5 PF power source PWB

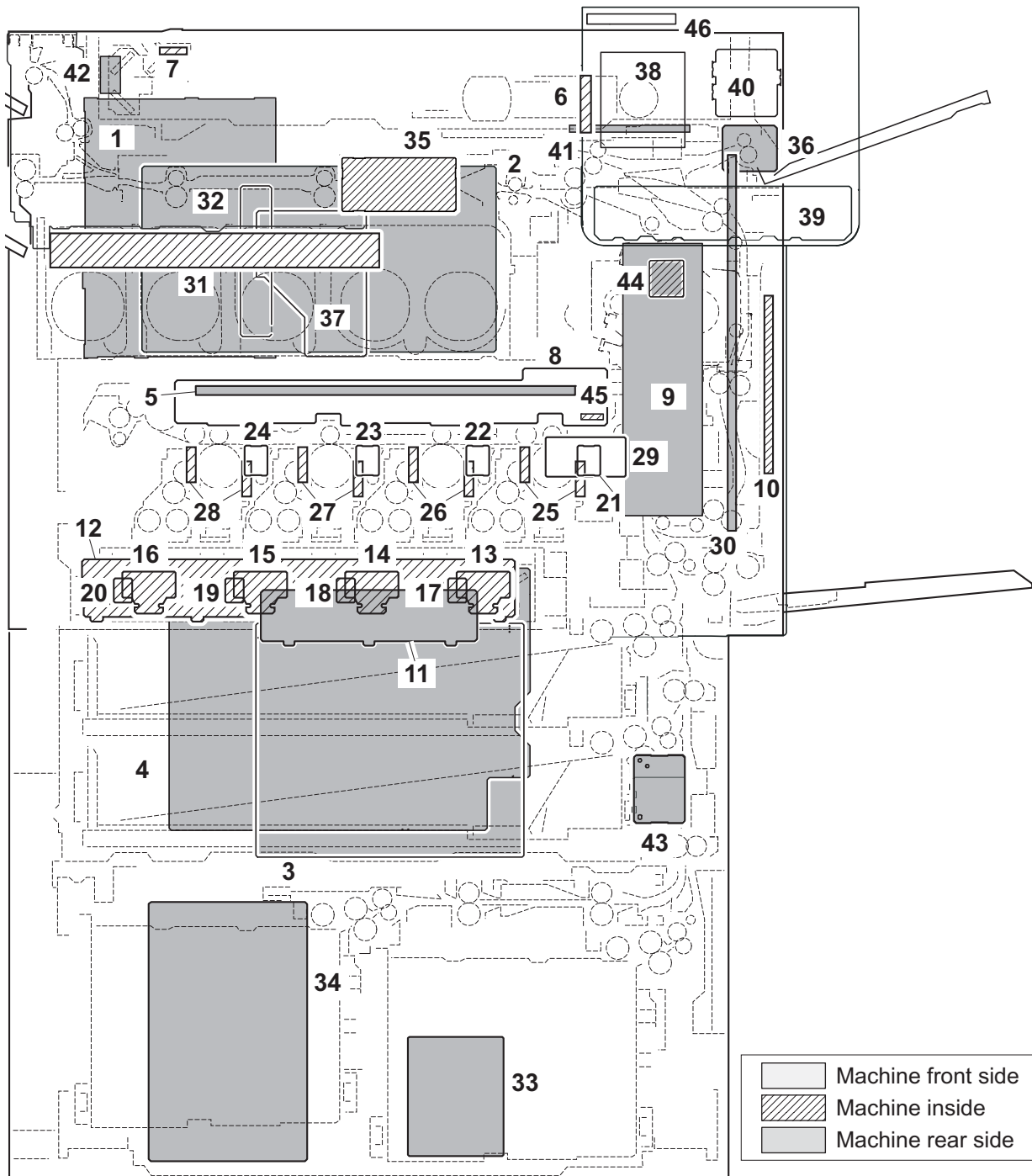


6 Engine PWB

7 Main high-voltage PWB

(2)Electric parts layout

(2-1)PWBs



1 Main PWB	Controlling the entire software to control the interface to the PC and network and image data process, etc.
2 Engine PWB	Controlling the hardware such as electric parts drive, high voltage, bias output, paper conveying, fuser temperature, etc.
3 Power source PWB	After full-wave rectification of AC power source input, switching for converting to 5 V DC for output.
4 Main high-voltage PWB	Generating the main charger high-voltage and the developer bias.
5 Transfer high-voltage PWB	Generating the transfer bias and separation bias.

6	CCD PWB	Scanning the original image.
7	LED PWB	Exposing originals.
8	Front PWB	Consists of wiring relay circuit between engine PWB and drum units, developer units, eject unit.
9	Feed PWB	Consists of wiring relay circuit between engine PWB and fuser drive unit, paper conveying section, drive section, relay PWB.
10	Relay PWB	Consists of wiring relay circuit between feed PWB and paper conveying unit.
11	Motor relay PWB	Consists of wiring relay circuit between engine PWB and drum motors, developer motors.
12	LSU relay PWB	Consists of wiring relay circuit between engine PWB and laser scanner unit.
13	APC PWB K	Generates and controls the laser beam (black).
14	APC PWB M	Generates and controls the laser beam (magenta).
15	APC PWB C	Generates and controls the laser beam (cyan).
16	APC PWB Y	Generates and controls the laser beam (yellow).
17	PD PWB K	Controls horizontal synchronizing timing of laser beam (black).
18	PD PWB M	Controls horizontal synchronizing timing of laser beam (magenta).
19	PD PWB C	Controls horizontal synchronizing timing of laser beam (cyan).
20	PD PWB Y	Controls horizontal synchronizing timing of laser beam (yellow).
21	Drum PWB K	Storing the drum unique data in an EEPROM.
22	Drum PWB M	Storing the drum unique data in an EEPROM.
23	Drum PWB C	Storing the drum unique data in an EEPROM.
24	Drum PWB Y	Storing the drum unique data in an EEPROM.
25	Encoder PWB K	Controls the drum motor K.
26	Encoder PWB M	Controls the drum motor M.
27	Encoder PWB C	Controls the drum motor C.
28	Encoder PWB Y	Controls the drum motor Y.
29	Retainer PWB	Consists of wiring relay circuit between engine PWB and toner hopper motors, developer fan motors.
30	IH PWB	Controlling IH.
31	RFID PWB	Reading the toner container information.
32	KUIO relay PWB	Consists of wiring relay circuit between main PWB and FAX PWB.
33	PF main PWB	Controlling the electric parts in the Large capacity feeder.
34	PF power source PWB	Power source output to large capacity feeder.
35	BR main PWB	Controlling the electric parts in the BR.
36	JS main PWB	Controlling the electric parts in the JS.
37	DP relay PWB	Relay of image data.

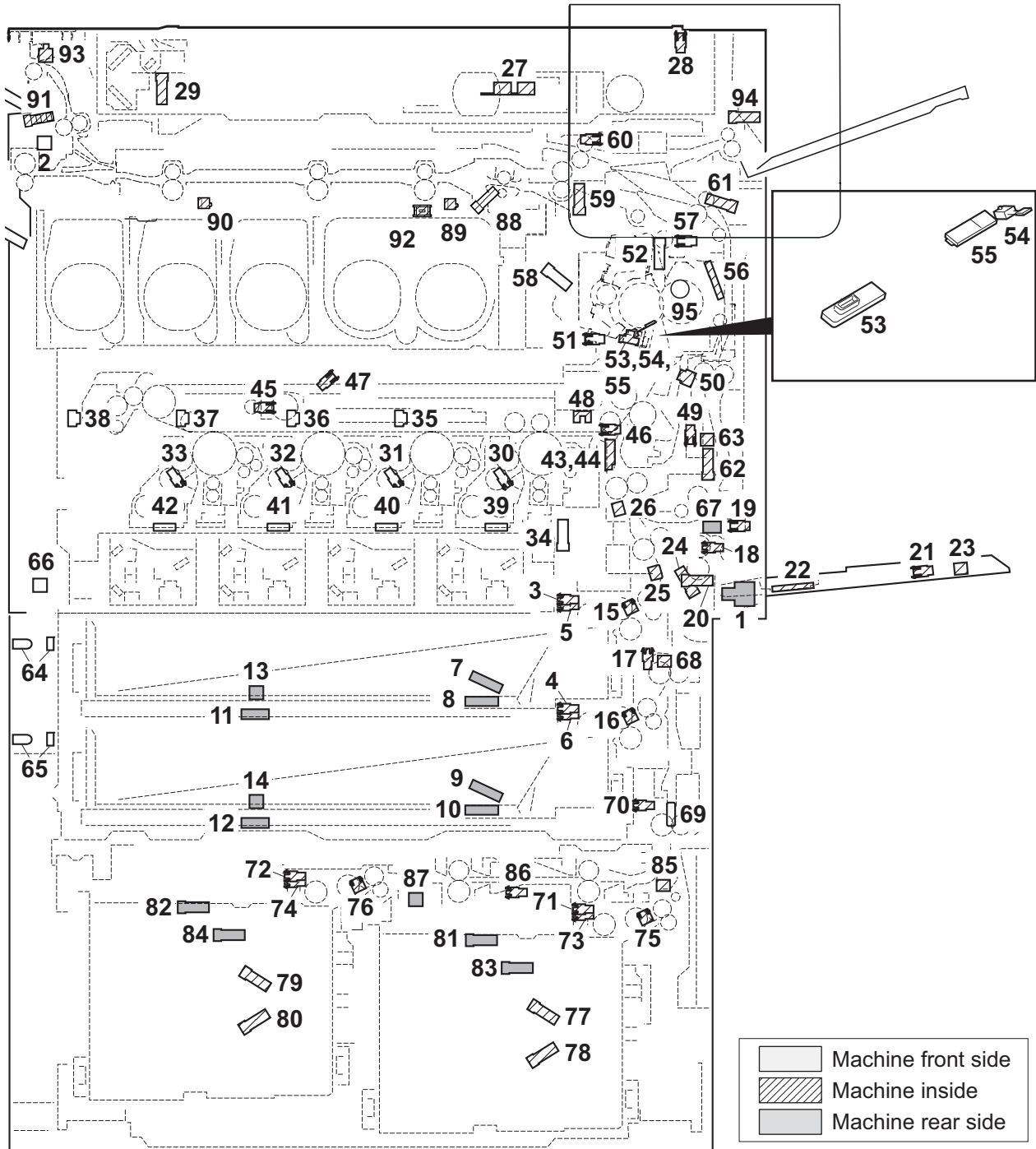
38 Operation panel main PWB	Controlling the touch panel and LCD indication.
39 Operation panel key PWB	Consists of the LED indicator and the key switches.
40 USB hub PWB	USB slot distribution.
41 Fuser high-voltage PWB	Discharging the fuser belt.
42 WiFi PWB	Wireless LAN connection (optional; except 120V model)
43 Current PWB	Converts the AC current input to the analog signal and delivers. (only for 100v model and 120V model)
44 Fuser PWB	Consists of wiring relay circuit for sensors.
45 EEPROM PWB	Storing the primary transfer unit unique data in an EEPROM.
46 NFC PWB	Antenna circuit for wireless communication.

**(3)Part name table (PWB)**

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
1	Main PWB	PARTS PWB MAIN ASSY SP PARTS PWB MAIN ASSY EU SP	302NH9405_ 302NH9409_	
2	Engine PWB	PARTS PWB ENGINE ASSY SP	302NH9410_	
3	Power source PWB	PARTS UNIT LOW VOLTAGE 100 SP PARTS UNIT LOW VOLTAGE 200 SP	302ND9461_ 302ND9462_	
4	Main high-voltage PWB	PARTS UNIT HIGH VOLTAGE MAIN SP	302NH9438_	
5	Transfer high-voltage PWB	PARTS UNIT HIGH VOLTAGE TRANSFER SP	302NH9437_	
6	CCD PWB	PARTS ISU ASSY H SP	302ND9311_	
7	LED PWB	PARTS MOUNT LED ASSY SP	302L79310_	
8	Front PWB	PARTS PWB FRONT CLR ASSY SP	302NH9411_	
9	Feed PWB	PARTS PWB FEED ASSY SP	302NH9432_	
10	Relay PWB	PARTS PWB JUNCTION ASSY SP	302K99420_	
11	Motor relay PWB	PARTS PWB MOTOR JUNCTION ASSY SP	302NH9433_	
12	LSU relay PWB	PARTS PWB LSU JUNCTION CLR ASSY SP	302NH9434_	
13	APC PWB K	LK-8720	302NH9313_	
14	APC PWB M	LK-8720	302NH9313_	
15	APC PWB C	LK-8720	302NH9313_	
16	APC PWB Y	LK-8720	302NH9313_	
17	PD PWB K	LK-8720	302NH9313_	
18	PD PWB M	LK-8720	302NH9313_	
19	PD PWB C	LK-8720	302NH9313_	
20	PD PWB Y	LK-8720	302NH9313_	
21	Drum PWB K	DK-8720	302NH9306_	

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
22	Drum PWB M	DK-8720	302NH9306_	
23	Drum PWB C	DK-8720	302NH9306_	
24	Drum PWB Y	DK-8720	302NH9306_	
25	Encoder PWB K	PARTS PWB ENCODER ASSY SP	-	
26	Encoder PWB M	PARTS PWB ENCODER ASSY SP	-	
27	Encoder PWB C	PARTS PWB ENCODER ASSY SP	-	
28	Encoder PWB Y	PARTS PWB ENCODER ASSY SP	-	
29	Retainer PWB	PARTS INNER UNIT SP	302NH9420_	
30	IH PWB	PARTS IH BOX ASSY (M/J) SP PARTS IH BOX ASSY (M/E) SP	302NH9419_ 302NH9418_	
31	RFID PWB	PARTS PWB RFID ASSY SP	-	
32	KUIO relay PWB	PARTS PWB KUIO ASSY SP	-	
33	PF main PWB	PARTS PWB FRONT DECK ASSY SP	302NH9430_	
34	PF power source PWB	PARTS UNIT LOW VOLTAGE 100 SP PARTS UNIT LOW VOLTAGE 200 SP	302L79413_ 302L79414_	
35	BR PWB	PARTS PWB NFC ASSY SP	302K99483_	
36	JS PWB	PARTS PWB JOB SEPA ASSY SP	302K99460_	
37	DP relay PWB	PARTS PWB DPIF ASSY SP	303R89405_	
38	Operation panel main PWB	PARTS PWB PANEL MAIN ASSY SP	302RH9403_	
39	Operation panel sub PWB	PARTS PWB OPERATION ASSY SP	302RH9404_	
40	USB hub PWB	PARTS PWB USB HUB ASSY SP	302RH9402_	
41	Fuser high-voltage PWB	PARTS UNIT HIGH VOLTAGE FUSER SP	302ND9469_	
42	WiFi PWB	PARTS WIFI UNIT SP	303RR9401_	
43	Current PWB	PARTS PWB CURRENT AVE 100 ASSY SP	302N49421_	
44	Fuser PWB	FK-8720 FK-8721 FK-8722	302NH9308_ 302NH9309_ 302NH9310_	
45	EEPROM PWB	TR-8720	302NH9314_	
46	NFC PWB	PARTS PWB NFC ASSY SP	302RH9405_	

**(4)Sensors and Switches**



1 Main power switch	<b>AC power shutdown.</b>
2 Front cover switch	<b>Detecting the opening and closing of the front upper cover.</b>
3 Paper sensor 1	<b>Detecting the presence of paper (cassette 1).</b>
4 Paper sensor 2	<b>Detecting the presence of paper (cassette 2).</b>
5 Lift sensor 1	<b>Detecting the upper limit when lifting the bottom plate (cassette 1).</b>
6 Lift sensor 2	<b>Detecting the upper limit when lifting the bottom plate (cassette 2).</b>
7 Upper paper gauge sensor 1	<b>Detecting the paper gauge (cassette 1).</b>
8 Lower paper gauge sensor 1	<b>Detecting the paper gauge (cassette 1).</b>



9	Upper paper gauge sensor 2	<b>Detecting the paper gauge (cassette 2).</b>
10	Lower paper gauge sensor 2	<b>Detecting the paper gauge (cassette 2).</b>
11	Paper length sensor 1	<b>Detecting the paper length (cassette 1).</b>
12	Paper length sensor 2	<b>Detecting the paper length (cassette 2).</b>
13	Paper width sensor 1	<b>Detecting the paper width (cassette 1).</b>
14	Paper width sensor 2	<b>Detecting the paper width (cassette 2).</b>
15	Paper feed sensor 1	<b>Detecting the paper jam in the paper feed section (cassette 1).</b>
16	Paper feed sensor 2	<b>Detecting the paper jam in the paper feed section (cassette 2).</b>
17	Conveying sensor	<b>Detecting the paper jam in the vertical conveying section.</b>
18	MP paper sensor	<b>Detecting the presence of paper (MP tray).</b>
19	MP upper lift sensor	<b>Detecting the upper limit when lifting the MP plate.</b>
20	MP lower lift sensor	<b>Detecting the lower limit when descending the MP plate.</b>
21	MP paper length sensor	<b>Detecting the paper length (MP tray).</b>
22	MP paper width sensor	<b>Detecting the paper width (MP tray).</b>
23	MP tray switch	<b>Detecting the MP sub tray is pulled out.</b>
24	MP conveying sensor	<b>Detecting the paper jam in the MP paper feed section.</b>
25	Middle sensor	<b>Detecting the paper jam in the paper conveying section.</b>
26	Registration sensor	<b>Controlling the timing to start the secondary paper feeding.</b>
27	Original size sensor	<b>Detecting the original size.</b>
28	Original size timing sensor	<b>Detecting the opening and closing of the document processor.</b>
29	Home position sensor	<b>Detecting the position of the image scanner unit.</b>
30	Screw sensor K	<b>Controlling the toner replenishing for the toner hopper K.</b>
31	Screw sensor M	<b>Controlling the toner replenishing for the toner hopper M.</b>
32	Screw sensor C	<b>Controlling the toner replenishing for the toner hopper C.</b>
33	Screw sensor Y	<b>Controlling the toner replenishing for the toner hopper Y.</b>
34	Developer shutter sensor	<b>Detecting the opening and closing of the developer shutter.</b>
35	Toner hopper sensor K	<b>Detecting the quantity of toner in a toner hopper K.</b>
36	Toner hopper sensor M	<b>Detecting the quantity of toner in a toner hopper M.</b>
37	Toner hopper sensor C	<b>Detecting the quantity of toner in a toner hopper C.</b>
38	Toner hopper sensor Y	<b>Detecting the quantity of toner in a toner hopper Y.</b>
39	Toner sensor K	<b>Detecting the toner density in the developer unit K.</b>
40	Toner sensor M	<b>Detecting the toner density in the developer unit M.</b>
41	Toner sensor C	<b>Detecting the toner density in the developer unit C.</b>
42	Toner sensor Y	<b>Detecting the toner density in the developer unit Y.</b>
43	ID sensor front	<b>Measuring the toner density at the calibration.</b>
44	ID sensor rear	<b>Measuring the toner density at the calibration.</b>

45 Color release sensor	<b>Detecting the separation of primary transfer rollers M, C, and Y.</b>
46 Transfer belt sensor	<b>Detecting the positioning of transfer belt rotation.</b>
47 Transfer skew sensor	<b>Detecting the skew of transfer belt center position.</b>
48 Transfer edge sensor	<b>Detecting the edge position of the transfer belt.</b>
49 Transfer release sensor	<b>Detecting the separation of secondary transfer roller.</b>
50 Loop sensor	<b>Detecting the paper jam. Controlling the fuser motor by detecting deflection in the paper.</b>
51 Fuser belt sensor	<b>Detecting the positioning of fuser belt rotation.</b>
52 Fuser release sensor	<b>Detecting the mode of the fuser pressure.</b>
53 Fuser center thermistor	<b>Detecting the heat roller (fuser belt) temperature.</b>
54 Fuser edge thermistor	<b>Detecting the heat roller (fuser belt) temperature.</b>
55 Fuser A3 thermistor	<b>Detecting the heat roller (fuser belt) temperature.</b>
56 Fuser press thermistor	<b>Detecting the press roller temperature.</b>
57 Fuser eject sensor	<b>Detecting the paper jam in the eject section.</b>
58 IH core sensor	<b>Detecting the position of the IH center core.</b>
59 Eject sensor	<b>Detecting the paper jam in the feed-shift section.</b>
60 Reversing sensor	<b>Detecting the paper jam in the switchback section.</b>
61 Duplex sensor 1	<b>Detecting the paper jam in the duplex section.</b>
62 Duplex sensor 2	<b>Detecting the paper jam in the duplex section.</b>
63 Duplex cover switch	<b>Detects the opening and closing of the duplex cover.</b>
64 Waste toner sensor 1	<b>Detecting the waste toner box full (full).</b>
65 Waste toner sensor 2	<b>Detecting the waste toner box full (near end).</b>
66 Waste toner detection switch	<b>Detecting the waste toner box is installed.</b>
67 Conveying unit switch	<b>Detecting the opening and closing of the conveying unit.</b>
68 Conveying cover open/close switch	<b>Detecting the opening and closing of the conveying cover.</b>
69 Outer temperature/humidity sensor	<b>Detecting the temperature and humidity outside the main unit.</b>
70 PF conveying cover open/close switch	<b>Detecting the opening and closing of the PF conveying cover.</b>
71 PF paper sensor 1	<b>Detecting the presence of paper (cassette 3).</b>
72 PF paper sensor 2	<b>Detecting the presence of paper (cassette 4).</b>
73 PF lift sensor 1	<b>Detecting the upper limit when lifting the bottom plate (cassette 3).</b>
74 PF lift sensor 2	<b>Detecting the upper limit when lifting the bottom plate (cassette 4).</b>
75 PF paper feed sensor 1	<b>Detecting the paper jam in the paper feed section (cassette 3).</b>
76 PF paper feed sensor 2	<b>Detecting the paper jam in the paper feed section (cassette 4).</b>
77 PF upper paper gauge sensor 1	<b>Detecting the paper gauge (cassette 3).</b>

78 PF lower paper gauge sensor 1	<b>Detecting the paper gauge (cassette 3).</b>
79 PF upper paper gauge sensor 2	<b>Detecting the paper gauge (cassette 4).</b>
80 PF lower paper gauge sensor 2	<b>Detecting the paper gauge (cassette 4).</b>
81 PF paper size detection switch 1	<b>Detecting the size of paper (cassette 3).</b>
82 PF paper size detection switch 2	<b>Detecting the size of paper (cassette 4).</b>
83 PF cassette detection switch 1	<b>Detecting the presence of cassette 3.</b>
84 PF cassette detection switch 2	<b>Detecting the presence of cassette 4.</b>
85 PF conveying sensor 1	<b>Detecting paper jam in the vertical conveying section.</b>
86 PF conveying sensor 2	<b>Detecting paper jam in the horizontal conveying section.</b>
87 PF conveying unit switch	<b>Detecting the presence of PF conveying unit.</b>
88 BR decurler sensor	<b>Detecting the positioning of decurler rotation.</b>
89 BR conveying sensor 1	<b>Detecting the paper jam in the bridge section.</b>
90 BR conveying sensor 2	<b>Detecting the paper jam in the bridge section.</b>
91 BR eject sensor	<b>Detecting the paper jam in the bridge eject section.</b>
92 BR conveying unit switch	<b>Detecting the presence of the bridge conveying unit.</b>
93 BR eject cover switch	<b>Detecting the opening and closing of the bridge eject cover.</b>
94 JS open/close detection sensor	<b>Detecting the opening and closing of the job separator.</b>
95 Power switch	<b>Turning on and off the main/engine PWB, the engine relay PWB and the operation panel PWB, etc.</b>

**(4-1)Part name table (Sensors and Switches)**

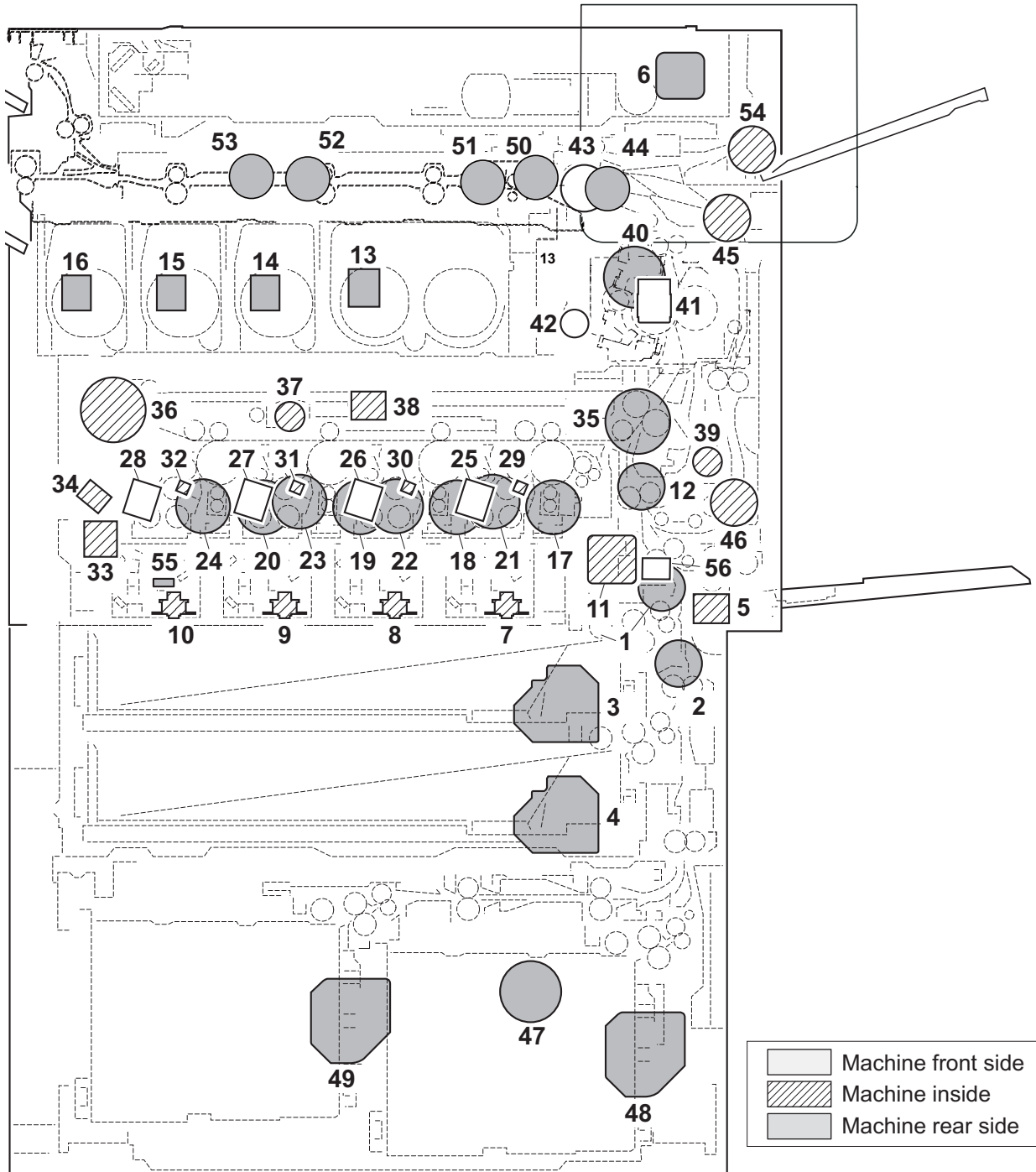
No.	Name used in service manual	Name used in parts list	Part. No.	Reference
1	Main power switch	SW.SEESAW	7SC020403+++H01	
2	Front cover switch	SW.PUSH	7SP01000006+H01	
3	MP paper sensor 1	PARTS SENSOR OPT SP	303M89426_	
4	MP paper sensor 2	PARTS SENSOR OPT SP	303M89426_	
5	Lift sensor 1	PARTS SENSOR OPT SP	303M89426_	
6	Lift sensor 2	PARTS SENSOR OPT SP	303M89426_	
7	Upper paper gauge sensor 1	PARTS SENSOR OPT SP	303M89426_	
8	Lower paper gauge sensor 1	PARTS SENSOR OPT SP	303M89426_	
9	Upper paper gauge sensor 2	PARTS SENSOR OPT SP	303M89426_	
10	Lower paper gauge sensor 2	PARTS SENSOR OPT SP	303M89426_	

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
11	Paper length sensor 1	SW.PUSH	7SP03072001+H01	
12	Paper length sensor 2	SW.PUSH	7SP03072001+H01	
13	Paper width sensor 1	SW.PUSH	7SP01000006+H01	
14	Paper width sensor 2	SW.PUSH	7SP01000006+H01	
15	Paper feed sensor 1	PARTS SENSOR OPT. SP	302K99458_	
16	Paper feed sensor 2	PARTS SENSOR OPT. SP	302K99458_	
17	Conveying sensor	PARTS SENSOR OPT. SP	302K99458_	
18	MP paper sensor	PARTS SENSOR OPT SP	303M89426_	
19	MP upper lift sensor	SENSOR OPT.	7NXGP1A173LCH01	
20	MP lower lift sensor	SENSOR OPT.	7NXGP1A173LCH01	
21	MP paper length sensor	SENSOR OPT.	7NXGP1A173LCH01	
22	MP paper width sensor	PARTS PWB MPF SIZE ASSY SP	302K99462_	
23	MP tray switch	SW.PUSH	7SP01000006+H01	
24	MP conveying sensor	SENSOR OPT.	7NXGP1A173LCH01	
25	DF middle sensor	SWITCH REGISTRATION	2FG2711_	
26	Registration sensor	SENSOR,CONVEYING	3H32741_	
27	Original size sensor	SENSOR ORIGINAL	2C92709_	
28	Original size timing sensor	SENSOR OPT.	7NXGP1A173LCH01	
29	Home position sensor	SENSOR OPT.	7NXGP1A173LCH01	
30	Screw sensor K	SENSOR OPT.	7NXGP1A173LCH01	
31	Screw sensor M	SENSOR OPT.	7NXGP1A173LCH01	
32	Screw sensor C	SENSOR OPT.	7NXGP1A173LCH01	
33	Screw sensor Y	SENSOR OPT.	7NXGP1A173LCH01	
34	Developer shutter sensor	SENSOR OPT.	7NXGP1A173LCH01	
35	Toner hopper sensor K	TONER EMPTY DETECTION SENSOR	303391518_	
36	Toner hopper sensor M	TONER EMPTY DETECTION SENSOR	303391518_	
37	Toner hopper sensor C	TONER EMPTY DETECTION SENSOR	303391518_	
38	Toner hopper sensor Y	TONER EMPTY DETECTION SENSOR	303391518_	
39	Toner sensor K	DV-8720K(J) DV-8720K	302NH9J02_ 302NH9302_	
40	Toner sensor M	DV-8720M(J) DV-8720M	302NH9J04_ 302NH9304_	
41	Toner sensor C	DV-8720C(J) DV-8720C	302NH9J03_ 302NH9303_	

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
42	Toner sensor Y	DV-8720Y(J) DV-8720Y	302NH9J05_ 302NH9305_	
43	ID sensor front	PARTS ID SENSOR ASSY SP	302R69406_	
44	ID sensor rear	PARTS ID SENSOR ASSY SP	302R69406_	
45	Color release sensor	TR-8720	302NH9314_	
46	Transfer belt sensor	TR-8720	302NH9314_	
47	Transfer skew sensor	TR-8720	302NH9314_	
48	Transfer edge sensor	TR-8720	302NH9314_	
49	Transfer roller release sensor	TR-8720	302NH9314_	
50	Loop sensor	PARTS SENSOR OPT. SP	302LC9441_	
51	Fuser belt sensor	FK-8720	302NH9308_	
52	Fuser release sensor	FK-8721	302NH9309_	
53	Fuser center thermistor	FK-8722	302NH9310_	
54	Fuser edge thermistor			
55	Fuser A3 thermistor			
56	Fuser press thermistor			
57	Fuser eject sensor			
58	IH core sensor	SENSOR OPT.	7NXGP1A173LCH01	
59	Eject sensor	SENSOR OPT.	7NXGP1A173LCH01	
60	Reversing sensor	SENSOR OPT.	7NXGP1A173LCH01	
61	Duplex sensor 1	PARTS CONVEYING H UNIT SP	302NH9406_	
62	Duplex sensor 2	PARTS CONVEYING H UNIT SP	302NH9406_	
63	Duplex cover switch	SWITCH,COVER OPEN	6612701_	
64	Waste toner sensor 1	PARTS TONER FULL DETECT ASSY SP	302K99415_	
65	Waste toner sensor 2	PARTS TONER FULL DETECT ASSY SP	302K99415_	
66	Waste toner switch	SW.PUSH	7SP01000006+H01	
67	Conveying unit switch	INTER LOCK SWITCH	2FB2716_	
68	Conveying cover open/close switch	SW.PUSH	7SP01000006+H01	
69	Outer temperature/humidity sensor	PARTS,HUMIDITY SENSOR,SP	302H09430_	
70	PF conveying cover open/close switch	PARTS SENSOR OPT SP	303M89426_	
71	PF paper sensor 1	PARTS SENSOR OPT SP	303M89426_	
72	PF paper sensor 2	PARTS SENSOR OPT SP	303M89426_	
73	PF lift sensor 1	PARTS SENSOR OPT SP	303M89426_	
74	PF lift sensor 2	PARTS SENSOR OPT SP	303M89426_	

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
75	PF paper feed sensor 1	PARTS SENSOR OPT. SP	302K99458_	
76	PF paper feed sensor 2	PARTS SENSOR OPT. SP	302K99458_	
77	PF upper paper gauge sensor 1	PARTS SENSOR OPT SP	303M89426_	
78	PF lower paper gauge sensor 1	PARTS SENSOR OPT SP	303M89426_	
79	PF upper paper gauge sensor 2	PARTS SENSOR OPT SP	303M89426_	
80	PF lower paper gauge sensor 2	PARTS SENSOR OPT SP	303M89426_	
81	PF paper size detection switch 1	PARTS SENSOR OPT SP	303M89426_	
82	PF paper size detection switch 2	PARTS SENSOR OPT SP	303M89426_	
83	PF cassette switch 1	PARTS SENSOR OPT SP	303M89426_	
84	PF cassette switch 2	PARTS SENSOR OPT SP	303M89426_	
85	PF conveying sensor 1	PARTS SENSOR OPT SP	303M89426_	
86	PF conveying sensor 2	PARTS SENSOR OPT SP	303M89426_	
87	PF conveying unit switch	SW.PUSH	7SP01000006+H01	
88	BR decurler sensor	SENSOR OPT.	7NXGP1A173LCH01	
89	BR conveying sensor 1	SENSOR OPT.	7NXGP1A173LCH01	
90	BR conveying sensor 2	SENSOR OPT.	7NXGP1A173LCH01	
91	BR eject sensor	SENSOR OPT.	7NXGP1A173LCH01	
92	BR conveying unit switch	SW.PUSH	7SP01000006+H01	
93	BR eject cover switch	SW.PUSH	7SP01000006+H01	
94	JS open/close detection sensor	SENSOR OPT.	7NXGP1A173LCH01	
95	Power switch	PARTS PWB SWITCH ASSY SP	302NG9430_	

**(5)Motors**



1 Paper feed motor	Driving the paper feed.
2 Vertical paper feed motor	Driving the paper feed section.
3 Lift motor 1	Operating the bottom plate (cassette 1).
4 Lift motor 2	Operating the bottom plate (cassette 2).
5 MP lift motor	Operates the MP plate.
6 Scanner motor	Driving the optical section.
7 Polygon motor K	Driving the polygon mirror K.
8 Polygon motor M	Driving the polygon mirror M.

9 Polygon motor C	Driving the polygon mirror C.
10 Polygon motor Y	Driving the polygon mirror Y.
11 Registration motor	Driving the registration section.
12 Middle conveying motor	Driving the conveying section.
13 Toner motor K	Driving the toner container K.
14 Toner motor M	Driving the toner container M.
15 Toner motor C	Driving the toner container C.
16 Toner motor Y	Driving the toner container Y.
17 Drum motor K	Driving the drum unit K.
18 Drum motor M	Driving the drum unit M.
19 Drum motor C	Driving the drum unit C.
20 Drum motor Y	Driving the drum unit Y.
21 Developer motor K	Driving the developer unit K.
22 Developer motor M	Driving the developer unit M.
23 Developer motor C	Driving the developer unit C.
24 Developer motor Y	Driving the developer unit Y.
25 Toner hopper motor K	Replenishing toner to the developer unit K.
26 Toner hopper motor M	Replenishing toner to the developer unit M.
27 Toner hopper motor C	Replenishing toner to the developer unit C.
28 Toner hopper motor Y	Replenishing toner to the developer unit Y.
29 Vibration motor K	Vibrating the toner lump in the developer unit K.
30 Vibration motor M	Vibrating the toner lump in the developer unit M.
31 Vibration motor C	Vibrating the toner lump in the developer unit C.
32 Vibration motor Y	Vibrating the toner lump in the developer unit Y.
33 LSU cleaning motor	Driving the LSU glass cleaning mechanism.
34 Waste toner motor	Driving the waste toner mechanism.
35 Transfer motor	Driving the transfer section.
36 Transfer cleaning motor	Driving the transfer cleaning section.
37 Color release motor	Driving the separation of primary transfer rollers M, C, and Y.
38 Transfer skew motor	Driving the skew of transfer tension roller.
39 Transfer roller release motor	Driving the separation of secondary transfer roller.
40 Fuser motor	Driving the fuser section.
41 Fuser release motor	Driving the fuser pressure release.
42 IH core motor	Driving IH section.
43 Eject motor	Driving the eject section.



44 Reversing motor	Driving the feed-shift section.
45 Duplex motor 1	Driving the duplex section.
46 Duplex motor 2	Driving the duplex section.
47 PF paper feed motor	Driving the paper feed section of the large capacity feeder.
48 PF lift motor 1	Operating the bottom plate (cassette 3).
49 PF lift motor 2	Operating the bottom plate (cassette 4).
50 BR conveying decurler motor	Driving the decurler (press roller).
51 BR conveying guide motor	Driving the rotary decurler.
52 BR conveying motor 1	Driving the conveying section.
53 BR conveying motor 2	Driving the conveying section.
54 JS eject motor	Driving the job separator.
55 Toner vibration motor	Vibration of the filter inside the waste toner box.
56 Waste toner collection motor	Driving the waste toner mechanism in the inner unit.

**(5-1)Part name table (motor)**

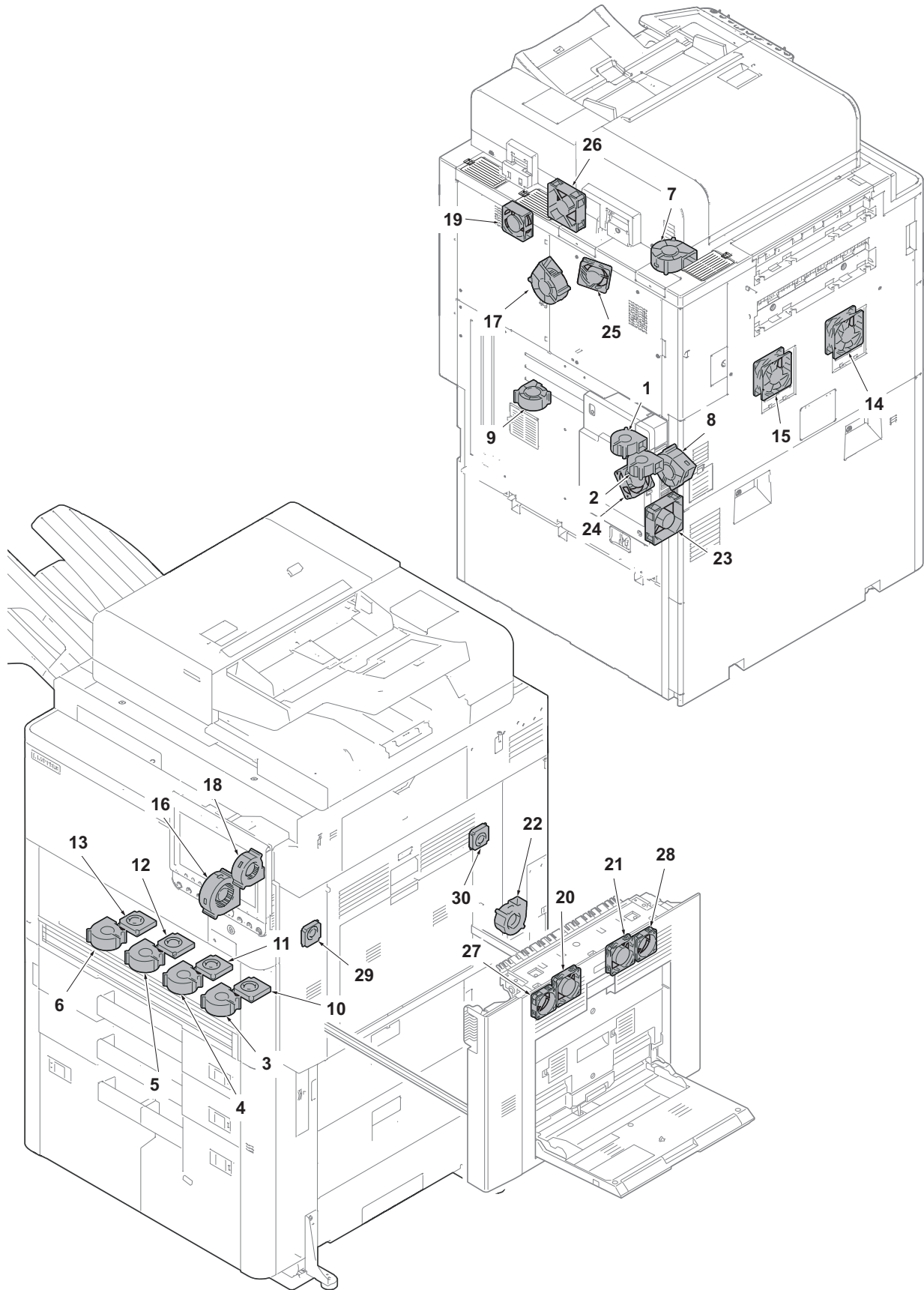
No.	Name used in service manual	Name used in parts list	Part. No.	Reference
1	Paper feed motor	PARTS MOTOR-BL INNER W10 SP	302NH9414_	
2	Vertical conveying motor	PARTS MOTOR-BL INNER W10 SP	302NH9414_	
3	Lift motor 1	PARTS MOTOR LIFT ASSY SP	302NH9436_	
4	Lift motor 2	PARTS MOTOR LIFT ASSY SP	302NH9436_	
5	MP lift motor	DC MOTOR	302HN4422_	
6	Scanner motor	PARTS MOTOR ISU SP	302N29401_	
7	Polygon motor K	LK-8720	302NH9313_	
8	Polygon motor M	LK-8720	302NH9313_	
9	Polygon motor C	LK-8720	302NH9313_	
10	Polygon motor Y	LK-8720	302NH9313_	
11	registration motor	PARTS MOTOR-BL INNER W10 SP	302NH9414_	
12	Middle conveying motor	PARTS MOTOR-BL INNER W10 SP	302NH9414_	
13	Toner motor K	MOTOR DC CONT K	-	
14	Toner motor M	MOTOR DC CONT C	-	
15	Toner motor C	MOTOR DC CONT C	-	
16	Toner motor Y	MOTOR DC CONT C	-	
17	Drum motor K	PARTS MOTOR-BL W30 DRUM SP	302K99429_	
18	Drum motor M	PARTS MOTOR-BL W30 DRUM SP	302K99429_	
19	Drum motor C	PARTS MOTOR-BL W30 DRUM SP	302K99429_	
20	Drum motor Y	PARTS MOTOR-BL W30 DRUM SP	302K99429_	
21	Developer motor K	PARTS MOTOR-BL W30 DLP SP	302K99489_	

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
22	Developer motor M	PARTS MOTOR-BL W30 DLP SP	302K99489_	
23	Developer motor C	PARTS MOTOR-BL W30 DLP SP	302K99489_	
24	Developer motor Y	PARTS MOTOR-BL W30 DLP SP	302K99489_	
25	Toner hopper motor K	PARTS INNER UNIT SP	302NH9420_	
26	Toner hopper motor M	PARTS INNER UNIT SP	302NH9420_	
27	Toner hopper motor C	PARTS INNER UNIT SP	302NH9420_	
28	Toner hopper motor Y	PARTS INNER UNIT SP	302NH9420_	
29	Vibration motor K	DV-8720K(J) DV-8720K	302NH9J02_ 302NH9302_	
30	Vibration motor M	DV-8720M(J) DV-8720M	302NH9J04_ 302NH9304_	
31	Vibration motor C	DV-8720C(J) DV-8720C	302NH9J03_ 302NH9303_	
32	Vibration motor Y	DV-8720Y(J) DV-8720Y	302NH9J05_ 302NH9305_	
33	LSU cleaning motor	MOTOR DC CONT K	-	
34	Waste toner motor	PARTS CLN WT UNIT(M) SP	302NH9404_	
35	Transfer motor	PARTS TRANSFER DRIVE UNIT SP	302NH9429_	
36	Transfer cleaning motor	TR-8720	302NH9314_	
37	Color release motor	TR-8720	302NH9314_	
38	Transfer skew motor	TR-8720	302NH9314_	
39	Transfer roller release motor	TR-8720	302NH9314_	
40	Fuser motor	PARTS FUSER DRIVE UNIT SP	302NH9415_	
41	Fuser release motor	FK-8720 FK-8721 FK-8722	302NH9308_ 302NH9309_ 302NH9310_	
42	IH core motor	FK-8740 IH FK-8745 IH	302NH9311_ 302NH9312_	
43	Eject motor	PARTS MOTOR PM FEED SP	302K99430_	
44	Reversing motor	PARTS MOTOR PM FEED SP	302K99430_	
45	Duplex motor 1	PARTS MOTOR PM FEED SP	302K99430_	
46	Duplex motor 2	PARTS MOTOR PM FEED SP	302K99430_	
47	PF paper feed motor	PARTS MOTOR-BL W30 SP	302K99433_	
48	PF lift motor 1	PARTS MOTOR LIFT DECK SP	303NF9409_	
49	PF Lift motor 2	PARTS MOTOR LIFT DECK SP	303NF9409_	
50	BR conveying decurler motor	PARTS MOTOR PM FEED SP	302K99430_	
51	BR conveying guide motor	PARTS MOTOR PM FEED SP	302K99430_	
52	BR conveying motor 1	PARTS MOTOR PM FEED SP	302K99430_	

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No.	Name used in service manual	Name used in parts list	Part. No.	Reference
53	BR conveying motor 2	PARTS MOTOR PM FEED SP	302K99430_	
54	JS eject motor	PARTS MOTOR PM FEED SP	302K99430_	
55	Toner vibration motor	PARTS DISPOSAL UNIT(M3) SP	302NH9408_	
56	Waste toner collection motor	PARTS CLN WT UNIT(M) SP	302NH9404_	

**(6)Fan motor**



1 Toner fan motor 1	Collecting scattered toner.
2 Toner fan motor 2	Collecting scattered toner.

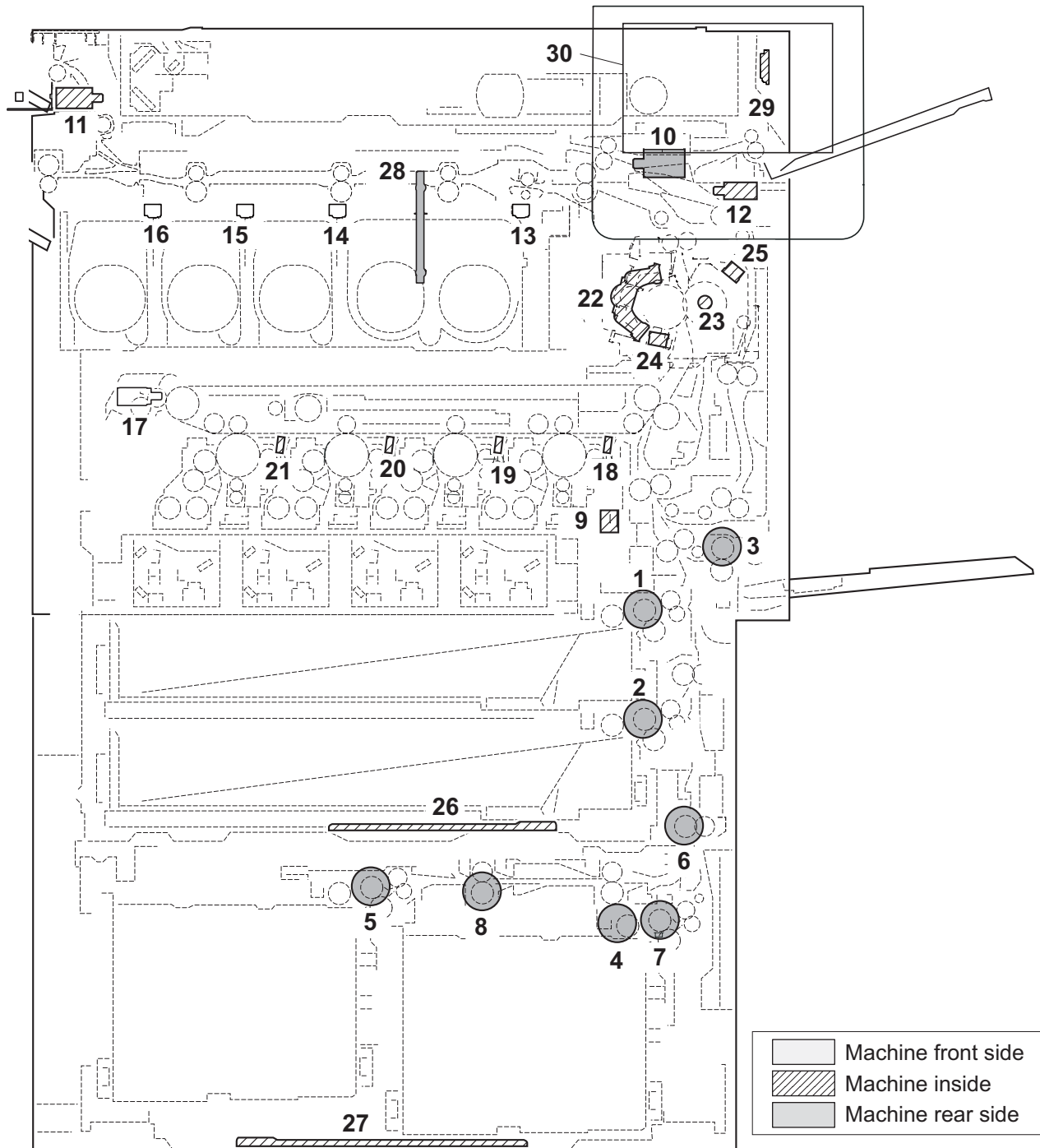
3	Developer fan motor K	Cools the developer unit K.
4	Developer fan motor M	Cools the developer unit M.
5	Developer fan motor C	Cools the developer unit C.
6	Developer fan motor Y	Cools the developer unit Y.
7	Exhaust fan motor 1	Cools the machine inside.
8	Exhaust fan motor left	Cools the machine inside.
9	Exhaust fan motor right	Cools the machine inside.
10	LSU fan motor K	Cools the laser scanner unit K.
11	LSU fan motor M	Cools the laser scanner unit M.
12	LSU fan motor C	Cools the laser scanner unit C.
13	LSU fan motor Y	Cools the laser scanner unit Y.
14	Front belt fan motor	Cools the transfer belt section.
15	Rear belt fan motor	Cools the transfer belt section.
16	IH core fan motor	Cools the fuser section (front side).
17	Rear fuser fan motor	Cools the fuser section (rear side).
18	Front eject fan motor	Cools the eject section (front side).
19	Rear eject fan motor	Cools the eject section (rear side).
20	Right front eject fan motor 1	Cooling the eject section.
21	Right rear eject fan motor 1	Cooling the eject section.
22	IH fan motor	Cools the IH PWB.
23	Power source fan motor 1	Cools the power source section.
24	Power source fan motor 2	Cools the power source section.
25	Controller fan motor	Cools the controller section.
26	Bridge fan motor	Cools the bridge section.
27	Right front eject fan motor 2	Cools the eject section.
28	Right rear eject fan motor 2	Cools the eject section.
29	Front fuser edge fan motor	Cools the fuser edge section.
30	Rear fuser edge fan motor	Cools the fuser edge section.

**(6-1)Part name table (fan motor)**

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
1	Toner collection fan motor 1	PARTS DISPOSAL UNIT(M3) SP	302NH9408_	
2	Toner collection fan motor 2	PARTS DISPOSAL UNIT(M3) SP	302NH9408_	
3	Developer fan motor K	PARTS FAN COOLING LSU 60 SP	302LC9438_	
4	Developer fan motor M	PARTS FAN COOLING LSU 60 SP	302LC9438_	
5	Developer fan motor C	PARTS FAN COOLING LSU 60 SP	302LC9438_	

No.	Name used in service manual	Name used in parts list	Part. No.	Reference
6	Developer fan motor Y	PARTS FAN COOLING LSU 60 SP	302LC9438_	
7	Eject fan motor	PARTS,FAN COOLING DLP 70 SP	302FZ9438_	
8	Left eject fan motor	PARTS,FAN COOLING DLP 70 SP	302FZ9438_	
9	Right eject fan motor	PARTS,FAN COOLING DLP 70 SP	302FZ9438_	
10	LSU fan motor K	PARTS FAN COOLING LSU 50 SP	302K99427_	
11	LSU fan motor M	PARTS FAN COOLING LSU 50 SP	302K99427_	
12	LSU fan motor C	PARTS FAN COOLING LSU 50 SP	302K99427_	
13	LSU fan motor Y	PARTS FAN COOLING LSU 50 SP	302K99427_	
14	Front belt fan motor	FAN MOTOR	302HN4401_	
15	Rear belt fan motor	FAN MOTOR	302HN4401_	
16	IH core fan motor	PARTS FAN COOLING DLP 70 SP	302K99435_	
17	Rear fuser fan motor	FAN LSU 60-25	-	
18	Front eject fan motor	PARTS FAN COOLING LSU 60 SP	302LC9438_	
19	Rear eject fan motor	FAN LSU 60-25	-	
20	Right front eject fan motor 1	PARTS,FAN COOLING CONVEYING SP	302FZ9442_	
21	Right rear eject fan motor 1	PARTS,FAN COOLING CONVEYING SP	302FZ9442_	
22	IH fan motor	PARTS FAN COOLING LSU 60 SP	302LC9438_	
23	Power source fan motor 1	FAN MOTOR	-	
24	Power source fan motor 2	PARTS FAN CENTER 60 25 SP	302ND9459_	
25	Controller fan motor	FAN BOX COOLING	302FZ4404_	
26	BR fan motor	FAN MOTOR	302K09430_	
27	Right front eject fan motor 2	PARTS FAN COOLING 50 SP	302LC9432_	
28	Right rear eject fan motor 2	PARTS FAN COOLING 50 SP	302LC9432_	
29	Fuser front edge fan motor	FK-8720 FK-8721 FK-8722	302NH9308_ 302NH9309_ 302NH9310_	
30	Rear fuser edge fan motor	FK-8720 FK-8721 FK-8722	302NH9308_ 302NH9309_ 302NH9310_	

## (7)Others



1 Paper feed clutch 1	Controlling the primary paper feeding from the cassette 1.
2 Paper feed clutch 2	Controlling the primary paper feeding from the cassette 2.
3 MP paper feed clutch	Controlling the primary paper feeding from the MP tray.
4 PF paper feed clutch 1	Controlling the primary paper feeding from the cassette 3.
5 PF paper feed clutch 2	Controlling the primary paper feeding from the cassette 4.
6 PF conveying clutch 1	Controlling the drive of vertical conveying section.
7 PF conveying clutch 2	Controlling the drive of vertical conveying section.
8 PF conveying clutch 3	Controlling the drive of horizontal conveying section.

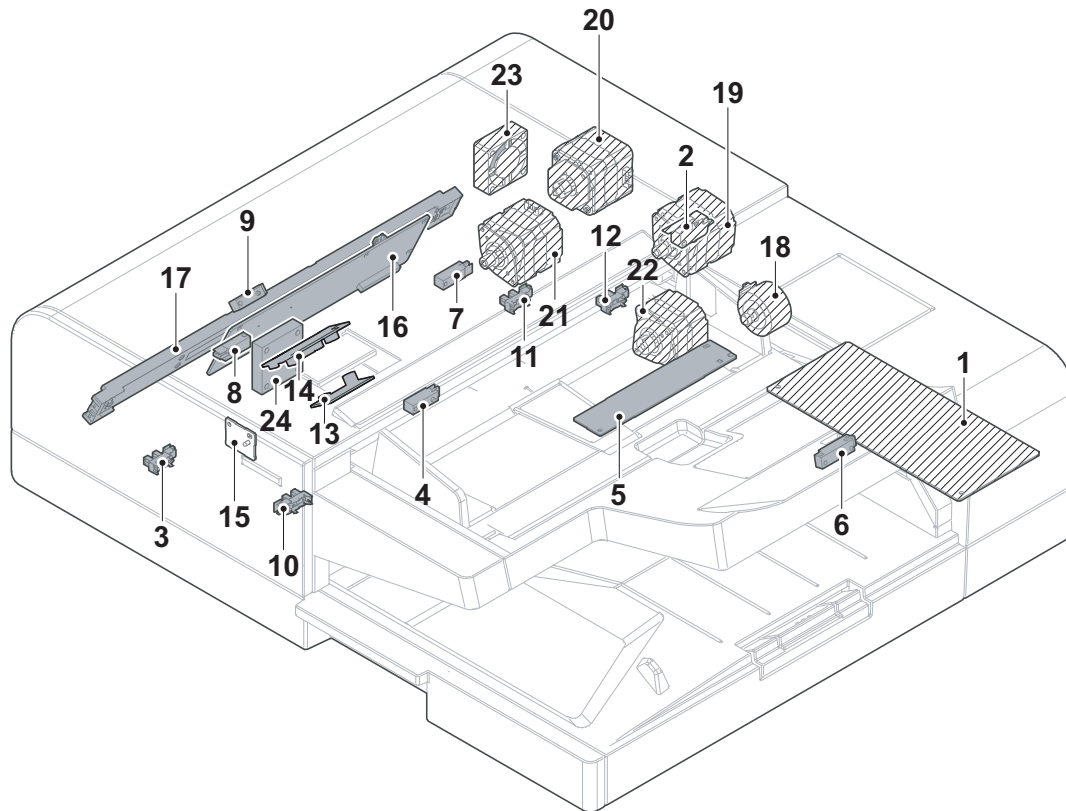
9	Cleaning solenoid	Cleaning the ID sensor.
10	Feed-shift solenoid	Operates the feed-shift guide.
11	BR feed-shift solenoid	Changes the paper conveying pass.
12	JS feed-shift solenoid	Changes the paper conveying pass.
13	Container solenoid K	Releasing the container lock (Black).
14	Container solenoid M	Releasing the container lock (Magenta).
15	Container solenoid C	Releasing the container lock (Cyan).
16	Container solenoid Y	Releasing the container lock (Yellow).
17	Release solenoid	For checking the transfer release.
18	Cleaning lamp K	Removing the remaining electric charge on the drum.(Black)
19	Cleaning lamp M	Removing the remaining electric charge on the drum.(Magenta)
20	Cleaning lamp C	Removing the remaining electric charge on the drum.(Cyan)
21	Cleaning lamp Y	Removing the remaining electric charge on the drum.(Yellow)
22	IH	Heats the heat roller (fuser belt).
23	Fuser heater	Heats the press roller.
24	Fuser thermostat 1	Prevention of the abnormal heat roller heating.
25	Fuser thermostat 2	Prevention of the abnormal press roller heating.
26	Cassette heater	Dehumidifying the paper in the cassette 1 and 2. (Option)
27	PF cassette heater	Dehumidifying the paper in the cassette 3 and 4. (Option)
28	Hard disk	Storing image data and job accounting data.
29	Speaker	Generating the panel touch sound and error sound.
30	Touch panel	Converting the operation position data.



**(7-1)Part name table (other)**

No.	Name used in service manual	Name used in parts list	Part. No.	
1	Paper feed clutch 1	PARTS DISPOSAL UNIT(M3) SP	302NH9408_	
2	Paper feed clutch 2	PARTS DISPOSAL UNIT(M3) SP	302NH9408_	
3	MP paper feed clutch	PARTS FAN COOLING LSU 60 SP	302LC9438_	
4	PF paper feed clutch 1	PARTS FAN COOLING LSU 60 SP	302LC9438_	
5	PF paper feed clutch 2	PARTS FAN COOLING LSU 60 SP	302LC9438_	
6	PF conveying clutch 1	PARTS FAN COOLING LSU 60 SP	302LC9438_	
7	PF conveying clutch 2	PARTS,FAN COOLING DLP 70 SP	302FZ9438_	
8	PF conveying clutch 3	PARTS,FAN COOLING DLP 70 SP	302FZ9438_	
9	Cleaning solenoid	PARTS,FAN COOLING DLP 70 SP	302FZ9438_	
10	Feed-shift solenoid	PARTS FAN COOLING LSU 50 SP	302K994A5_	
11	BR feed-shift solenoid	PARTS FAN COOLING LSU 50 SP	302K994A5_	
12	JS feed-shift solenoid	PARTS FAN COOLING LSU 50 SP	302K994A5_	



No.	Name used in service manual	Name used in parts list	Part. No.	
13	Container solenoid K	PARTS FAN COOLING LSU 50 SP	302K994A5_	
14	Container solenoid M	FAN MOTOR	302HN4401_	
15	Container solenoid C	FAN MOTOR	302HN4401_	
16	Container solenoid Y	PARTS FAN COOLING DLP 70 SP	302K99435_	
17	Release solenoid	FAN LSU 60-25	-	
18	Cleaning lamp K	PARTS FAN COOLING LSU 60 SP	302LC9438_	
19	Cleaning lamp M	FAN LSU 60-25	-	
20	Cleaning lamp C	PARTS,FAN COOLING CONVEYING SP	302FZ9442_	
21	Cleaning lamp Y	PARTS,FAN COOLING CONVEYING SP	302FZ9442_	
22	IH	PARTS FAN COOLING LSU 60 SP	302LC9438_	
23	Fuser heater	FAN MOTOR	302HN4401_	
24	Fuser thermostat 1	PARTS FAN CENTER 60 25 SP	302ND9459_	
25	Fuser thermostat 2	FAN BOX COOLING	302FZ4404_	
26	Cassette heater	FAN MOTOR	302HN4401_	
27	PF cassette heater	PARTS FAN COOLING 50 SP	302LC9432_	
28	Hard disk	PARTS FAN COOLING 50 SP	302LC9432_	
29	Speaker	FK-8720 FK-8721 FK-8722	302NH9308_ 302NH9309_ 302NH9310_	
30	Touch panel	FK-8720 FK-8721 FK-8722	302NH9308_ 302NH9309_ 302NH9310_	

**(8) Document processor**

Machine front side /  Machine inside /  Machine rear side

1 DP main PWB	Consisting of the engine PWB and relay circuit for the DP electric parts.
2 DP top cover switch	Shutting off the 24V power supply line when the top cover is opened.
3 DP open/close sensor	Detecting the opening and closing of the document processor.
4 DP original sensor	Detecting the presence of the original in the document processor.
5 DP original width sensor	Detecting the original width in the document processor.
6 DP original length sensor	Detecting the original length in the document processor.
7 DP original feed sensor	Detects the primary feed timing of the document processor.
8 DP timing sensor	Detecting the timing to scan the original in the document processor.(Front page)
9 DP backside timing sensor	Detecting the timing to scan the original in the document processor.(Back page)
10 DP eject sensor	Detecting the document processor eject paper.
11 DP lift upper limit sensor	Detecting the upper limit when lifting the original bottom plate inside the document processor.
12 DP lift lower limit sensor	Detecting the lower limit when lifting the original bottom plate inside the document processor.
13 DP multi paper feed sensor (photo emitter)	Detecting the paper multi feed.
14 DP multi paper feed sensor (photo receptor)	Detecting the paper multi feed.
15 DP LED PWB	Document processor original set indication or original jam indication.

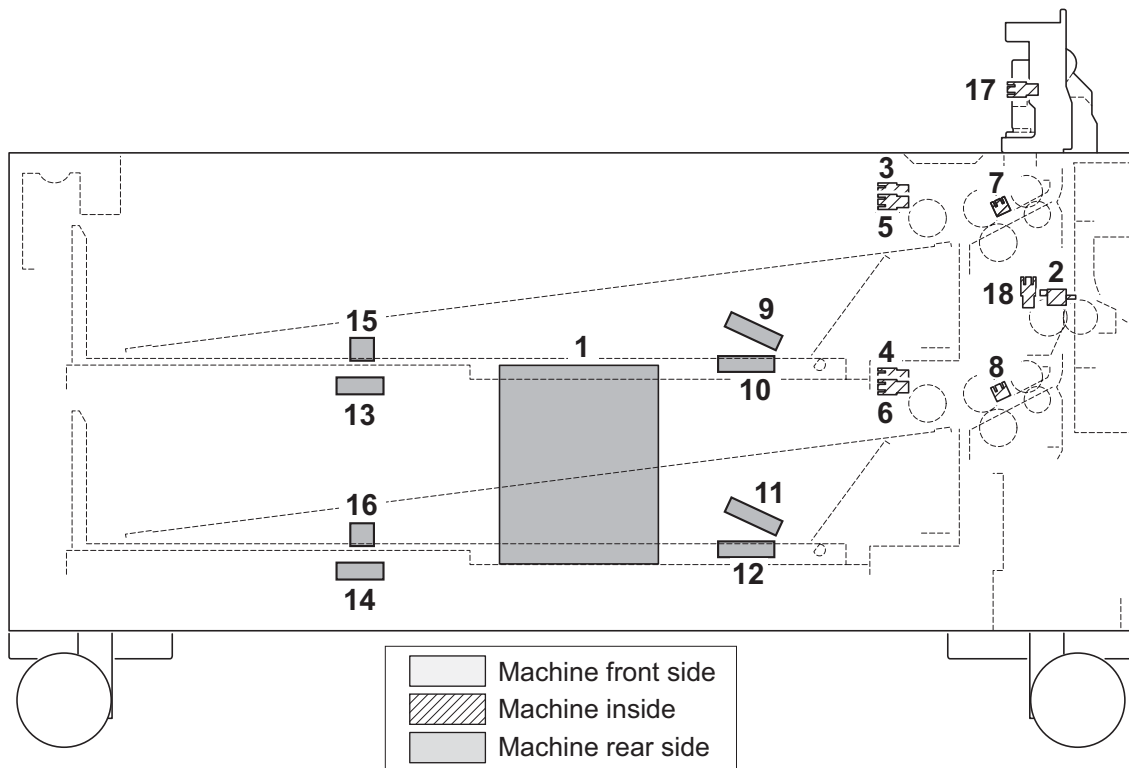
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16 DPSHD PWB	Processing the scanned image data in the document processor.
17 DPCIS	Scanning the backside original data in the document processor.
18 DP lift motor	Driving the document processor original bottom plate.
19 DP original feed motor	Driving the original feed section in the document processor.
20 DP registration motor	Driving the original registration section in the document processor.
21 DP conveying motor	Driving the original conveying section in the document processor
22 DP eject motor	Driving the original eject section in the document processor.
23 DP drive fan motor	Cooling the document processor drive section.
24 DPCIS fan motor	Cooling the CIS PWB in the document processor. Document processor (DP-7120)

### 3 - 5 Electric parts (Optional unit)

#### (1) Paper feeder (PF-730(B))

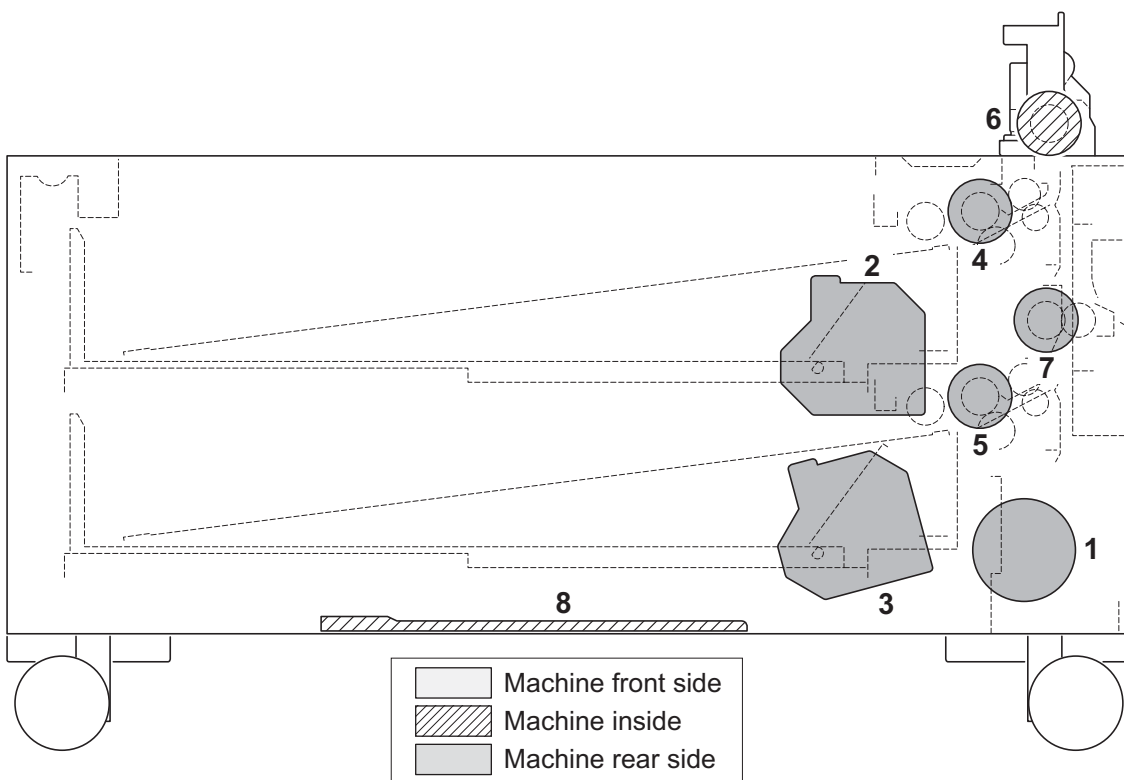
##### (1-1) PWBs and Sensors



1	PF main PWB	Controlling the electric parts in the PF.
2	PF conveying cover switch	Breaks the safety circuit when PF conveying cover is opened, and resets paper jam detection.
3	PF paper sensor 1	Detecting the presence of paper (cassette 3).
4	PF paper sensor 2	Detecting the presence of paper (cassette 4).
5	PF lift sensor 1	Detecting the upper limit when lifting the bottom plate (cassette 3).
6	PF lift sensor 2	Detecting the upper limit when lifting the bottom plate (cassette 4).
7	PF paper feed sensor 1	Detecting the paper jam in the paper feed section (cassette 3).
8	PF paper feed sensor 2	Detecting the paper jam in the paper feed section (cassette 4).
9	PF upper paper gauge sensor 1	Detecting the paper gauge (cassette 3).
10	PF lower paper gauge sensor 1	Detecting the paper gauge (cassette 3).
11	PF upper paper gauge sensor 2	Detecting the paper gauge (cassette 4).
12	PF lower paper gauge sensor 2	Detecting the paper gauge (cassette 4).
13	PF paper length sensor 1	Detecting the paper length (cassette 3).
14	PF paper length sensor 2	Detecting the paper length (cassette 4).

15 PF paper width switch 1	Detecting the paper width (cassette 3).
16 PF paper width switch 2	Detecting the paper width (cassette 4).
17 PF conveying sensor 1	Detecting the paper jam in the vertical conveying section.
18 PF conveying sensor 2	Detecting the paper jam in the vertical conveying section.

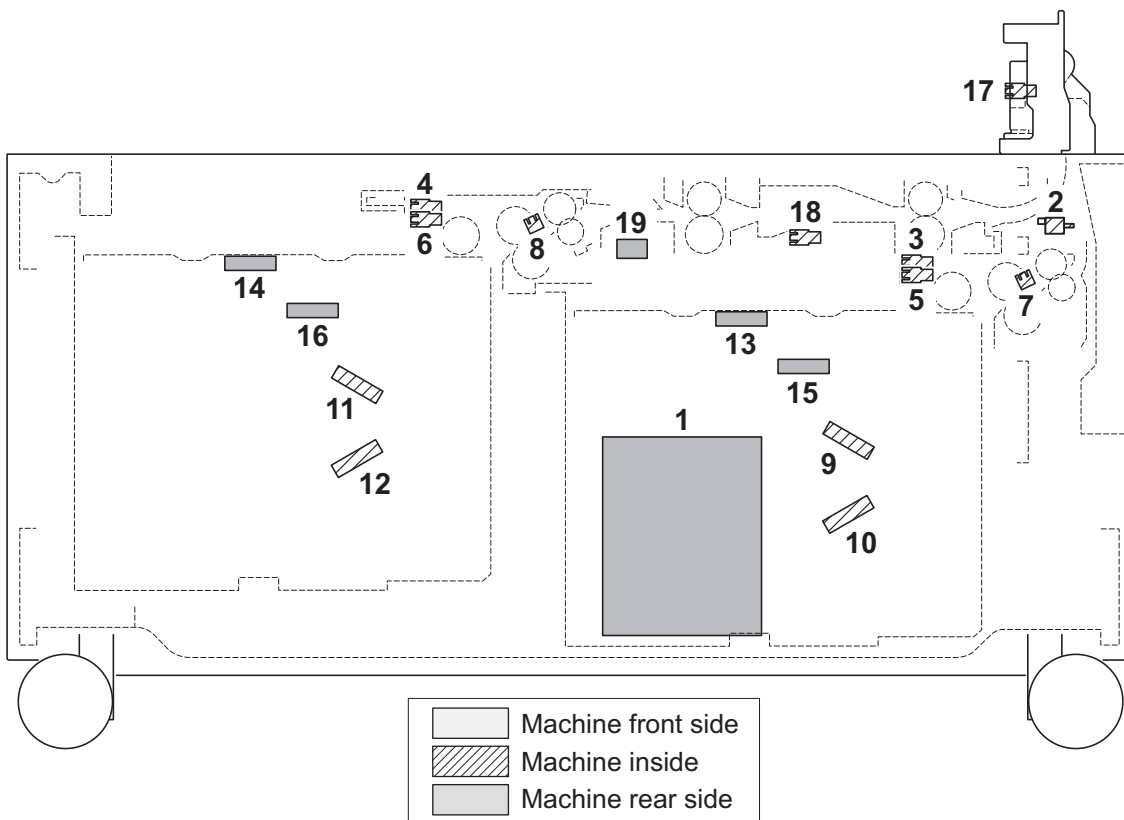
**(1-2)Motors and others**



1 PF paper feed motor	Driving the paper feed section.
2 PF lift motor 1	Operating the bottom plate (cassette 3).
3 PF lift motor 2	Operating the bottom plate (cassette 4).
4 PF paper feed clutch 1	Controlling the primary paper feeding from the cassette 3.
5 PF paper feed clutch 2	Controlling the primary paper feeding from the cassette 4.
6 PF conveying clutch 1	Controlling the drive of conveying section.
7 PF conveying clutch 2	Controlling the drive of conveying section.
8 PF cassette heater	Dehumidifying paper.

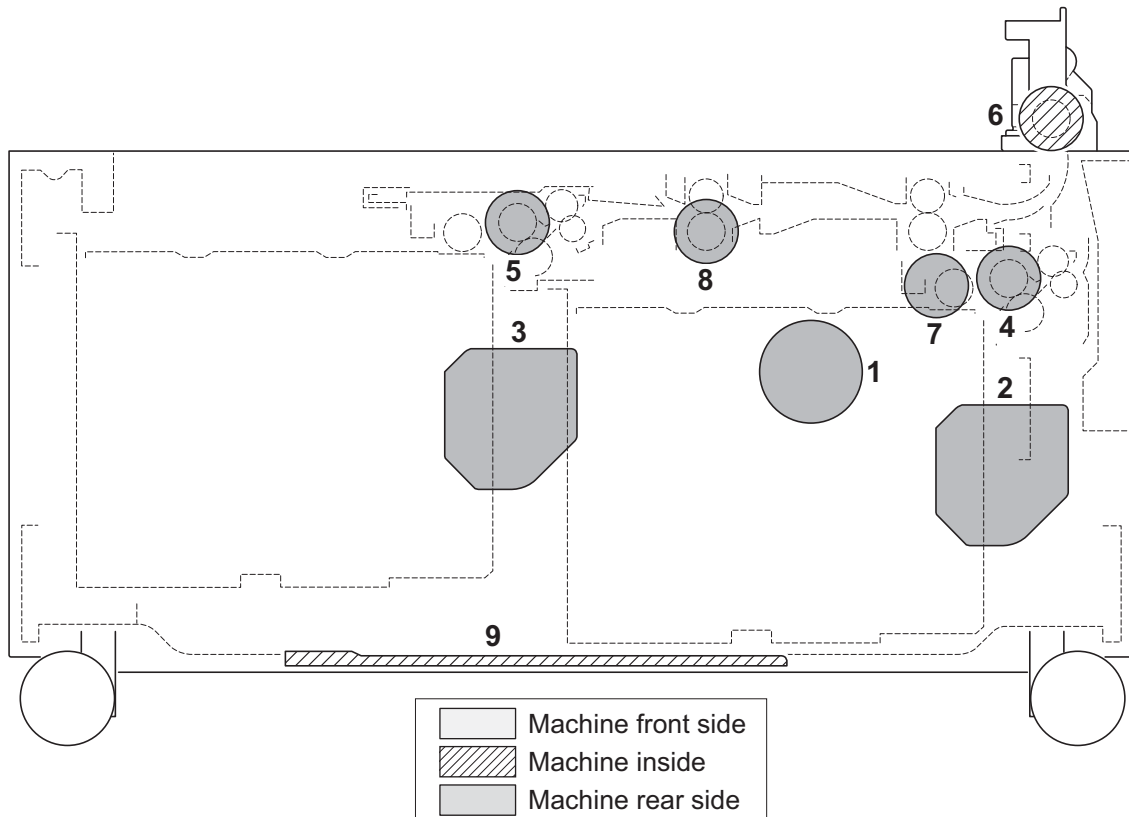
**(2)Paper feeder (PF-740(B))**

**(2-1)PWBs and Sensors**

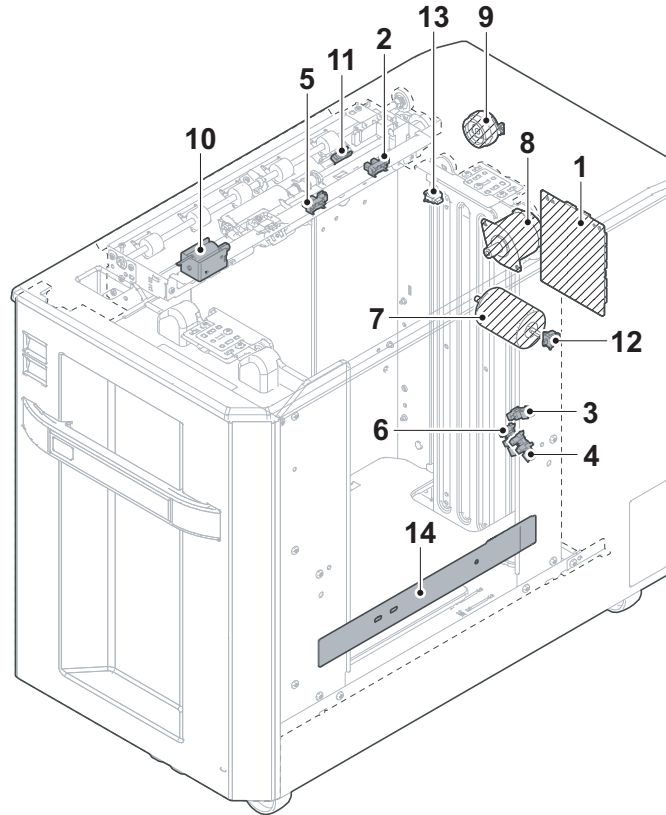


1 PF main PWB	Controlling the electric parts in the PF.
2 PF conveying cover switch	Breaks the safety circuit when PF conveying cover is opened, and resets paper jam detection.
3 PF paper sensor 1	Detecting the presence of paper (cassette 3).
4 PF paper sensor 2	Detecting the presence of paper (cassette 4).
5 PF lift sensor 1	Detecting the upper limit when lifting the bottom plate (cassette 3).
6 PF lift sensor 2	Detecting the upper limit when lifting the bottom plate (cassette 4).
7 PF paper feed sensor 1	Detecting the paper jam in the paper feed section (cassette 3).
8 PF paper feed sensor 2	Detecting the paper jam in the paper feed section (cassette 4).
9 PF upper paper gauge sensor 1	Detecting the paper gauge (cassette 3).
10 PF lower paper gauge sensor 1	Detecting the paper gauge (cassette 3).
11 PF upper paper gauge sensor 2	Detecting the paper gauge (cassette 4).
12 PF lower paper gauge sensor 2	Detecting the paper gauge (cassette 4).
13 PF paper size detection switch 1	Detecting the size of paper (cassette 3).
14 PF paper size detection switch 2	Detecting the size of paper (cassette 4).
15 PF cassette detection switch 1	Detecting the presence of cassette 3.

16 PF cassette detection switch 2	Detecting the presence of cassette 4.
17 PF conveying sensor 1	Detecting paper jam in the vertical conveying section.
18 PF conveying sensor 2	Detecting paper jam in the horizontal conveying section.
19 PF conveying unit switch	Detecting the presence of PF conveying unit.

**(2-2)Motors and others**

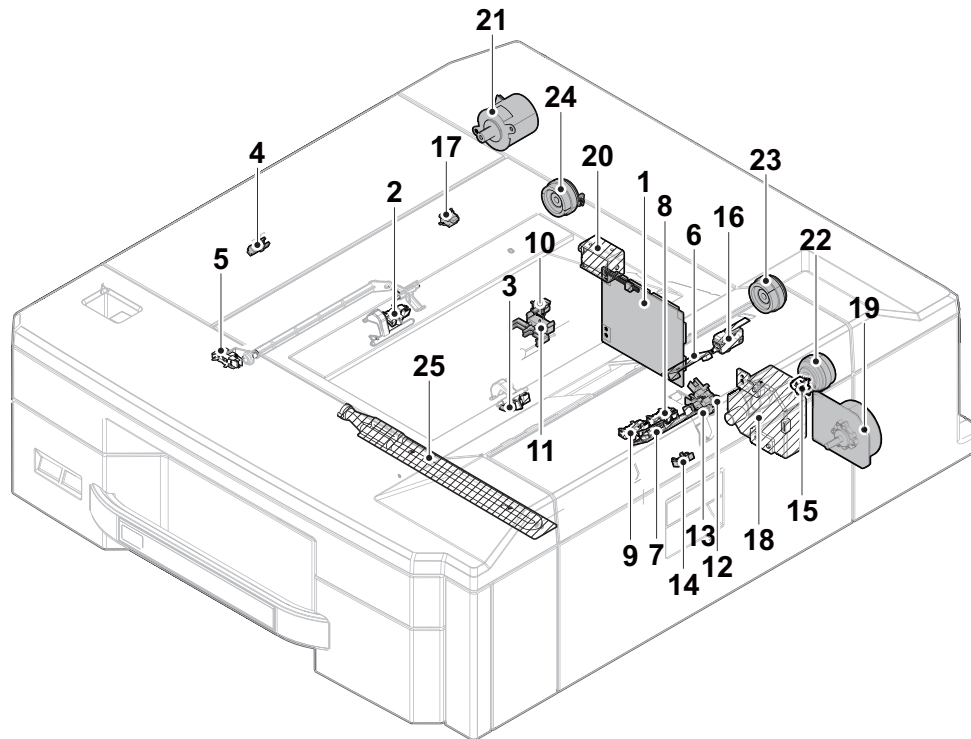
1 PF paper feed motor	Driving the paper feed section.
2 PF lift motor 1	Operating the bottom plate (cassette 3).
3 PF lift motor 2	Operating the bottom plate (cassette 4).
4 PF paper feed clutch 1	Controlling the primary paper feeding from the cassette 3.
5 PF paper feed clutch 2	Controlling the primary paper feeding from the cassette 4.
6 PF conveying clutch 1	Controlling the drive of vertical conveying section.
7 PF conveying clutch 2	Controlling the drive of horizontal conveying section.
8 PF conveying clutch 3	Controlling the drive of horizontal conveying section.
9 PF cassette heater	Dehumidifying paper.

**(3)Paper feeder (PF-7120)**

Machine front side / 
  Machine inside / 
  Machine rear side

1 PF main PWB	Controlling the electric parts in the PF.
2 PF paper sensor	Detecting presence of paper in the paper deck.
3 PF upper paper gauge sensor 1	Detecting the level of the remaining paper inside the paper deck.
4 PF lower paper gauge sensor 2	Detecting the level of the remaining paper inside the paper deck.
5 PF lift upper limit sensor	Detecting the upper limit when lifting the bottom plate inside the paper deck.
6 PF lift lower limit sensor	Detecting the lower limit when lifting the bottom plate inside the paper deck.
7 PF lift motor	Operating the bottom plate inside the deck.
8 PF conveying motor	Controlling the paper conveying.
9 PF paper feed clutch	Controlling the primary paper feeding from the deck.
10 PF paper feed solenoid	Switching the paper feeding section.
11 PF paper feed sensor	Detecting the paper jam in the paper feed section (cassette 5).
12 PF deck detection switch	Detecting the PF deck installation.
13 PF connection switch	PF connection detection with the main unit
14 PF cassette heater	Dehumidifying paper.



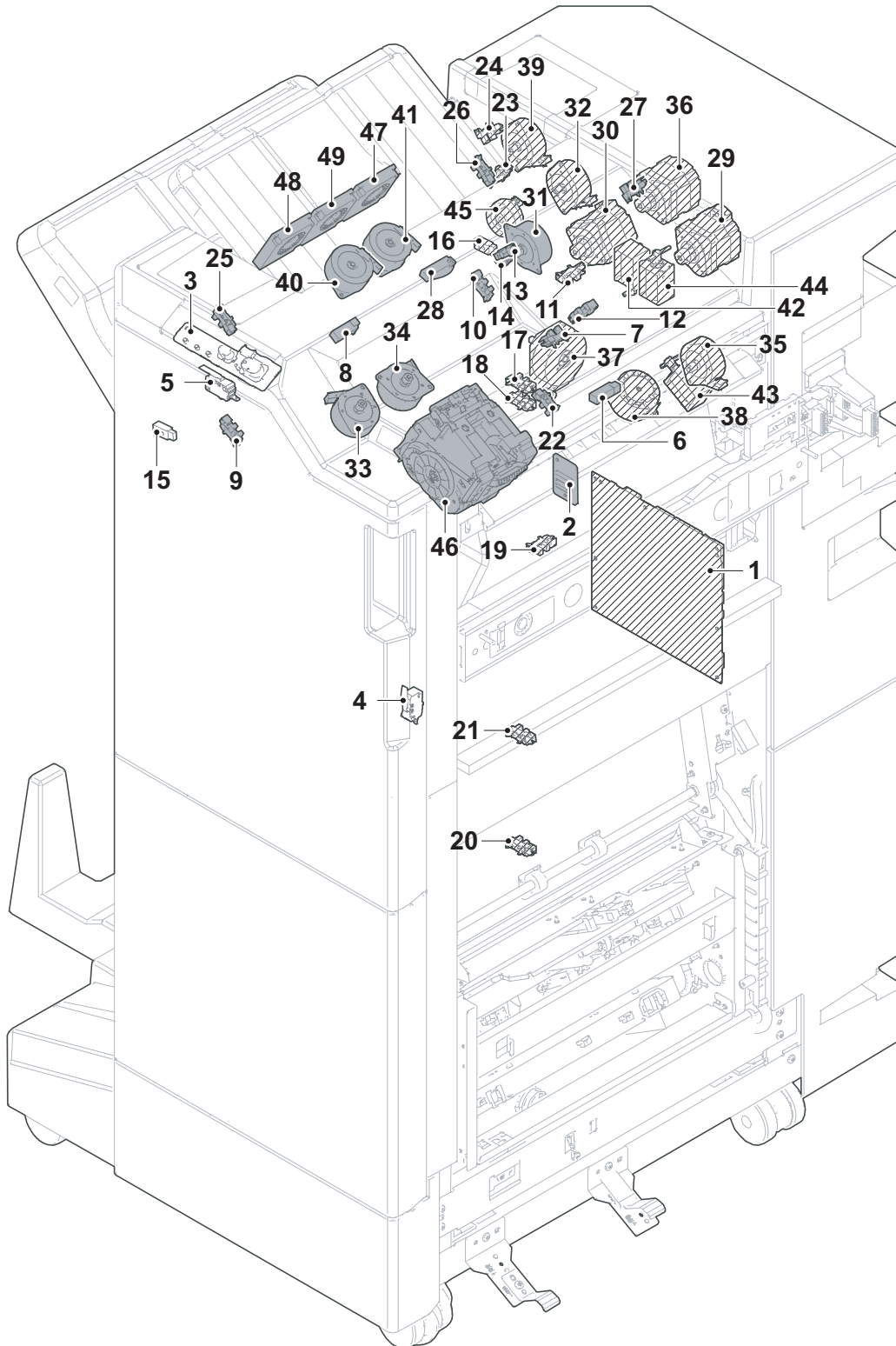
**(4)Paper feeder (PF-7130)**

1 PF main PWB	Controlling the electric parts in the PF.
2 PF conveying sensor 1	Detecting the paper jam in the conveying section.
3 PF conveying sensor 2	Detecting the paper jam in the conveying section.
4 PF conveying sensor 3	Detecting the paper jam in the conveying section.
5 PF eject sensor	Detecting the paper jam in the eject section.
6 PF multi paper feed sensor (photo emitter)	Detecting the paper multi feed.
7 PF multi paper feed sensor (photo receptor)	Detecting the paper multi feed.
8 PF paper sensor	Detecting presence of paper (cassette 5).
9 PF lift sensor	Detecting the upper limit when lifting the bottom plate (cassette 5).
10 PF paper width switch	Detecting the paper width (cassette 5).
11 PF paper length switch	Detecting the paper length (cassette 5).
12 PF upper paper gauge sensor	Detecting the paper gauge (cassette 5).
13 PF lower paper gauge sensor	Detecting the paper gauge (cassette 5).
14 PF paper feed sensor	Detecting the paper jam in the paper feed section (cassette 5).
15 PF conveying cover open/close switch	Detecting the opening and closing of the PF conveying cover.
16 PF top cover open/close switch	Detecting the opening and closing of the PF top cover.
17 PF set switch	Detecting the connection to the machine.

---

18 PF lift motor	Operating the bottom plate (cassette 5).
19 PF paper feed motor	Driving the paper feed section.
20 PF feed-shift solenoid	Operates the PF feed-shift guide.
21 PF regist motor	Driving the conveying section.
22 PF paper feed clutch	Controlling the primary paper feeding from the cassette 5.
23 PF conveying clutch 1	Controlling the drive of conveying section.
24 PF conveying clutch 2	Controlling the drive of conveying section.
25 PF cassette heater	Dehumidifying paper.

**(5)4000-sheet Finisher (DF-7110)**



Machine front side / 
  Machine inside / 
  Machine rear side

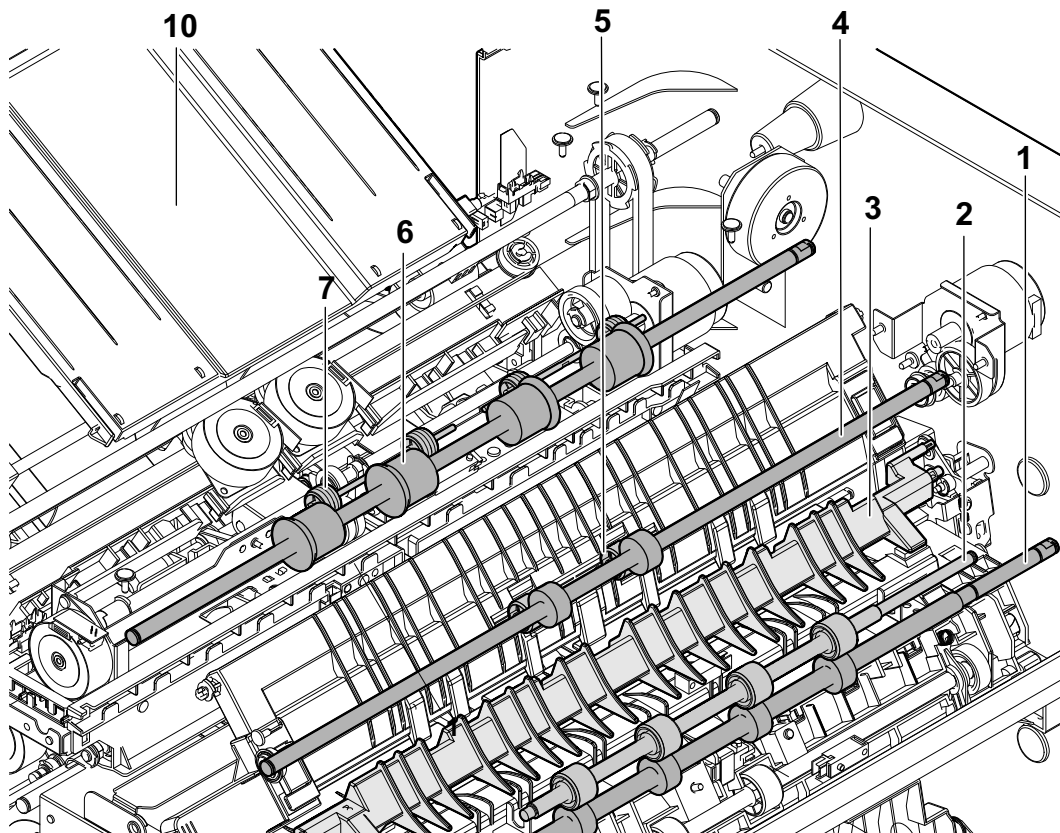
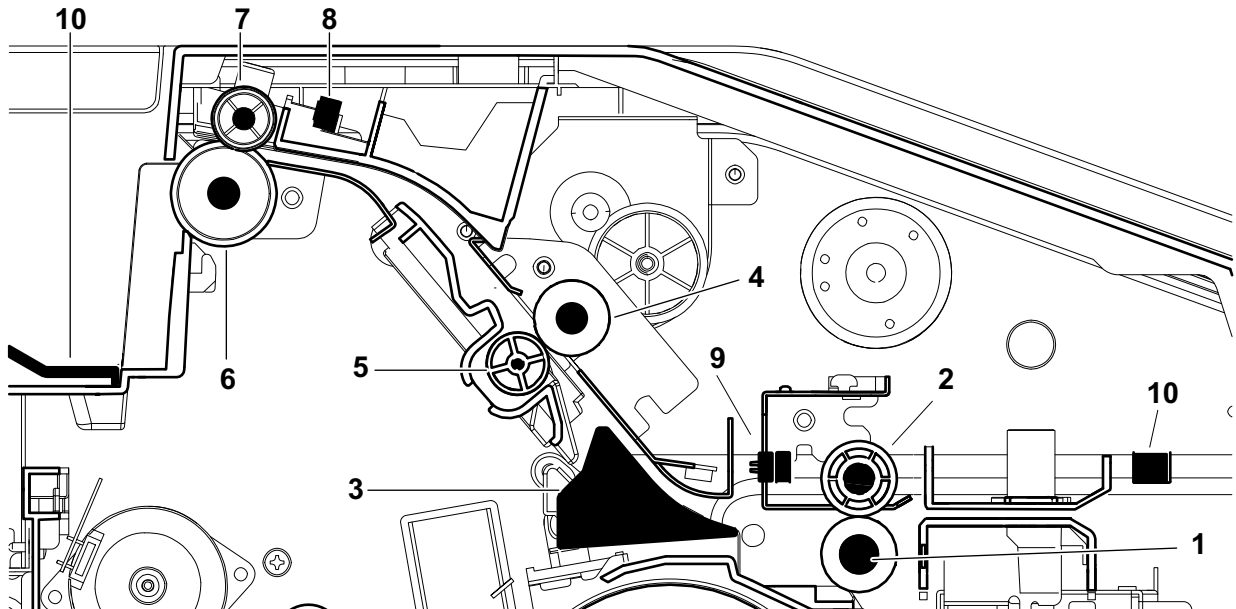
1 DF main PWB	Controlling the electric parts.
2 DF staple relay PWB	Relaying the staple unit control signals.

3	DF operation PWB	Consisting of LEDs and keys.
4	DF front cover switch	Detecting the front cover open/close.
5	DF eject cover switch	Detecting the eject cover open/close.
6	DF paper entry sensor	Detecting presence of paper at the paper entry section.
7	DF middle sensor	Detecting presence of paper in the conveying section.
8	DF eject sensor	Detecting presence of paper the eject section.
9	DF side registration sensor 1	Detecting the adjusting DF plate front home position.
10	DF side registration sensor 2	Detecting the adjusting DF plate rear home position.
11	DF paddle sensor	Detecting the paddle home position.
12	DF drum sensor	Paper detection at the relief drum.
13	DF adjusting sensor	Detecting the paper guides home position.
14	DF bundle eject switch	Detecting the bundle eject unit position.
15	DF tray upper surface sensor 1	Detecting the DF main tray paper upper surface.
16	DF tray upper surface sensor 2	Detecting the DF main tray paper upper surface.
17	DF tray sensor 1	Detecting the eject tray home position.
18	DF tray sensor 2	Detecting the eject tray home position.
19	DF tray sensor 3	Detecting the eject tray middle position.
20	DF tray sensor 4	Detecting the eject tray lower limit.
21	DF tray sensor 5	Detecting the eject tray lower limit.(when the folding unit is installed)
22	DF slide sensor	Detecting the staple unit slide position.
23	DF shift set sensor	Detecting the shift guide home position.
24	DF shift release sensor	Detecting the shift guide release position.
25	DF shift sensor 1	Detecting the front shift plate home position.
26	DF shift sensor 2	Detecting the rear shift plate home position.
27	DF sub eject sensor	Detecting paper ejected to the tray B.
28	DF sub tray full sensor	Detecting tray B paper full.
29	DF paper entry motor	Driving the entry roller.
30	DF middle motor	Driving the middle roller.
31	DF paddle motor	Driving the paper guides.
32	DF eject release motor	Driving the bundle eject unit.
33	DF side registration motor 1	Driving the adjusting plate front.
34	DF side registration motor 2	Driving the adjusting plate rear.

35 DF relief drum motor	Driving the relief drum.
36 DF eject motor	Driving the eject roller.
37 DF tray motor	Eject tray ascending and descending drive.
38 DF slide motor	Staple unit sliding drive.
39 DF shift release motor	Detecting the shift guide release position.
40 DF shift motor 1	Driving the rear shift guide.
41 DF shift motor 2	Driving the front shift guide.
42 DF feed-shift solenoid 1	Switching the feed-shift guide.
43 DF feed-shift solenoid 2	Switching the feed-shift guide.
44 DF feed-shift solenoid 3	Switching the feed-shift guide.
45 DF eject clutch	Driving the eject roller.
46 DF staple unit	Paper stapler.
47 DF Eject fan motor 1	Cooling the eject paper.(rear) (not connected)
48 DF Eject fan motor 2	Cooling the eject paper.(front) (not connected)
49 DF Eject fan motor 3	Cooling the eject paper.(center) (not connected)

**(6)100 sheet staple finisher (DF-7130)****(6-1)Paper entry and feed-shift and DF tray B exit section**

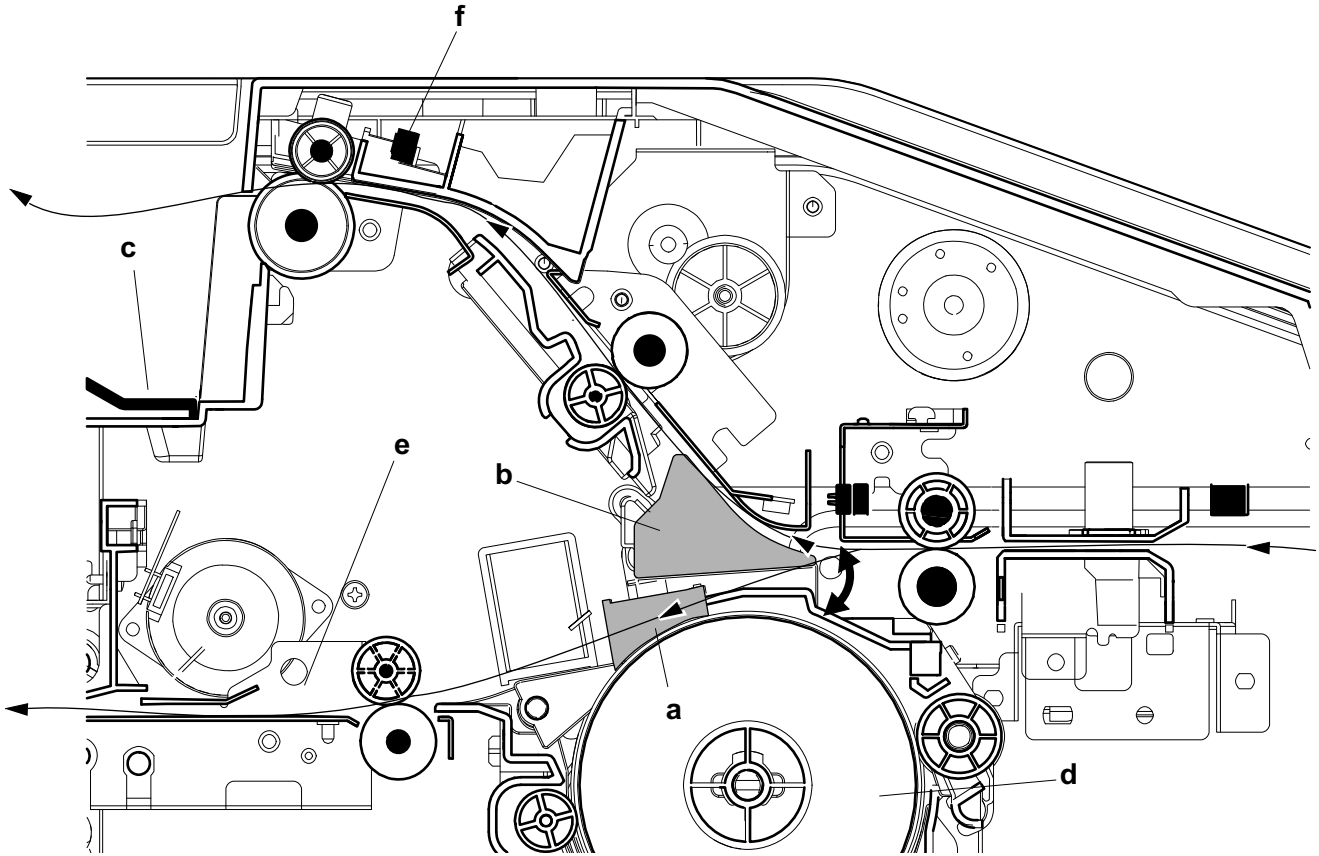
The paper entry section convey paper from the main unit to the feed-shift section. Also, the feed-shift guide 3 switches the paper conveying path to convey paper to the DF tray B or finishing section.



- |                              |                       |
|------------------------------|-----------------------|
| 1 DF entry roller            | 7 DF eject pulley     |
| 2 DF entry pulley            | 8 DF sub eject sensor |
| 3 DF feedshift solenoid 3    | 9 DF entry sensor     |
| 4 DF tray B conveying roller | 10 DF tray B          |
| 5 DF conveying pulley        |                       |
| 6 DF tray B exit roller      |                       |

**(6-2) Feed-shift operation to the DF tray B or finishing section**

The feed-shift guide 3 (b) is activated by the DF feed-shift solenoid 3 (a) and switches the paper conveying path, then convey it to either the DF tray B (c), relief drum (d) or finishing section (e). Also, the DF sub exit sensor (f) detects paper jam at exit to the DF tray B (c).

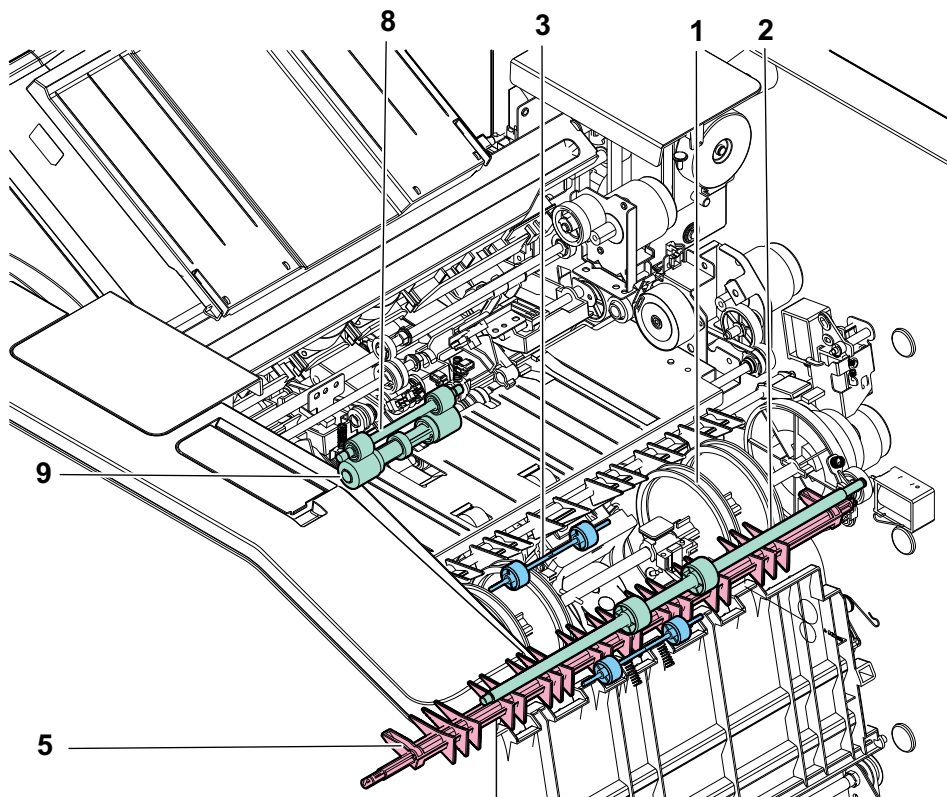
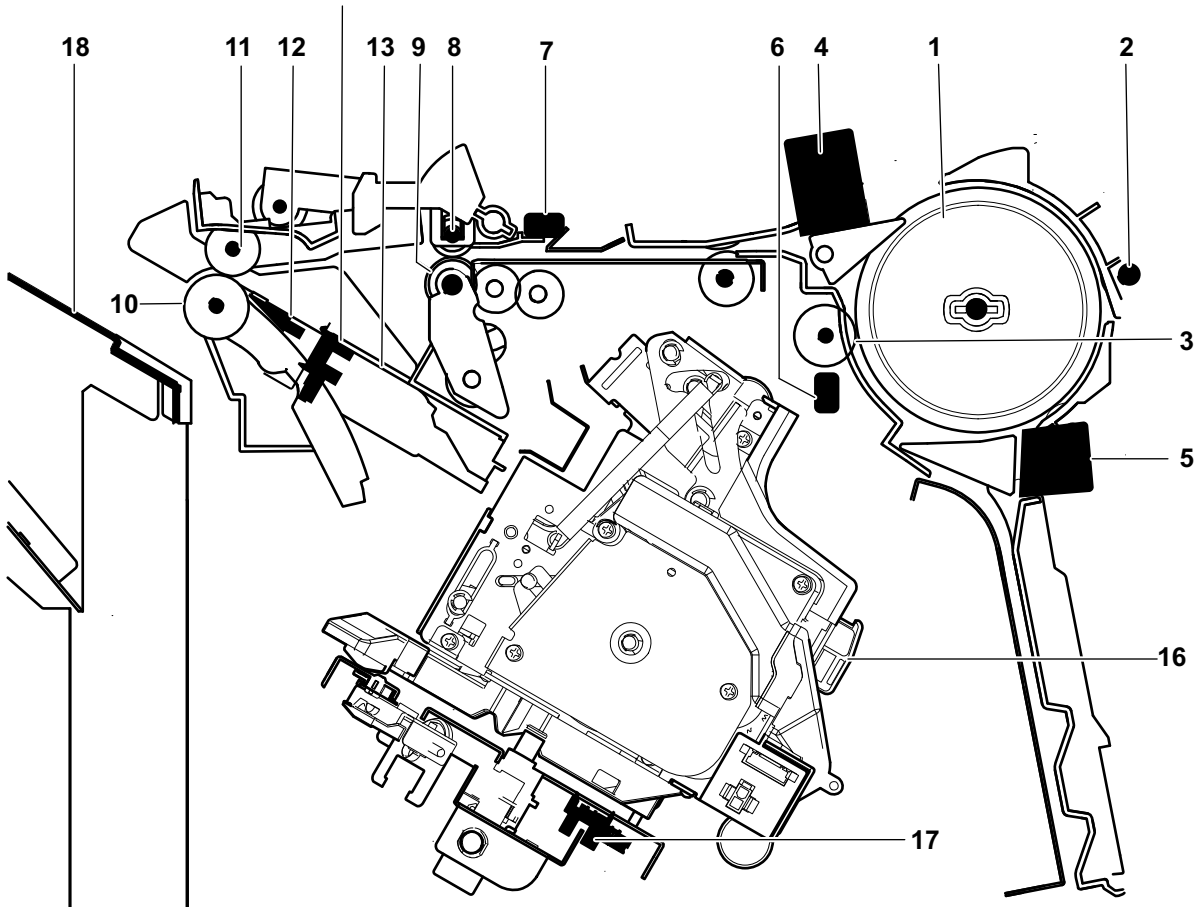


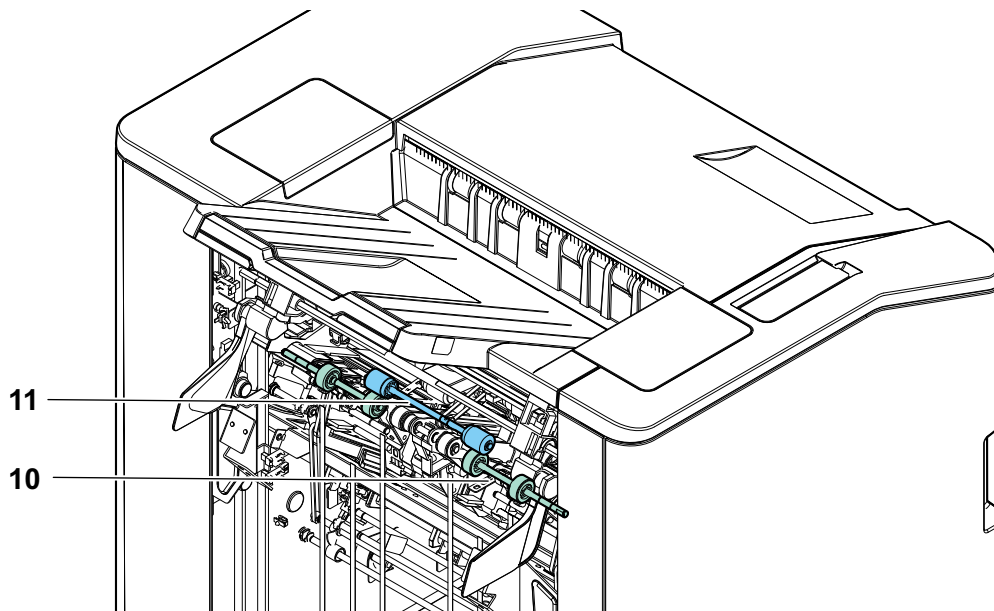
### **(6-3)Finishing section**

The finishing section consists of the parts below and convey the paper from the main unit to the DF tray A. Also, bundle eject mode and staple mode are processed.



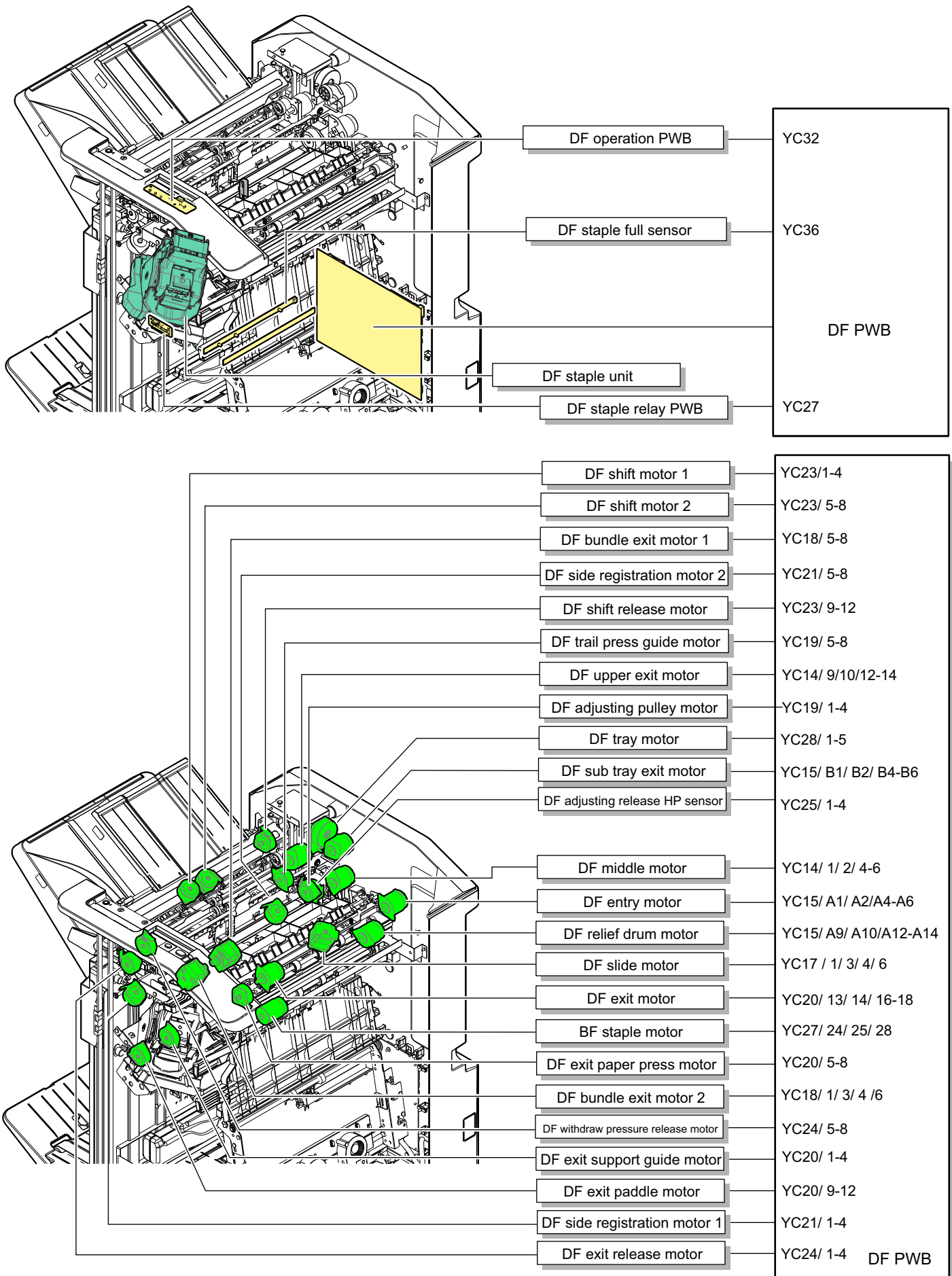
Also, for folding, switch the paper path to the relief drum by the feed-shift guide 1.

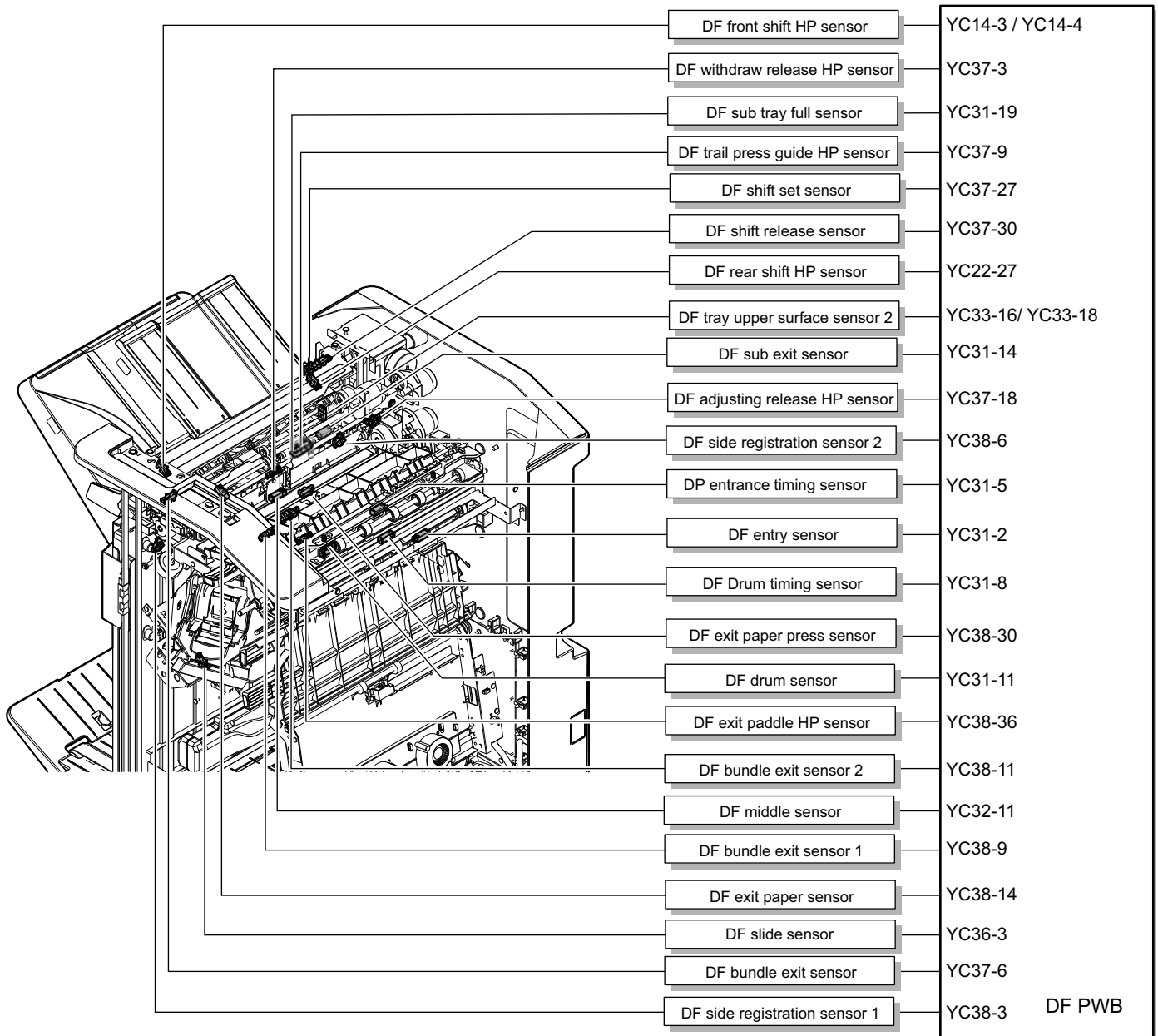




- |                           |                          |                                  |
|---------------------------|--------------------------|----------------------------------|
| 1 DF relief drum          | 7 DF middle sensor       | 13 DF bundle eject unit          |
| 2 DF conveying pulley     | 8 DF middle roller       | 14 DF side registration sensor 1 |
| 3 DF conveying pulley     | 9 DF middle pulley       | 15 DF side registration sensor 2 |
| 4 DF Feedshift solenoid 1 | 10 DF tray A exit roller | 16 DF staple unit                |
| 5 DF Feedshift solenoid 2 | 11 DF eject pulley       | 17 DF slide sensor               |
| 6 DF drum sensor          | 12 DF eject sensor       | 18 DF tray A                     |

[Block diagram]

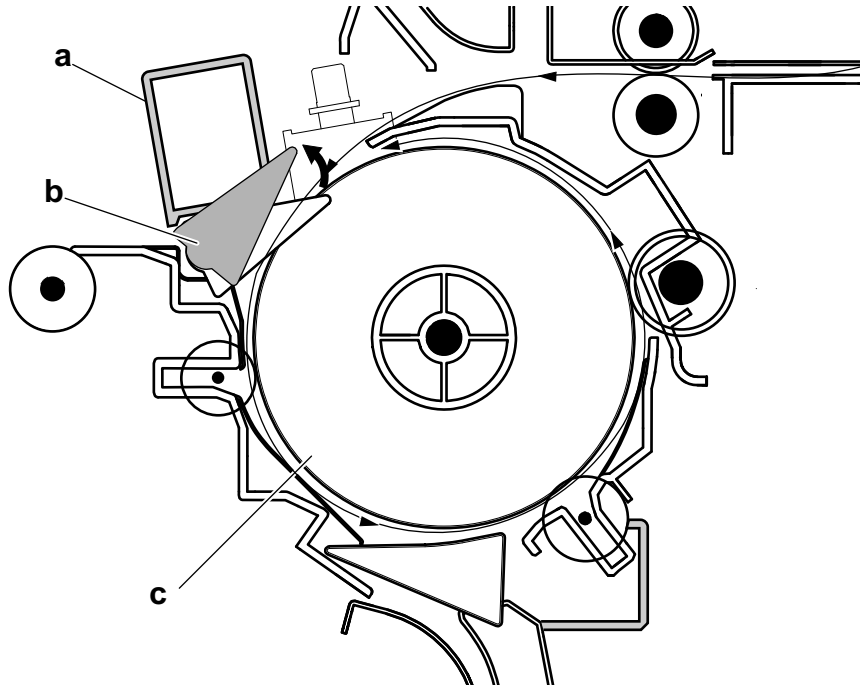




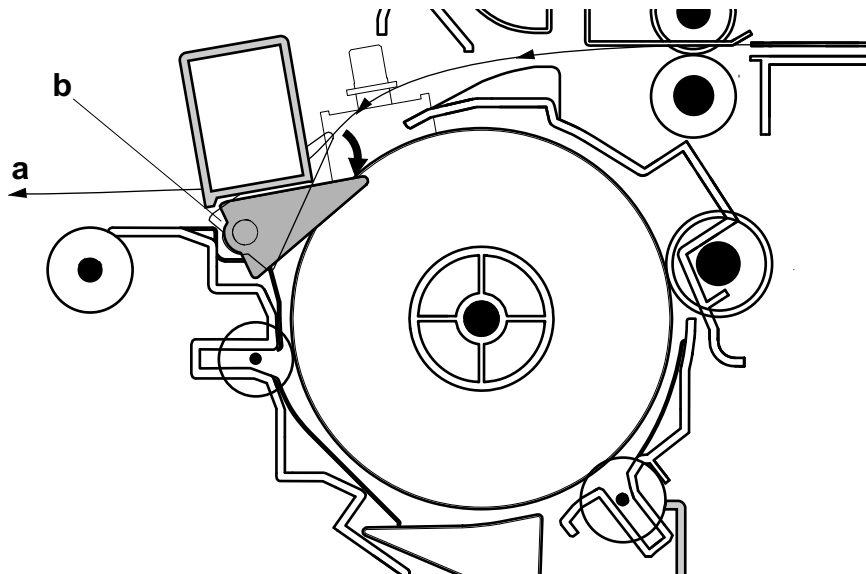
### (6-4)Relief drum operation

As process multiple copies of A4 size paper to the finishing section or folding section, to secure the time to finish paper, the 1st and 2nd paper of the next group is relieved until the 3rd paper is conveyed.

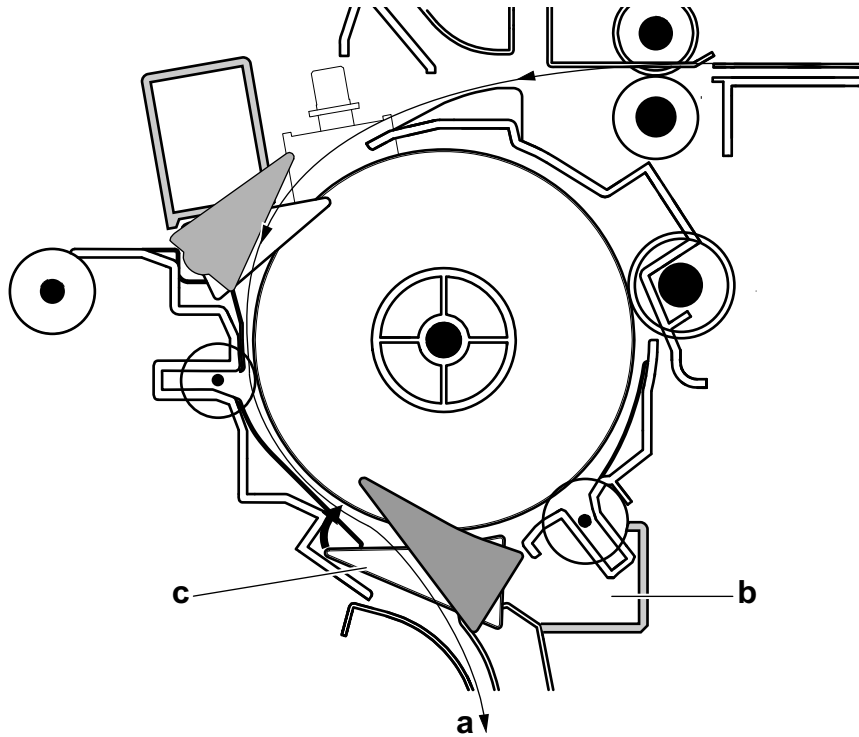
- 1 The feed-shift guide 1 (b) is activated by the DF feed-shift solenoid 1 (a) and switch the paper path, then the first paper of the next group goes to the relief drum (c).
- 2 Likewise, 2nd paper of the next group goes to the relief drum (c).



- 3 When the 3rd paper of the next group goes to the relief drum, it goes to the finishing section (a) with the 1st and 2nd paper. Then, switch the paper path by the feed-shift guide 1 (b).

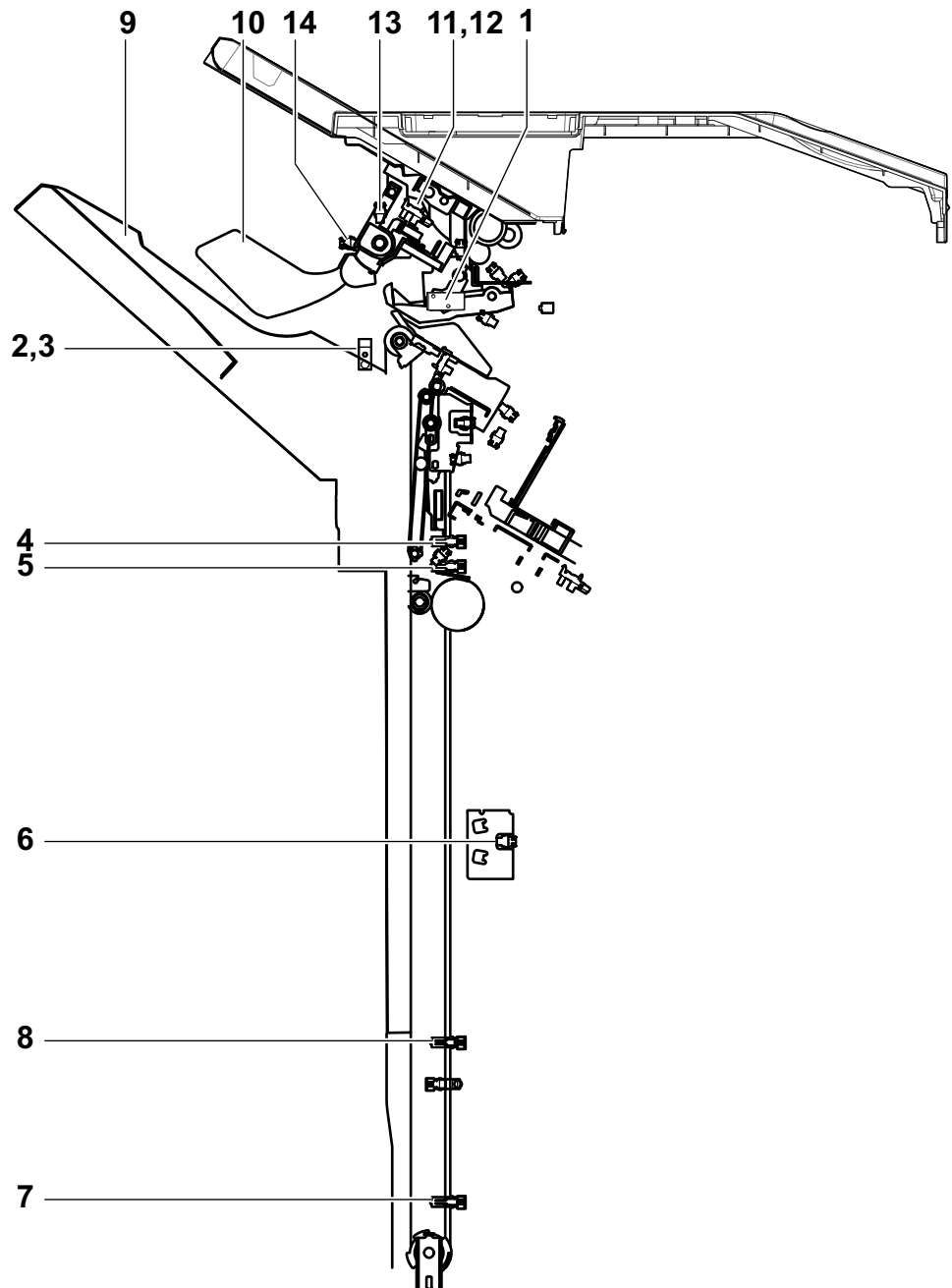


- 4 The DF feed-shift solenoid 2 (b) activates the feed-shift guide 2 (c) and switches the paper path to the folding unit (a).

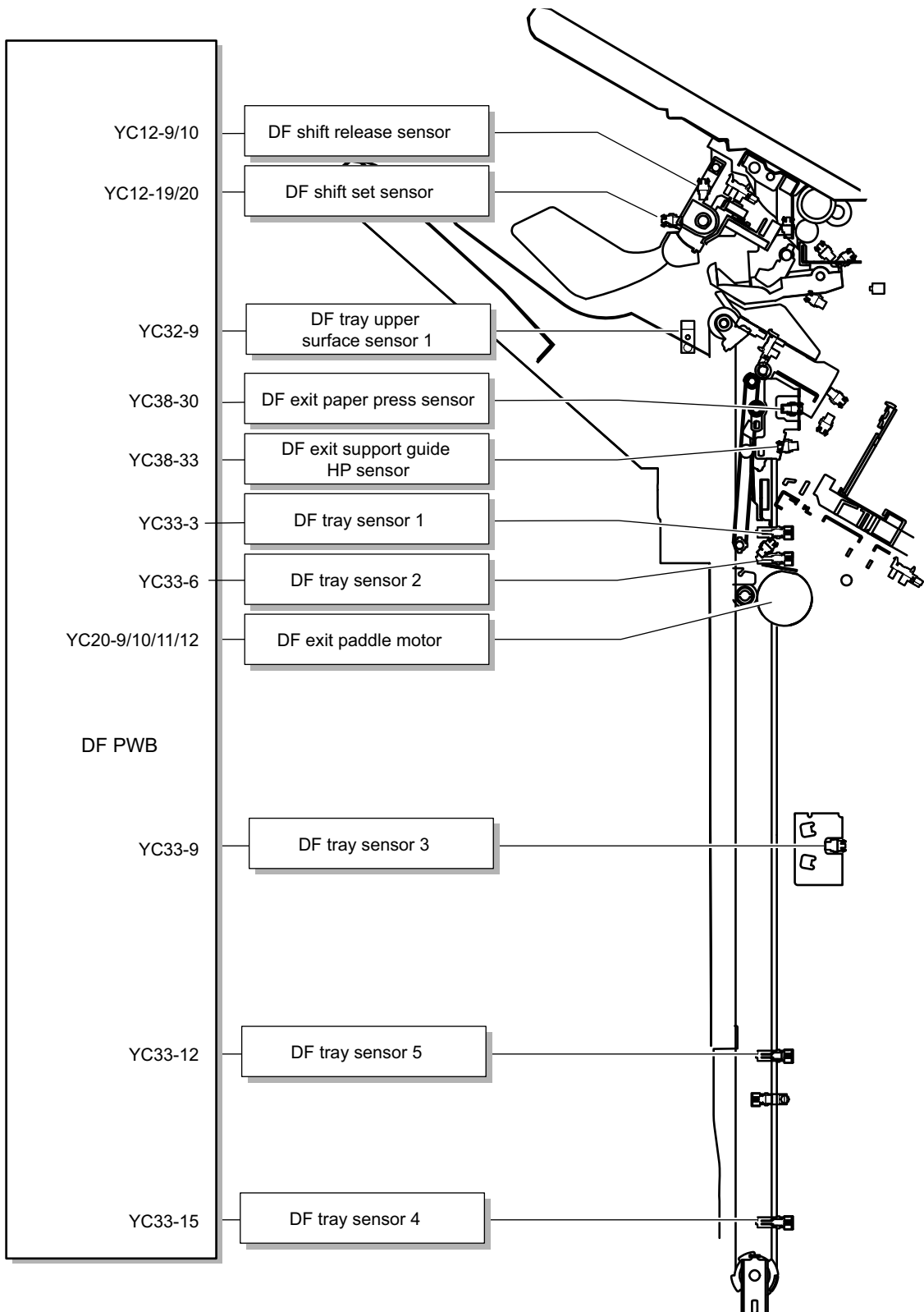


**(6-5)DF eject tray**

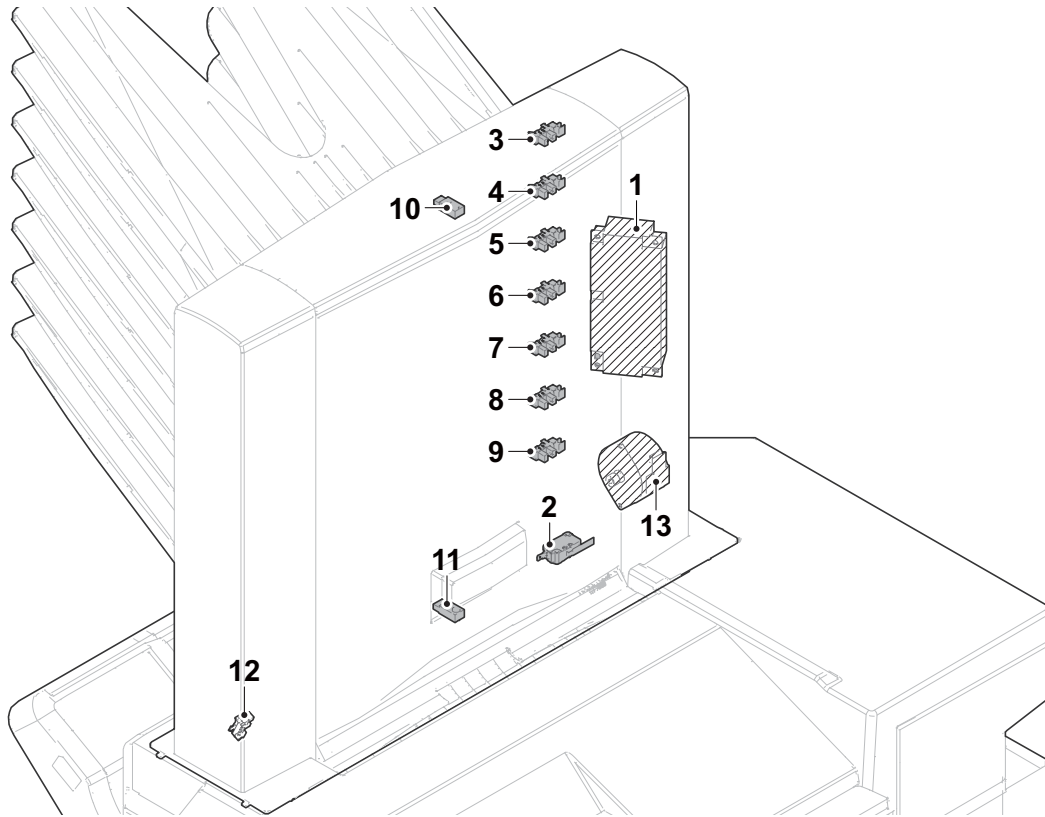
The paper is ejected to main tray in sort or staple function. And ejected to main tray when it is selected as output tray.



- |                                  |                             |
|----------------------------------|-----------------------------|
| 1 DF exit switch solenoid        | 8 DF tray sensor 5          |
| 2 DF tray upper surface sensor 1 | 9 DF main tray (tray A)     |
| 3 DF tray upper surface sensor 2 | 10 Side shift guide         |
| 4 DF tray sensor 1               | 11 DF rear shift HP sensor  |
| 5 DF tray sensor 2               | 12 DF front shift HP sensor |
| 6 DF tray sensor 3               | 13 DF shift set sensor      |
| 7 DF tray sensor 4               | 14 DF shift release sensor  |

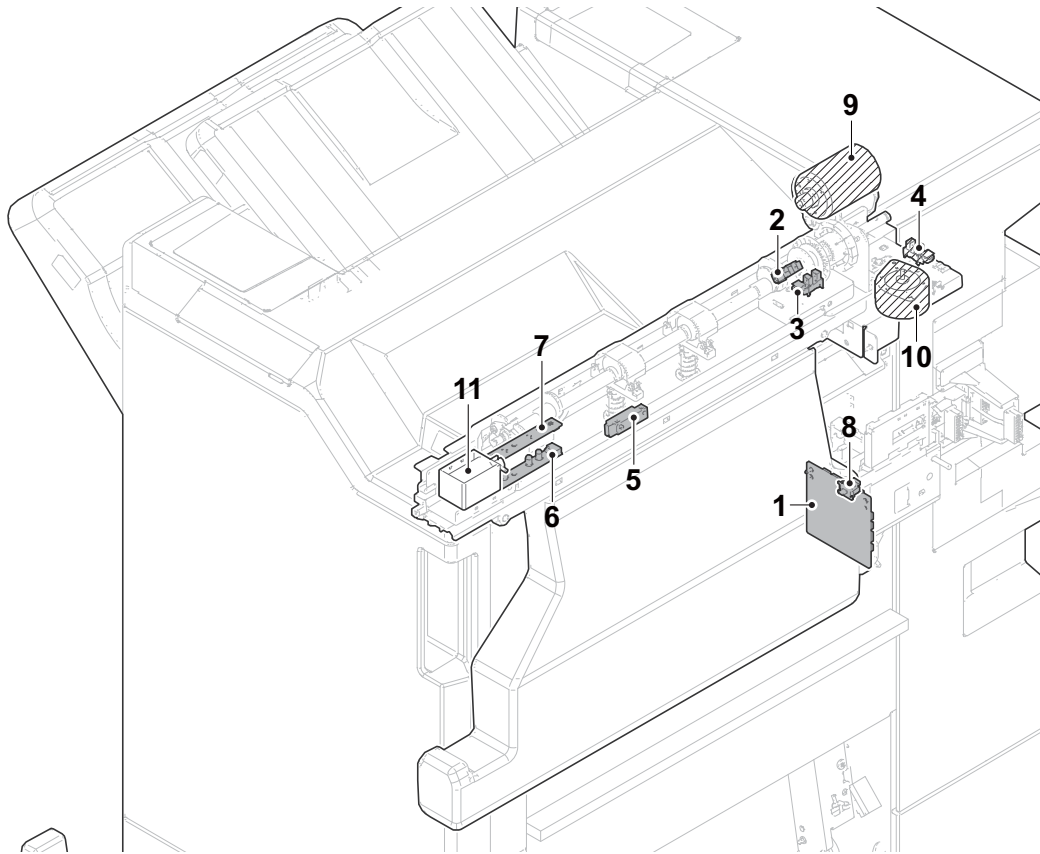




**(7)Mailbox (MT-730(B))**

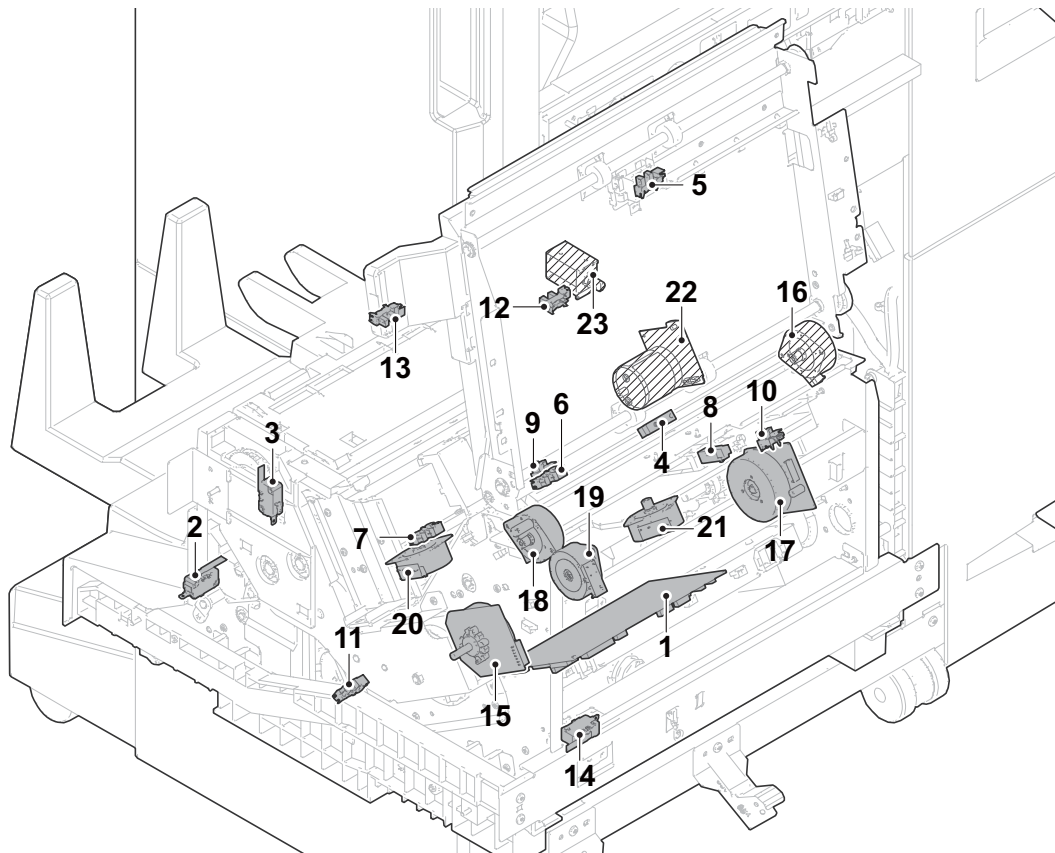
□ Machine front side / ■ Machine inside / ▨ Machine rear side

1 MB main PWB	Controlling electric parts of the mailbox.
2 MB cover switch	Detecting the mail box cover open/close.
3 MB tray sensor 1	Detecting overflow of paper ejected to the tray 1.
4 MB tray sensor 2	Detecting overflow of paper ejected to the tray 2.
5 MB tray sensor 3	Detecting overflow of paper ejected to the tray 3.
6 MB tray sensor 4	Detecting overflow of paper ejected to the tray 4.
7 MB tray sensor 5	Detecting overflow of paper ejected to the tray 5.
8 MB tray sensor 6	Detecting overflow of paper ejected to the tray 6.
9 MB tray sensor 7	Detecting overflow of paper ejected to the tray 7.
10 MB tray eject sensor 1	Detecting paper jam.
11 MB tray eject sensor 2	Emitting LED pulses.
12 MB home position sensor	Controlling the mailbox drive motor.
13 MB conveying motor	Driving the mailbox paper conveying.

**(8)Punch unit (PH-7)**

□ Machine front side / ■ Machine inside / ▨ Machine rear side

1 Punch main PWB	Controlling the electric parts of the punch unit.
2 Punch home position sensor	Detecting the punch cam home position.
3 Punch pulse sensor	Controlling the punch cam rotation.
4 Punch slide sensor	Detecting the punch unit home position.
5 Punch dust tank full sensor	Detecting the punch dust tank full.
6 Punch paper edge sensor 1	Detecting the paper edge.
7 Punch paper edge sensor 2	Detecting the paper edge.
8 Punch dust tank switch	Detecting the presence of the punch dust tank.
9 Punch motor	Driving the punch unit.
10 Punch slide motor	Driving the punch unit.
11 Punch solenoid	Switching the punch holes.(Except 100 V model)

**(9) Folding unit (BF-730)**

□ Machine front side / ■ Machine inside / ▨ Machine rear side

1 BF main PWB	Controlling the electric parts of the folding unit.
2 BF tray switch	Detecting the folding tray open/close.
3 BF left cover switch	Detecting the BF left cover open/close.
4 BF paper entry sensor	Detecting paper entering into the folding unit.
5 BF vertical conveying sensor	Detecting paper on the BF bridge section.
6 BF paper sensor	Detecting paper on the folding bridge section.
7 BF adjusting sensor 1	Detecting lower BF moving plate home position.
8 BF adjusting sensor 2	Detecting upper BF moving plate home position.
9 BF side registration sensor 1	Detecting BF side registration guide home position.
10 BF side registration sensor 2	Detecting BF side registration guide home position.
11 BF blade sensor	Detecting BF blade home position.
12 BF eject sensor	Detecting paper ejected to the folding tray.
13 BF tray full sensor	Detecting folding tray paper full.
14 BF switch	Detecting the folding unit.
15 BF main motor	Driving the folding conveying.

---

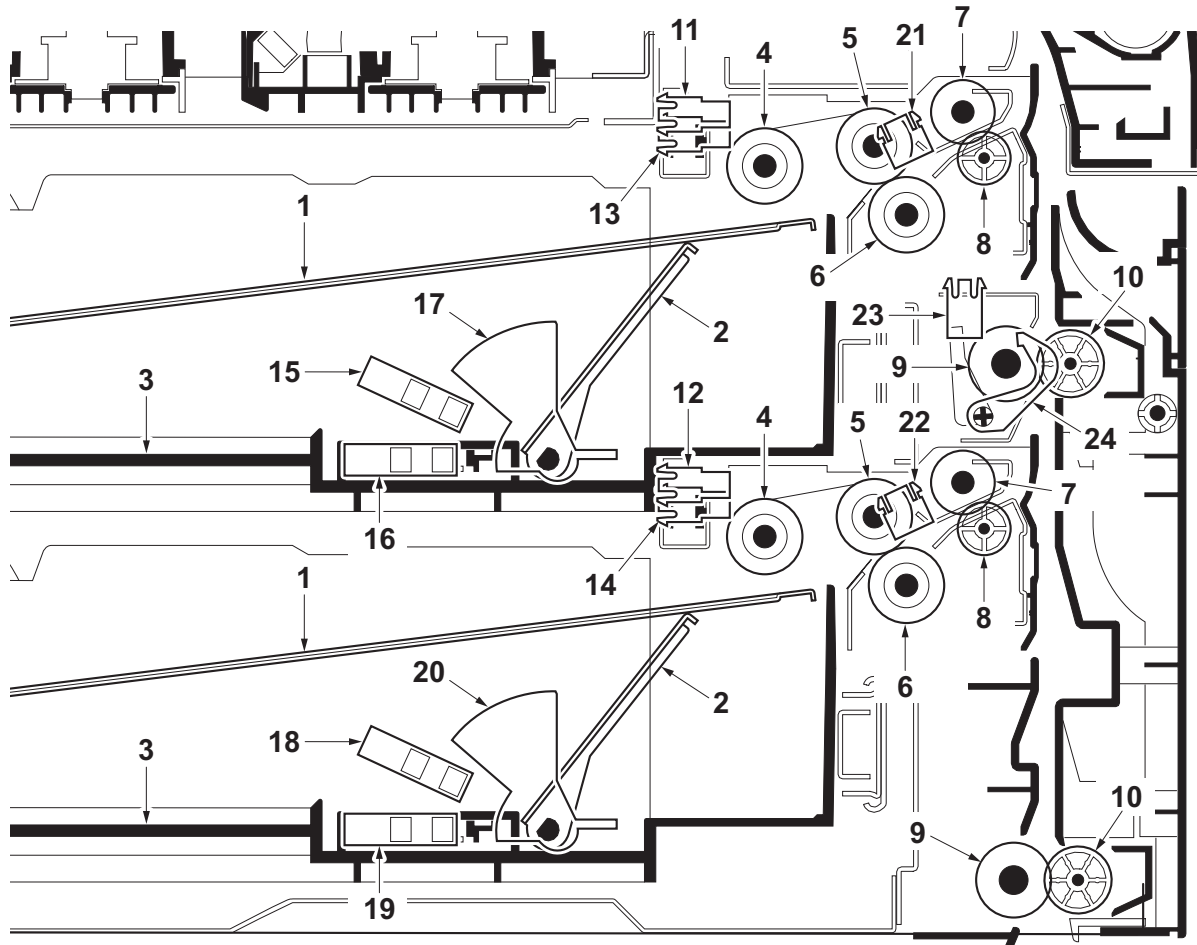
16 BF paper entry motor	Driving the entry roller.
17 BF blade motor	Driving the BF blade.
18 BF adjusting motor 1	Driving lower folding adjustor plate.
19 BF adjusting motor 2	Driving upper folding adjustor plate.
20 BF side registration sensor 1	Detecting the lower BF side registration guide home position.
21 BF side registration sensor 2	Detecting the upper BF side registration guide home position.
22 BF staple motor	Driving the BF staple.
23 BF feed-shift solenoid	Operates the BF feed-shift guide.

### 3 - 6 Mechanical construction

The paper feed and conveying section consists of the cassette paper feed section and the MP tray paper feed section, and the paper conveying section conveying the fed paper to the transfer and separate section.

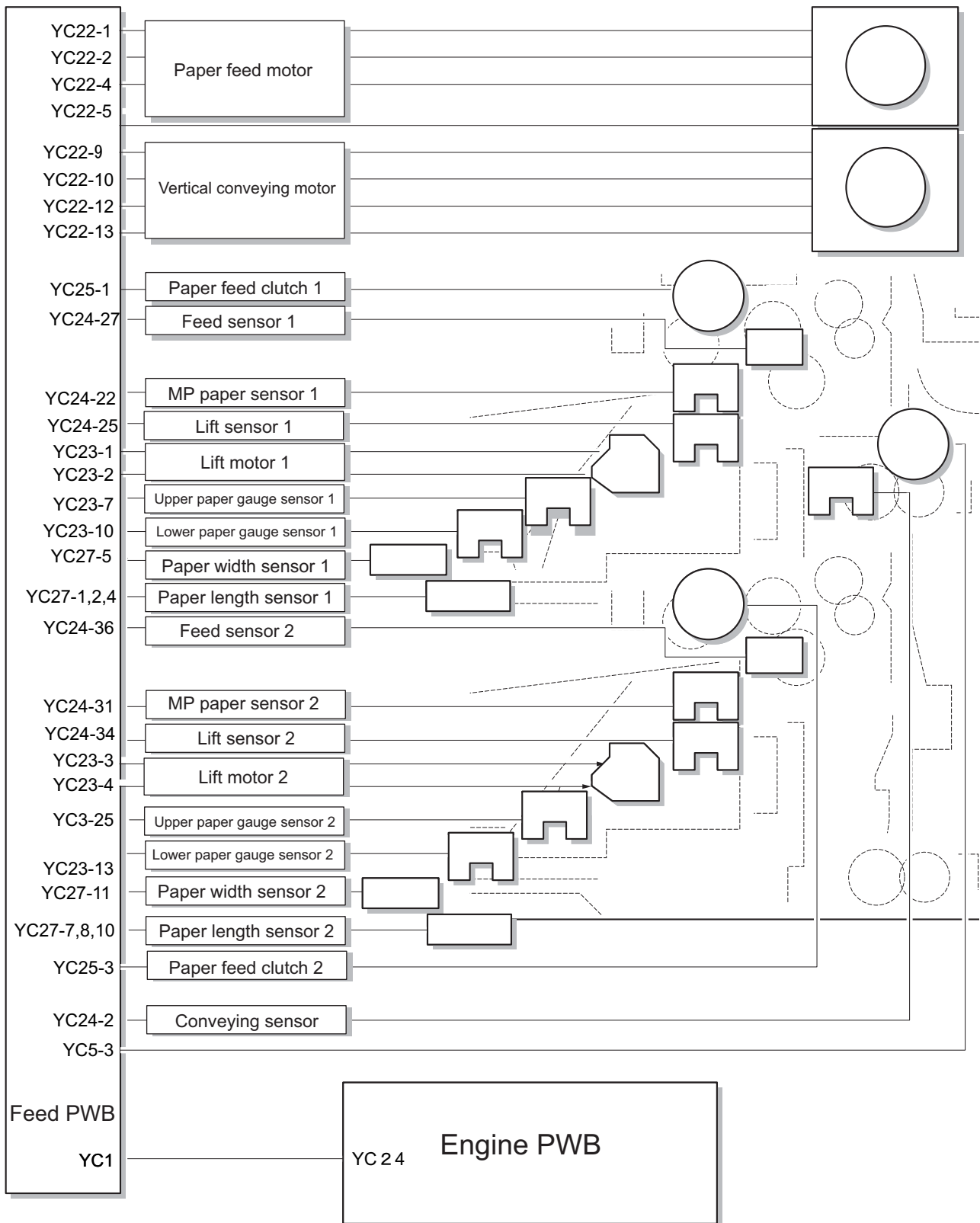
#### (1)Cassette paper feed section

Cassette paper feed section consists of the paper holder with the cassette operation plate activated by lift motor 1 and 2, and the pulleys, such as the forwarding pulley, the paper feed pulley and the separation pulley for extracting and conveying the paper. Paper is fed out of the cassette by the rotation of the forwarding pulley, paper feed pulley and separation pulley.



- |    |                          |    |                                 |
|----|--------------------------|----|---------------------------------|
| 1  | Cassette base            | 13 | Lift sensor 1                   |
| 2  | Cassette operation plate | 14 | Lift sensor 2                   |
| 3  | Cassette                 | 15 | Upper paper gauge sensor 1      |
| 4  | Forwarding pulley        | 16 | Lower paper gauge sensor 1      |
| 5  | Paper feed pulley        | 17 | Actuator (Paper gauge sensor 1) |
| 6  | Separation pulley        | 18 | Upper paper gauge sensor 2      |
| 7  | Assist roller            | 19 | Lower paper gauge sensor 2      |
| 8  | Assist pulley            | 20 | Actuator (Paper gauge sensor 2) |
| 9  | Conveying roller         | 21 | Paper feed sensor 1             |
| 10 | Conveying pulley         | 22 | Paper feed sensor 2             |
| 11 | Paper sensor 1           | 23 | Conveying sensor                |
| 12 | Paper sensor 2           | 24 | Actuator (Conveying sensor)     |

Block diagram

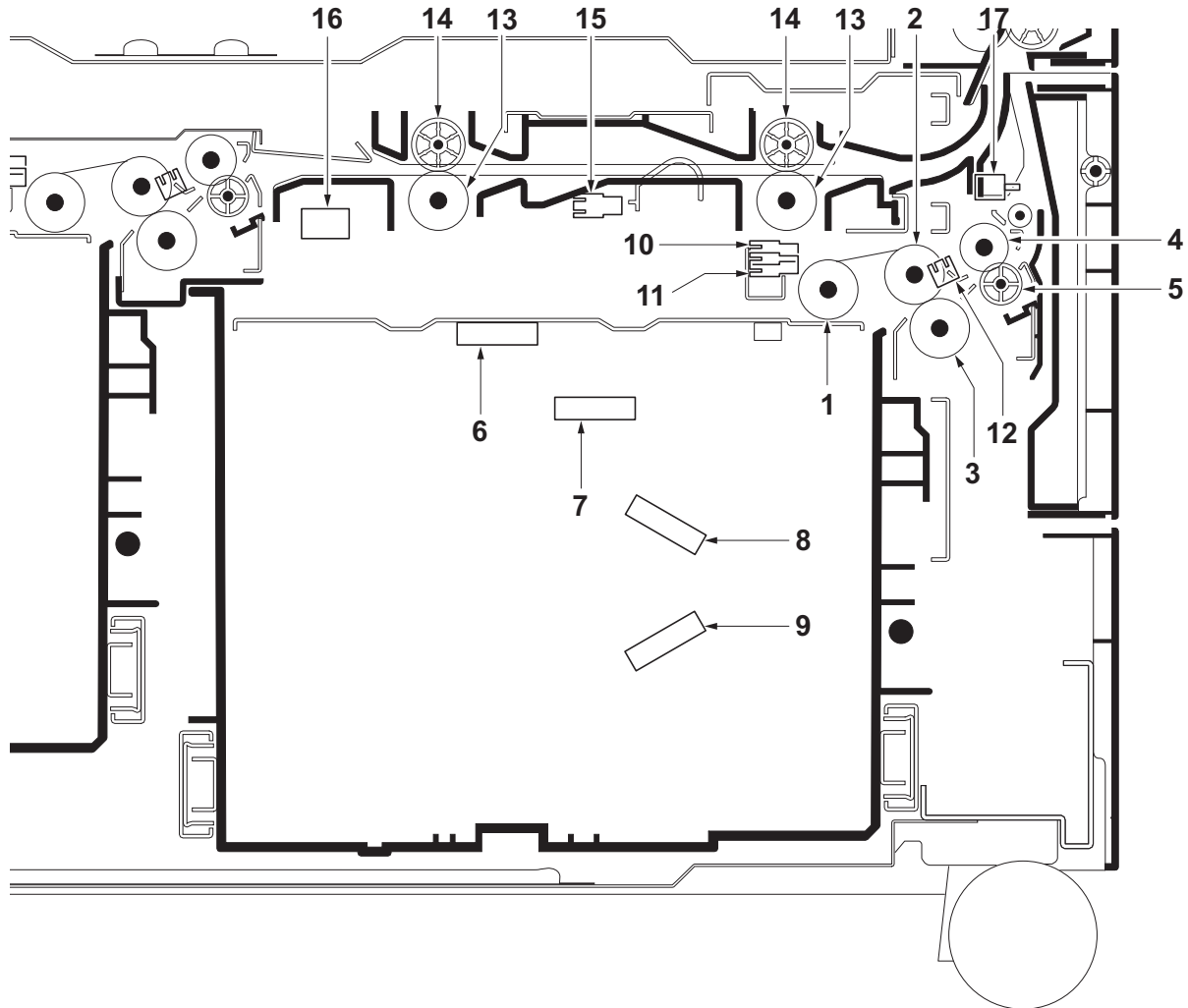


## (2) Large capacity feeder

The paper feeder is comprised of the right- and left-hand cassettes and their feeding units, and the paper feeding section for the left-hand cassette.

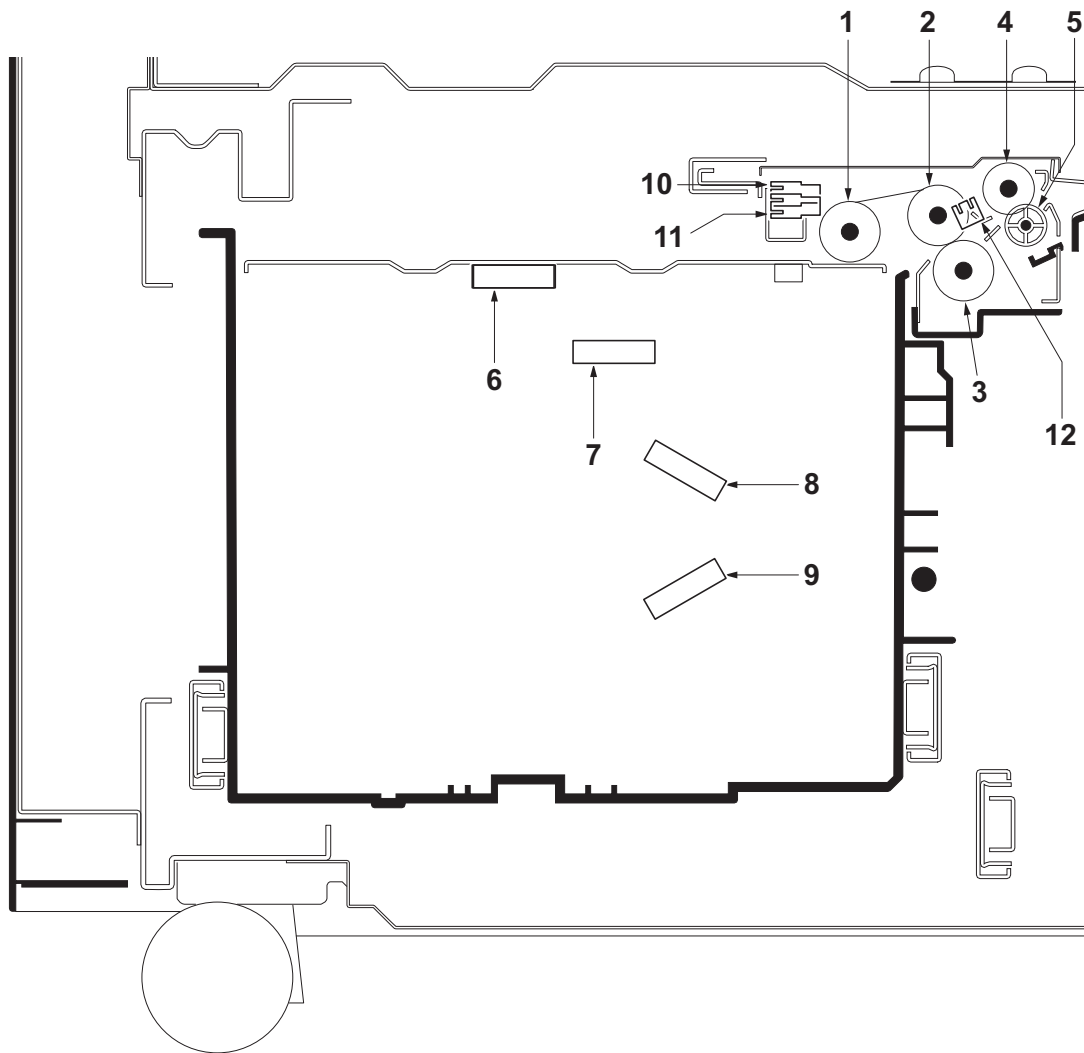
The paper loaded on the lifting plate in the right-hand cassette is picked up to one by one by PF forwarding pulley, PF feeding pulley and PF separator pulley. And then PF feed roller 1 feeds the paper into the main unit. The paper fed by the left-hand cassette is separated in the similar manner and fed out by the conveying roller into the main unit.

### Right cassette section



- |                                    |                              |
|------------------------------------|------------------------------|
| 1 PF forwarding pulley             | 10 PF paper sensor 1         |
| 2 PF paper feed pulley             | 11 PF lift sensor 1          |
| 3 PF separation pulley             | 12 PF paper feed sensor 1    |
| 4 PF paper feed roller 1           | 13 PF conveying roller       |
| 5 PF paper feed pulley             | 14 PF conveying pulley       |
| 6 PF paper size detection switch 1 | 15 PF conveying sensor 2     |
| 7 PF cassette detection switch 1   | 16 PF conveying unit switch  |
| 8 PF upper paper gauge sensor 1    | 17 PF conveying cover switch |
| 9 PF lower paper gauge sensor 1    |                              |

## Left cassette section

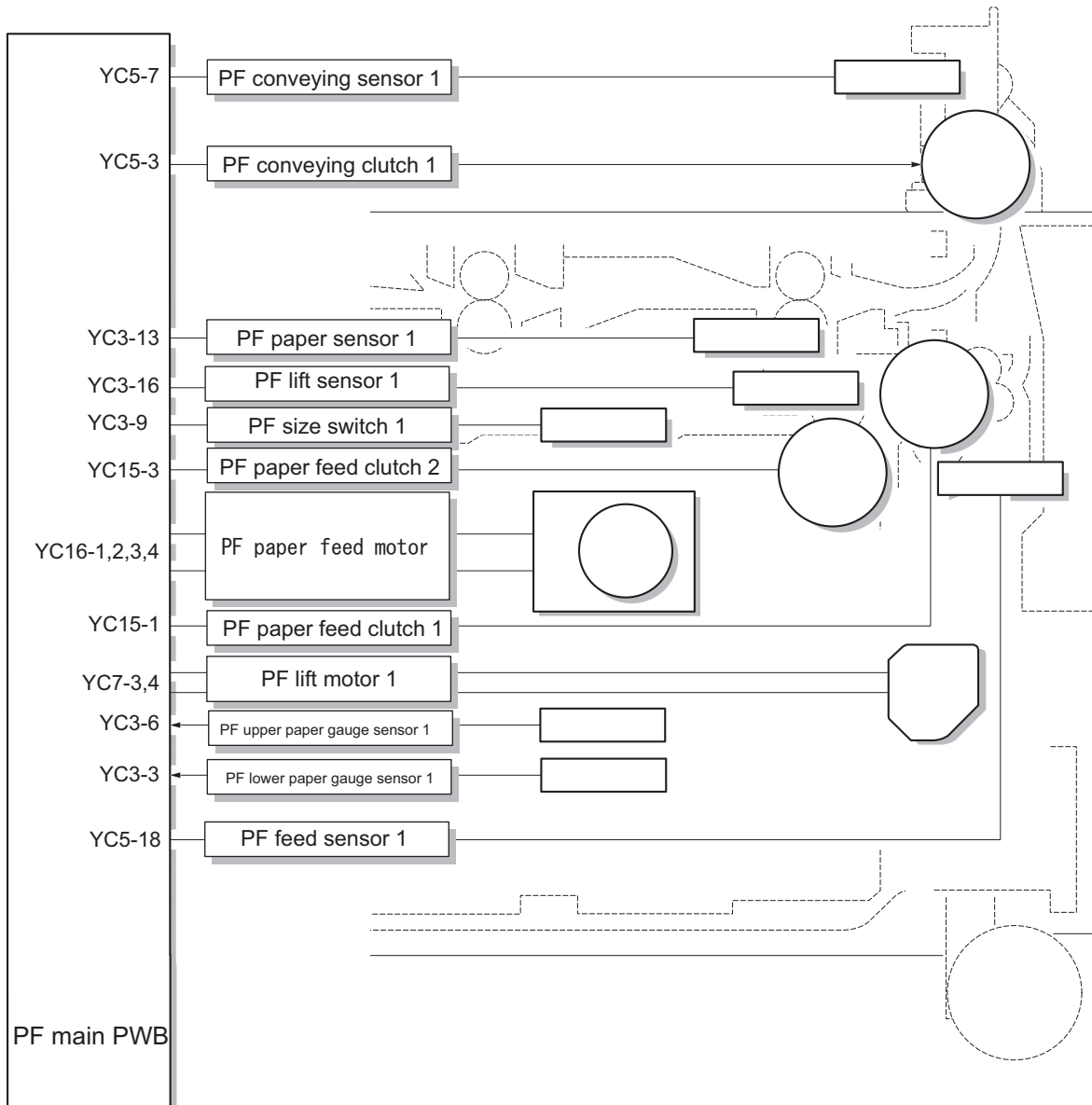


- 18 PF forwarding pulley
- 19 PF paper feed pulley
- 20 Separation pulley
- 21 PF paper feed roller 2
- 22 PF paper feed pulley
- 23 PF paper size detection switch 2

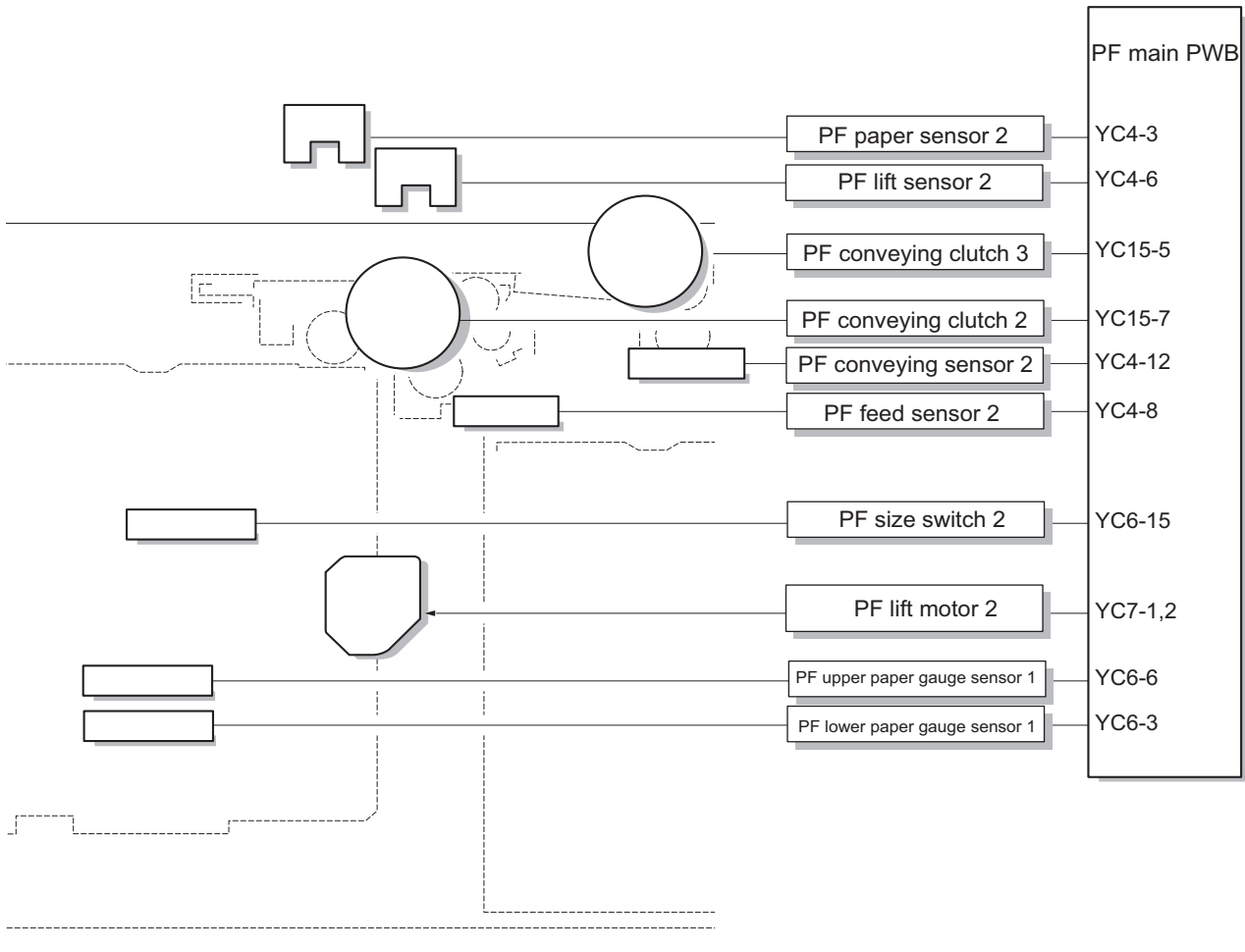
- 24 PF cassette detection switch 2
- 25 PF upper paper gauge sensor 2
- 26 PF lower paper gauge sensor 2
- 27 PF paper sensor 2
- 28 PF lift sensor 2
- 29 PF paper feed sensor 2



Block diagram (Right cassette section)

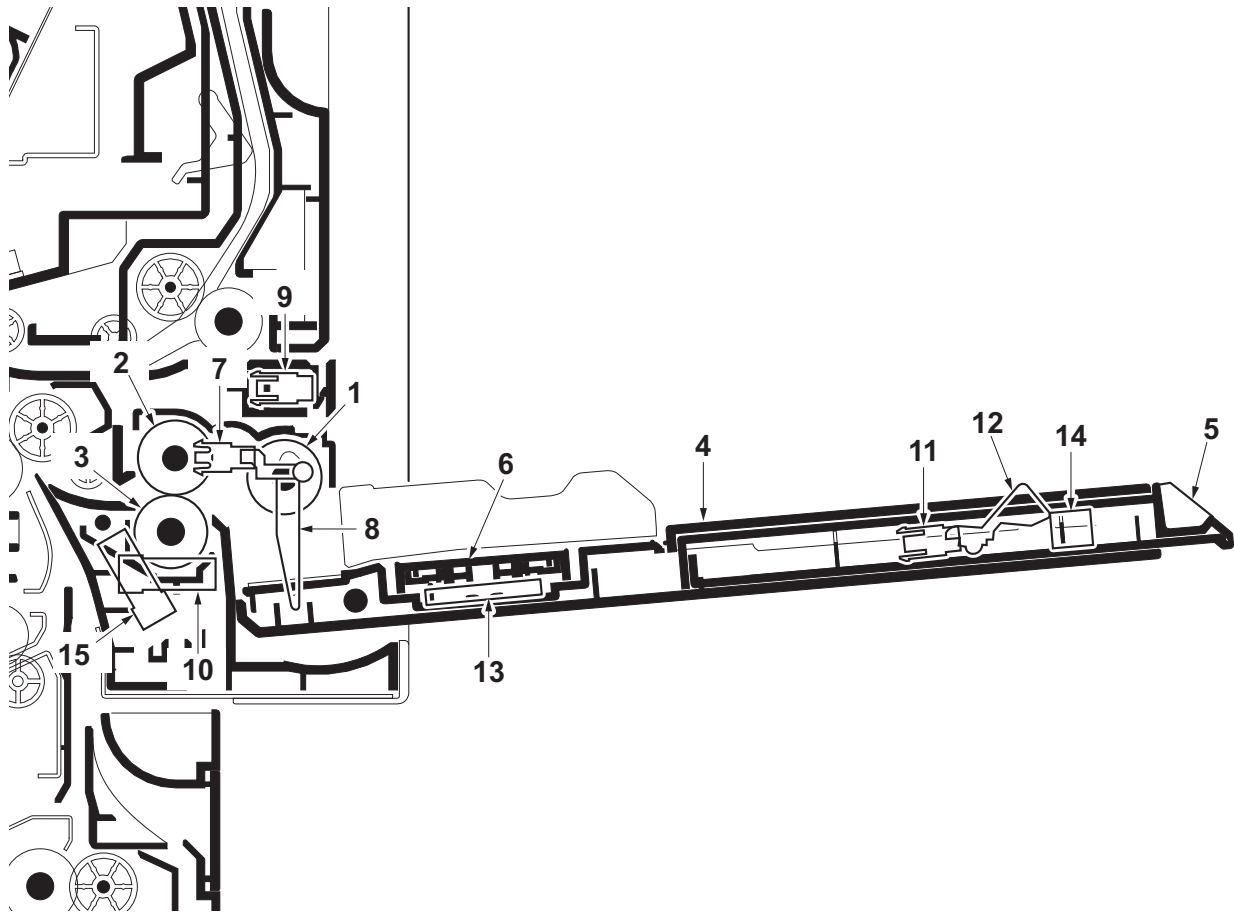


Block diagram (Left cassette section)



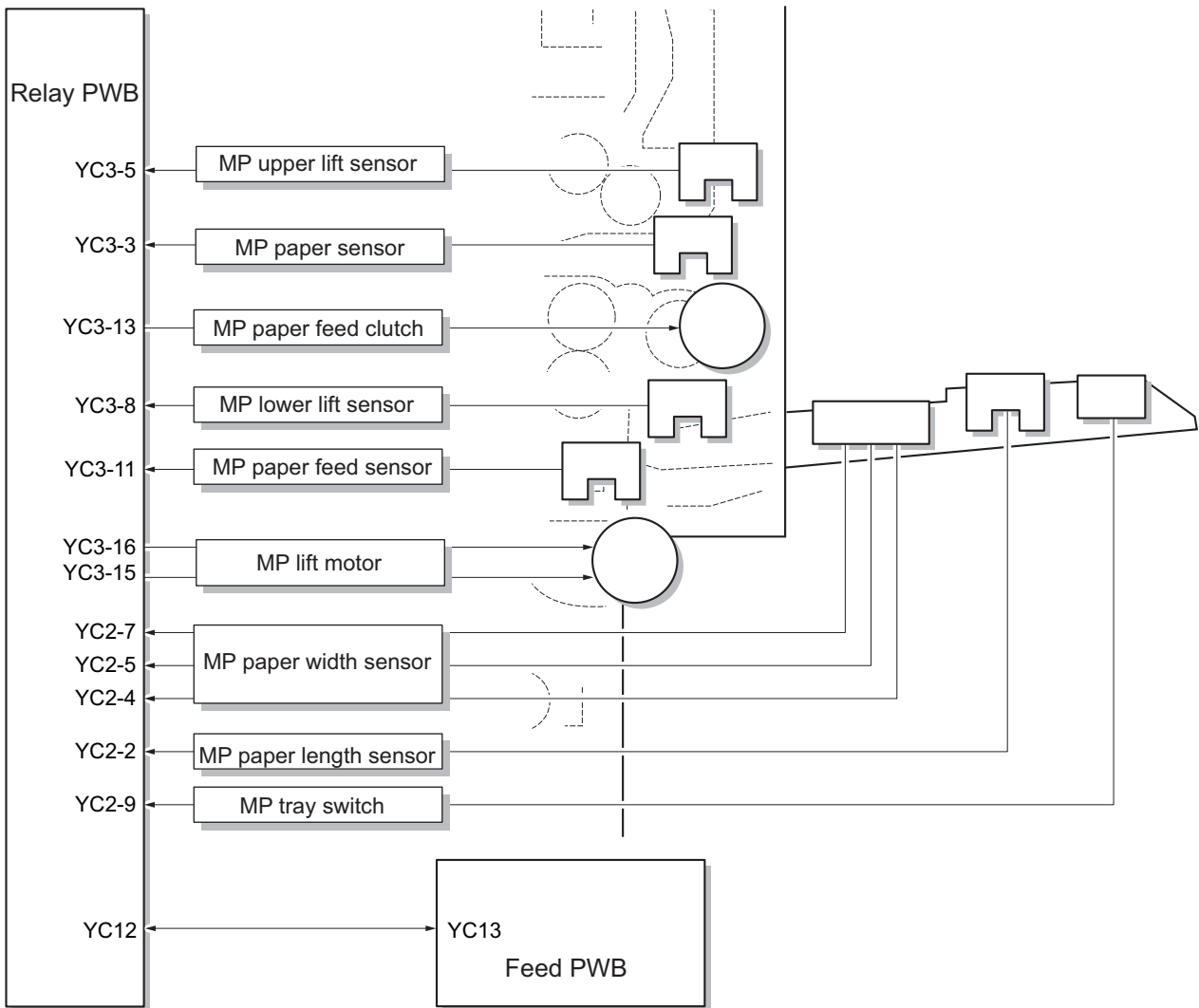
### (3)MP tray paper feed section

MP tray paper feed section consists of the lift base activated by MP lift motor, and MP forwarding pulley, MP paper feed pulley and MP separation pulley for extracting and conveying the paper. The paper on the MP tray is fed by rotating the MP forwarding pulley, the MP paper feed pulley and the MP separation pulley. The MP separation pulley prevents multiple sheets from being fed at one time by the torque limiter.



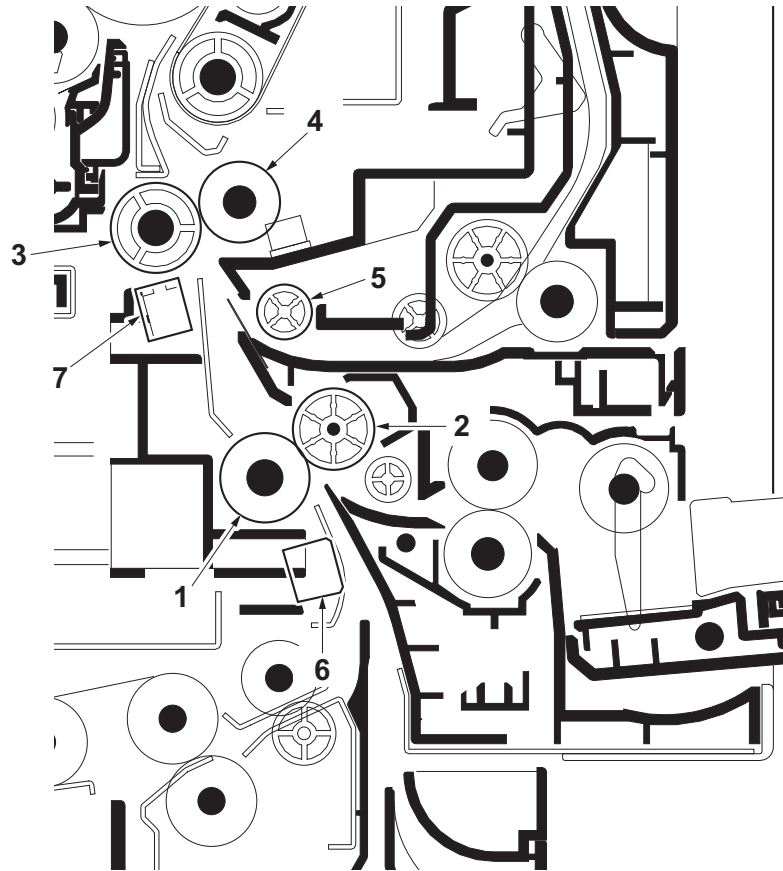
- |                              |   |
|------------------------------|---|
| 1 MP forwarding pulley       | 9 MP lift sensor 1                      |
| 2 MP paper feed pulley       | 10 MP lift sensor 2                     |
| 3 MP separation pulley       | 11 MP paper length switch               |
| 4 MP tray                    | 12 Actuator<br>(MP paper length switch) |
| 5 MP sub tray                | 13 MP paper width switch                |
| 6 MP lift base               | 14 MP tray switch                       |
| 7 MP paper sensor            | 15 MP original feed sensor              |
| 8 Actuator (MP paper sensor) |   |

Block diagram



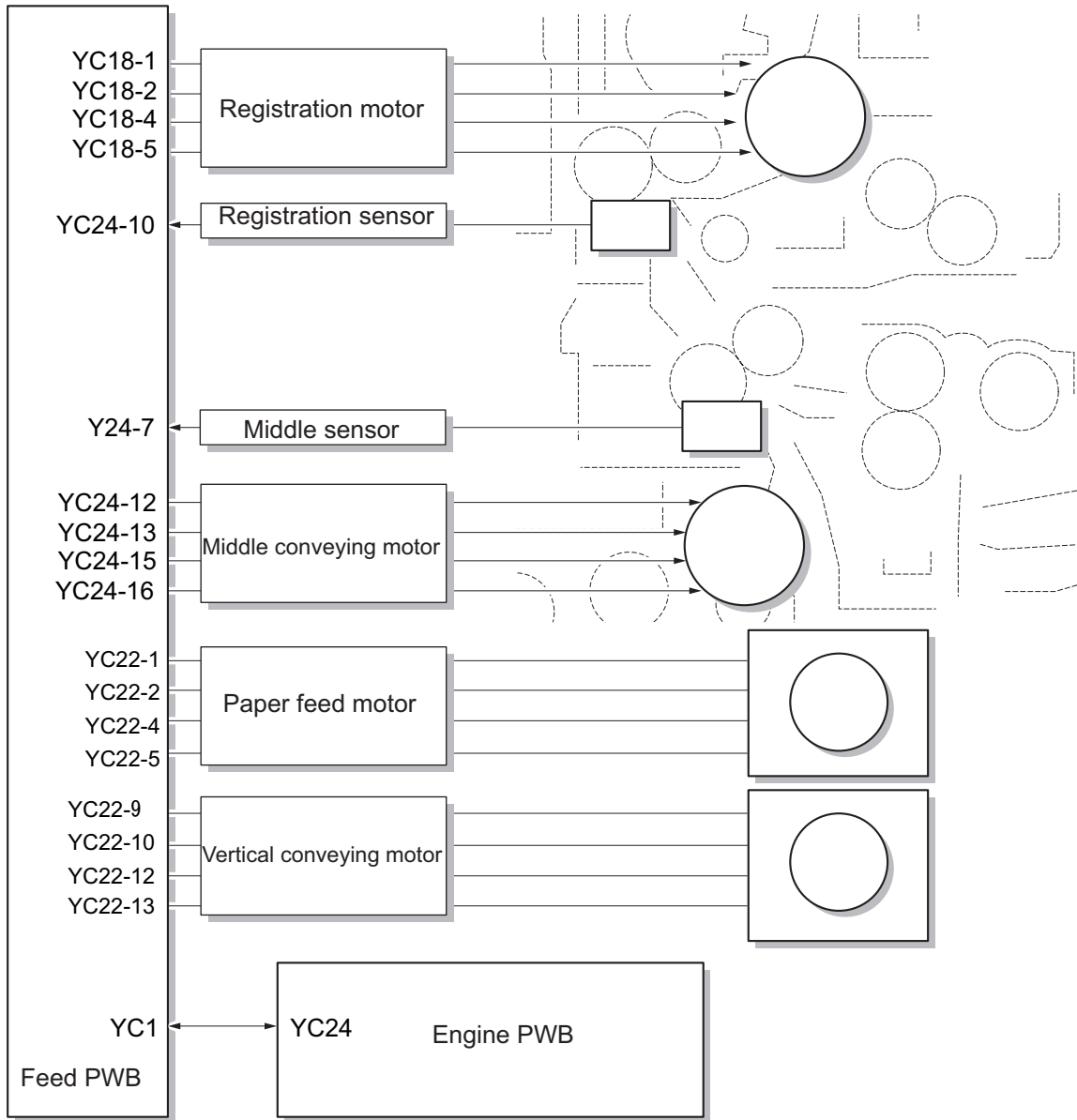
#### (4)Conveying section

The paper conveying section conveys paper to the transfer and separation section when the paper is fed from the cassette or the MP tray, or re-fed in the duplex print. The fed paper is conveyed to where it turns the registration sensor on by the middle roller, and then conveyed to the transfer and separation section by the registration right and left rollers.



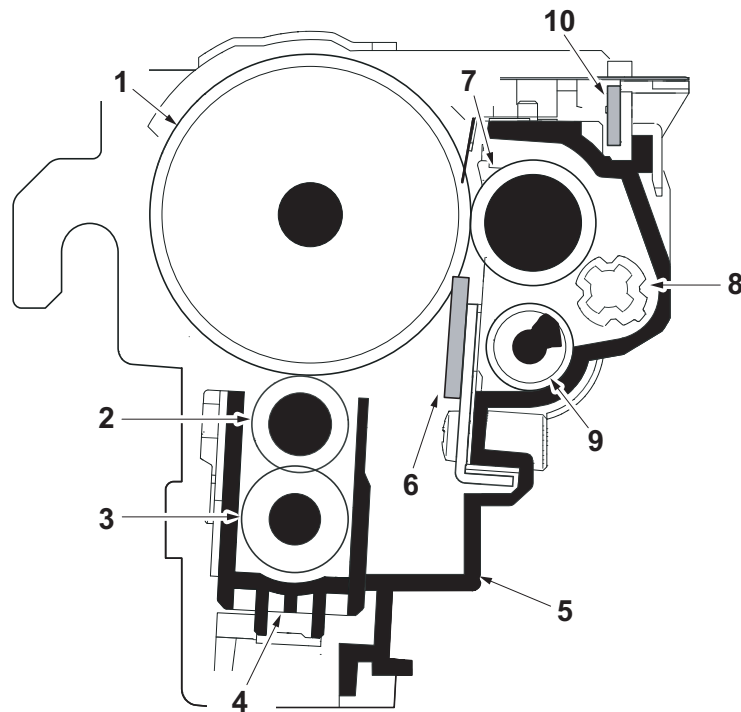
1 Middle roller	5 Conveying pulley
2 Middle pulley	6 DF middle sensor
3 Registration roller left	7 Registration sensor
4 Registration roller right	

Block diagram



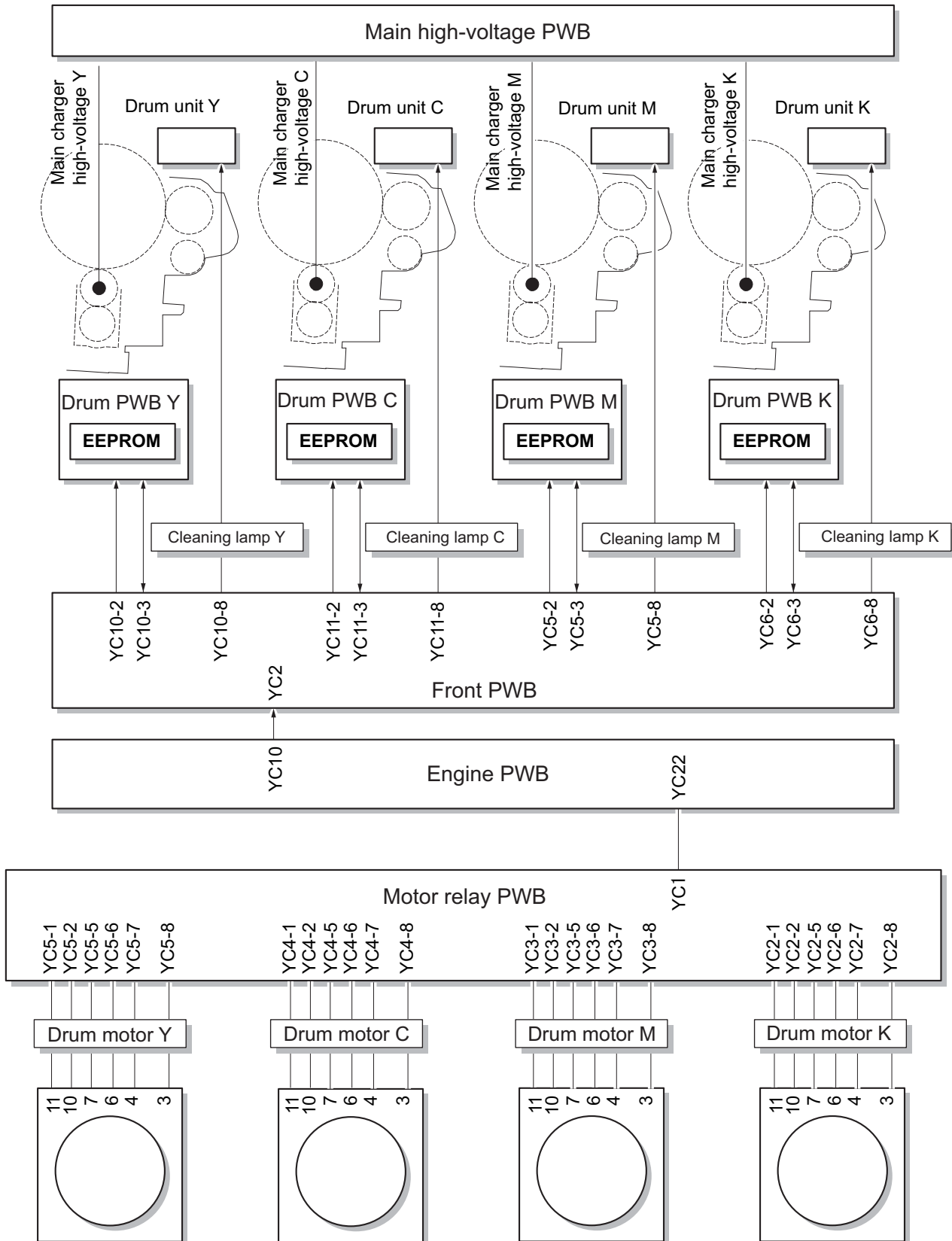
## (5) Drum section

The drum section consists of the charger roller unit, drum and cleaning section. The drum is electrically charged uniformly by means of a charger roller to form a latent image on the surface. The cleaning section consists of the cleaning blade and the cleaning roller which remove residual toner from the drum surface after transfer. The cleaning lamp consists of LEDs and removes residual charge on the drum before main-charging.



- |                           |                   |
|---------------------------|-------------------|
| 1 Drum                    | 6 Cleaning blade  |
| 2 Charger roller          | 7 Cleaning roller |
| 3 Charger cleaning roller | 8 Control roller  |
| 4 Charger case            | 9 Drum screw      |
| 5 Drum frame              | 10 Cleaning lamp  |

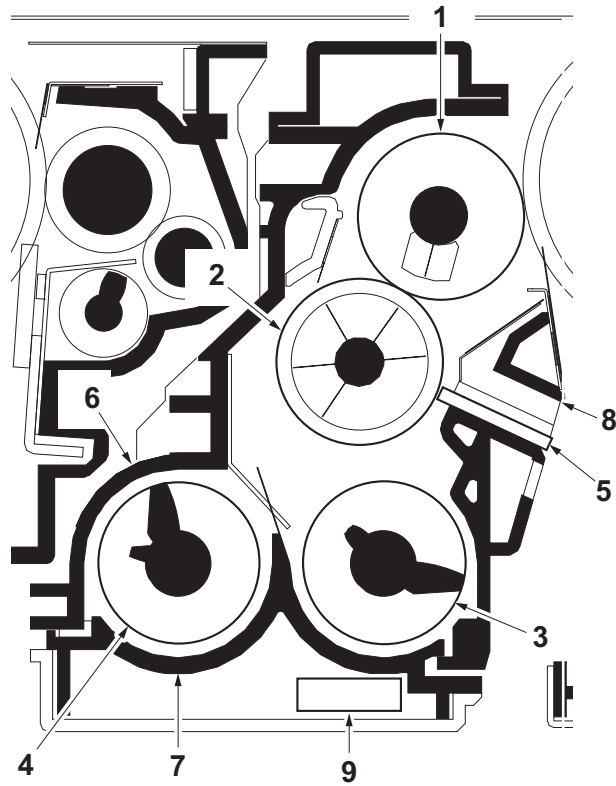
Block diagram



3 - 7 Developer section

The developer section consists of the sleeve roller, the magnet roller and the developer blade forming the magnetic brush, and the developer screw mixing up the toner. The toner amount inside the developer unit is detected by the toner sensor.

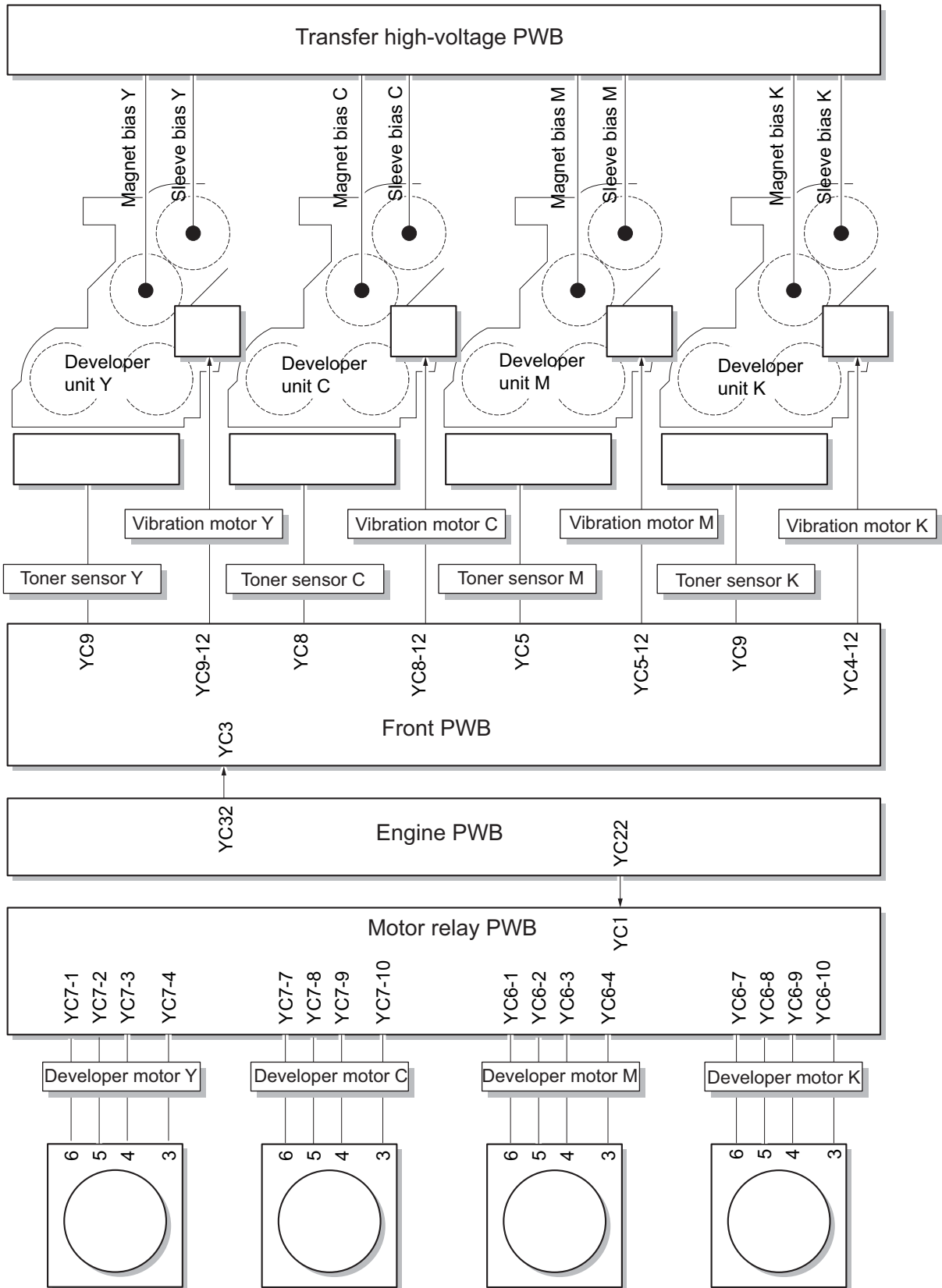




- 1 Sleeve roller
- 2 Magnet roller
- 3 Developer screw A
- 4 Developer screw B
- 5 Developer blade

- 6 Developer case
- 7 Developer cover
- 8 Magnet roller cover
- 9 Toner sensor

Block diagram



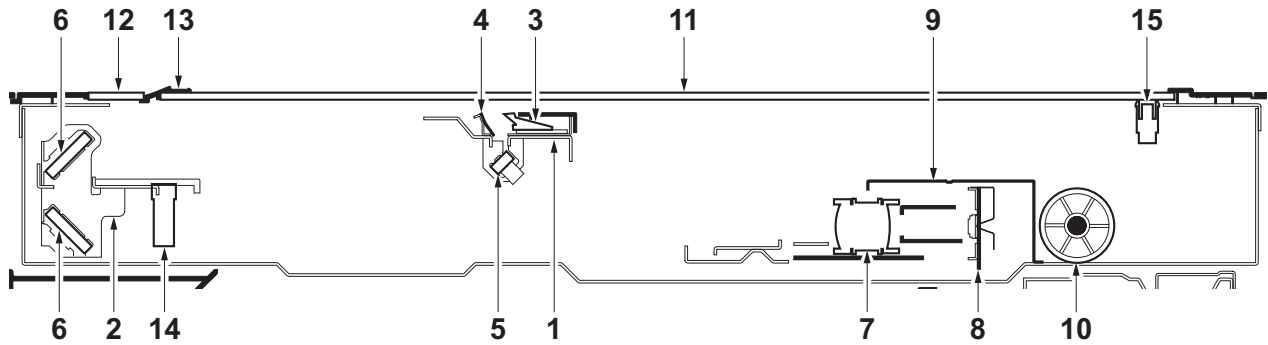
## (1)Optical section

The optical section consists of the image scanner section for scanning the original and the laser scanner section to write the image.

### (1-1)Image scanner section

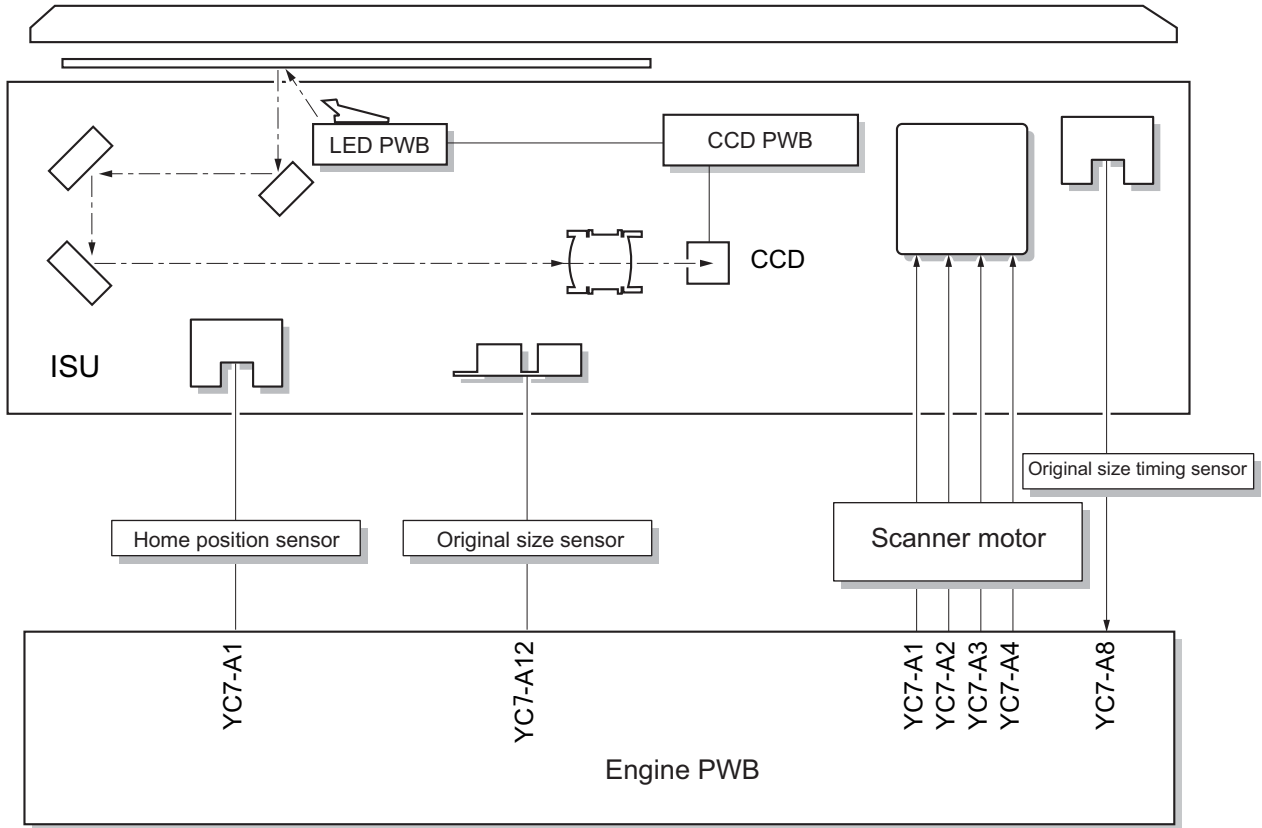
The image on the original is exposed by the LED lamp and that reflection light is scanned by the CCD image sensor on the CCD PWB via three mirrors and the ISU lens to change the electric signal.

The mirror frame A and B travel to scan on the optical rails on the front and rear of the machine to scan from side to side. The speed of the mirror frame B is half the speed of the mirror frame A.



- |                     |                              |
|---------------------|------------------------------|
| 1 Mirror frame A    | 9 LSU cover                  |
| 2 Mirror frame B    | 10 Scanner wire drum         |
| 3 LED mount         | 11 Contact glass             |
| 4 Scanner reflector | 12 Slit glass                |
| 5 Mirror A          | 13 Original size indicator   |
| 6 Mirror B          | 14 Home position sensor      |
| 7 ISU lens          | 15 Original detection switch |
| 8 CCD PWB           |                              |

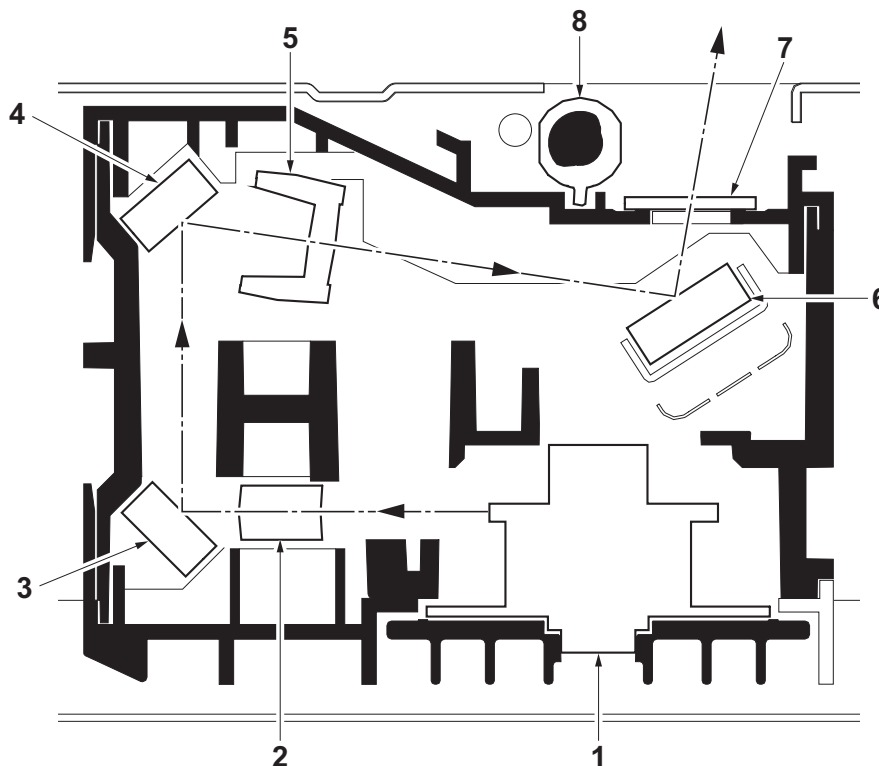
**Block diagram**



**(2)Laser scanner unit**

The charged drum surface is scanned by the laser emitted from the laser scanner units. The laser reflects to the polygon mirrors by rotating the polygon motor so that the laser scans horizontally to the image. The laser scanner unit has some lenses and mirrors, that adjust the diameter of the laser to focus the laser to the drum surface.

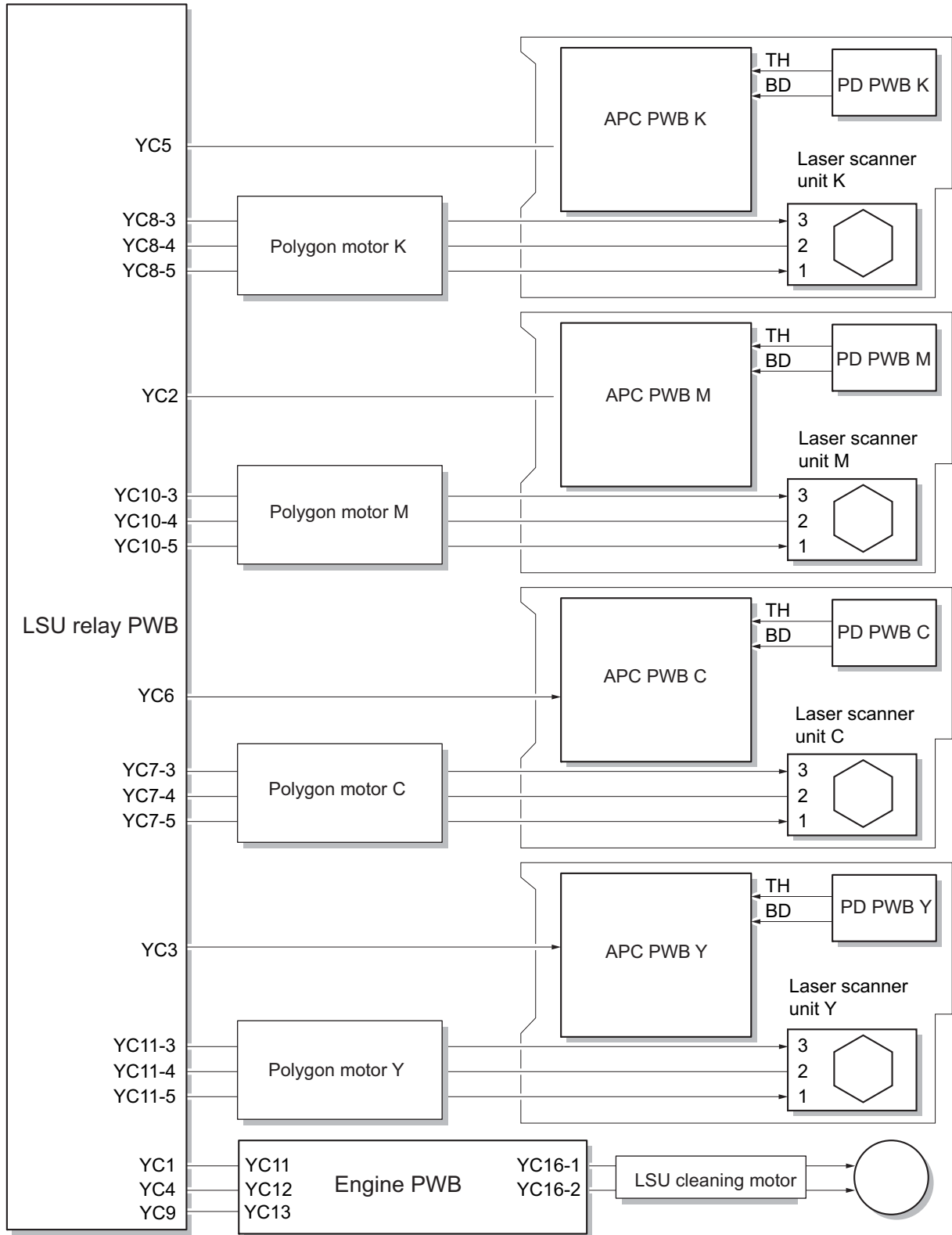
Also, the LSU cleaning motor operates to automatically clean the LSU dust shield glass.



- 1 Polygon motor
- 2 f $\theta$  lens A
- 3 Mirror A
- 4 Mirror B

- 5 f $\theta$  lens B
- 6 Mirror C
- 7 LSU dust shield glass
- 8 LSU spiral

**Block diagram**



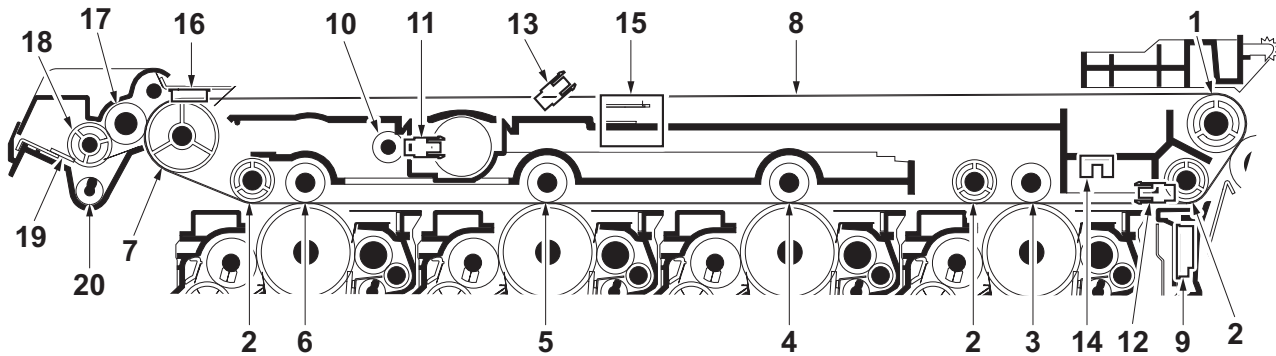
**(3)Transfer and separation section**

The transfer/separation section consists of the primary transfer unit section and the secondary transfer roller section.

### (3-1) Primary transfer unit

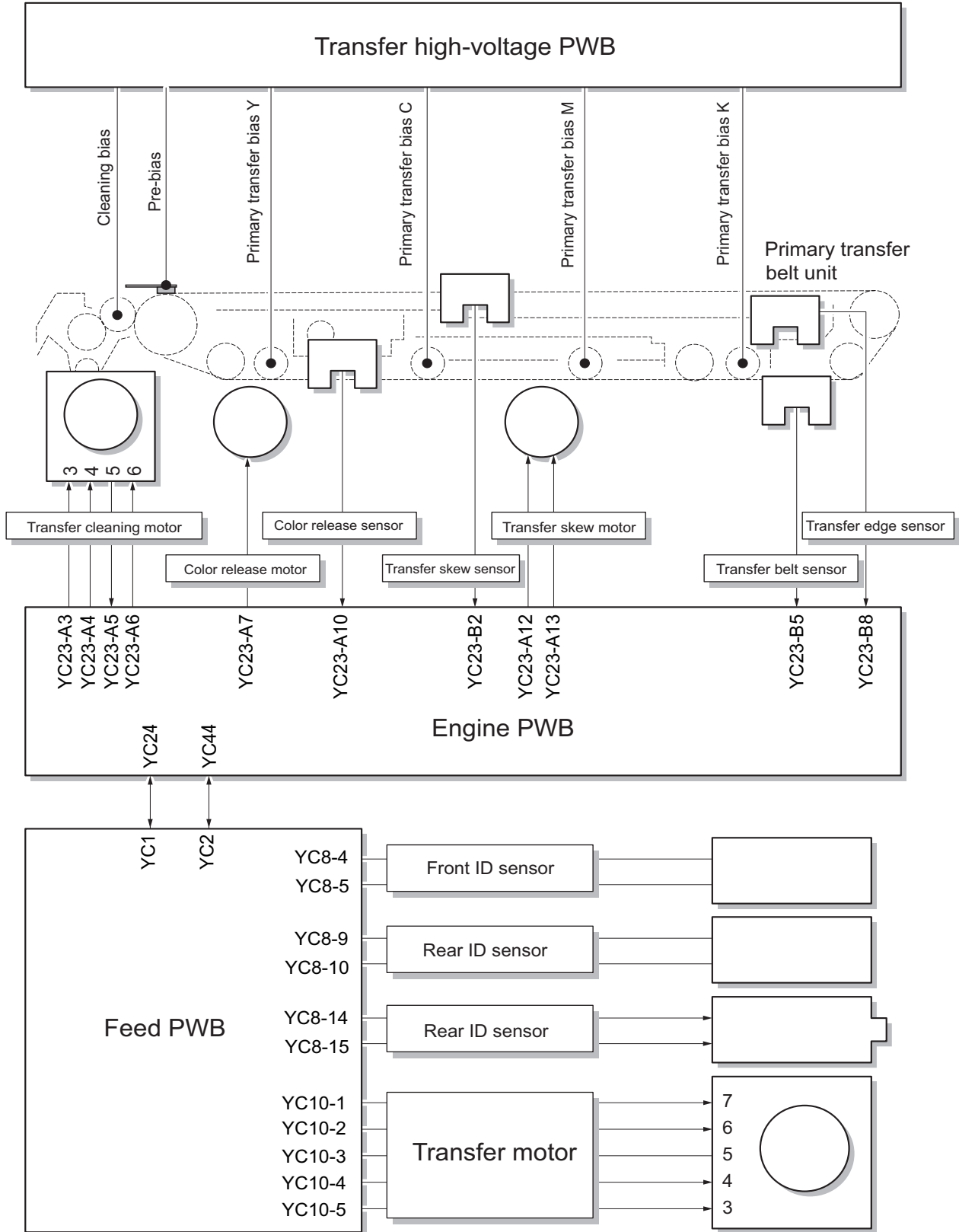
The primary transfer unit consists of the transfer cleaning unit, the transfer belt and four primary transfer rollers facing each drum. When printing the color image, it forms a full-color toner image by superimposing and transferring single-color toner images formed on each drum onto the transfer belt. Also with the ID sensors mounted on the machine frame, the toner density on the transfer belt is measured.

The transfer cleaning unit collects the remaining toner on the transfer belt after the secondary transferring, and forwards it to the waste toner box as waste toner.



- |                             |                         |
|-----------------------------|-------------------------|
| 1 Drive roller              | 11 Color release sensor |
| 2 Backup roller             | 12 Transfer belt sensor |
| 3 Primary transfer roller K | 13 Transfer skew sensor |
| 4 Primary transfer roller M | 14 Transfer edge sensor |
| 5 Primary transfer roller C | 15 Transfer skew motor  |
| 6 Primary transfer roller Y | 16 Cleaning pre-brush   |
| 7 Tension roller            | 17 Cleaning fur brush   |
| 8 Transfer belt             | 18 Cleaning roller      |
| 9 ID sensor                 | 19 Cleaning blade       |
| 10 Color release motor      | 20 Cleaning screw       |

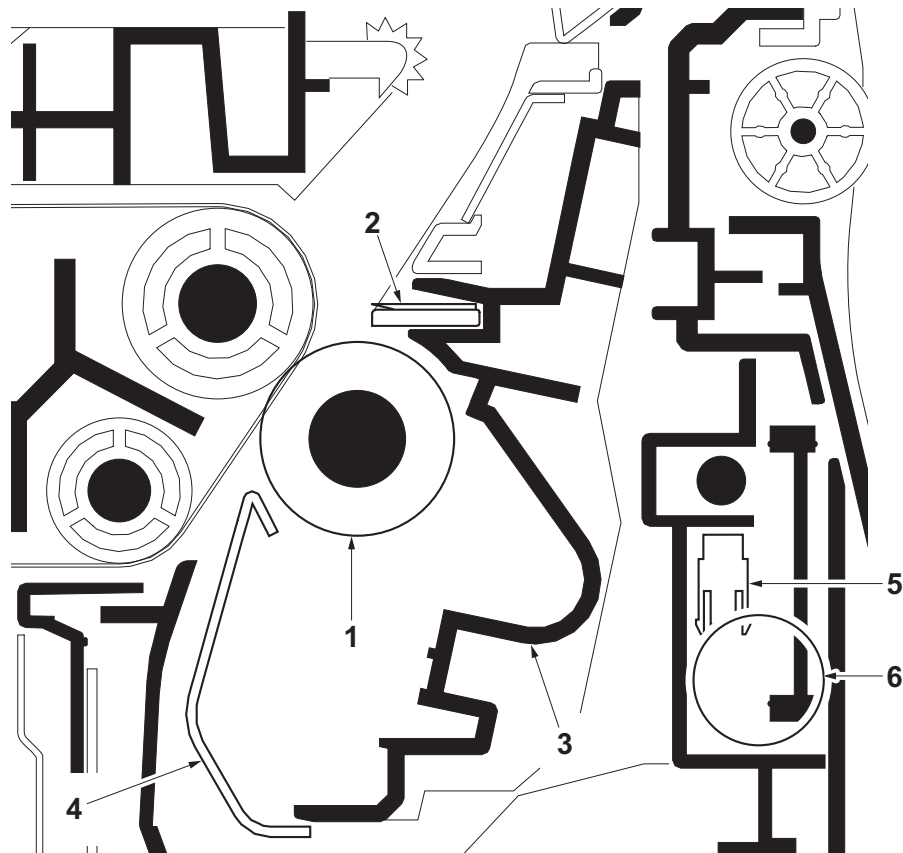
Block diagram





### (3-2) Secondary transfer roller section

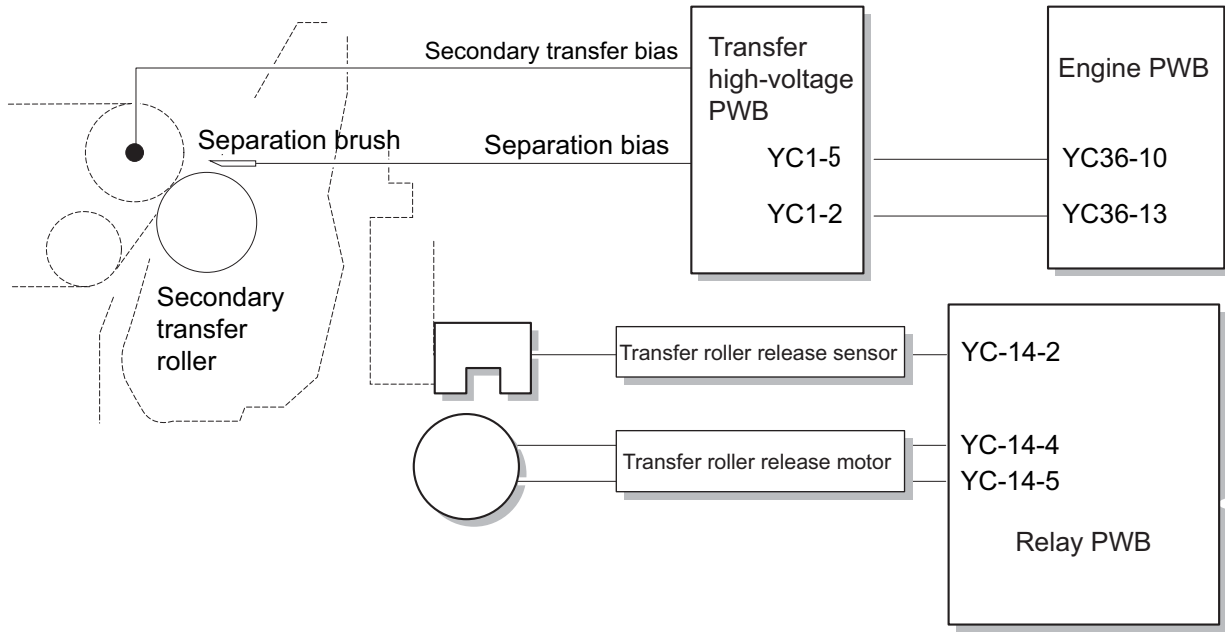
The secondary transfer roller section consists of the secondary transfer roller attached to the conveying unit, and the separation brush. The DC bias from the high-voltage PWB is impressed to the secondary transfer roller, and the toner image formed on the transfer belt is transferred to the paper by the potential gap. After transferring, the paper is separated by self stripping.



- 1 Secondary transfer roller
- 2 Separation brush
- 3 Secondary transfer frame

- 4 Transfer guide
- 5 Transfer release sensor
- 6 Transfer release motor

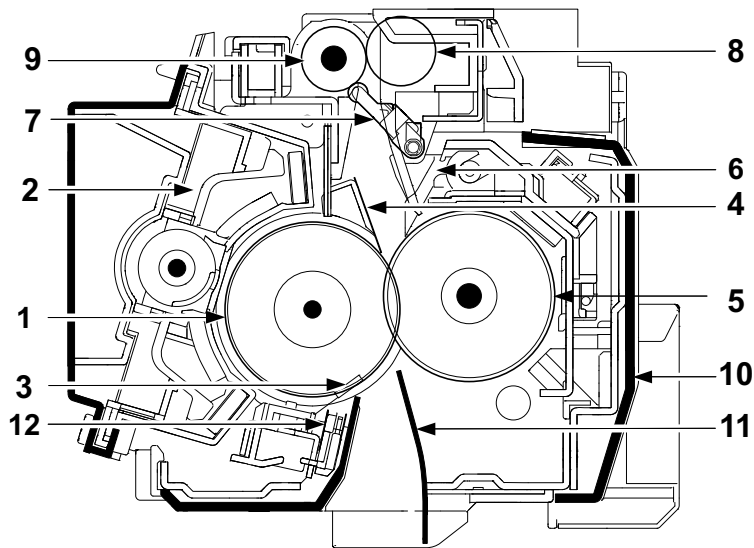
**Block diagram**



**(4)Fuser section**

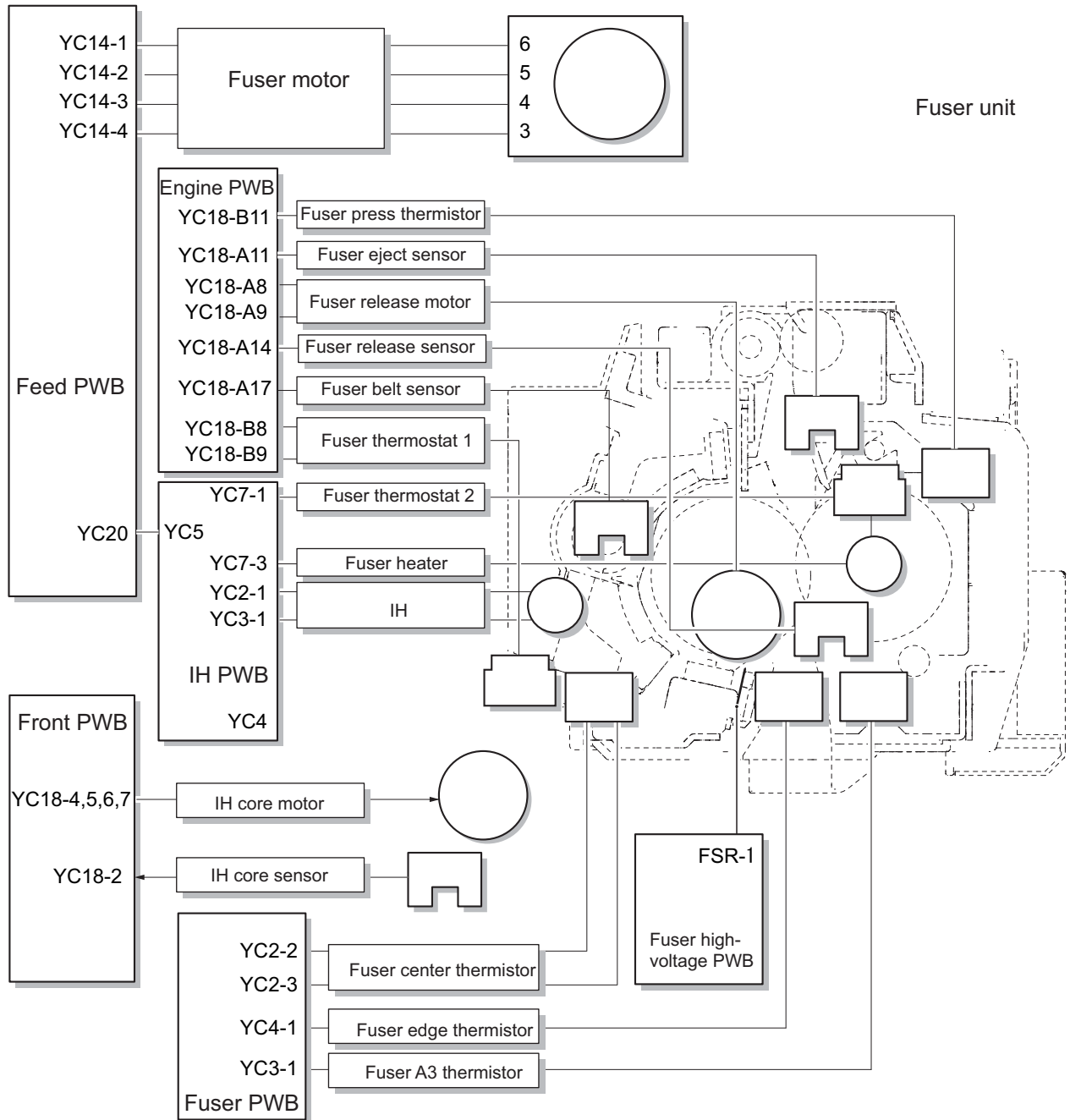
The paper from the transfer and separation section is pinched between the heat roller and the press roller. The fuser roller is heated by the IH, and the paper is pressed by the press roller with the pressure added by the pressure spring toward the fuser roller, so toner is fused on the paper by that heat and pressure.

The surface temperature of the fuser roller and the press roller is detected by the fuser thermistor and controlled by the Engine PWB.



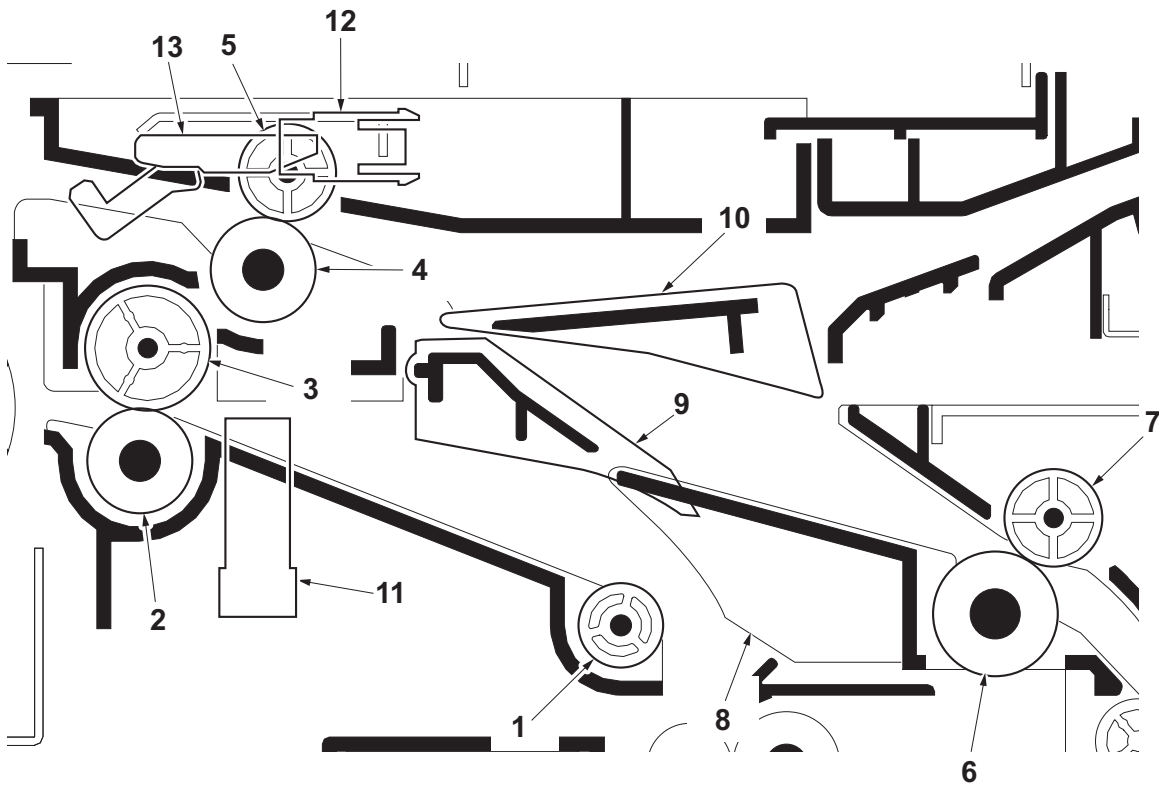
- |                                |                            |
|--------------------------------|----------------------------|
| 1 Fuser belt                   | 8 Fuser eject roller       |
| 2 IH core                      | 9 Left fuser eject roller  |
| 3 Fuser thermistor             | 10 Fuser frame             |
| 4 Separator                    | 11 Front fuser guide       |
| 5 Press roller                 | 12 Fuser discharger needle |
| 6 Press roller separation claw |                            |
| 7 Actuator (Eject sensor)      |                            |

## Block diagram



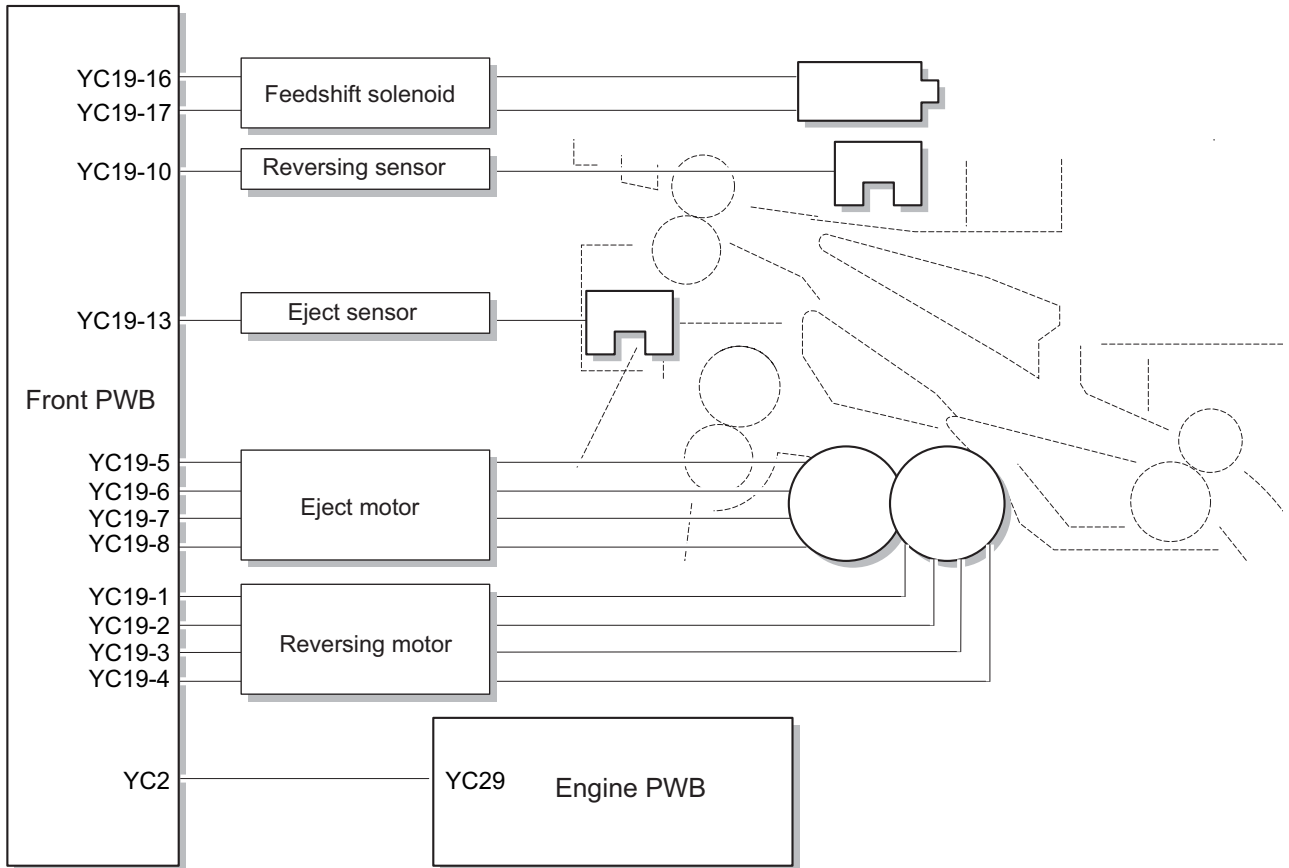
### (5) Feed-shift/switchback section

The feed-shift/switchback section consists of the conveying path which sends the paper that has passed the fuser section to the bridge section, duplex conveying section or job separator.



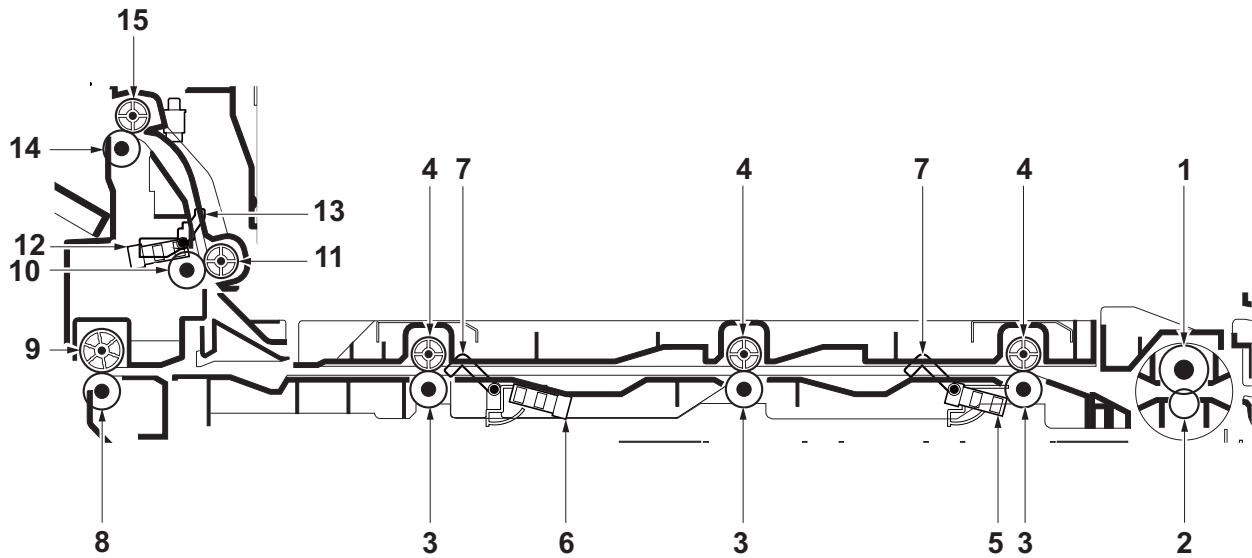
- |                       |                                |
|-----------------------|--------------------------------|
| 1 Middle pulley       | 8 Lower duplex guide           |
| 2 Eject roller        | 9 Lower change guide           |
| 3 Eject pulley        | 10 Upper change guide          |
| 4 Eject roller B      | 11 Eject sensor                |
| 5 Eject pulley B      | 12 Reversing sensor            |
| 6 Upper duplex roller | 13 Actuator (Reversing sensor) |
| 7 Duplex pulley       |                                |

### Block diagram



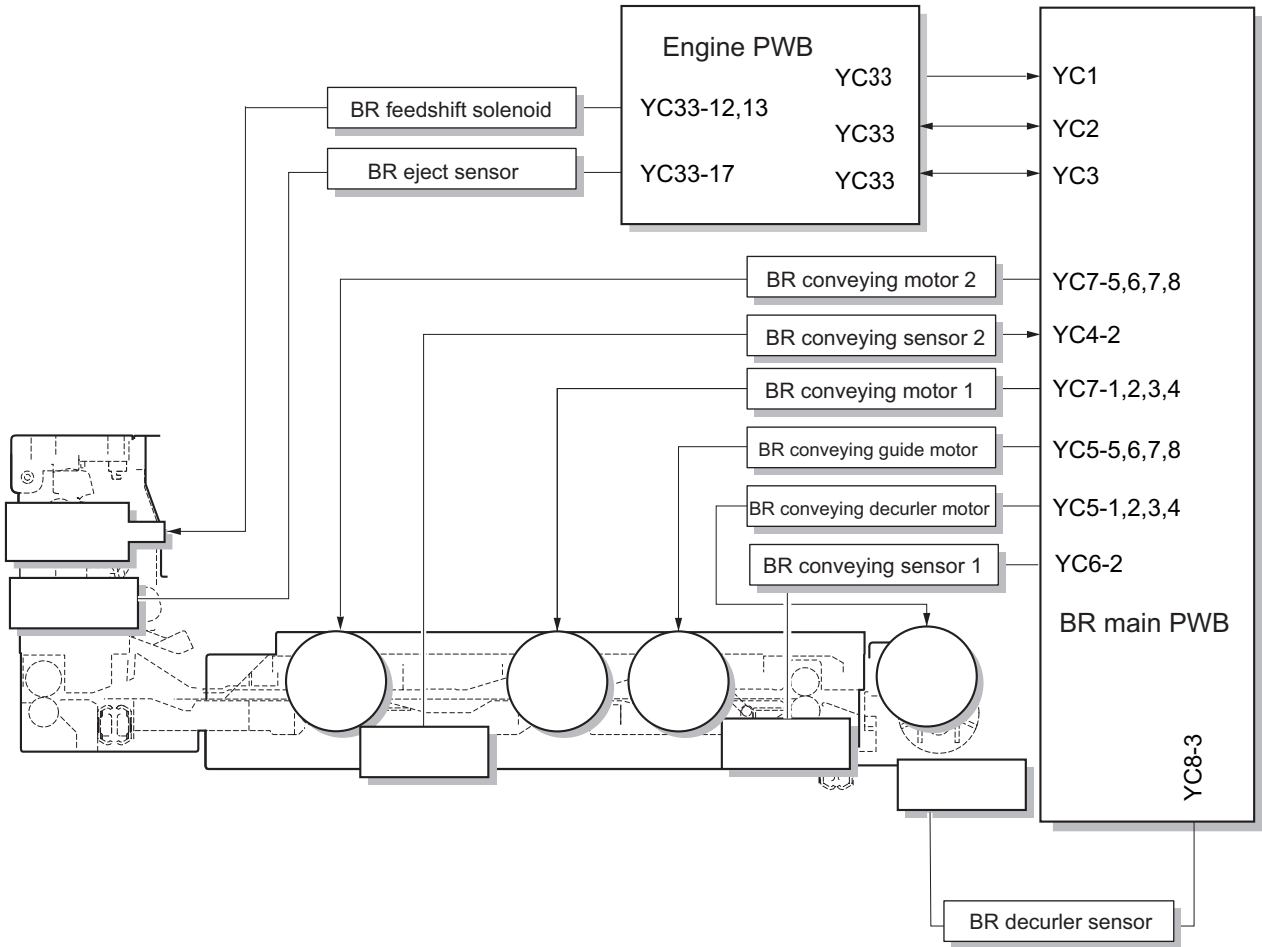
**(6) Bridge section**

Bridge section activates the conveying roller to deliver the paper, which was sent by the feed-shift/switchback section, to the eject tray after de-curling the paper using the decurler.



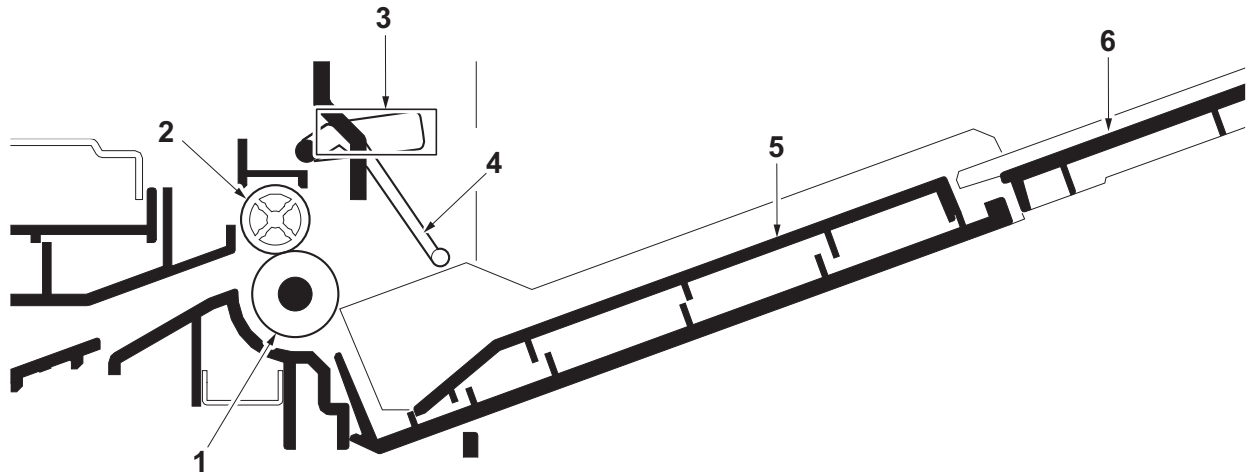
- |                                  |                               |
|----------------------------------|-------------------------------|
| 1 BR press roller 1              | 9 BR eject pulley 1           |
| 2 BR press roller 2              | 10 BR feed-shift roller       |
| 3 BR conveying roller            | 11 BR feed-shift pulley       |
| 4 BR conveying pulley            | 12 BR eject sensor            |
| 5 BR conveying sensor 1          | 13 Actuator (BR eject sensor) |
| 6 BR conveying sensor 2          | 14 BR eject roller 2          |
| 7 Actuator (BR conveying sensor) | 15 BR eject pulley 2          |
| 8 BR eject roller 1              |                               |

Block diagram



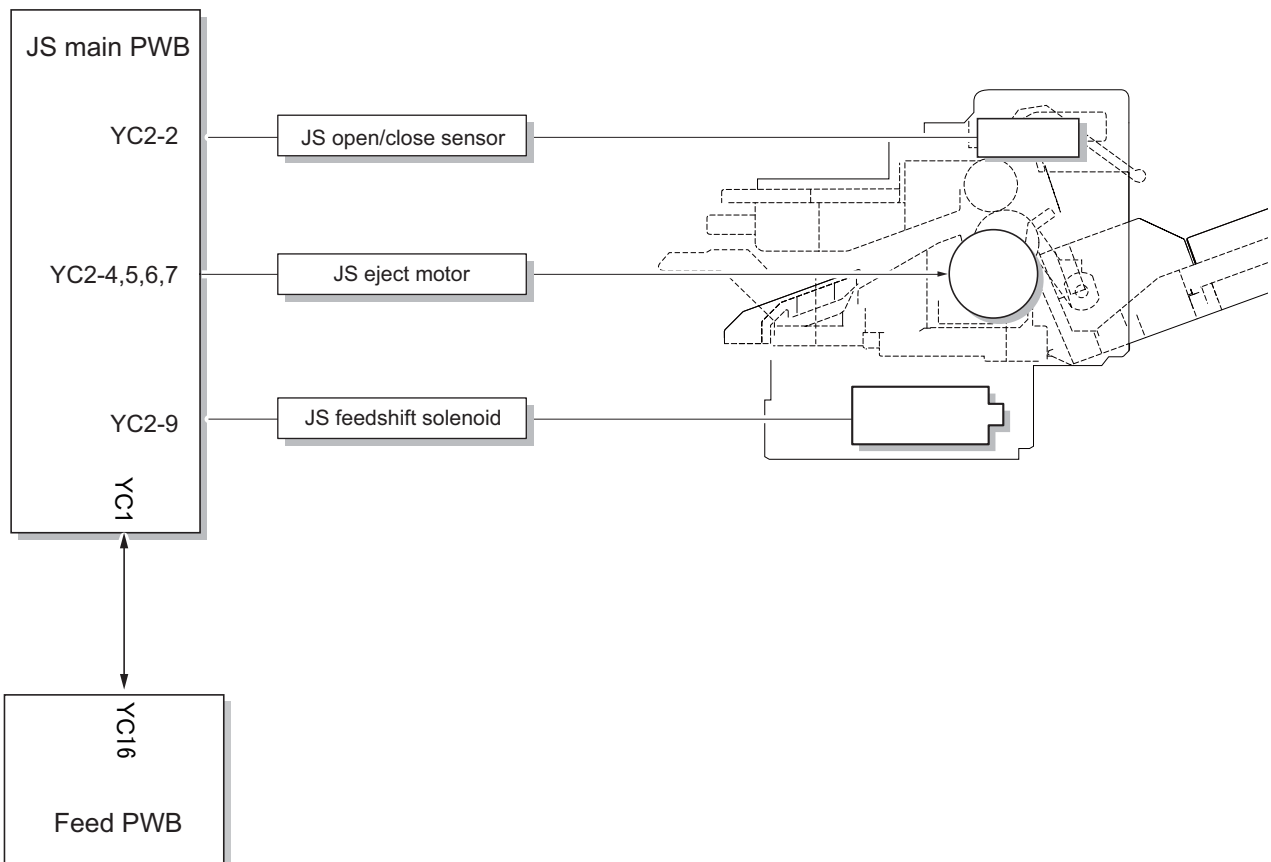
### (7) Job separator section

The job separator switches the paper path to eject printed paper to the right tray.



- |                   |   |
|-------------------|---|
| 1 JS eject roller | 4 Actuator (JS open/close detection sensor) |
| 2 JS eject pulley | 5 Right tray                                |
| 3 JS eject sensor | 6 Sub tray                                  |

### Block diagram





**(8) Duplex conveying section**

The duplex conveying section consists of the paper conveying path to forward the paper from the feed-shift/switchback section in the duplex print to the conveying section.

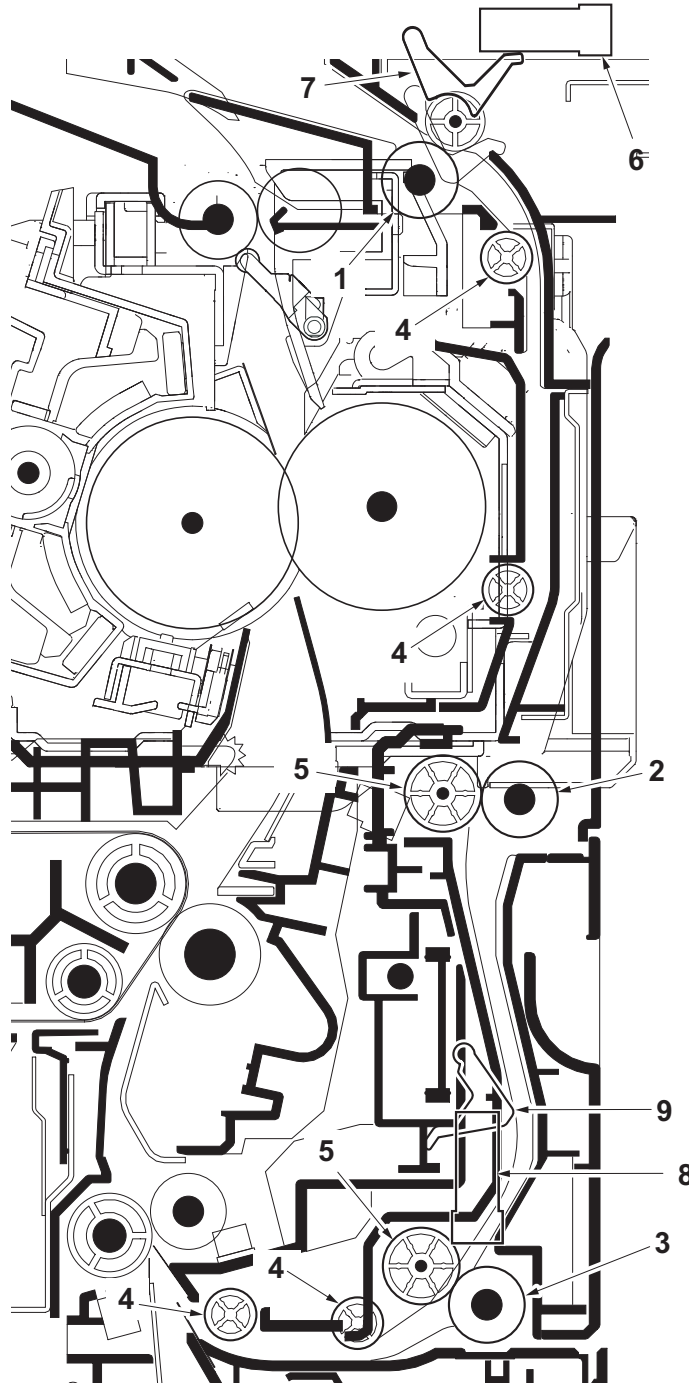
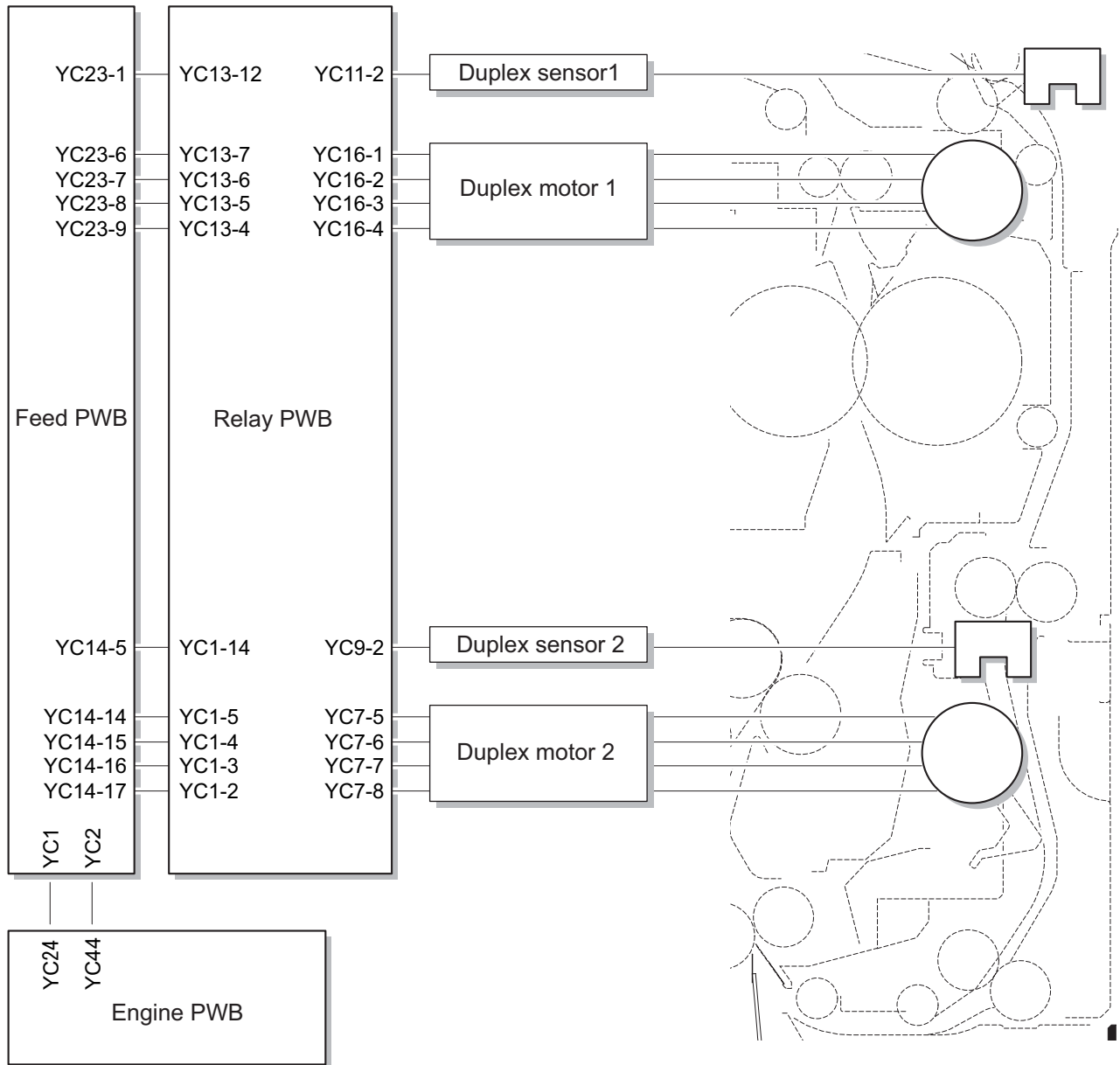


Figure 3-1

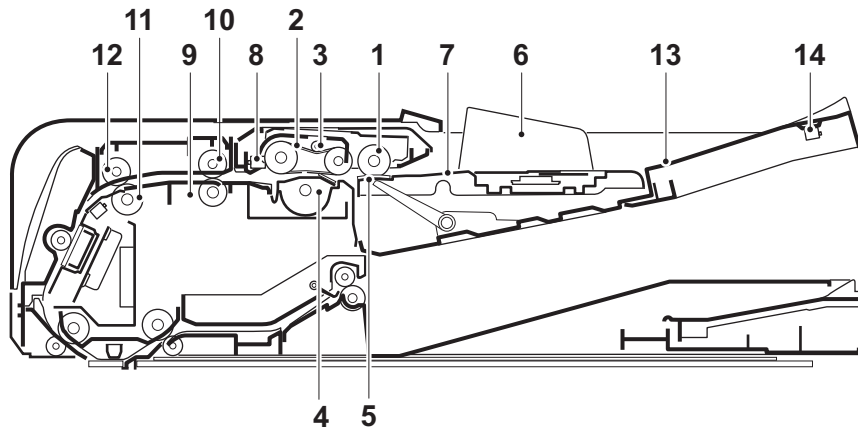
- |                        |                              |
|------------------------|------------------------------|
| 1 Upper duplex roller  | 6 Duplex sensor 1            |
| 2 Middle duplex roller | 7 Actuator (Duplex sensor 1) |
| 3 Lower duplex roller  | 8 Duplex sensor 2            |
| 4 Duplex pulley A      | 9 Actuator (Duplex sensor 2) |
| 5 Duplex pulley B      |                              |

Block diagram

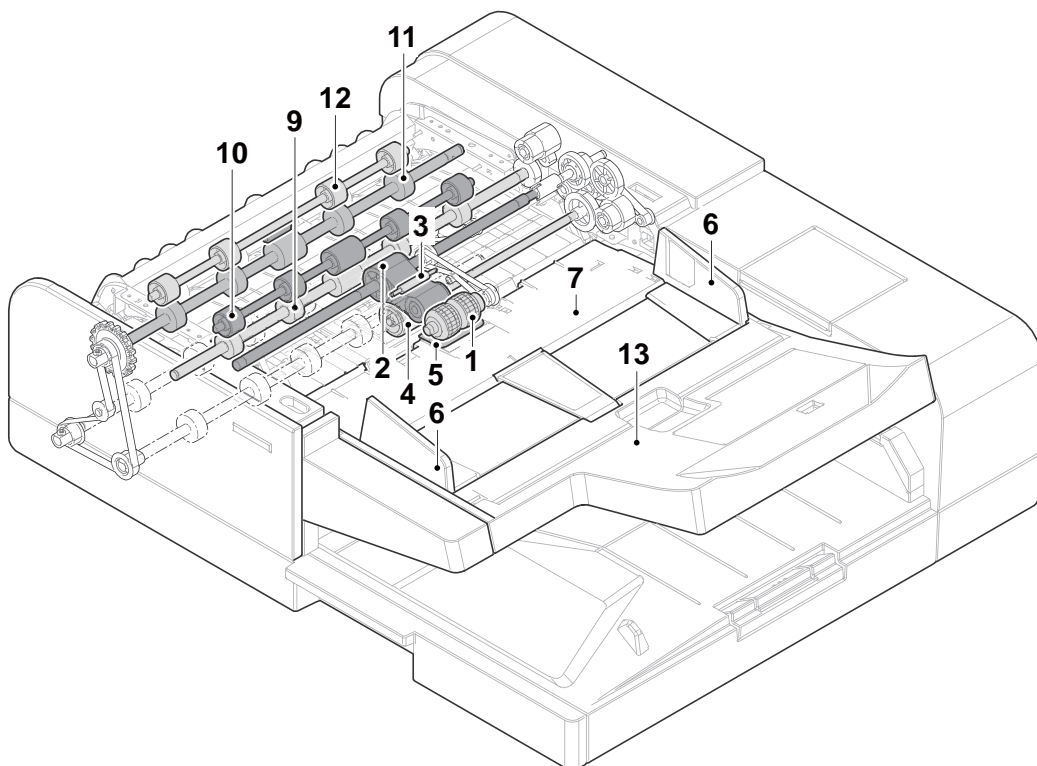


**(9) Document processor****(9-1) Original feed section**

The original feed section consists of the parts in the figure, and conveys the original on the original tray to the original conveying section. The original is fed by rotating the DP forwarding pulley and the DP feed roller.

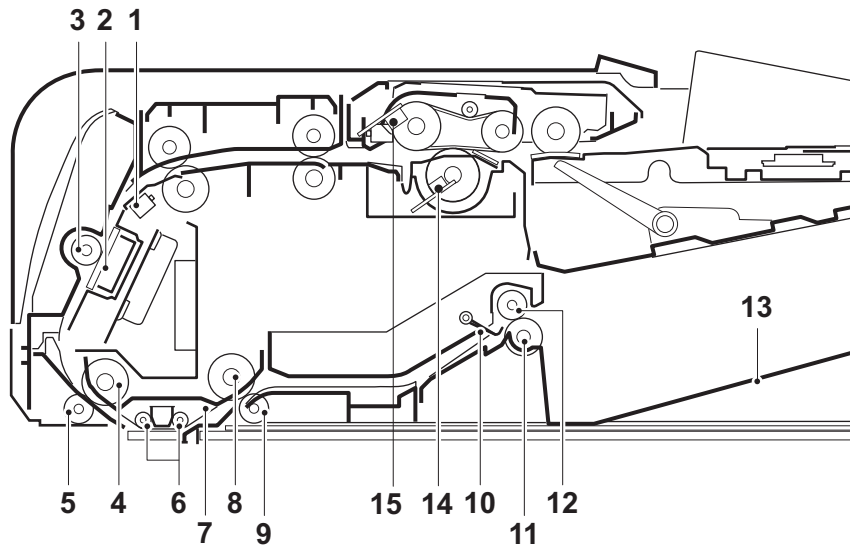


- |                            |                              |
|----------------------------|------------------------------|
| 1 DP forwarding pulley     | 8 DP original feed sensor    |
| 2 DP original feed belt    | 9 DP registration roller     |
| 3 DP belt tension pulley   | 10 DP registration pulley    |
| 4 DF separation pulley     | 11 DP conveying roller 1     |
| 5 DF friction pad          | 12 DP conveying pulley 1     |
| 6 DP original width guide  | 13 DP original tray          |
| 7 DP original bottom plate | 14 DP original length sensor |

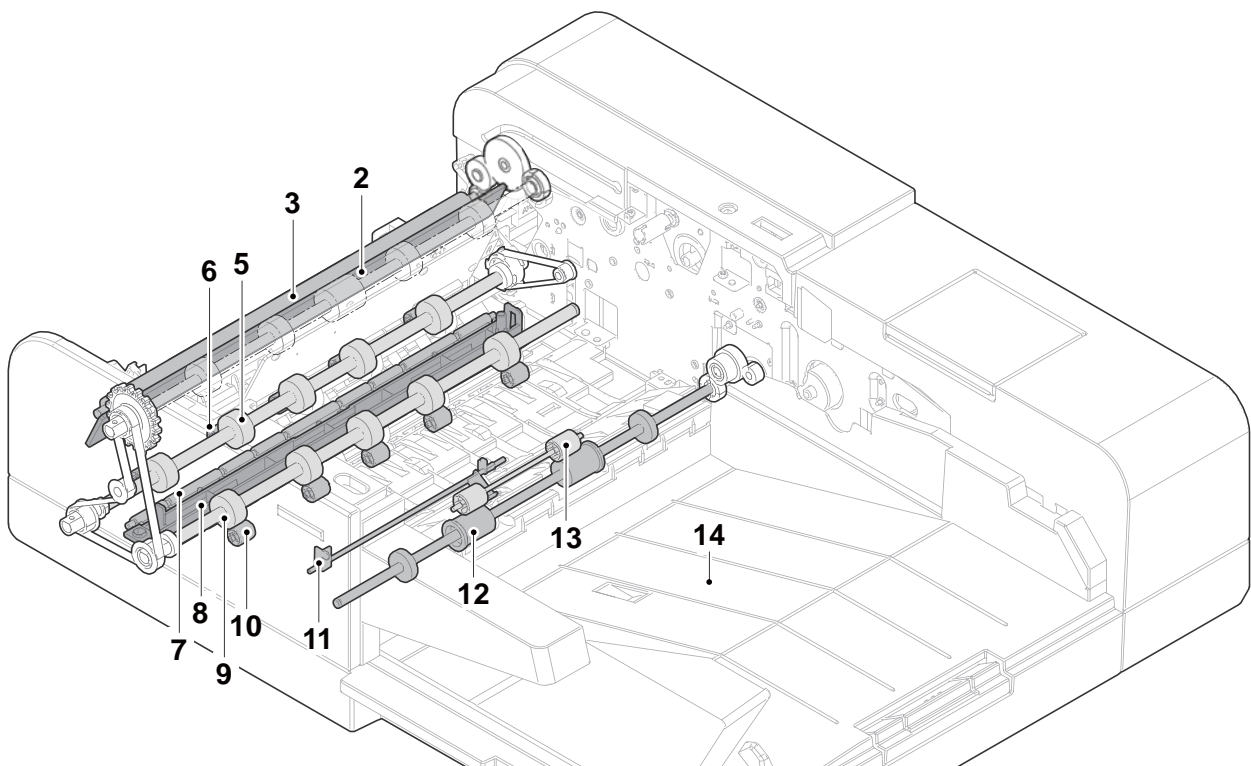


## (9-2)Original conveying section and eject section

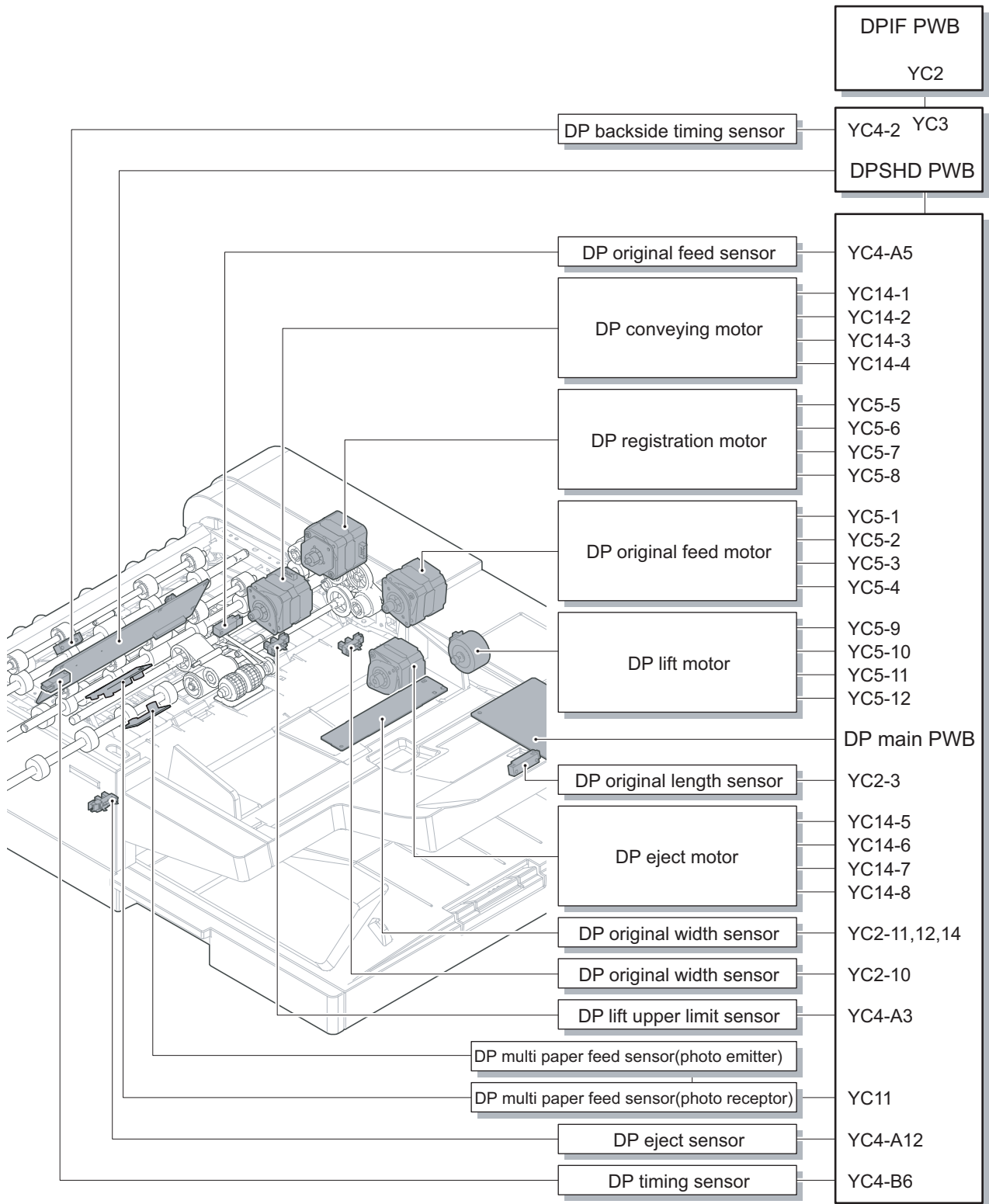
The original conveying section consists of the parts in the figure. The 2nd side of the conveyed original is scanned when passing the CIS and the 1st side at the optical section (CCD) in the main unit when passing the DP slit glass. The original already scanned is ejected to the original eject table by the eject roller.



- |                             |  |
|-----------------------------|--|
| 1 DP backside timing sensor | 9 DP conveying pulley 3                  |
| 2 DPCIS                     | 10 DP actuator (DP eject sensor)         |
| 3 DPCIS roller              | 11 DP eject roller                       |
| 4 DP conveying roller 2     | 12 DP eject pulley                       |
| 5 DP conveying pulley 2     | 13 DP eject tray                         |
| 6 DP scanner guide pulley   | 14 PF multi feed sensor (photo emitter)  |
| 7 DP scanner guide          | 15 PF multi feed sensor (photo receptor) |
| 8 DP conveying roller 3     |  |



Block diagram

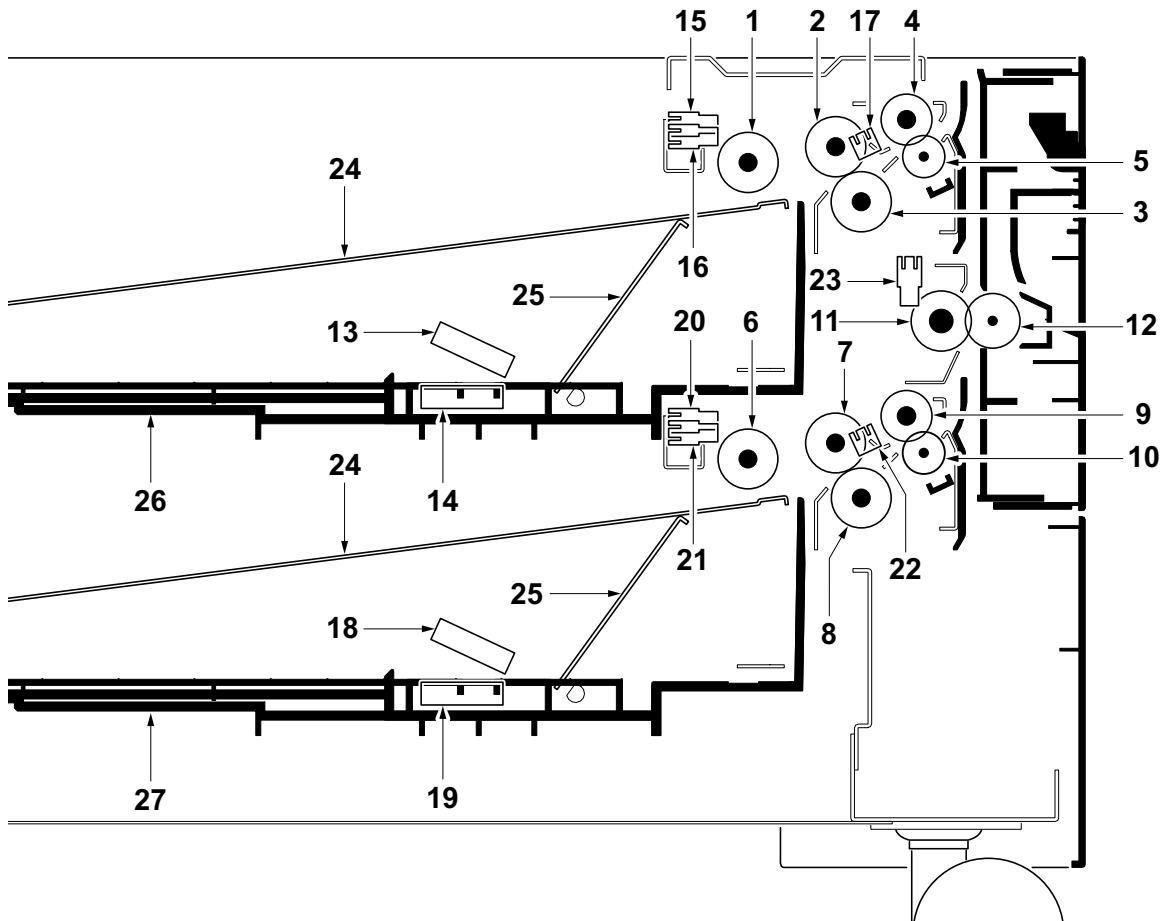


### 3 - 8 Mechanical construction (option)

#### (1) Paper feeder (PF-730(B))

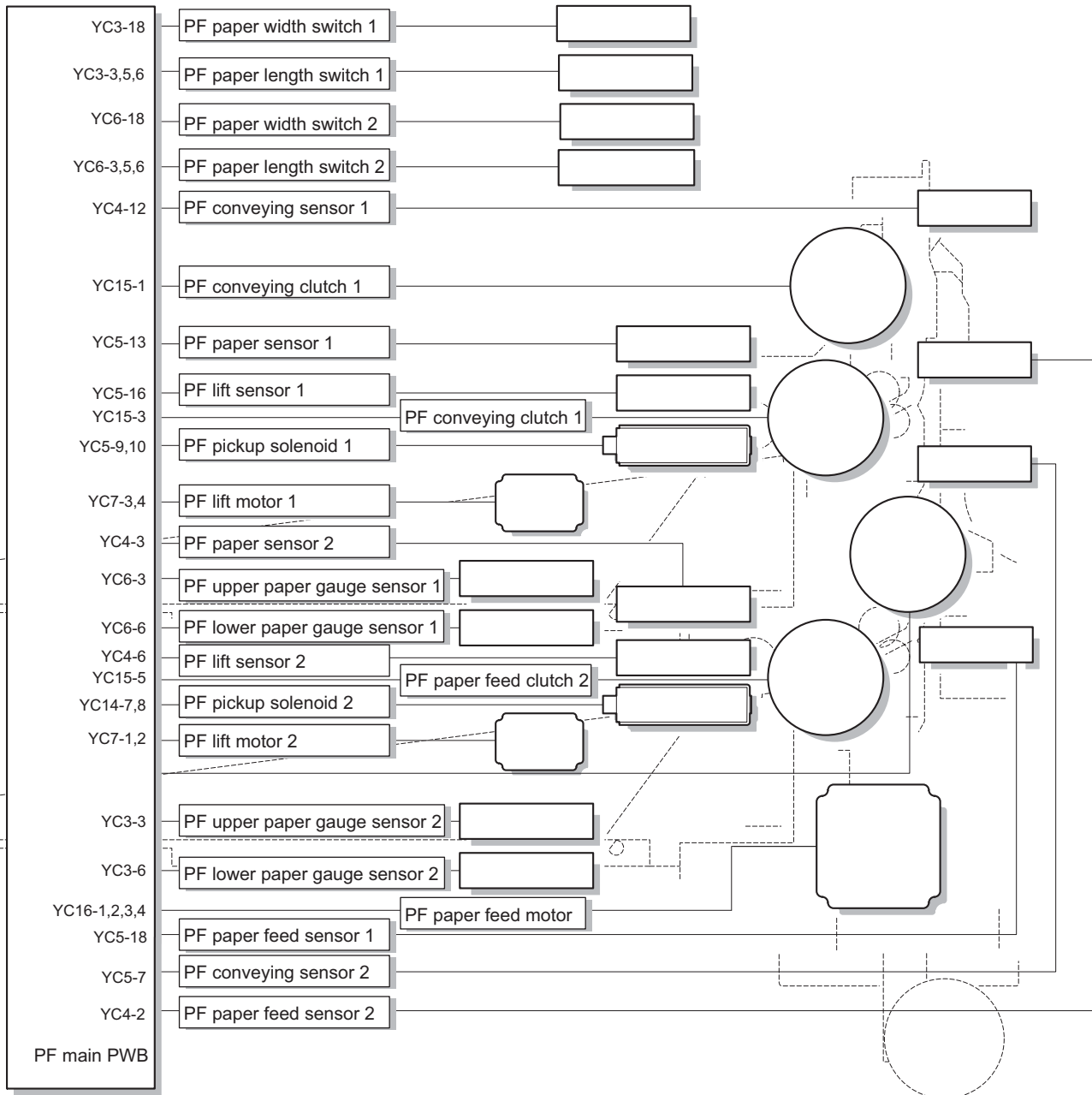
##### (1-1) Cassette paper feed section

The cassette can load 550 sheets paper (64 g/m<sup>2</sup>) or 500 sheets paper (80 g/m<sup>2</sup>) and consists of 2 cassettes. Paper from the cassette is picked up by rotating the pickup roller and is conveyed to the main unit by rotating the paper feed roller. Multi-feeding is also prevented by the effect of the retard roller.



- |                                  |                                  |
|----------------------------------|----------------------------------|
| 1 PF forwarding pulley 1         | 15 PF paper sensor 1             |
| 2 PF paper feed pulley 1         | 16 PF lift sensor 1              |
| 3 PF separation pulley 1         | 17 PF paper feed sensor 1        |
| 4 PF paper feed roller 1         | 18 PF upper paper gauge sensor 2 |
| 5 PF paper feed pulley 1         | 19 PF lower paper gauge sensor 2 |
| 6 PF forwarding pulley 2         | 20 PF paper sensor 2             |
| 7 PF paper feed pulley 2         | 21 PF lift sensor 2              |
| 8 PF separation pulley 2         | 22 PF paper feed sensor 2        |
| 9 PF paper feed roller 2         | 23 PF conveying sensor 2         |
| 10 PF paper feed pulley 2        | 24 Cassette operation plate      |
| 11 PF conveying roller           | 25 Lift operation plate          |
| 12 PF conveying pulley           | 26 Cassette 3                    |
| 13 PF upper paper gauge sensor 1 | 27 Cassette 4                    |
| 14 PF lower paper gauge sensor 1 |                                  |

## Block diagram



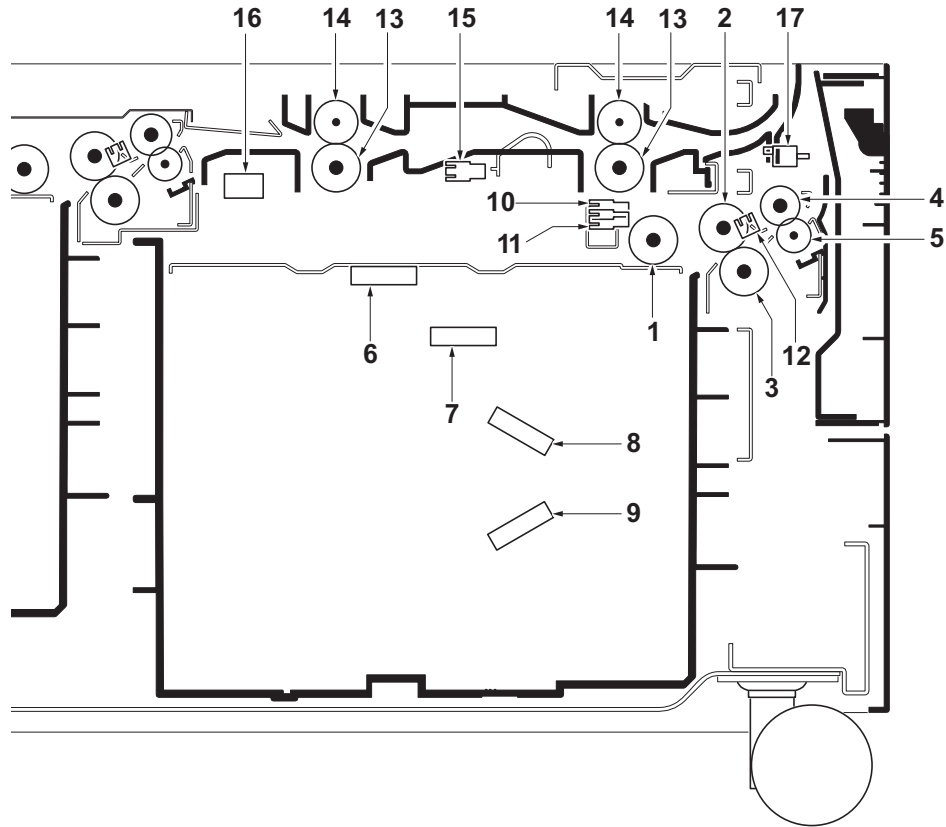
## (2) Paper feeder (PF-740(B))

### (2-1) Paper deck section

The deck can load 1750 sheets paper (64 g/m<sup>2</sup>) or 1500 sheets paper (80 g/m<sup>2</sup>). Paper from the deck is picked up by rotating the pickup roller and is conveyed to the main unit by rotating the paper feed roller. Multi-feeding is also prevented by the effect of the retard roller.

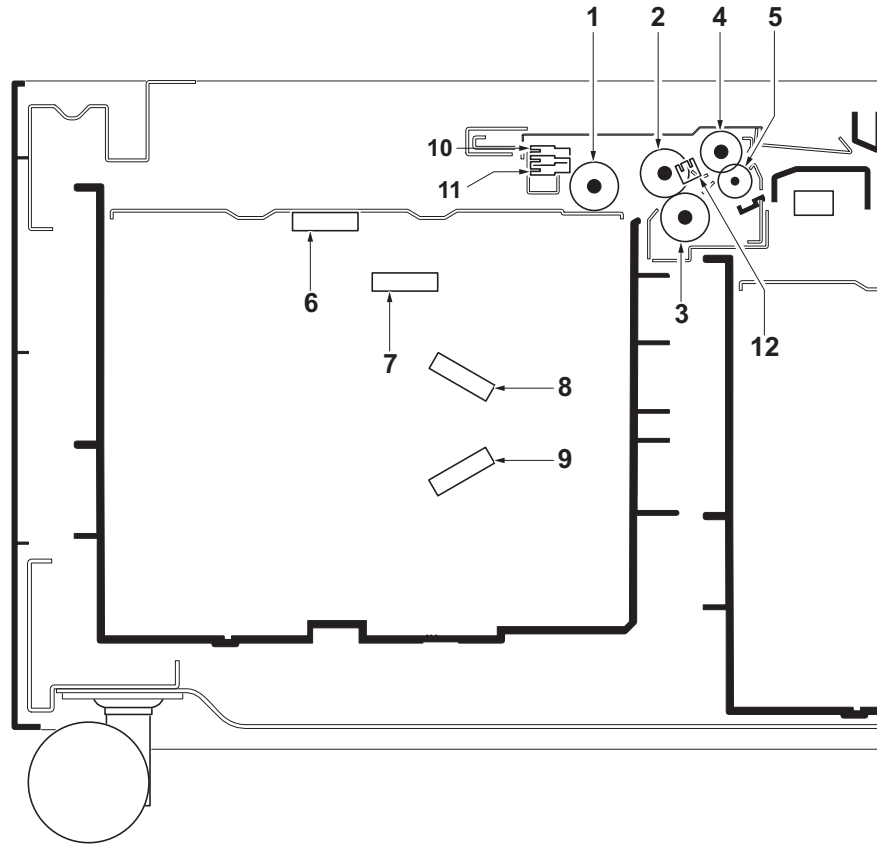
The paper feeder is comprised of the right- and left-hand cassettes and their feeding units, and the paper feeding section for the left-hand cassette.

The paper loaded on the lifting plate in the right-hand cassette is picked up one by one by PF forwarding pulley 1, PF paper feed pulley 1 and PF separation pulley 1. And then the PF paper feed roller 1 feeds the paper into the main unit. The paper fed by the left-hand cassette is separated in the similar manner and fed out by the conveying roller into the main unit.

**(2-2)Right cassette section**

- |                                    |                              |
|------------------------------------|------------------------------|
| 1 PF forwarding pulley 1           | 10 PF paper sensor 1         |
| 2 PF paper feed pulley 1           | 11 PF lift sensor 1          |
| 3 PF separation pulley 1           | 12 PF paper feed sensor 1    |
| 4 PF paper feed roller 1           | 13 PF conveying roller       |
| 5 PF paper feed pulley             | 14 PF conveying pulley 1     |
| 6 PF paper size detection switch 1 | 15 PF conveying sensor 2     |
| 7 PF cassette detection switch 1   | 16 PF conveying unit switch  |
| 8 PF upper paper gauge sensor 1    | 17 PF conveying cover switch |
| 9 PF lower paper gauge sensor 1    |                              |



**(2-3)Left cassette section**

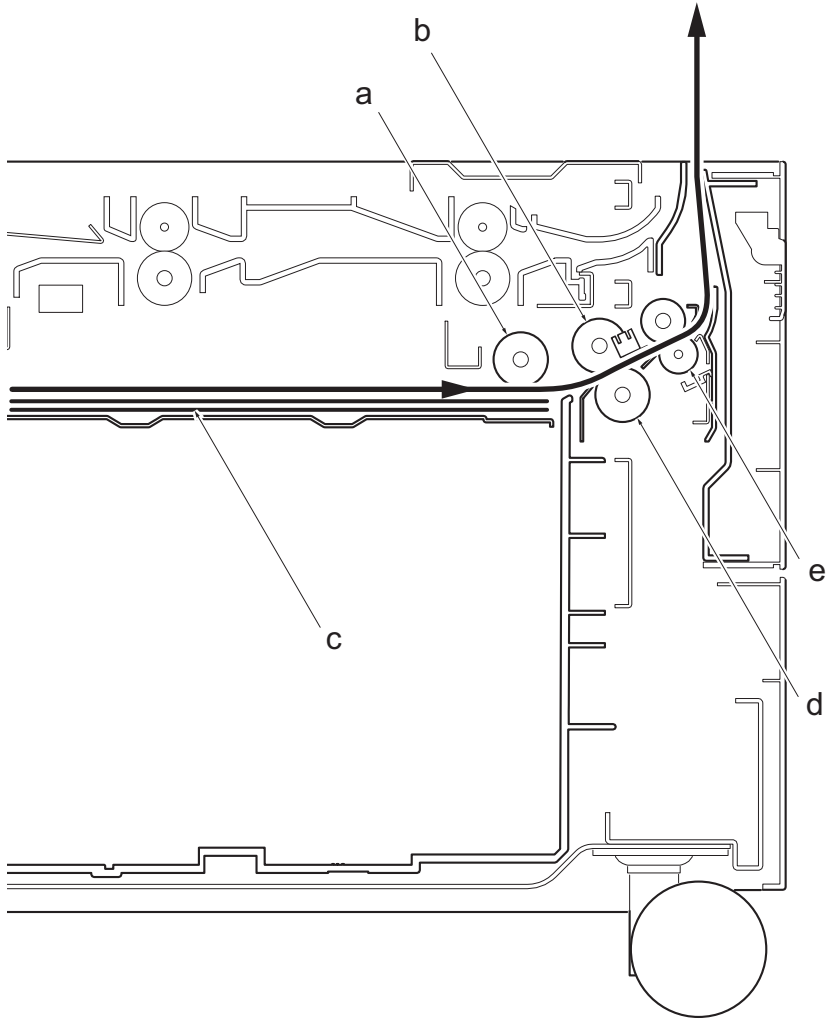
- |                                    |                                  |
|------------------------------------|----------------------------------|
| 1 PF forwarding pulley 2           | 7 PF cassette detection switch 2 |
| 2 PF paper feed pulley 2           | 8 PF upper paper gauge sensor 2  |
| 3 PF separation pulley 2           | 9 PF lower paper gauge sensor 2  |
| 4 PF paper feed roller 2           | 10 PF paper sensor 2             |
| 5 PF paper feed pulley             | 11 PF lift sensor 2              |
| 6 PF paper size detection switch 2 | 12 PF paper feed sensor 2        |

**(2-4)Right cassette paper feed**

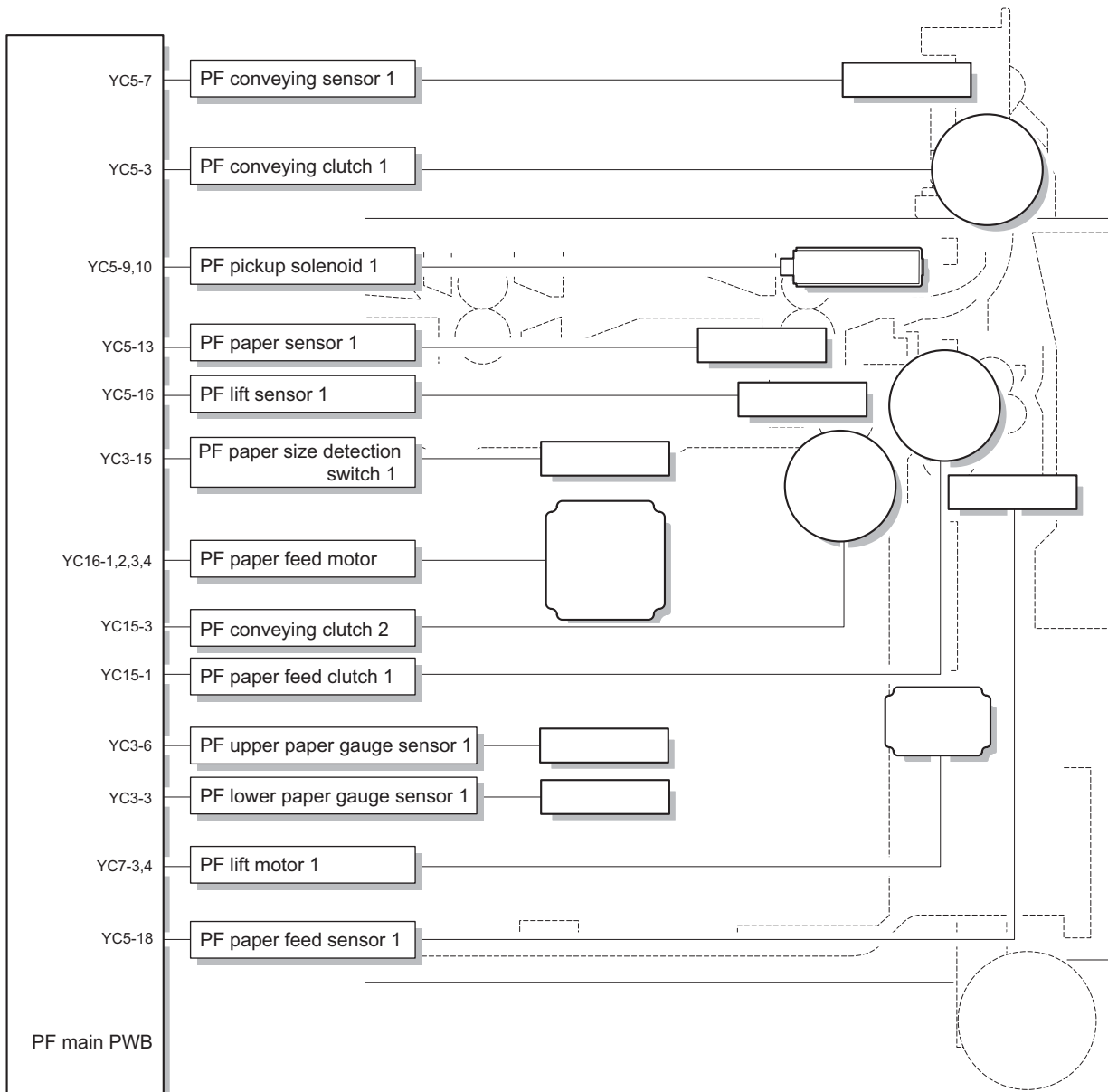
The paper (c) fed by the right-hand cassette is transferred by the rotation of PF forwarding pulley 1 (a) and PF paper feed pulley 1 (b) which are driven by the PF paper feed clutch 1.

The fed paper is prevented from multiple-page feeding by PF separation pulley 1 (d), and then is fed into the main unit by PF paper feed roller 1 (e).

The PF separation roller 1 (d) is equipped with a torque limiter which prevents multi-page feeding to the main unit.



## Block diagram (Right cassette section)

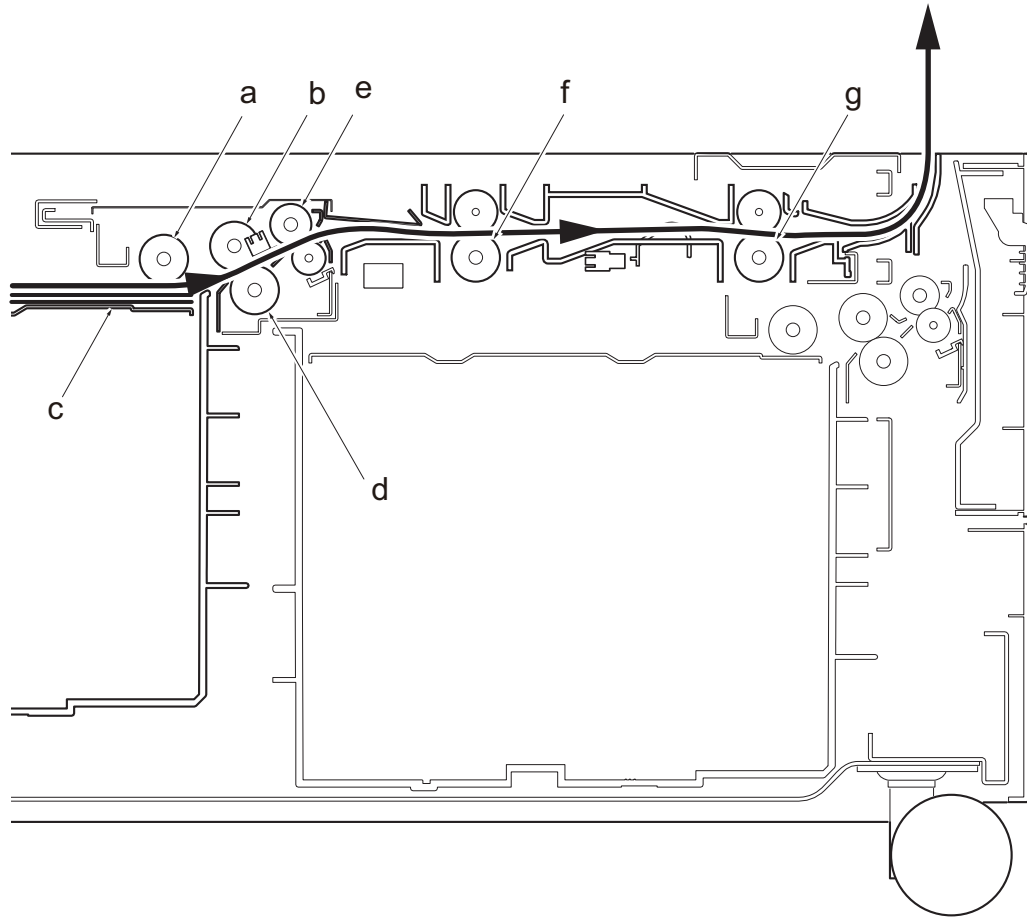


### (2-5) Left cassette paper feed

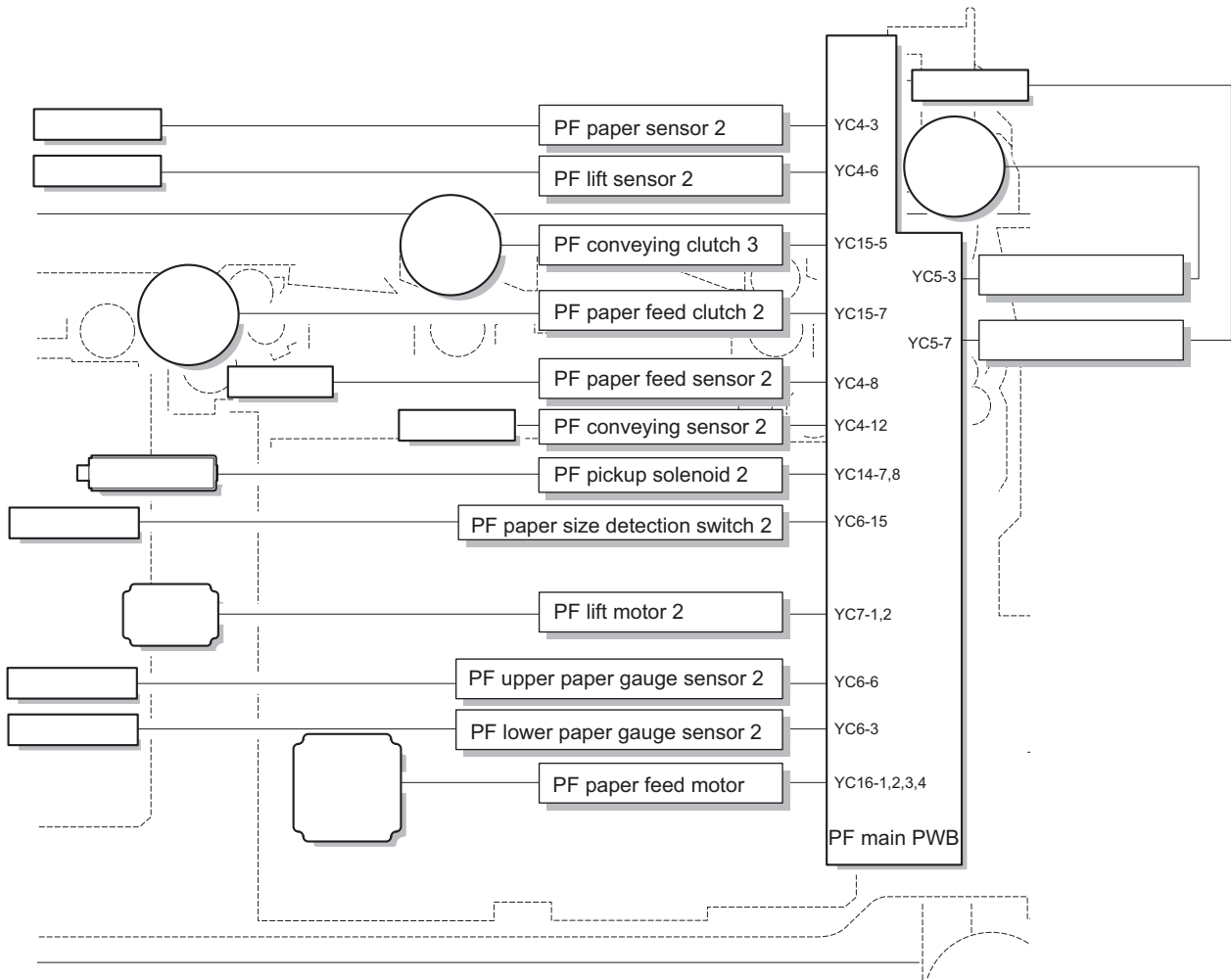
As well as the right-hand cassette, the paper fed by the left-hand cassette is transferred by the rotation of PF forwarding pulley 2 (a) and PF paper feed pulley 2 (b) which are driven by the PF paper feed clutch 2.

The fed paper (c) is prevented from multiple-page feeding by PF separation pulley 2 (d), and is fed out by PF paper feed roller 2 (e), and then is fed into the main unit by PF left conveying roller (f) and PF right conveying roller (g).

The PF separation roller 2 (d) is equipped with a torque limiter which prevents multi-page feeding to the main unit.

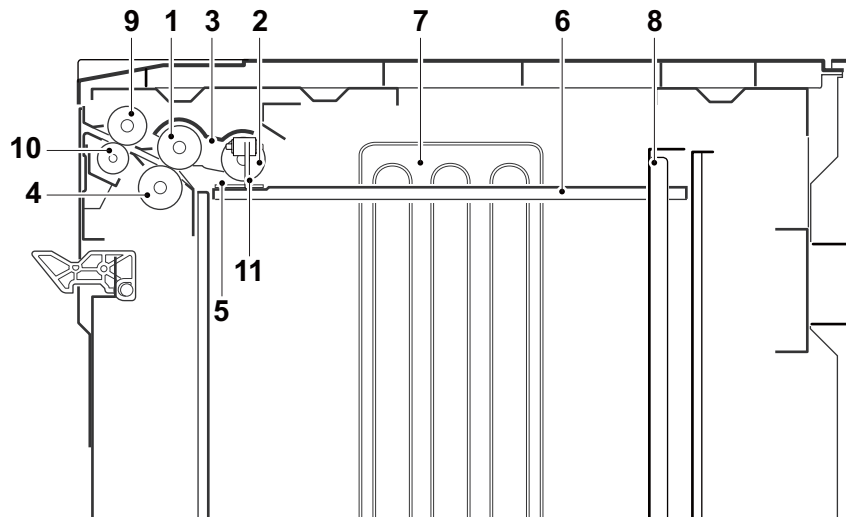


Block diagram (Left cassette section)

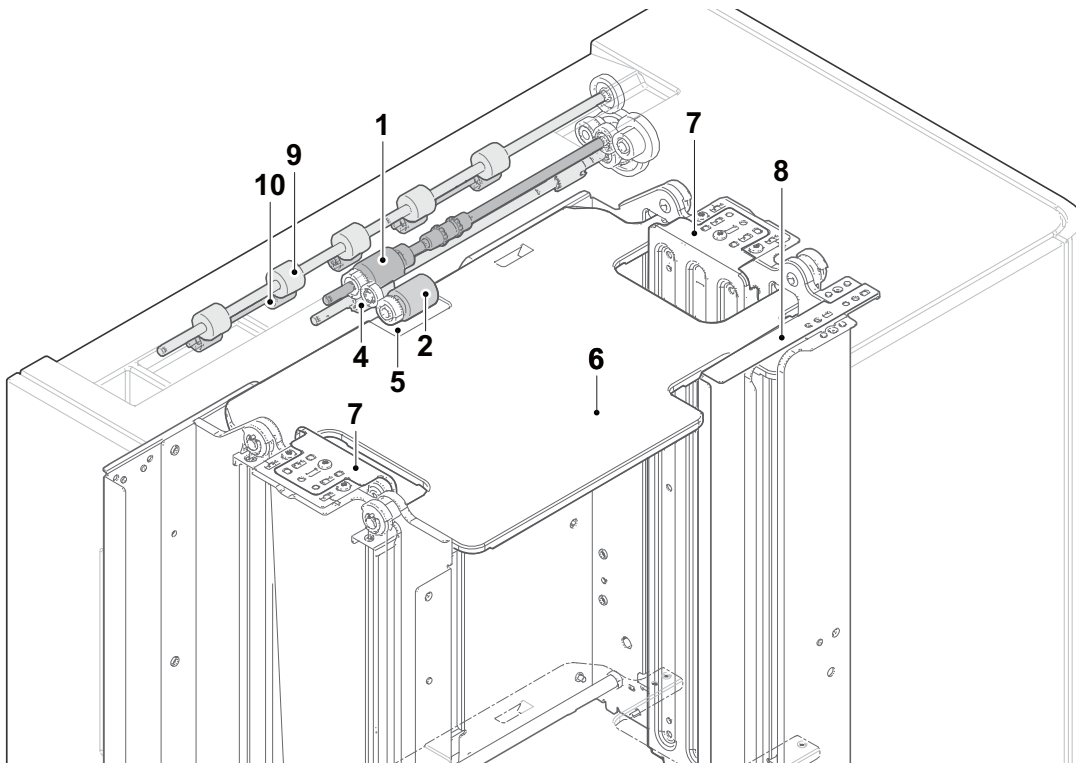


**(3)Paper feeder (PF-7120)****(3-1)Cassette paper feed section**

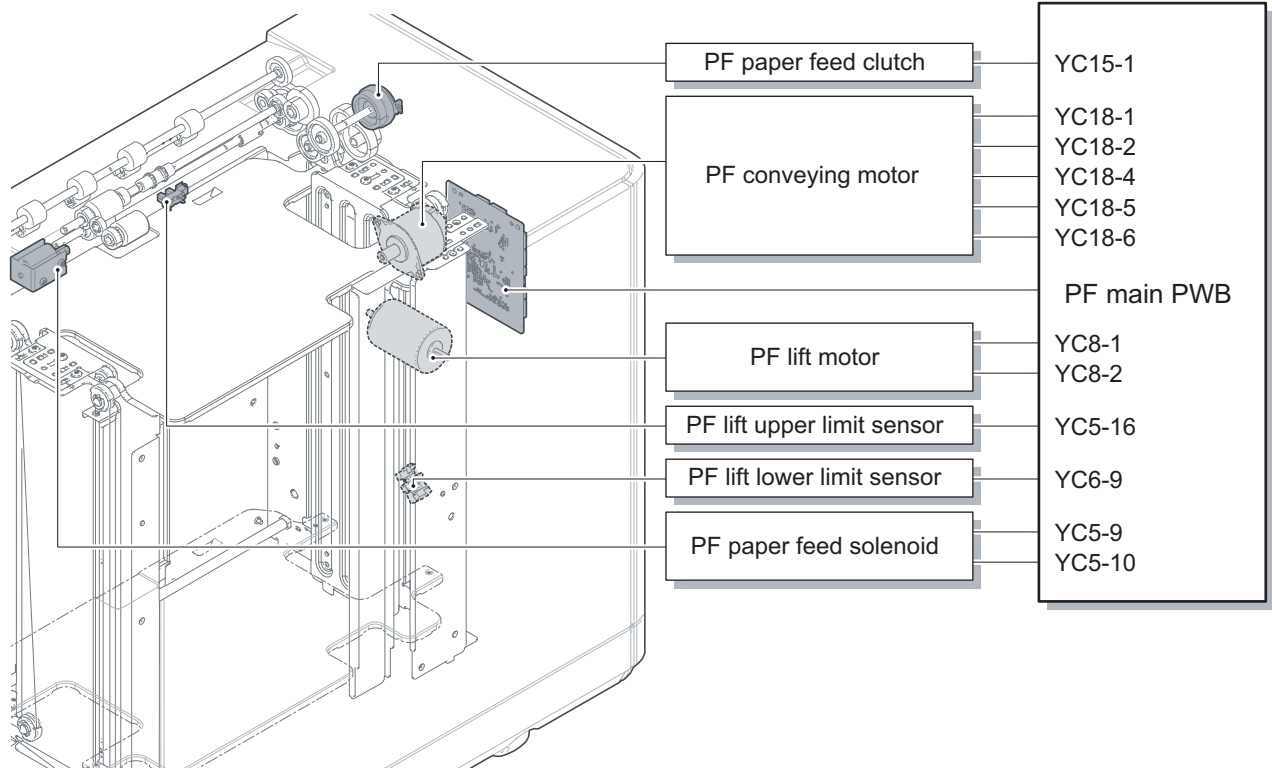
The deck can load 3500 sheets paper (64 g/m<sup>2</sup>) or 3000 sheets paper (80 g/m<sup>2</sup>). Paper from the deck is picked up by rotating the pickup roller and is conveyed to the main unit by rotating the paper feed roller. Multi-feeding is also prevented by the effect of the retard roller.



- |                             |                                   |
|-----------------------------|-----------------------------------|
| 1. PF paper feed roller     | 7. PF paper width guides          |
| 2. PF pickup roller         | 8. Paper length guide             |
| 3. PF pickup holder         | 9. PF conveying roller            |
| 4. PF retard roller         | 10. PF conveying pulley           |
| 5. PF friction pad          | 11. PF actuator (PF paper sensor) |
| 6. PF cassette bottom plate |                                   |

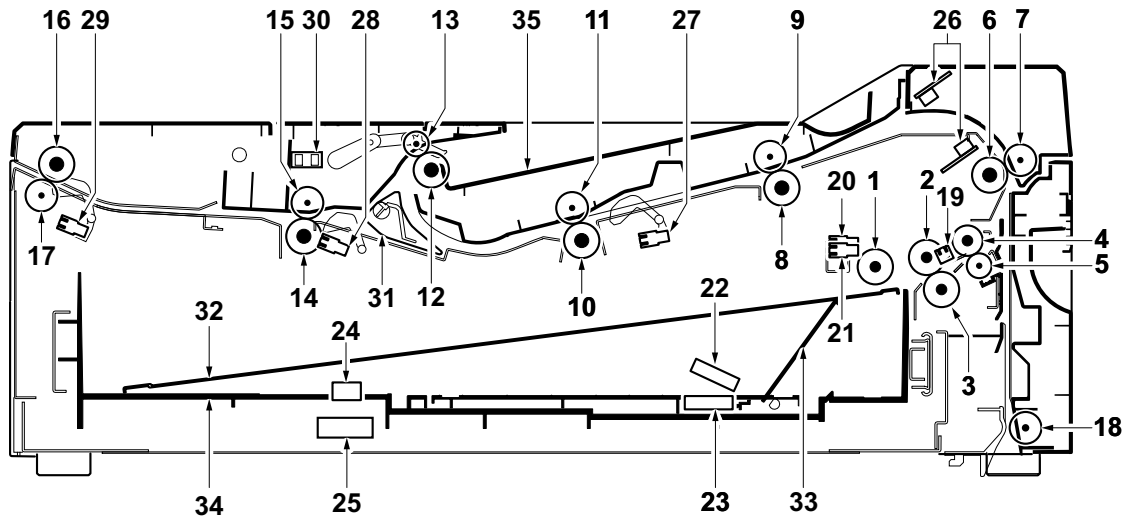


Block diagram



**(4)Paper feeder (PF-7130)****(4-1)Cassette paper feed section**

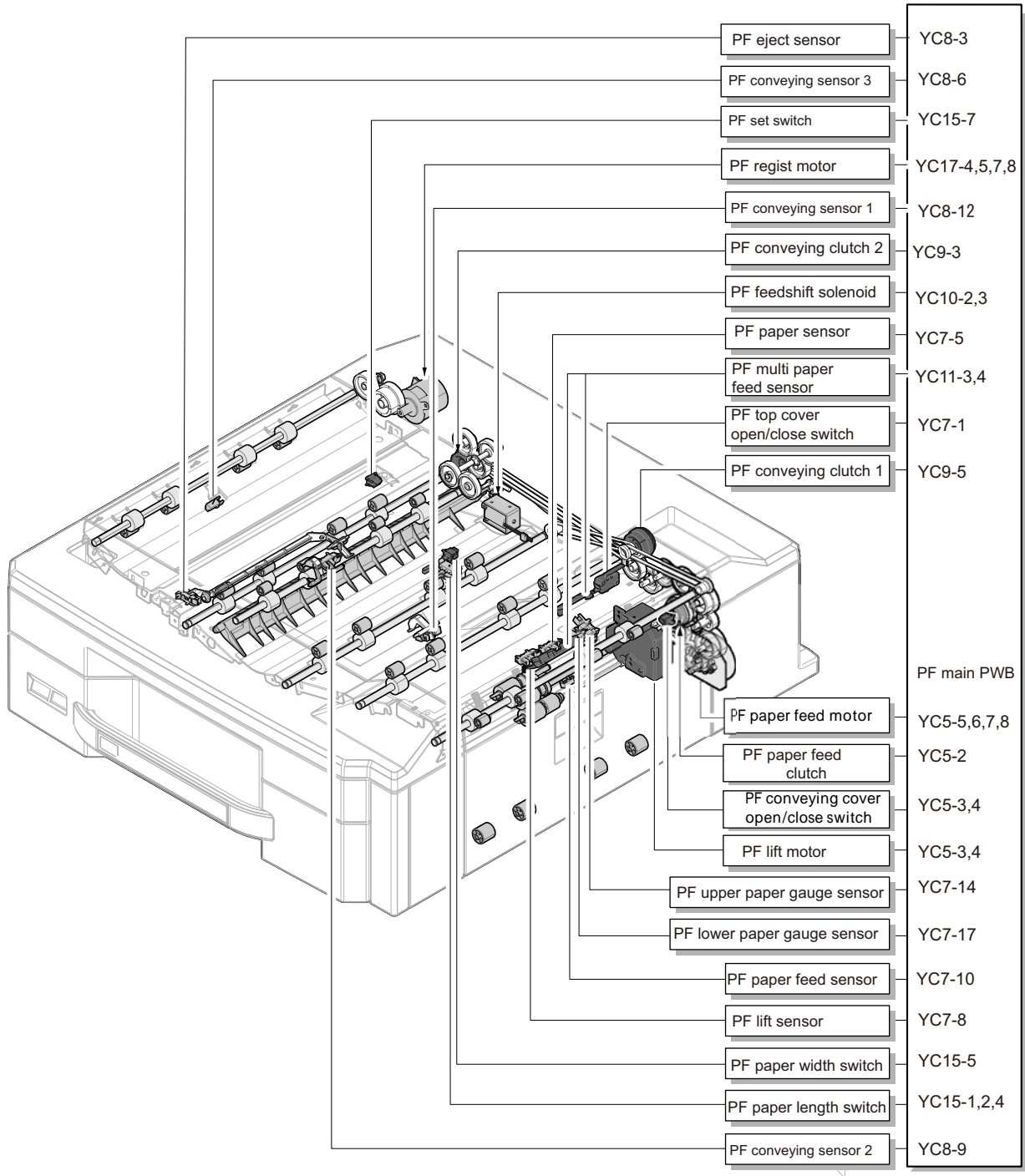
The feeder assembly contains a mechanism to feed paper picked up from the cassette into the printing device. When feeding from the paper feeder, the paper is passed on through the vertical paper feeder assembly, then the feeding roller and feeding pulley as they rotate, finally to the main unit. The multi feed sensor is provided to detect more than one sheet of paper are fed at one time. The PF feed-shift solenoid activates the PF feed-shift guide so that the excessive sheet(s) of paper is diverged and set aside by means of the eject rollers as they rotate into the eject tray.



- |                          |                                |
|--------------------------|--------------------------------|
| 1 PF forwarding pulley   | 19 PF paper feed sensor        |
| 2 PF paper feed pulley   | 20 PF paper sensor             |
| 3 PF separation pulley   | 21 PF lift sensor              |
| 4 PF assist roller       | 22 PF upper paper gauge sensor |
| 5 PF assist pulley       | 23 PF lower paper gauge sensor |
| 6 PF conveying roller 1  | 24 PF paper width switch       |
| 7 PF conveying pulley    | 25 PF paper length switch      |
| 8 PF conveying roller 2  | 26 PF multi feed sensor        |
| 9 PF conveying pulley    | 27 PF conveying sensor 1       |
| 10 PF conveying roller 3 | 28 PF conveying sensor 2       |
| 11 PF conveying pulley   | 29 PF conveying sensor 3       |
| 12 PF eject roller       | 30 PF eject sensor             |
| 13 PF eject pulley       | 31 PF feed-shift guide         |
| 14 PF conveying roller 4 | 32 Cassette operation plate    |
| 15 PF conveying pulley   | 33 Lift operation plate        |
| 16 PF conveying roller 5 | 34 Cassette 5                  |
| 17 PF conveying pulley   | 35 Eject tray                  |
| 18 PF conveying pulley   |                                |

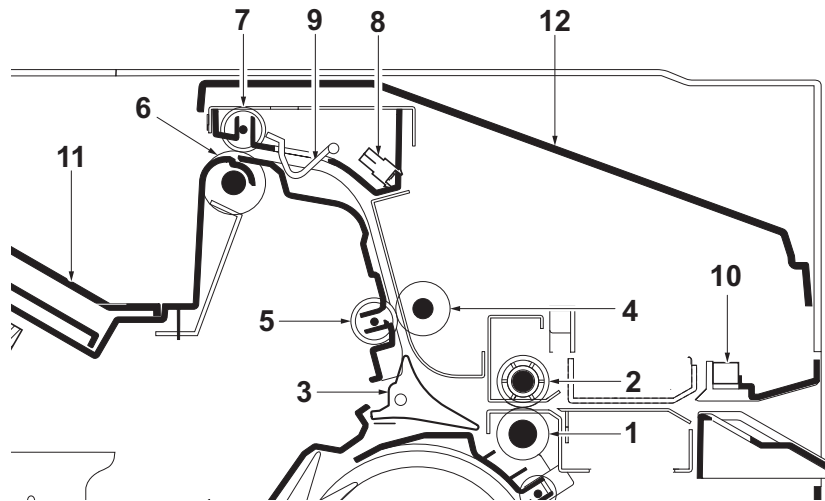


Block diagram

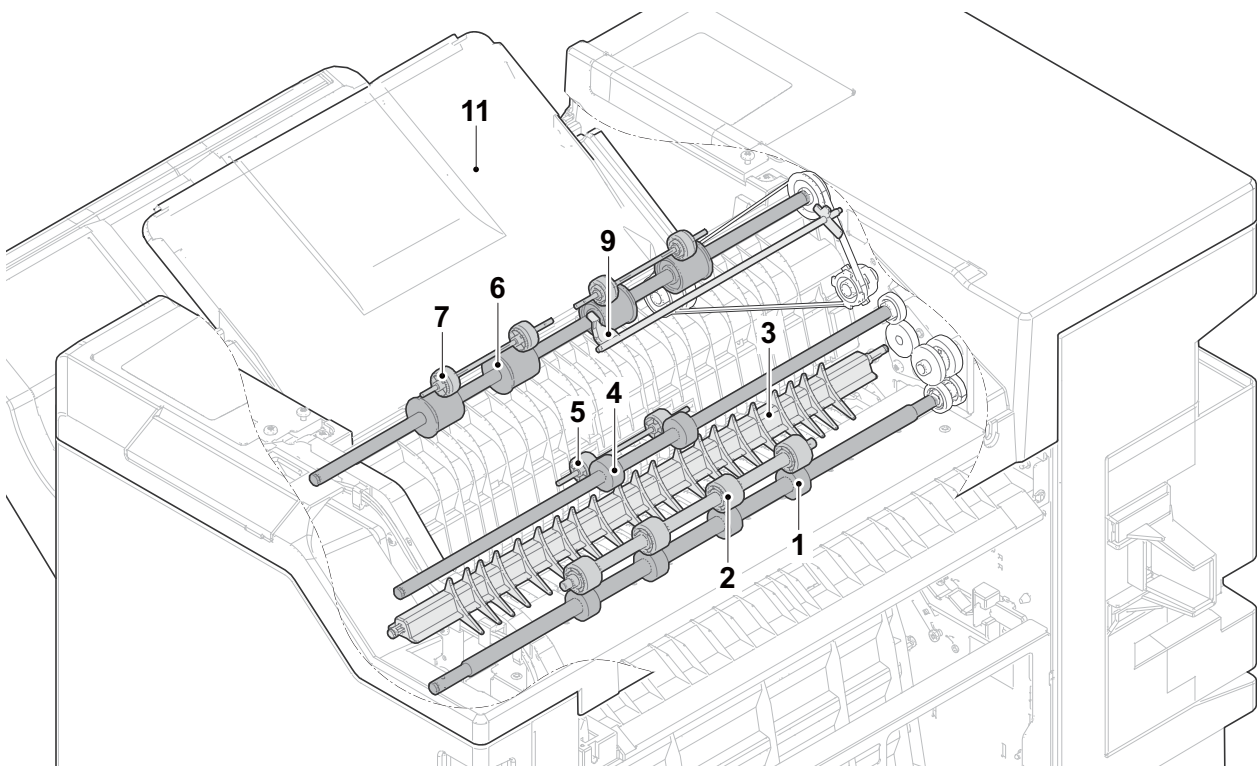


**(5)4000-sheet Finisher (DF-7110)****(5-1)paper entry and feed-shift and DF tray B eject section**

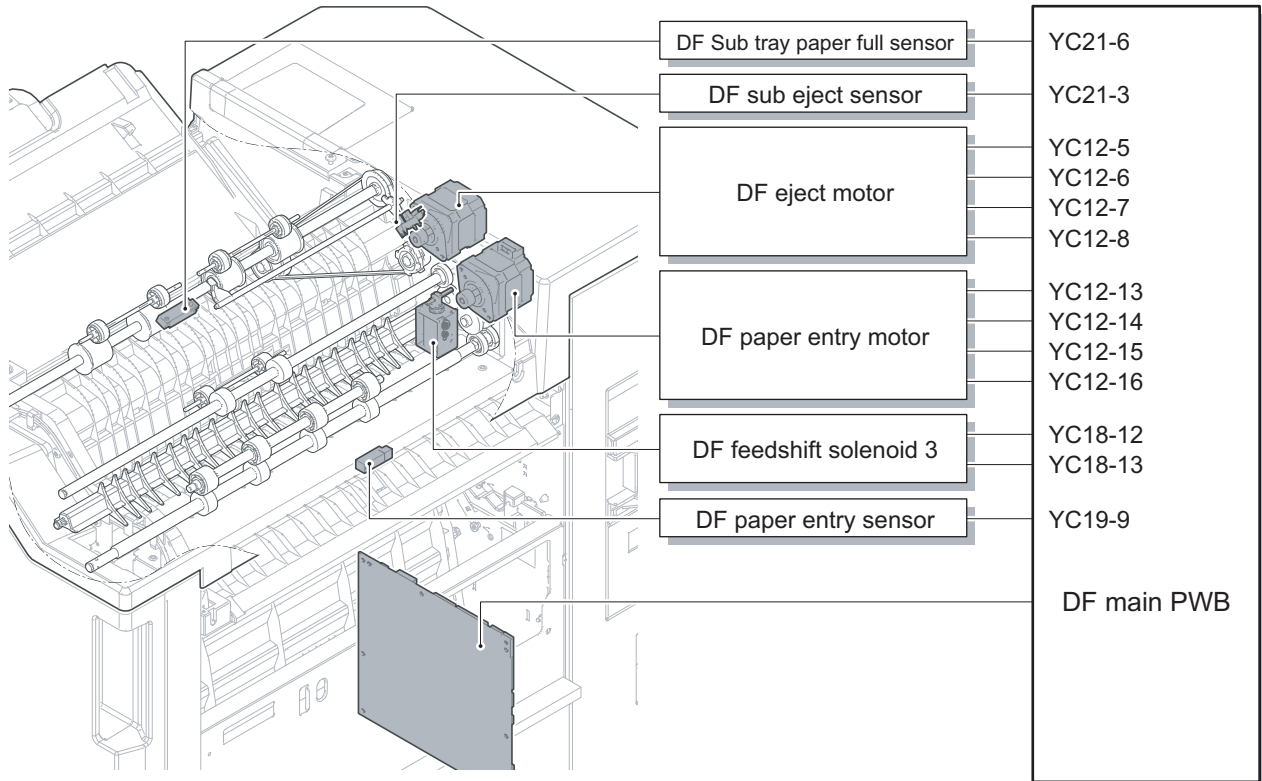
The paper entry section convey paper from the main unit to the feed-shift section. Also, the feed-shift guide 3 switches the paper conveying path to convey paper to the DF tray B or finishing section.



- |                               |                                      |
|-------------------------------|--------------------------------------|
| 1. DF entry roller            | 7. DF eject pulley                   |
| 2. DF entry pulley            | 8. DF sub eject sensor               |
| 3. DF feed-shift solenoid 3   | 9. DF actuator (DF sub eject sensor) |
| 4. DF tray B conveying roller | 10. DF entry sensor                  |
| 5. DF conveying pulley        | 11. DF tray B                        |
| 6. DF tray B eject roller     | 12. DF tray C                        |

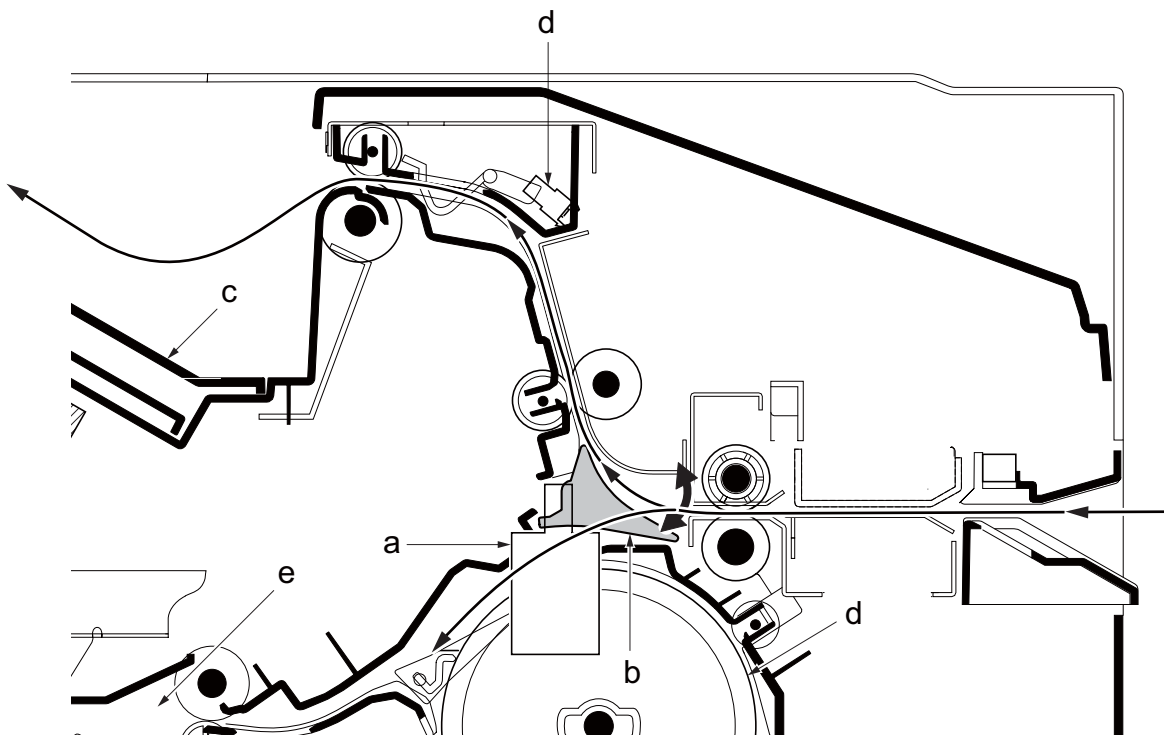


## Block diagram



### (5-2) Feed-shift operation to the DF tray B or finishing section

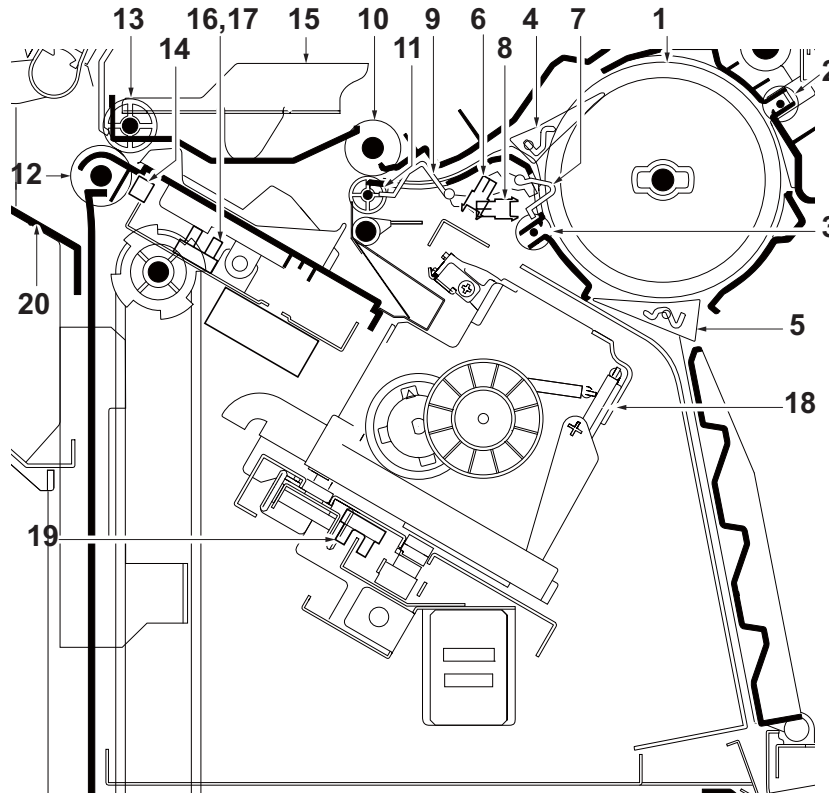
The feed-shift guide 3 (b) is activated by the DF feed-shift solenoid 3 (a) and switches the paper conveying path for the paper conveyed to the feed-shift section to eject it to the DF tray B (c) or to convey it to the feed-shift section for the relief drum (d) or finishing section (e). Also, the DF sub eject sensor (f) detects paper jam at eject to the DF tray B (c).



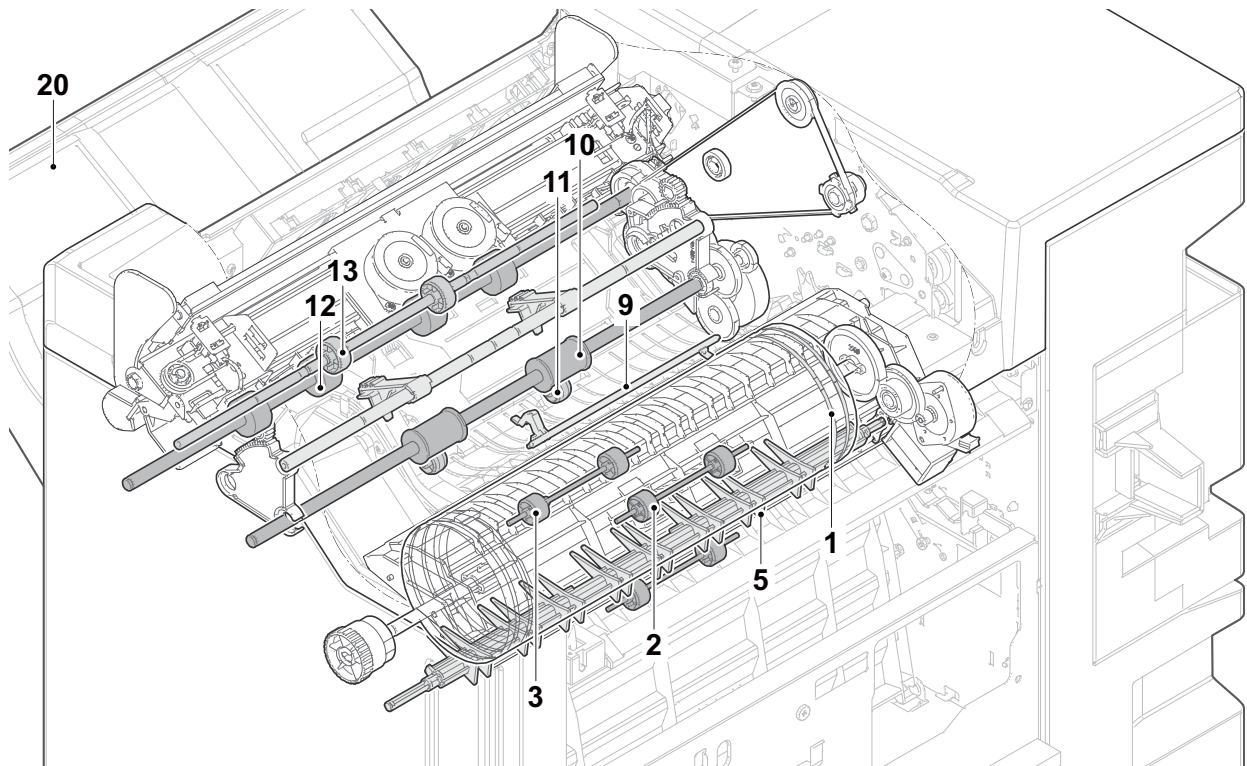
### (5-3) Finishing section

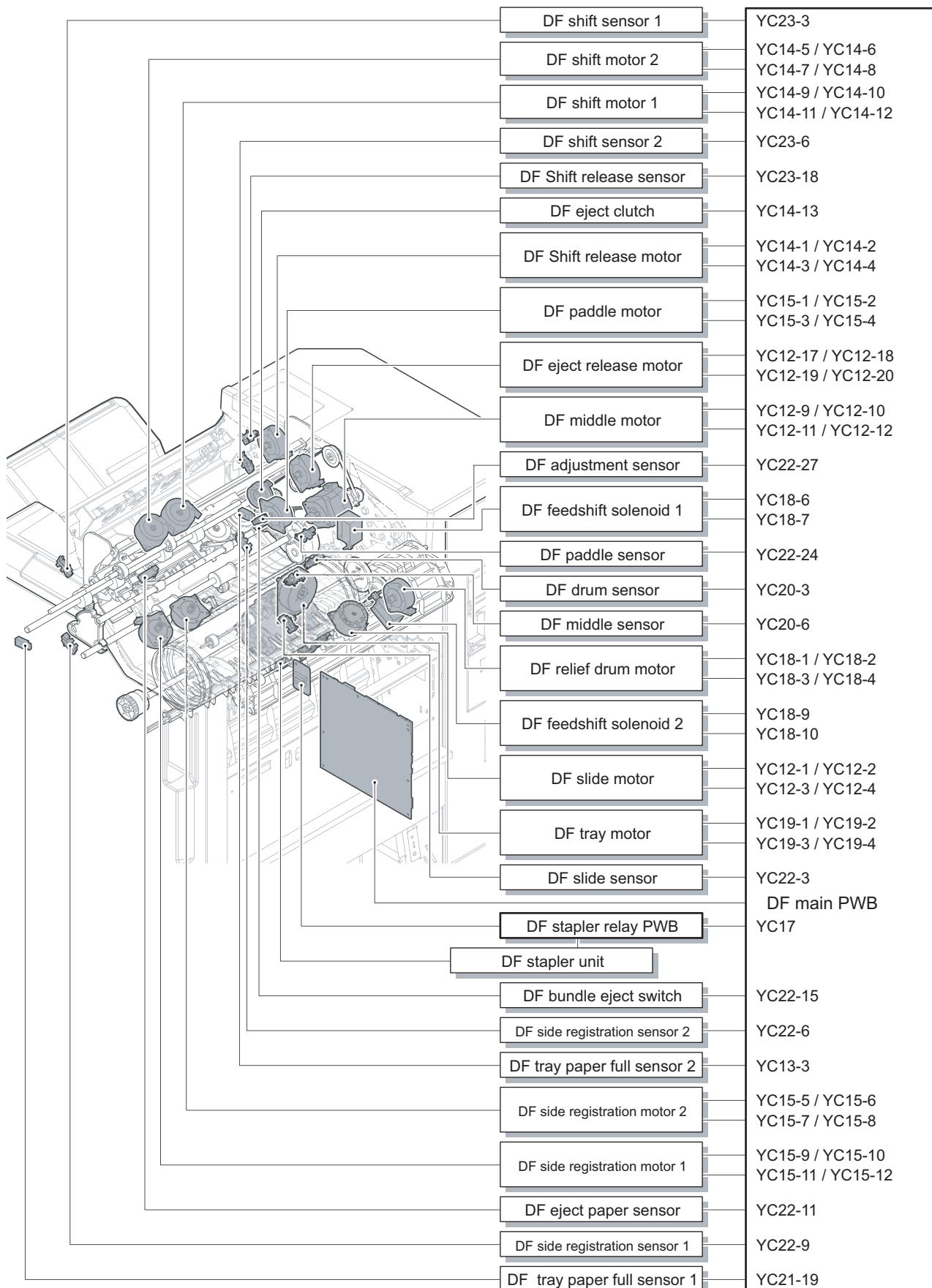
The finishing section consists of the parts below and the paper conveyed from the main unit is ejected to the DF tray A. Also, bundle eject mode and staple mode are processed.

Also, for folding, switch the paper conveying path to the relief drum side by the feed-shift guide 1.



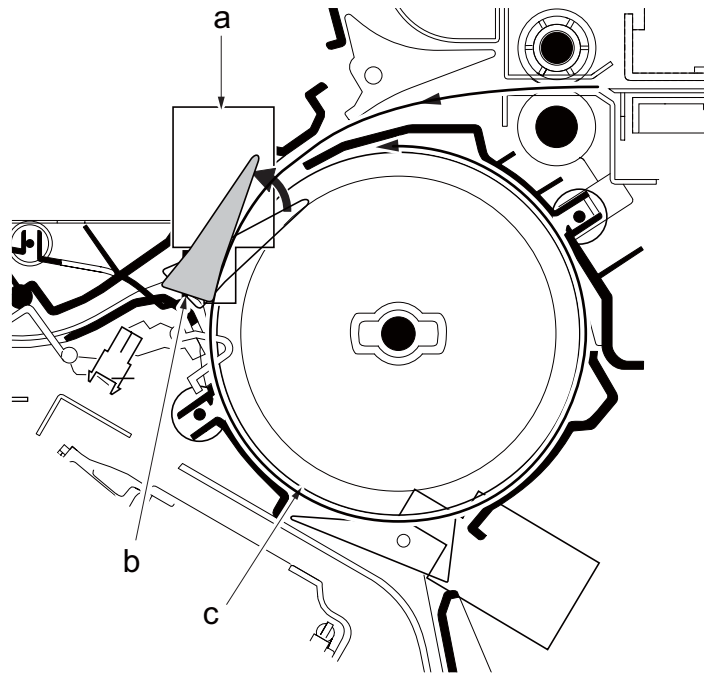
- |                                   |                                   |
|-----------------------------------|-----------------------------------|
| 1. DF relief drum                 | 11. DF Middle pulley              |
| 2. DF conveying pulley            | 12. DF tray A eject roller        |
| 3. DF conveying pulley            | 13. DF eject pulley               |
| 4. DF feed-shift guide 1          | 14. DF eject sensor               |
| 5. DF feed-shift guide 2          | 15. DF bundle eject unit          |
| 6. DF drum sensor                 | 16. DF side registration sensor 1 |
| 7. DF actuator (DF drum sensor)   | 17. DF side registration sensor 2 |
| 8. DF middle sensor               | 18. DF staple unit                |
| 9. DF actuator (DF middle sensor) | 19. DF slide sensor               |
| 10. DF Middle roller              | 20. DF tray A                     |



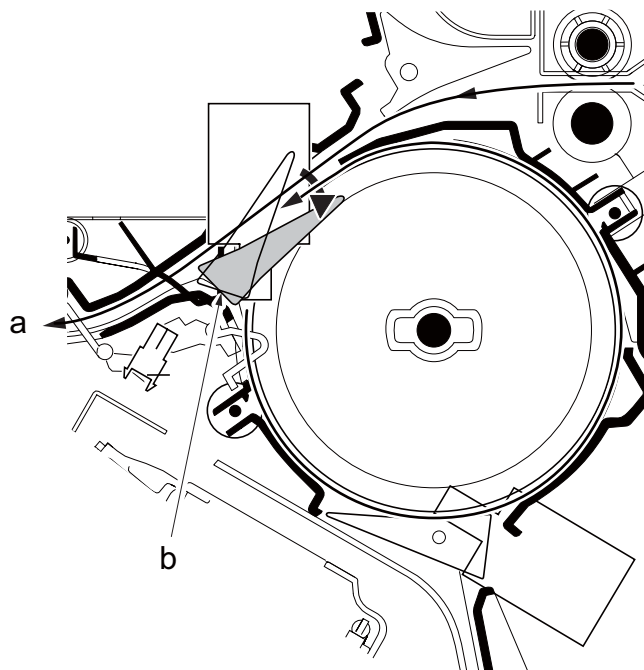


#### (5-4)Relief drum operation

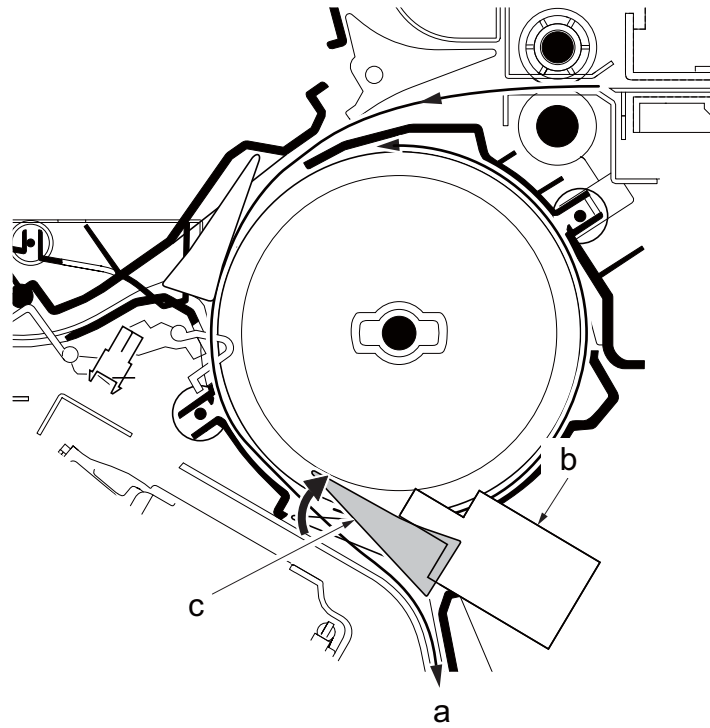
When finishing multiple copies of A4 size paper to the finishing section or folding section, to secure the time to finish paper, the 1st and 2nd paper of the next group is relieved until the 3rd paper is conveyed.



- 1 The feed-shift guide 1 (b) is activated by the DF feed-shift solenoid 1 (a) and the conveying path for the conveyed paper is switched. The 1st paper of the next group is conveyed to the relief drum (c).
- 2 Likewise, 2nd paper of the next group is conveyed to the relief drum (c).

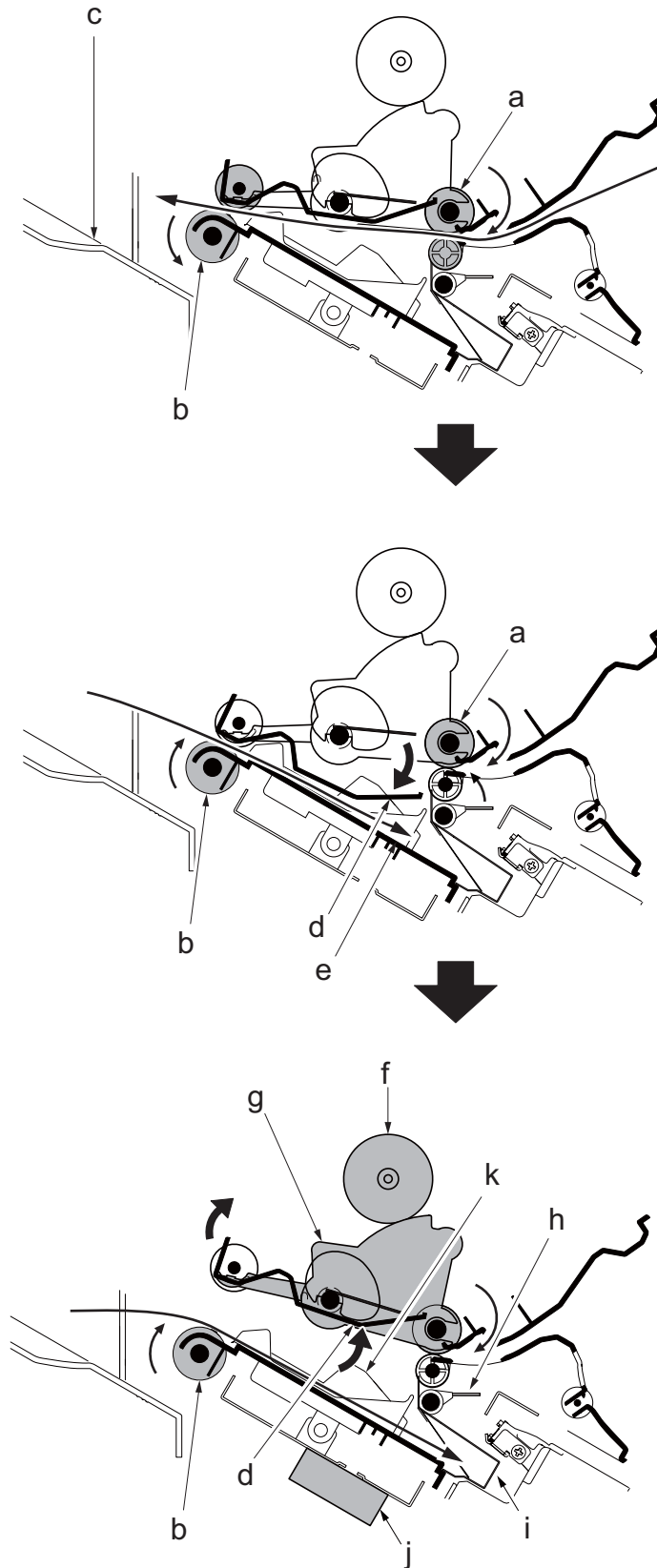


- 1 When the 3rd paper of the next group is conveyed into the relief drum, it is conveyed to the finishing section (a) with the 1st and 2nd paper. Then, the paper conveying path is switched by the feed-shift guide 1 (b).



- 1 The DF feed-shift solenoid 2 (b) activates the feed-shift guide 2 (c) and it switches the paper conveying path to convey paper to the folding unit (a).

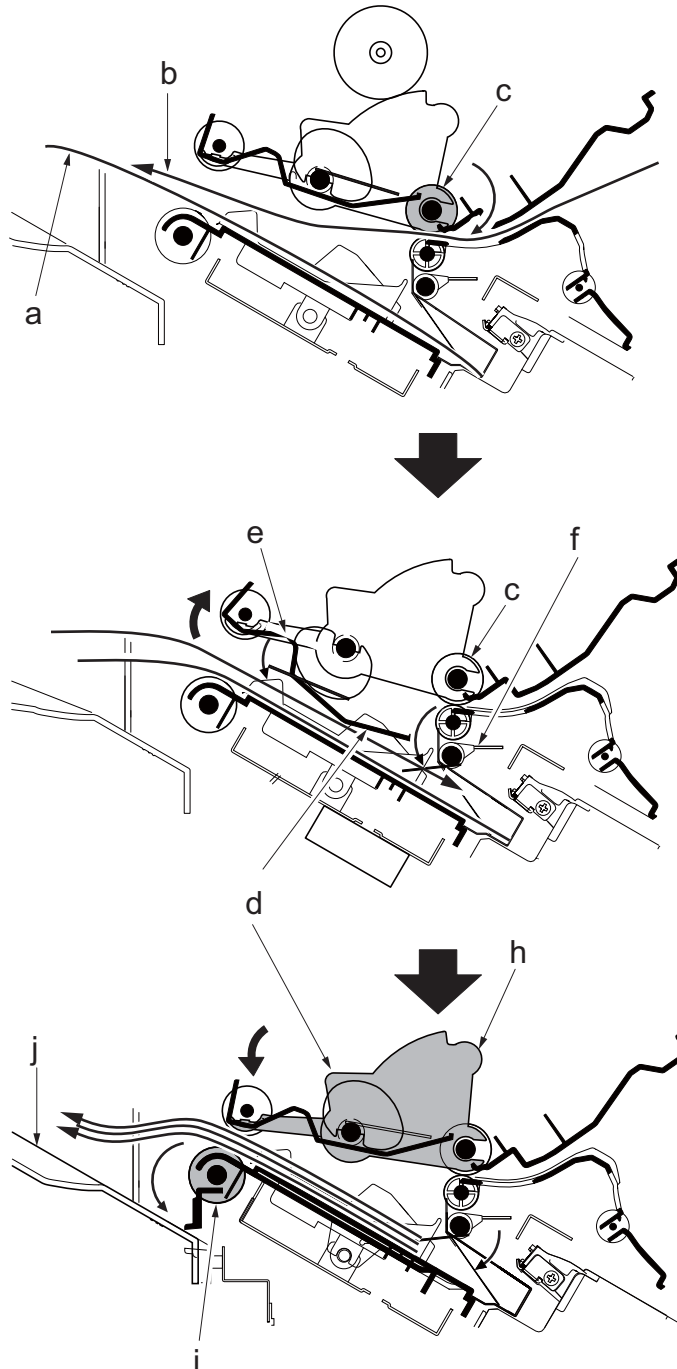


**(5-5) Bundle eject operation****1st sheet**

- 1 By rotating the middle roller (a), paper is conveyed to the process section.  
Paper is conveyed to the DF tray A (c) by the DF tray A eject roller (b).

- 2 The conveying guide (d) descends when the paper trailing edge passes the middle roller (a). Then, the DF tray A eject roller (b) is rotated reversely and paper is sent to the adjusting tray (e).
- 3 Then, the conveying guide (d) ascends and the bundle eject unit (g) ascends by the DF eject release motor (f) drive. By rotating the DF tray A eject roller (b) and adjusting paddles (h), paper is conveyed to the adjusting tray (i). The DF side registration motor 1,2 (j) drive the adjusting guides (k) to adjust paper.

## 2nd sheet and after

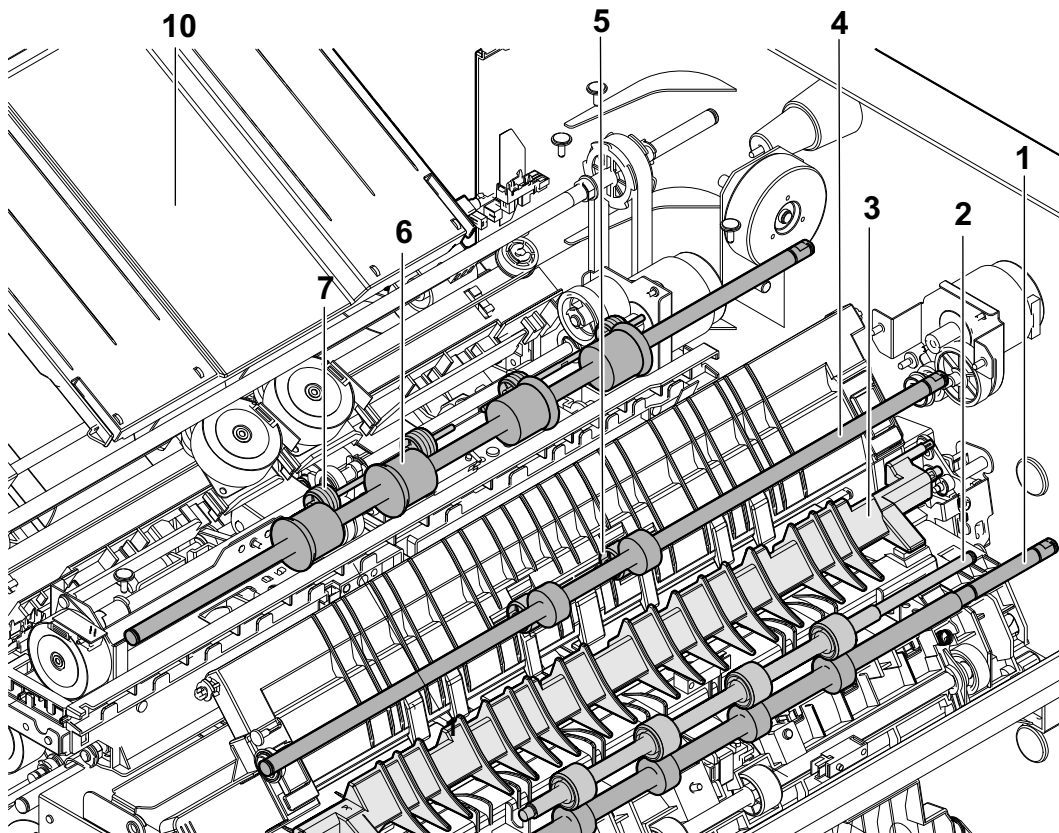
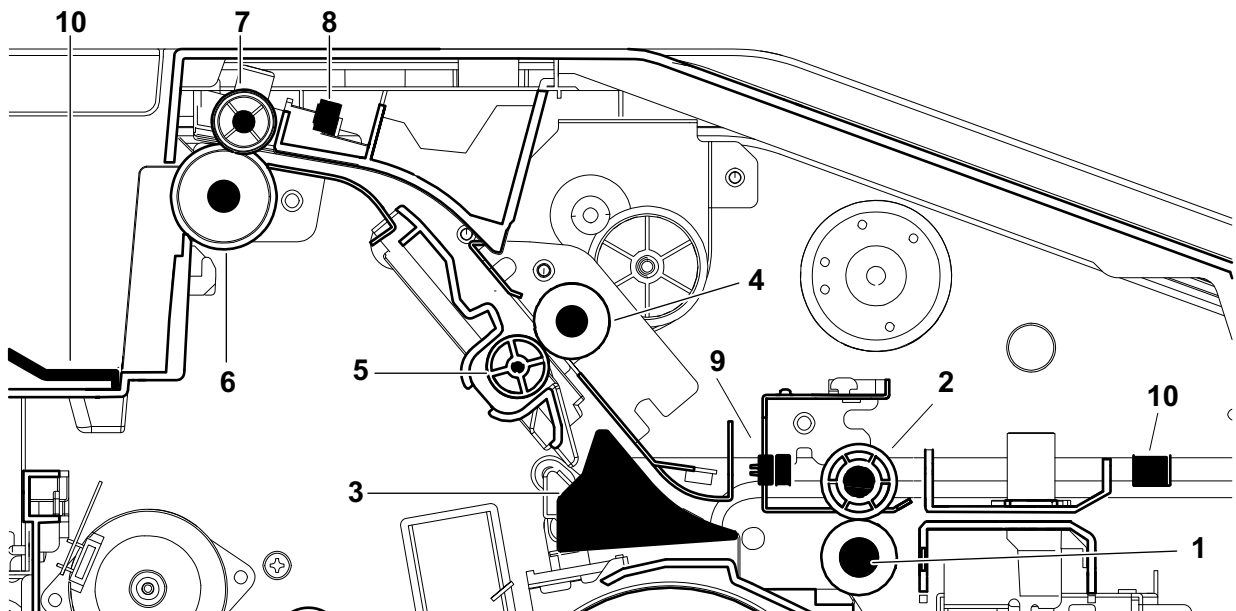


- 1 By rotating the DF entry roller and DF middle roller (c), 2nd paper (b) is conveyed to the process section as the 1st sheet (a).
- 2 The conveying guide (d) descends when the paper trailing edge passes the DF middle roller (c). Then, by rotating the paddles (e) and the adjusting paddles (e), paper is conveyed to the adjusting tray (g). Paper is adjusted as well as the 1st sheet.
- 3 When adjusting the last paper of bundle is complete, the bundle eject unit (h) descends and the DF tray A eject roller (i) rotates to eject the paper bundle to the DF tray A (j).

## (6)100 sheet staple finisher (DF-7130)

## (6-1)Paper entry and feed-shift and DF tray B exit section

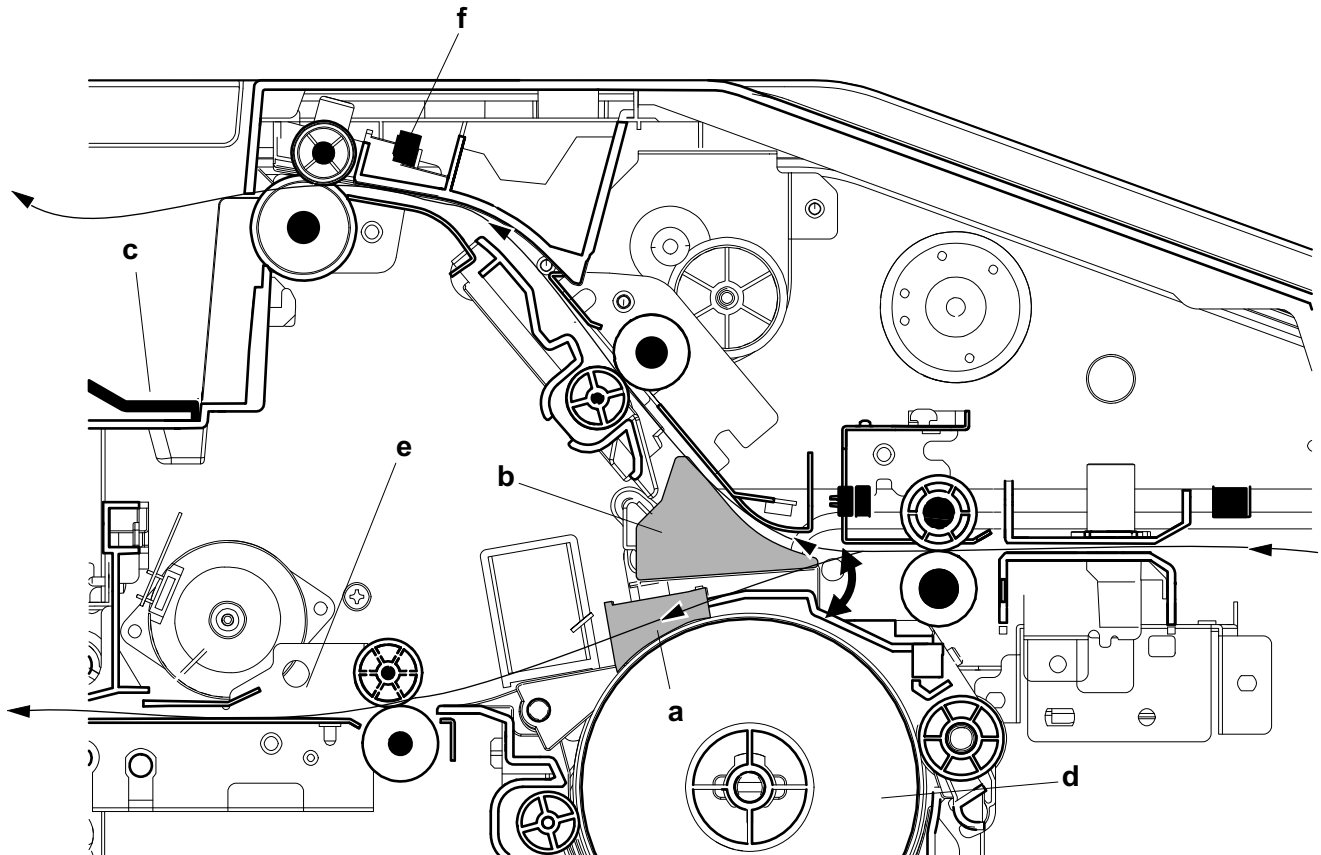
The paper entry section convey paper from the main unit to the feed-shift section. Also, the feed-shift guide 3 switches the paper conveying path to convey paper to the DF tray B or finishing section.



- |                              |                       |
|------------------------------|-----------------------|
| 1 DF entry roller            | 7 DF eject pulley     |
| 2 DF entry pulley            | 8 DF sub eject sensor |
| 3 DF feedshift solenoid 3    | 9 DF entry sensor     |
| 4 DF tray B conveying roller | 10 DF tray B          |
| 5 DF conveying pulley        |                       |
| 6 DF tray B exit roller      |                       |

## (6-2) Feed-shift operation to the DF tray B or finishing section

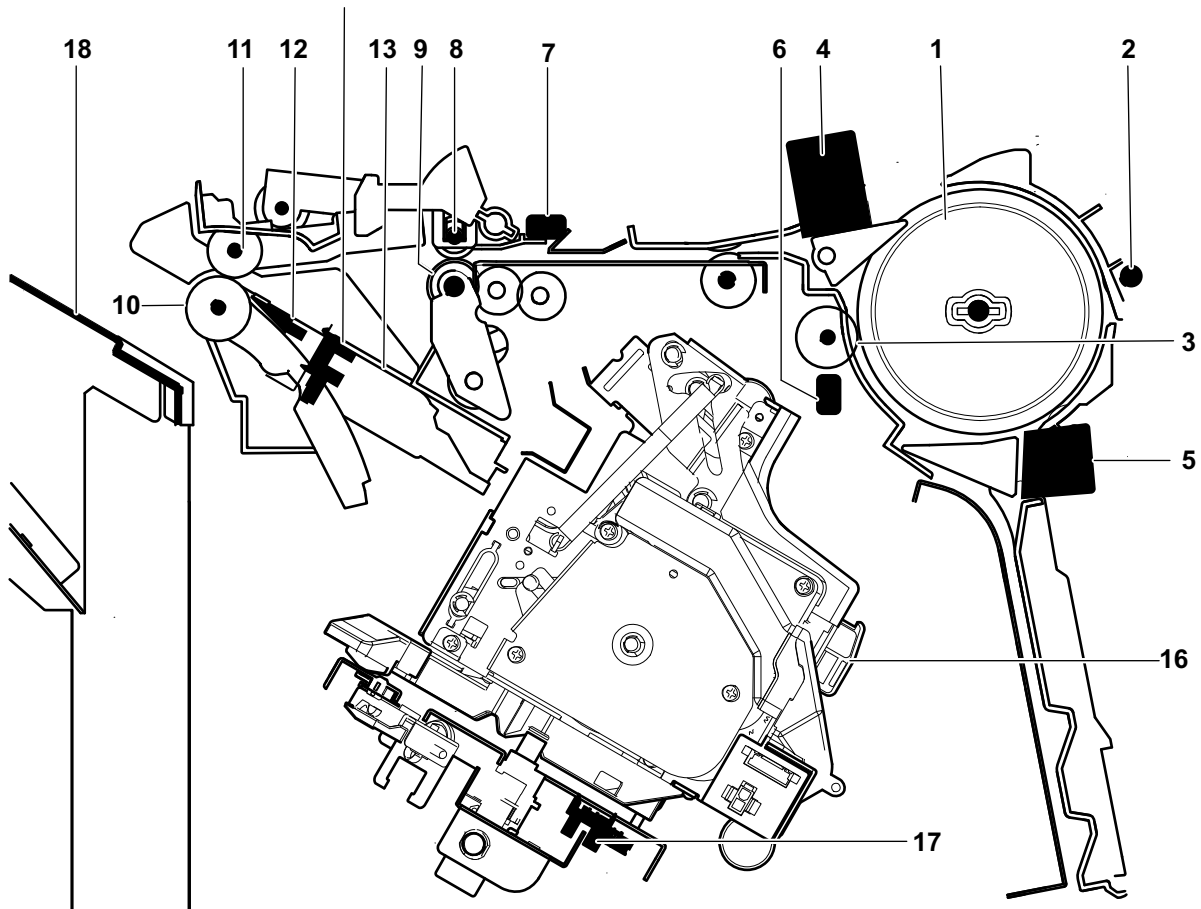
The feed-shift guide 3 (b) is activated by the DF feed-shift solenoid 3 (a) and switches the paper conveying path, then convey it to either the DF tray B (c), relief drum (d) or finishing section (e). Also, the DF sub exit sensor (f) detects paper jam at exit to the DF tray B (c).

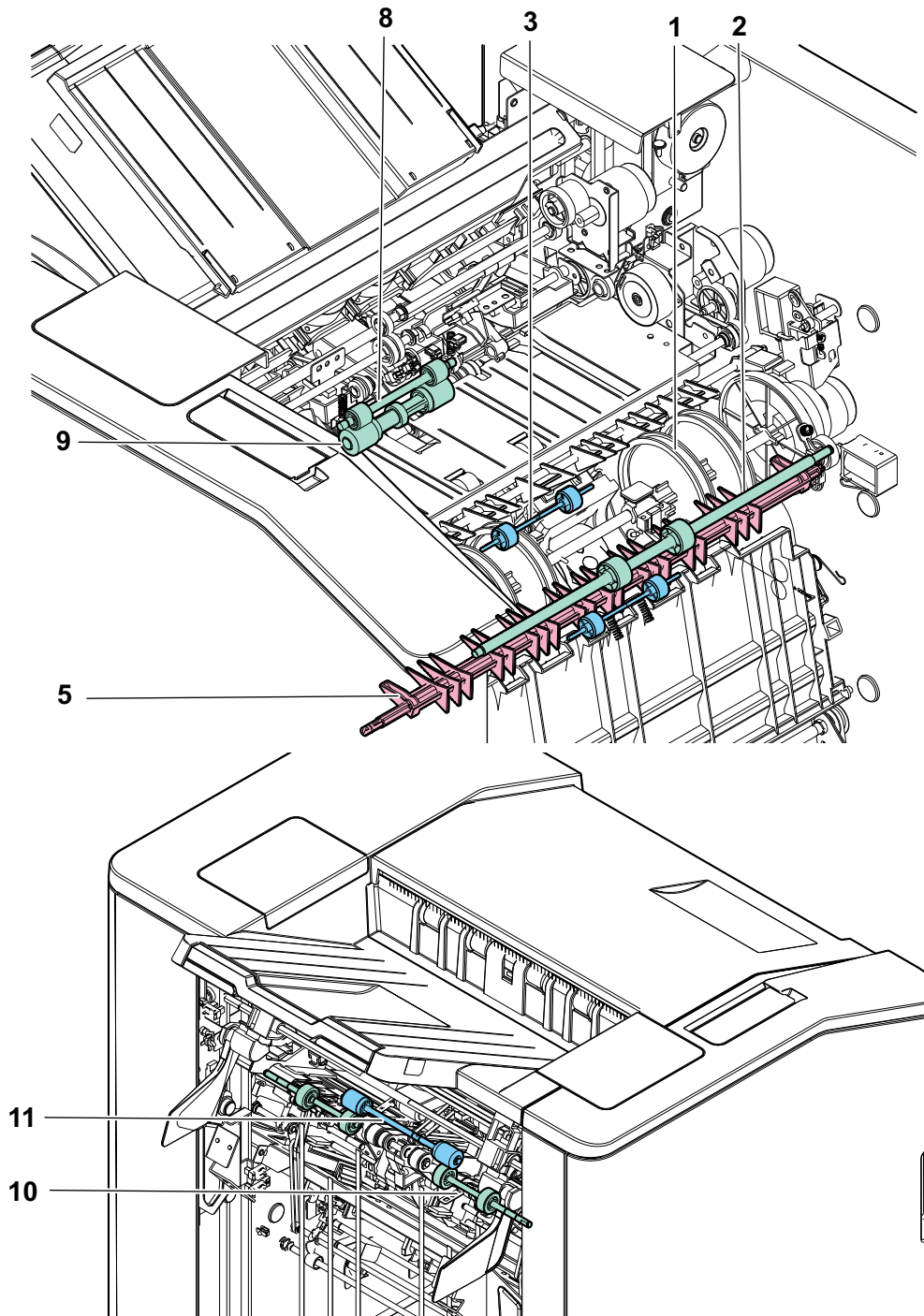


### (6-3) Finishing section

The finishing section consists of the parts below and convey the paper from the main unit to the DF tray A. Also, bundle eject mode and staple mode are processed.

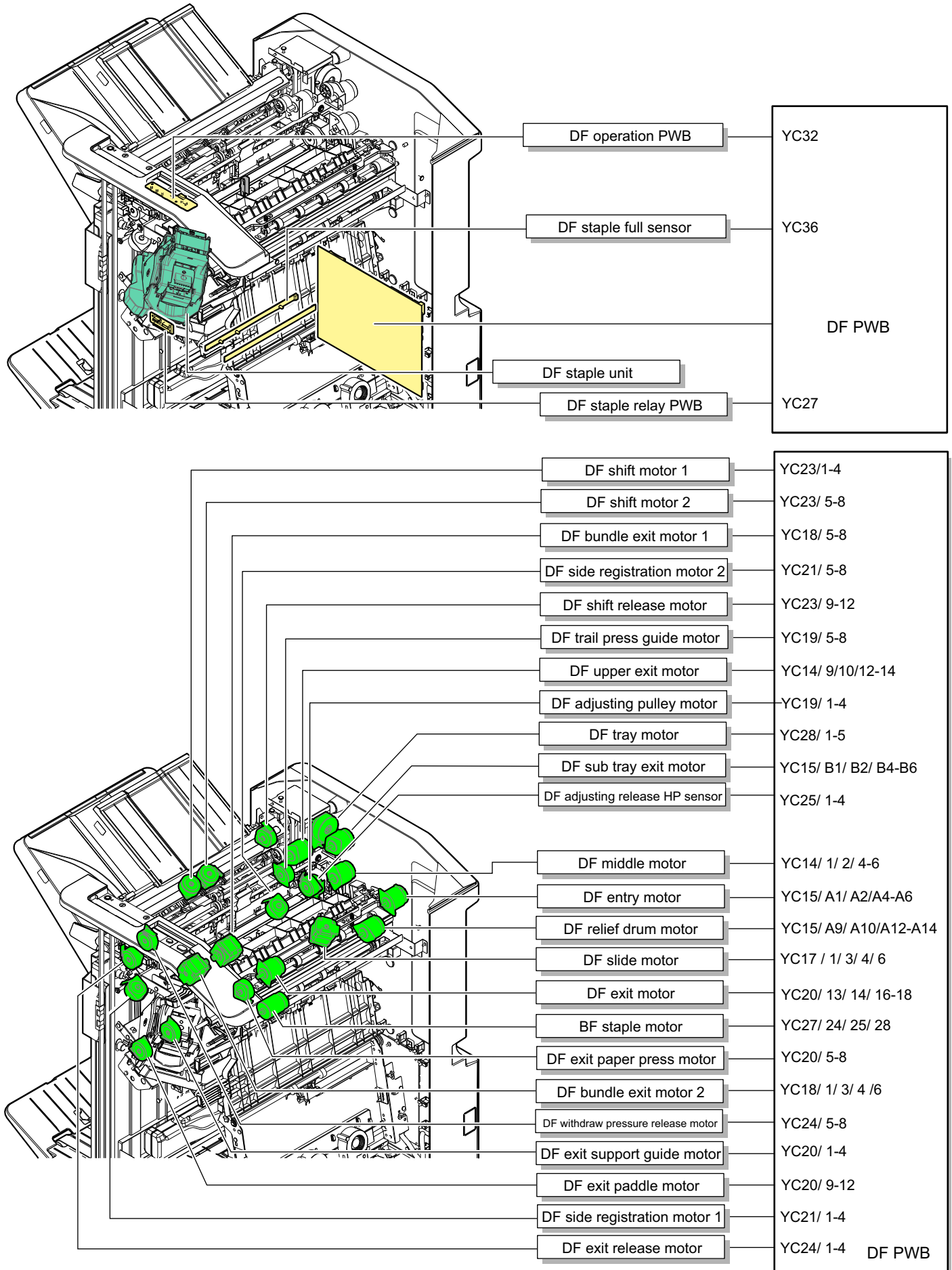
Also, for folding, switch the paper path to the relief drum by the feed-shift guide 1.



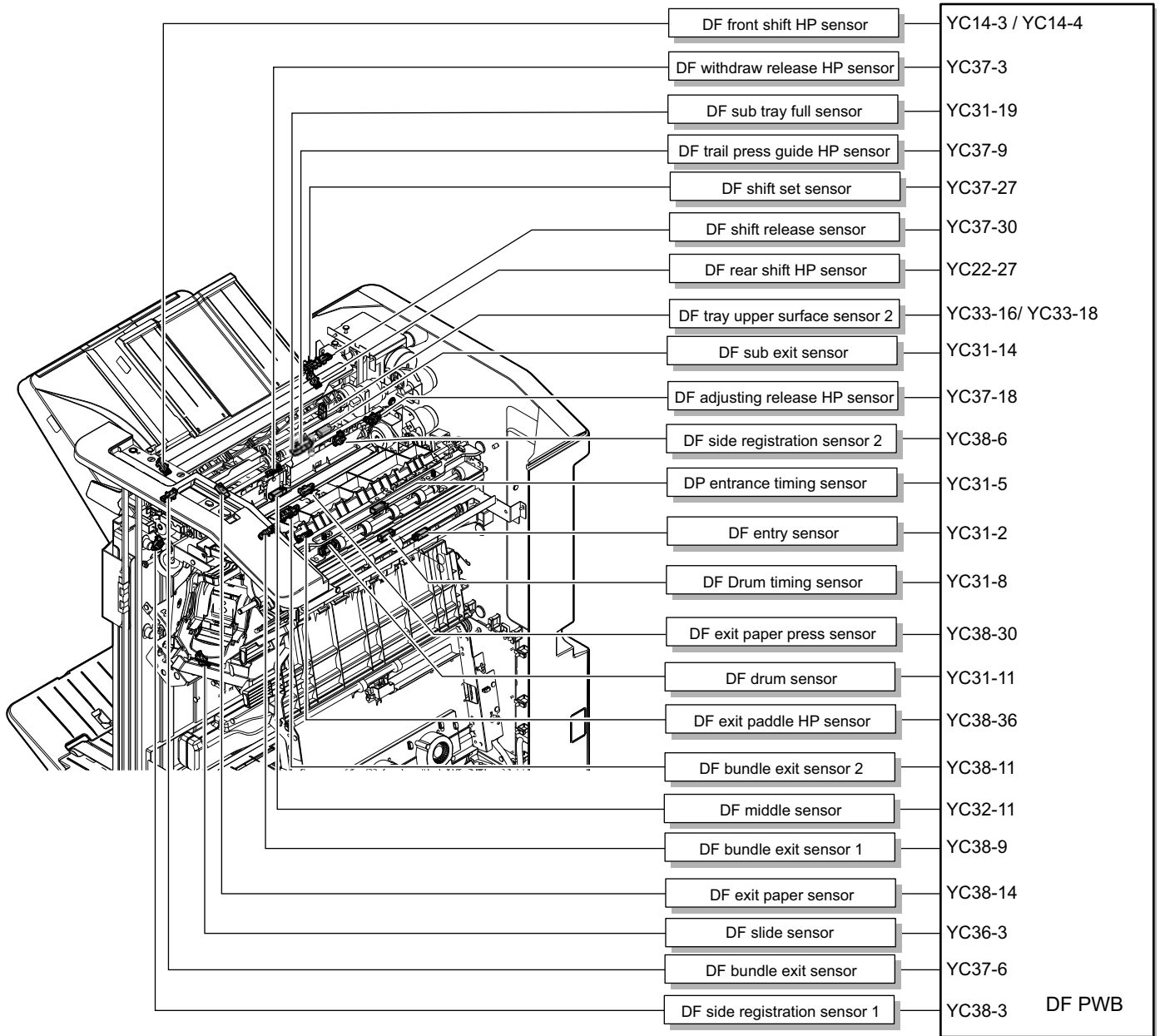


- |                           |                          |                                  |
|---------------------------|--------------------------|----------------------------------|
| 1 DF relief drum          | 7 DF middle sensor       | 13 DF bundle eject unit          |
| 2 DF conveying pulley     | 8 DF middle roller       | 14 DF side registration sensor 1 |
| 3 DF conveying pulley     | 9 DF middle pulley       | 15 DF side registration sensor 2 |
| 4 DF Feedshift solenoid 1 | 10 DF tray A exit roller | 16 DF staple unit                |
| 5 DF Feedshift solenoid 2 | 11 DF eject pulley       | 17 DF slide sensor               |
| 6 DF drum sensor          | 12 DF eject sensor       | 18 DF tray A                     |

[Block diagram]



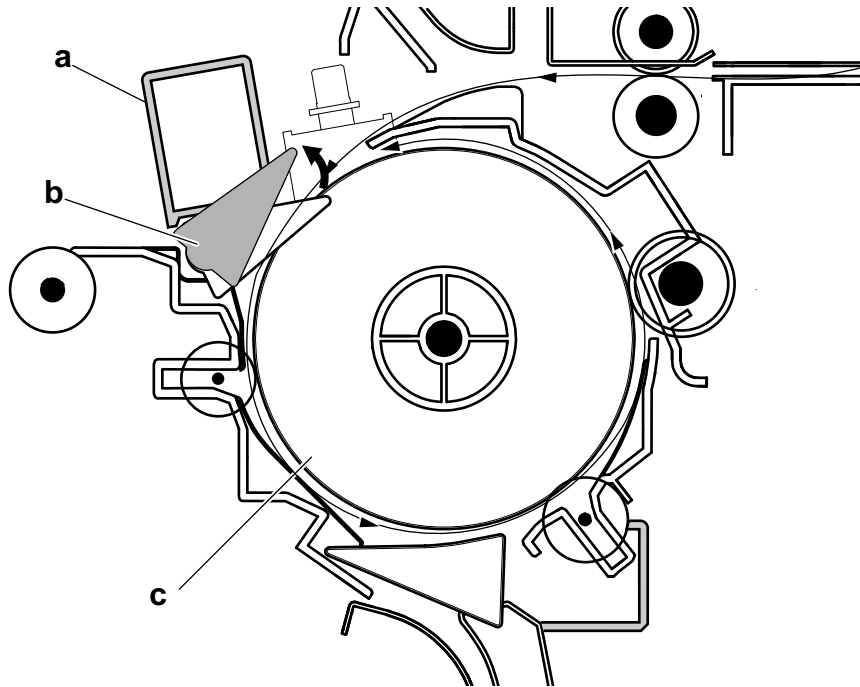




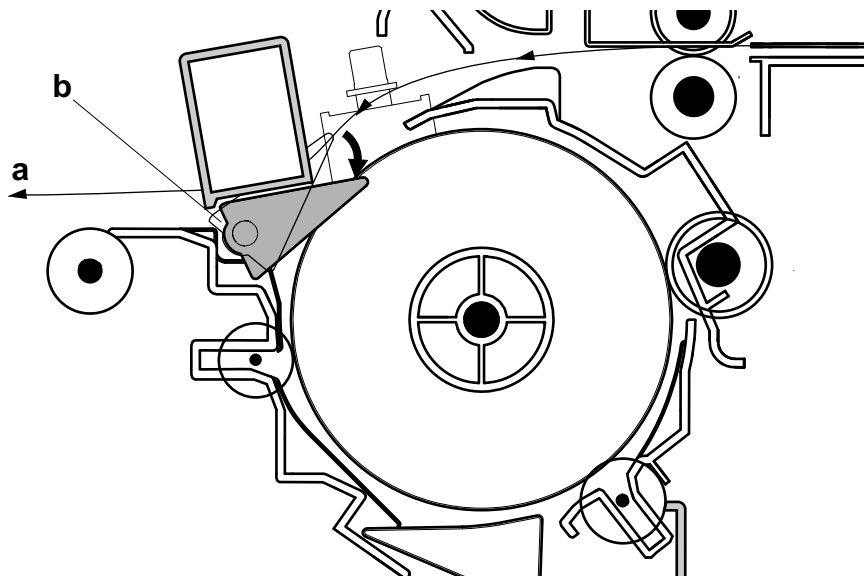
### (6-4) Relief drum operation

As process multiple copies of A4 size paper to the finishing section or folding section, to secure the time to finish paper, the 1st and 2nd paper of the next group is relieved until the 3rd paper is conveyed.

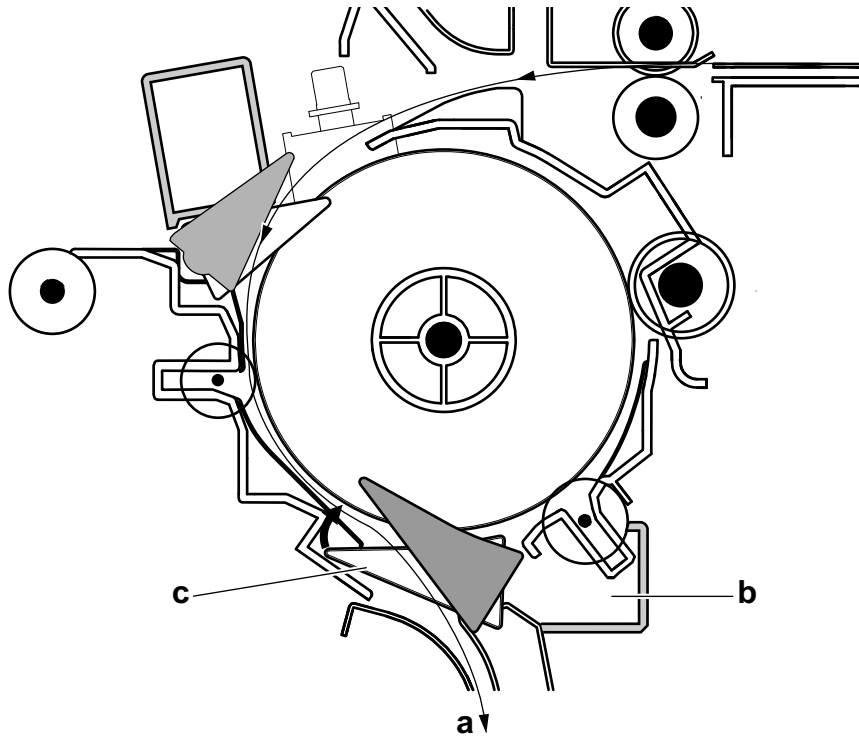
- 1 The feed-shift guide 1 (b) is activated by the DF feed-shift solenoid 1 (a) and switch the paper path, then the first paper of the next group goes to the relief drum (c).
- 2 Likewise, 2nd paper of the next group goes to the relief drum (c).



- 3 When the 3rd paper of the next group goes to the relief drum, it goes to the finishing section (a) with the 1st and 2nd paper. Then, switch the paper path by the feed-shift guide 1 (b).

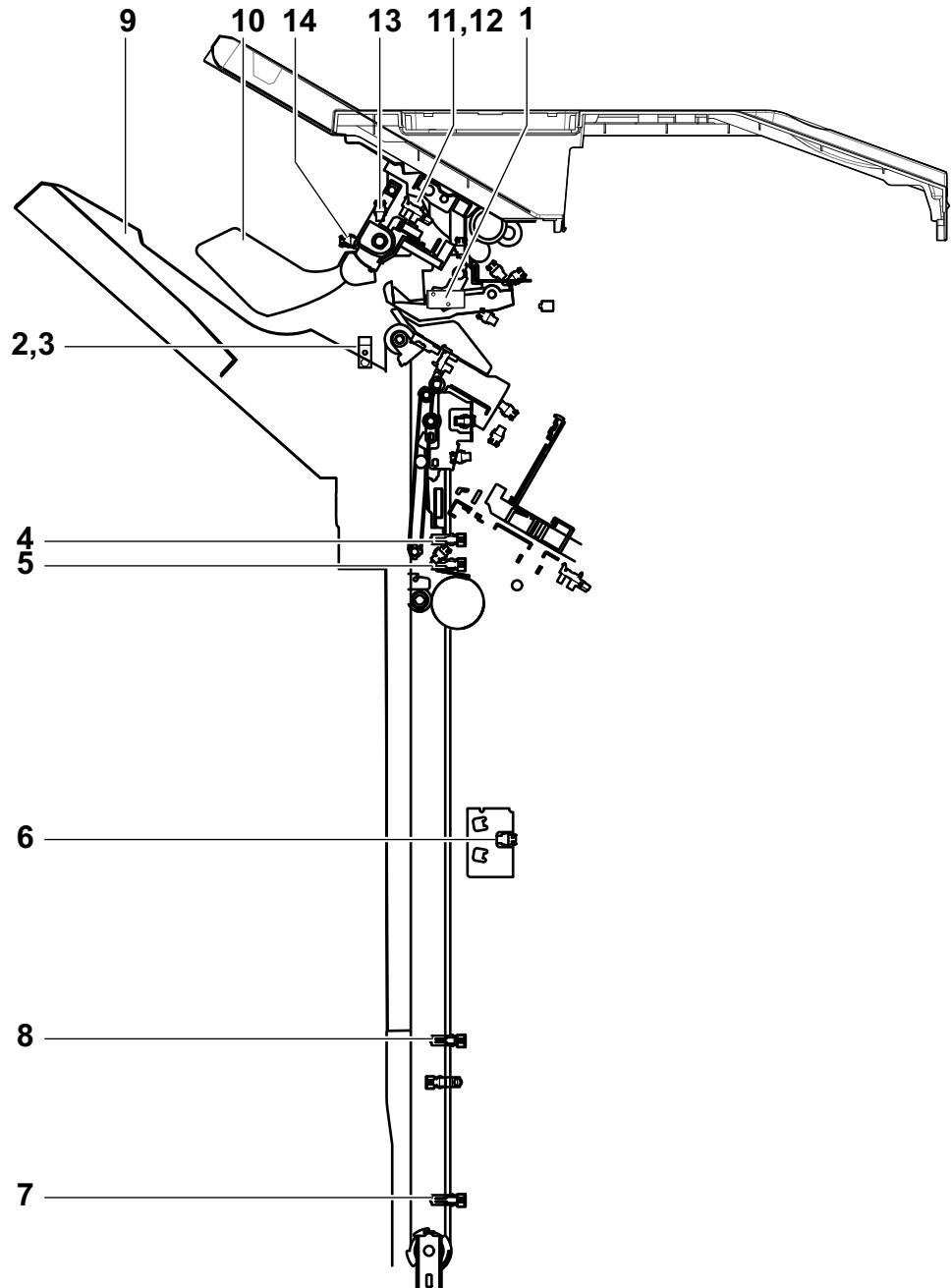


- 4 The DF feed-shift solenoid 2 (b) activates the feed-shift guide 2 (c) and switches the paper path to the folding unit (a).

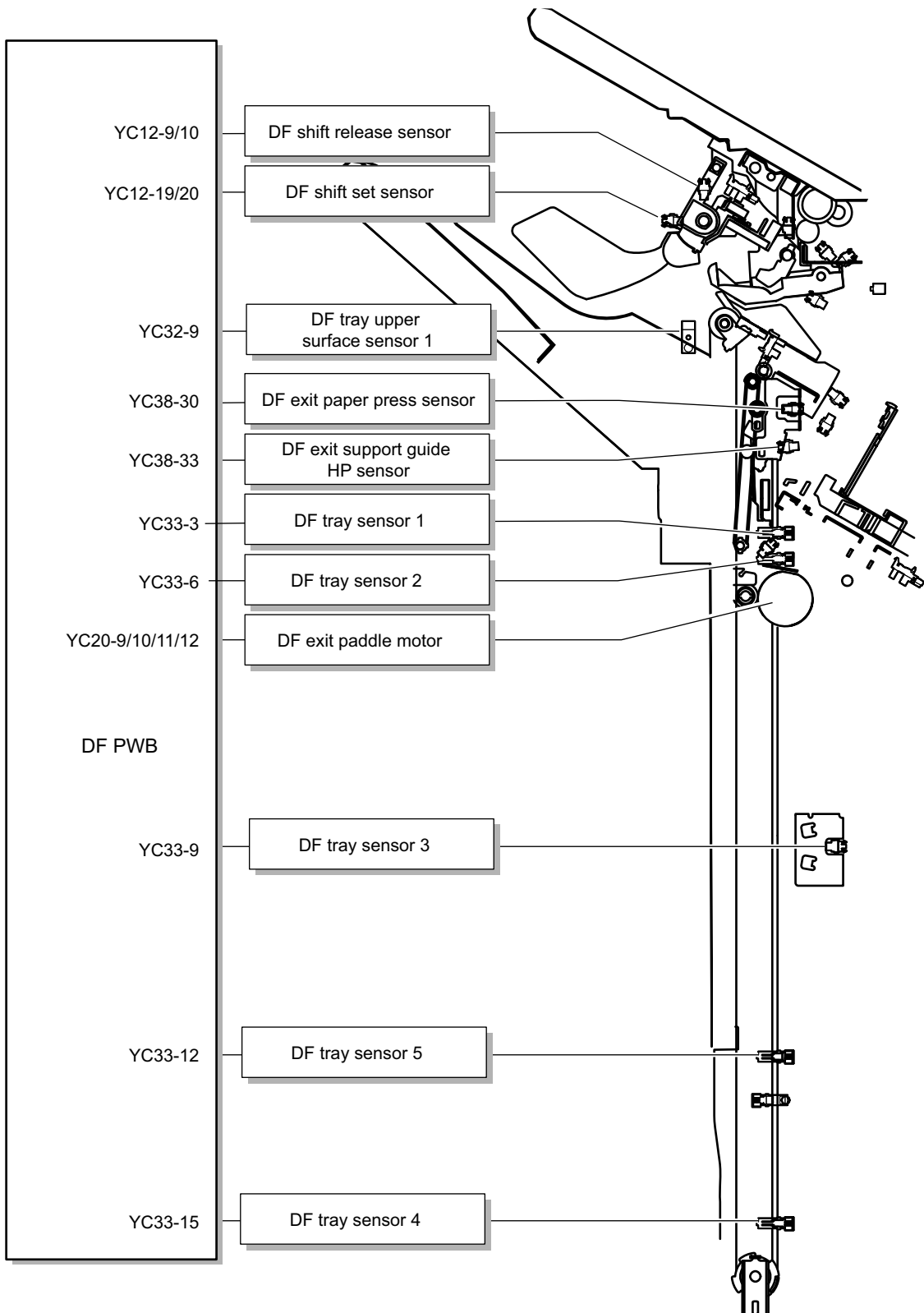


## (6-5)DF eject tray

The paper is ejected to main tray in sort or staple function. And ejected to main tray when it is selected as output tray.

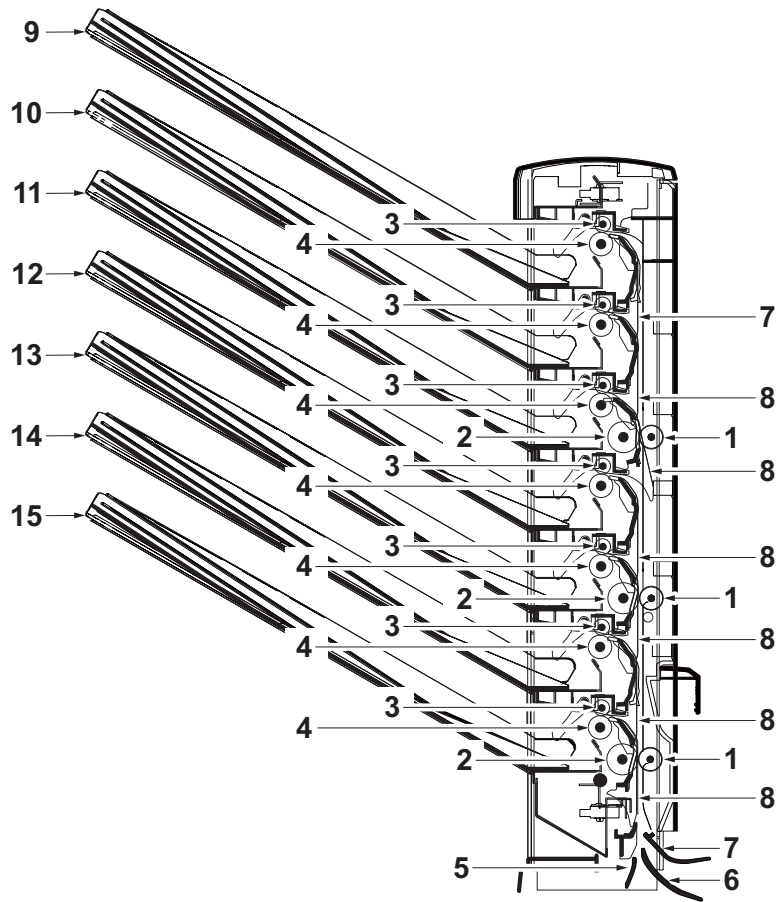


- |                                  |                             |
|----------------------------------|-----------------------------|
| 1 DF exit switch solenoid        | 8 DF tray sensor 5          |
| 2 DF tray upper surface sensor 1 | 9 DF main tray (tray A)     |
| 3 DF tray upper surface sensor 2 | 10 Side shift guide         |
| 4 DF tray sensor 1               | 11 DF rear shift HP sensor  |
| 5 DF tray sensor 2               | 12 DF front shift HP sensor |
| 6 DF tray sensor 3               | 13 DF shift set sensor      |
| 7 DF tray sensor 4               | 14 DF shift release sensor  |

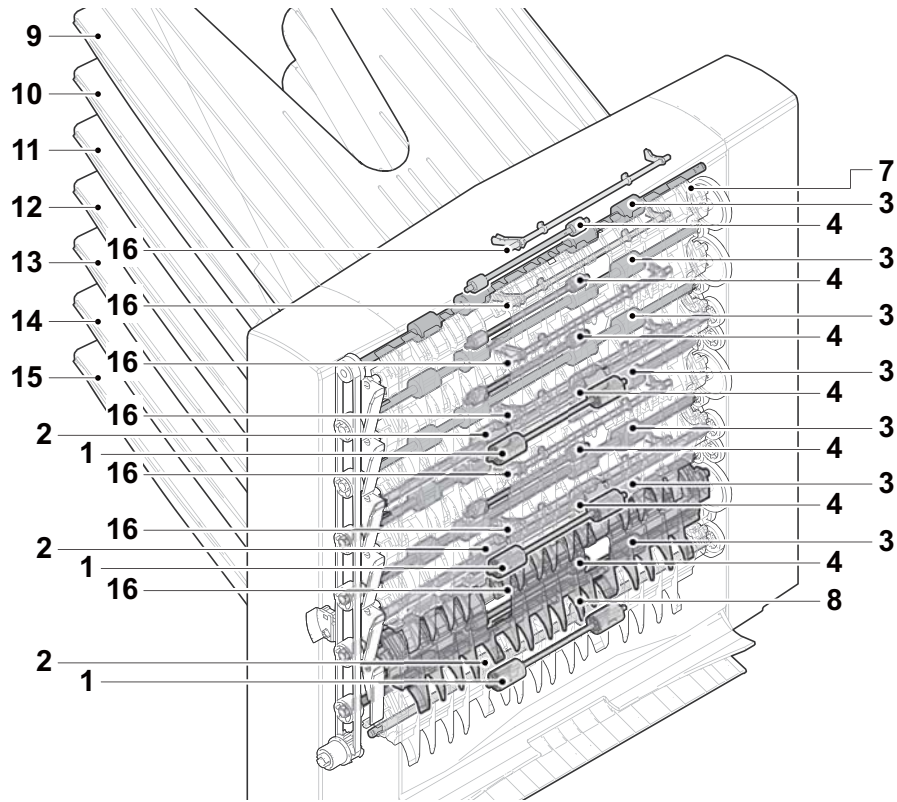


**(7) Mailbox (MT-730(B))**

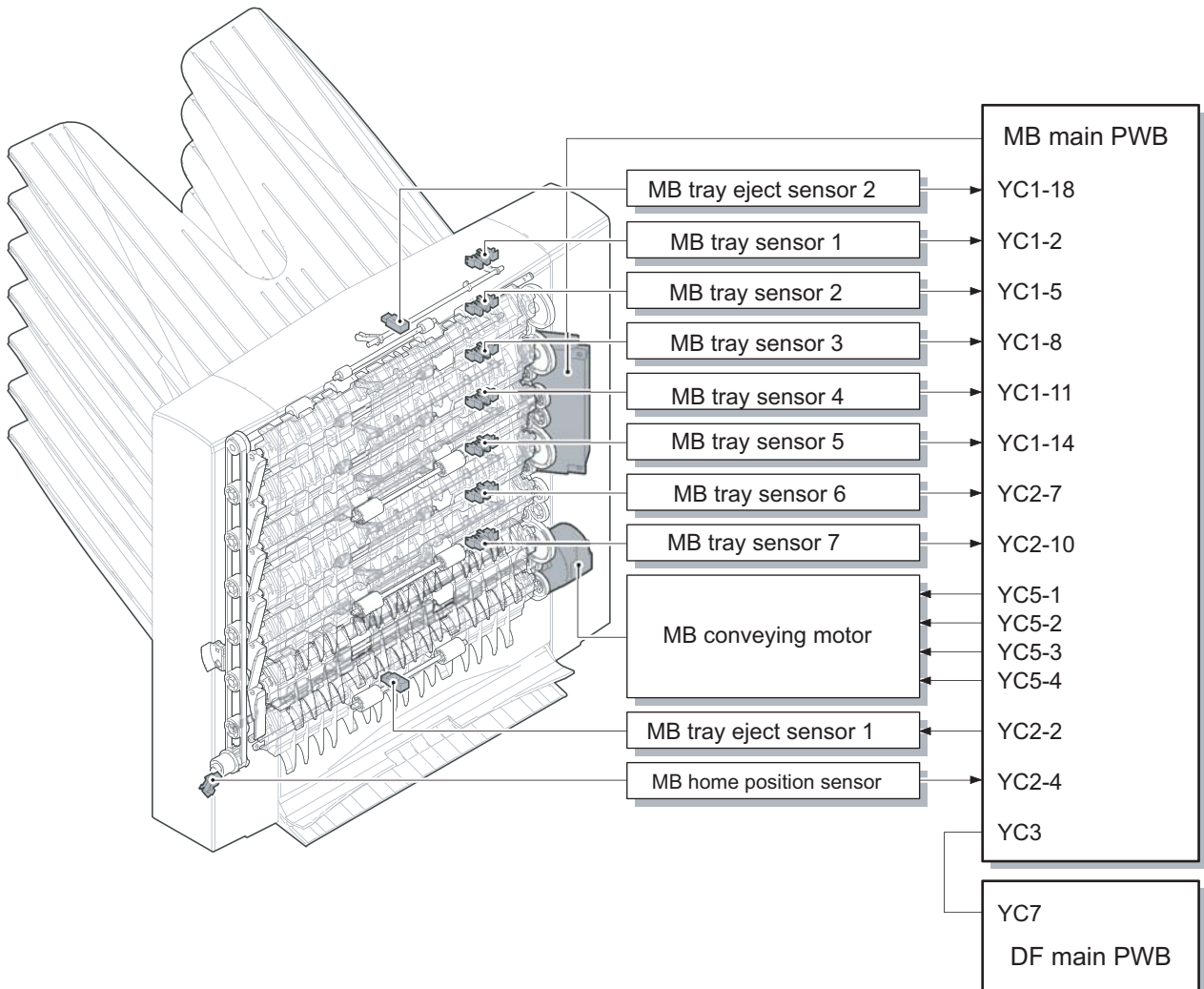
The mailbox ejects paper to the tray 1 to 7 designated to stack



- |                         |                                     |
|-------------------------|-------------------------------------|
| 1 MB conveying pulley   | 9 MB tray 1                         |
| 2 MB conveying roller   | 10 MB tray 2                        |
| 3 MB eject pulley       | 11 MB tray 3                        |
| 4 MB eject roller       | 12 MB tray 4                        |
| 5 MB lower entry guide  | 13 MB tray 5                        |
| 6 MB middle entry guide | 14 MB tray 6                        |
| 7 MB upper entry guide  | 15 MB tray 7                        |
| 8 MB feed-shift nail    | 16 MB Actuator (MB overflow sensor) |

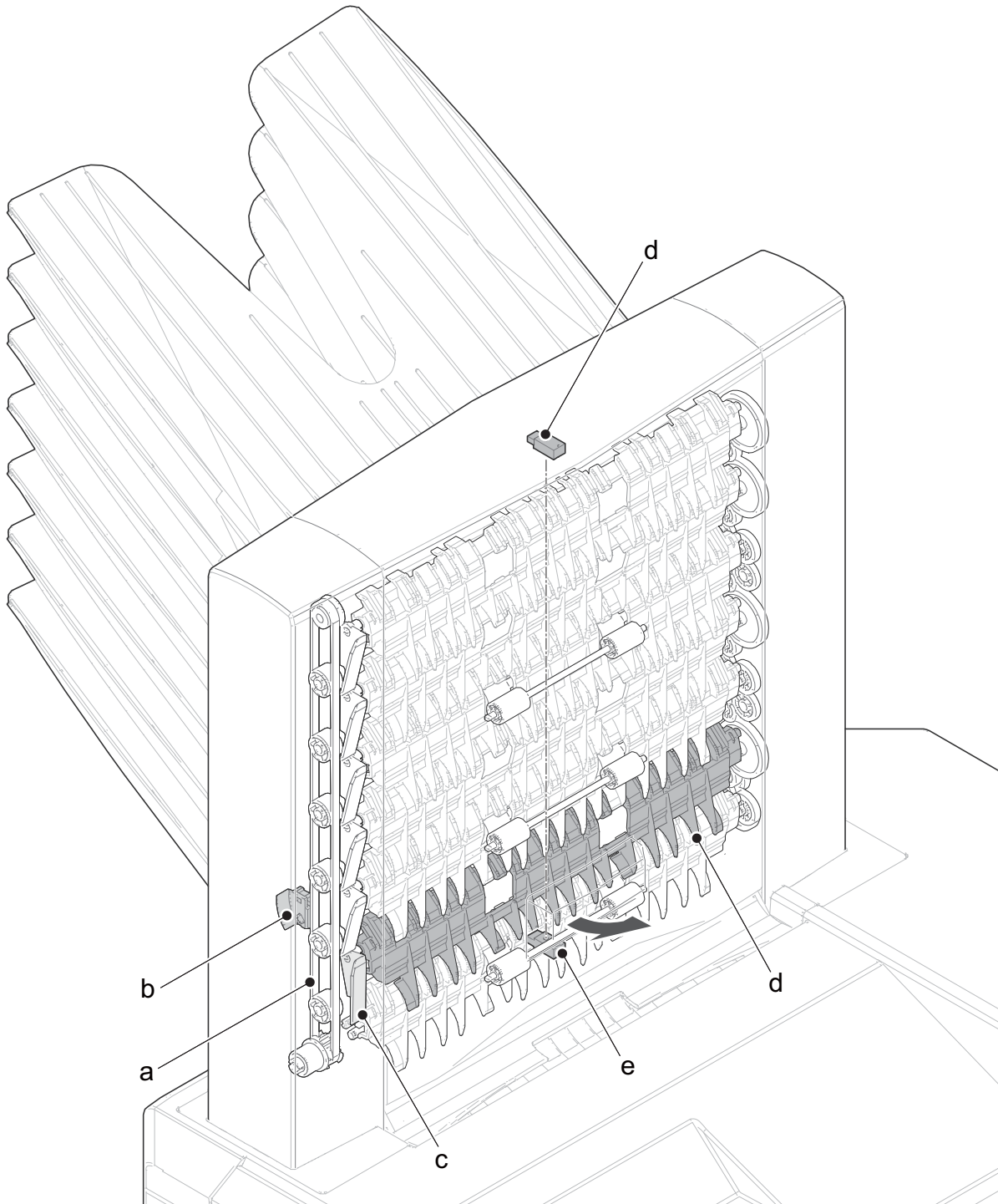


**Block diagram**



### (7-1)Ejecting to the mailbox tray

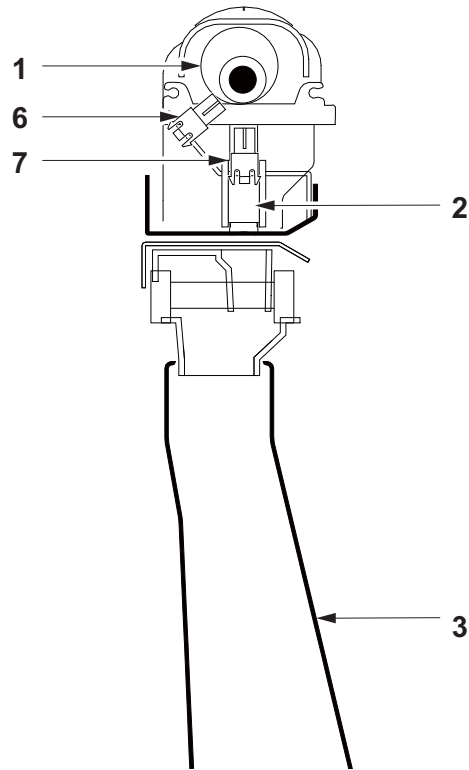
If the belt (a) support plate (b) moving on the belt passes the feed-shift nail lever (c), the feed-shift nail (d) is switches the conveying path to eject to each tray. Also, the MP tray eject sensor (d) detects paper jam.



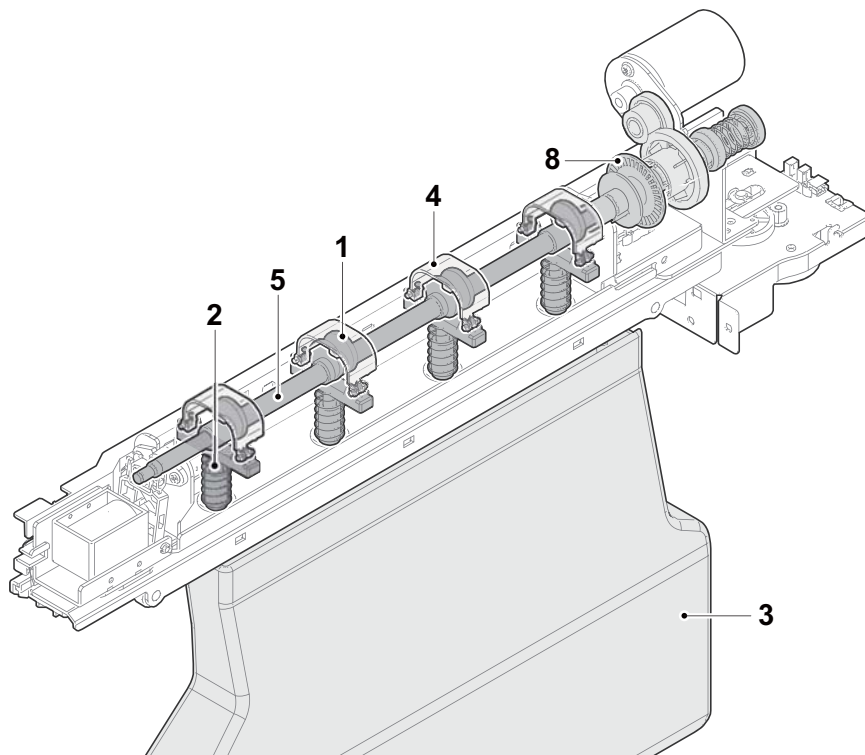


**(8)Punch unit (PH-7)**

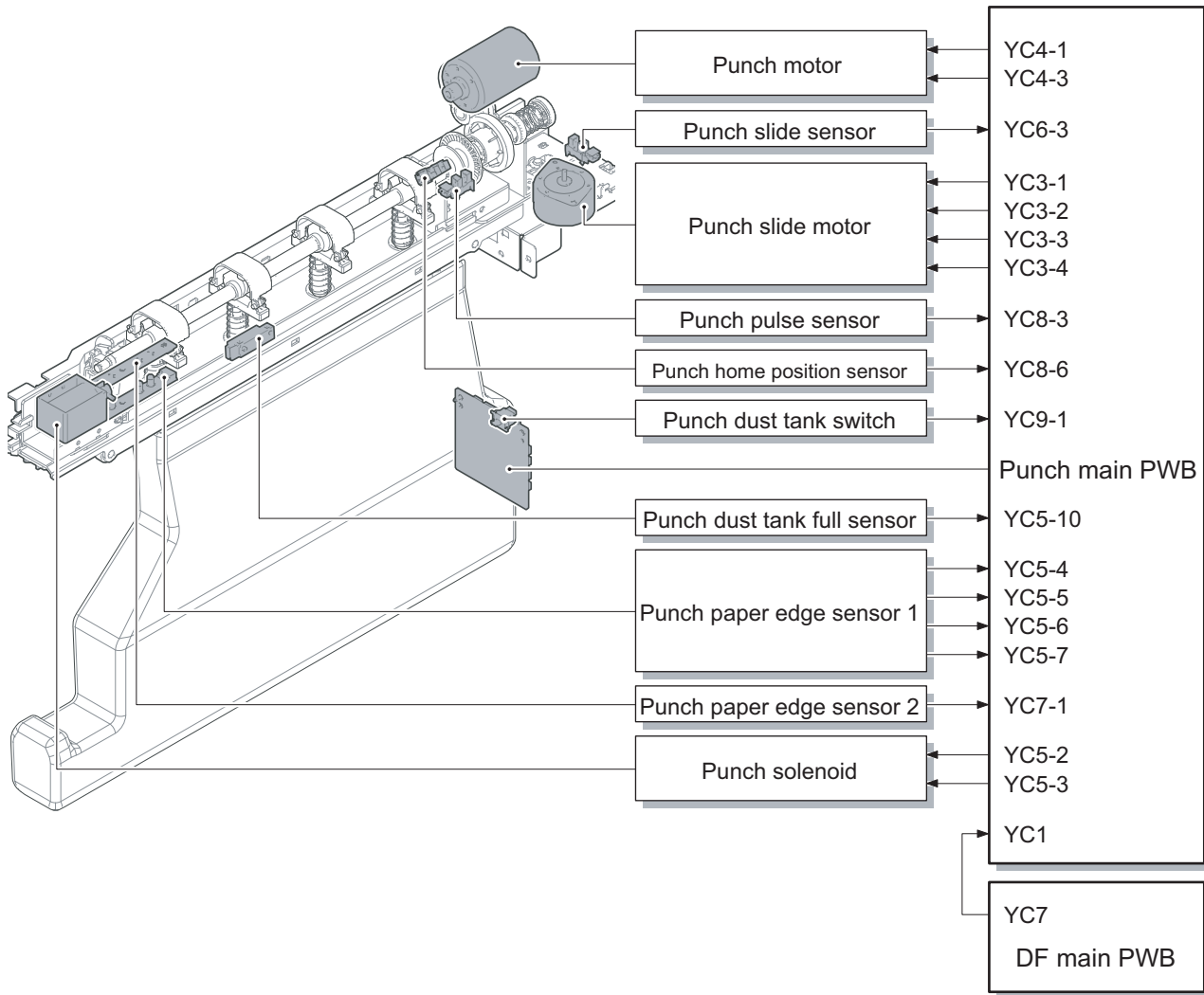
The punch unit is installed at the paper entry section of the document finisher and paper entered there is stopped to make punch holes.



- |                       |                              |
|-----------------------|------------------------------|
| 1 Punch cam           | 5 Punch cam shaft            |
| 2 Punch cutter        | 6 Punch home position sensor |
| 3 Punch dust tank     | 7 Punch pulse sensor         |
| 4 Punch cutter holder | 8 Punch pulse plate          |

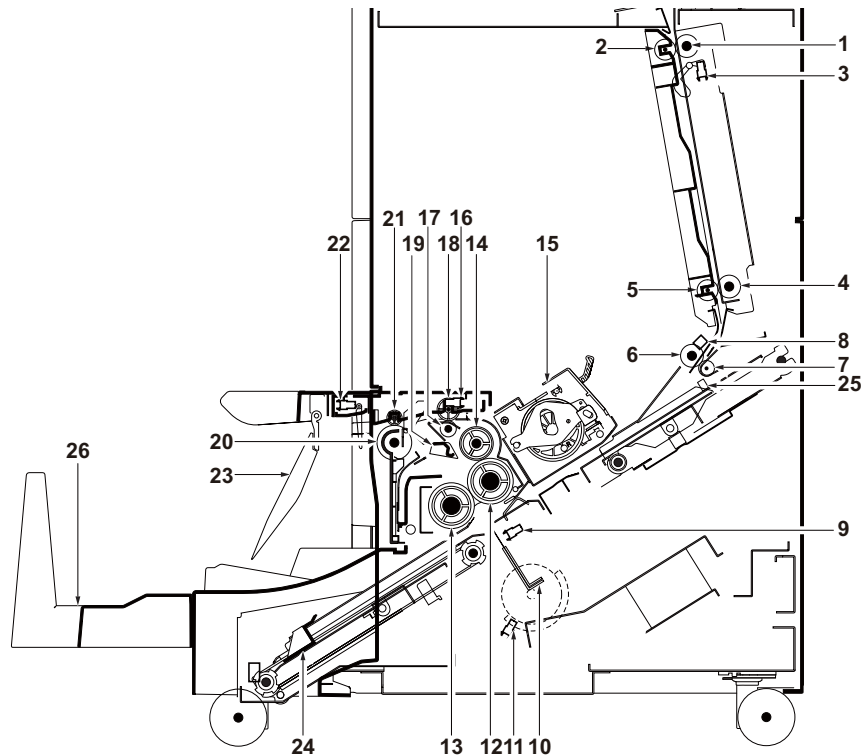


Block diagram

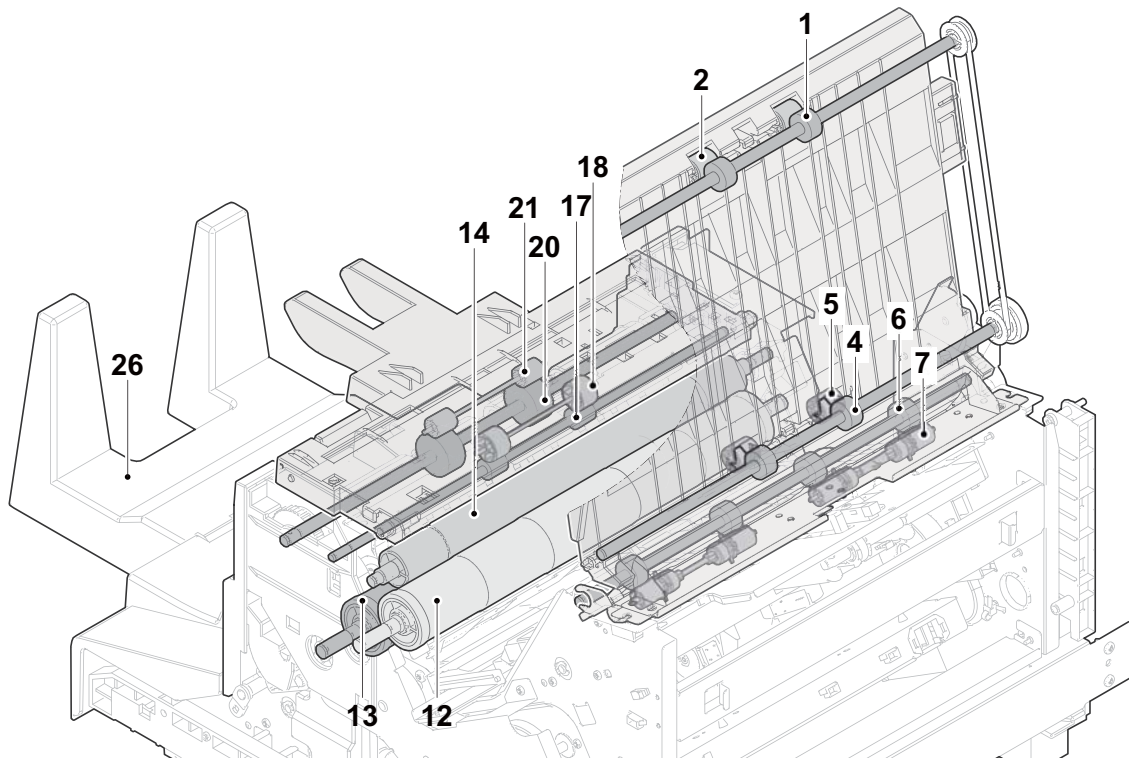


**(9)Folding unit (BF-730)**

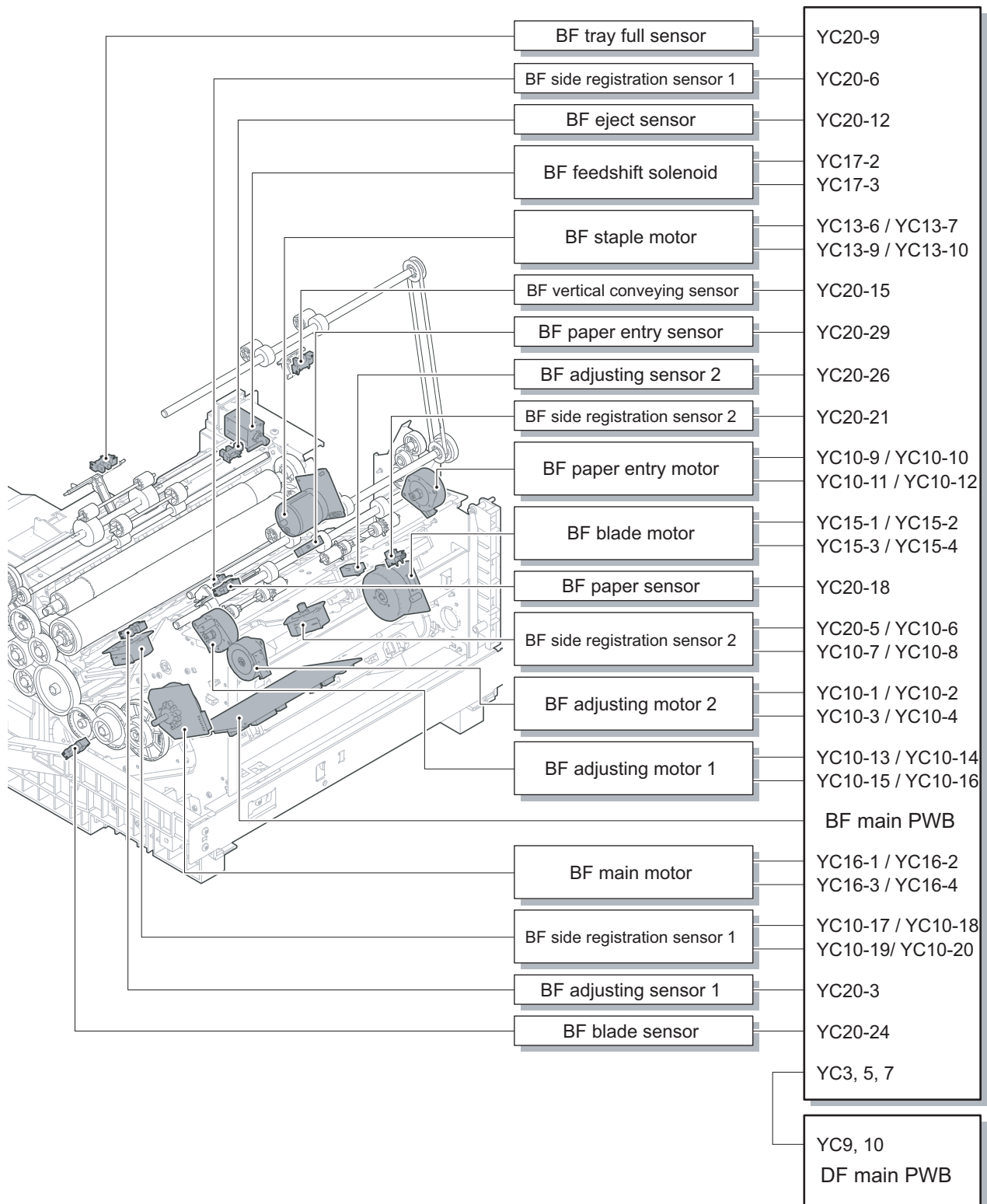
The folding unit makes the conveyed paper bi-fold or tri-fold with the BF blade and eject paper to the fold tray. Also, the BF staple unit makes paper half-folded and ejects booklet-stapled paper to the fold tray.



- |                                |                                     |
|--------------------------------|-------------------------------------|
| 1 BF conveying roller 1        | 14 BF upper roller                  |
| 2 BF conveying pulley 1        | 15 BF staple unit                   |
| 3 BF vertical conveying sensor | 16 BF eject sensor                  |
| 4 BF conveying roller 2        | 17 BF conveying roller 3            |
| 5 BF conveying pulley 2        | 18 BF conveying pulley 3            |
| 6 BF entry roller              | 19 BF feed-shift guide              |
| 7 BF entry pulley              | 20 BF eject roller                  |
| 8 BF entry sensor              | 21 BF eject pulley                  |
| 9 BF paper sensor              | 22 BF tray full sensor              |
| 10 BF blade                    | 23 hf eject paper press arm         |
| 11 BF blade sensor             | 24 BF lower side registration guide |
| 12 BF right roller             | 25 BF upper side registration guide |
| 13 BF left roller              | 26 BF tray                          |



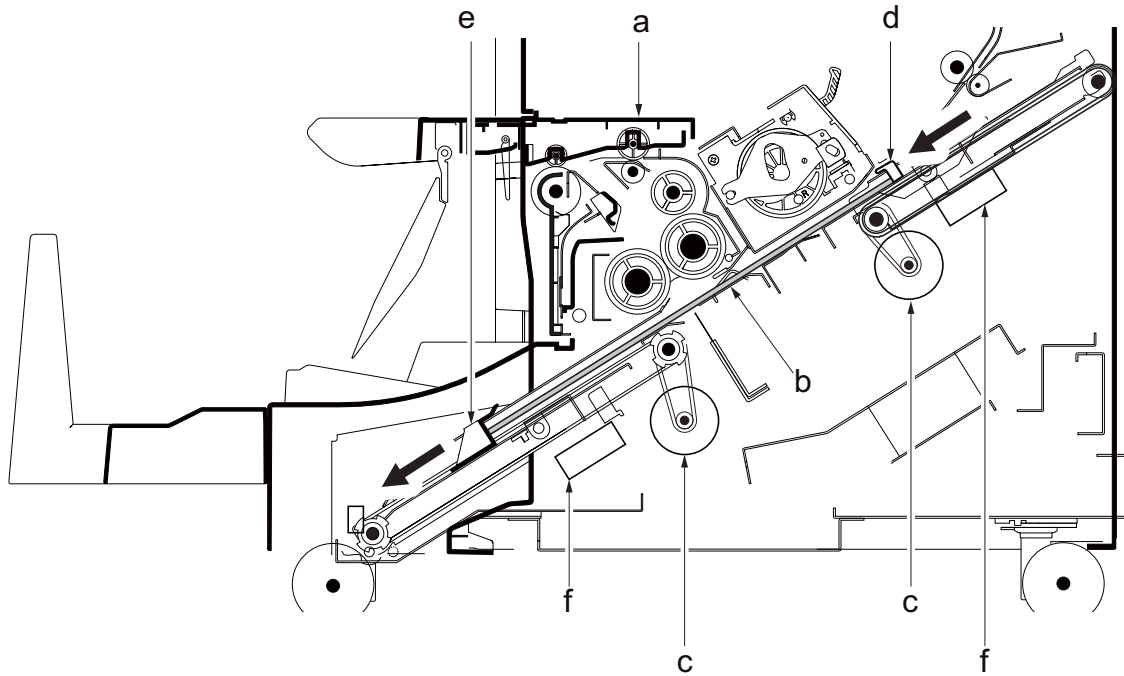
## Block diagram



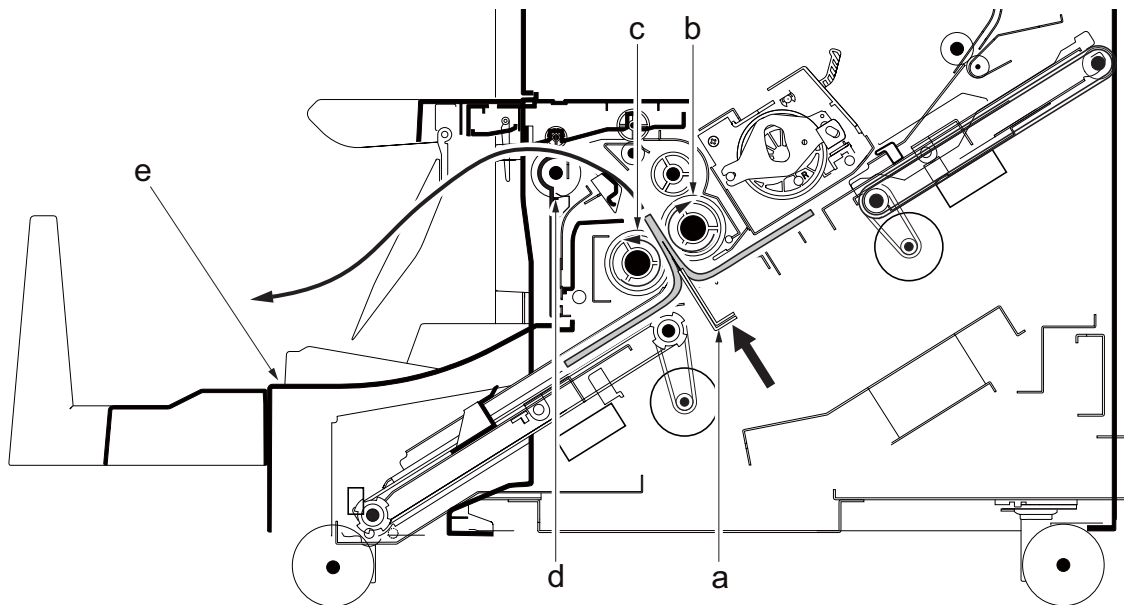
### (9-1) Paper folding operation (Center-folding, Tri-folding)

#### Center-folding

- 1 Paper (b) stuck in the folding unit (a) is conveyed to the center-folding position by the BF adjusting motor 1/2 (c) that move the upper BF moving plate (d) and lower BF moving plate (e).
- 2 The BF adjusting motor 1/2 (f) drives to adjust the paper side registration.

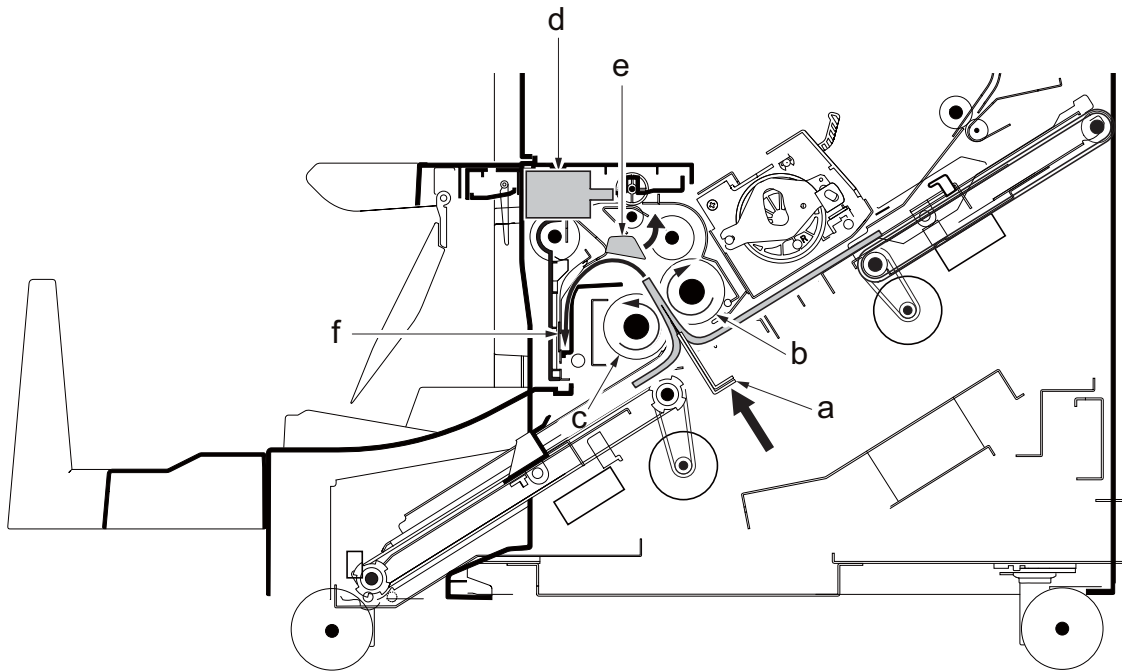


- 3 The BF blade (a) pushes up the center of paper by the BF blade motor drive to pinch it between the BF right roller (b) and BF left motor (c).
- 4 Center-folded paper is ejected to the BF tray (e) by the BF right roller (b), BF left roller (c) and BF eject roller (d).

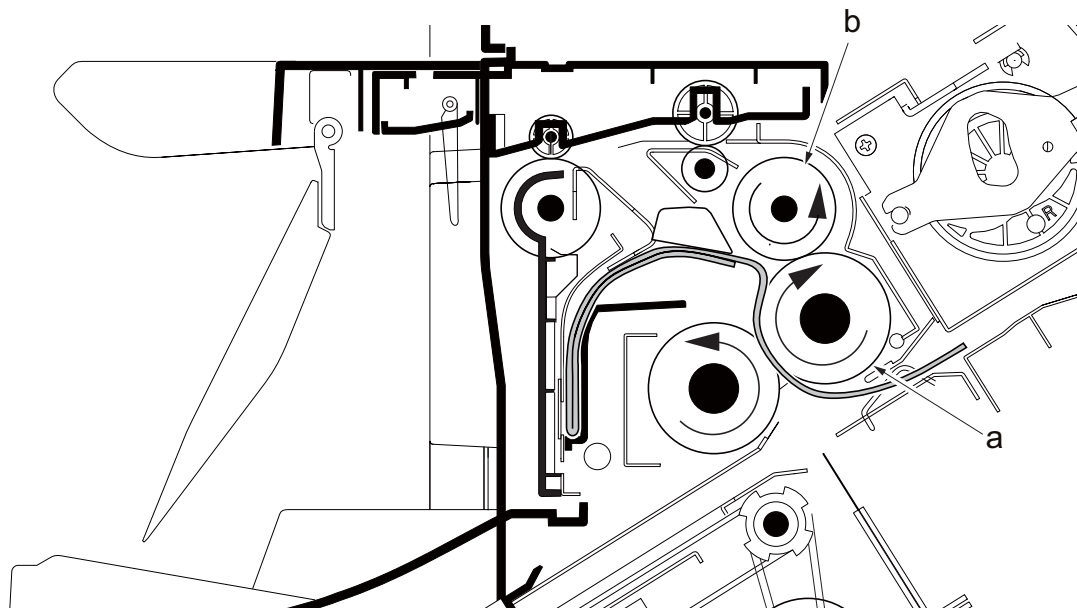


### Tri-folding

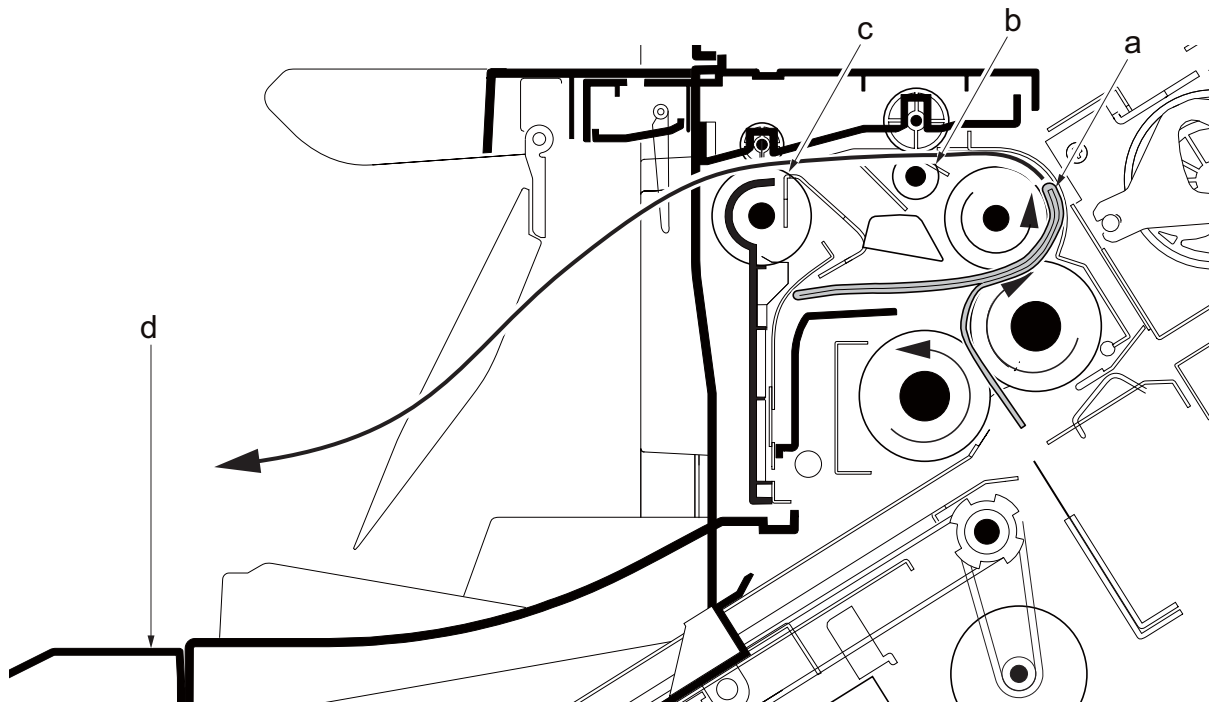
- 1 The paper in the folding unit is conveyed to the center-folding position by drive of the BF adjusting motor 1/2 as well as the center-folding operation.
- 2 After the paper side registration, the BF blade (a) pushes up the paper and have it pinched between the BF right roller (b) and BF left roller (c).
- 3 The BF feed-shift solenoid (d) activates the BF feed-shift guide (e) it switches the paper conveying path for the paper from the BF right/left roller to convey it to the relief section (f).



- 4 When the paper stops at the relief section, the paper loop generated at the space is pinched between the BF right roller (a) and upper BF roller (b). Then, the paper is folded inside.



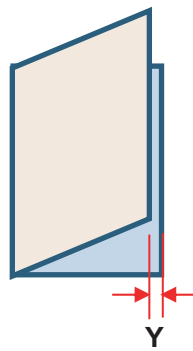
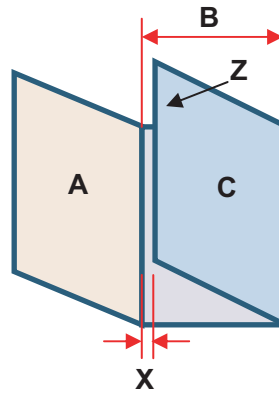
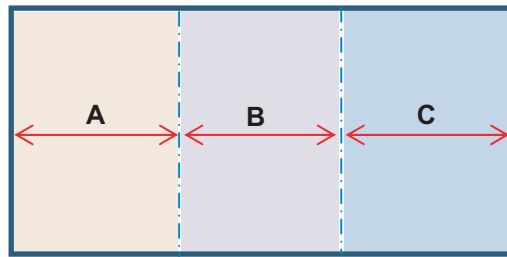
- 5 Tri-folded paper (a) is ejected to the BF tray (d) by the BF conveying roller (b) and BF eject roller (c).



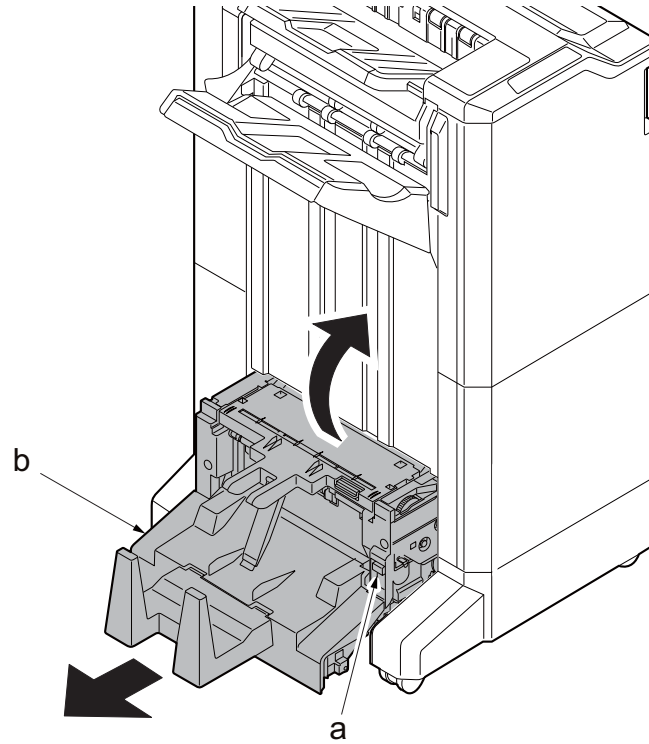
### (9-2) Tri-folding position adjustment for the folding unit

- 1 Execute the treatment below to make uniform width of A, B and C when tri-folding the paper.

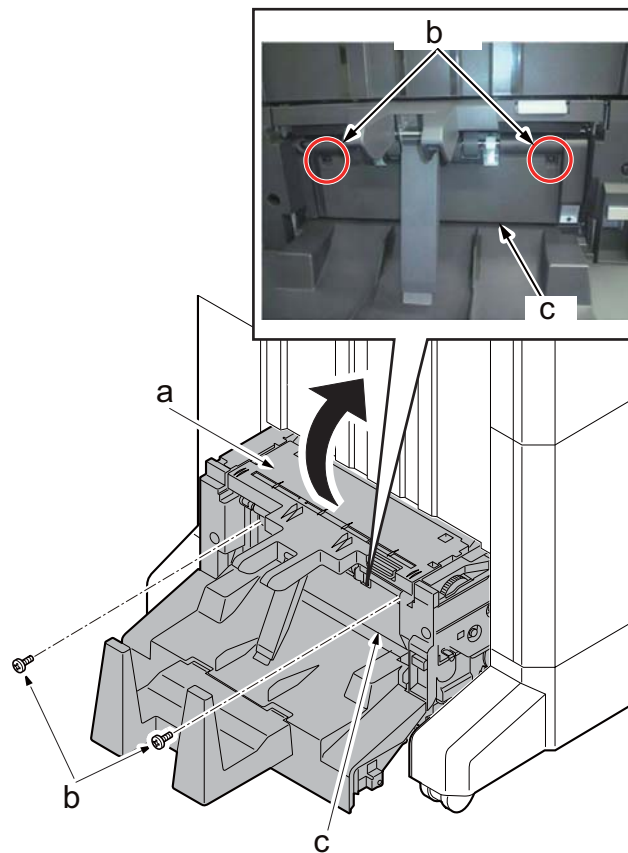




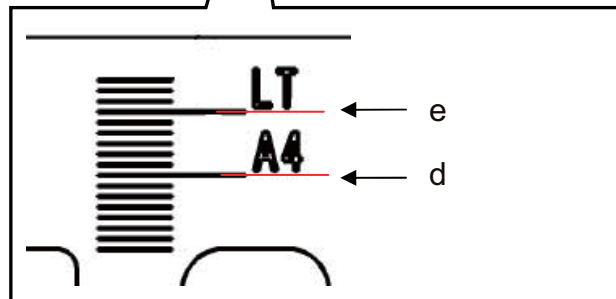
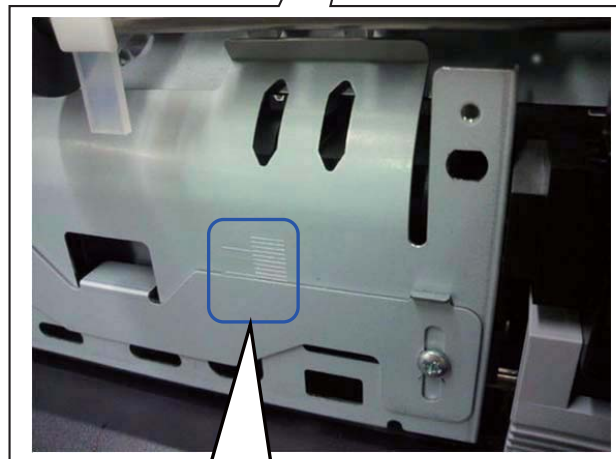
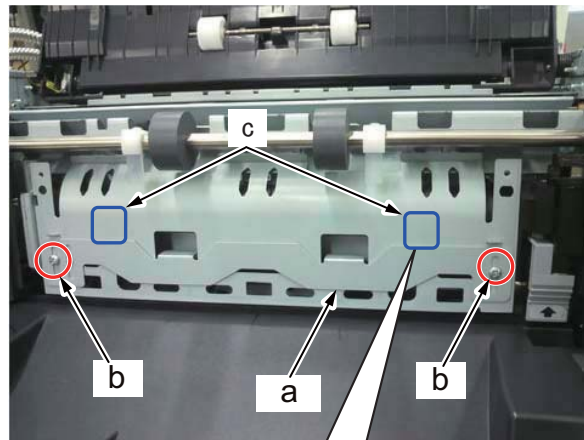
- 2 If this finishing is executed for the paper bundle, there may be little margin for the tri-folding position and Z section may be folded.
- 3 Machine shipment setting (B) Metric (A4): 100 to 102 mm Inch (Letter): 95 to 96 mm

**Adjustment 1: Change the width of B. Adjuster plate relocation method**

1 Push the folding unit release lever and pull out the folding unit.



2 Open the upper folding unit cover (a) upward and remove two screws (b) to remove the eject cover (c).

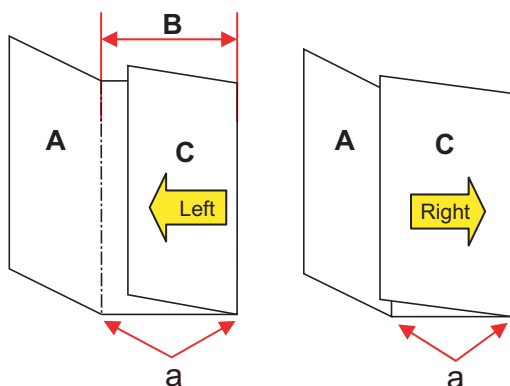


3 Loosen two screws (b) securing the adjuster plate (a) and move it.

Raise the adjuster plate to decrease the width B and lower the adjuster to increase the width. Scale: 1mm

When adjusting, fix it where the left and right scale are equal in Reference to the scale (c).

Shipment setting position Metric: A4 (d) Inch: LT (e) A4 and LT punch marks are at the machine rear side only.



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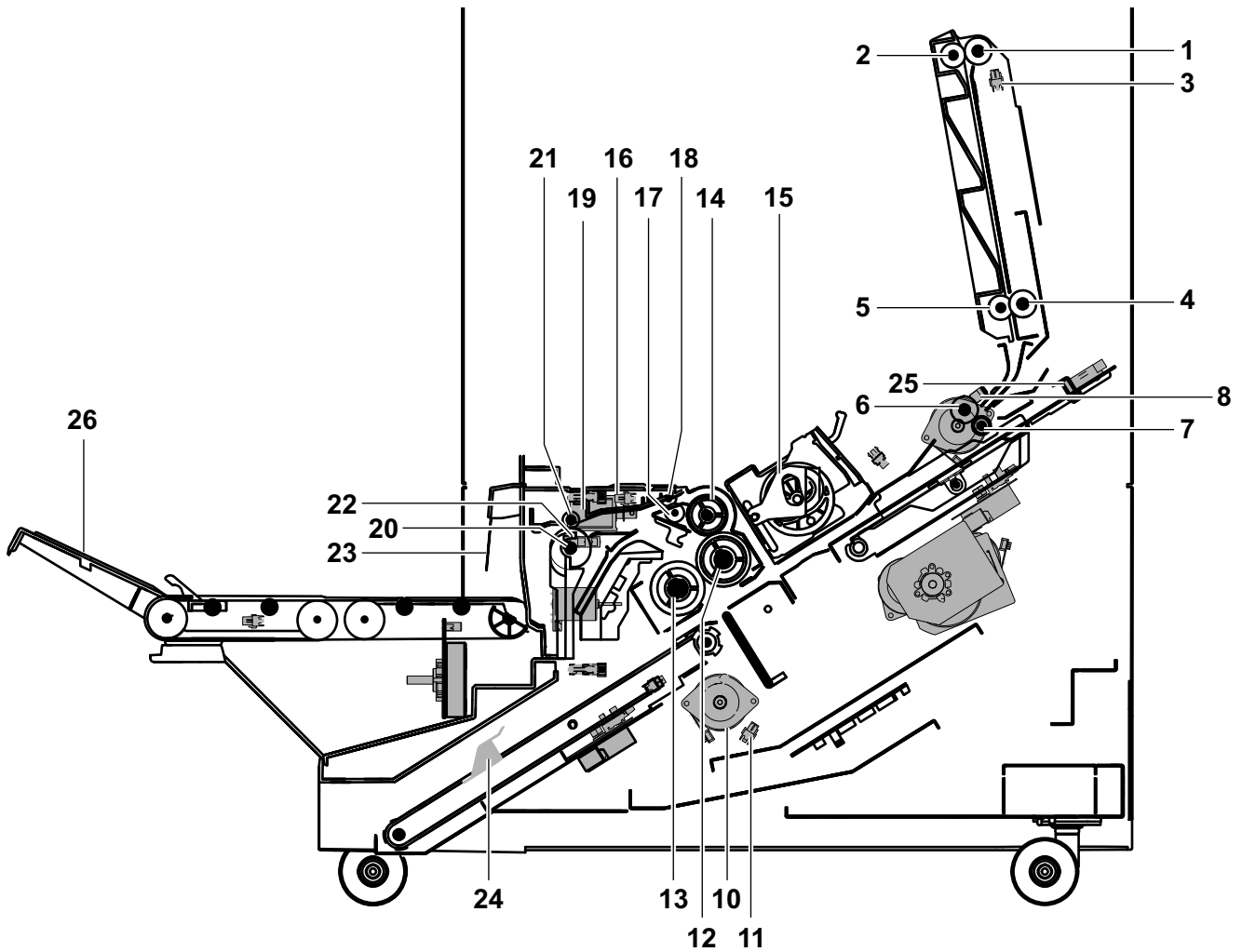
## Treatment 2

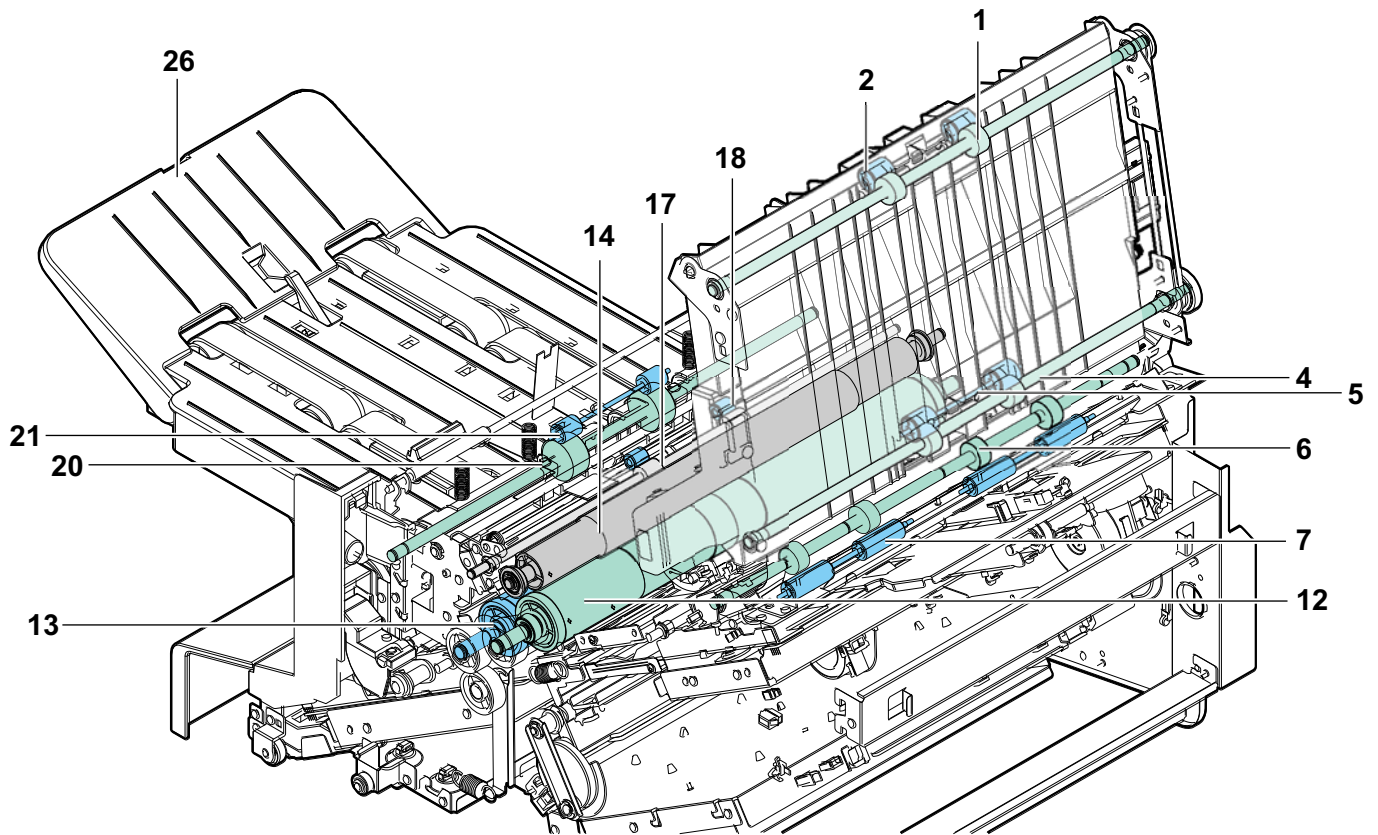
Change the setting values in U246 [Setting: Three Fold] to shift the tri-folding position (a) and to change the width A and C. (Width of B remains unchanged.)

- 1 Raise the set value to align the tri-folding to the left.
- 2 Lower the set value to align the tri-folding to the right

**(10)Booklet Unit (BF-9100)**

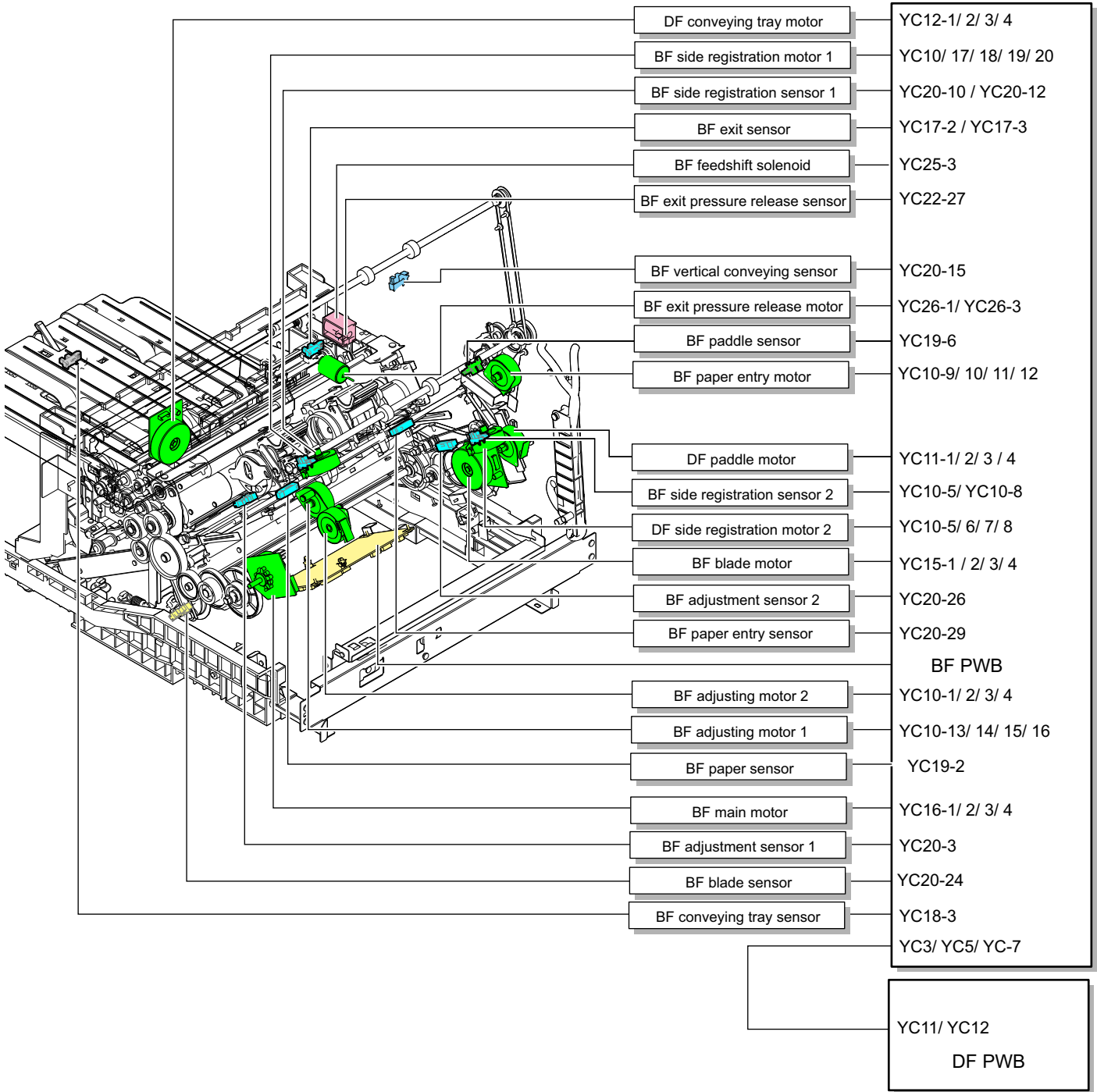
The folding unit makes the conveyed paper bi-fold or tri-fold with the BF blade and exit paper to the fold tray. Also, the BF staple unit makes center paper center-fold and exits booklet-stapled paper to the fold tray.





- |                                |                          |                             |
|--------------------------------|--------------------------|-----------------------------|
| 1 PF conveying roller 1        | 10 BF blade              | 19 BF feedshift guide       |
| 2 PF conveying pulley 1        | 11 BF blade sensor       | 20 DF eject roller          |
| 3 BF vertical conveying sensor | 12 BF right roller       | 21 DF eject pulley          |
| 4 PF conveying roller 2        | 13 BF left roller        | 22 BF tray full sensor      |
| 5 PF conveying pulley 2        | 14 BF upper roller       | 23 BF eject paper press arm |
| 6 DF entry roller              | 15 BF staple unit        | 24 BF lower moving plate    |
| 7 DF entry pulley              | 16 BF exit sensor        | 25 BF upper moving plate    |
| 8 BF paper entry sensor        | 17 BF conveying roller 3 | 26 DF tray                  |
| 9 BF paper sensor              | 18 BF conveying pulley 3 |                             |

[Block diagram]



## 4 Maintenance

### 4 - 1 Precautions for the maintenance

#### (1)Precautions

Before disassembling the main unit, press the main power switch to turn the power off. Make sure that the power lamp on the operation panel is off and unplug the power cord from the wall outlet. Then, start the disassembly.

When handling the PWBs (printed wiring boards), do not touch parts with bare hands. Make sure not to damage the PWB.

If ICs are mounted on the PWB, do not touch them by hand or something charged with electrostatic.

Make sure to release the hook before disconnecting the connector with the hook.

Take care not to pinch up the wire and cable.

Use the original screws when reassembling the parts once disassembled.

If the types and the sizes of screws are not sure, Refer to the parts list.

#### (2)Storage and handling of the drum

Note the following when handling and storing the drum.

When detaching the drum unit, never expose the drum surface to strong direct light.

Store in the range of ambient temperature of -20 to 40 degree C(-4°F to 104°F) and ambient humidity of 85% RH or less. Wait more than 5 seconds between the power off and on. Avoid storing the drum unit in the place where the temperature and humidity may suddenly change even if these changes are within the tolerable range.

Avoid exposure to any substance which is harmful or may affect the quality of the drum.

Do not touch the drum surface with any object.

Make sure not to touch the drum surface with bare hands or gloves.

If the drum is touched by hands or stained with oil, clean it.

#### (3)Storage of the toner container

Store the toner container in a cool, dark place.

Do not place the toner container under direct sunshine or in a damp environment.



## 4 - 2 Maintenance parts

### (1)Maintenance kits

#### (1-1)100V

Maintenance part name		Qty	Part No.	Alternative parts No.
Name used in service manual	Name used in parts list			
MK-8725A (600,000 images)	MK-8725A/MAINTENANCE KIT		1702NH9JP0	072NH9JP
Drum unit K	DK-8720	1		
Developer unit K	DV-8720K(J)	1		
Primary transfer unit	TR-8720	1		
Secondary transfer roller	ROLLER SECONDLY TRANSFER SP	1		
Waste toner box	PARTS DISPOSAL UNIT(M3) SP	1		
Fuser unit	FK-8720	1		
Eject filter	FILTER TOP	3		
Left filter	FILTER LEFT SIDE	1		
Forwarding pulley/Paper feed pulley	PULLEY FEED	8		
Separation pulley	PULLEY RETARD	4		
MK-8725B (600,000 images)	MK-8725B/MAINTENANCE KIT		1702NH0UN0	072NH0UN
Drum unit	DK-8720	3		
Developer unit C	DV-8720C(J)	1		
Developer unit M	DV-8720M(J)	1		
Developer unit Y	DV-8720Y(J)	1		

#### (1-2)120V

Maintenance part name		Qty	Part No.	Alternative parts No.
Name used in service manual	Name used in parts list			
MK-8725A (600,000 images)	MK-8725A/MAINTENANCE KIT		1702NH7US0	072NH7US
Drum unit K	DK-8720	1		
Developer unit K	DV-8720K	1		
Primary transfer unit	TR-8720	1		
Secondary transfer roller	ROLLER SECONDLY TRANSFER SP	1		
Waste toner box	PARTS DISPOSAL UNIT(M3) SP	1		
Fuser unit	FK-8721	1		
Eject filter	FILTER TOP	3		
Left filter	FILTER LEFT SIDE	1		

Forwarding pulley/Paper feed pulley	PULLEY FEED	8		
Separation pulley	PULLEY RETARD	4		
MK-8725B (600,000 images)	MK-8725B/MAINTENANCE KIT		1702NH0UN0	072NH0UN
Drum unit	DK-8720	3		
Developer unit C	DV-8720C	1		
Developer unit M	DV-8720M	1		
Developer unit Y	DV-8720Y	1		

(1-3)220-240V

Maintenance part name		Qty	Part No.	Alternative parts No.
Name used in service manual	Name used in parts list			
MK-8725A (600,000 images)	MK-8725A/MAINTENANCE KIT		1702NH8NLO	072NH8NL
Drum unit K	DK-8720	1		
Developer unit K	DV-8720K	1		
Primary transfer unit	TR-8720	1		
Secondary transfer roller	ROLLER SECONDLY TRANSFER	1		
Waste toner box	PARTS DISPOSAL UNIT(M3) SP	1		
Fuser unit	FK-8722	1		
Eject filter	FILTER TOP	3		
Left filter	FILTER LEFT SIDE	1		
Forwarding pulley/Paper feed pulley	PULLEY FEED	8		
Separation pulley	PULLEY RETARD	4		
MK-8725B (600,000 images)	MK-8725B/MAINTENANCE KIT		1702NH0UN0	072NH0UN
Drum unit	DK-8720	3		
Developer unit C	DV-8720C	1		
Developer unit M	DV-8720M	1		
Developer unit Y	DV-8720Y	1		

**(2)Executing the maintenance mode after replacing the maintenance kit**

Execute the following maintenance modes after replacing the above maintenance kit.

Section	Mode No.	Maintenance item	MK-8725A	MK-8725B
Replacing settings	U119	Drum unit initial settings	○	○
	U140	Developer bias adjustment (AC Calib/Calibration)	○	○
	U469	Color printing position adjustment (Belt Initialize)	○	×
	U127	Checking/clearing the transfer counts	○	×

Section	Mode No.	Maintenance item	MK-8725A	MK-8725B
Image adjustment	U464	ID correction operation setting (Calib)	○	○
	U469	Color registration adjustment (Auto)	○	○
	U412	Adjusting the uneven density (Normal Mode)	○	○
	U464	ID correction operation setting (Calib)	○	○
	U410	Adjusting the halftone automatically	○	○
Maintenance	U251	Maintenance counter clear	○	○

## Items to perform after replacing the unit

### Drum unit

Section	Mode No.	Maintenance item	
Replacing settings	U119	Drum unit initial settings	○
	U140	Developer bias adjustment (AC Calib/Calibration)	○
Image adjustment	U464	ID correction operation setting (Calib)	○
	U469	Color registration adjustment (Auto)	○
	U412	Adjusting the uneven density (Normal Mode)	○
	U464	ID correction operation setting (Calib)	○
	U410	Adjusting the halftone automatically	○

### Developer unit

Section	Mode No.	Maintenance item	
Replacing settings	U140	Developer bias adjustment (AC Calib/Calibration)	○
Image adjustment	U464	ID correction operation setting (Calib)	○
	U469	Color registration adjustment (Auto)	○
	U410	Adjusting the halftone automatically	○

### Primary transfer unit

Section	Mode No.	Maintenance item	
Image adjustment	U464	ID correction operation setting (Calib)	○
	U469	Color registration adjustment (Auto)	○
	U410	Adjusting the halftone automatically	○

### Secondary transfer roller unit

Section	Mode No.	Maintenance item	
Replacing settings	U127	Checking/clearing the transfer counts	○

## Main charger roller

Section	Mode No.	Maintenance item	
Replacing settings	U930	Checking/clearing the main charger roller counts	○
Image adjustment	U464	ID correction operation setting (Calib)	○
	U410	Adjusting the halftone automatically	○

## 4 - 3 Maintenance parts replacement procedures

Replacement of the maintenance kit is required after 600,000 images. The message [Replace MK.] appears at the replacement timing.

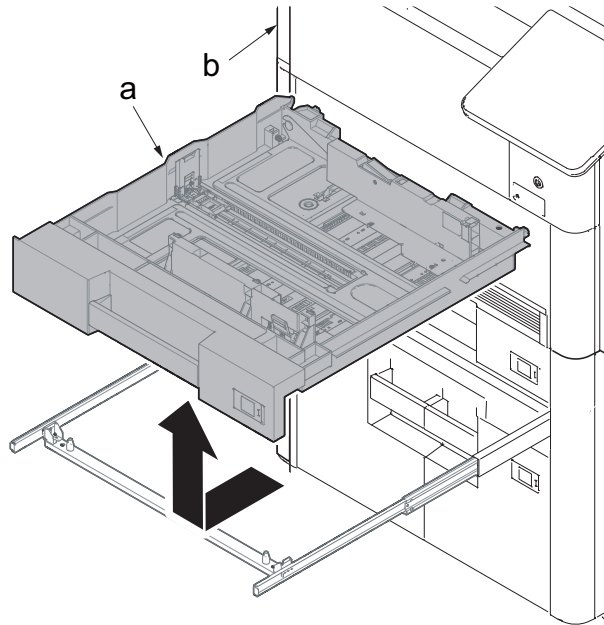
Execute maintenance mode U251 to reset the count after replacing the maintenance kit in the following procedures.

### (1) Cassette paper feed section

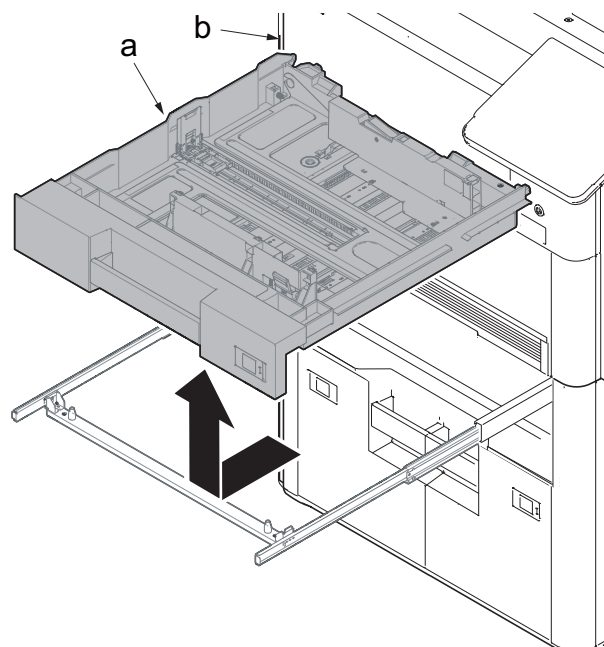
#### (1-1) Detaching and reattaching the forwarding pulley/paper feed pulley/separation pulley

#### Procedures

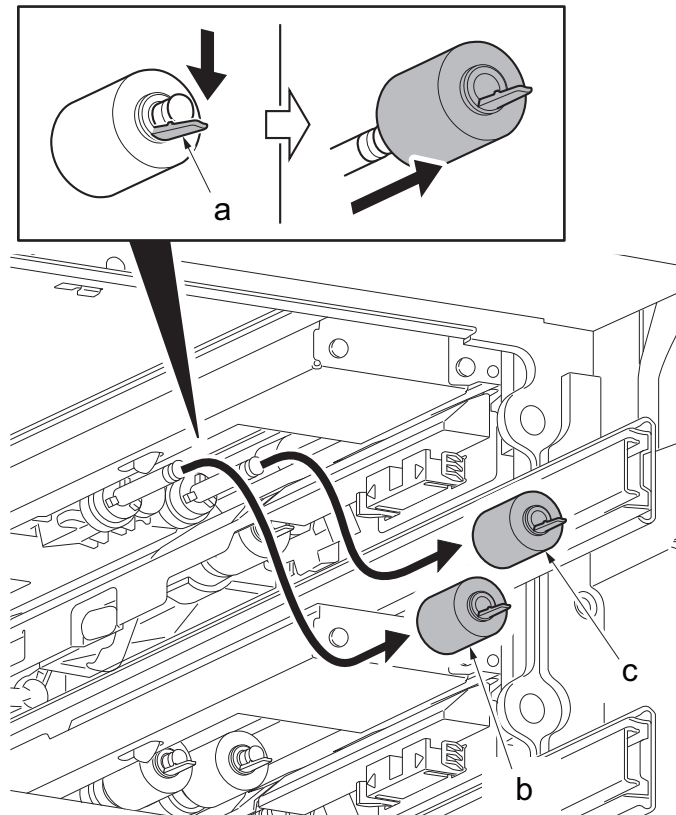
- 1 Pull out the lower cassette (a) from the main unit (b) and remove it in the direction of the arrow.



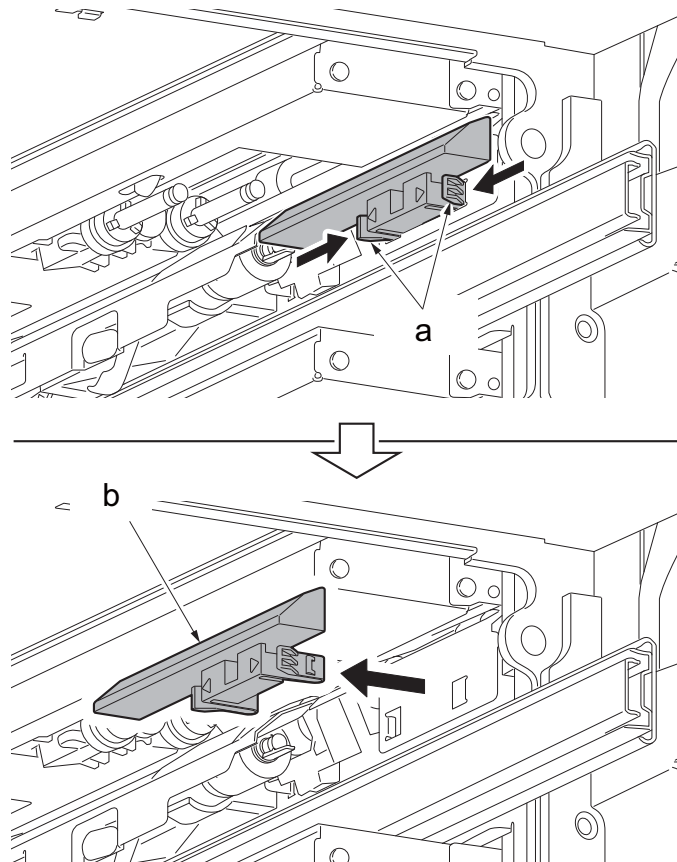
- 2 Pull out the upper cassette (a) from the main unit (b) and remove it in the direction of the arrow.



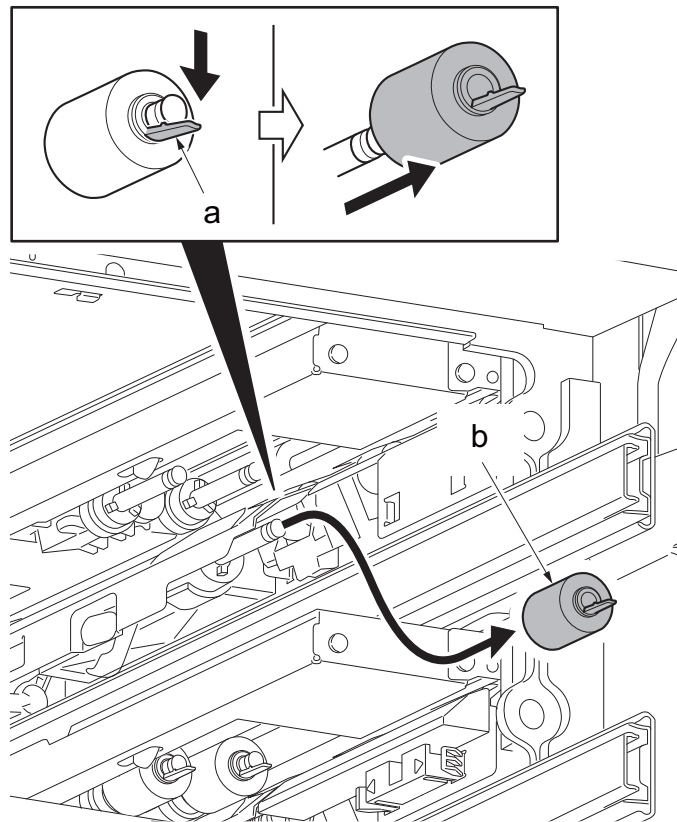
- 3 Release the hook (a) and remove the forwarding pulley (b) from the shaft.
- 4 Release the hook (a) and remove the paper feed pulley (c) from the shaft.



- 5 Release two hooks (a) and remove the cover (b).



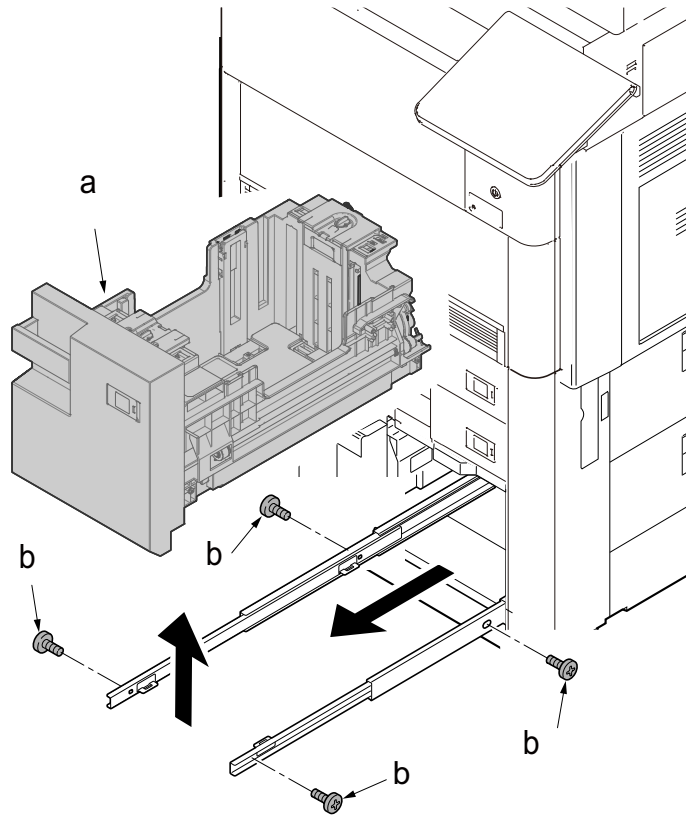
- 6 Release the hook (a) and remove the separation pulley (b) from the shaft.
- 7 Check that the contact between the paper feed pulley and separation pulley is released.
- 8 Clean or replace the forwarding pulley, paper feed pulley and separation pulley.
- 9 Reattach the forwarding pulley, paper feed pulley and separation pulley in the original position of the primary paper feed unit.
- 10 Attach them while checking the color of the collar. Forwarding pulley (Collar: white)  
Paper feed pulley (Collar: white) Separation pulley (Collar: black)



- 11 When replacing the forwarding pulley, paper feed pulley and separation pulley, execute U903 (Jam counter clear). (Refer [P.6-328](#)) Execute "Maintenance counter – cassette – cassette counter clear" in maintenance mode U251 (Maintenance counter set/clear). (Refer [P.6-207](#))

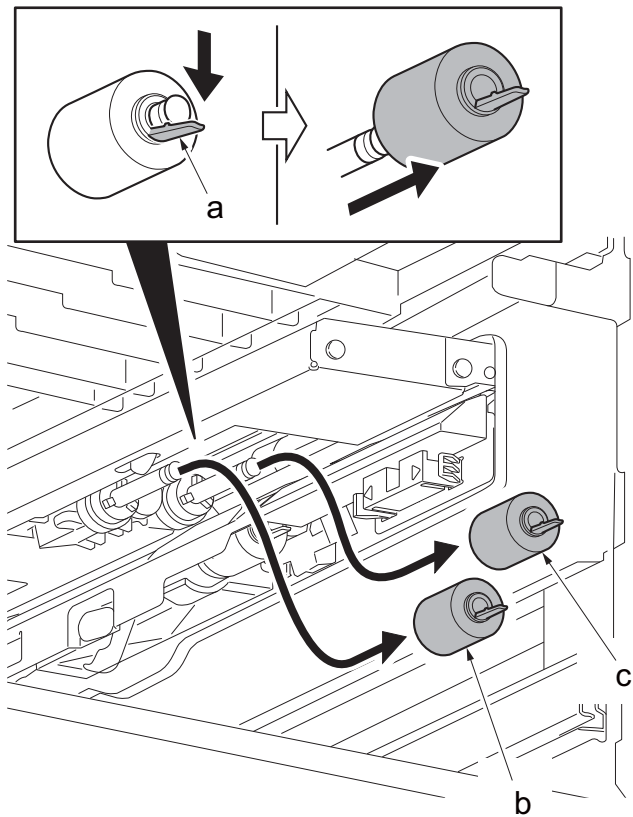
**(1-2) Detaching and reattaching the PF forwarding pulley (right)/PF paper feed pulley (right)/PF separation pulley (right)****Procedures**

- 1 Pull out the right paper cassette (a).**
- 2 Remove four screws (b)(M3x8) and detach the right paper cassette (a).**

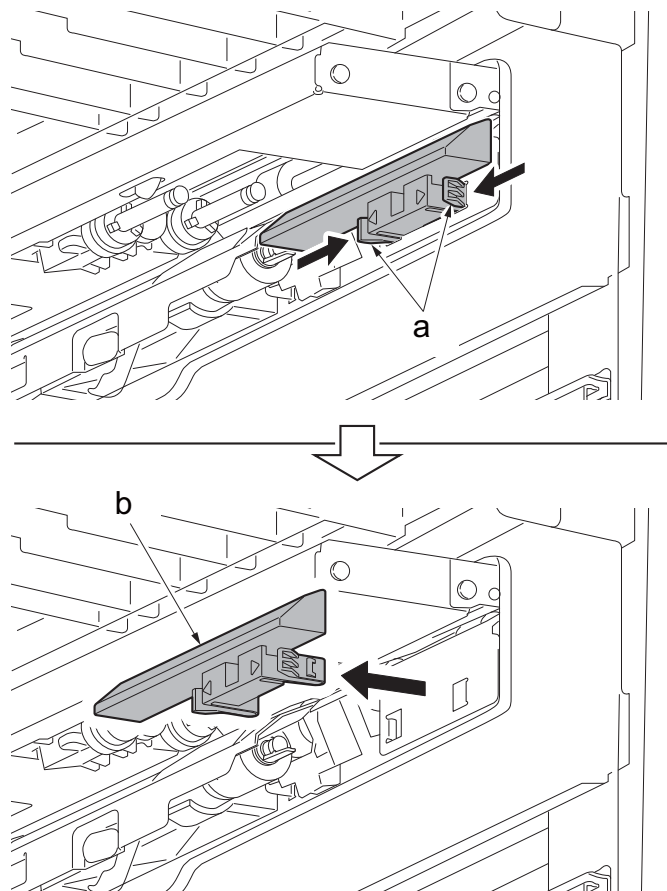




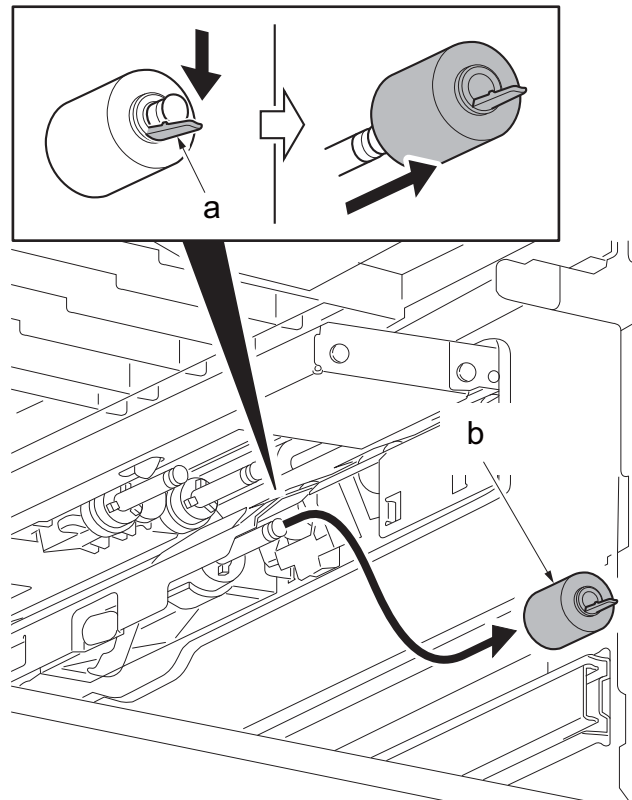
- 3 Release the hook (a) and remove the PF forwarding pulley (b)(right) from the shaft.
- 4 Release the hook (a) and remove the paper feed pulley (c) (right) from the shaft.



- 5 Release two hooks (a) and remove the cover (b).



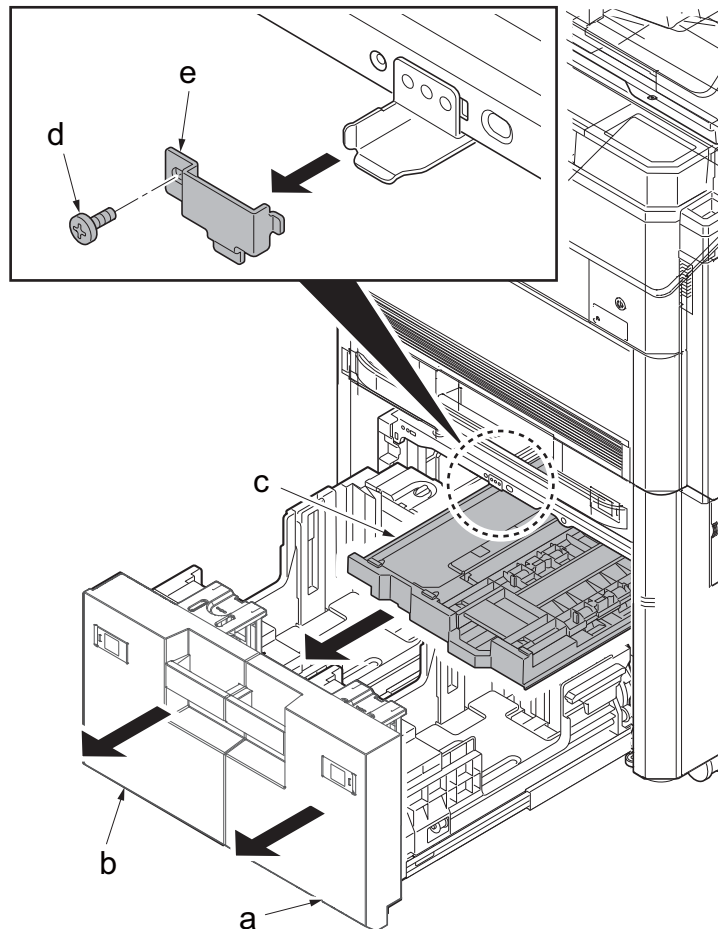
- 6 Release the hook (a) and remove the PF separation pulley (b)(right) from the shaft.
- 7 Check that the contact between the paper feed pulley and separation pulley is released.
- 8 Clean or replace the PF forwarding pulley (right), PF paper feed pulley (right) and PF separation pulley (right).
- 9 Reattach the PF forwarding pulley (right), PF paper feed pulley (right) and PF separation pulley (right) in the original position of the primary paper feed unit.
- 10 Attach them while checking the color of the collar. PF forwarding pulley (right) (Collar: white) PF paper feed pulley (right) (Collar: white) PF separation pulley (right) (Collar: black)



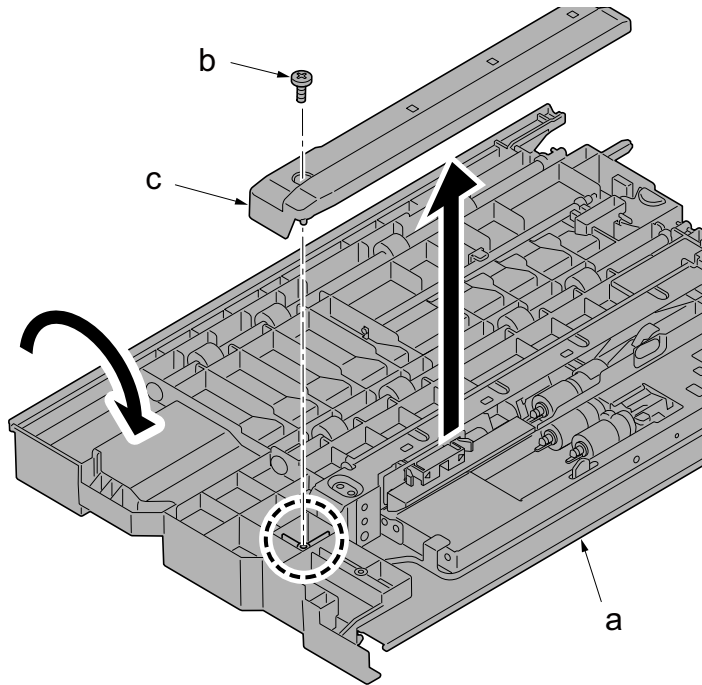
- 11 When replacing the PF forwarding pulley (right), PF paper feed pulley (right) and PF separation pulley (right), execute U903 (Jam counter clear). (Refer [P.6-328](#))
- 12 Execute "Maintenance counter – cassette –cassette counter clear" in maintenance mode U251 (Maintenance counter set/clear). (Refer [P.6-207](#))

**(1-3) Detaching and reattaching the PF forwarding pulley (left)/PF paper feed pulley (left)/PF separation pulley (left)****Procedures**

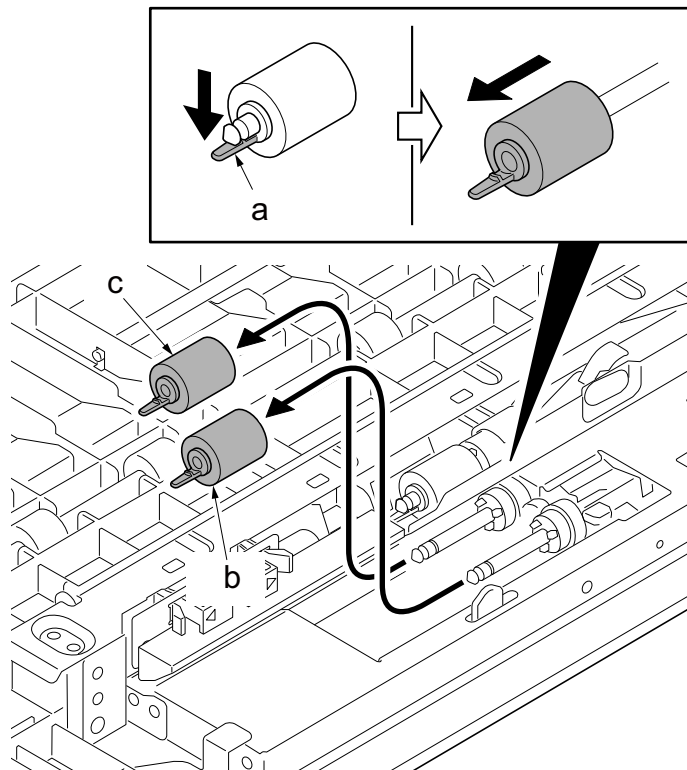
- 1** Pull out the right paper cassette (a) and left paper cassette (b).
- 2** Pull out the PF conveying unit (c).
- 3** Remove the screw (d)(M3x8) and then remove the stopper (e).
- 4** Detach the PF conveying unit (c).



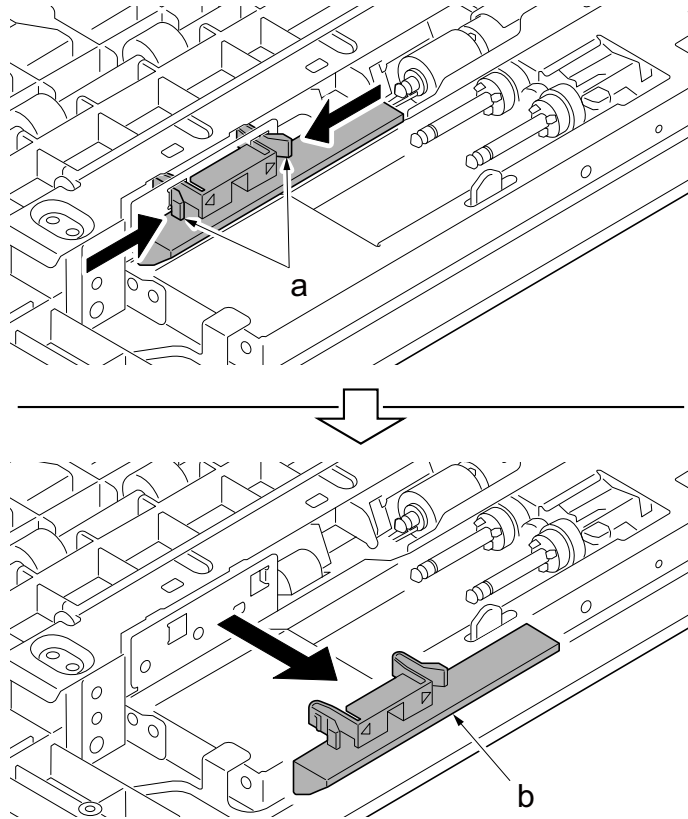
- 5 Turn over the PF conveying unit (a).
- 6 Remove the screw (b)(M3x8) and remove the cover (c).



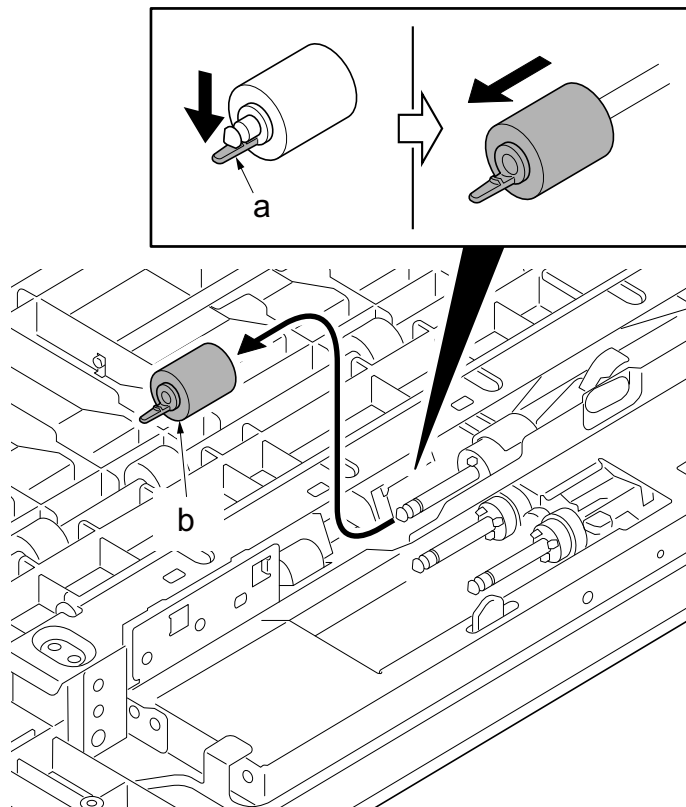
- 7 Release the hook (a) and remove the PF forwarding pulley (b) (left) from the shaft.
- 8 Release the hook (a) and remove the PF paper feed pulley (c) (left) from the shaft.



9 Release two hooks (a) and remove the cover (b).



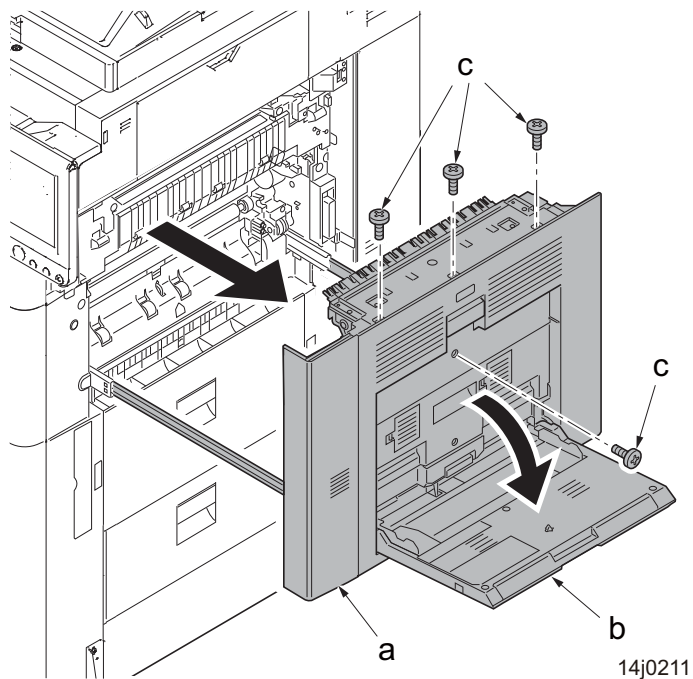
- 10 Release the hook (a) and remove the PF separation pulley (b) (left) from the shaft.
- 11 Clean or replace the PF forwarding pulley (left), PF paper feed pulley (left) and PF separation pulley (left).
- 12 Reattach the PF forwarding pulley (left), PF paper feed pulley (left) and PF separation pulley (left) in the original position of the primary paper feed unit.
- 13 Attach them while checking the color of the collar. PF forwarding pulley (left) (Collar: white) PF paper feed pulley (left) (Collar: white) PF separation pulley (left) (Collar: black)



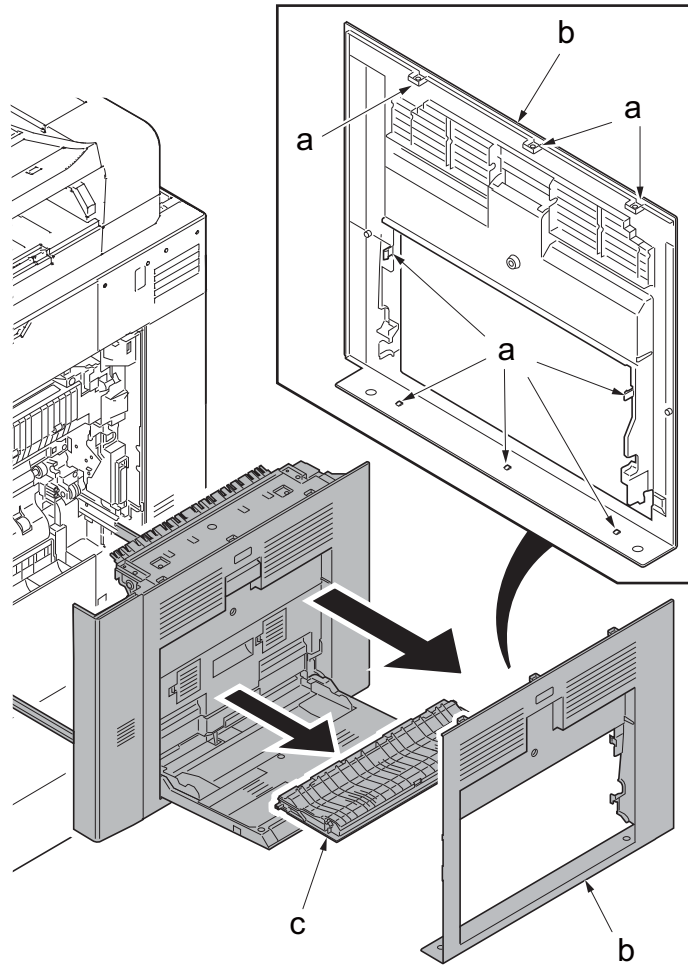
- 14 When replacing the PF forwarding pulley (left), PF paper feed pulley (left) and PF separation pulley (left), execute U903 (Jam counter clear). (Refer [P.6-328](#))
- 15 Execute "Maintenance counter – cassette –cassette counter clear" in maintenance mode U251 (Maintenance counter set/clear). (Refer [P.6-207](#))

**(2)MP paper feed section****(2-1)Detaching and reattaching the MP tray paper feed unit****Procedures**

- 1** Pull out the conveying unit (a).
- 2** Open the MP tray (b).
- 3** Remove four screws (a)(M4x8).

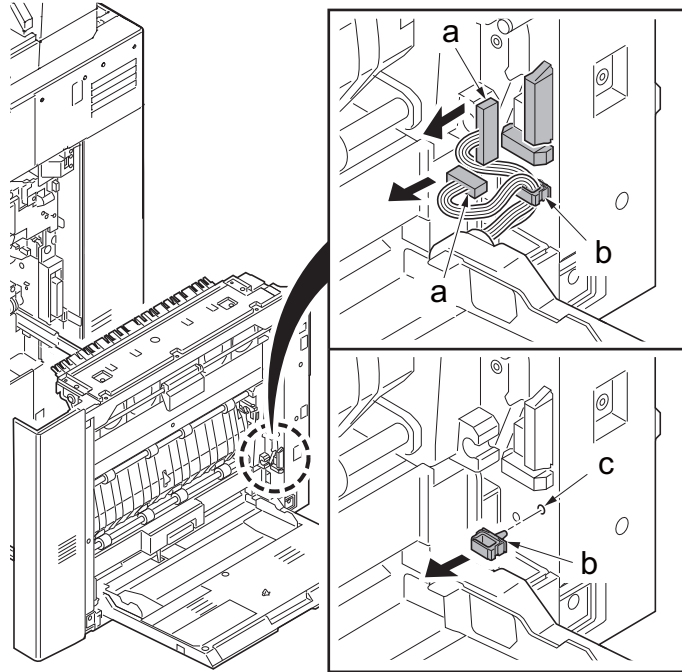


**4 Release eight hooks (a). And then remove the right cover (b) and DU cover assembly (c).**

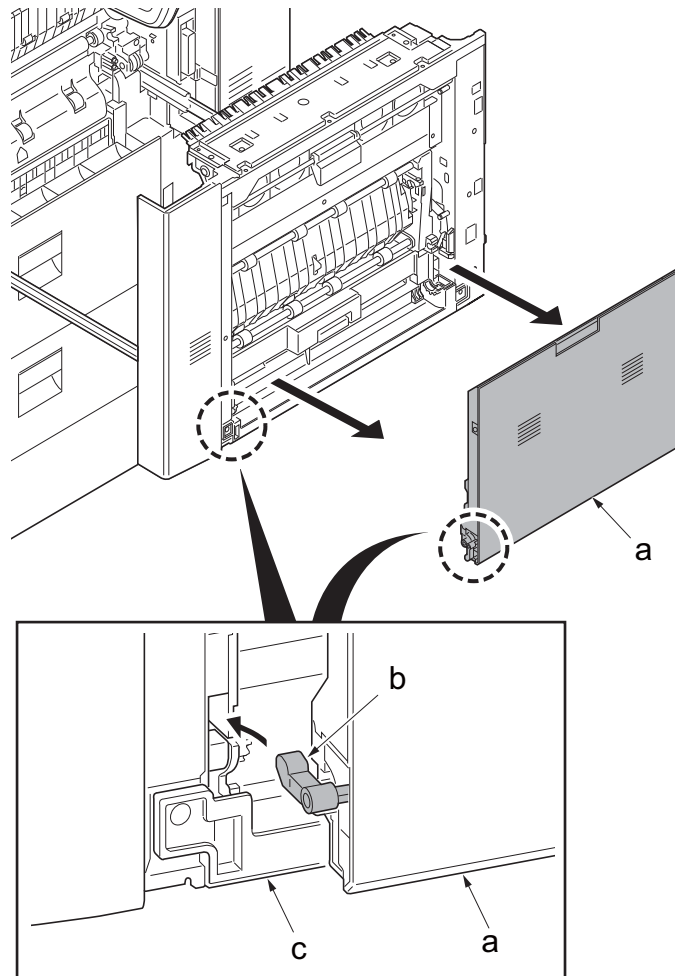




- 5 **Disconnect two connectors (a).**
- 6 **Release the wire saddle (b).**
- 7 **Remove the wire saddle (b).**
- 8 **Check if the mounting hole (c) is in the original position when reattaching it.**

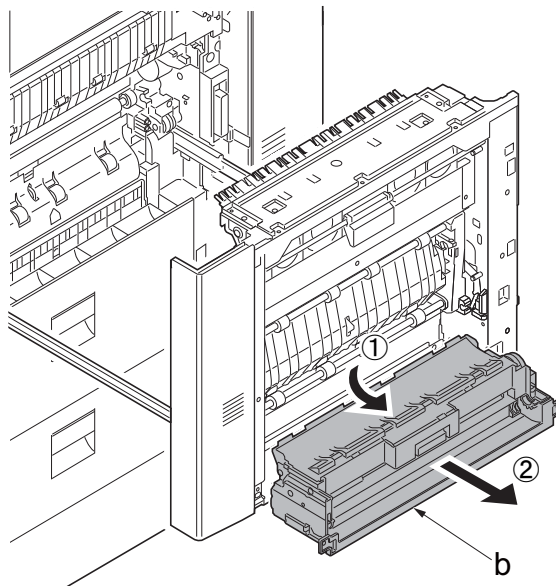
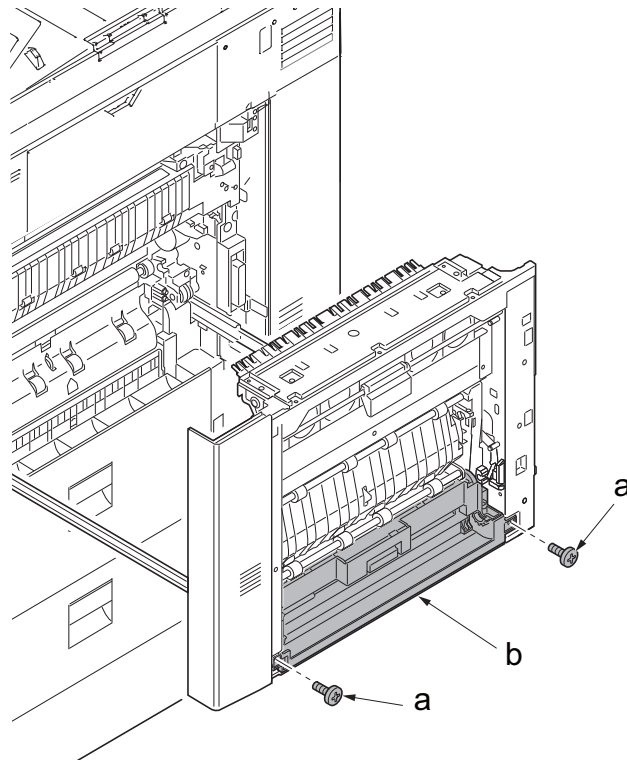


- 9 Detach the MP tray (a).
- 10 When reattaching the MP tray (a), rotate the lift arm (b) and insert it to the side of the MP tray paper feed unit (c).



**11** Remove two screws (a)(M4x8).

**12** Remove the MP tray paper feed unit (b).



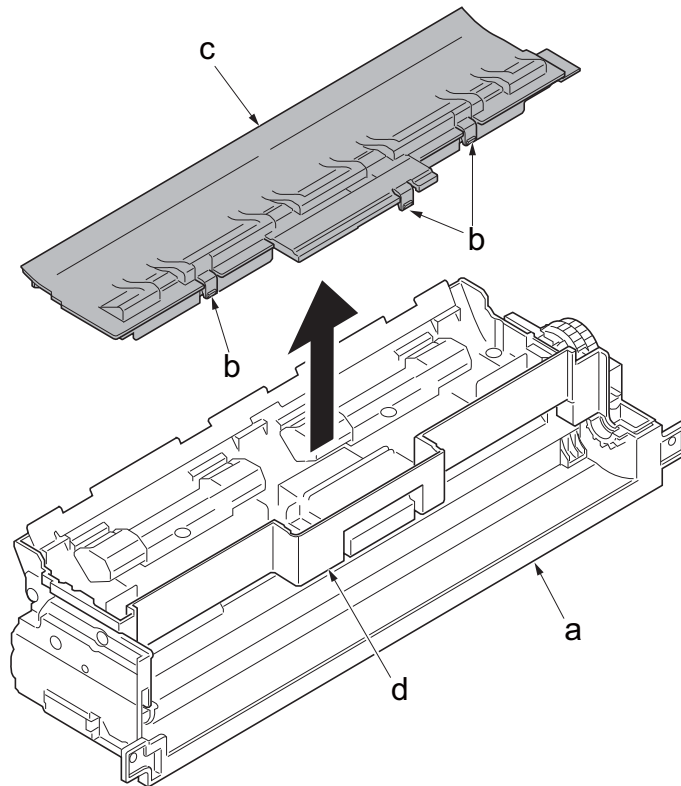
## (2-2) Detaching and reattaching the MP forwarding pulley/MP paper feed pulley/MP separation pulley

### Procedures

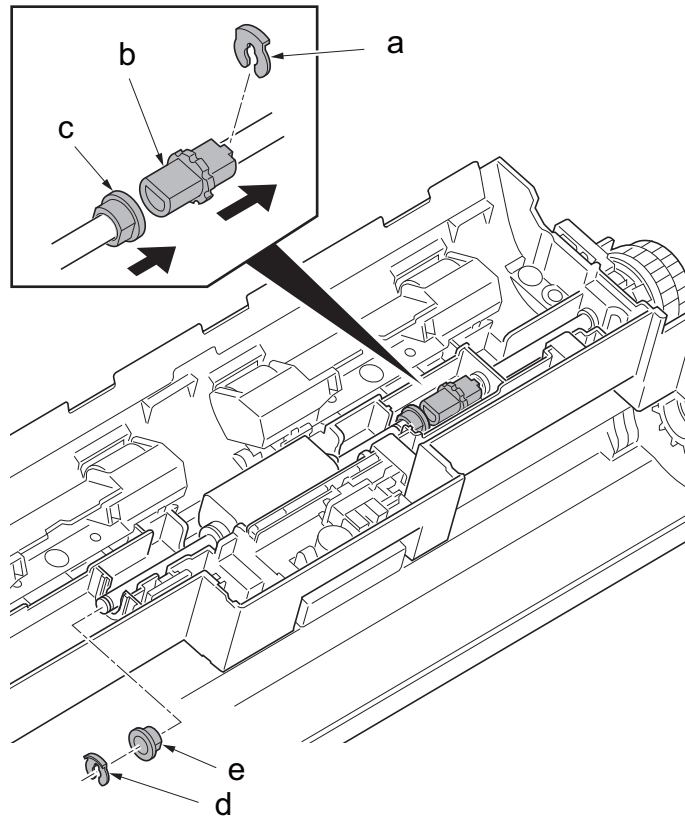
- 1 Detach the MP tray paper feed unit (a).

### Detaching the forwarding pulley and paper feed pulley

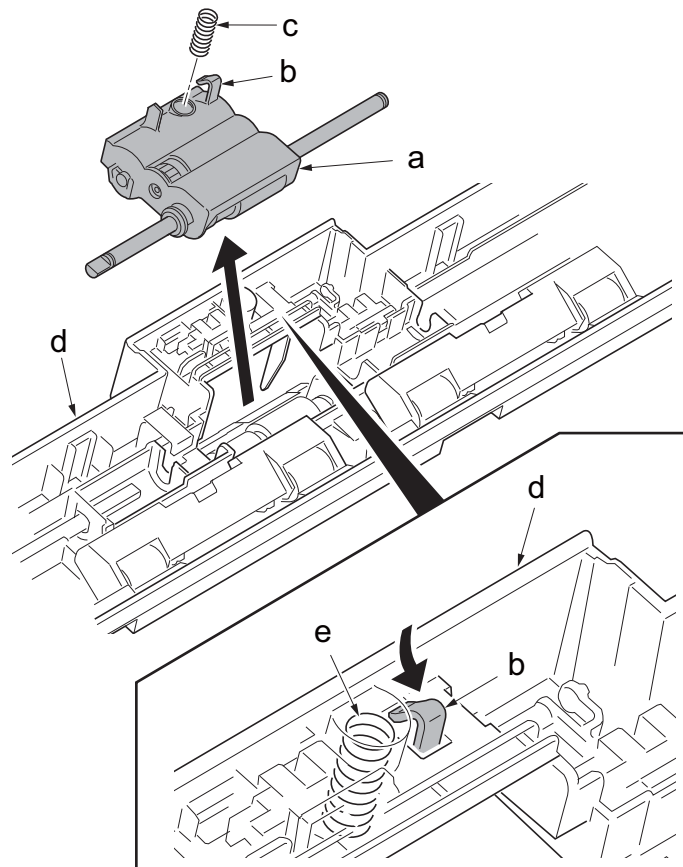
- 1 Release three hooks (b) and remove the DU lower guide (c).
- 2 Remove the DU lower guide easily by bending the top base (d) that the hook is hooking because the hook of the DU lower guide lacks flexibility.



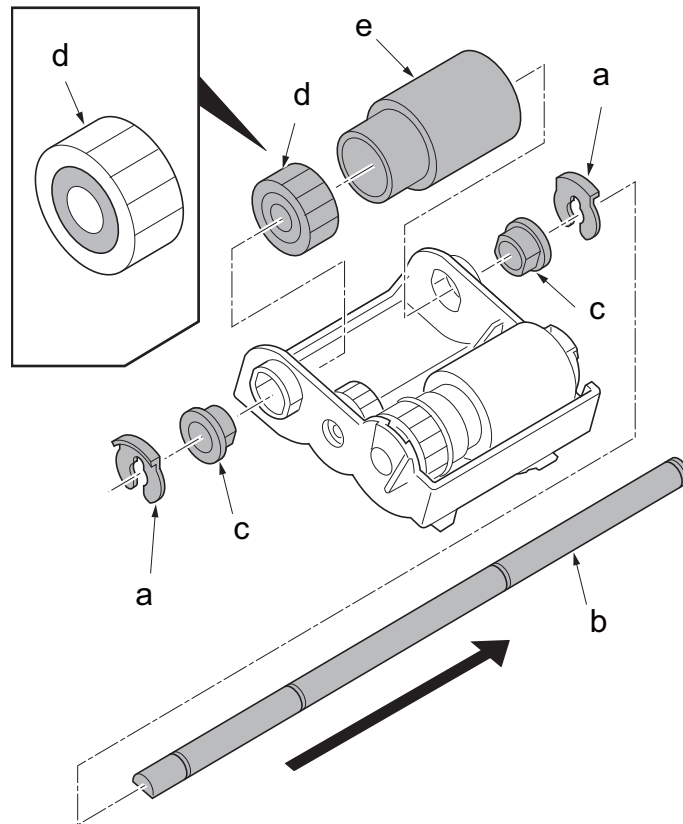
- 3 Remove the stop ring A (a) and slide the drive joint (b).
- 4 Slide the bushing A (c).
- 5 Remove the stop ring B (d) and remove the bushing B (e).



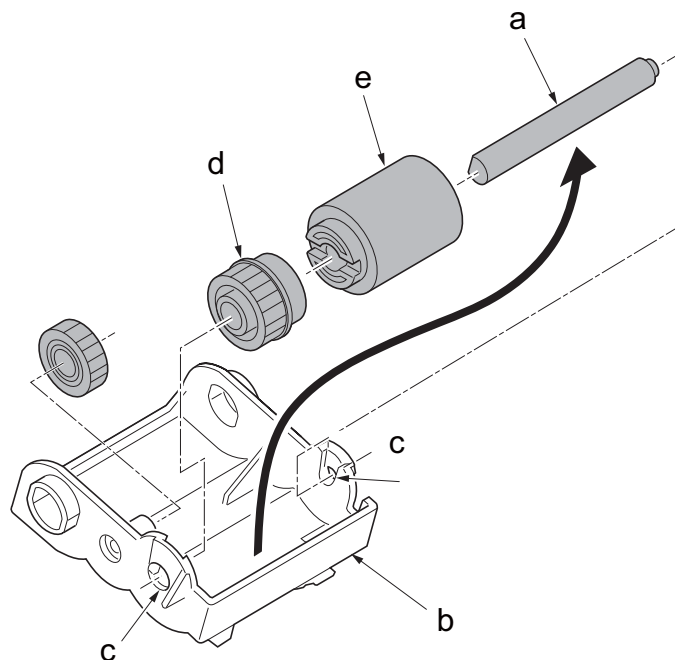
- 6 Release the hook (b) of the feed holder assembly (a).
- 7 Remove the spring (c) and feed holder assembly (a) from the upper base (d).



- 8 Remove the stop ring (a).
- 9 Pull out the feed MPF shaft (b).
- 10 Remove two bushings (c), one way gear Z30R (d) and MP paper feed pulley (e).  
When reattaching the one way gear Z30R (d), be aware of the attachment direction.

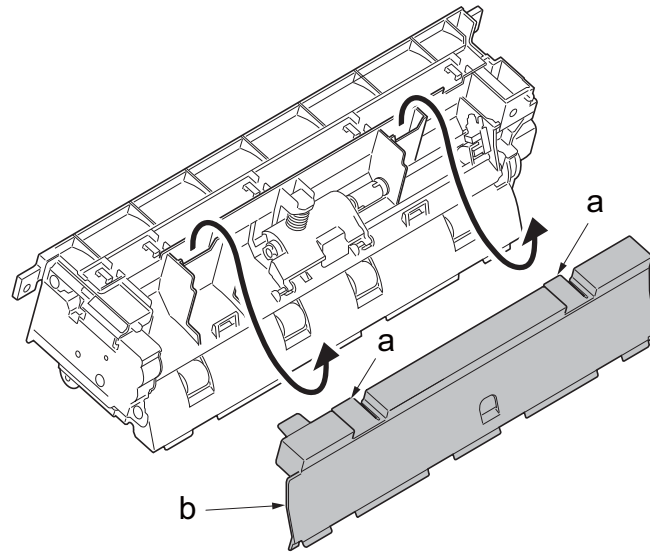


- 11 Remove the pickup MPF shaft (a) from the shaft hole (c) of the MPF holder (b).
- 12 Remove the pickup gear Z30R (d) and MP forwarding pulley (e) from the pickup MPF shaft (a).

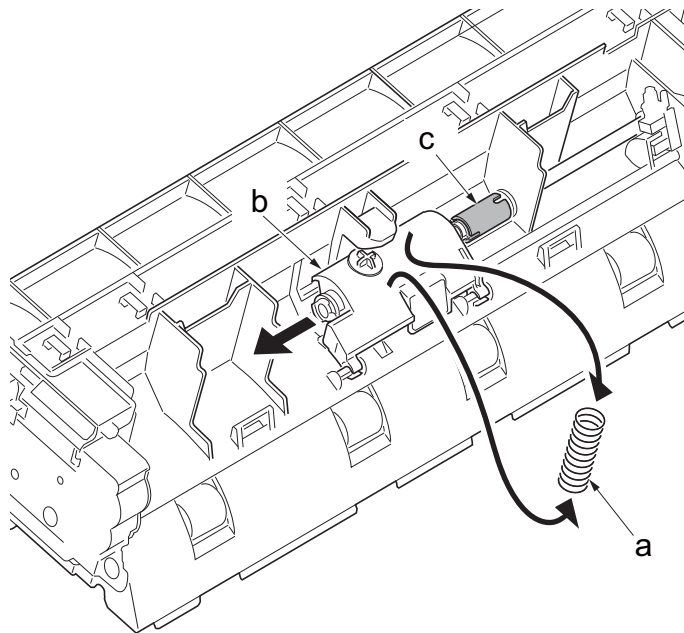


## Detaching the MP separation pulley

- 1 Release two hooks (a) and remove the middle guide (b).

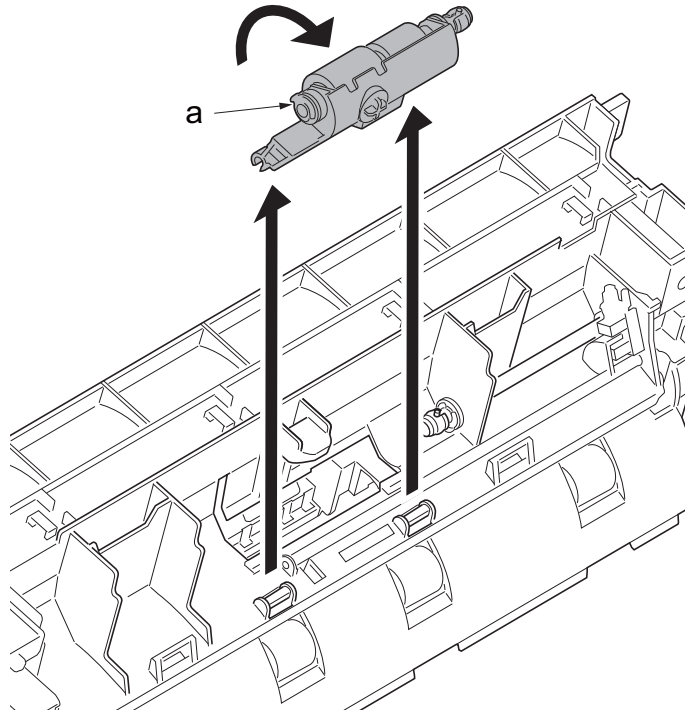


- 2 Remove the spring (a).
- 3 Slide the retard holder assembly (b) and disconnect the connection of the joint (c).

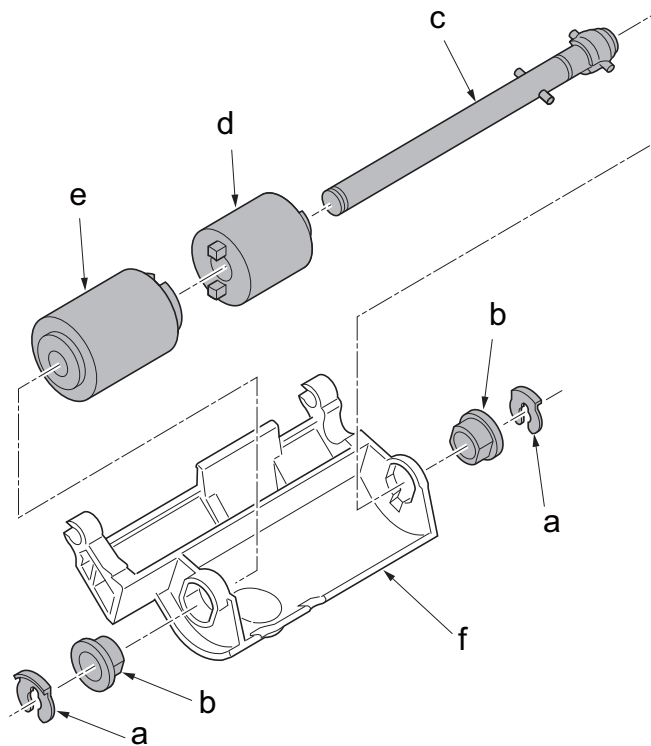




**4** Rotate the retard holder assembly (a) to remove it.

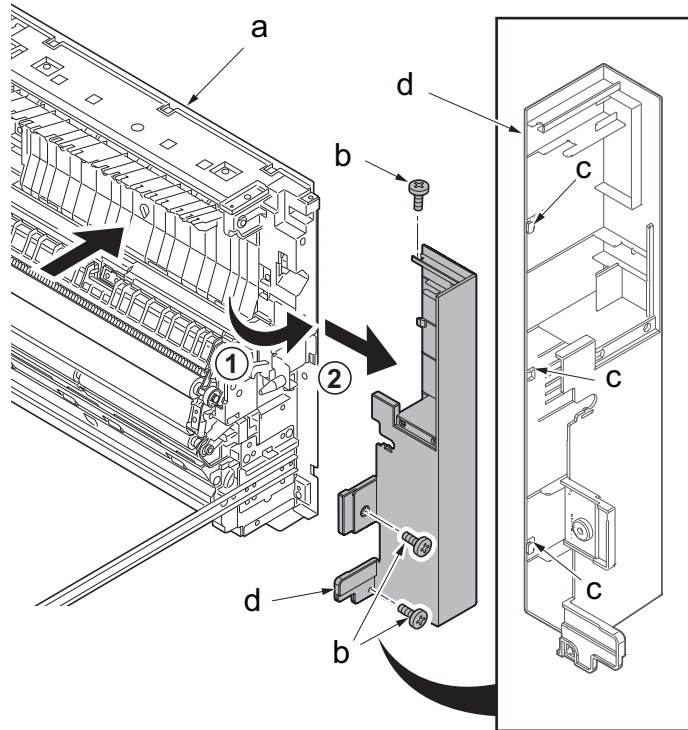


- 5 Remove two stop rings (a).
- 6 Remove two bushings (b).
- 7 Pull out the retard MPF shaft (c) from the retard holder (f), and remove the torque limiter (d) and MP separation pulley (e).
- 8 Clean or replace the MP forwarding pulley, MP paper feed pulley and MP separation pulley.
- 9 Reattach the MP forwarding pulley, MP paper feed pulley and MP separation pulley in the original position of the MP tray paper feed unit.
- 10 When replacing the MP forwarding pulley, MP paper feed pulley and MP separation pulley, execute U903 (Jam counter clear).

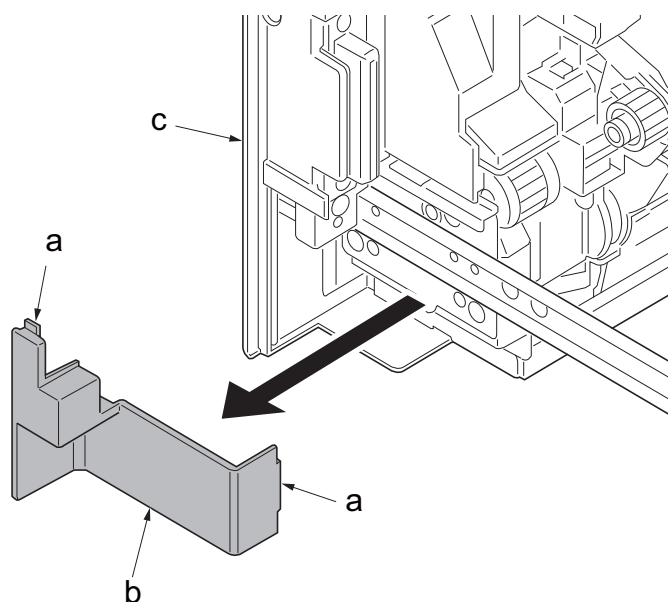


**(3)Transfer section****(3-1)Detaching and reattaching the conveying unit****Procedures**

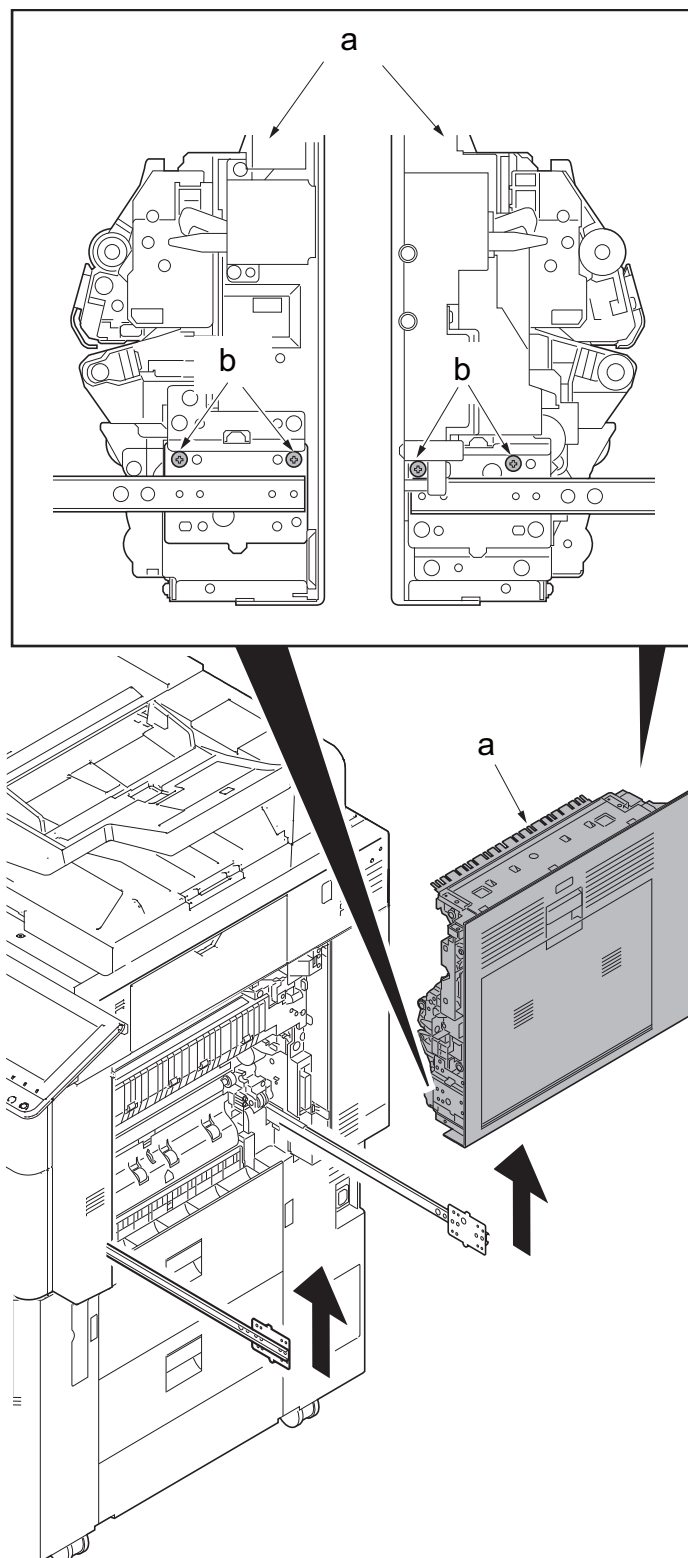
- 1** Pull out the conveying unit (a).
- 2** Remove three screws (b)(M4x8).
- 3** Release three hooks (c) and remove the front right cover (d).



- 4** Release two hooks (a). And then remove the conveying inner cover (b) from the conveying unit (c).

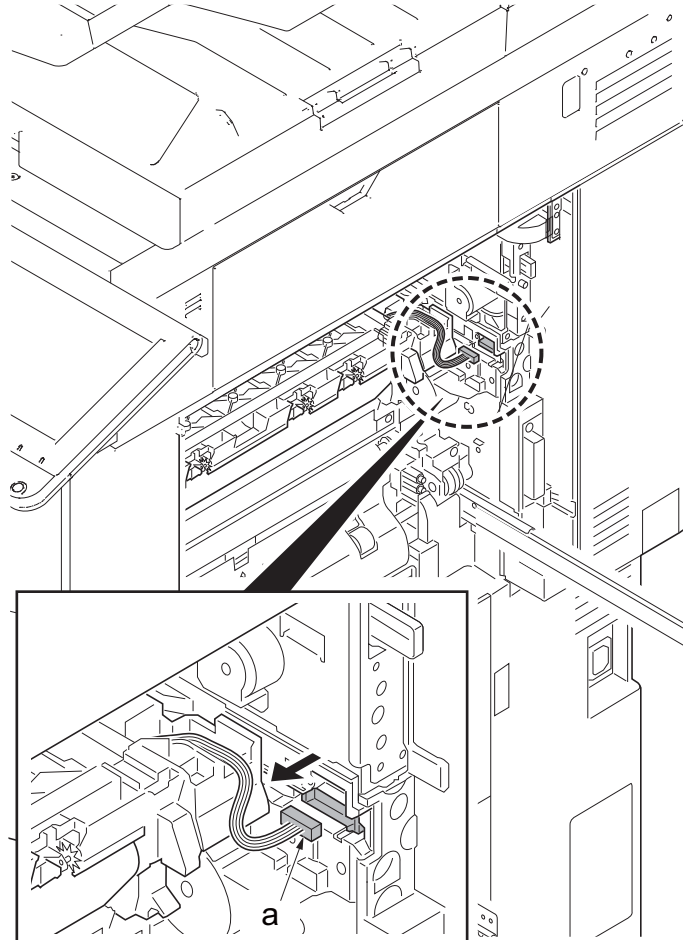


- 5 Remove four screws (a)(M4x8).
- 6 Lift up the conveying unit (b) and remove it.

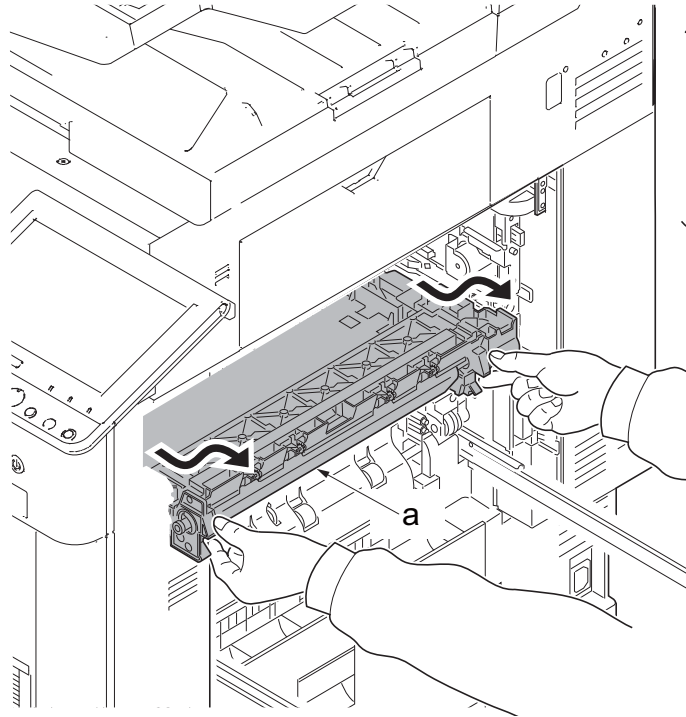


**(3-2) Detaching and reattaching the primary transfer unit****Procedures**

- 1 Detach the conveying unit.**
- 2 Detach the fuser unit.**
- 3 Disconnect the connector (a).**



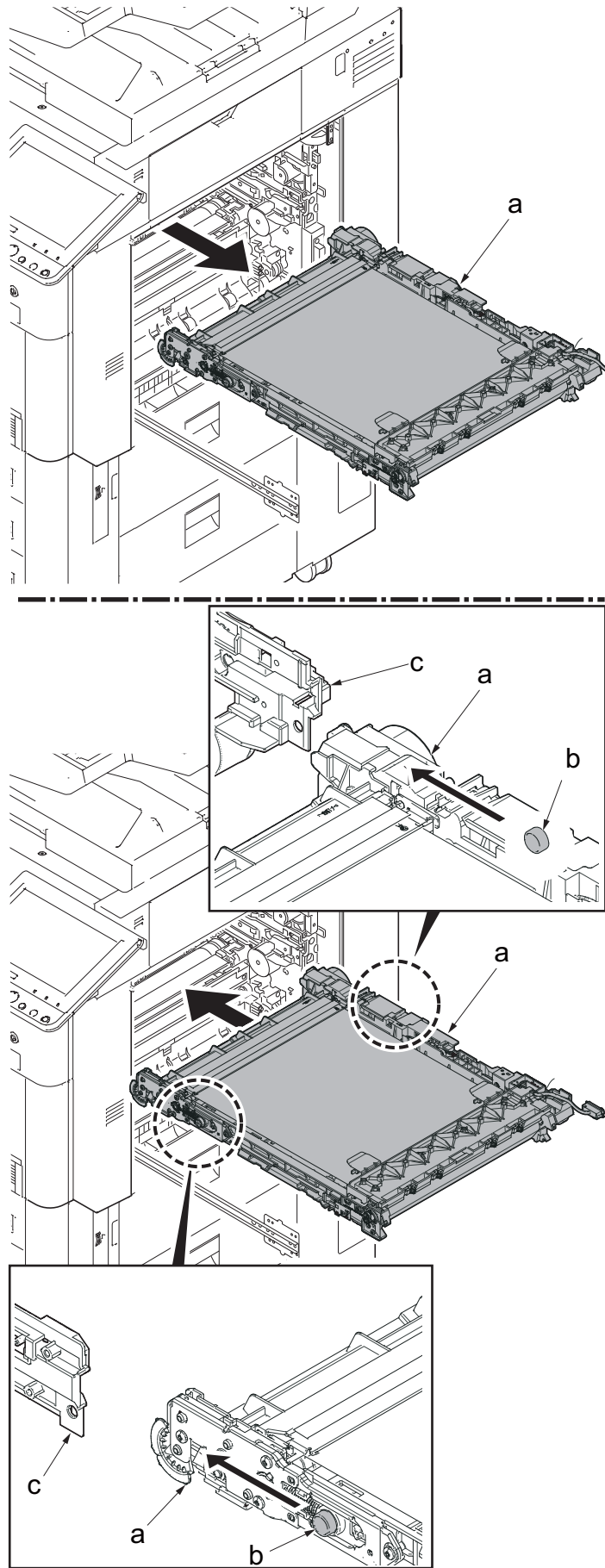
- 4** Lift up the both side edge of the primary transfer unit (a) and pull out it.



- 5** Detach the primary transfer unit (a).

- 6** Check or replace the primary transfer unit (a), and then reattach the parts in the original position.

When reattaching the primary transfer unit (a), set the projected part (b) aligned with the rail entrance (c). Hold the primary transfer unit (a) at its both ends, and insert slowly all the way in, and then press firmly into the main unit.



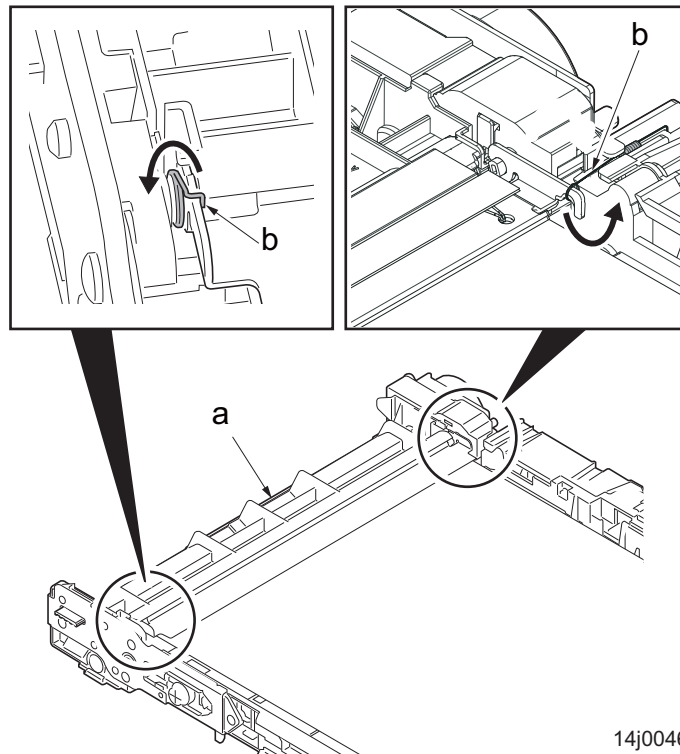
## 7 Execute the following procedures when replacing the primary transfer unit to the new unit.

- 1 Execute maintenance mode U469 (Transfer belt speed correction). (Refer [P.6-272](#))
- 2 Execute maintenance mode U464 (Calibration). (Refer [P.6-263](#))
- 3 Execute maintenance mode U469 (Auto color registration correction). (Refer [P.6-272](#))
- 4 Execute maintenance mode U410 (Auto halftone adjustment). (Refer [P.6-240](#))

### (3-3) Detaching and reattaching the cleaning pre-brush

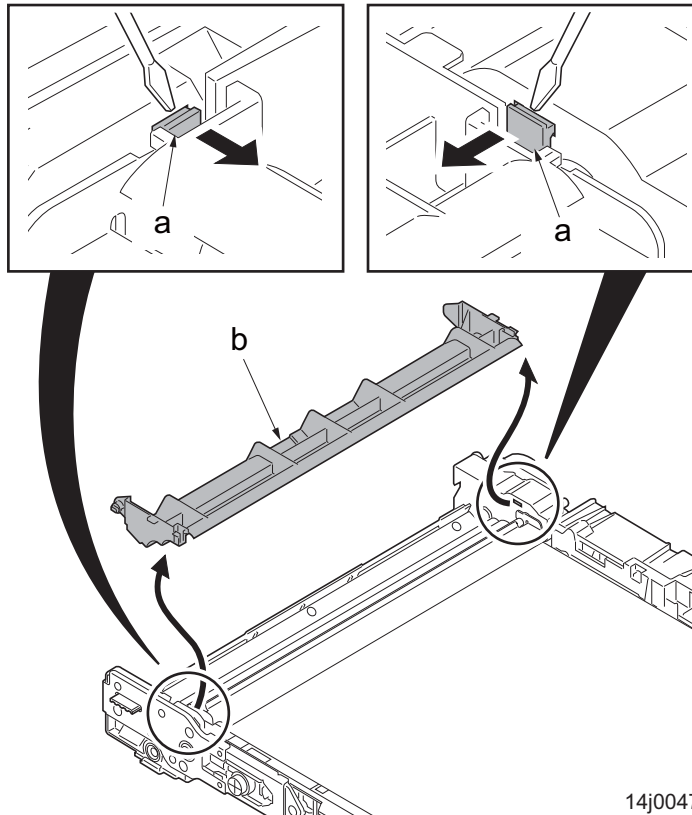
#### Procedures

- 1 Detach the primary transfer unit (a).
- 2 Release the hook of the front spring (b).
- 3 Remove the rear pre-bias spring (c)

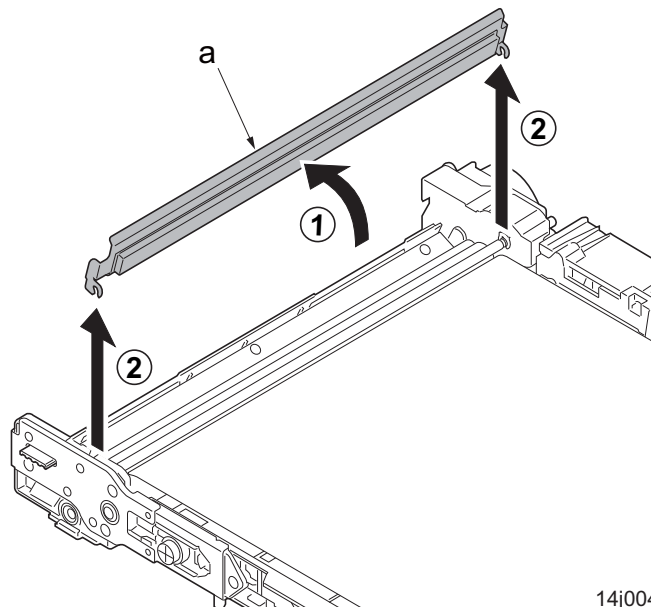


14j0046



**4 Release two hooks (a) and remove the cleaning cover (b).**

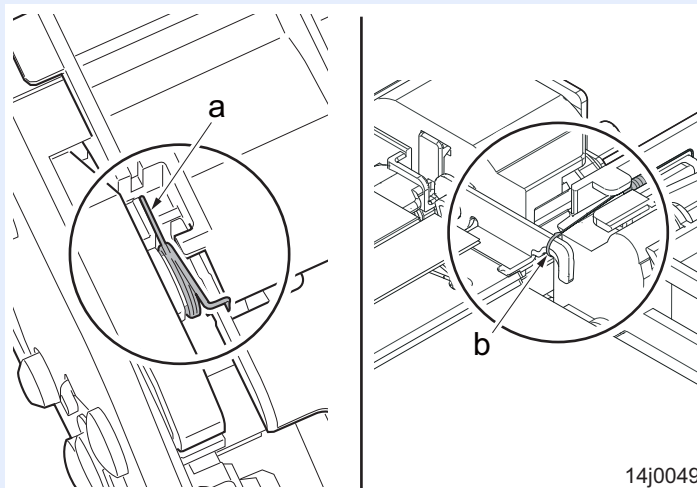
14j0047

**5 Rotate the cleaning pre-brush (a) as shown in the figure, and remove it.****6 Check or replace the cleaning pre-brush (a), and then reattach the parts in the original position.**

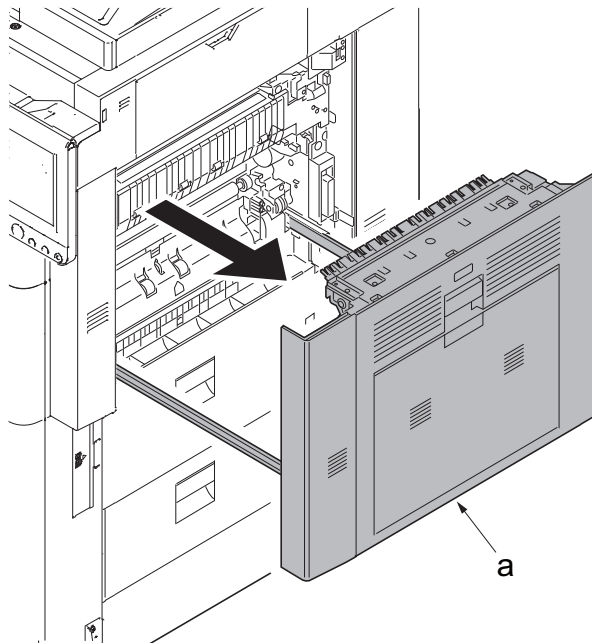
14j0048

 **NOTE**

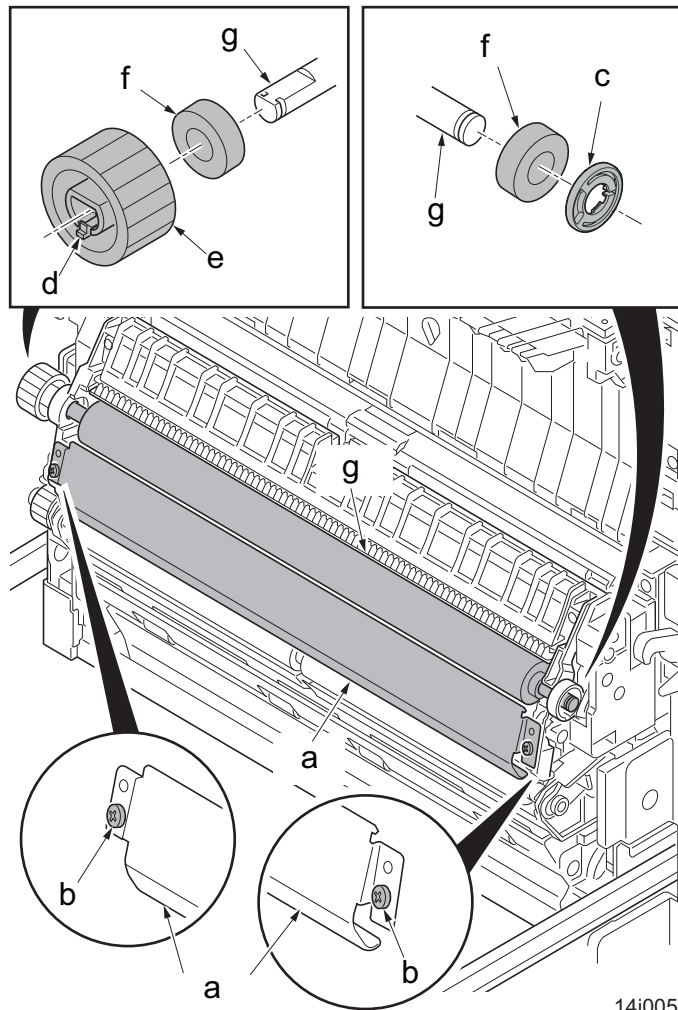
When installing, hook the front and rear springs (a) removed in procedure 2 in place onto the cleaning pre-brush.

**(3-4) Detaching and reattaching the secondary transfer roller unit****Procedures**

- 1 Pull out the conveying unit (a).**



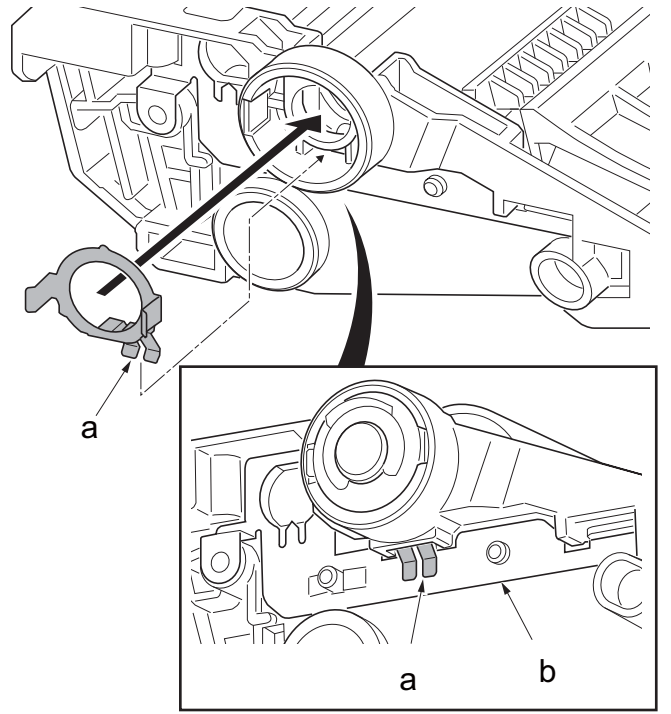
- 2 Loosen two screws (b)(M3x8) of the TC guide (a).
- 3 Remove the stop ring (c).
- 4 Release the hook (d) and remove the TC gear Z29R (e).
- 5 Remove two bearings (f).
- 6 Remove the secondary transfer roller (g).



14j0051

- 7 Check or replace the secondary transfer roller, and then reattach the parts in the original position.

When refitting the secondary transfer roller, confirm that the terminal (a) of the ground plate is in contact reliably with the ground plate (b) in the frame.



14j0052

## 8 Execute the following procedures when replacing the secondary transfer roller to the new one.

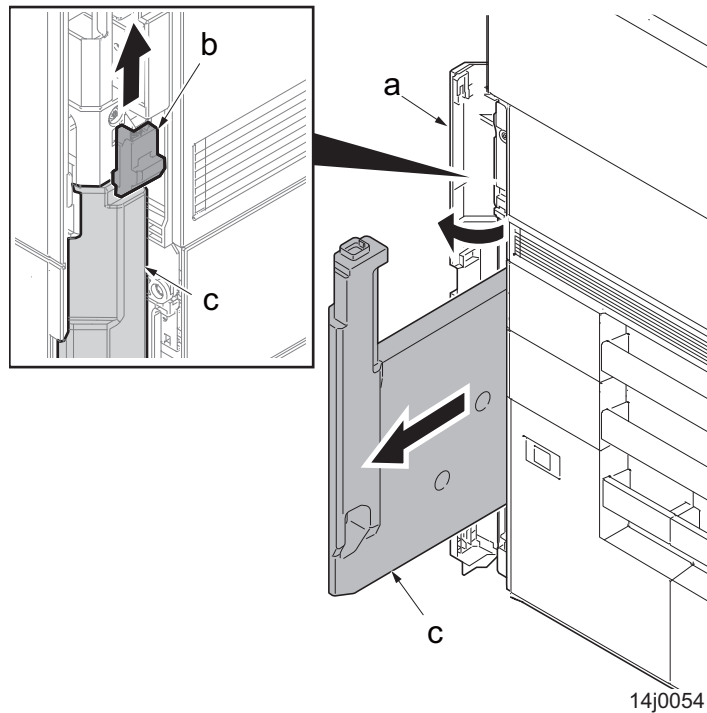
- 1 Execute maintenance mode U127 (Transfer counter clear). (Refer [P.6-129](#))
- 2 Execute maintenance mode U464 (Calibration). (Refer [P.6-263](#))
- 3 Execute maintenance mode U469 (Auto color registration correction). (Refer [P.6-272](#))
- 4 Execute maintenance mode U410 (Auto halftone adjustment). (Refer [P.6-240](#))

### (4)Developer section/Drum section

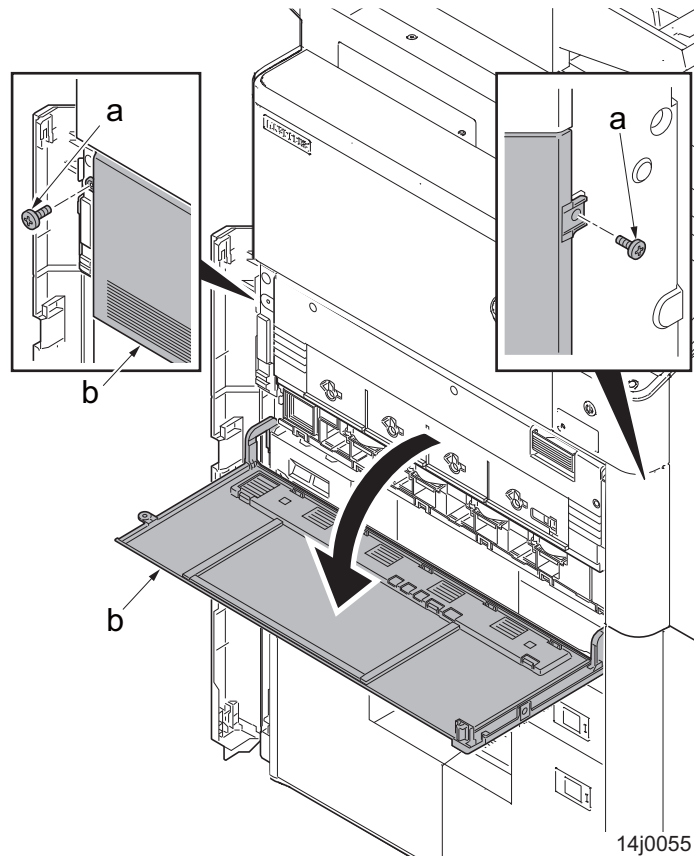
#### (4-1)Detaching and reattaching the inner unit

##### Procedures

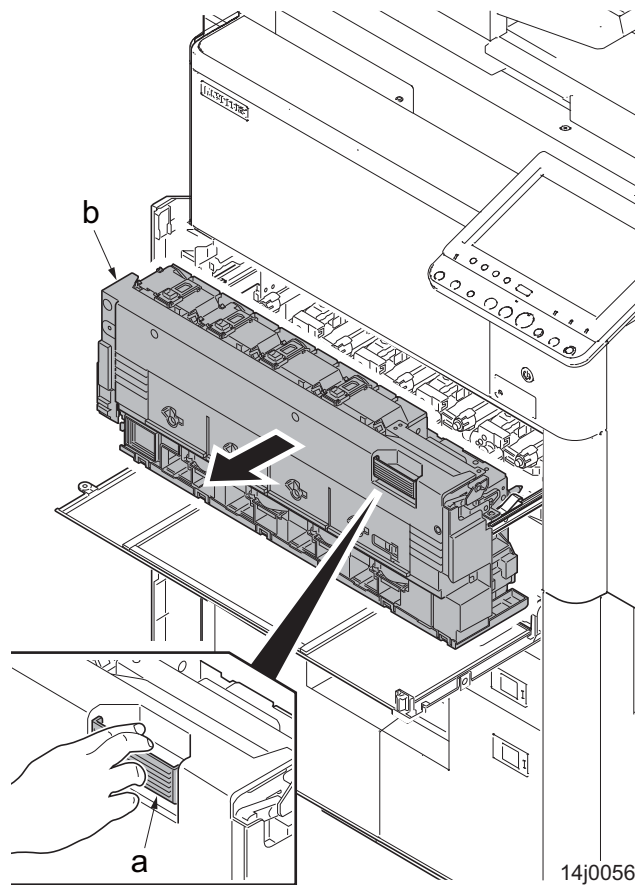
- 1 Open the waste toner box cover (a).
- 2 Lift up the lever (b) and remove the waste toner box (c).



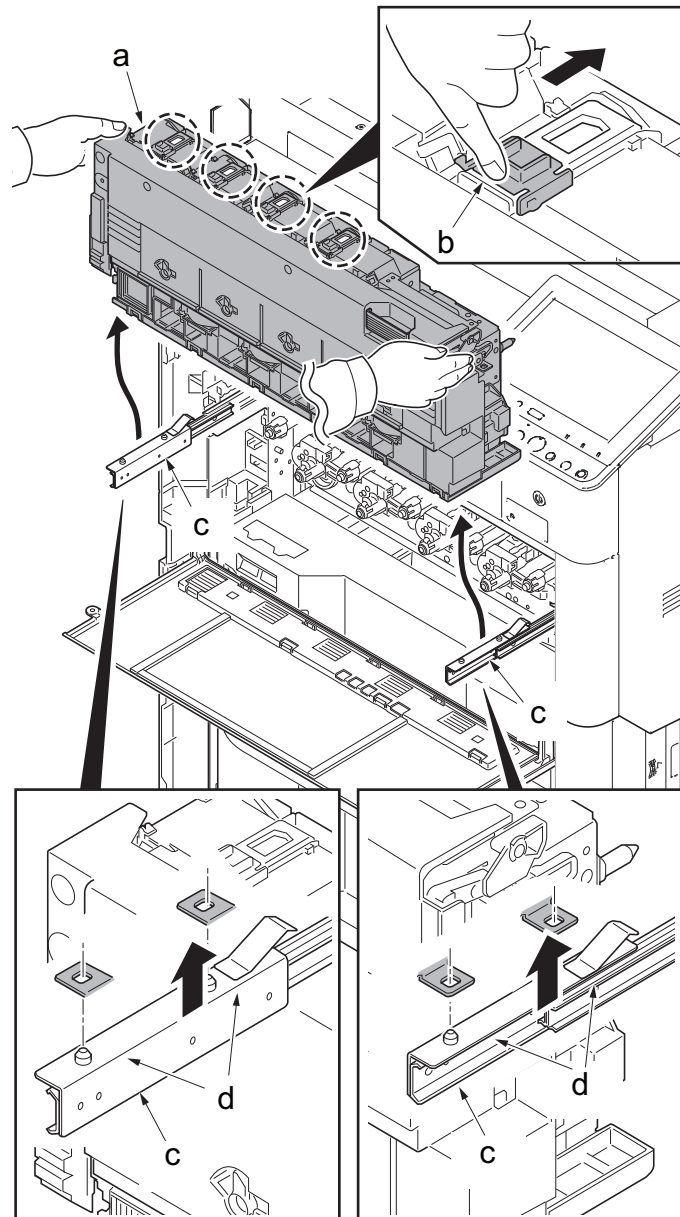
- 3 Pull out the conveying unit.
- 4 Remove two screws (a)(M4x8) and open the front middle cover (b).
- 5 Unlock the developer waste exit that was locked. (Refer [P.2-15](#))



- 6** Pull the lock lever (a) to release the lock of the inner unit (b) and then pull out the inner unit (b).



- 7 Close the four toner supply shutters (b) of the inner unit (a).
- 8 Lift the inner unit (a) and take it off from the pins (d) at the both sides of the slider rail (c).



14j0057



**✔ IMPORTANT**

When inserting the inner unit (a), make sure to close it by simultaneously pressing both sides

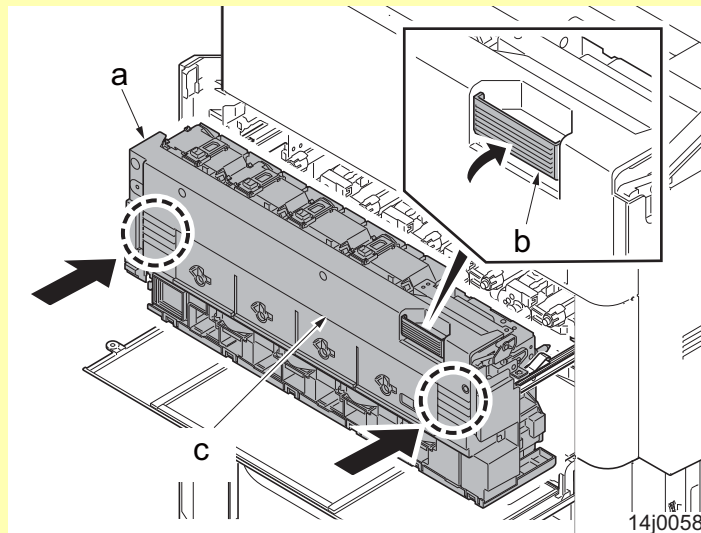
After inserting the inner unit, make sure that the lock lever (b) is parallel with the inner unit cover (c). If not, remove the inner unit out once again and then try inserting properly.

Failure to properly insert, it may result in defective printing or difficulty locking the developer unit in place.

Be sure to lock the developer waste exit after the inner unit has been installed.

The waste toner box must be installed following the installation of the inner unit.

Otherwise, the waste exit shutter may be damaged or the waste toner paths may be clogged.

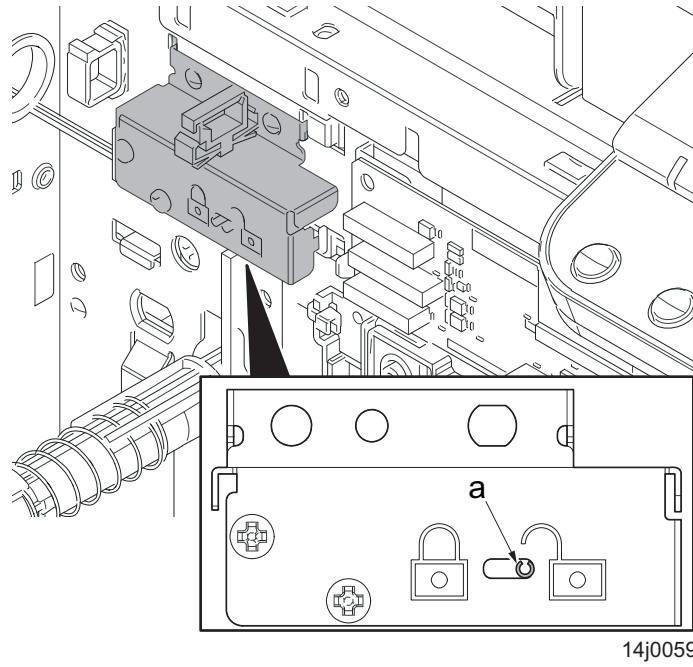
**(4-2) Detaching and reattaching the developer unit and drum unit**

Detaching example: Developer unit Y and Drum unit Y

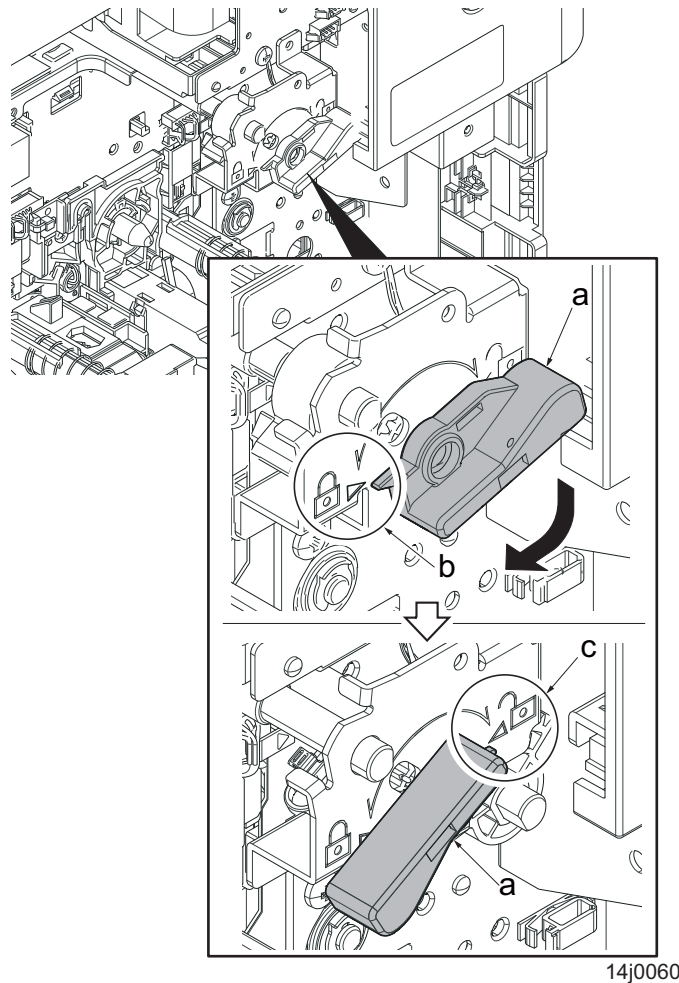
**Procedures**

- 1 Detach the inner unit.**
- 2 Check that the three colors unit are released.**

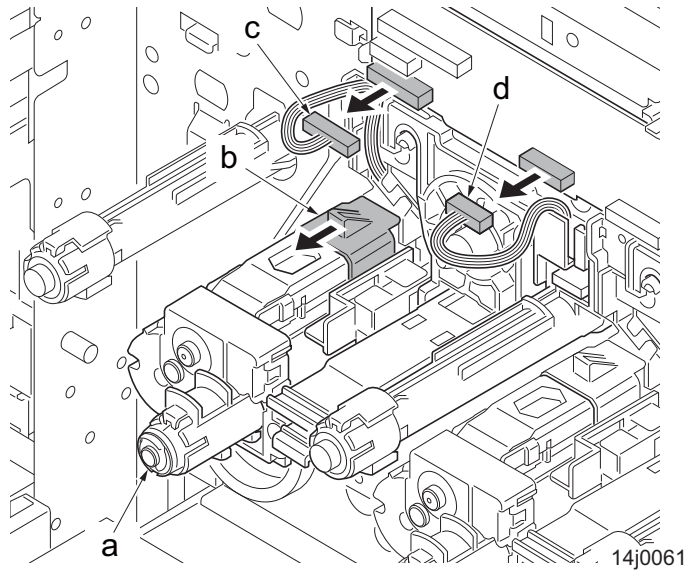
(The pin position of the release solenoid (a) must have come to the right.)



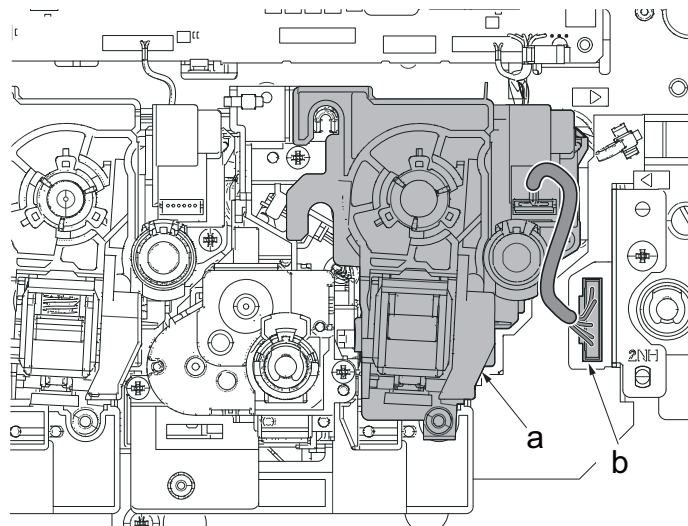
- 3** While three colors are released, rotate the release lever (a) in the direction of the arrow to shift it from lock position (b) to unlock position (c), and release the primary transfer roller.



- 4 Close the toner supply shutter (b) of the developer unit (a).
- 5 Disconnect both the connector (c) of the developer unit and the connector (d) of the drum unit.

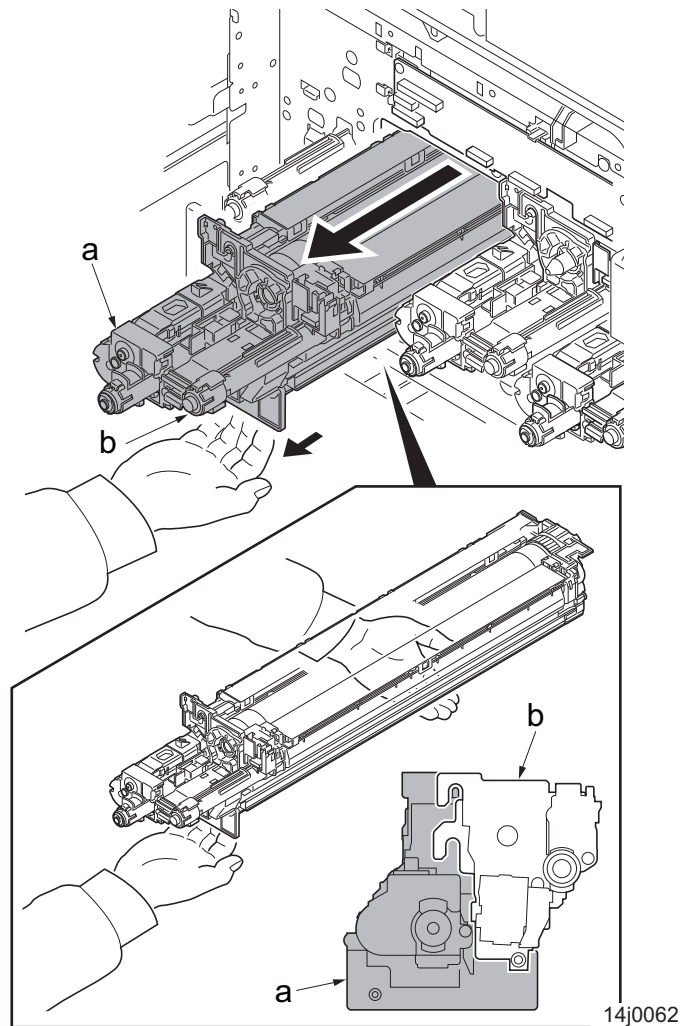


- 6 In case of disconnecting the connector of BK drum unit (a), disconnect the relay connector (b).



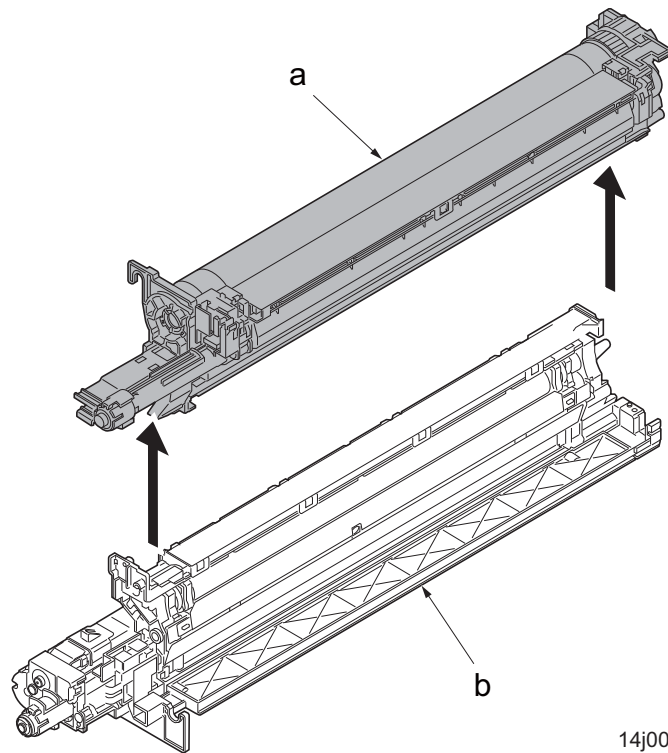
14j0061a

- 7 Pull out the developer unit (a) and drum unit (b) as one body. (The developer unit becomes basic and the drum units are combined.)
- 8 Detach the developer unit (a) while supporting the bottom.



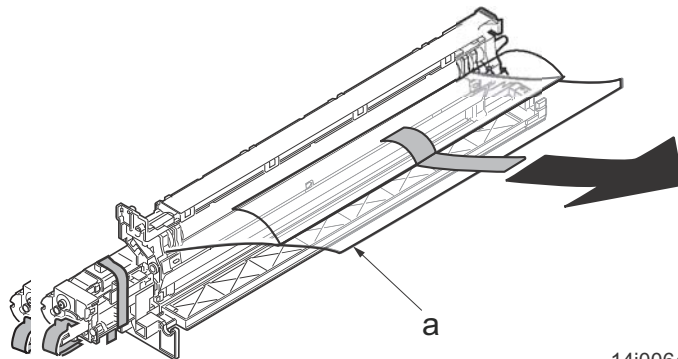
- 9 Remove the drum unit (a) from the developer unit (b).
- 10 Check or replace the drum unit (a) and the developer unit (b) and then reattach the parts in the original position.

To install the drum unit onto the developer unit, insert the front end first, then the rear end of the unit.



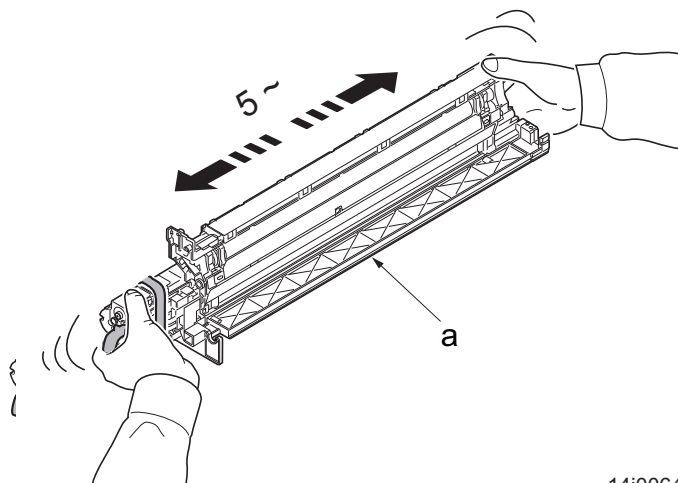
14j0063

- 11** When a new development unit is installed, the developer roller protective sheet (a) must be removed.



14j0064

- 12** Shake from side to side five times or more before attaching the developer unit (a).



14j0064

### 1 3 Execute the following procedures when replacing the developer unit to the new unit.

- 1 Execute maintenance mode U140 (AC calibration). (Refer [P.6-138](#))
- 2 Execute maintenance mode U464 (Calibration). (Refer [P.6-263](#))
- 3 Execute maintenance mode U469 (Auto color registration correction). (Refer [P.6-272](#))
- 4 Execute maintenance mode U412 (Uneven density adjustment). (Refer [P.6-249](#))
- 5 Execute maintenance mode U464 (Calibration). (Refer [P.6-263](#))
- 6 Execute maintenance mode U410 (Auto halftone adjustment). (Refer [P.6-240](#))

### 1 4 Execute the following procedures when replacing the drum unit to the new unit.

- 1 Execute the LSU cleaning (see the operation guide)  
Press [Adjustment/Maintenance] and then [Next] of [Laser Scanner Cleaning].  
Press [Execute] to execute the LSU cleaning.
- 2 Execute maintenance mode U119 (Drum setup). (Refer [P.6-126](#))
- 3 Execute maintenance mode U930 (Main charger roller counter clear). (Refer [P.6-340](#))
- 4 Execute maintenance mode U140 (AC calibration). (Refer [P.6-138](#))
- 5 Execute maintenance mode U464 (Calibration). (Refer [P.6-263](#))
- 6 Execute maintenance mode U469 (Auto color registration correction). (Refer [P.6-272](#))
- 7 Execute maintenance mode U412 (Uneven density adjustment). (Refer [P.6-249](#))
- 8 Execute maintenance mode U464 (Calibration). (Refer [P.6-263](#))
- 9 Execute maintenance mode U410 (Auto halftone adjustment). (Refer [P.6-240](#))

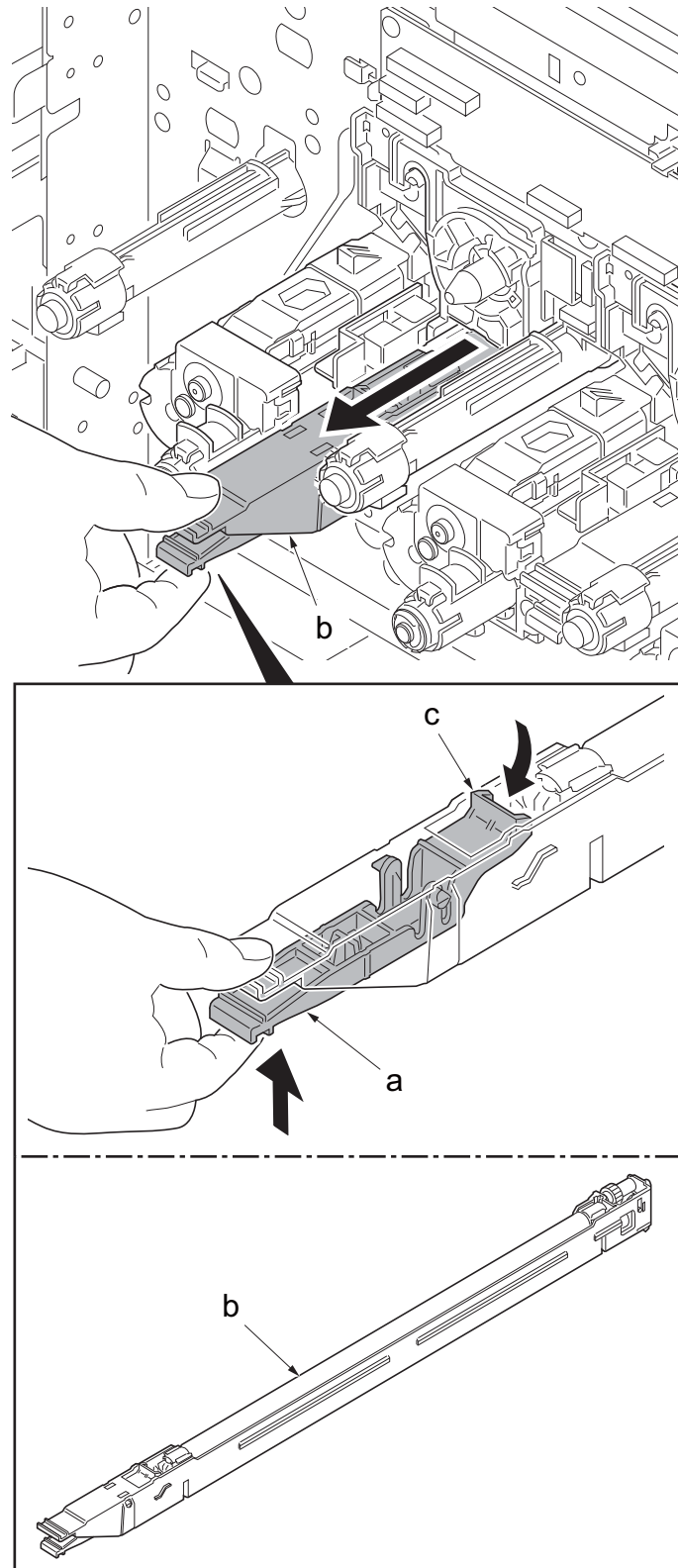
### (4-3) Detaching and reattaching the main charge roller unit

#### Detaching example: Main charger roller unit Y

#### Procedures

- 1 **Detach the inner unit.**
- 2 **Pull out the main charger roller unit (b) by picking and releasing the MC lock lever (a).**
- 3 **Check or replace the main charger roller unit (b) and then reattach the parts in the original position.**

When reattaching the main charger roller unit (b), hook the hook (c) firmly by operating the MC lock lever after inserting the main charger roller unit until click.



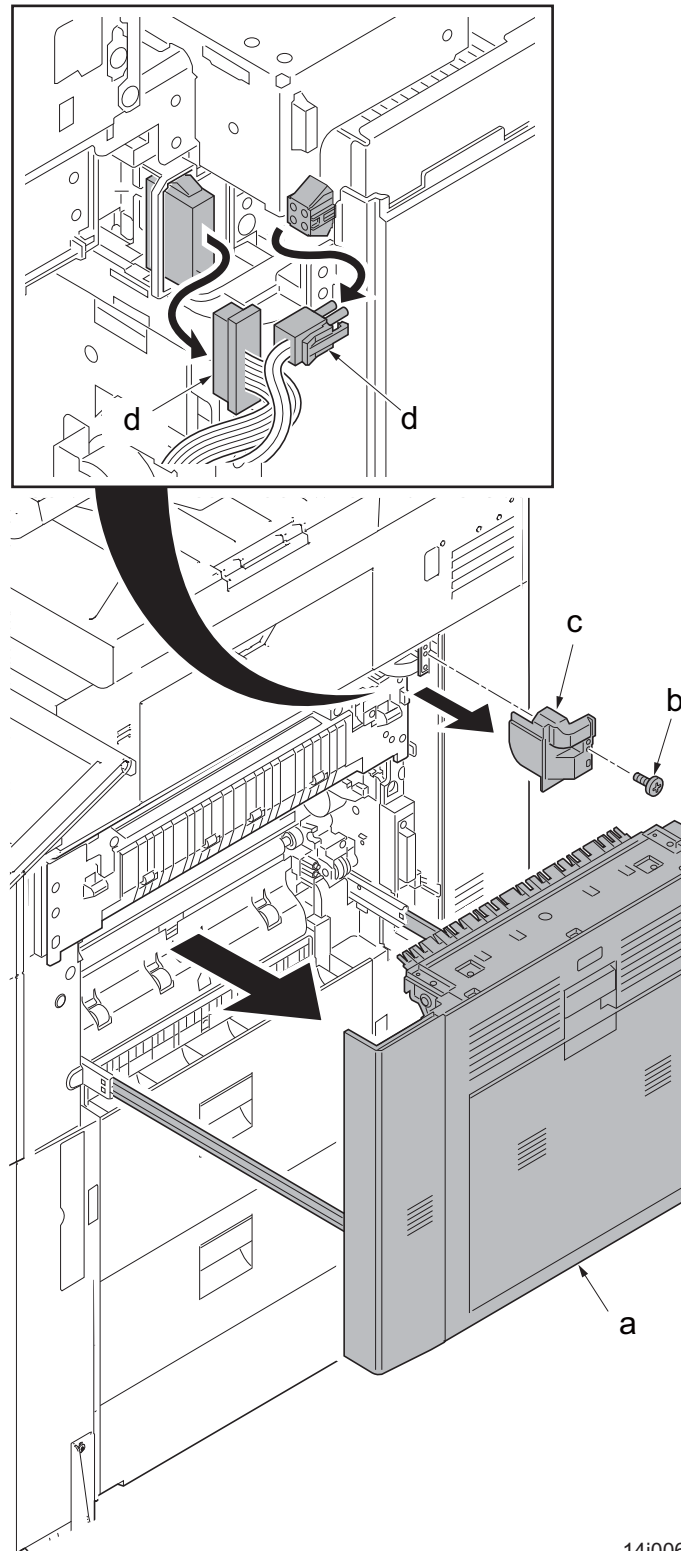
14j0065

#### 4 Execute the following procedures when replacing the main charger roller unit to the new unit.

- 1) 1) Execute maintenance mode U930 (Main charger roller counter clear). (Refer [P.6-340](#))
- 2) 2) Execute maintenance mode U464 (Calibration). (Refer [P.6-263](#))
- 3) 3) Execute maintenance mode U410 (Auto halftone adjustment). (Refer [P.6-240](#))

**(5)Fuser section****(5-1)Detaching and reattaching the fuser unit****Procedures**

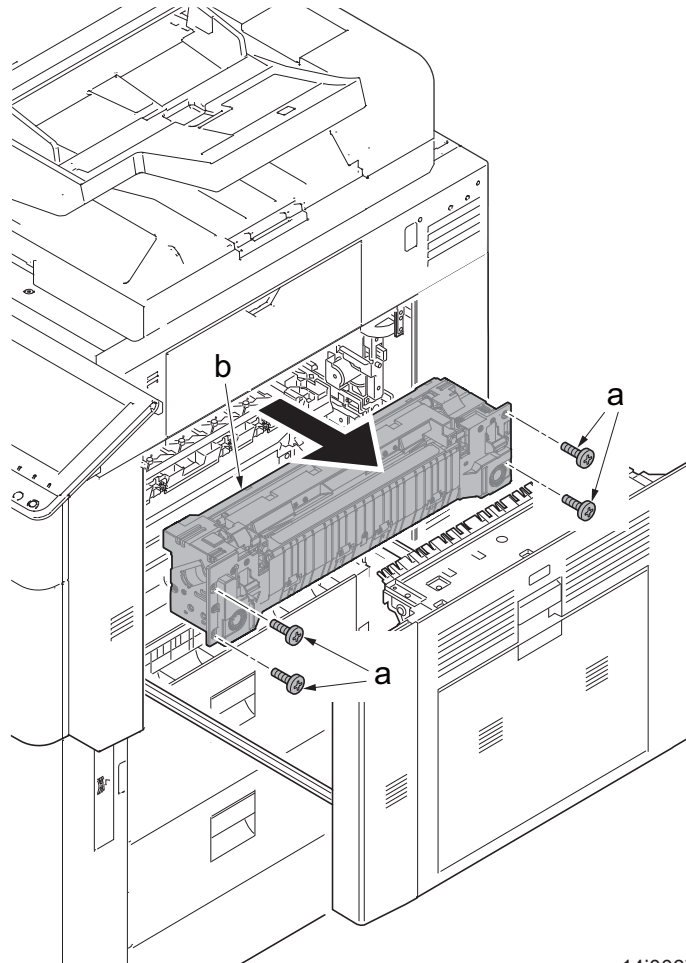
- 1** Pull out the conveying unit (a).
- 2** Remove the screw (b)(M3x8) and remove the fuser wire cover (c).
- 3** Disconnect two connectors (d).



14j0066



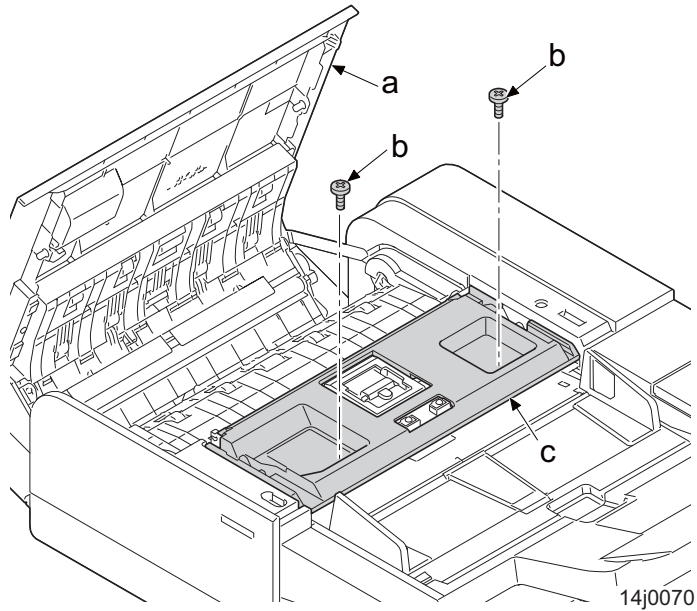
- 4 Remove four screws (a)(M4x12) and remove the fuser unit (b).
- 5 Check or replace the fuser unit (b) and then reattach the parts in the original position.



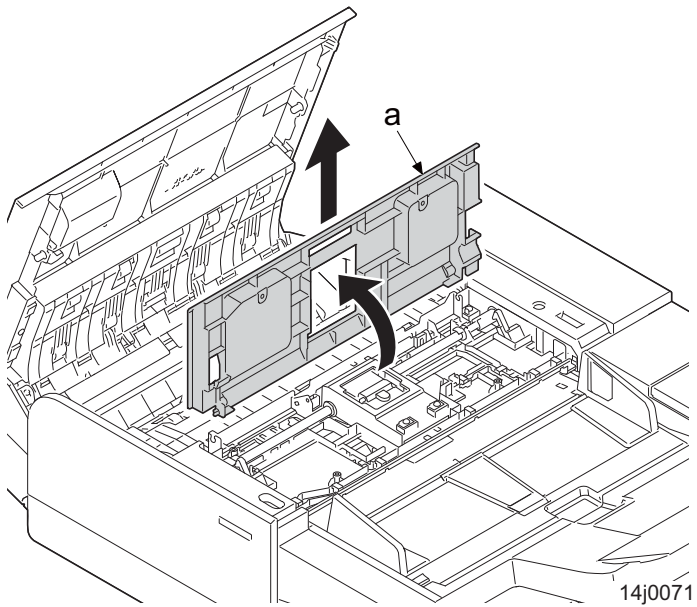
14j0067

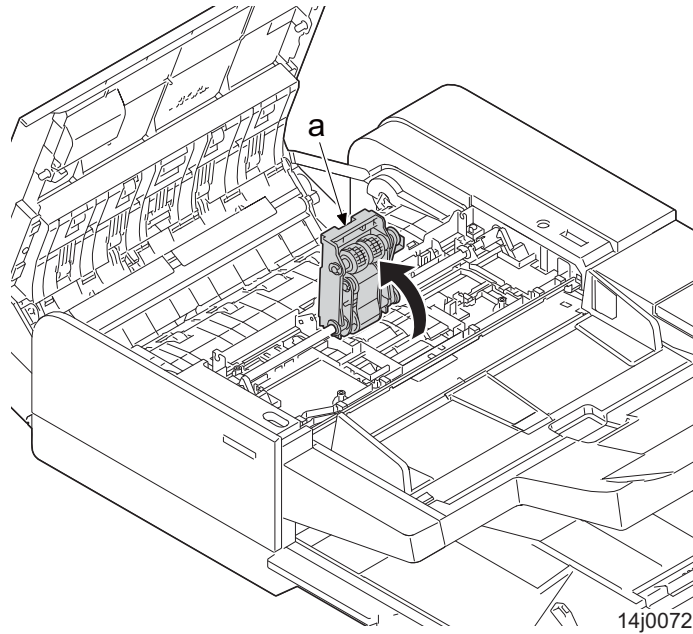
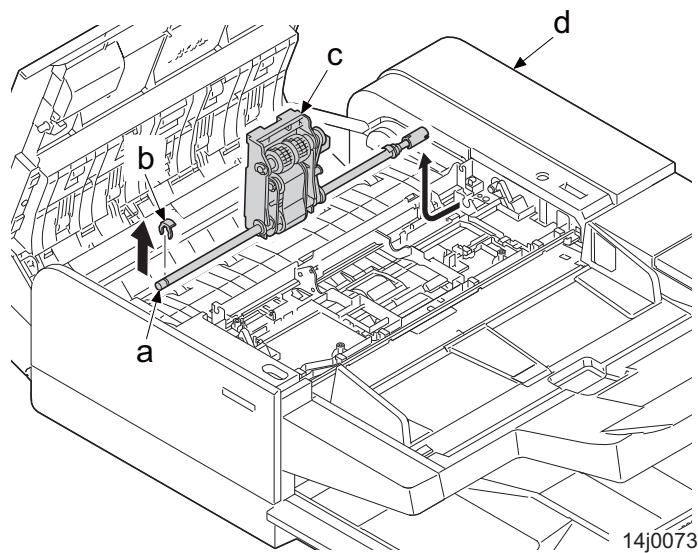
**(6) Document processor****(6-1) Detaching and reattaching the DP pickup pulley and DP paper feed roller****Procedures**

- 1** Open the DP upper cover (a).
- 2** Remove one screw (b)(M3x8) of DP paper feed unit (C).



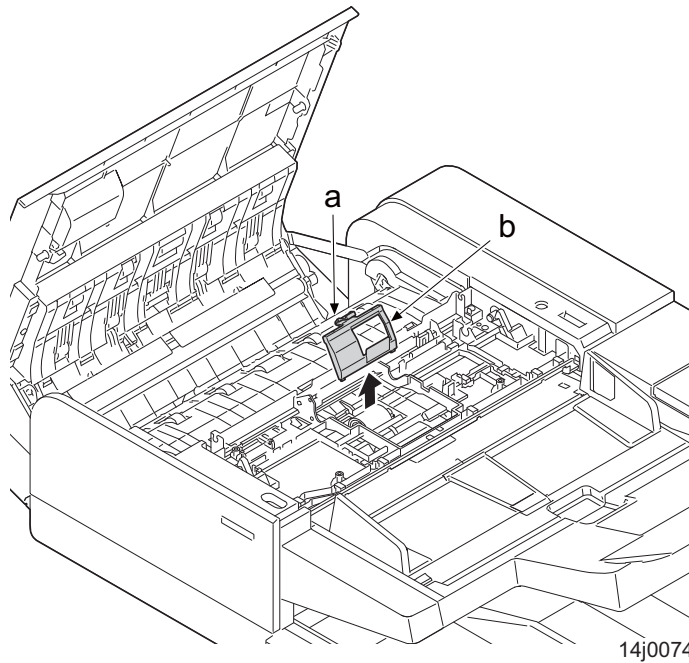
- 3** Tilt up the DP paper feed (a) and remove it upward.



**4 Raise the DP paper feed unit (a) upward.****5 Detach the front side stop ring from the DP feed belt shaft (a).****6 Slide the DP feed unit (c) frontward and remove it from the document processor (d)****7 Attach the DP paper feed unit (c).****8 Reattach the parts in the original position.**

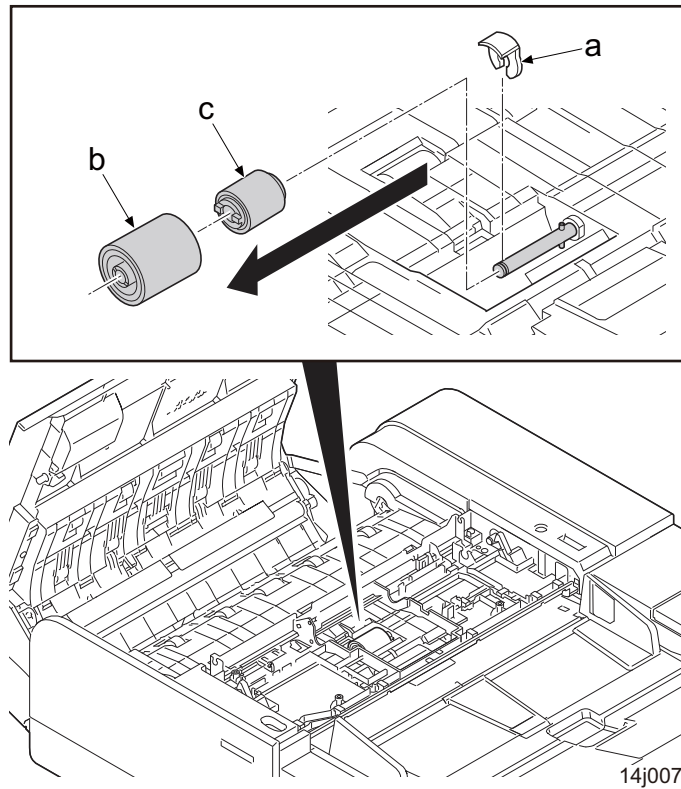
**(6-2) Detaching and reattaching the DP separation pulley****Procedures**

- 1** Open the DP top cover.
- 2** Detach the DP paper feed guide (a) and the DP feed unit.
- 3** Remove hooks (a) and remove the DP separation pulley cover (c).



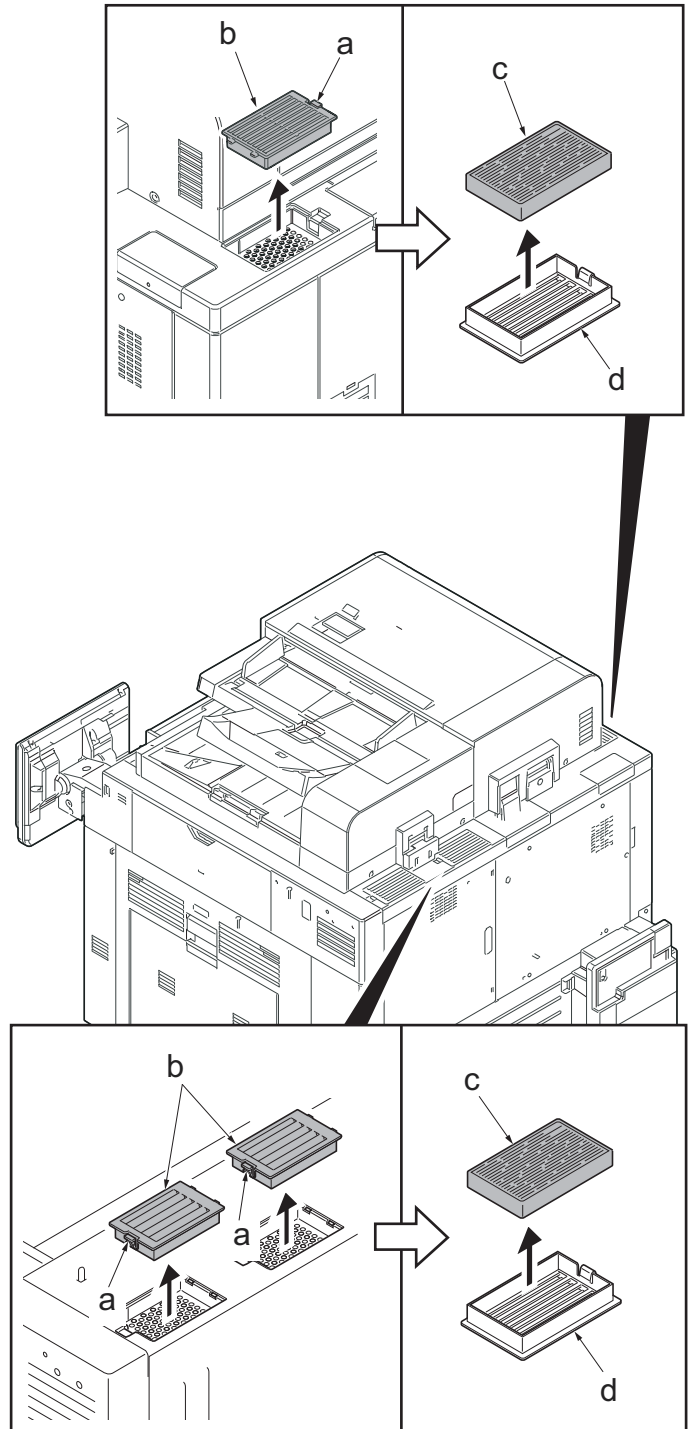
14j0074

- 4 Remove the stop rings (a), and remove the DP separation pulley (b) and the torque limiter (c).
- 5 Attach the new DP separation pad assembly.
- 6 Reattach the parts in the original position.



**(7)Others****(7-1)Detaching and reattaching the eject filters****Procedures**

- 1** Unhook each hook (a) and remove three eject filter units (b).
- 2** Remove the eject filter (c) from the eject cover (d).
- 3** Clean or replace the eject filter (c) and then reattach it in the original position.

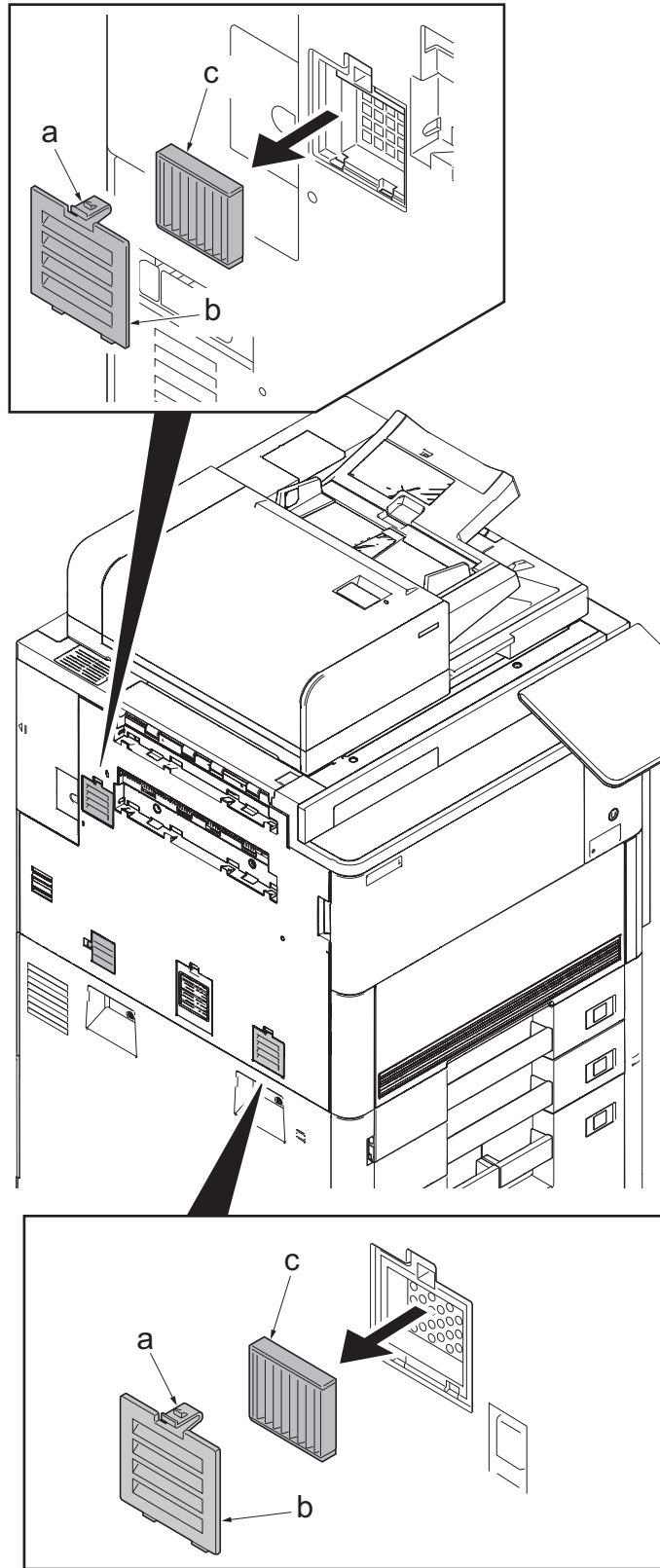


14j0076

## **(7-2) Detaching and reattaching the left filter**

### **Procedures**

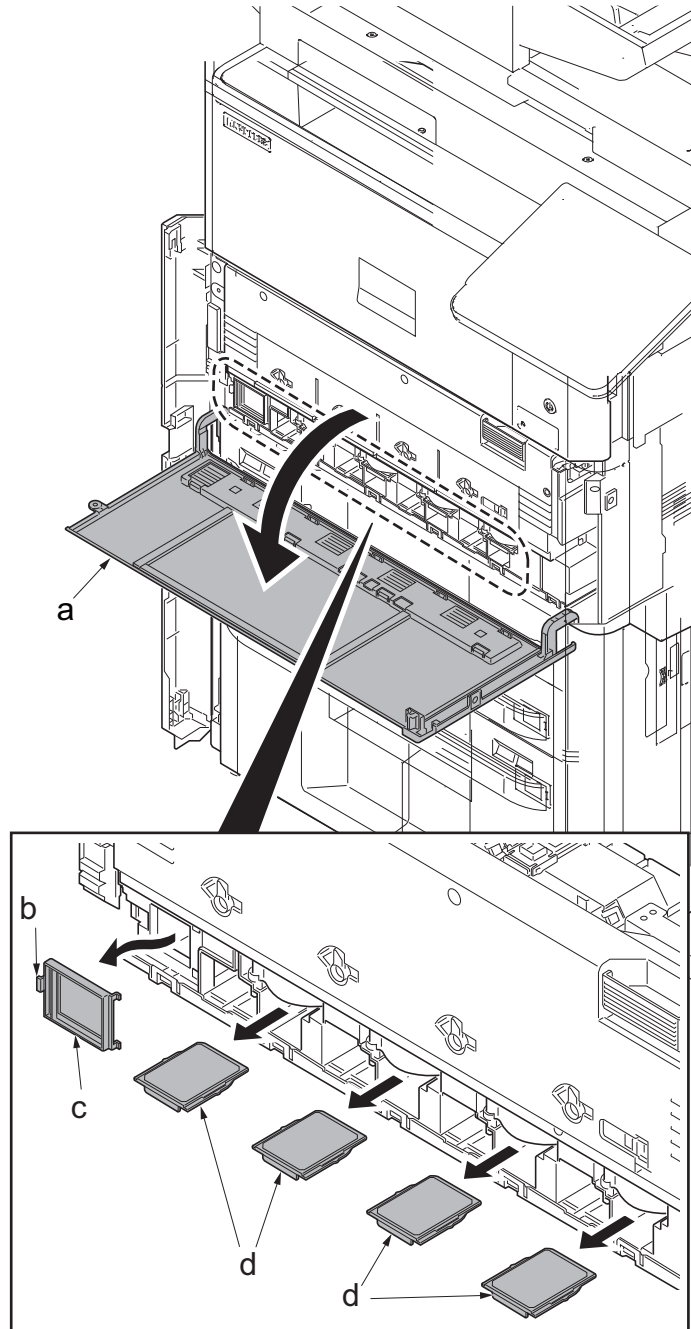
- 1** Remove two left filter covers (b) by pushing the lever (a).
- 2** Remove the left filter (c).
- 3** Clean or replace the left filter (c) and then reattach it in the original position.





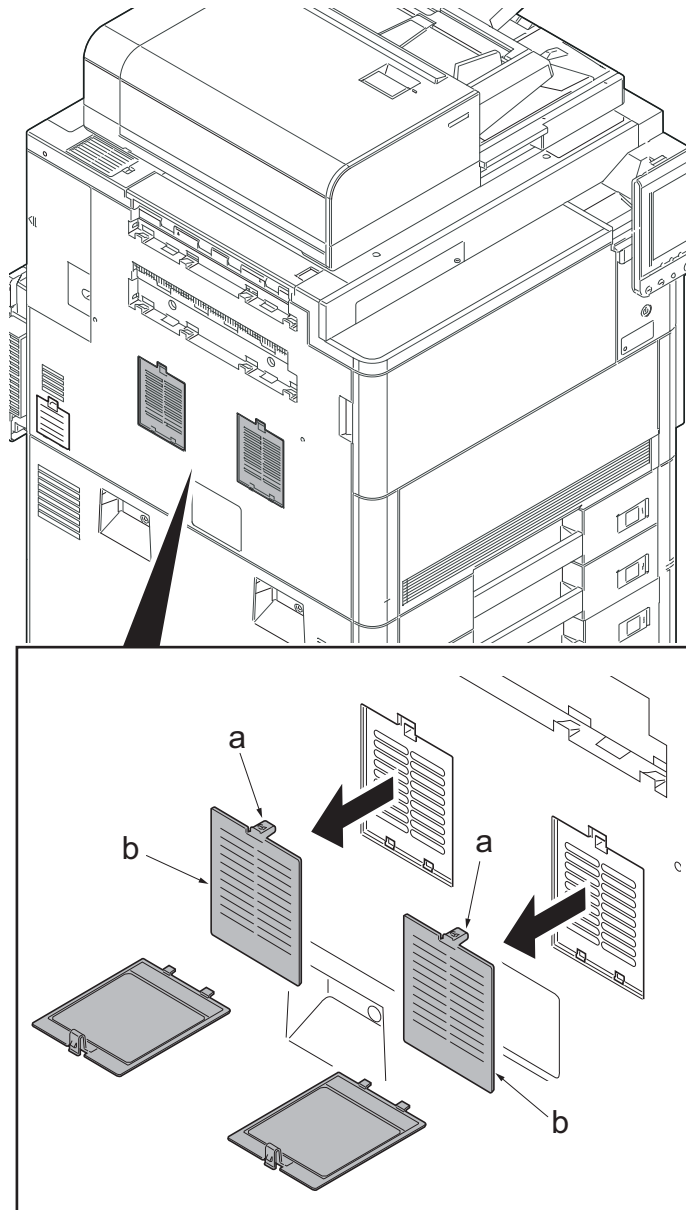
**(7-3) Detaching and reattaching the fan filter and PU dust filters****Procedures**

- 1** Open the front middle cover (a).
- 2** Remove the fan filter (c) by pushing the lever (b).
- 3** Clean the fan filter (c) and then reattach it in the original position.
- 4** Pull four PU dust filters (d) out and then remove them.
- 5** Clean the PU dust filters (d) and then reattach them in the original position.



**(7-4) Detaching and reattaching the primary transfer belt filters****Procedures**

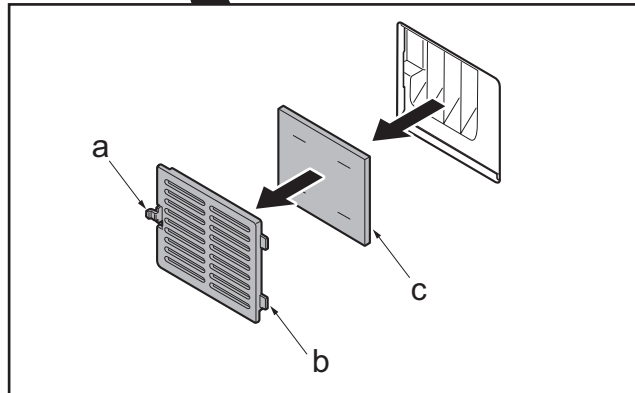
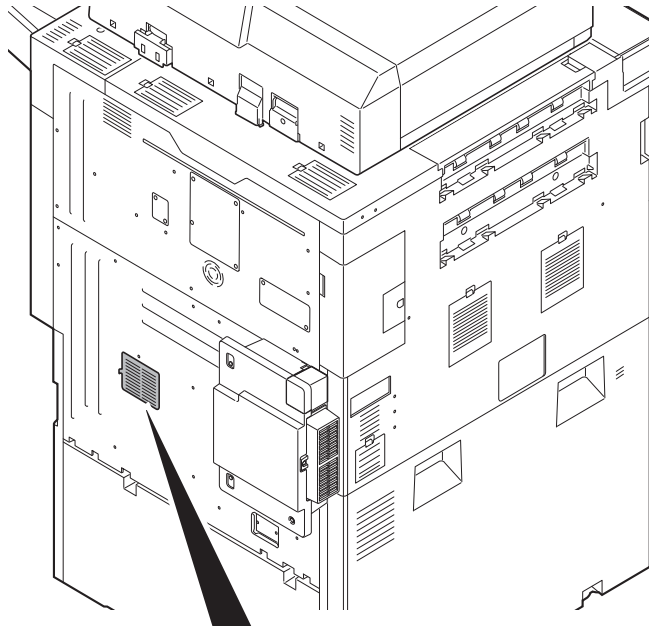
- 1** Remove two primary transfer belt filters (b) by pushing the lever (a).
- 2** Clean the primary transfer belt filters (b) and then reattach them in the original position.



14j0079

**(7-5) Detaching and reattaching the developer filter****Procedures**

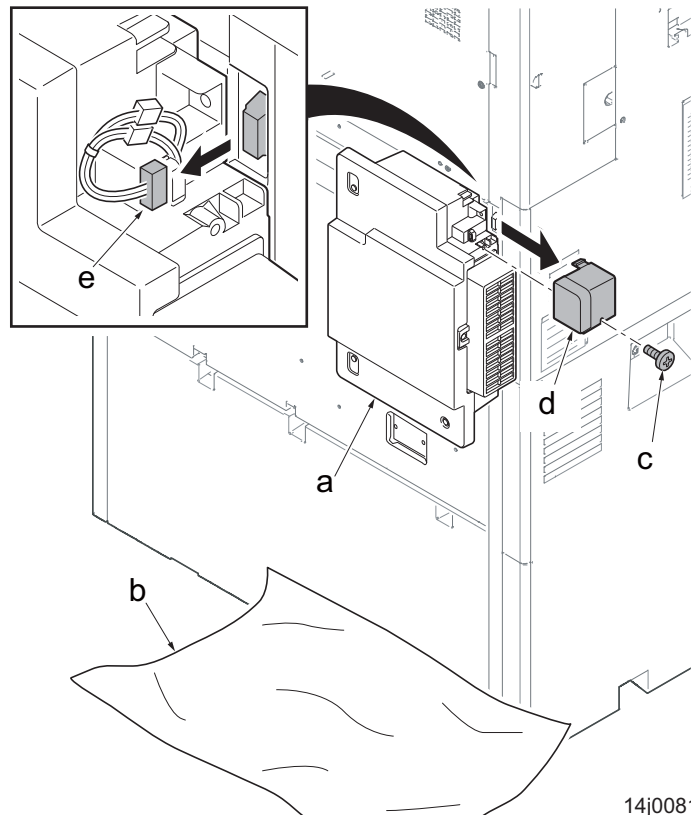
- 1** Remove the developer filter cover (b) by pushing the lever (a).
- 2** Remove the developer filter (c).
- 3** Clean or replace the developer filter (c) and then reattach it in the original position.



14j0080

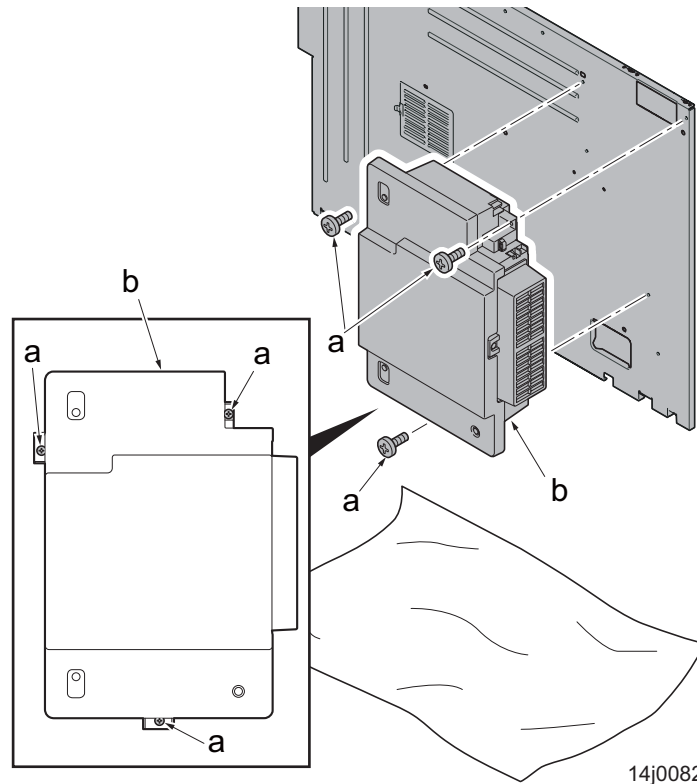
**(7-6) Detaching and reattaching the waste toner box****Procedures**

- 1** Cover the area under the waste toner box (a) to prevent contamination due to the scattered toner with the sheet (b).
- 2** Remove the screw (c)(M3x8) and remove the cable cover (d).
- 3** Disconnect the connector (e).

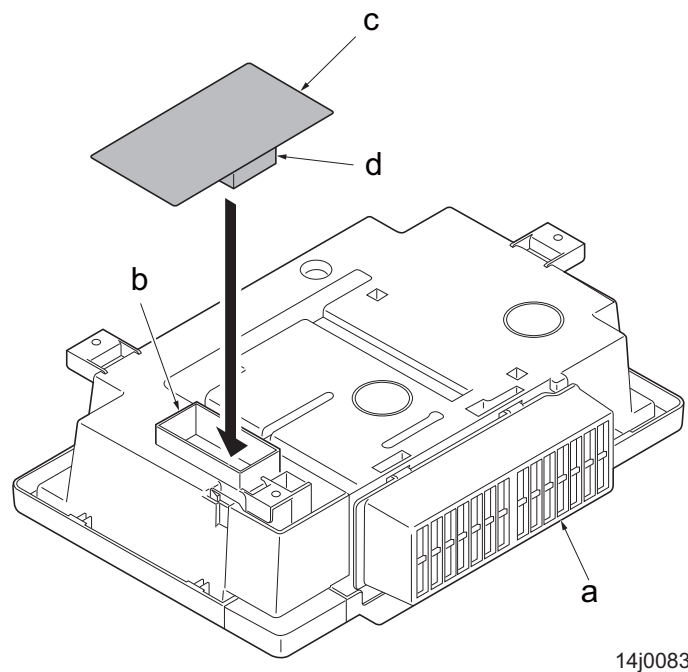


14j0081

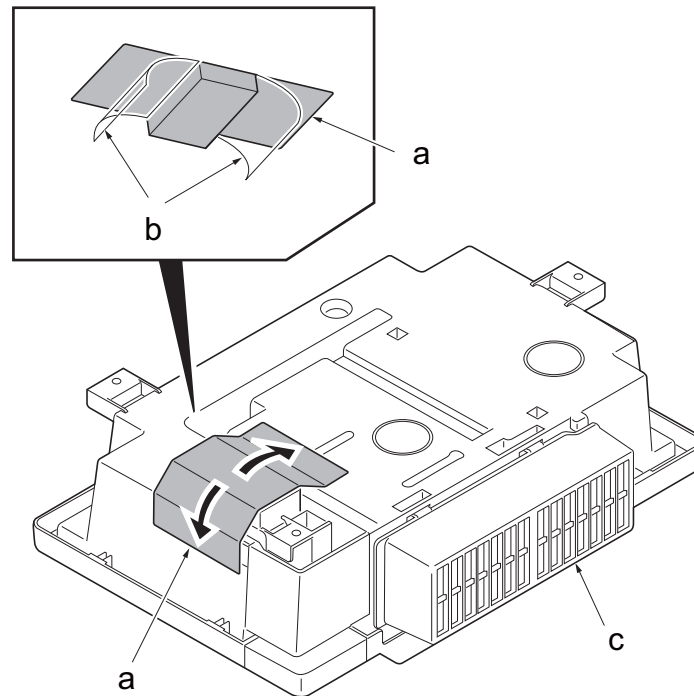
- 4 Remove three screws (a)(M3x8) and remove the waste toner box (b).**



- 5 Execute the following procedures when replacing the waste toner box (a) to the new unit.**
- 6 Insert the sponge (d) at the toner cap sheet (c) into the opening (b) of the waste toner box (a) that was removed.**



- 7 Peel the protective pad (a) from the toner cap sheet (a).
- 8 Affix the toner cap sheet (a) over the waste toner box (c).
- 9 Attach the new waste toner box (c) to the main unit.
- 10 Reattach the parts in the original position.



14j0084

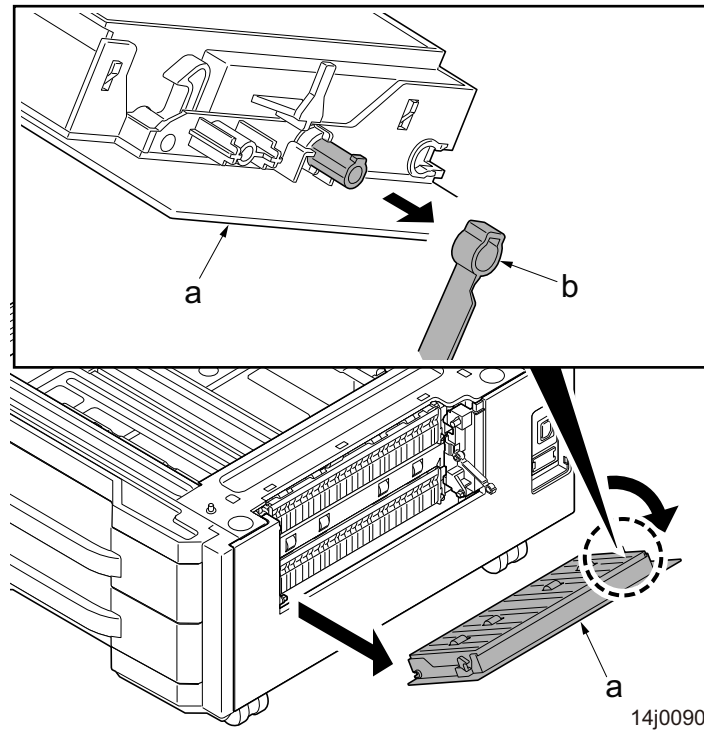
## 4 - 4 Maintenance parts replacement procedures (option)

### (1) Paper feeder (PF-730(B))

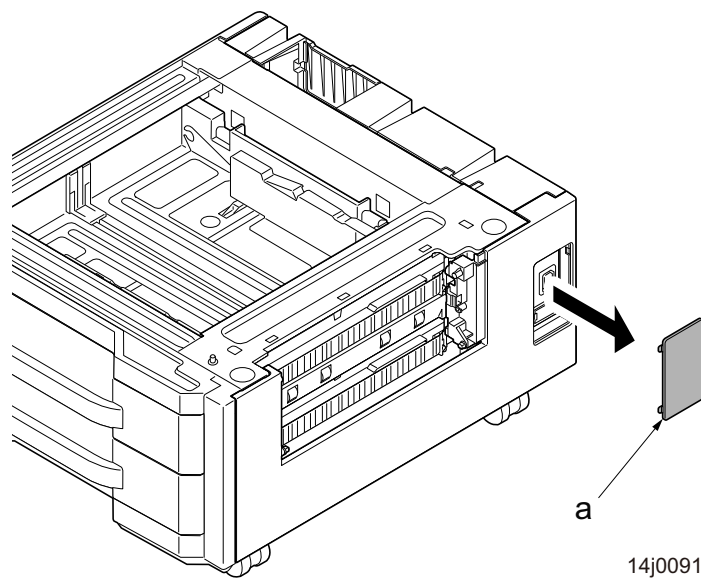
#### (1-1) Detaching and reattaching the PF forwarding pulley/PF paper feed pulley/PF separation pulley

##### Procedures

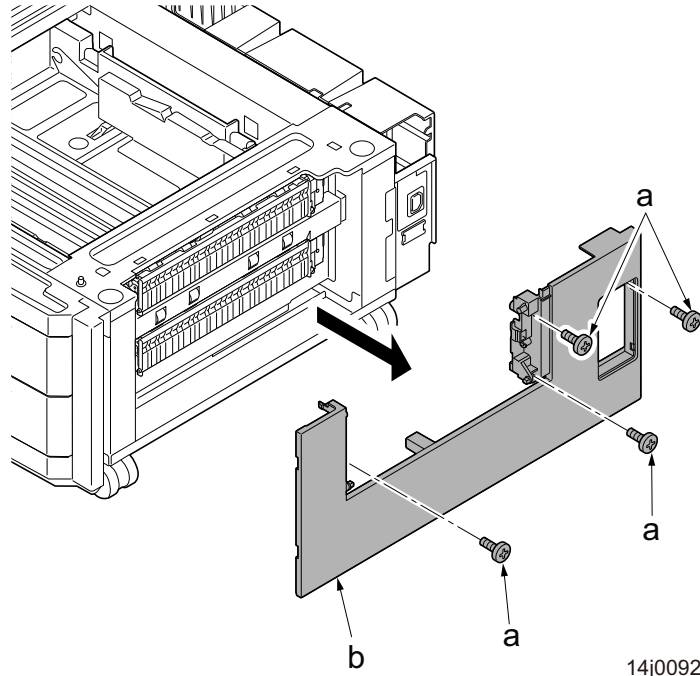
- 1 Open the PF conveying cover (a).
- 2 Remove the strap (b) and then remove the PF conveying cover (a).



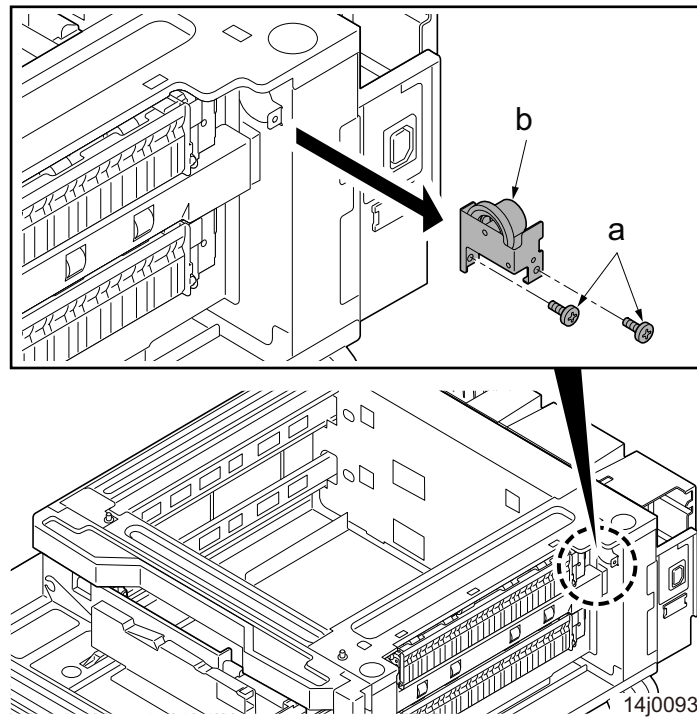
- 3 Remove the interface cover (a).



- 4 Remove four screws (a)(M4x8) and then remove the right cover (b).**

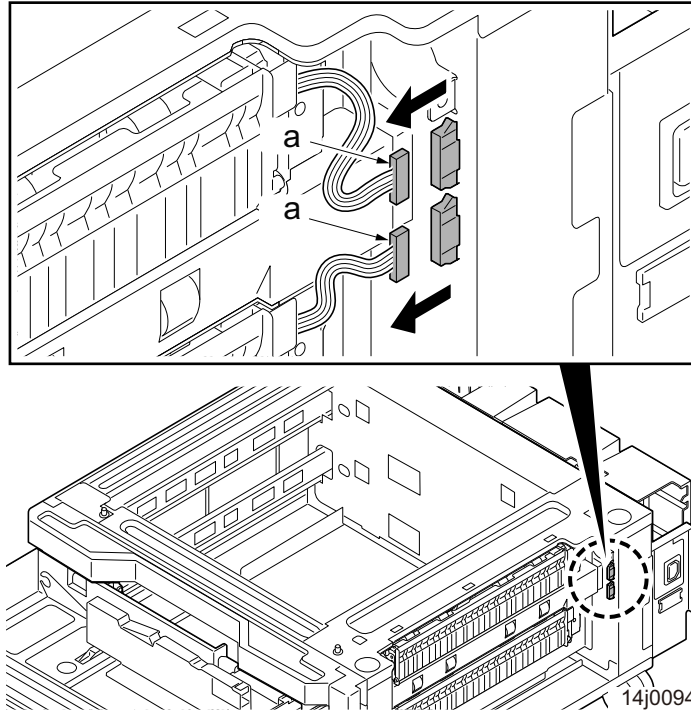


- 5 Pull out the paper cassette 3 and the paper cassette 4.**
- 6 Remove two screws (a)(M4x8) and remove the driving plate (b).**
- 7 The driving plate may not be changed when only the lower unit is replaced.**



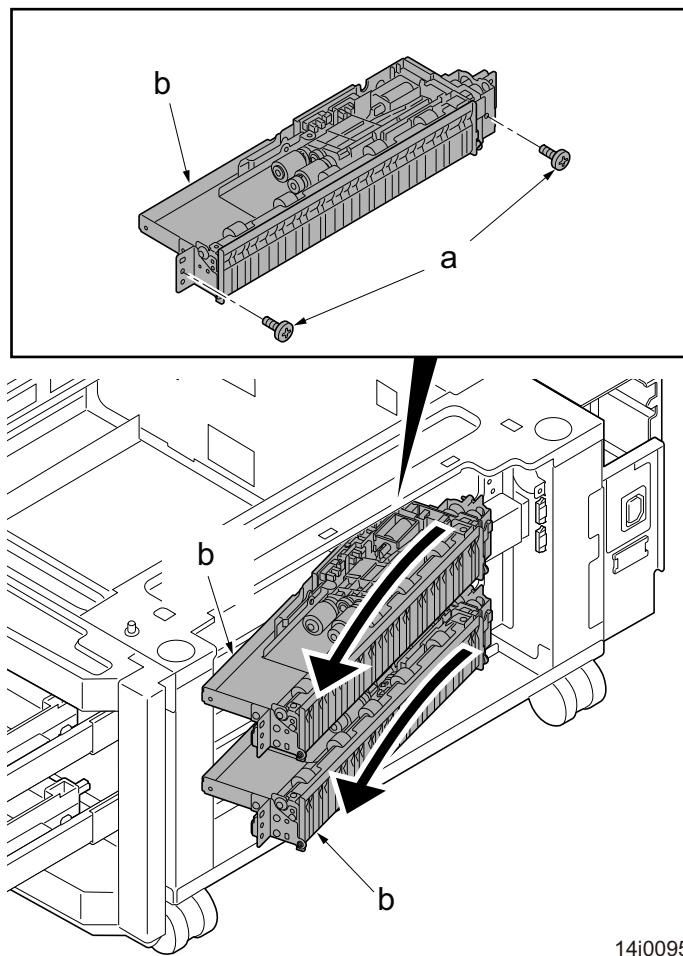


**8 Disconnect two connectors (a).**

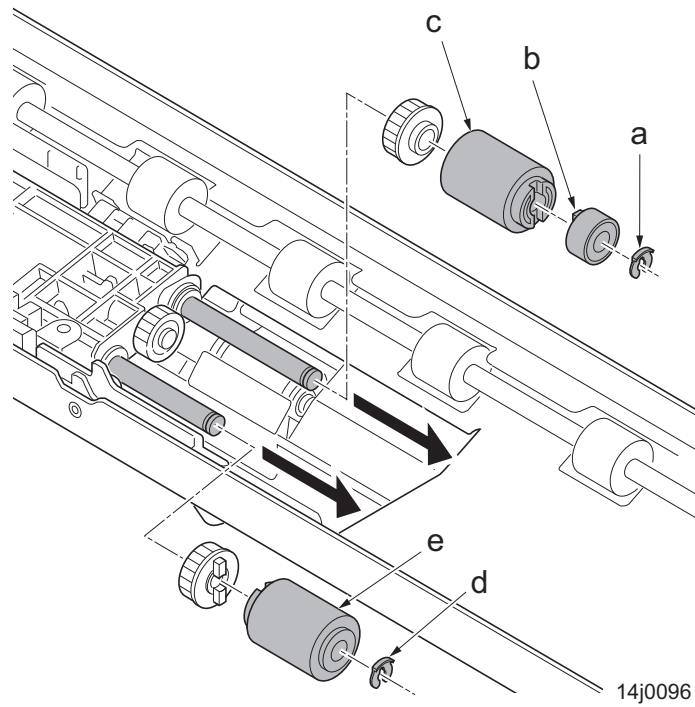


**9 Remove each two screws (a)(M4x8).**

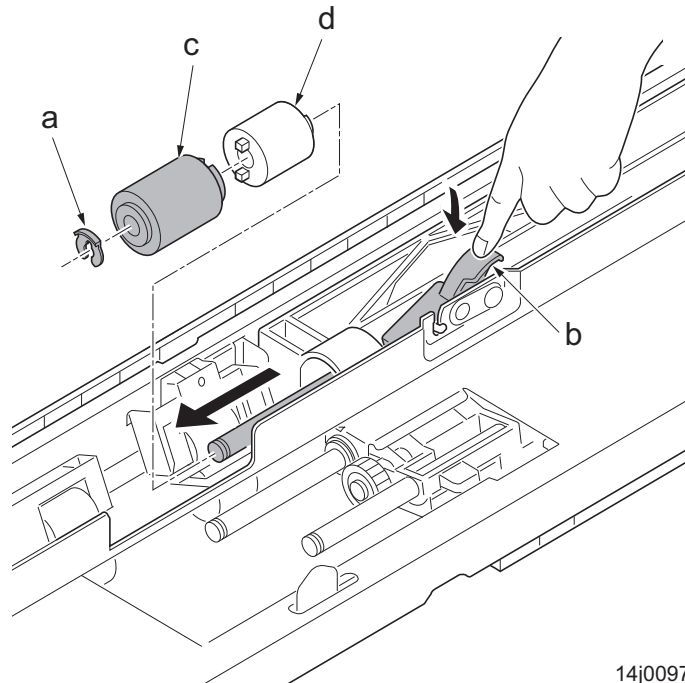
**10 Remove the PF primary paper feed unit (a).**



- 11 Remove the stop ring A (a) and then remove the one way clutch (b) and PF paper feed pulley (c).
- 12 Remove the stop ring B (d) and then remove the PF forwarding pulley (e).

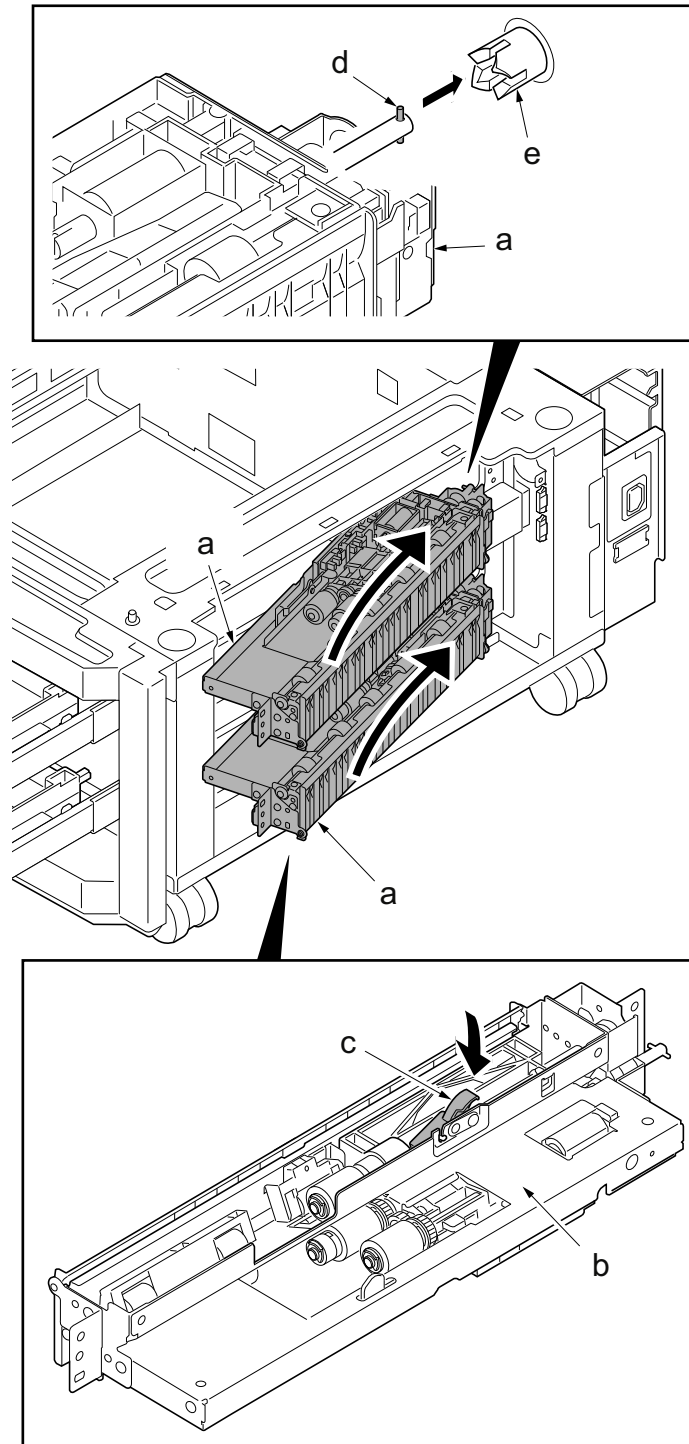


- 13 Remove the stop ring (a).
- 14 While pressing the retard release lever (b), remove the PF separation pulley (c).
- 15 Clean or replace the PF forwarding pulley, PF paper feed pulley and PF separation pulley.
- 16 Reattach the PF forwarding pulley, PF paper feed pulley and PF separation pulley in the original position of the PF primary paper feed unit.



14j0097

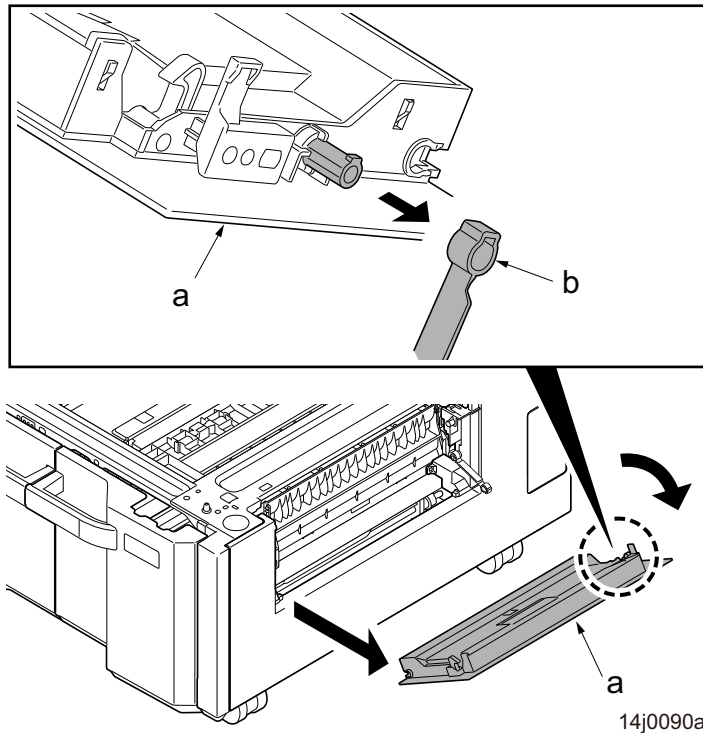
- 17 Reattach the PF primary paper feed unit (a) in the original position.
- 18 To reassemble, press and hold the retard release lever (c) at the bottom (b) of the PF primary paper feed unit.
- 19 When reattaching the unit, align the pin (d) at the rear side shaft to vertical and insert it into the coupling (e).
- 20 Connect both upper and lower connectors in the matching connectors.  
Upper: white / lower: blue



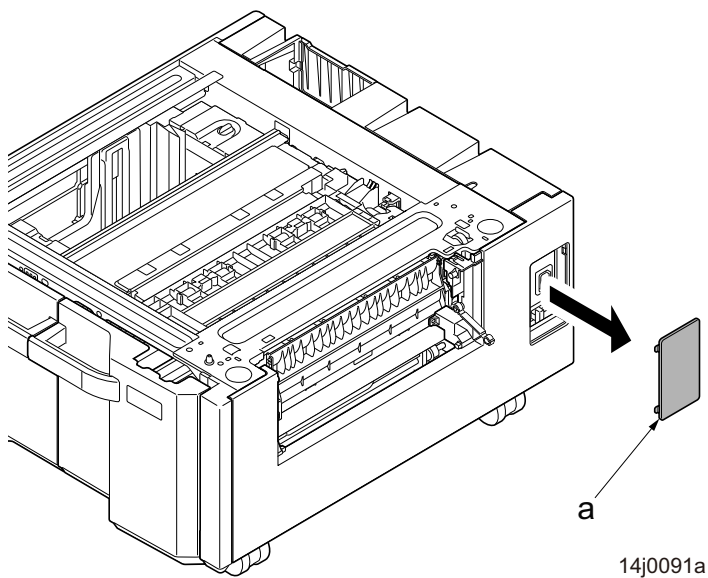
14i0098

**(2) Paper feeder (PF-740(B))****(2-1) Detaching and reattaching the PF forwarding pulley (right)/PF paper feed pulley (right)/PF separation pulley (right)****Procedures**

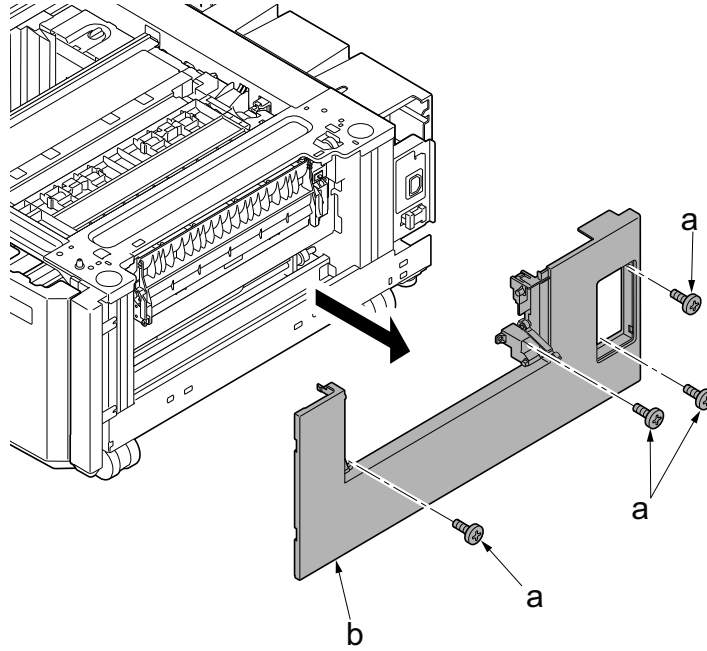
- 1 Open the PF conveying cover (a).
- 2 Remove the strap (b) and then remove the PF conveying cover (a).



- 3 Remove the interface cover (a).

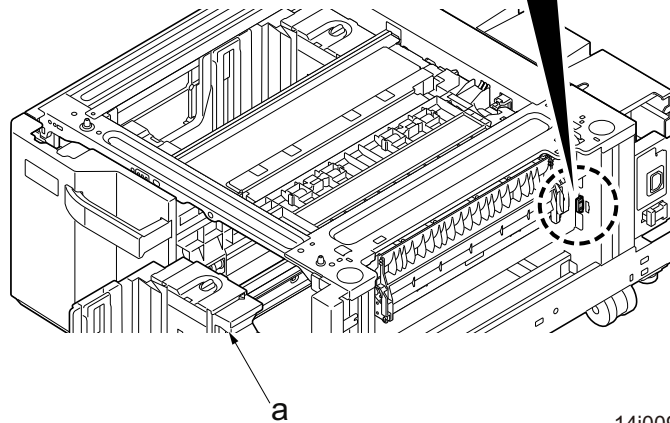
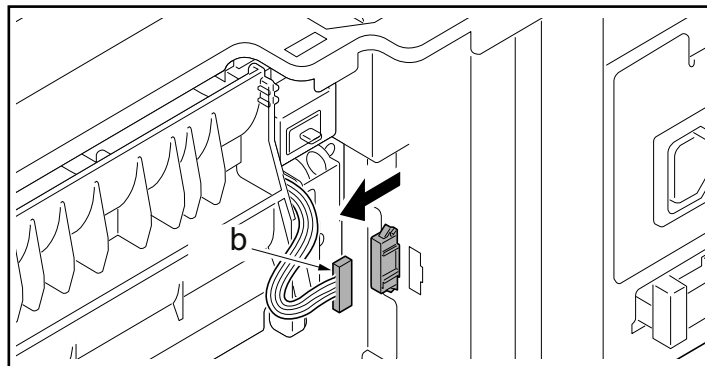


**4 Remove four screws (a)(M4x8) and then remove the right cover (b).**



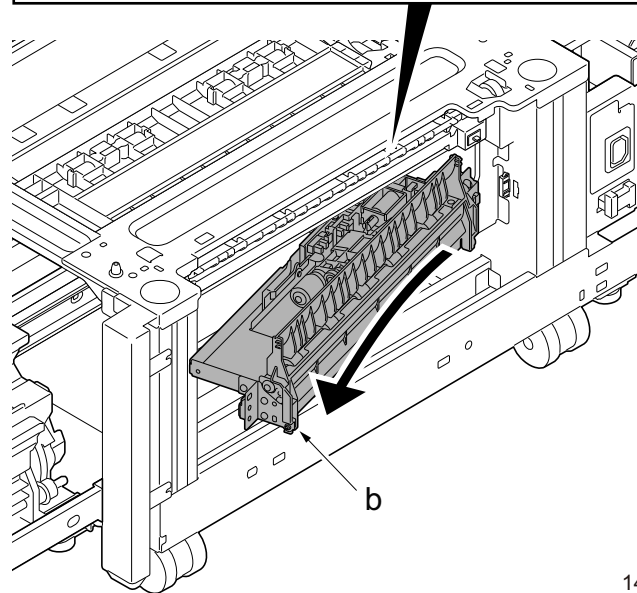
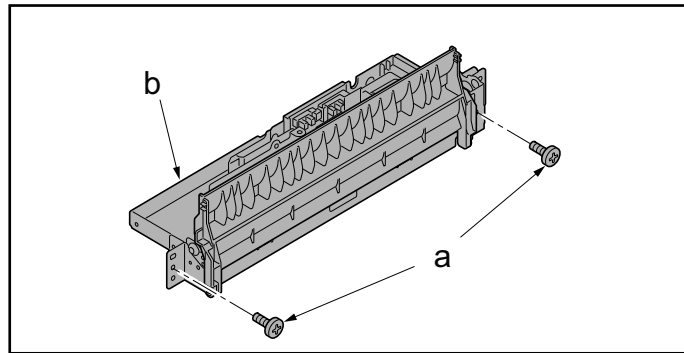
**5 Pull out the right paper cassette (a).**

**6 Disconnect the connector (b).**



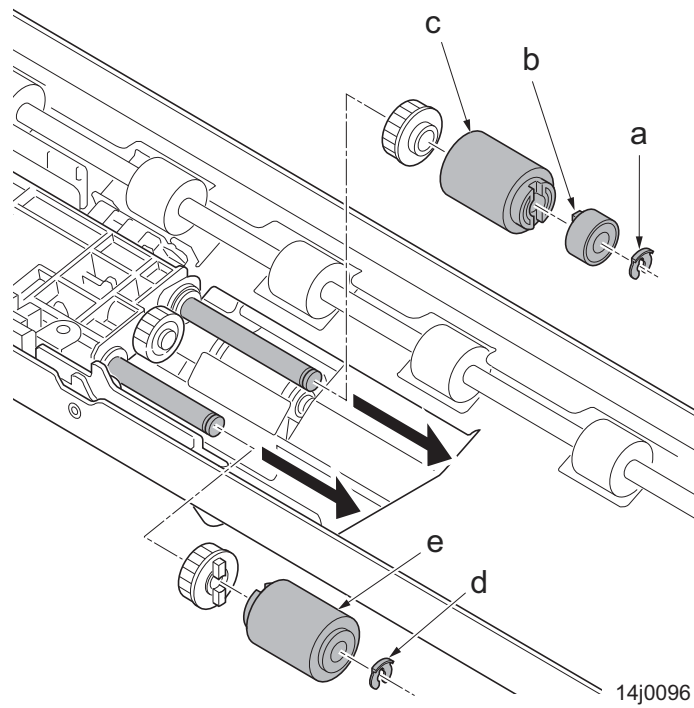
14j0099

- 7 Remove each two screws (a)(M4x8).
- 8 Remove the PF primary paper feed unit (b).



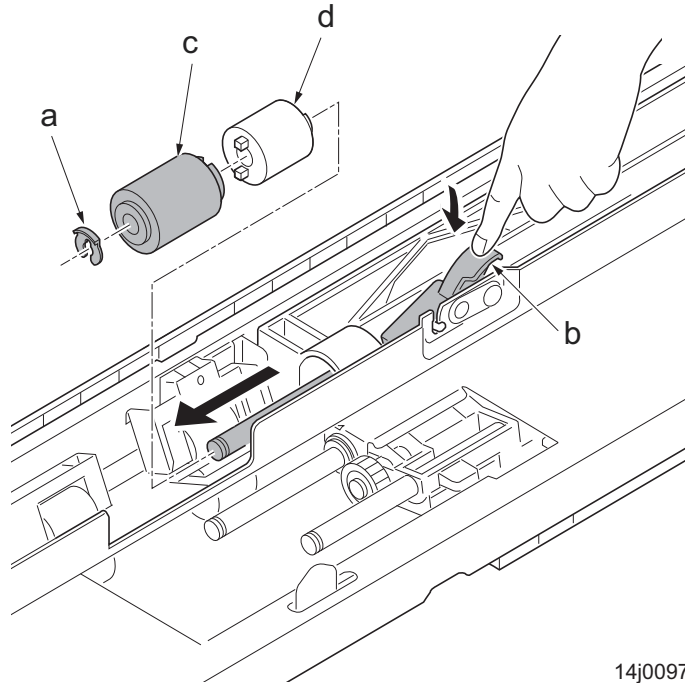
14j0100

- 9 Remove the stop ring A (a) and then remove the one way clutch (b) and PF paper feed pulley (c).
- 10 Remove the stop ring B (d) and then remove the PF forwarding pulley (e).



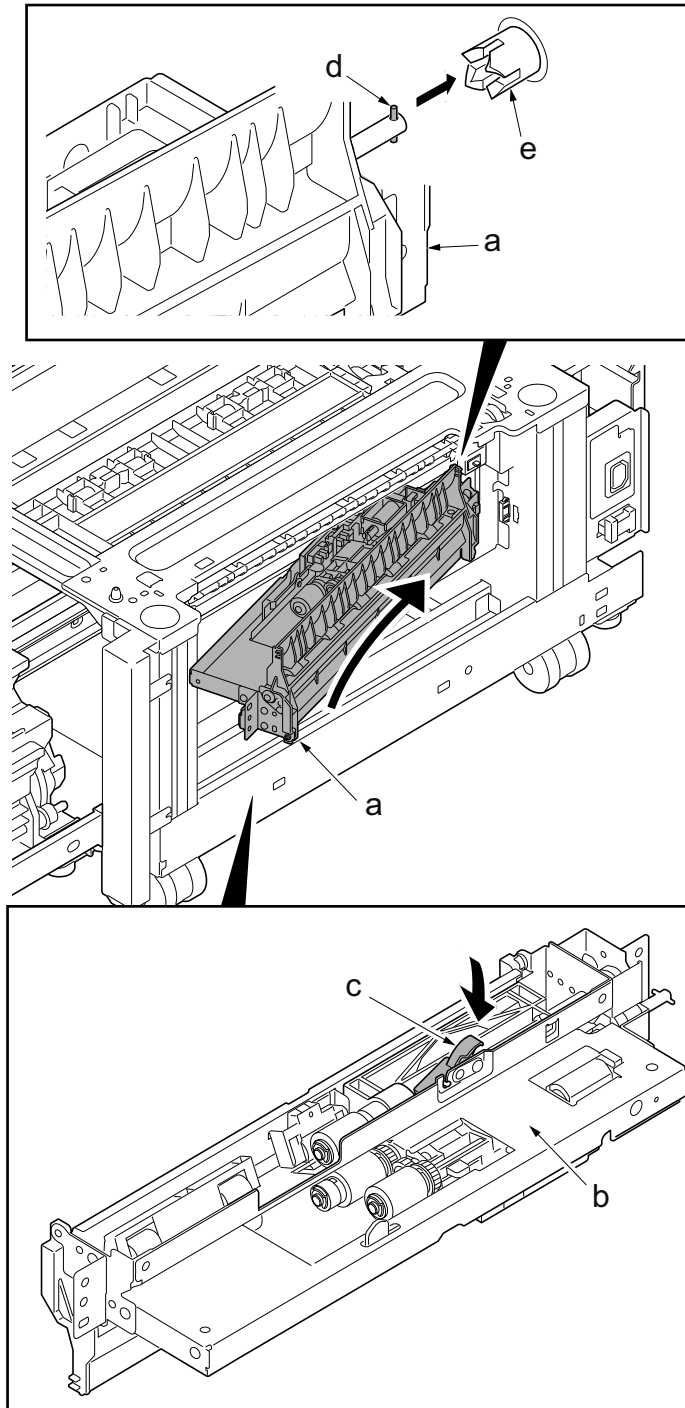


- 1 1 Remove the stop ring (a).
- 1 2 While pressing the retard release lever (b), remove the PF separation pulley (c).
- 1 3 Clean or replace the PF forwarding pulley, PF paper feed pulley and PF separation pulley.
- 1 4 Reattach the PF forwarding pulley, PF paper feed pulley and PF separation pulley in the original position of the PF primary paper feed unit.



14j0097

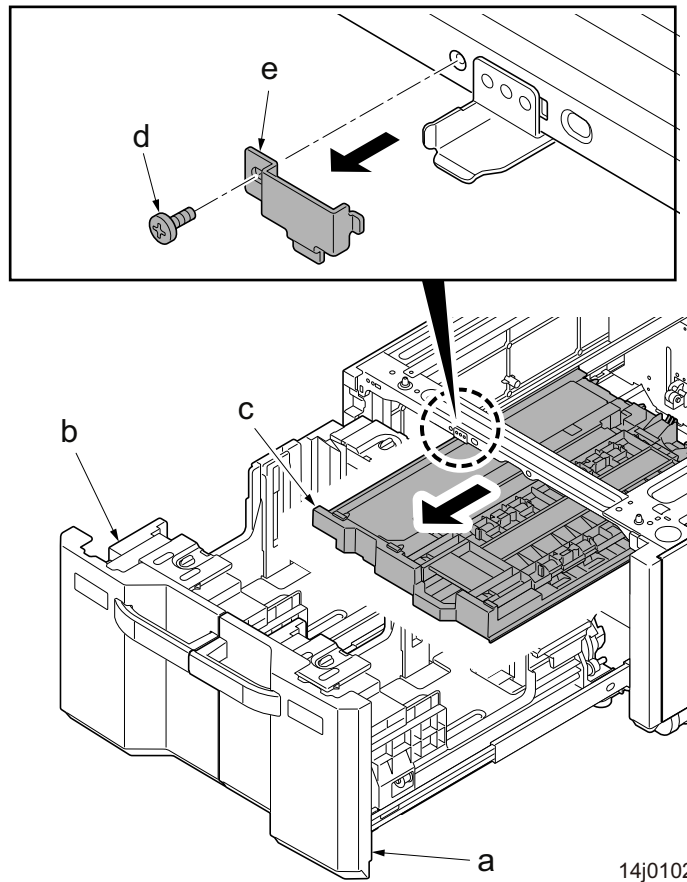
- 15 Reattach the PF primary paper feed unit (a) in the original position.
- 16 To reassemble, press and hold the retard release lever (c) at the bottom (b) of the PF primary paper feed unit.
- 17 When reattaching the unit, align the pin (d) at the rear side shaft to vertical and insert it into the coupling (e).



14i0101

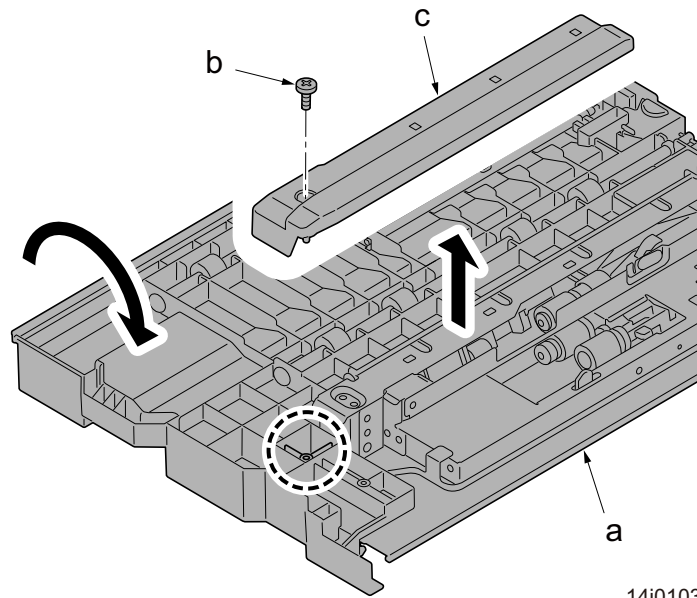
**(2-2) Detaching and reattaching the PF forwarding pulley (left)/PF paper feed pulley (left)/PF separation pulley (left)****Procedures**

- 1** Pull out the right paper cassette (a) and left paper cassette (b).
- 2** Pull out the PF conveying unit (c).
- 3** Remove the screw (d)(M3x8) and then remove the stopper (e).
- 4** Detach the PF conveying unit (c).



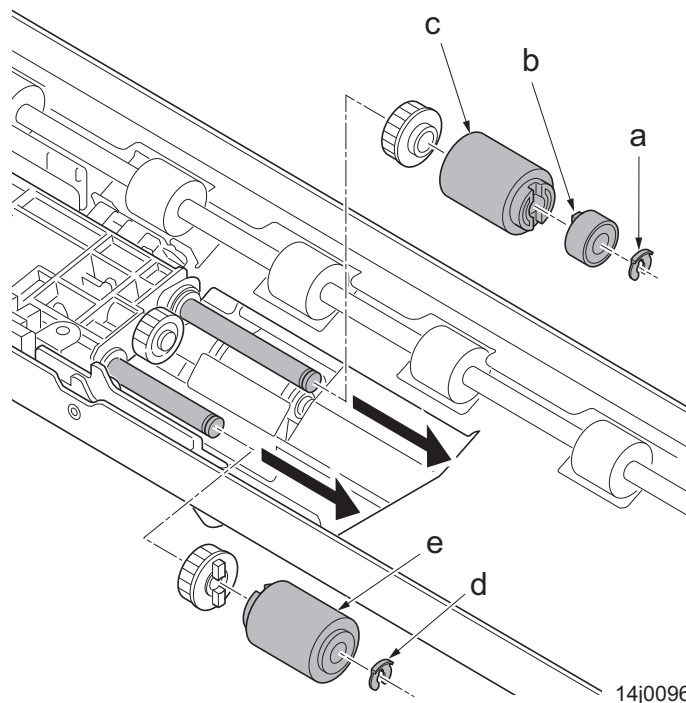
14j0102

- 5 Turn over the PF conveying unit (a).
- 6 Remove the screw (b)(M4x8) and remove the cover (c).



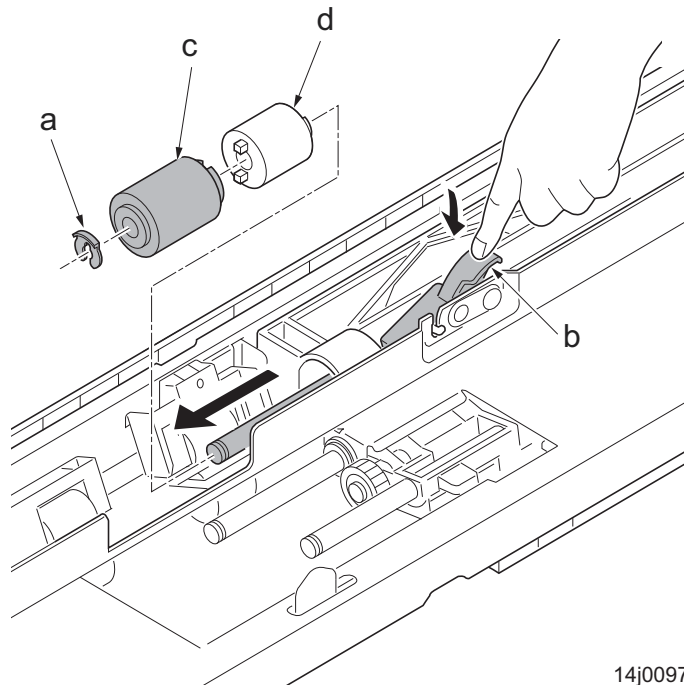
14j0103

- 7 Remove the stop ring A (a) and then remove the one way clutch (b) and PF paper feed pulley (left) (c).
- 8 Remove the stop ring B (d) and then remove the PF forwarding pulley (left) (e).



14j0096

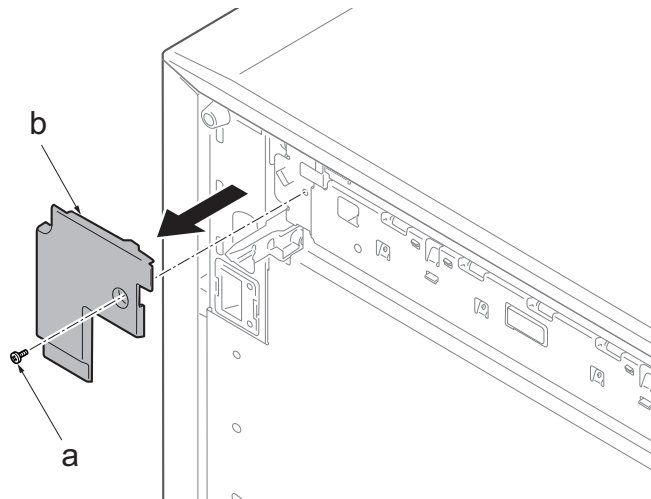
- 9 Remove the stop ring (a).
- 10 While pressing the retard release lever (b), remove the PF separation pulley (left) (c).
- 11 Clean or replace the PF forwarding pulley (left), PF paper feed pulley (left) and PF separation pulley (left).
- 12 Reattach the PF forwarding pulley (left), PF paper feed pulley (left) and PF separation pulley (left) in the original position of the primary paper feed unit.
- 13 When replacing the PF forwarding pulley (left), PF paper feed pulley (left) and PF separation pulley (left), execute U903 (Jam counter clear).



14j0097

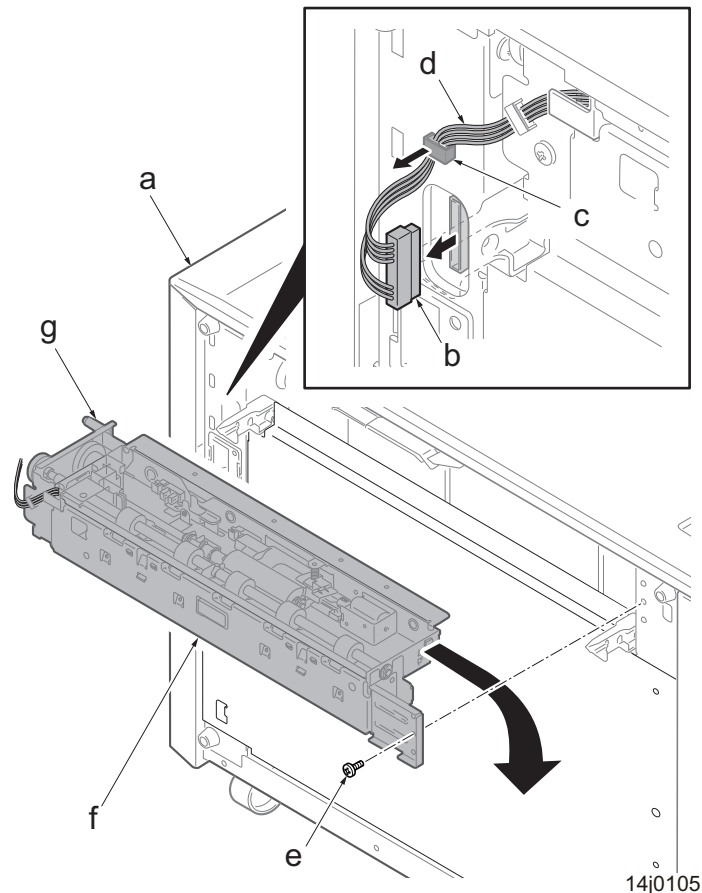
**(3)Side feeder (PF-7120)****(3-1)Detaching and reattaching the pickup pulley and paper feed roller****Procedures**

- 1** Pull out the deck.
- 2** Remove the screw (a)(M3x8) and detach the wire cover (b).

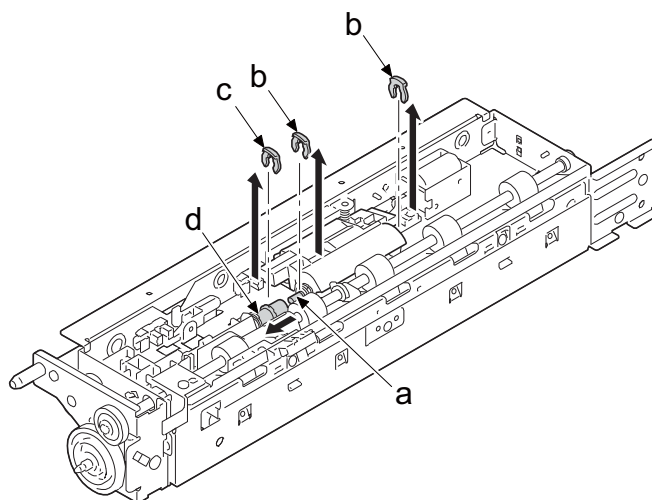


14j0104

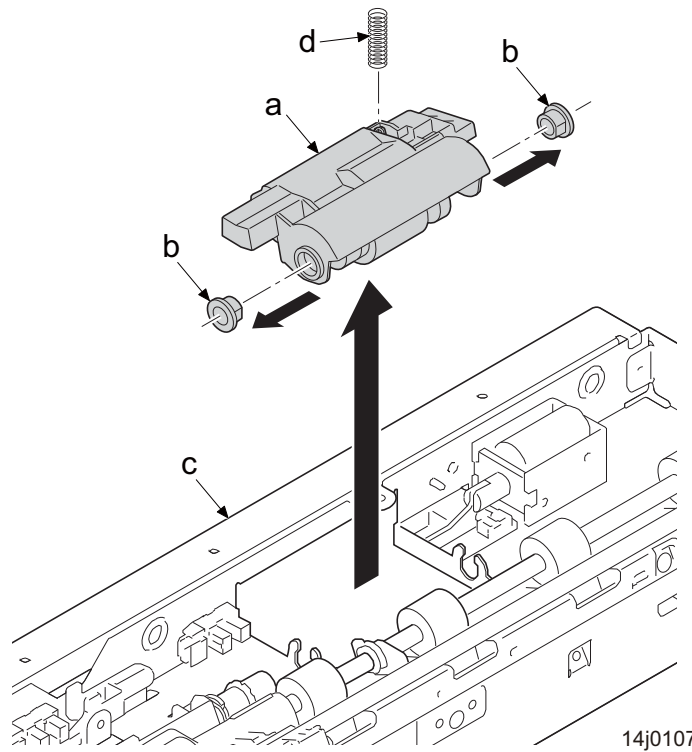
- 3 Disconnect the connector (b) of the main unit (a).
- 4 Release the wire (d) from the clamp (c).
- 5 Remove the screw (e)(M3x8).
- 6 Slide the PF feed unit (f) frontward and remove it while rotating it by using the positioning shaft (g) as fulcrum.



- 7 Remove two stop rings A (b) from the PF paper feed shaft (a).
- 8 Remove two stop rings B (c) and slide the joint (d).



- 9 Slide two bushings (b) at the both sides of the feed roller holder (a).
- 10 Remove the feed roller holder (a) and spring (d) upward from the PF feed unit (c).

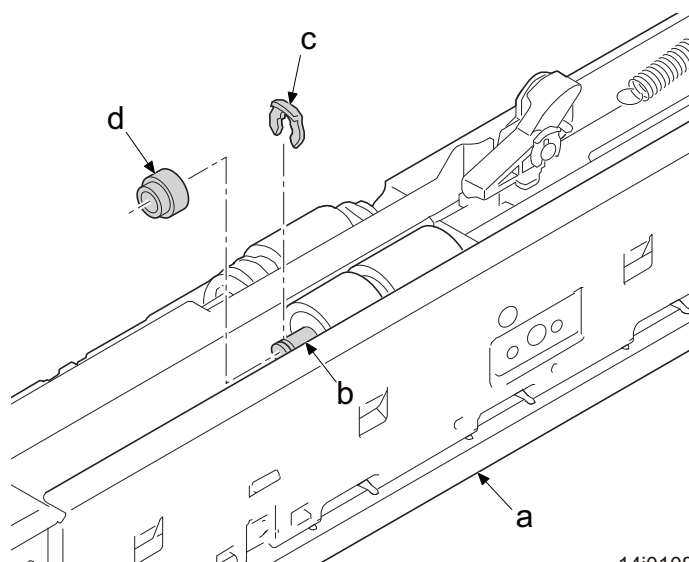


### (3-2) Detaching and reattaching the retard pulley

#### Procedures

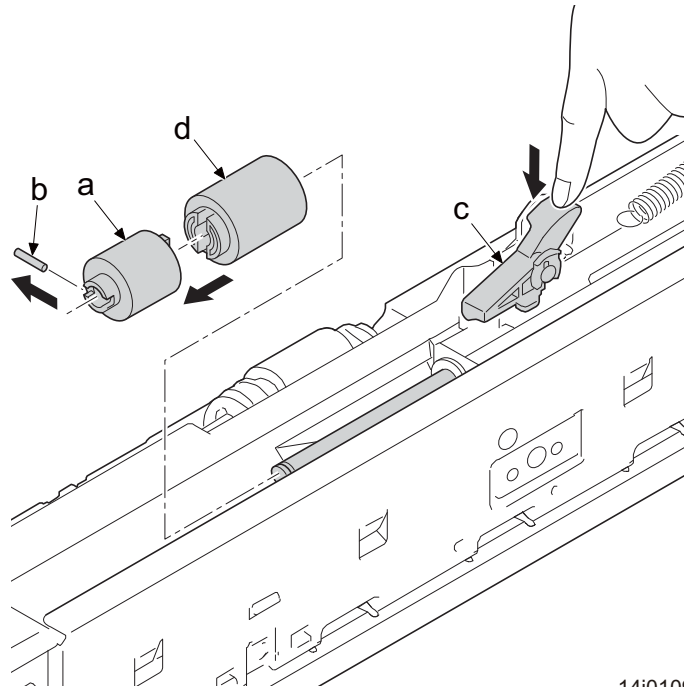
- 1 Detach the PF paper feed unit (a).
- 2 Turn over the PF paper feed unit (a).
- 3 Remove two stop rings (c) from the separation pulley shaft (b).
- 4 Pull out the spacer (d) from separation pulley shaft and remove it.

Take care not to fall the set pin, when removing the spacer.





- 5 Pull out the set pin (b) of torque limiter (a).
- 6 Pull out the torque limiter (a) and PF separation pulley shaft while pushing Retard release lever (c), and remove it.
- 7 Clean or replace the PF separation pulley.
- 8 Attach the PF separation pulley back again to the PF feed unit.
- 9 Reattach the PF paper feed unit in the original position.



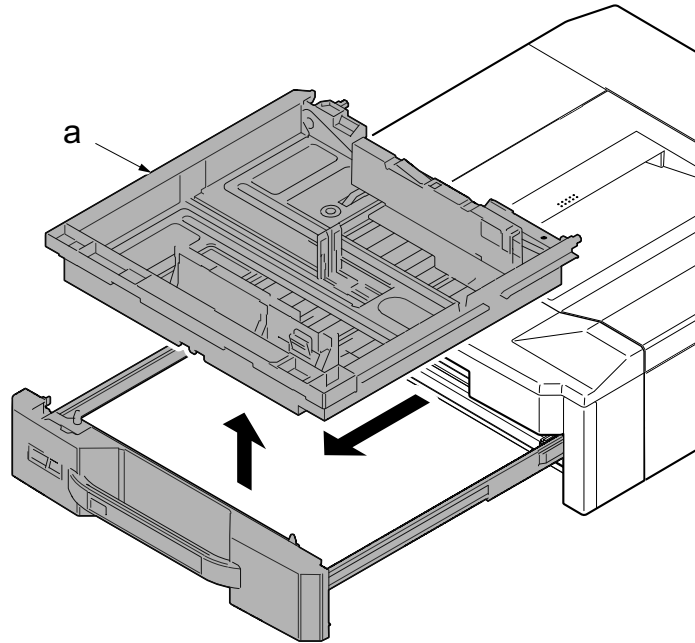
14j0109

**✔ IMPORTANT**

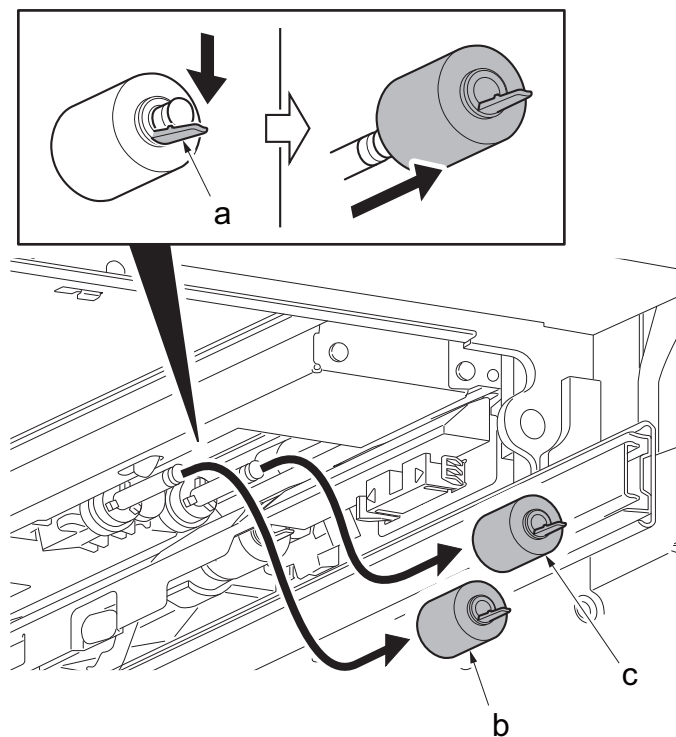
When replacing the new pickup holder or retard holder, take care not to touch the roller surface.

**(4)Side Multi Feeder (PF-7130)****(4-1)Detaching and reattaching the forwarding pulley/paper feed pulley/separation pulley****Procedures**

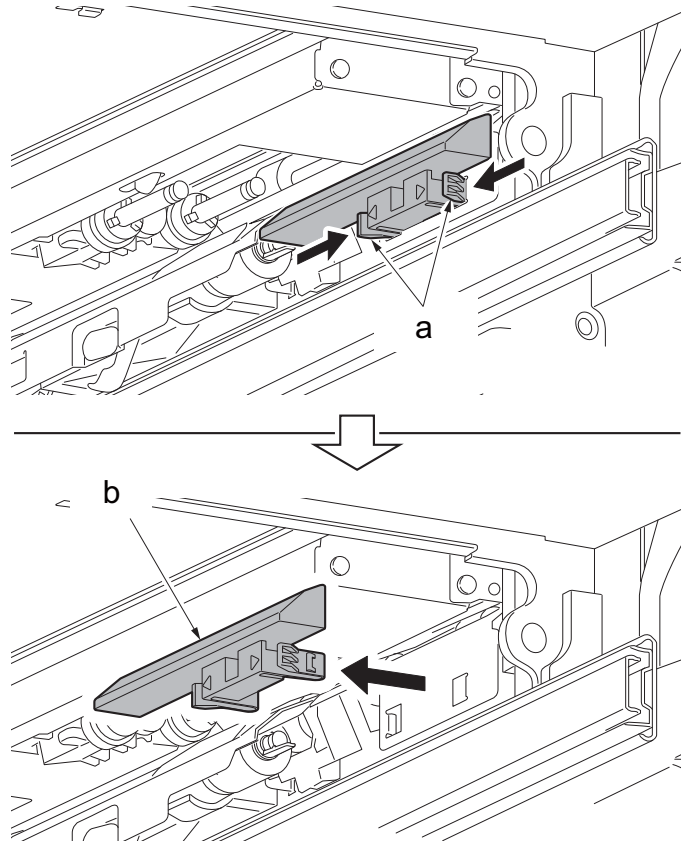
- 1** Pull out the cassette (a) and remove it in the direction of the arrow.



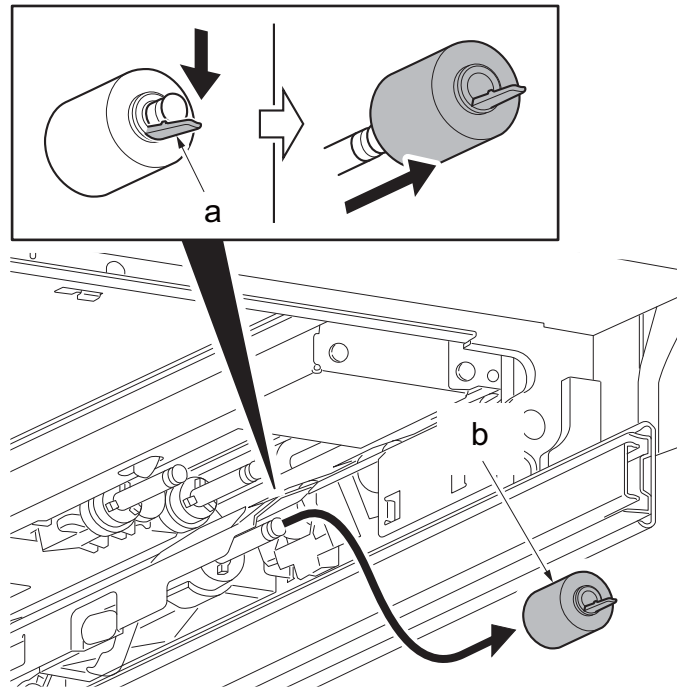
- 2** Release the hook (a) and remove the forwarding pulley (b) from the shaft.
- 3** Release the hook (a) and remove the paper feed pulley (c) from the shaft.



**4** Release two hooks (a) and remove the cover (b).



- 5 Release the hook (a) and remove the separation pulley (b) from the shaft.
- 6 Check that the contact between the paper feed pulley and separation pulley is released.
- 7 Clean or replace the forwarding pulley, paper feed pulley and separation pulley.
- 8 Reattach the forwarding pulley, paper feed pulley and separation pulley in the original position of the primary paper feed unit.
- 9 Attach them while checking the color of the collar. Forwarding pulley (Collar: white)  
Paper feed pulley (Collar: white) Separation pulley (Collar: black)



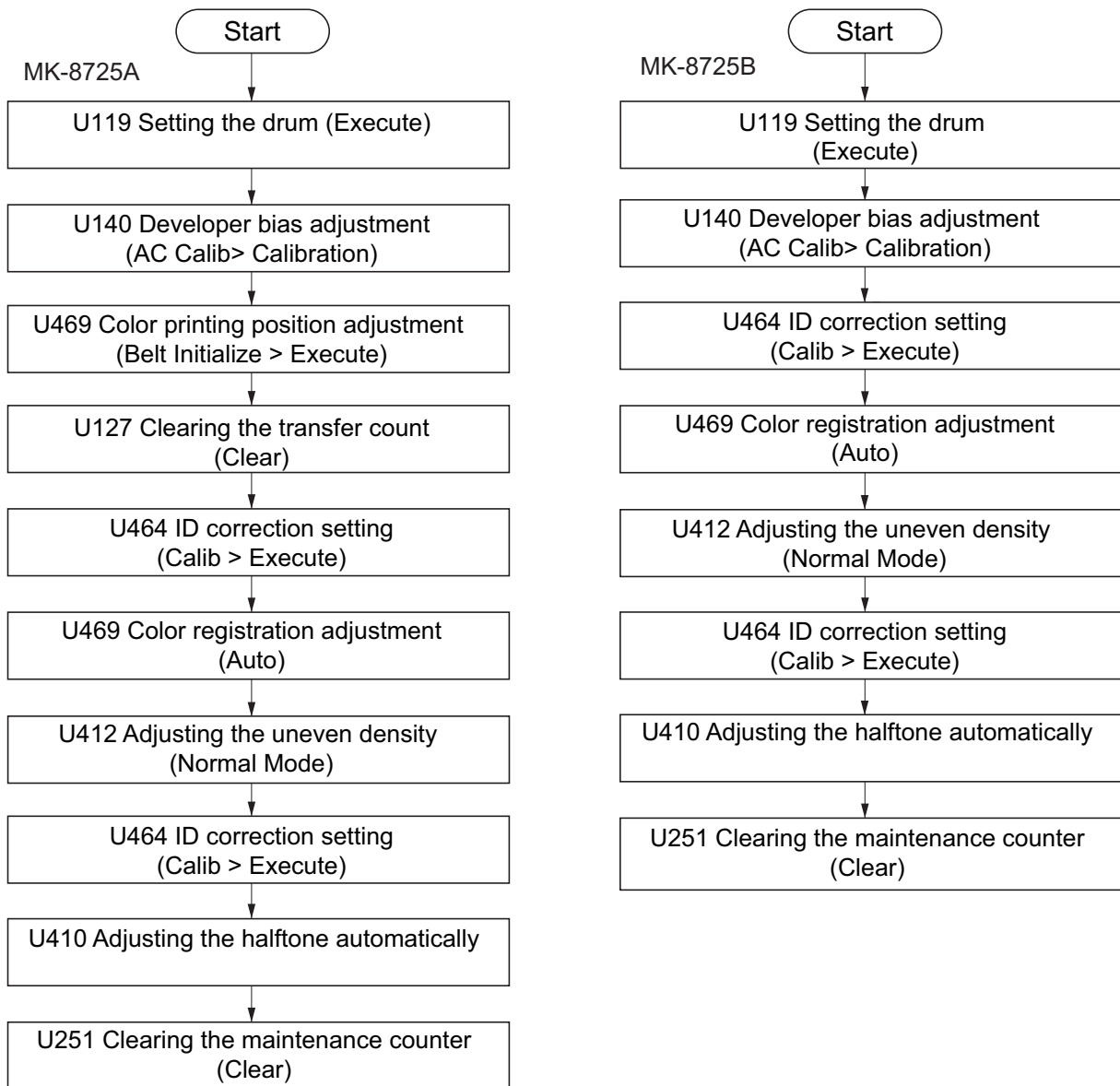
When replacing the forwarding pulley, paper feed pulley and separation pulley, execute U903 (Jam counter clear). (Refer [P.6-328](#)) Clearing the maintenance counts (maintenance mode U251): Clear (Refer [P.6-207](#))

## 4 - 5 Adjustment procedures after replacing the maintenance kit

Execute the following procedures after replacing the above maintenance kit.

Execute with the preset in the U952 maintenance mode workflow. ([P.6-344](#))

- 1 Input "10871087" using the numeric keys to enter the maintenance mode.
- 2 Input "952" using the numeric keys and press the [Start] key.
- 3 Select the [Execute].
- 4 Select the maintenance kit to set.
- 5 Select the displayed maintenance modes from the top and press the [Start] key to enter the maintenance mode.
- 6 After transition, execute the setting steps in the maintenance mode.
- 7 After executing, press the [Stop] key to go back to the original flow.
- 8 Repeat step 5, 6 and 7 and terminate the workflow



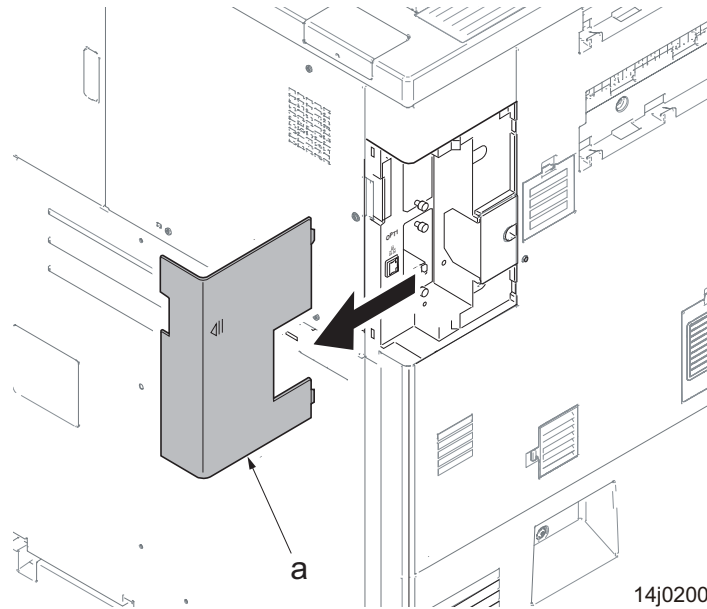
## 4 - 6 Disassembly and Reassembly procedures

### (1) OUTER COVERS

#### (1-1) Detaching and reattaching the rear right cover and rear left cover

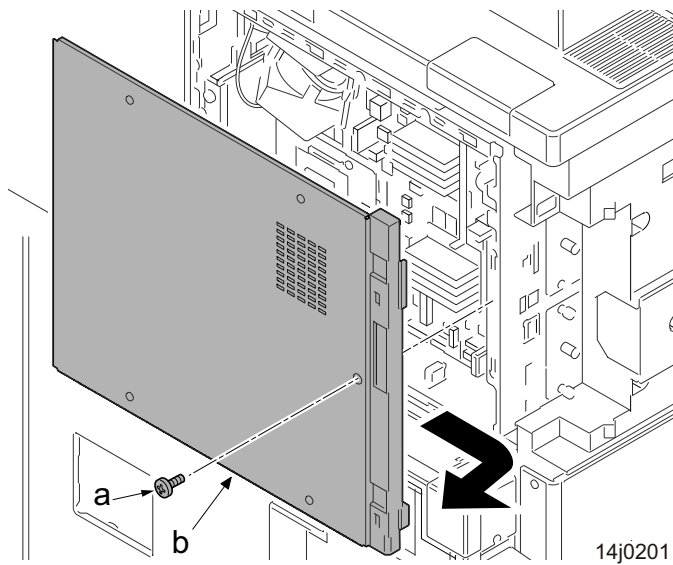
##### Procedures

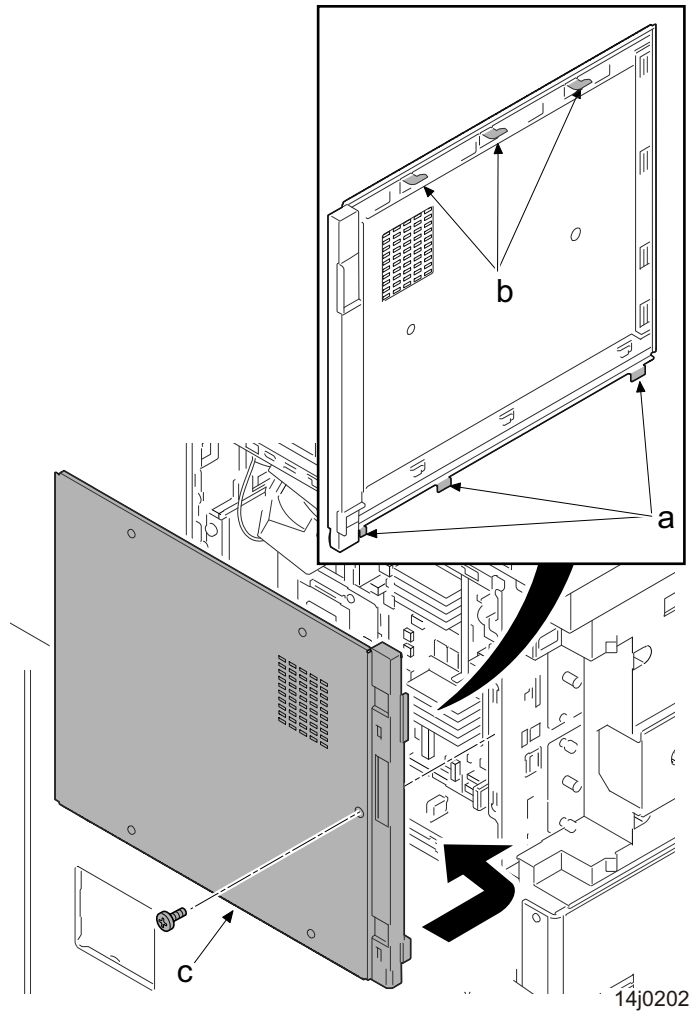
- 1 Remove the controller cover (a).



- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.

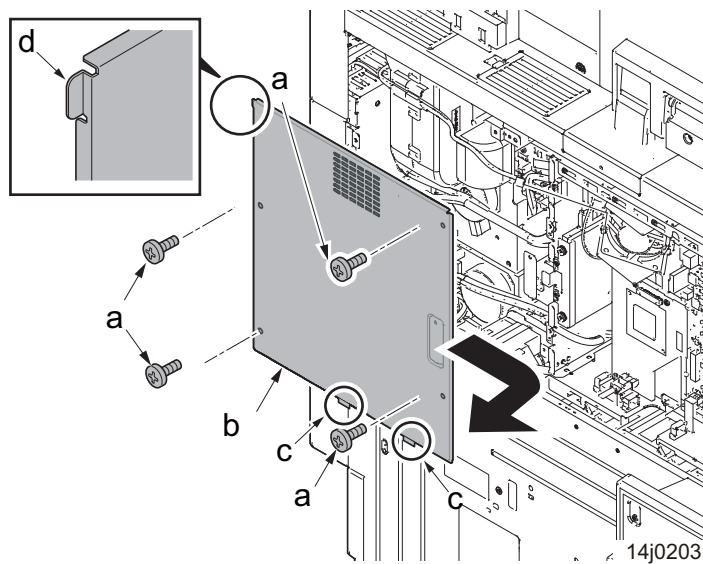
When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.





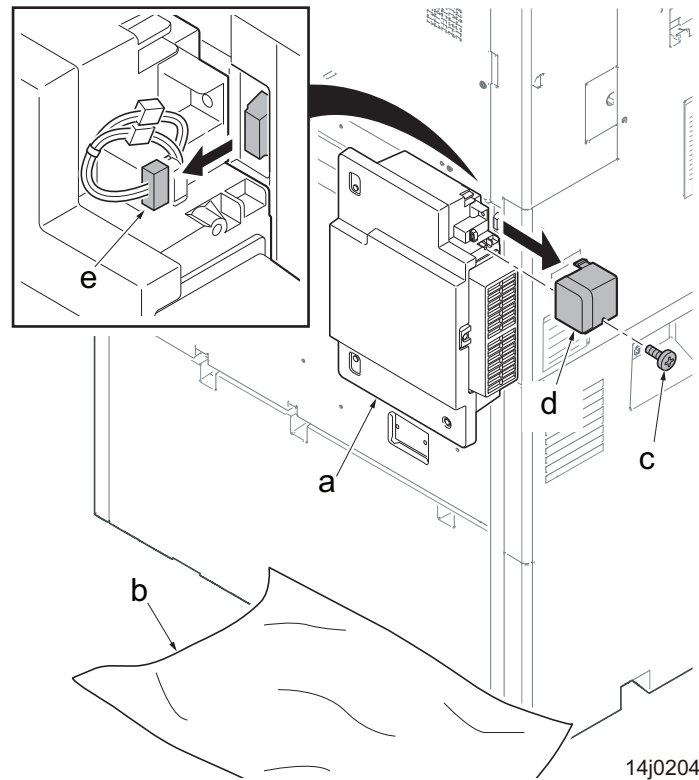
**3 Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.**

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.



**(1-2) Detaching and reattaching the rear lower cover****Procedures**

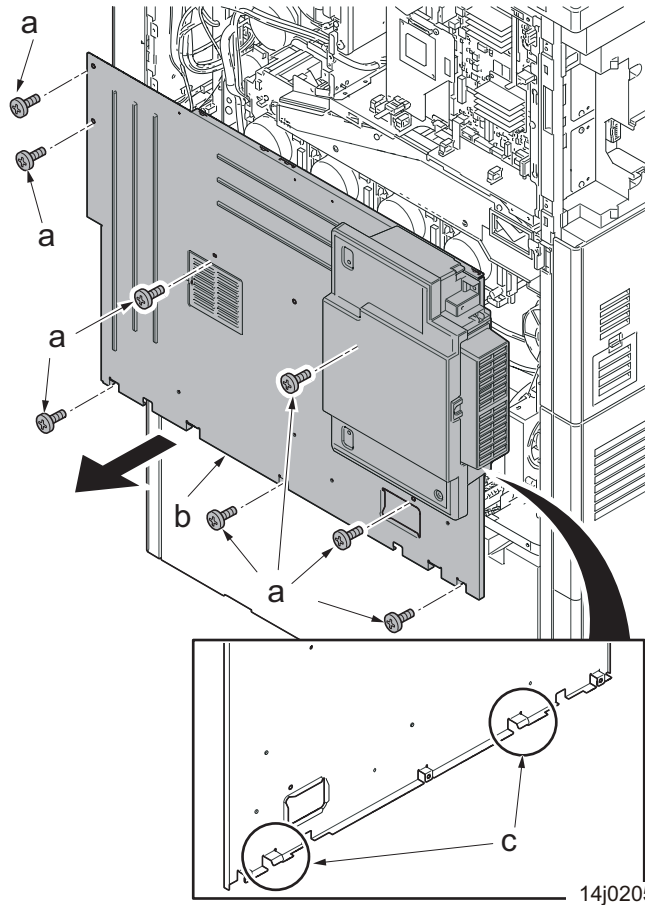
- 1** Cover the area under the waste toner box (a) to prevent contamination due to the scattered toner with the sheet (b).
- 2** Remove the screw (c)(M3x8) and remove the cable cover (d).
- 3** Disconnect the connector (e).



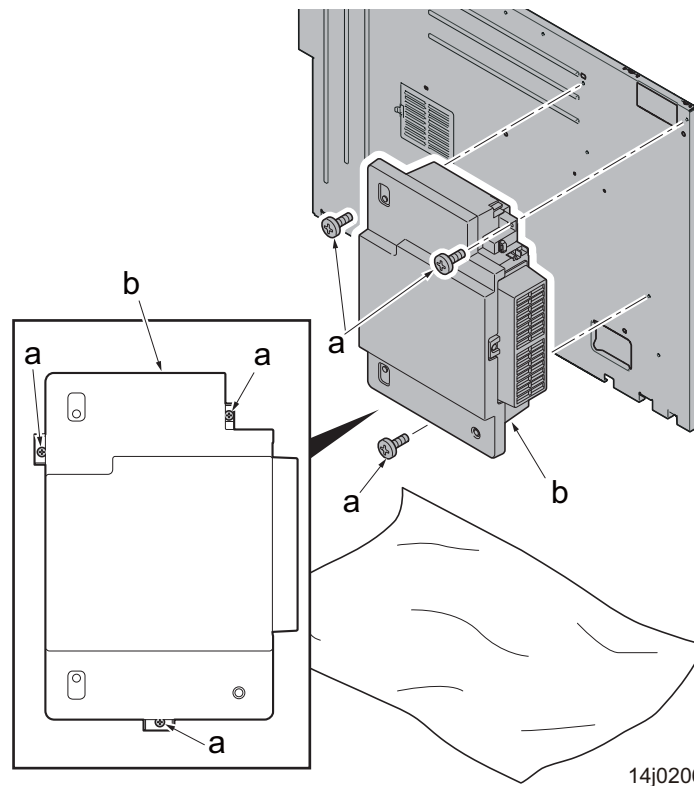
14j0204



- 4 Remove nine screws (a)(M3x8).
- 5 Release two lower hooks (b) and remove the rear lower cover (c).

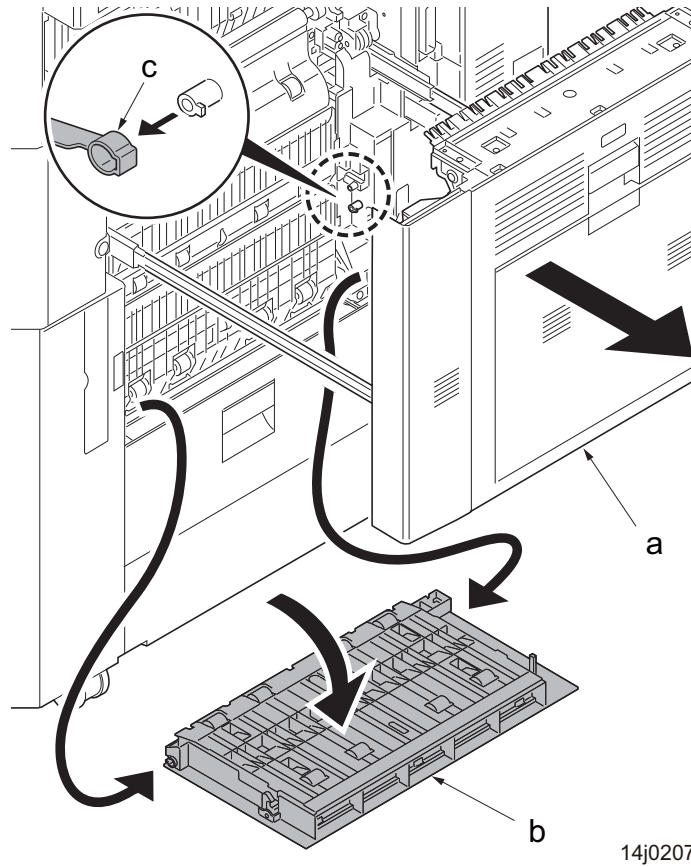


- 6 Remove three screws (a)(M3x8) and remove the waste toner box (b).

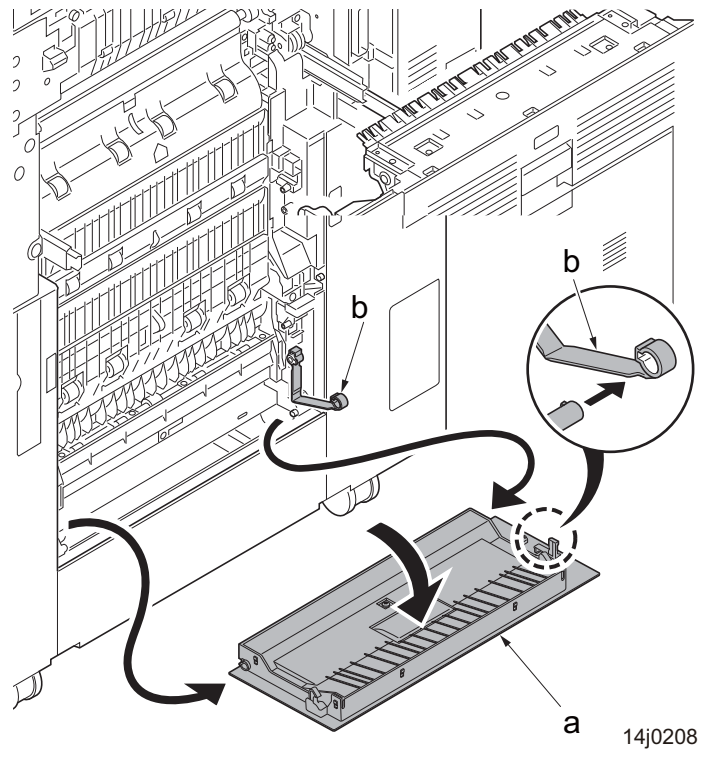


**(1-3) Detaching and reattaching the conveying cover and PF conveying cover****Procedures**

- 1** Pull out the paper cassette 1, 2, 3 and 4.
- 2** Pull out the conveying unit (a).
- 3** Open the conveying cover (b).
- 4** Remove the strap (c) and then remove the conveying cover (b).

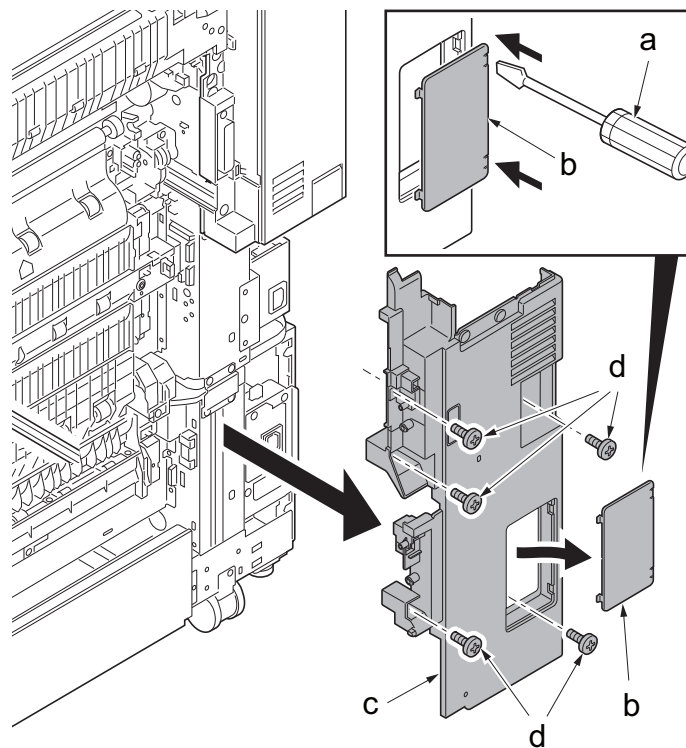


- 5 Open the PF conveying cover (a).
- 6 Remove the strap (b) and then remove the PF conveying cover (a).



**(1-4) Detaching and reattaching the right lower rear cover****Procedures**

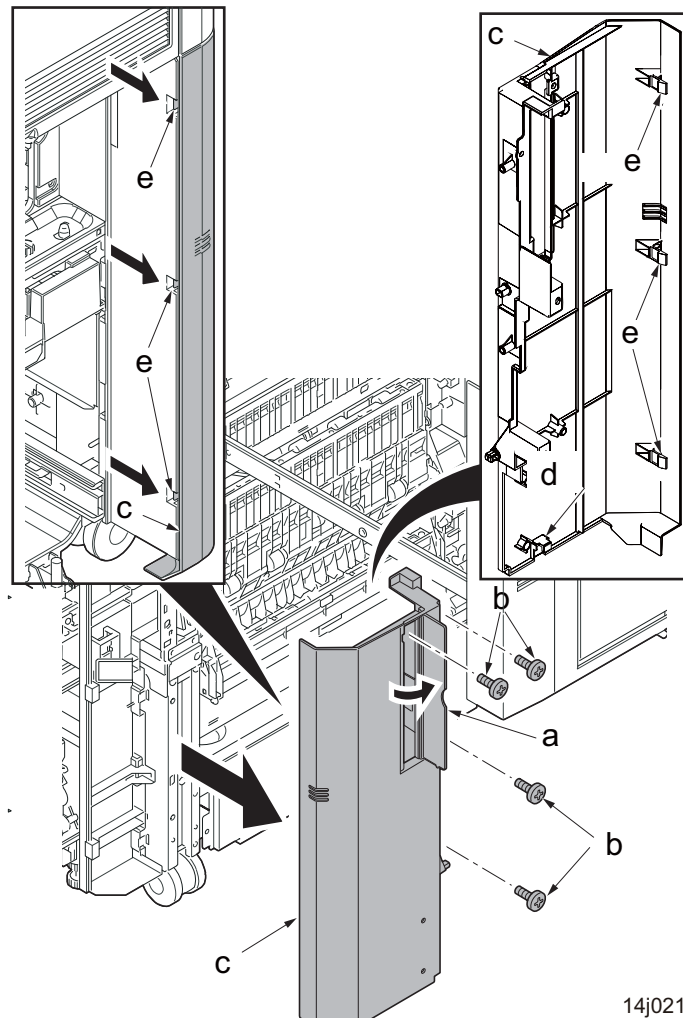
- 1** Remove the rear left cover, rear right cover and rear lower cover.
- 2** Pull out the conveying unit.
- 3** Release two hooks using a flat blade screwdriver (a) and then remove the interface cover (b).
- 4** Remove five screws (d)(M4x8) of the right lower rear cover (c).
- 5** Remove the right lower rear cover (c).



14j0209

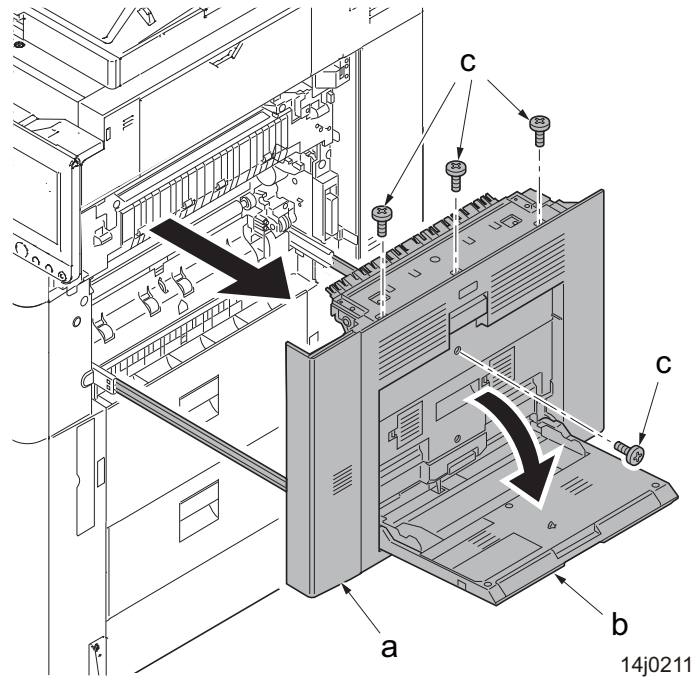
**(1-5) Detaching and reattaching the right lower front cover****Procedures**

- 1** Pull out the conveying unit.
- 2** Open the handle cover (a).
- 3** Remove four screws (b)(M4x8).
- 4** Release the lower hook (d) of the right lower front cover (c), release the three hooks (e) at the main unit front side while opening it from the near side, and remove the right lower front cover (c).

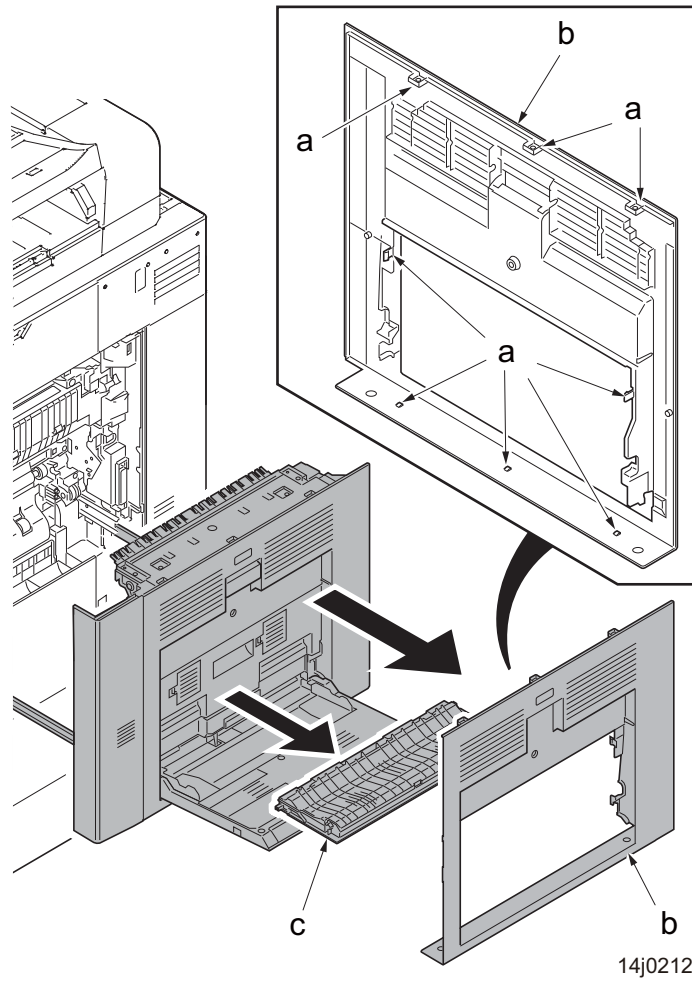


**(1-6) Detaching and reattaching the right cover and DU cover assembly****Procedures**

- 1** Pull out the conveying unit (a).
- 2** Open the MP tray (b).
- 3** Remove four screws (a)(M4x8).

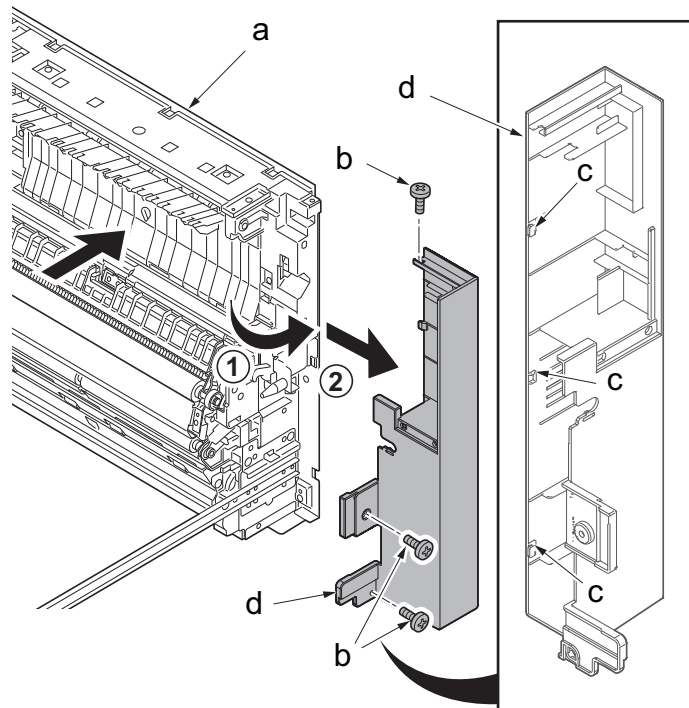


**4 Release eight hooks (a). And then remove the right cover (b) and DU cover assembly (c).**



**(1-7) Detaching and reattaching the front right cover****Procedures**

- 1** Pull out the conveying unit (a).
- 2** Remove three screws (b)(M3x8).
- 3** Release three hooks (c) and remove the front right cover (d).

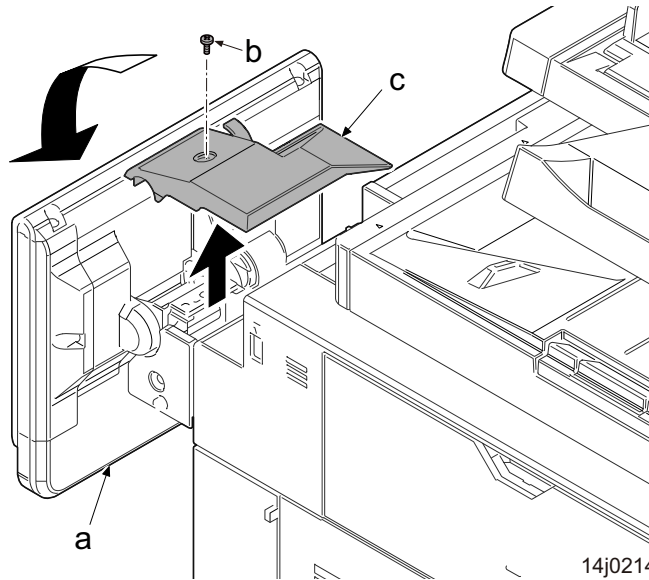


14j0213

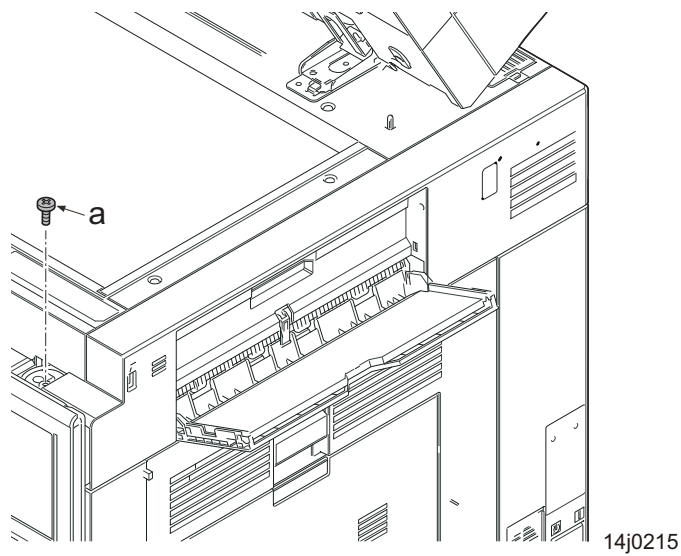


**(1-8) Detaching and reattaching the ISU right cover, right upper cover and right middle rear cover****Procedures**

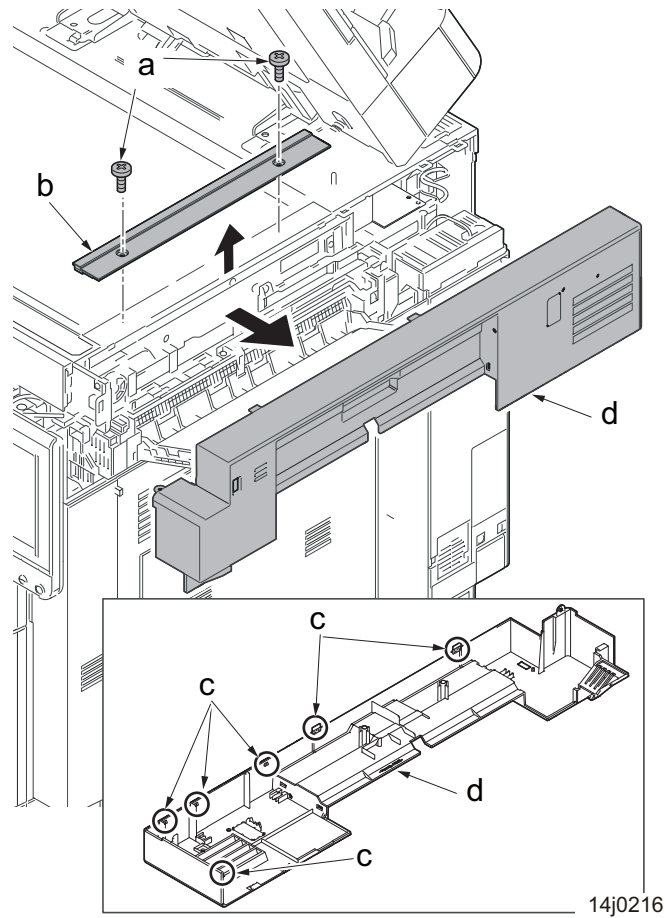
- 1** Tilt up the operation unit (a).
- 2** Remove the screw (b)(M3x8) and remove the operation rear cover (c) in the direction of the arrow.



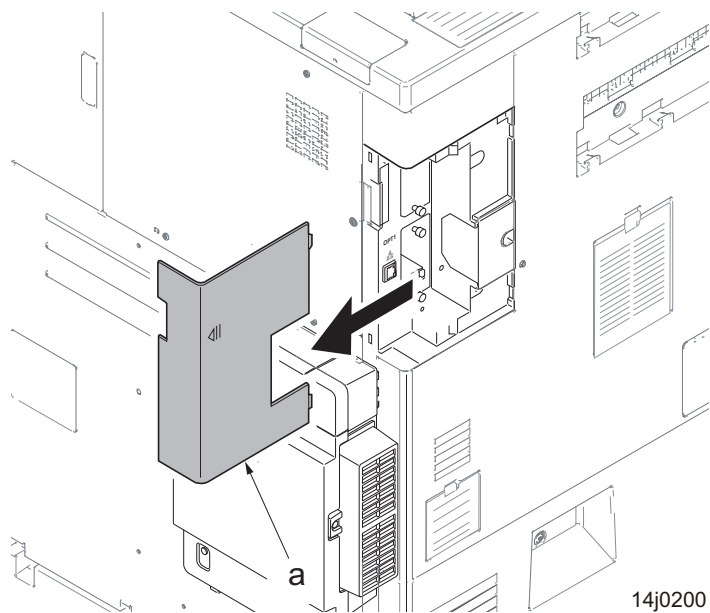
- 3** Remove the screw (a)(M4x8).



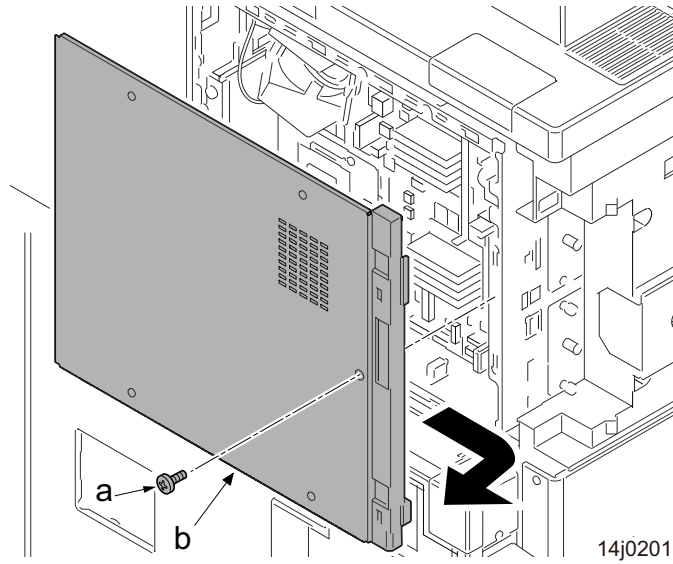
- 4 Remove two screws (a)(M4x8) and then remove the ISU right cover (b).
- 5 Release six hooks (c) and remove the right upper cover (d).



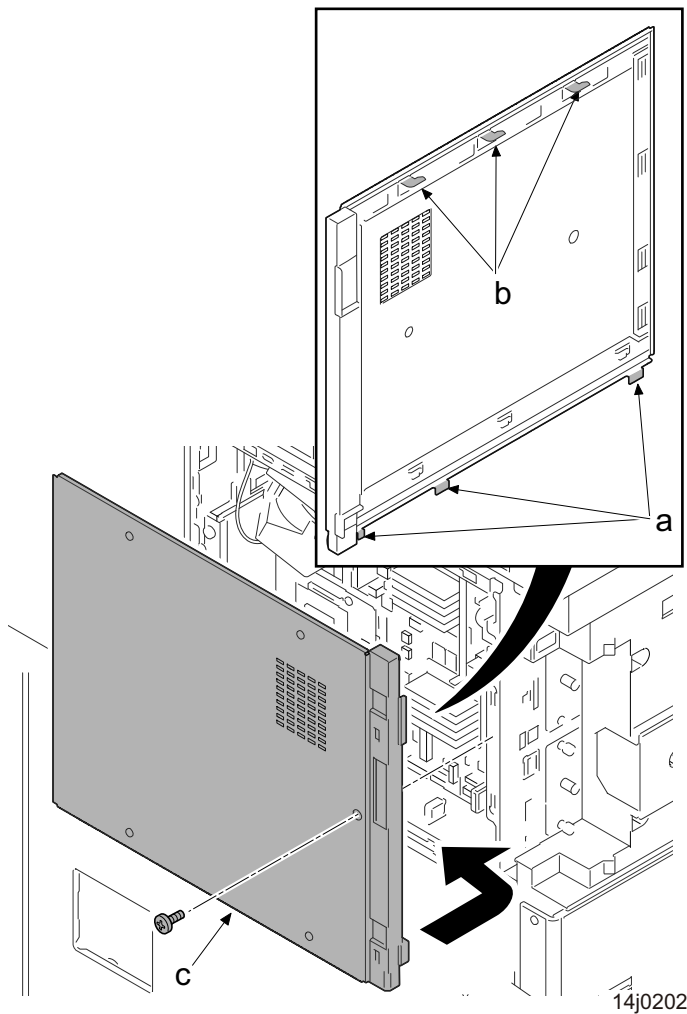
- 6 Remove the controller cover (a).



- 7** Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.

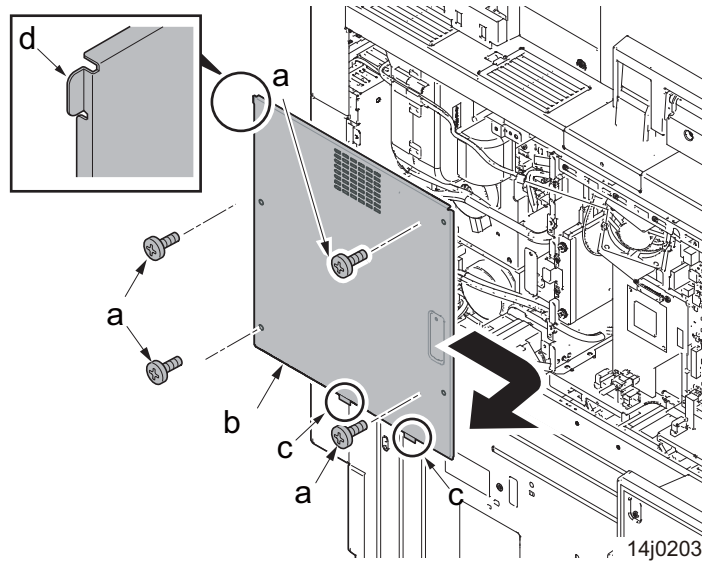


When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.



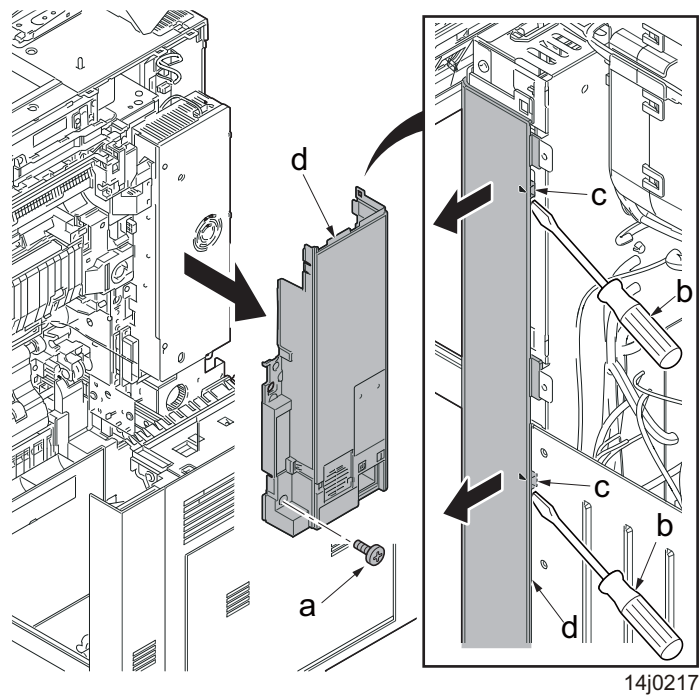
- 8** Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.



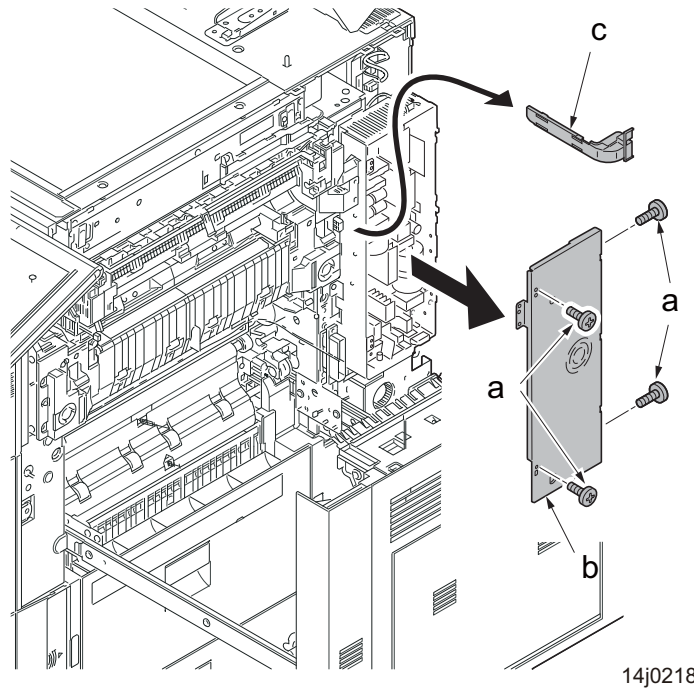
9 Remove the screw (a)(M4x8).

10 Release two hooks (c) using a flat blade screwdriver (b) and remove the right middle rear cover (d).

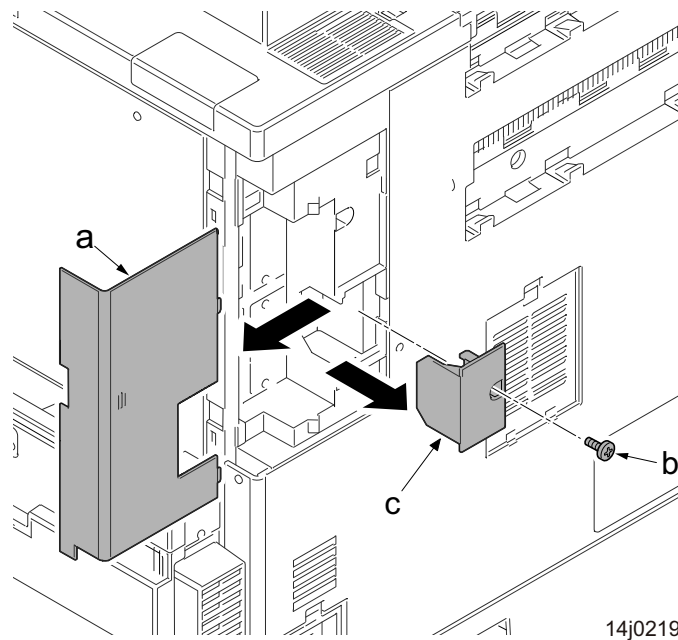


**(1-9) Detaching and reattaching the IH PWB cover and IH wire cover****Procedures**

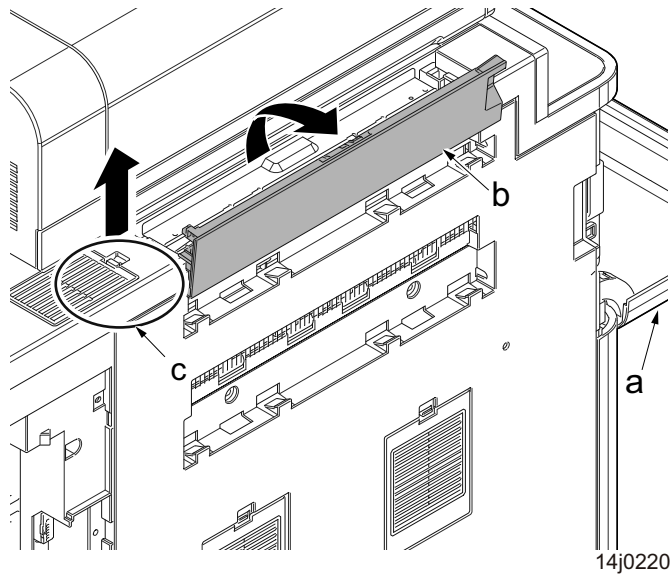
- 1 Remove the right middle rear cover.
- 2 Remove four screws (a)(M3x8) and then remove the IH PWB cover (b).
- 3 Remove the IH wire cover (c).

**(1-10) Detaching and reattaching the left upper cover****Procedures**

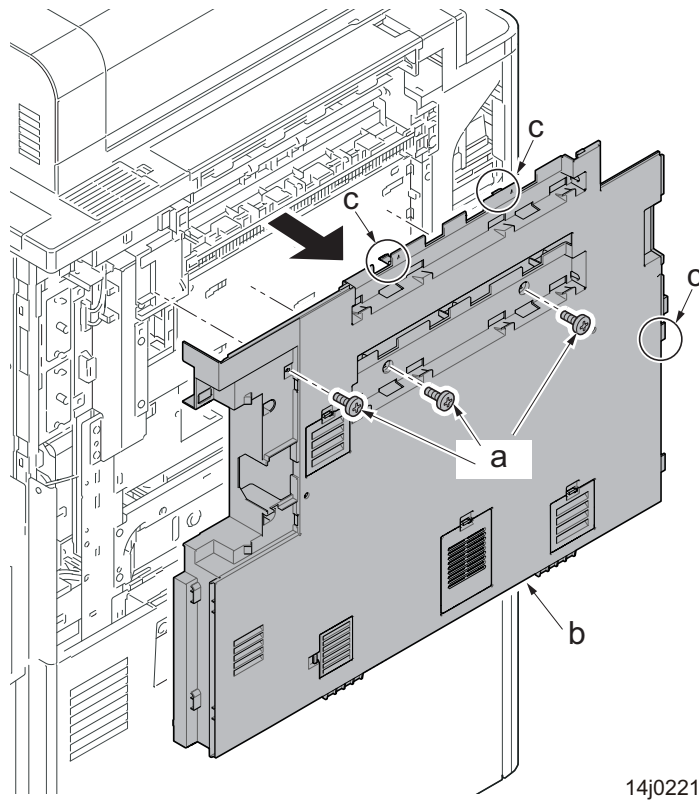
- 1 Remove the controller cover (a).
- 2 Remove the screw (b)(M3x8) and then remove the controller lid (c).



- 3 Open the front cover (a).
- 4 Open the bridge eject cover (b).
- 5 Unhook the rib by lifting up the ISU rear cover edge (c).

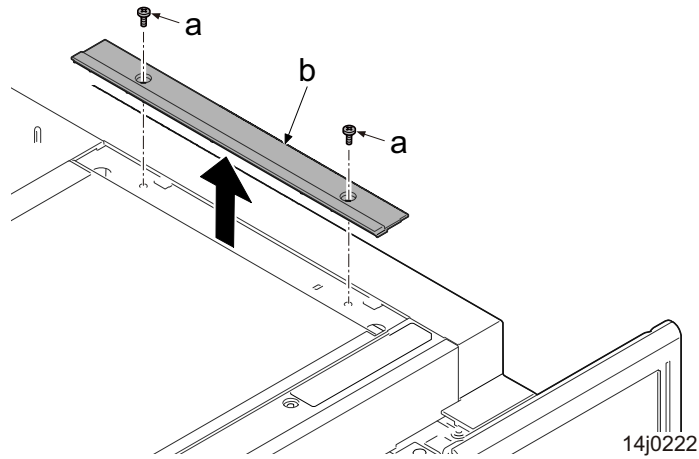


- 6 Remove three screws (a)(M4x8).
- 7 Release three hooks (c) and remove the left upper cover (b).

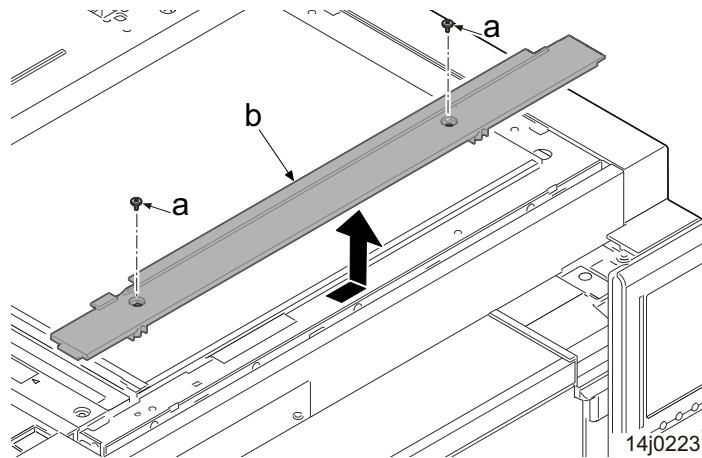


**(1-11) Detaching and reattaching the front glass cover, ISU right cover and ISU rear cover****Procedures**

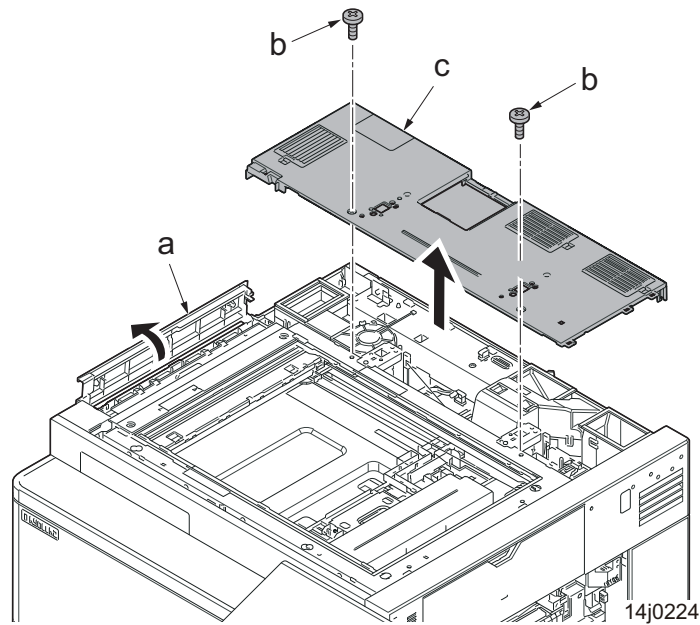
- 1 Detach the document processor.**
- 2 Remove two screws (a)(M4x8) and remove the ISU right cover (b) in the direction of the arrow.**



- 3 Remove two pins (a)(M4x6) and remove the front glass cover (b) by sliding it in the direction of the arrow.**



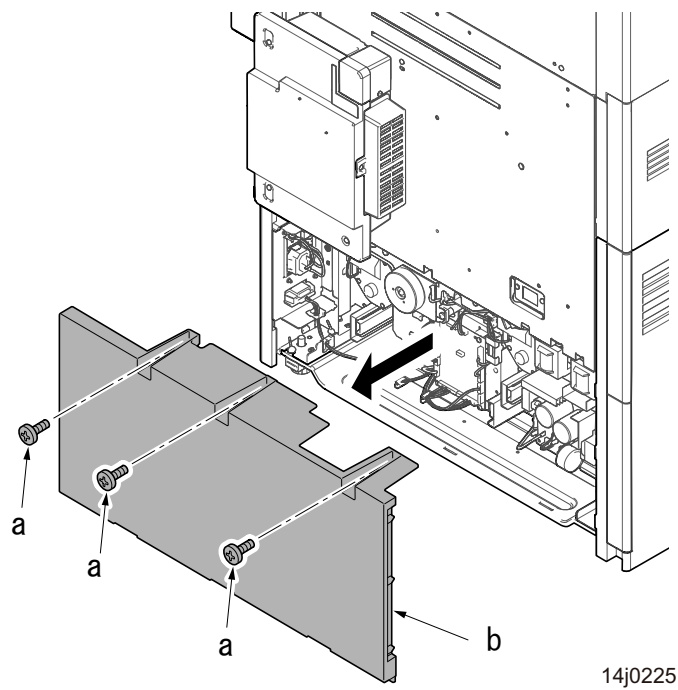
- 4 Open the bridge eject cover (a).
- 5 Remove two screws (b)(M4x8) and remove the ISU rear cover (c).



#### (1-12) Detaching and reattaching the PF rear cover

##### Procedures

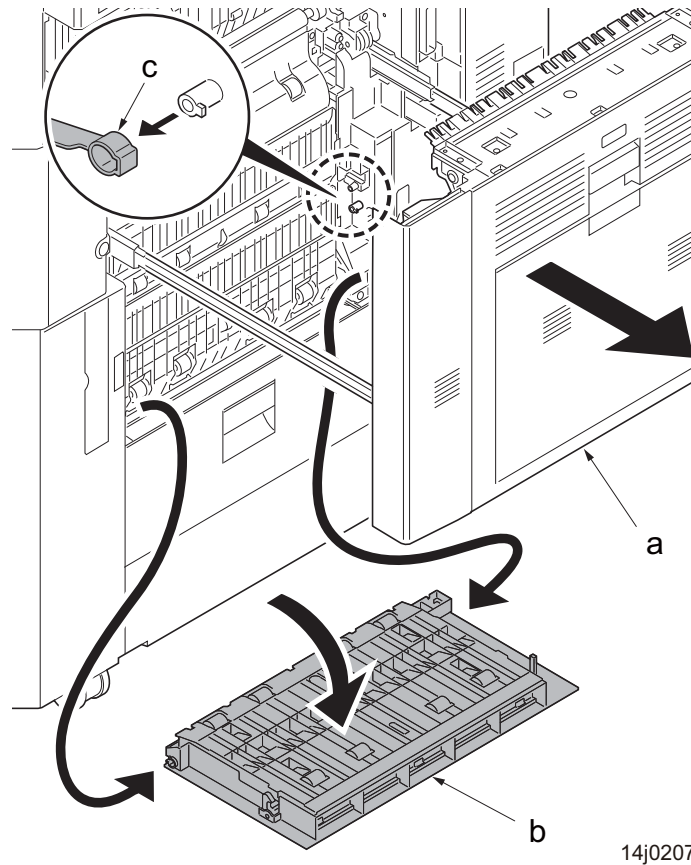
- 1 Remove three screws (a)(M4x8) and remove the PF rear right cover (b).



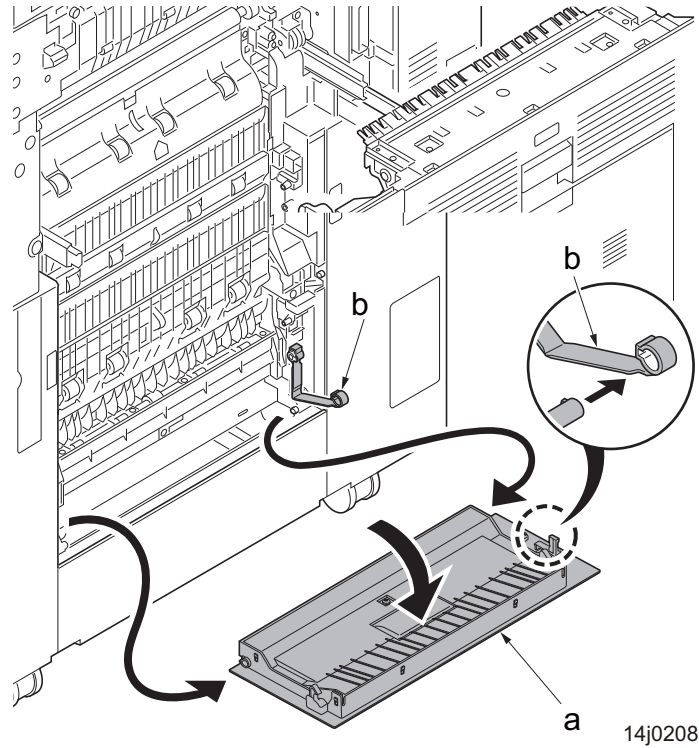


**(2) Paper feed section****(2-1) Detaching and reattaching the primary paper feed unit****Procedures**

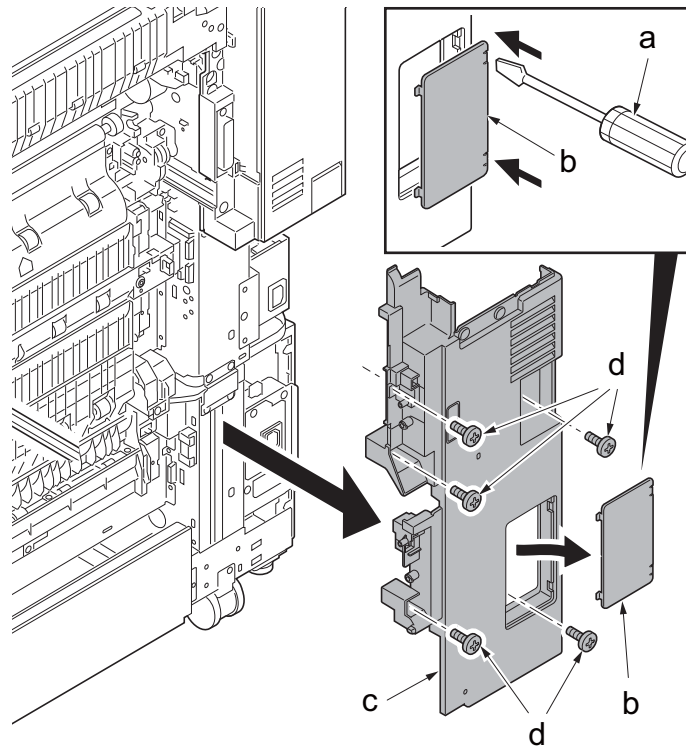
- 1** Pull out the paper cassette 1, 2, 3 and 4.
- 2** Pull out the conveying unit (a).
- 3** Open the conveying cover (b).
- 4** Remove the strap (c) and then remove the conveying cover (b).



- 5 Open the PF conveying cover (a).
- 6 Remove the strap (b) and then remove the PF conveying cover (a).

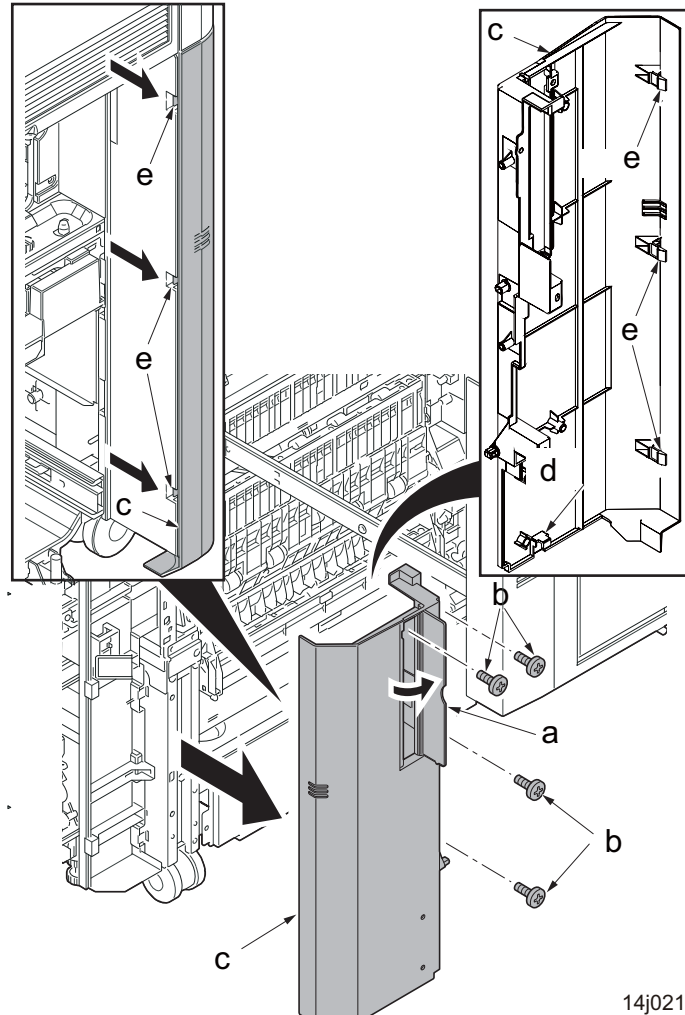


- 7 Remove the rear right cover and rear lower cover.
- 8 Pull out the conveying unit.
- 9 Release two hooks using a flat blade screwdriver (a) and then remove the interface cover (b).
- 10 Remove five screws (d)(M4x8) of the right lower rear cover (c).
- 11 Remove the right lower rear cover (c).



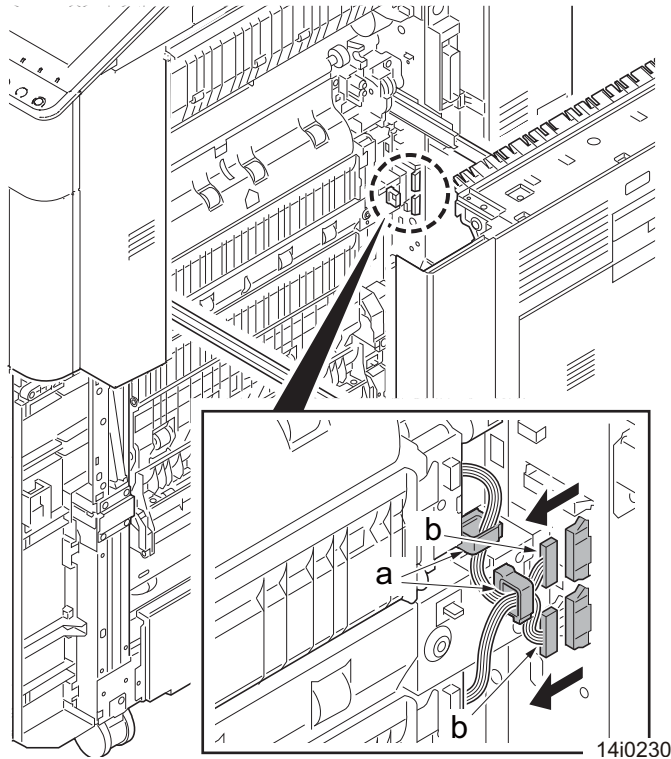
14j0209

- 12 Open the handle cover (a).
- 13 Remove four screws (b)(M4x8).
- 14 Release the lower hook (d) of the right lower front cover (c), release the three hooks (e) at the main unit front side while opening it from the near side, and remove the right lower front cover (c).



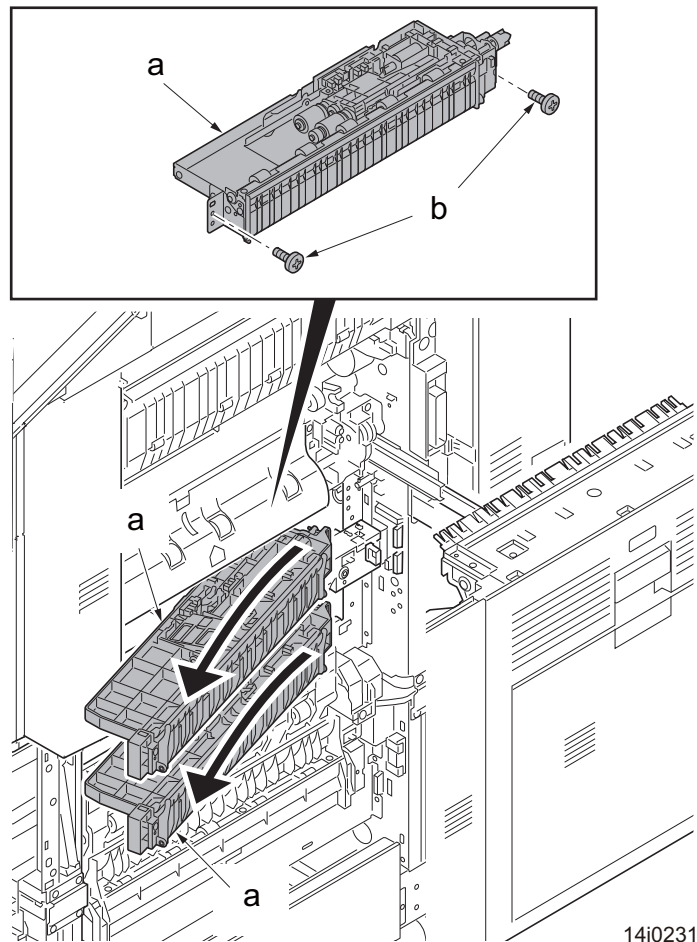
**15** Release two wire saddles (a).

**16** Disconnect two connectors (b).

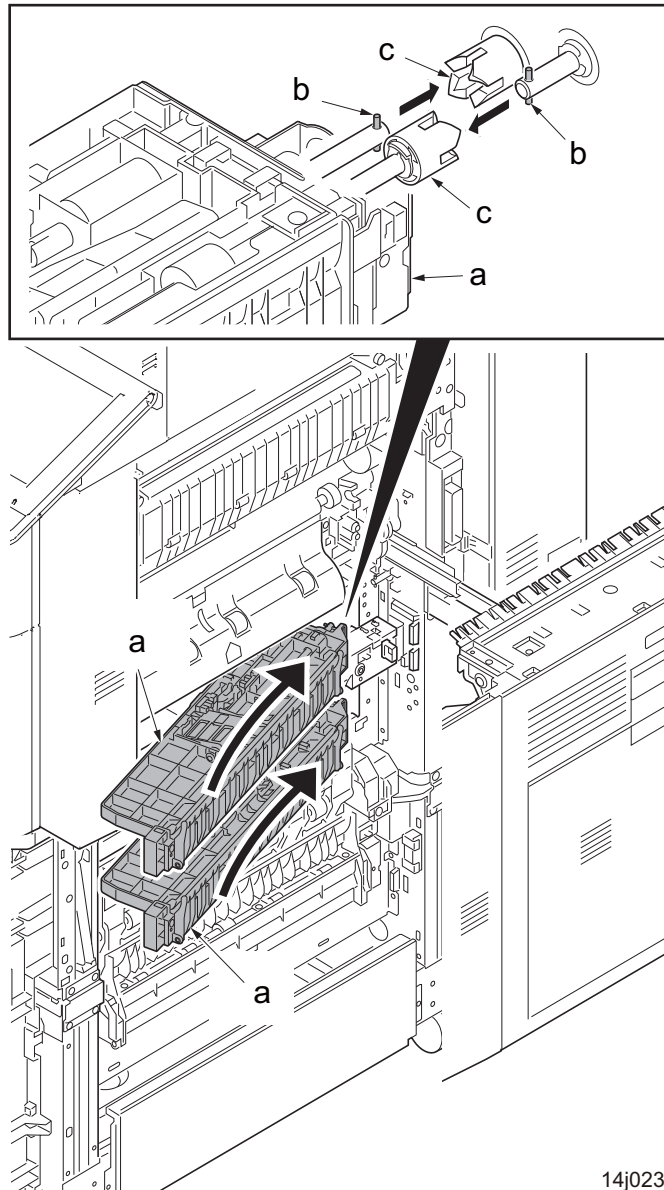


## Detaching the primary paper feed unit

- 1 Remove each two screws (b)(M4x8) of the primary paper feed unit (a).
- 2 Remove the primary paper feed unit (a).



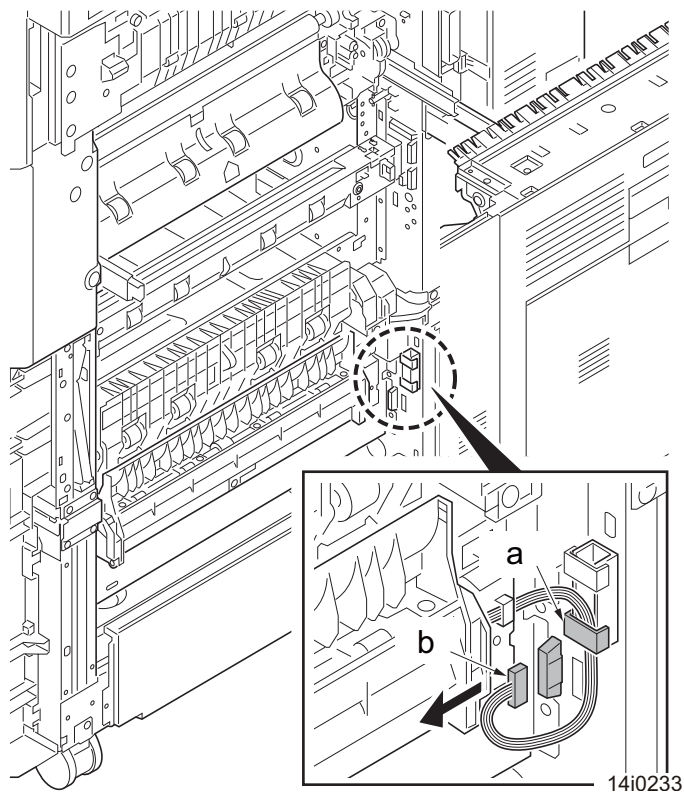
- 3 Check or replace the primary paper feed unit (a) and then reattach the parts in the original position.
- 4 When reattach the primary paper feed unit, confirm that the pin (b) is firmly inserted to the driving coupler (c).
- 5 When replacing the primary paper feed unit, execute U903 (Jam counter clear). (Refer [P.6-328](#)) Execute "Maintenance counter – cassette –cassette counter clear" in maintenance mode U251 (Maintenance counter set/clear). (Refer [P.6-207](#))



14j0232

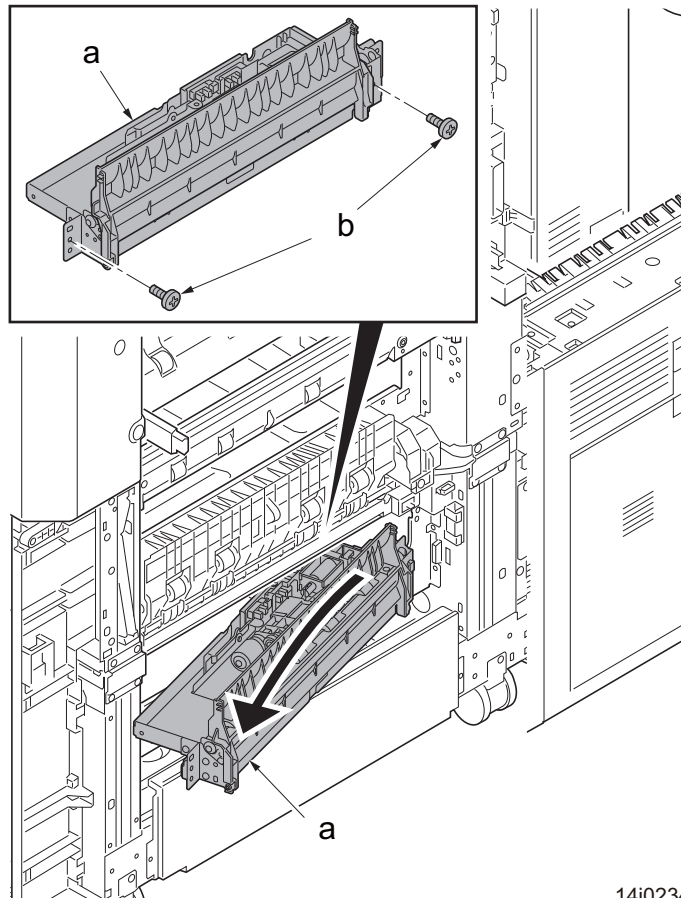
**(2-2) Detaching and reattaching the PF primary paper feed unit**

- 1** Remove the wire holder (a).
- 2** Disconnect the connector (b).



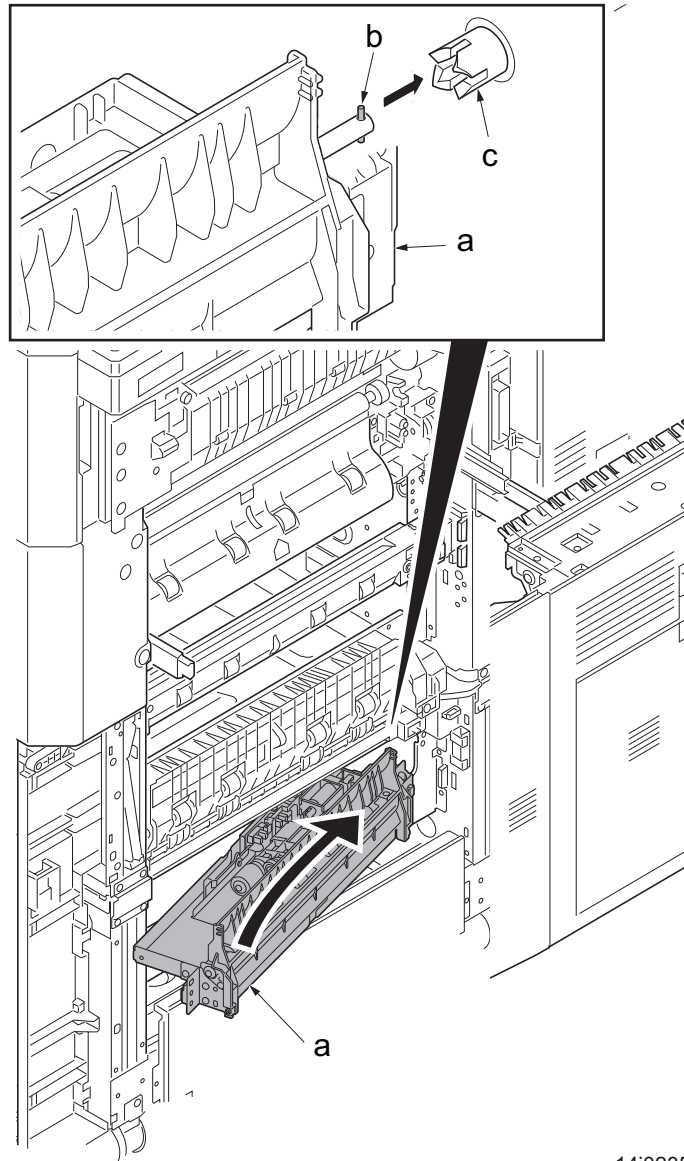


- 3 Remove two screws (a)(M4x8) of the PF primary paper feed unit (a).
- 4 Remove the PF primary paper feed unit (a).



14i0234

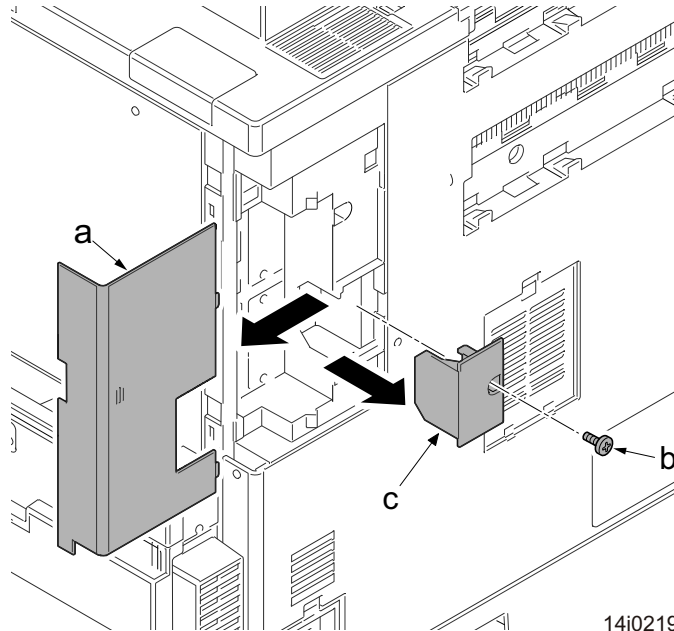
- 5 Check or replace the PF primary paper feed unit (a) and then reattach the parts in the original position.
- 6 When reattach the PF primary paper feed unit, confirm that the pin (b) is firmly inserted to the driving coupler (c).
- 7 When replacing the PF primary paper feed unit, execute U903 (Jam counter clear). (Refer [P.6-328](#)) Execute "Maintenance counter – cassette –cassette counter clear" in maintenance mode U251 (Maintenance counter set/clear). (Refer [P.6-207](#))



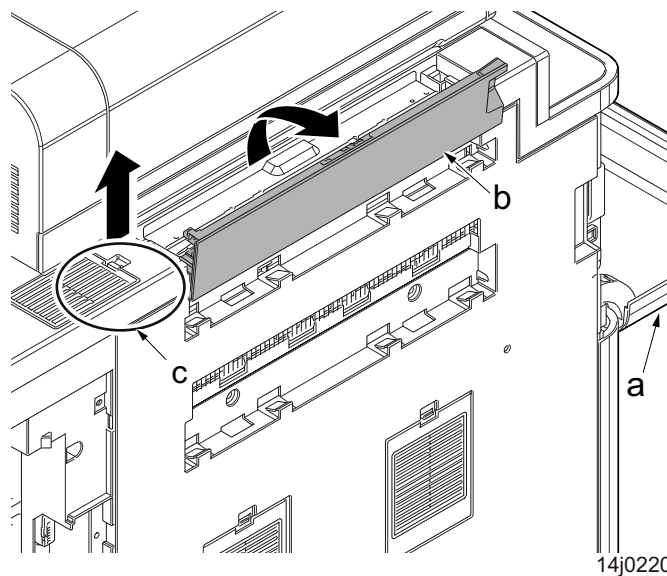
14j0235

**(3)Optical section****(3-1)Detaching and reattaching the LSU****Procedures**

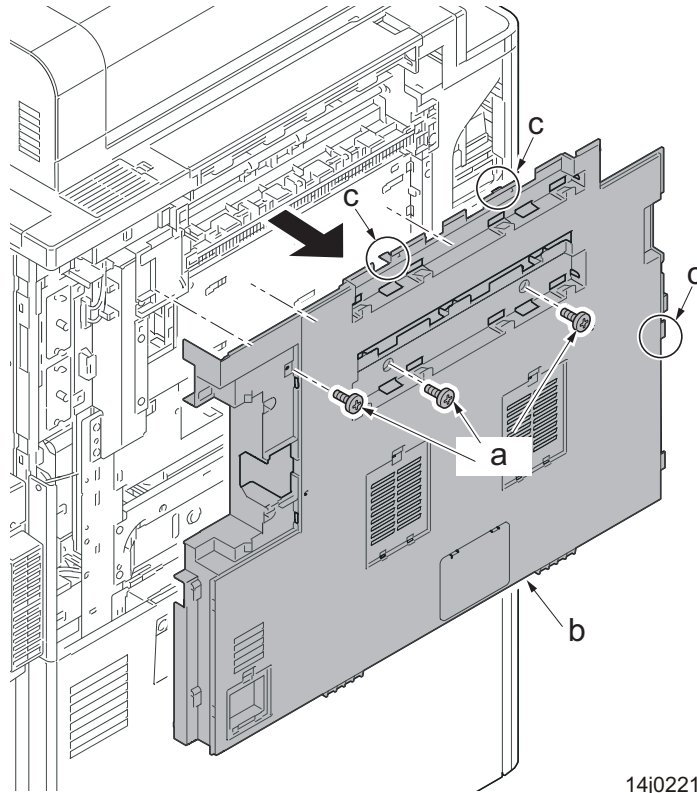
- 1 Remove the controller cover (a).**
- 2 Remove the screw (b)(M3x8) and then remove the controller lid (c).**



- 3 Open the front cover (a).**
- 4 Open the bridge eject cover (b).**
- 5 Unhook the rib by lifting up the ISU rear cover edge (c).**

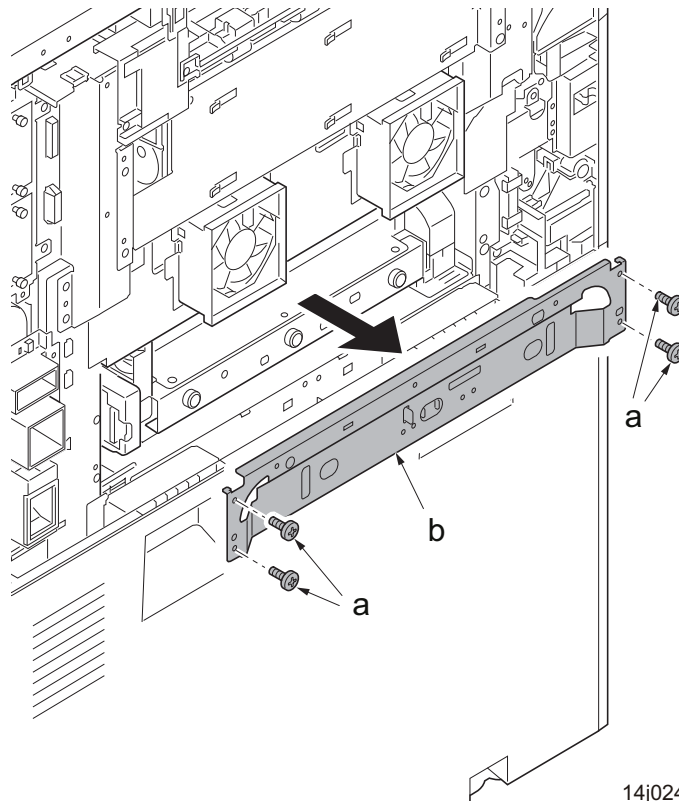


- 6 Remove three screws (a)(M4x8).
- 7 Release three hooks (c) and remove the left upper cover (b).



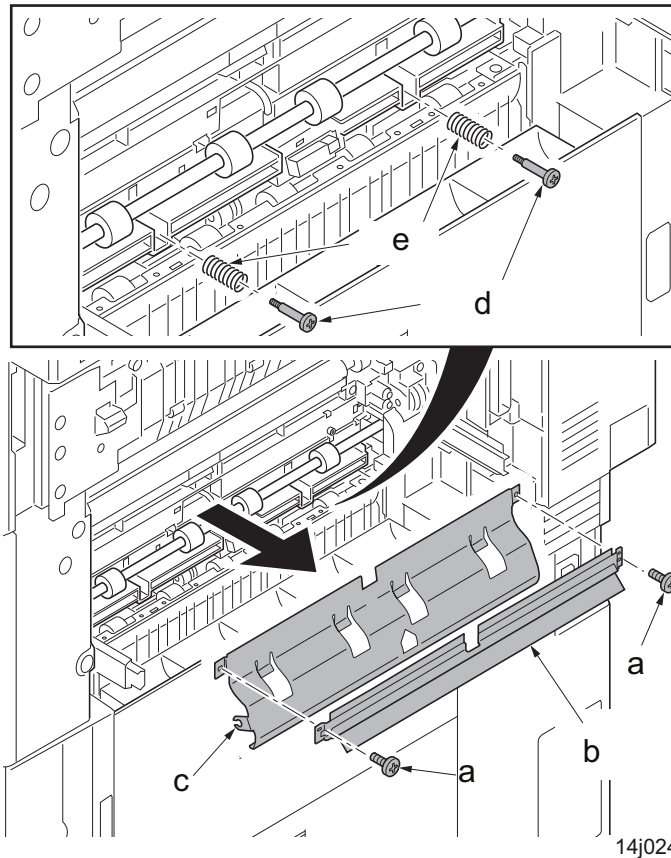
14j0221

- 8 Remove four screws (a)(M4x8) and then remove the LSU retainer (b).



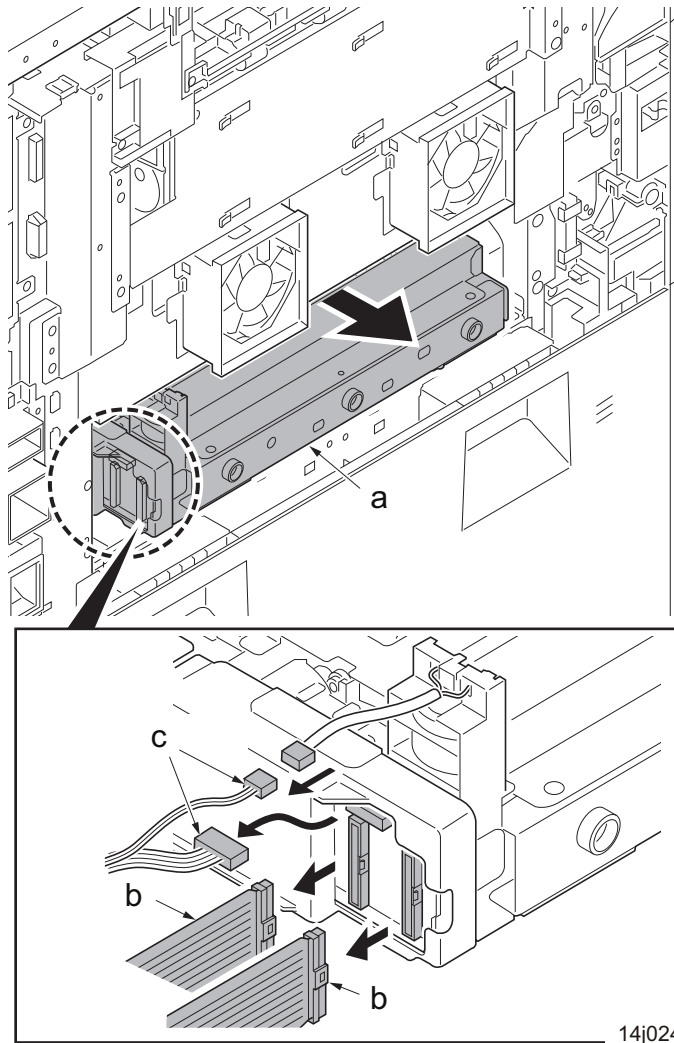
14j0240

- 9 Remove two screws (a)(M4x8) and then remove the middle feed plate (a) and middle feed plate B (b).
- 10 Remove two LSU retainer pins (c) and two springs (d).



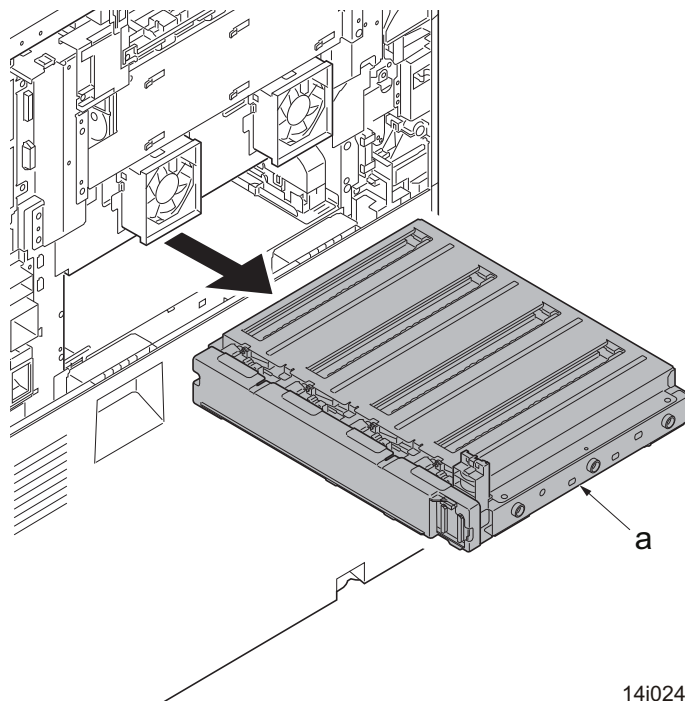
- 11 Pull the LSU (a) out a little.
- 12 Disconnect the following connectors from the LSU (a). Connector with a lock (b): 2pcs  
Connector (c): 2pcs

When disconnect the FFC with a connector, unlock the lock by pressing the lock lever in its center.



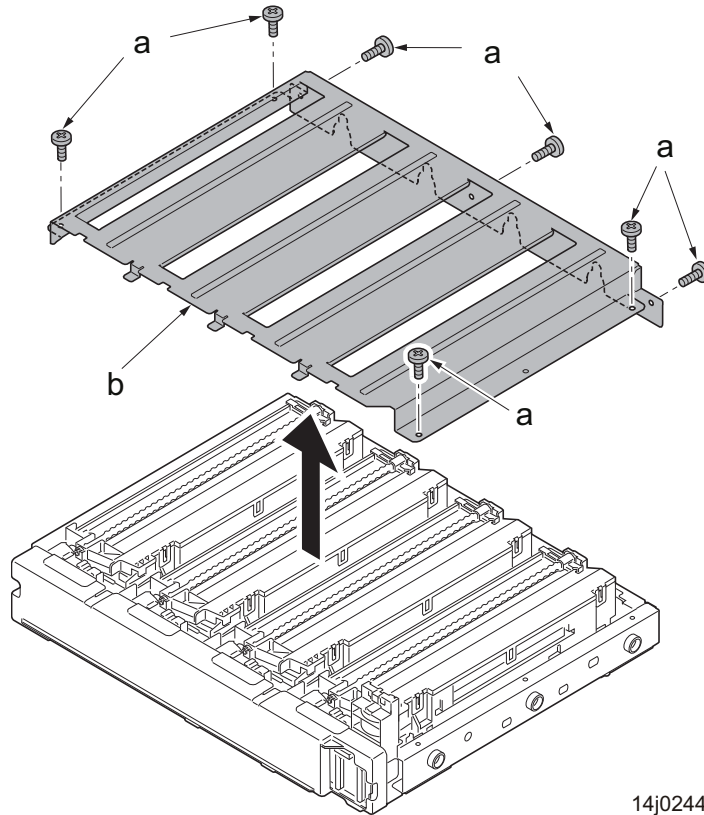
14j0242

**13** Pull the LSU (a) out from the main unit.



14j0243

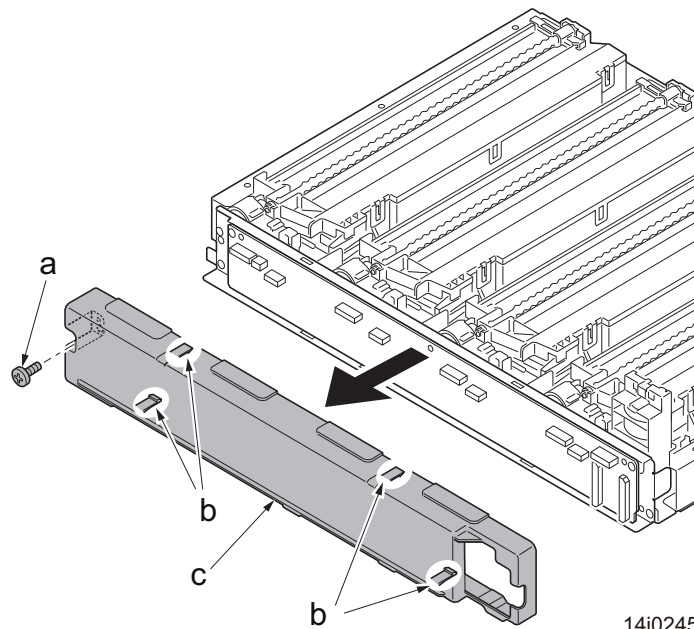
## 14 Remove seven screws (a)(M4x8) and then remove the LSU mount lid (b).



14j0244

## 15 Remove the screws (a)(M4x8).

## 16 Release four hooks (b) and then remove the LSU relay PWB cover (c).



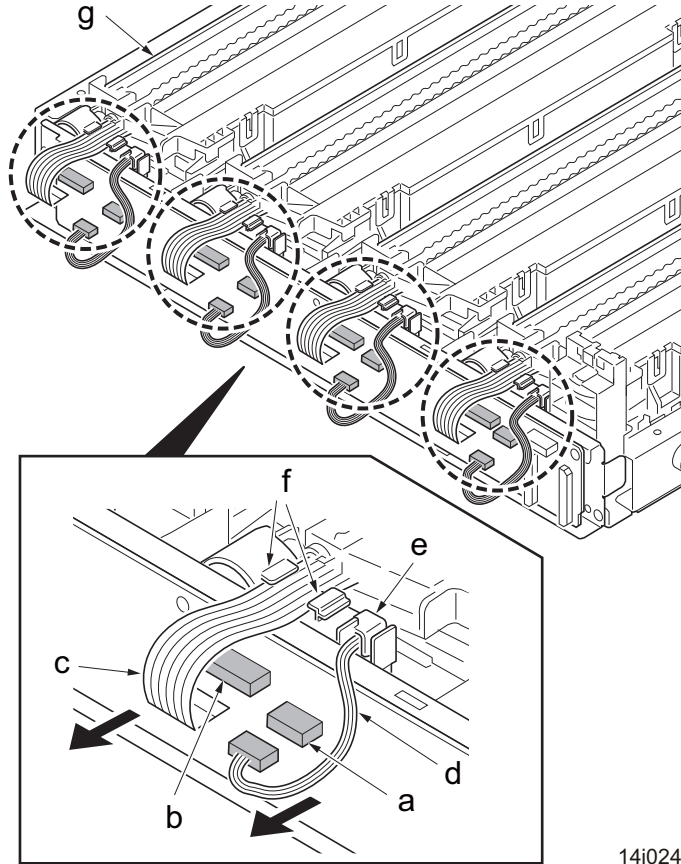
14j0245

## 17 Disconnect each the connector (a) and FFC connector (b).

When disconnecting the FFC (c) from the FFC connector (b), disconnect it after releasing the lock.

**18** Remove the wire (d) from the wire support portion (e).

**19** Remove the FFC (c) from the FFC support portion (f).

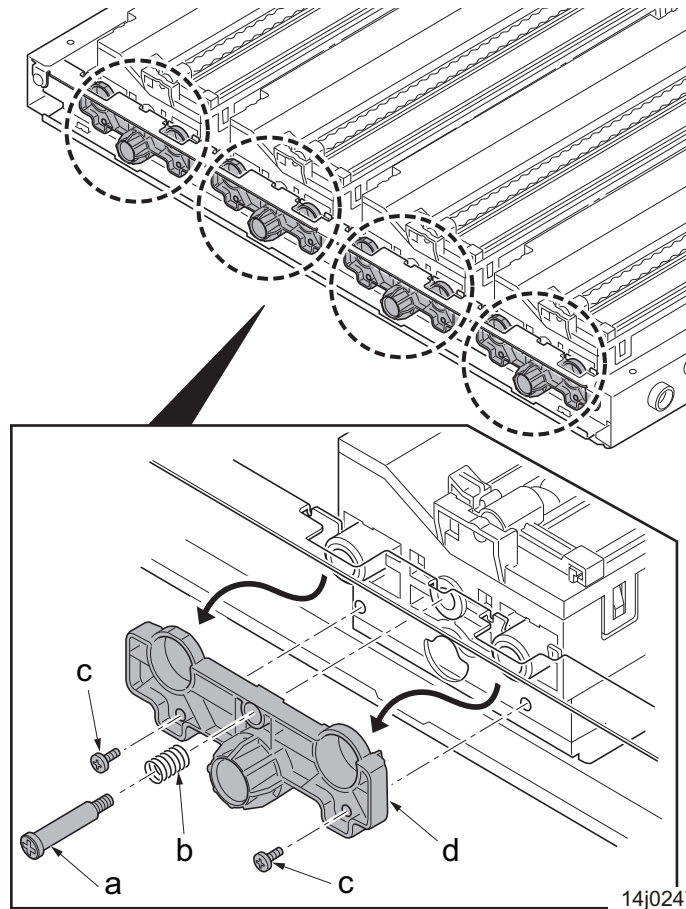


14j0246



**20** Remove each the LSU retainer pin (a) and spring (b).

**21** Remove each two screws (c)(M3x8) and then remove the LSU front holder (d).



**22** Wrap an antistatic discharging belt around your wrist to prevent damage to the LSU.

**23** Do not touch the APC PWB on the LSU, and FFC contacts.

**24** Remove four LSUs, following the precautions and instructions below.

Lift the rear end (b) of the LSU.

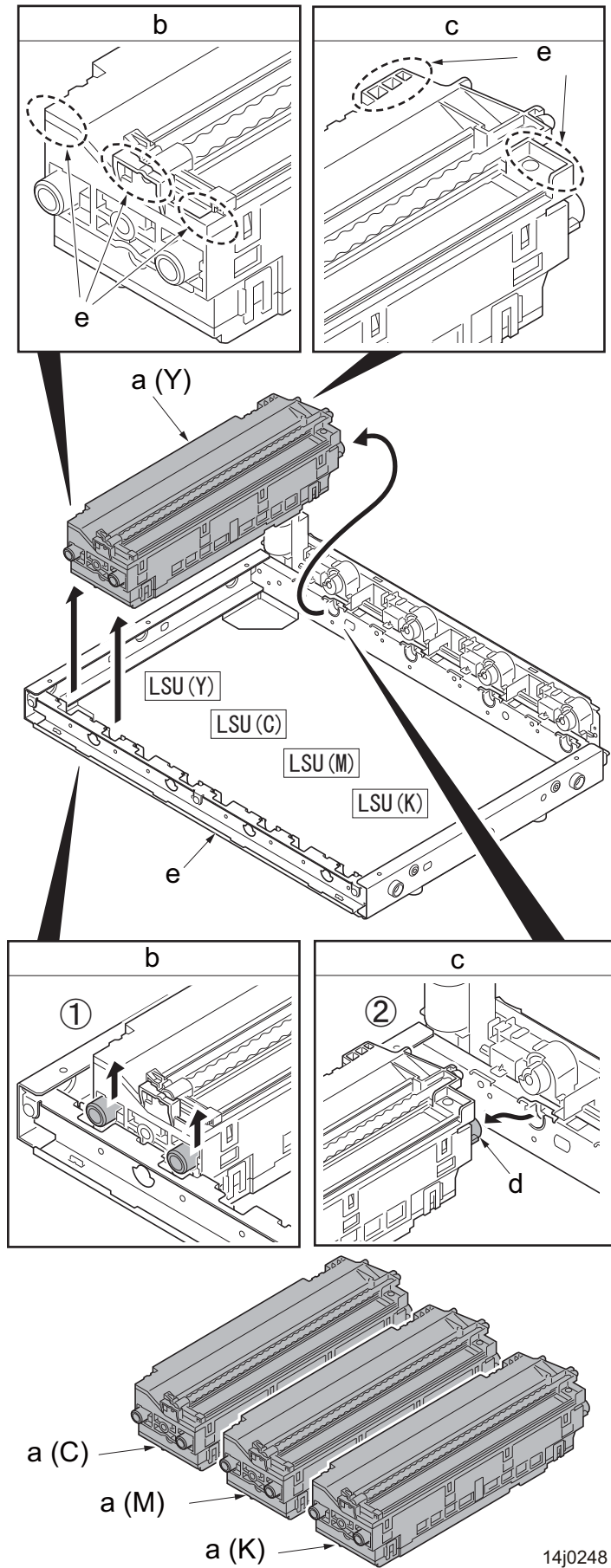
Unhook the protrusion (d) at the front (c) of the LSU.

Be sure to hold the front and rear handholds when handling the LSU.

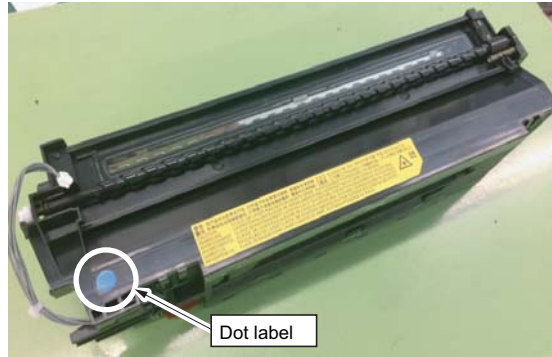
When detaching and reattaching the LSU, do not hit the LSU to the holding frame (e) subsequently applying shocks to the polygon motor inside.

**25** Check or replace the LSU and then reattach the parts in the original position.

When reconnecting FFCs, be sure to insert the FFC all the way in with the FFC connector. This is to avoid a lengthy servicing due to a possible error which could cause re-disassembly and assembly.



When installing the LSU, make sure to apply the one with the dot label for the Cyan (C) and Magenta (M) position



### Notes when replacing the laser scanner unit

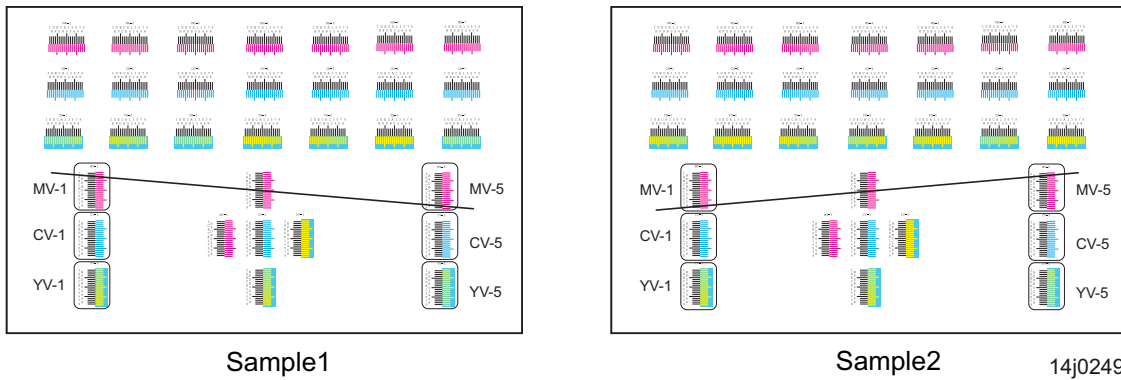
Execute the following adjustment after replacing the laser scanner unit.

- 1 Drum unit initial setting (maintenance mode U119): Execute**
- 2 Input "119" using the numeric keys and press the [Start] key.**
  - 1 Select [Execute] and press the [Start] key.  
Drum setup is commenced.
  - 2 Turn the main power switch off and on. Allow more than 5 seconds between Off and On.
- 3 ID correction operation setting (maintenance mode U464): Calib**
  - 1 Input "464" using the numeric keys and press the [Start] key.
  - 2 Select [Calib].
  - 3 Select [Execute] and press the [Start] key.  
Calibration starts.

- 4 Press the [Stop] key.

## 4 Color registration adjustment (maintenance mode U469): Angle

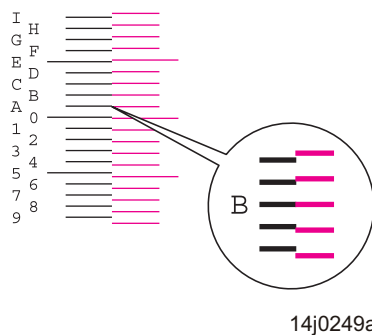
- 1 Input "469" using the numeric keys and press the [Start] key.
- 2 Select [Manual].
- 3 Select [Print].
- 4 Press the [Start] key to output the manual adjustment chart.
- 5 Execute the following adjustment if the gap between V-1 and V-5 match scale position is 2 scales or more for each color.



- 6 Find the positions where two lines are best matched on each chart.

The illustration below applies to [B](-2)

A to I correspond with -1 to -9 respectively.



- 7 Detach the inner unit.
- 8 Rotate the hex hole (a) by using a hex wrench (b)(5mm).

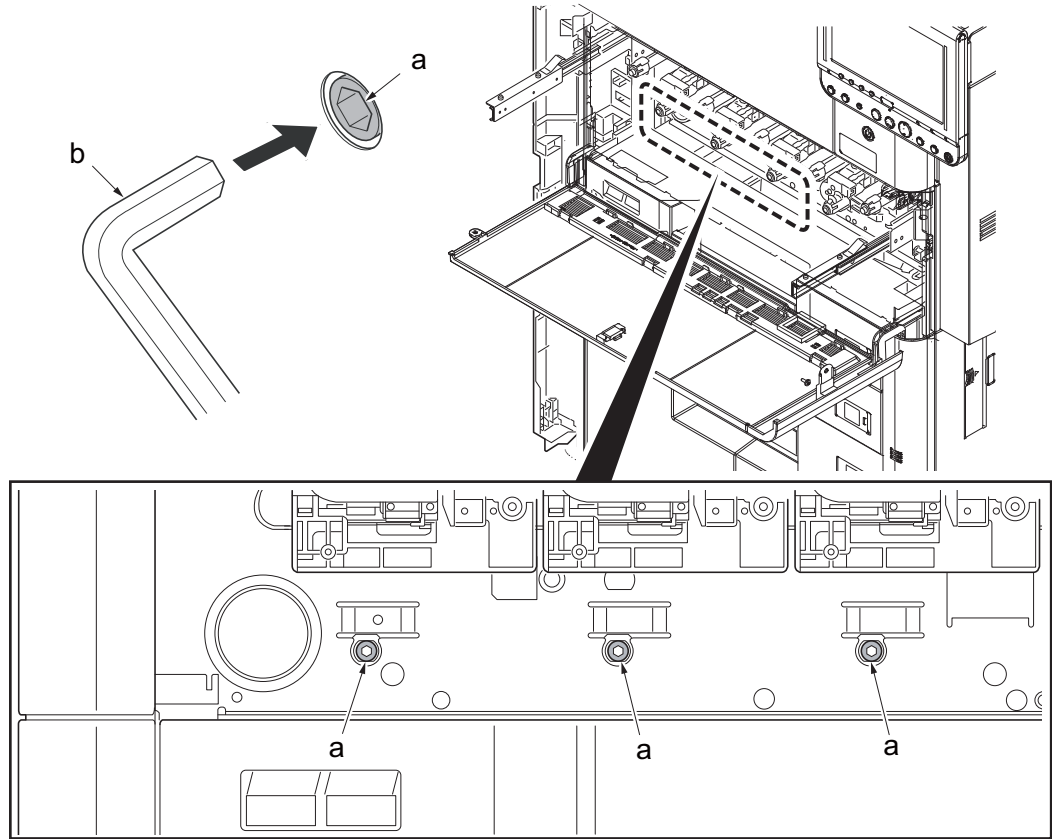
**Direction of rotation**

The gap between V-1 and V-5 match scale is 2 scales or more (sample 1): counter-clockwise  
 The gap between V-1 and V-5 match scale is -2 scales or more (sample 2): clockwise

**Number of rotation**

The gap between V-1 and V-5 match scale multiplied by 4 clicks.

- 9 Reattach the inner unit in the original position.
- 10 Output the adjustment chart to check it is within the range.
- 11 Press the [Stop] key.



14j0250

## 5 ID correction operation setting (maintenance mode U464): Calib

- 1 Input "464" using the numeric keys and press the [Start] key.
- 2 Select [Calib].
- 3 Select [Execute] and press the [Start] key.  
Calibration starts.
- 4 Press the [Stop] key.

## 6 Color registration adjustment (maintenance mode U469): Regist

- 1 Input "469" using the numeric keys and press the [Start] key.
- 2 Select [Auto].  
Output the auto adjustment chart.
- 3 Select [Execute].
- 4 Set the chart on the table and press the [Start] key.  
Execute the automatic adjustment. When adjustment has normally completed, [OK] is displayed.

- 5 Press the [Stop] key.

## 7 Adjusting the uneven density (maintenance mode U412): Normal Mode

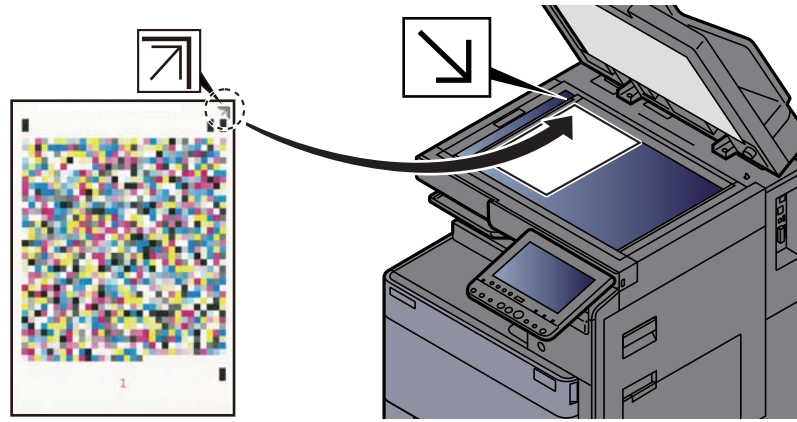
- 1 Input "412" using the numeric keys and press the [Start] key.
- 2 Select [Normal Mode].  
Test Pattern is output with the initial light amount setting after about 60s of the aging operation. (1st sheet)
- 3 Place approximately 20 sheets of white paper on the test pattern for an original.
- 4 Press the [Start] key. Correction starts.
- 5 Press the [Start] key after completing correction. Output the test pattern. (2nd sheet)  
Output with 20% less light intensity than the 1st test pattern.
- 6 Place approximately 20 sheets of white paper on the test pattern for an original.
- 7 Press the [Start] key. Correction starts.
- 8 Press the [Start] key after completing correction. Output the test pattern. (3rd sheet)
- 9 Place approximately 20 sheets of white paper on the test pattern for an original.
- 10 Press the [Start] key.  
Check the result of the correction. When correction has normally completed, [Fin] is displayed.
- 11 Press the [Stop] key.

## 8 ID correction operation setting (maintenance mode U464): Calib

- 1 Input "464" using the numeric keys and press the [Start] key.
- 2 Select [Calib].
- 3 Select [Execute] and press the [Start] key.  
Calibration starts.
- 4 Press the [Stop] key.

## 9 Adjusting the halftone automatically (maintenance mode U410)

- 1 Input "410" using the numeric keys.
- 2 Press the [Start] key.  
Displays the execution information screen.  
Test pattern 1, Test pattern 2 and Test pattern 3 are output on the A4/ letter paper.
- 3 Set the test pattern output on the original glass with the arrow facing the rear side and print side face-down.  
Load about 20 sheets of the blank paper on Test Pattern 1.

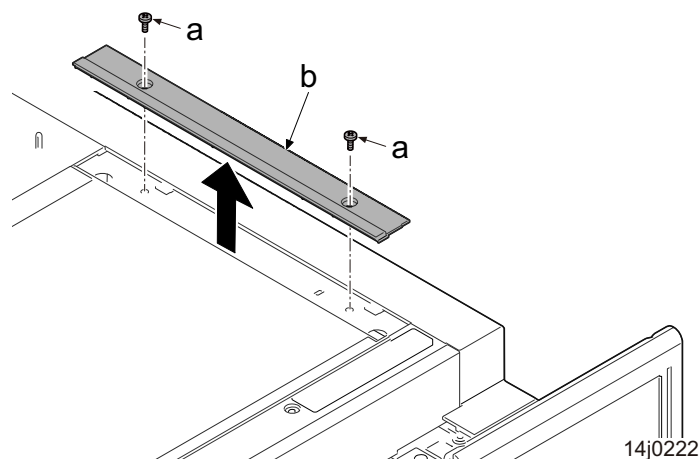


- 4 Press the [Start] key.  
The first auto adjustment is executed.
- 5 Set the output Test Pattern 2 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 2.
- 6 Press the [Start] key.  
The second auto adjustment is executed.
- 7 Set the output Test Pattern 3 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 3.
- 8 Press the [Start] key.  
The third auto adjustment is executed.
- 9 [Finish] appears after normal completion.

### (3-2) Detaching and reattaching the lens unit

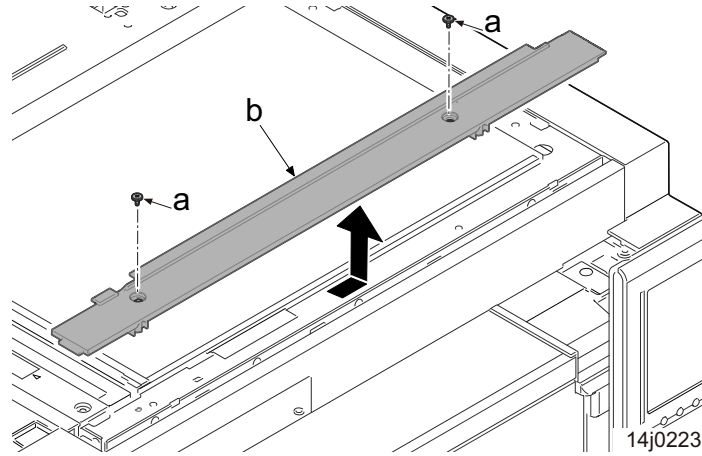
#### Procedures

- 1 Detach the document processor.
- 2 Remove two screws (a)(M4x8) and remove the ISU right cover (b) in the direction of the arrow.

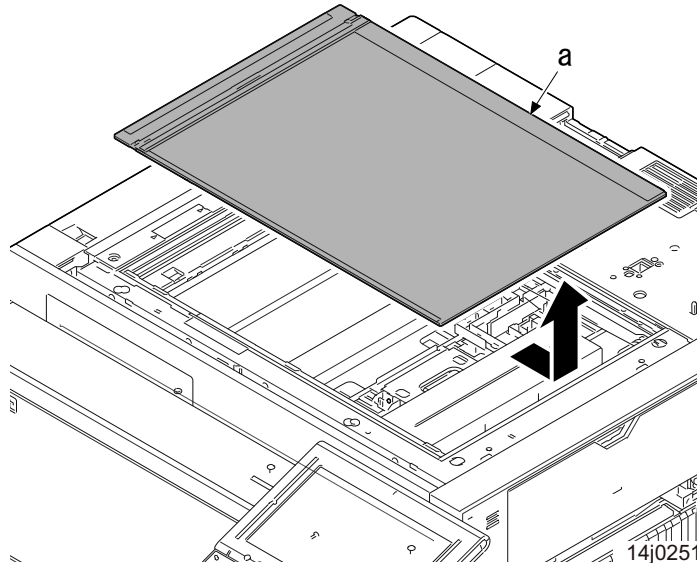


14j0222

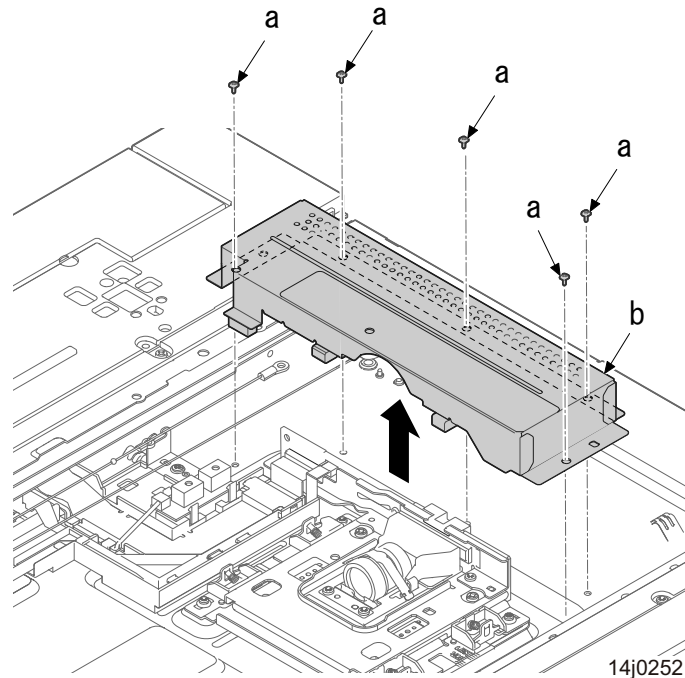
- 3** Remove two pins (a)(M4x6) and remove the front glass cover (b) by sliding it in the direction of the arrow.



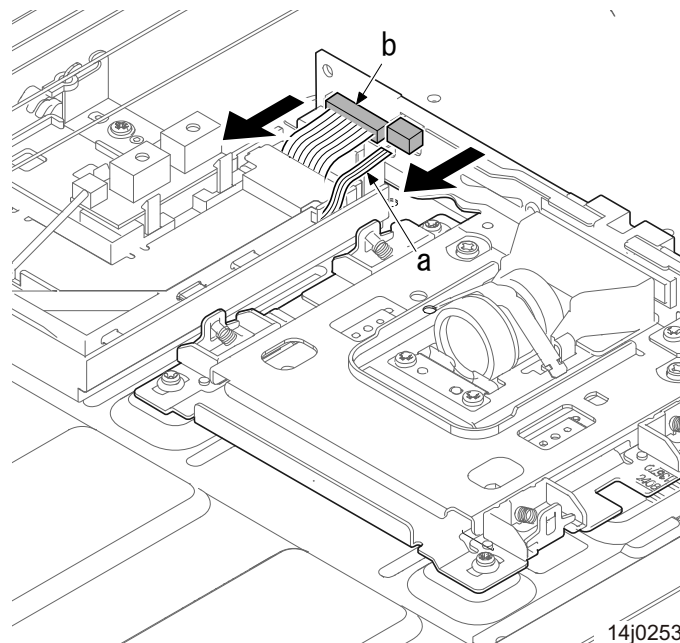
- 4** Remove the contact glass (a) in the direction of the arrow.





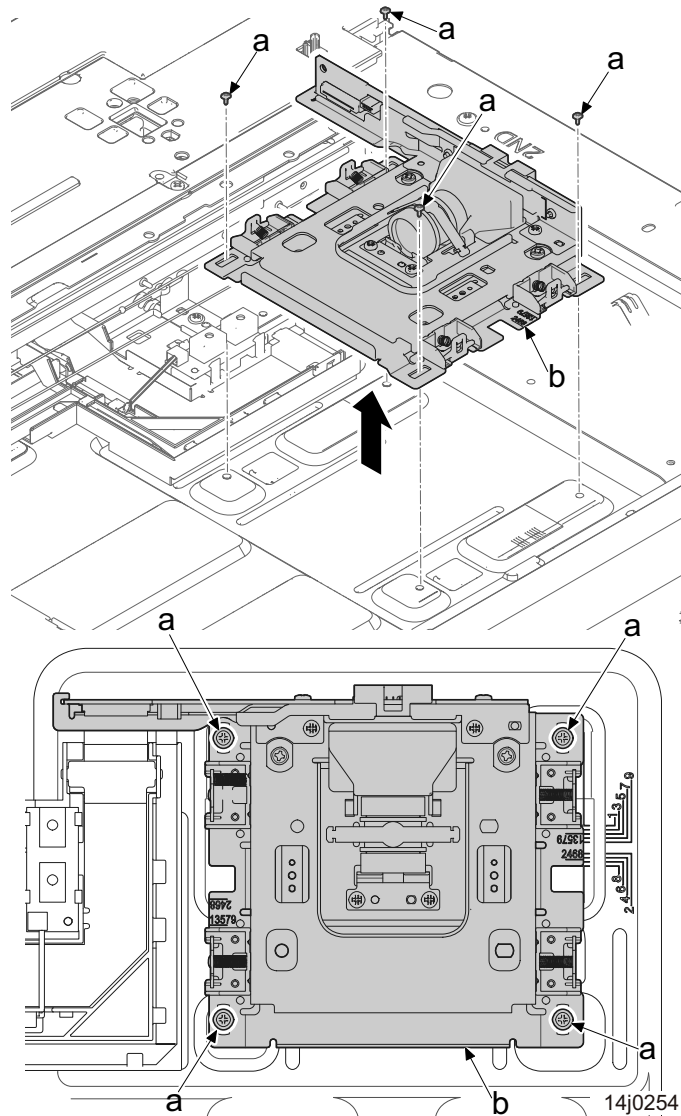
**5 Remove five screws (a)(M3x8) and detach the lens cover (b).**

14j0252

**6 Removes the FFC (a).****7 Disconnect the FFC from the FFC connector (b) with a lock.**

14j0253

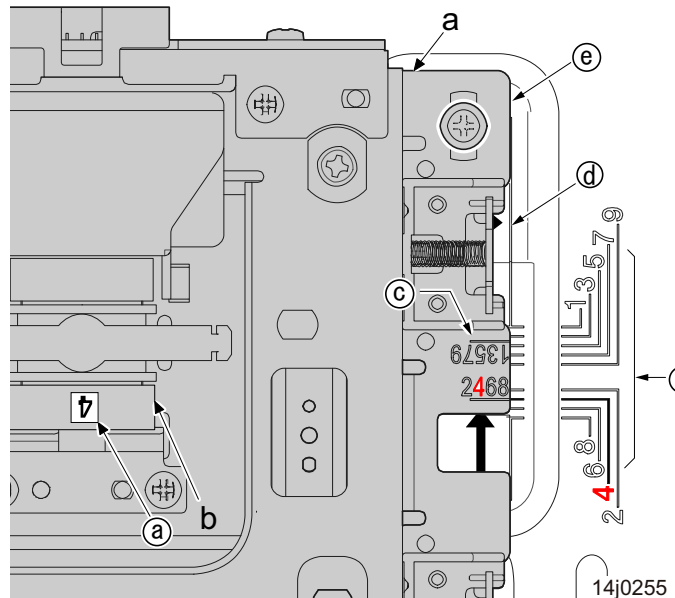
- 8 Remove four screws (a)(M3x8).
- 9 Detaches the lens unit (b) in the direction of the arrow.



## Detaching the lens unit

Decide the fix position of lens unit (a) by the following.

- 1 The right and left of machine: Confirm the number (a) on the label affixed on the lens (b). Match the line (c) of lens unit (a) to the positioning line (b) of same number on frame side.
- 2 The rear and front of machine: Match the edge (e) of lens unit (a) to the positioning line (d) on frame side.
- 3 Fix the lens unit (a) as before with four screws.

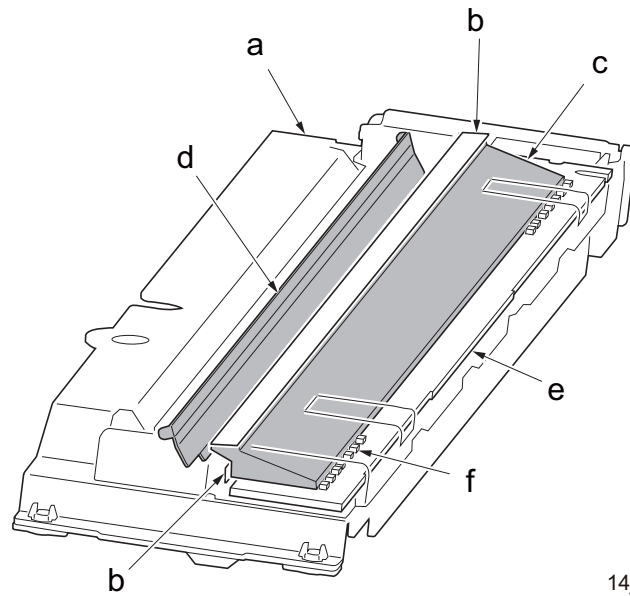


### (3-3) Detaching and reattaching the lamp unit

#### NOTE

Handling the LED mount assembly (a)

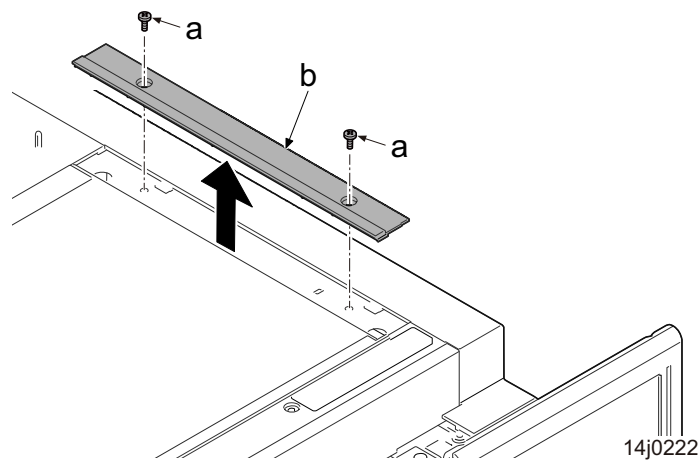
- Do not touch the diffusion seat (b) and the light guiding plate (c).
- Use air blow when you clean the diffusion seat (b), the light guiding plate (c) and reflector (d). Do not clean it using a cleaning cloth that adheres the fiber easily.
- LED lamp PWB (e)
- White LED



14j0256

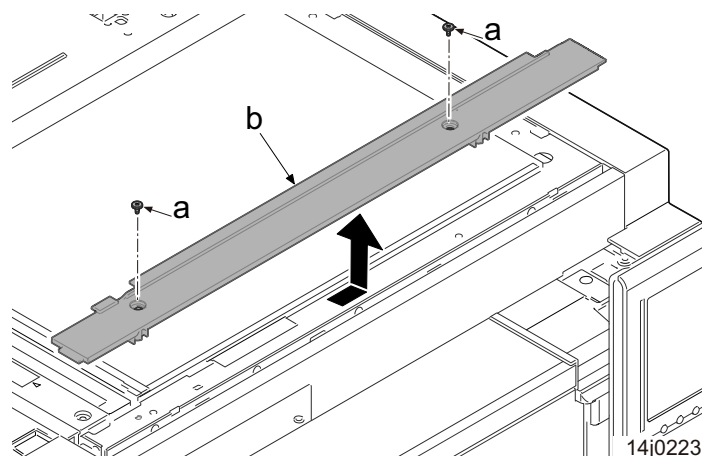
## Procedures

- 1 Detach the document processor. (Refer [P.4-248](#))
- 2 Remove two screws (a)(M4x8) and remove the ISU right cover (b) in the direction of the arrow.



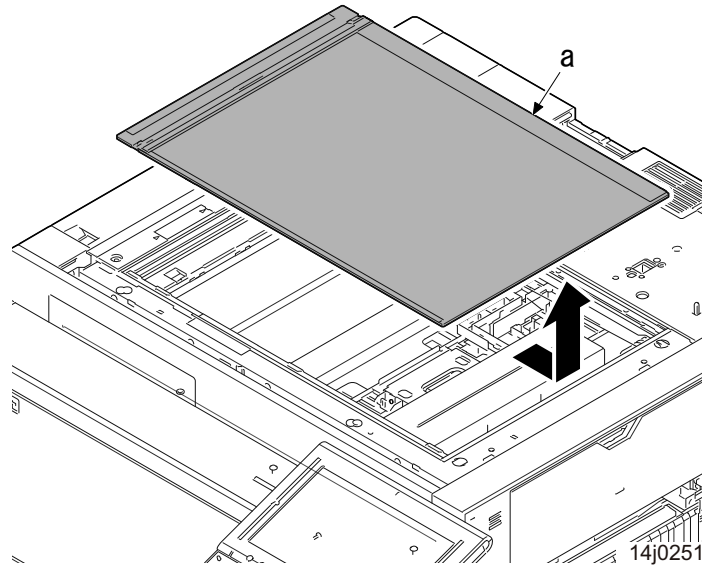
14j0222

- 3 Remove two pins (a)(M4x6) and remove the front glass cover (b) by sliding it in the direction of the arrow.

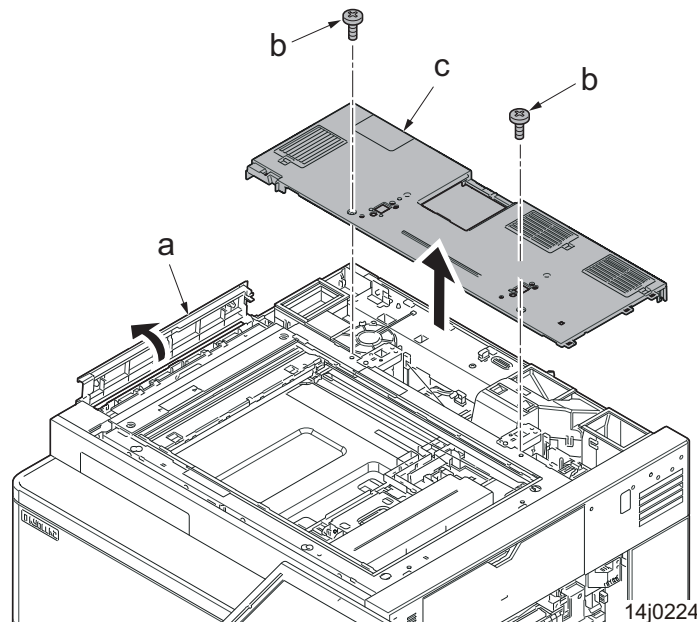


14j0223

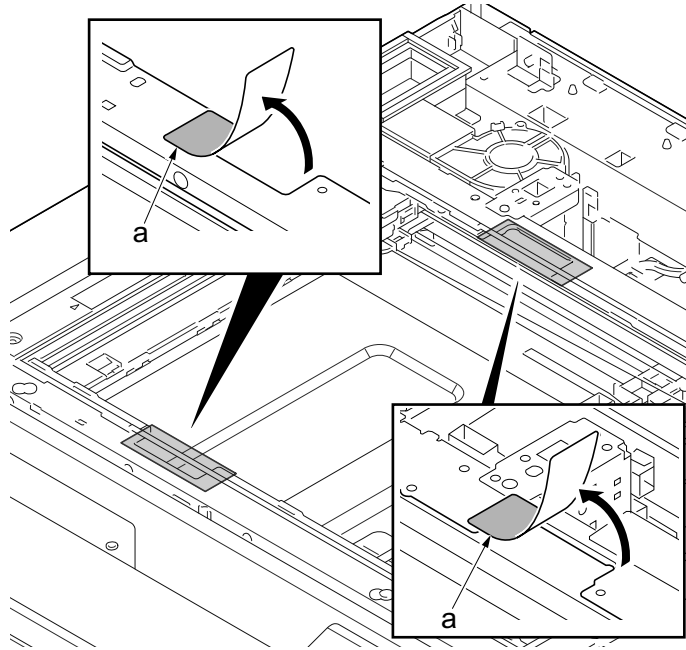
- 4** Remove the contact glass (a) in the direction of the arrow.



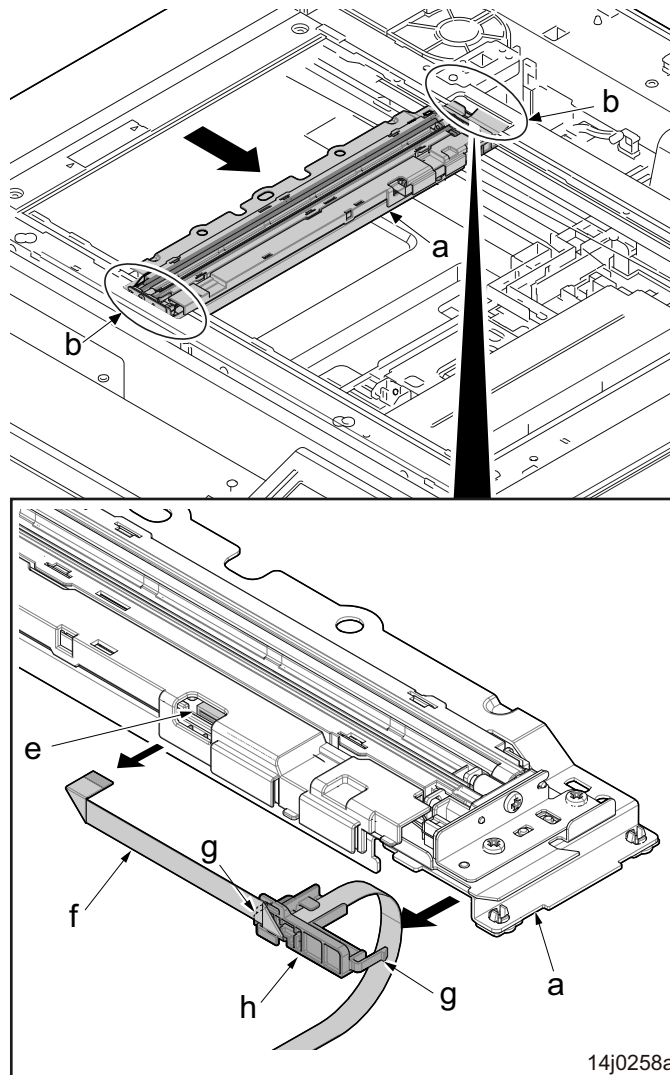
- 5** Open the bridge eject cover (a).
- 6** Remove two screws (a)(M4x8) and remove the ISU rear cover (c).



**7 Peel off two sheets (a).**



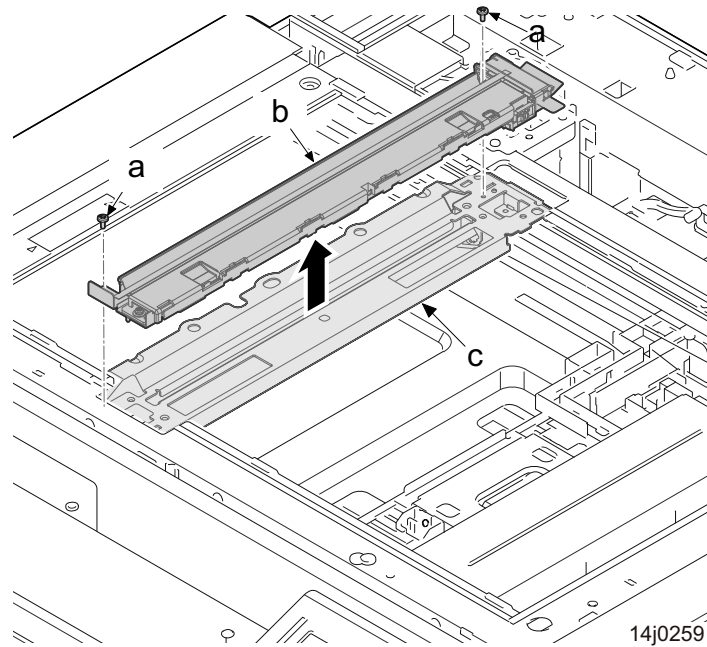
- 8 Move the lamp unit assembly (a) to the cut-out (b).
- 9 Remove FFC (f) from FFC connector (e).
- 10 Remove two hooks (g) and remove FFC guide (h) from the lamp unit (a).



- 11 Remove two screws (a)(M3x8) and remove the lamp unit (b) from mirror frame A (c).
- 12 Check or replace the lamp unit (b), and then reattach the parts in the original position.
- 13 When replacing the lamp unit (b), execute maintenance mode U411 (adjusting the scanner automatically).

✔ **IMPORTANT**

Use an air blower brush when cleaning the reflector, light guide plate and diffusion sheet of the LED mount assembly. Clean not to leave a hair dust.



### (3-4) Detaching and reattaching the scanner wires

#### Precautions

When fitting the wires, be sure to use those specified below.

Machine front side (P/N: 302H717380(gray))

Machine rear side (P/N: 302H717390(black))

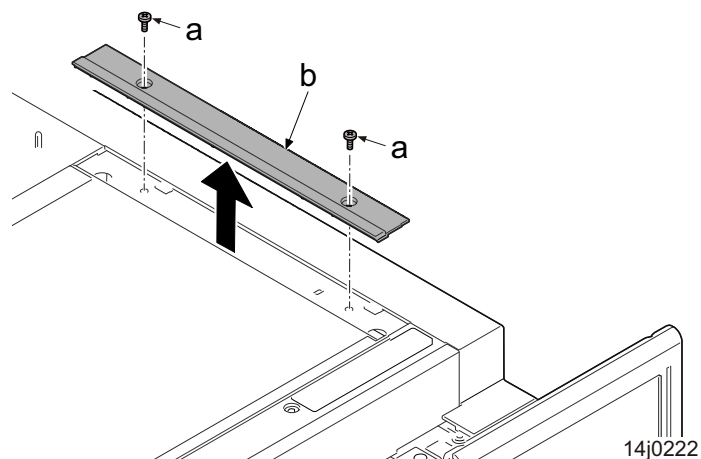
#### Fitting requires the following tools

Two frame securing tools (P/N: 302NL1711\_)

Two scanner wire stoppers (P/N: 302RH9401\_)

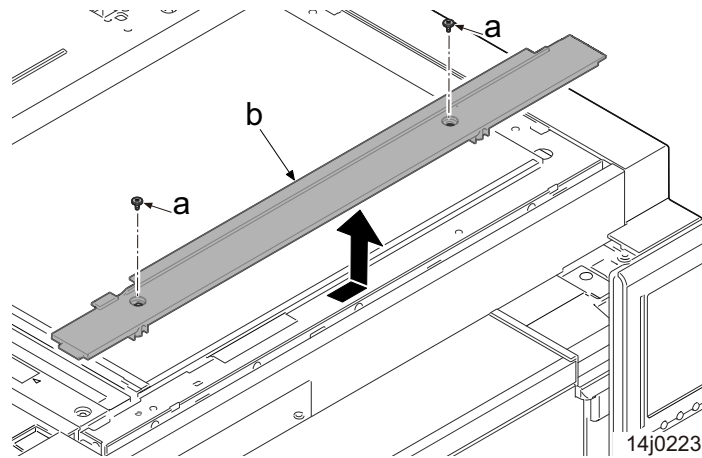
#### Procedures

- 1 Detach the document processor. (Refer [P.4-248](#))
- 2 Remove two screws (a)(M4x8) and remove the ISU right cover (b) in the direction of the arrow.

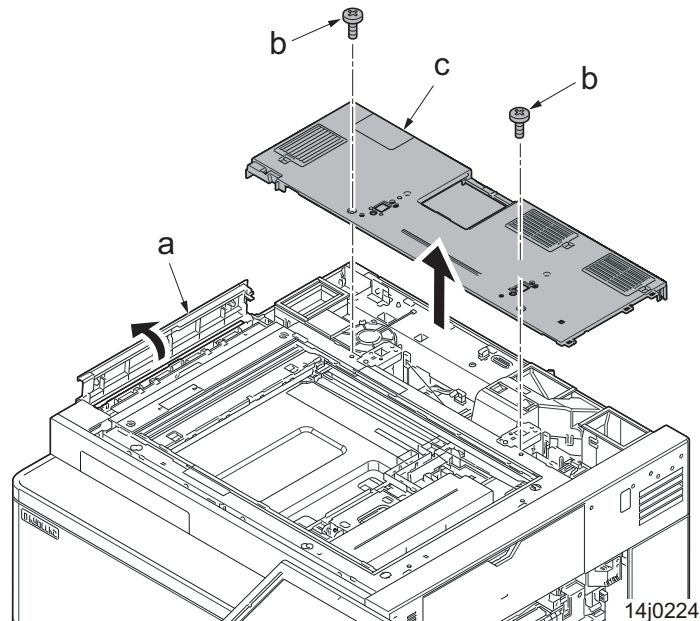




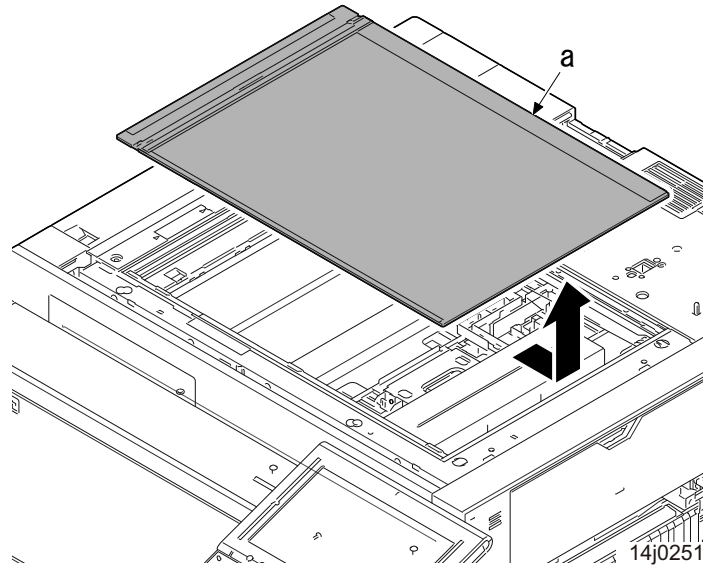
- 3** Remove two pins (a)(M4x6) and remove the front glass cover (b) by sliding it in the direction of the arrow.



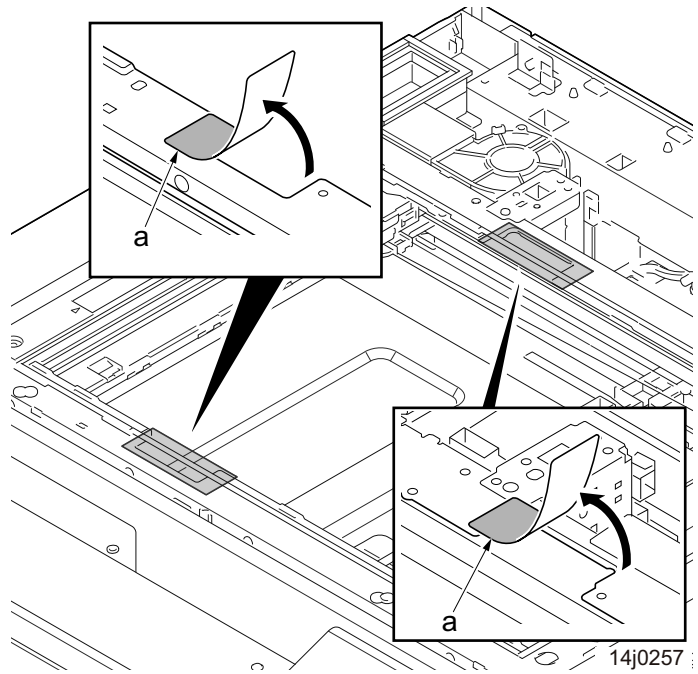
- 4** Open the bridge eject cover (a).
- 5** Remove two screws (a)(M4x8) and remove the ISU rear cover (c).



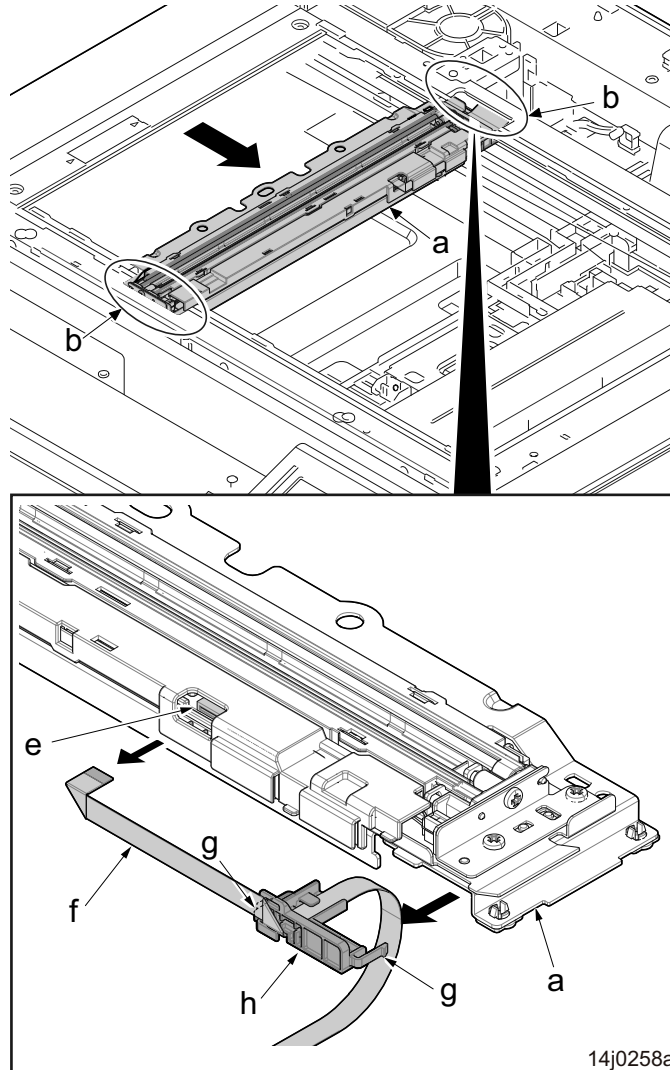
**6** Remove the contact glass (a) in the direction of the arrow.



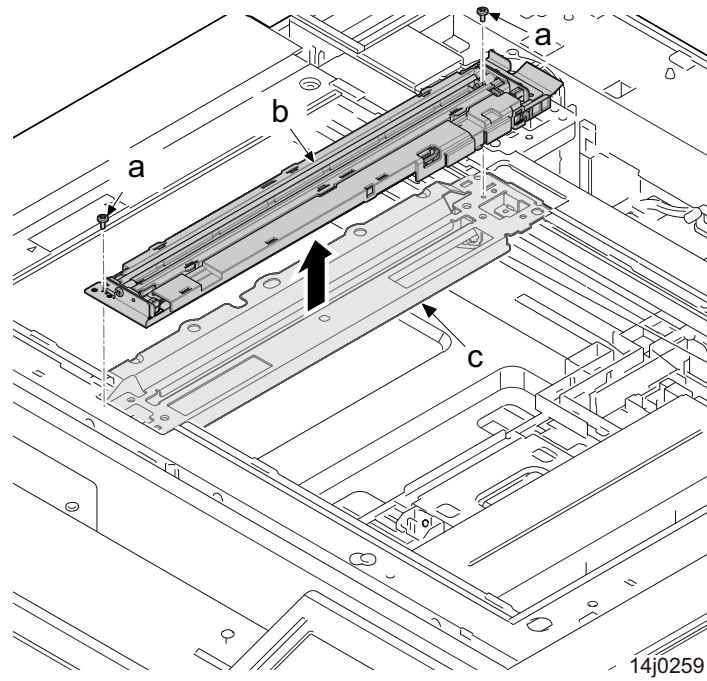
**7** Peel off two sheets (a).



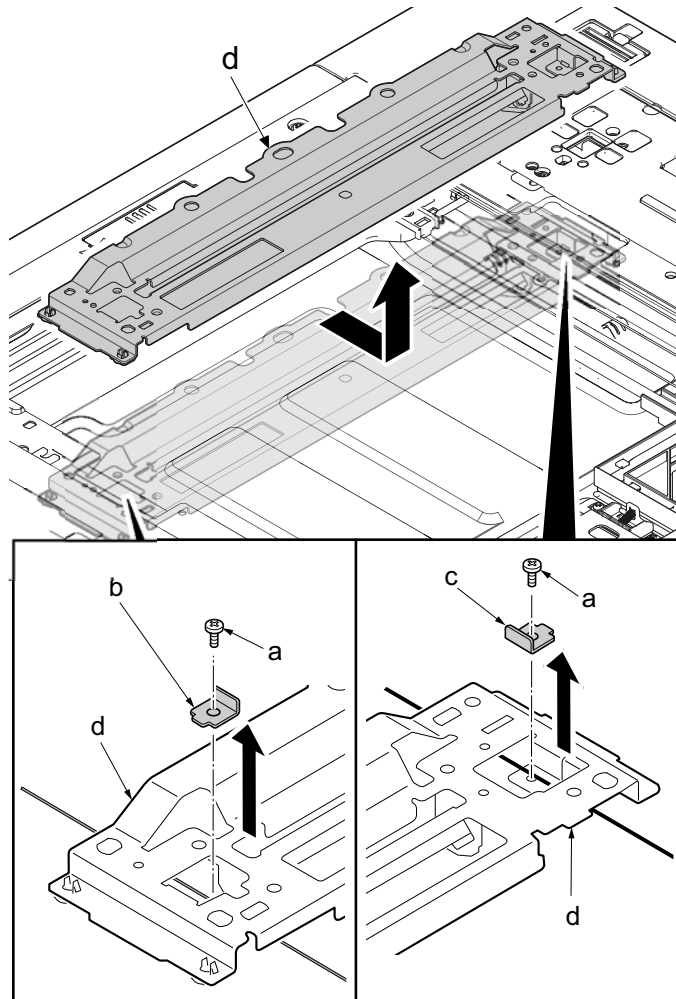
- 8 Move the lamp unit assembly (a) to the cut-out (b).
- 9 Remove FFC (f) from FFC connector (e).
- 10 Remove two hooks (g) and remove FFC guide (h) from the lamp unit (a).



**1 1** Remove two screws (a)(M3x8) and remove the lamp unit (b) from mirror frame A (c).

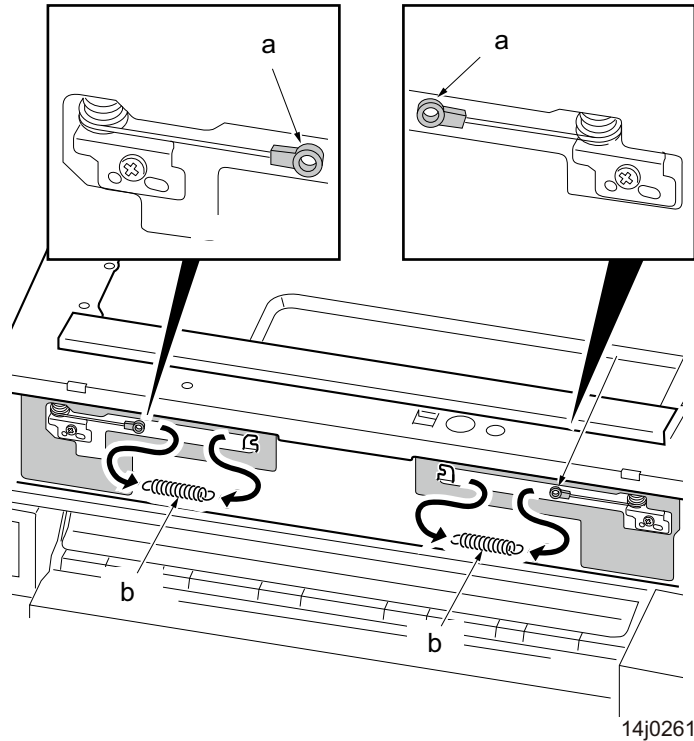


- 12 Remove each the screw (a)(M3x8), remove the front wire presser plate (b) and the rear wire presser plate (c) from mirror frame A (d).
- 13 Detach the mirror frame A (d) from the main unit.



14j0260

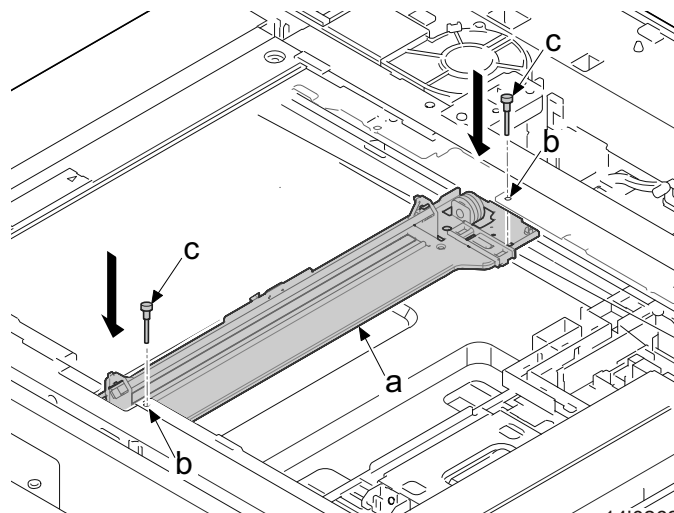
- 14** Detach the round terminals (a) from the scanner wire springs (b) on scanner unit left side.
- 15** Detach the scanner wire from the main unit.



14j0261

### Fitting the scanner wires

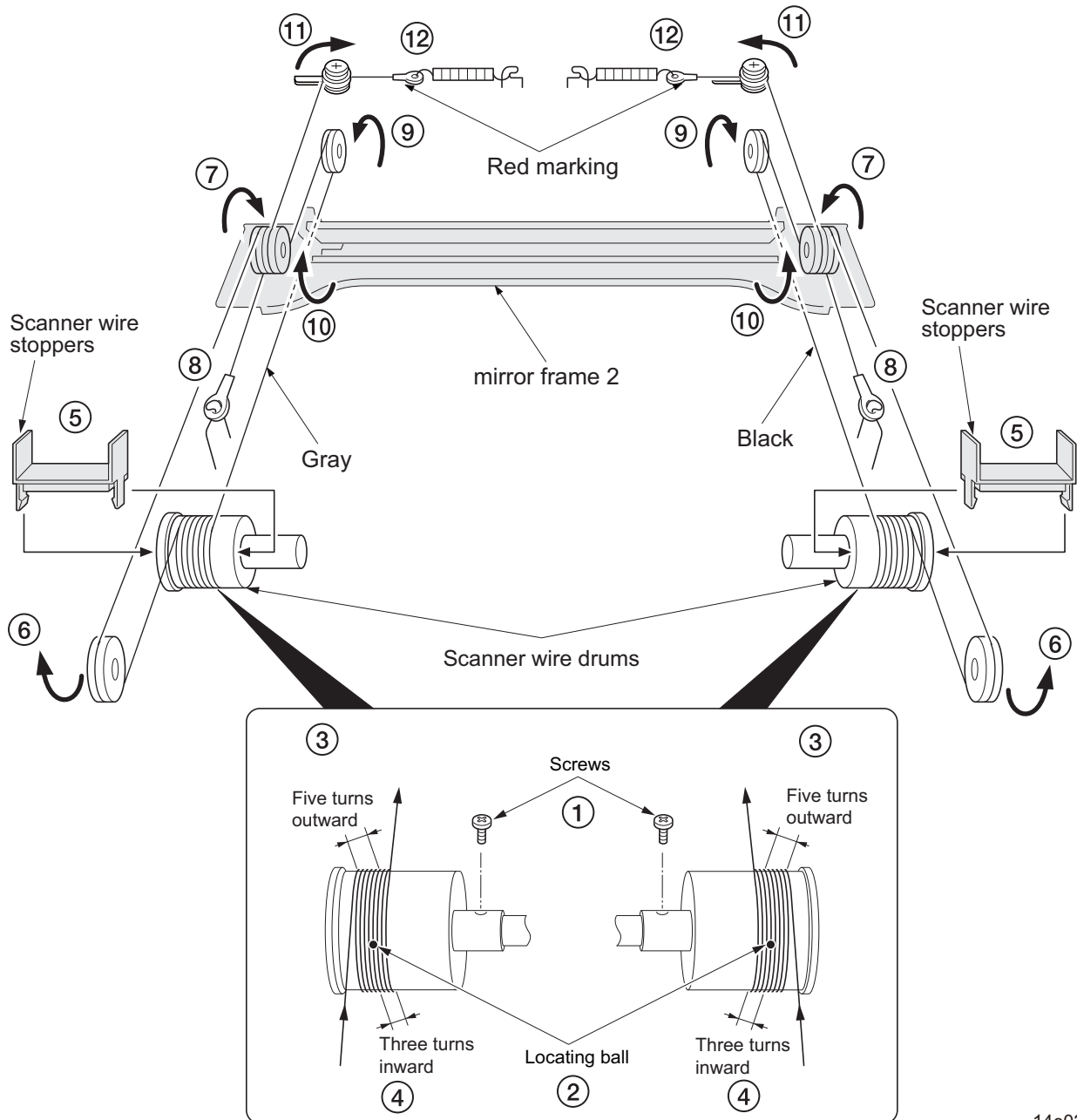
- 1 Remove two screws each from scanner wire drum.
- 2 Insert the locating ball on the scanner wire into the hole in the scanner wire drum.
- 3 Wind the scanner wires five turns outward and three turns inward. (Shorter from small ball of the scanner wire is wound to come outside.)
- 4 Secure the scanner wires using the scanner wire stoppers.
- 5 Move the mirror frame 2 as shown in the figure and insert two frame securing tools into the positioning holes at the front and rear of the machine center to fix the mirror frame 2 in position.



14j0262

- 6 Wind the inner scanner wires around the grooves in the pulleys at the right of the scanner unit from below to above.
- 7 Wind the outer scanner wires around the outside grooves in the pulleys of the mirror frame 2 from above to below.  
The scanner wires pass the outside of positioning pin.
- 8 Hook the round terminals (without red marking) to the catches inside the scanner unit.
- 9 Wind the inner scanner wires around the grooves in the pulleys at the left of the scanner unit from below to above.  
Align the scanner wires along the lower side of the mirror frame 2.

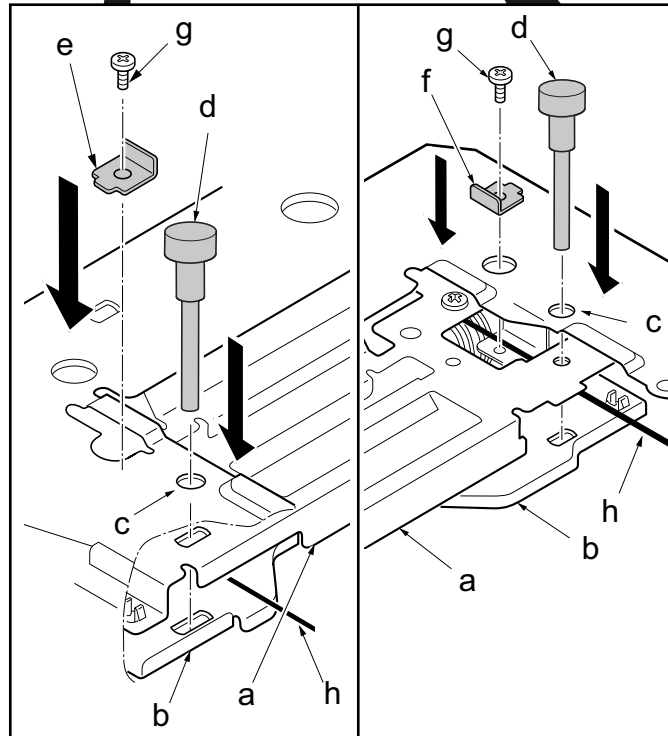
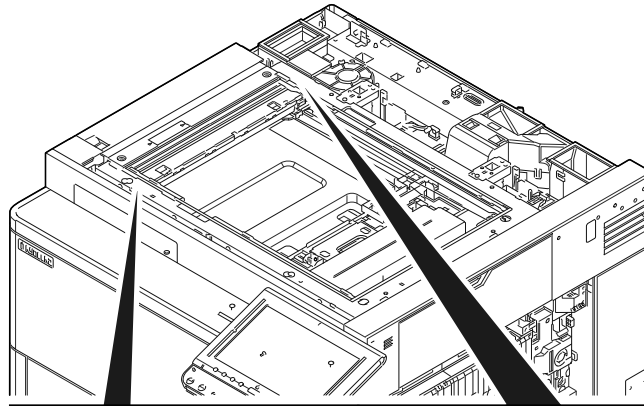
- 10 Wind the scanner wires around the inside grooves in the pulleys of the mirror frame 2 from below to above.
- 11 Wind the scanner wires around the grooves in the pulleys at the left of the scanner unit.
- 12 Hook the round terminals (with red marking) to the scanner wire springs.
- 13 Apply the procedures 6 through 12 to another scanner wires.



14e0263



- 16 Refit the scanner wire drum with two screws.**
- 17 Detach the scanner wire stoppers and the frame securing tools.**
- 18 Focusing on the locating ball of the wire drum, align the scanner wires to the inside.**
- 19 Move the mirror frame B (b) from side to side to correctly locate the wires in position.**
- 20 Refit the mirror frame A (a) in the main unit.**
- 21 Move the mirror frames A (a) and the mirror frames B (b) to the machine left, and insert two frame securing tools (d) into the positioning holes (c) at the front and rear of the scanner unit to secure the mirror frame A (a) and the mirror frame B (b) in position.**
- 22 Attach the front wire holder plate (e) and rear wire holder plate (f) to the mirror frame A (a) with each screw (g) while holding the wire (h) with the plates.**
- 23 Detach the frame securing tools (d).**
- 24 Reattach the lamp unit in the original position.**



14j0264

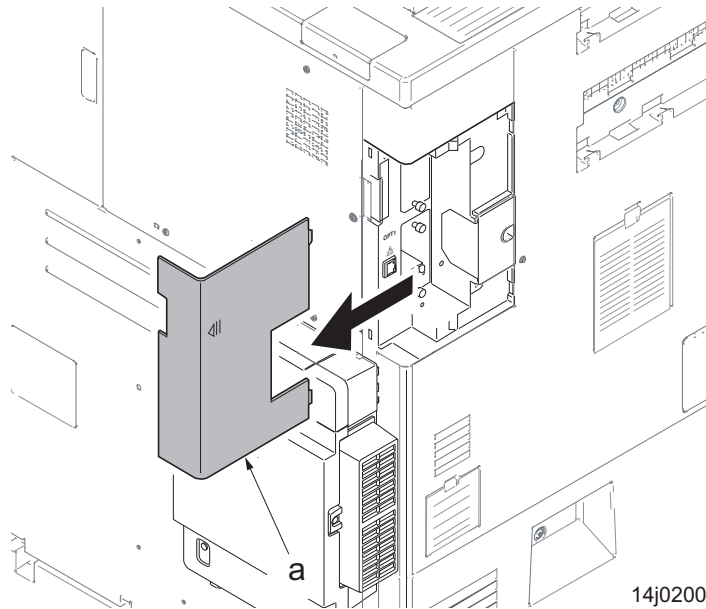
## (4) Drive section

### (4-1) Detaching and reattaching the fuser drive unit/transfer drive unit/feed drive unit

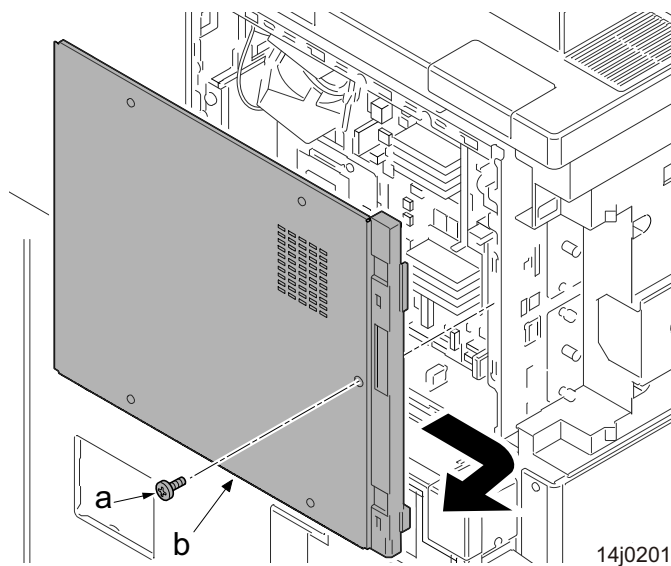
#### Detaching the fuser drive unit

#### Procedures

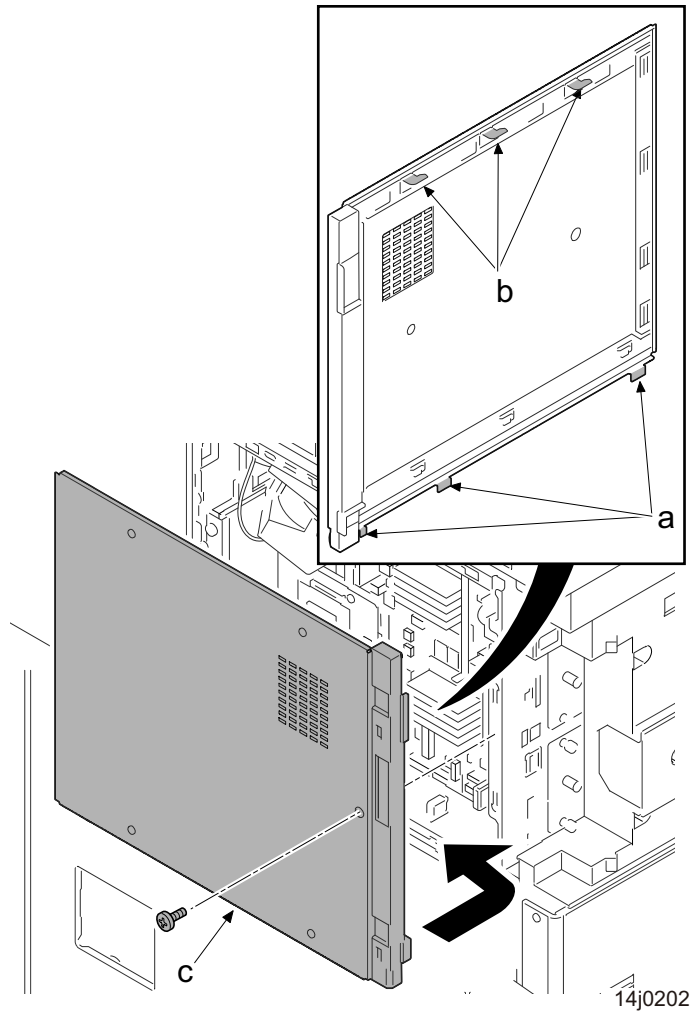
- 1 Remove the controller cover (a).



- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.

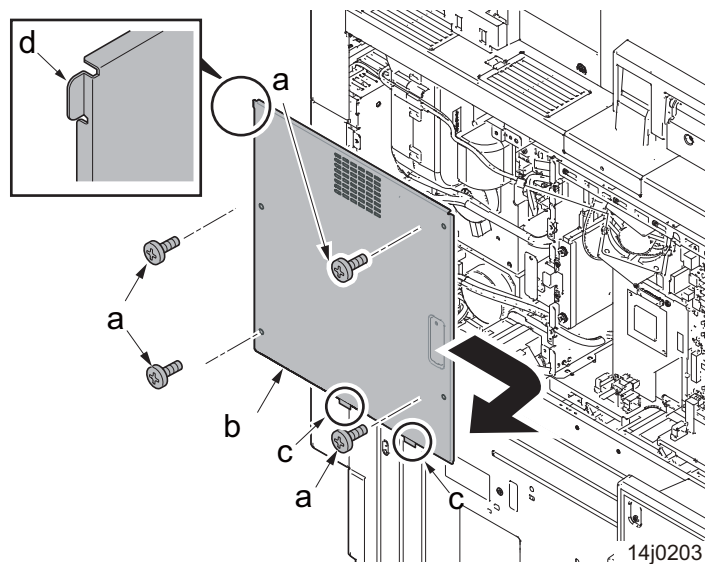


When reattaching the rear left cover (b), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.

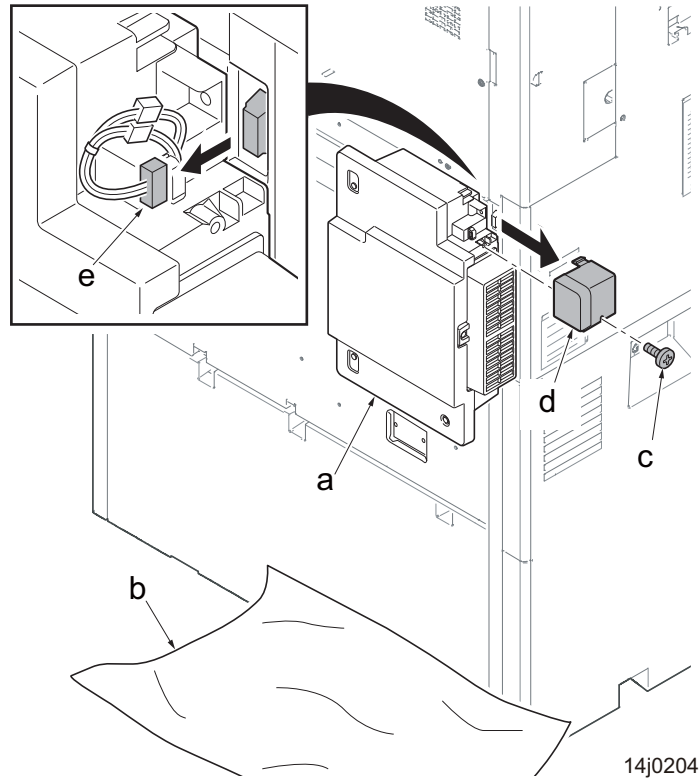


**3 Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.**

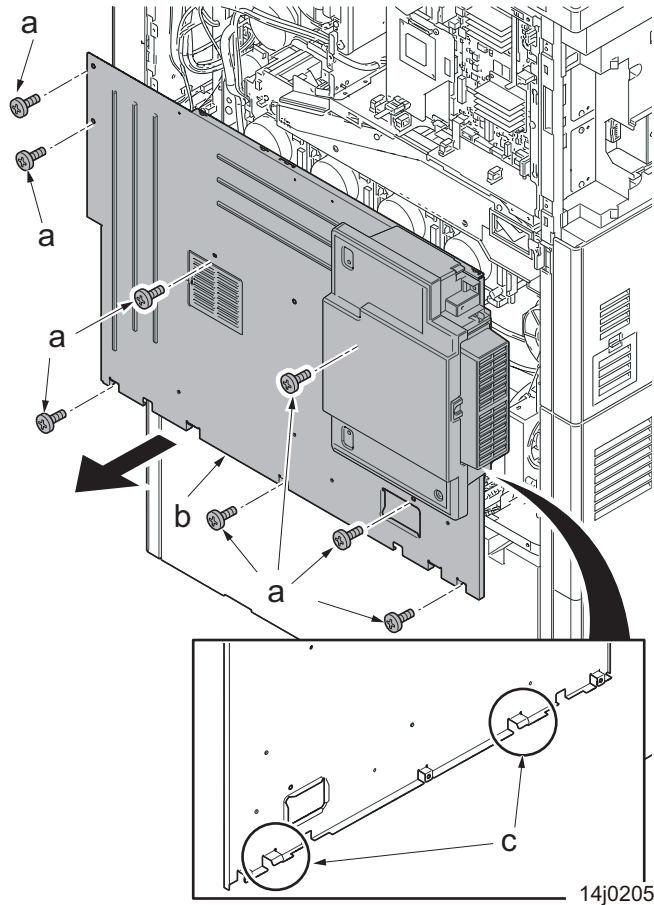
When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.



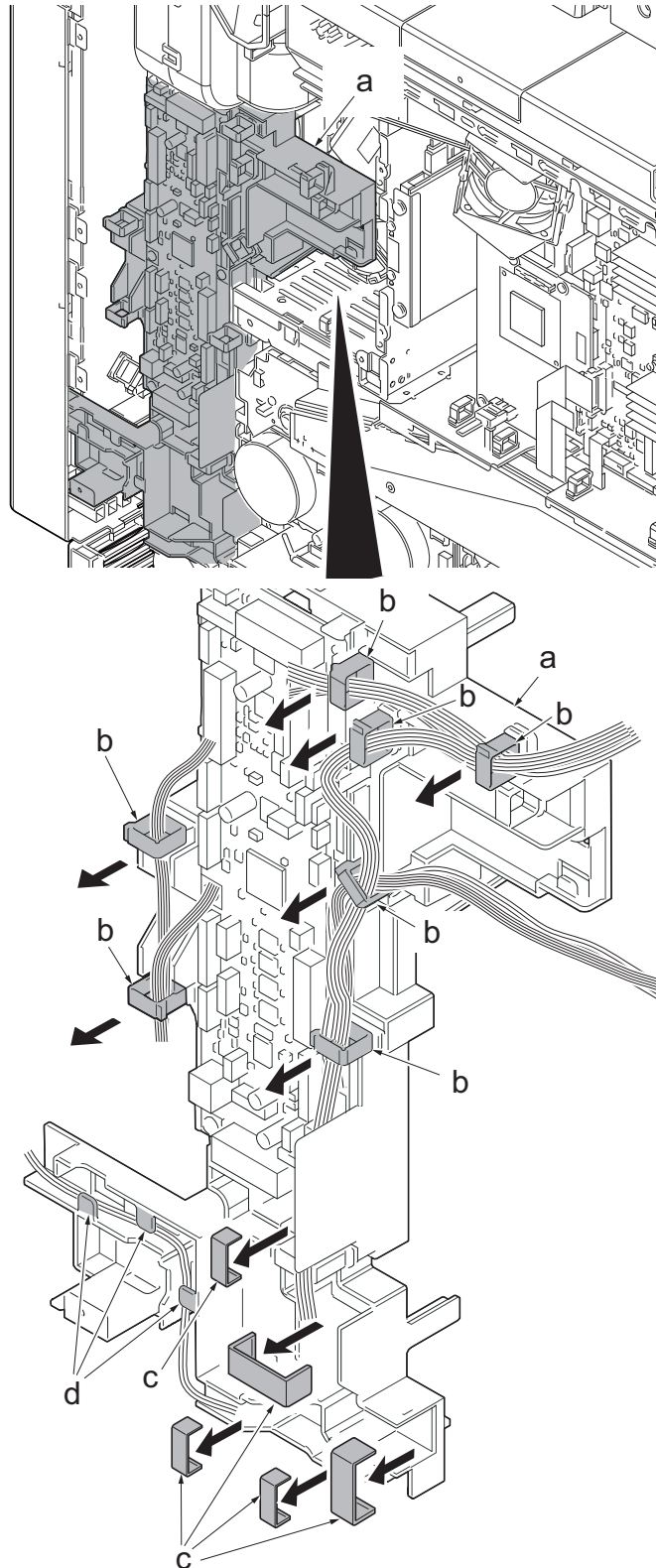
- 4 Cover the area under the waste toner box (a) to prevent contamination due to the scattered toner with the sheet (b).
- 5 Remove the screw (c)(M3x8) and remove the cable cover (d).
- 6 Disconnect the connector (e).



- 7 Remove eight screws (a)(M3x8).
- 8 Release two lower hooks (b) and remove the rear lower cover (c)

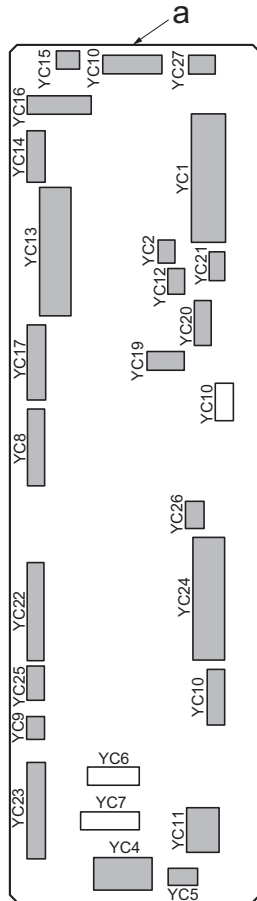


- 9 Release seven wire saddles (b) of the feed PWB assembly (a) and remove the wires.
- 10 Remove five wire holders (c).
- 11 Remove the wire from the rib (c)



14j0265

## 12 Disconnect the connectors from the feed PWB (a).

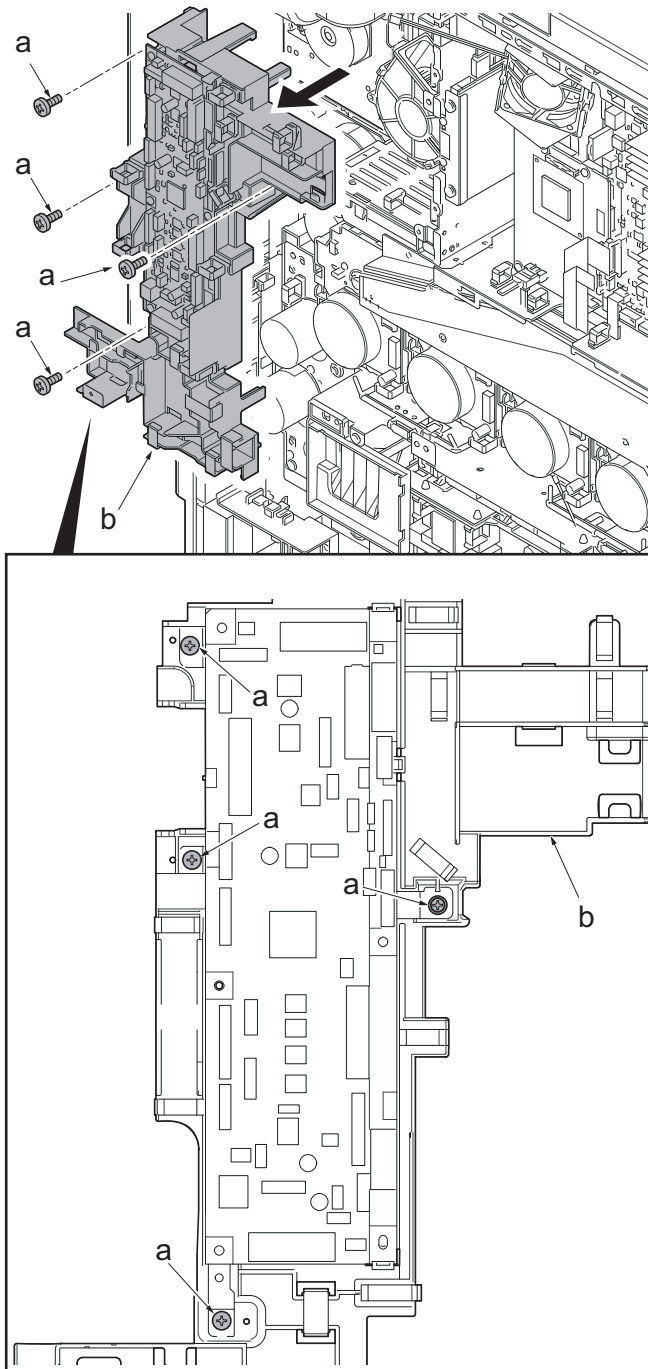


14j0266



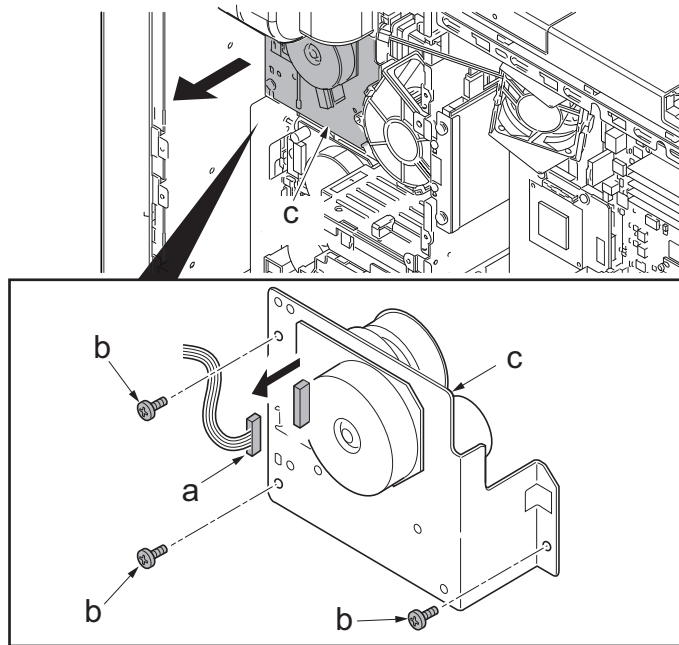
**13** Remove four screws (a)(M4x8).

**14** Remove the feed PWB assembly (b).



14j0267

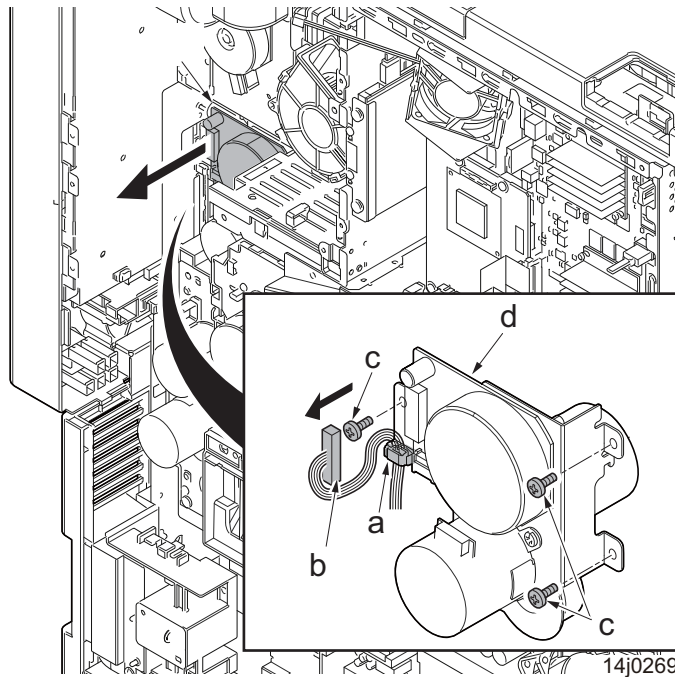
- 15 Disconnect the connector (a).
- 16 Remove three screws (b)(M4x8).
- 17 Detach the fuser drive unit (c).



14j0268

## Detaching the transfer drive unit

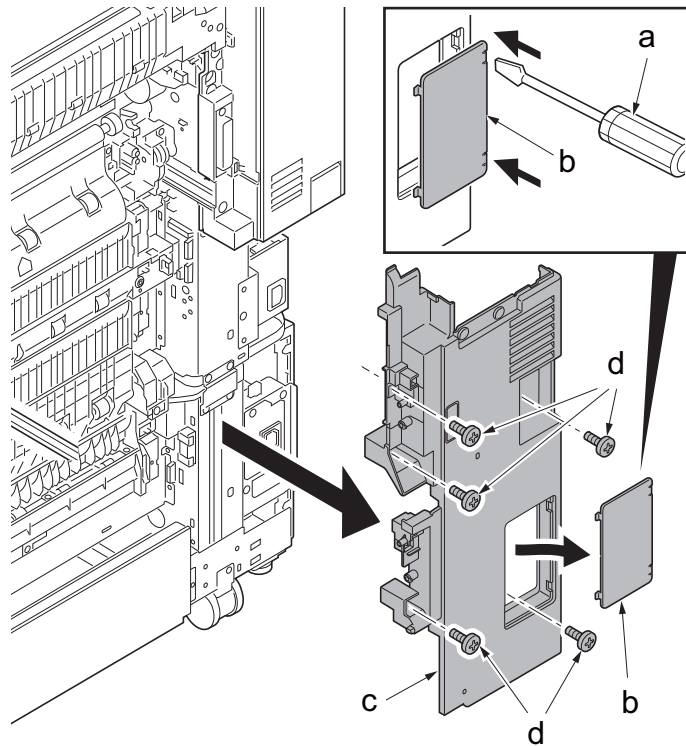
- 18 Pull the primary transfer unit out a little.
- 19 Release the clump (a).
- 20 Disconnect the connector (b).
- 21 Remove three screws (c)(M4x8).
- 22 Detach the transfer drive unit (d).



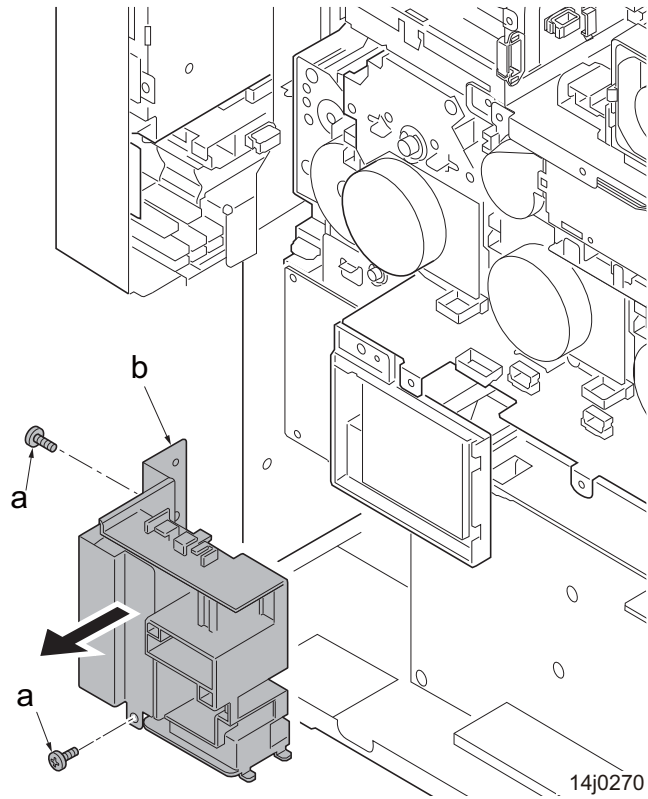
## Detaching the feed drive unit

### Procedures

- 1 Remove the rear left cover, rear right cover and rear lower cover.
- 2 Pull out the conveying unit.
- 3 Release two hooks using a flat blade screwdriver (a) and then remove the interface cover (b).
- 4 Remove five screws (d)(M4x8) of the right lower rear cover (c).
- 5 Remove the right lower rear cover (c).

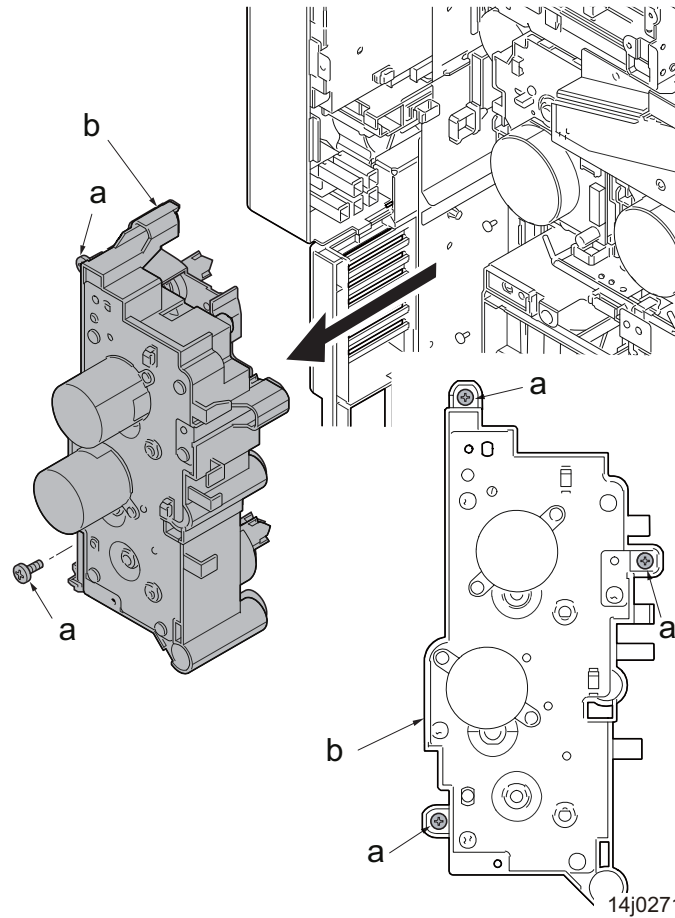


14i0209

**6 Remove two screws (a)(M4x8) and remove the inlet unit (b).**

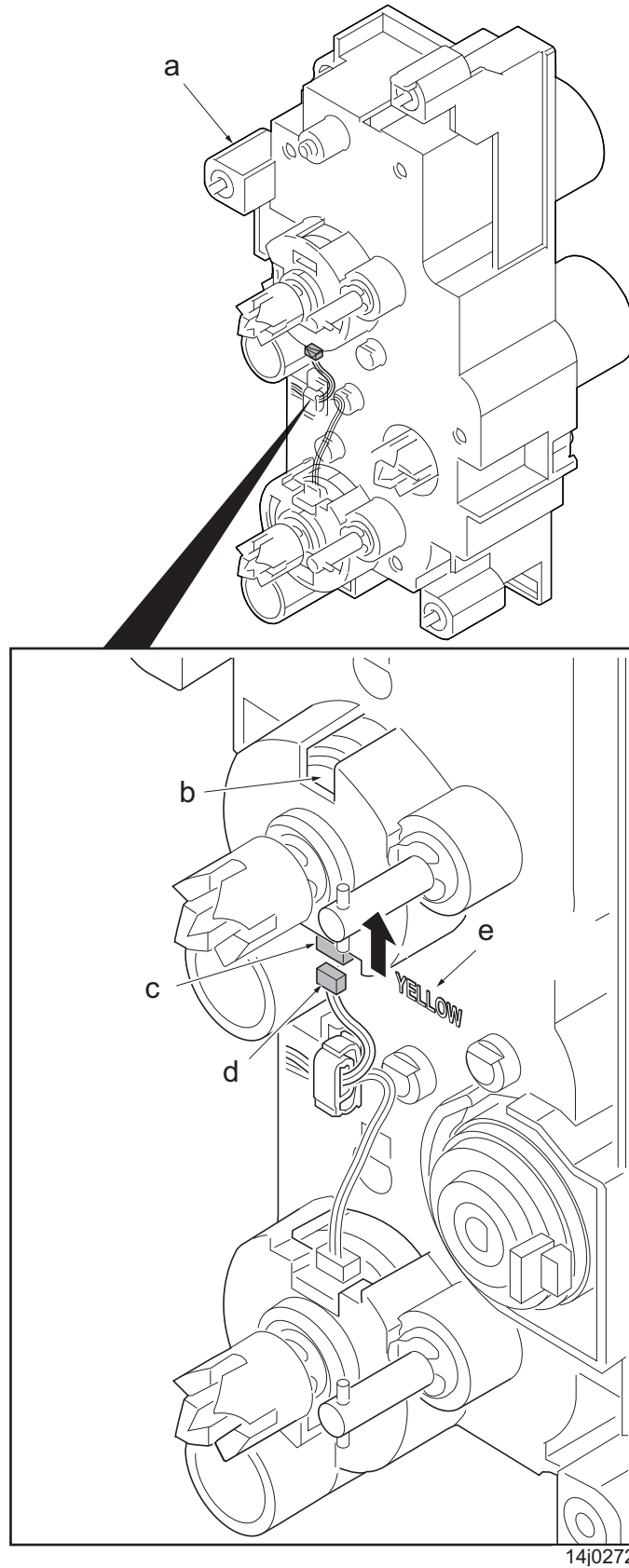
**7 Remove three screws (a)(M4x8).**

**8 Detach the feed drive unit (b).**



**9 Check or replace the feed drive unit (a) and then reattach the parts in the original position.**

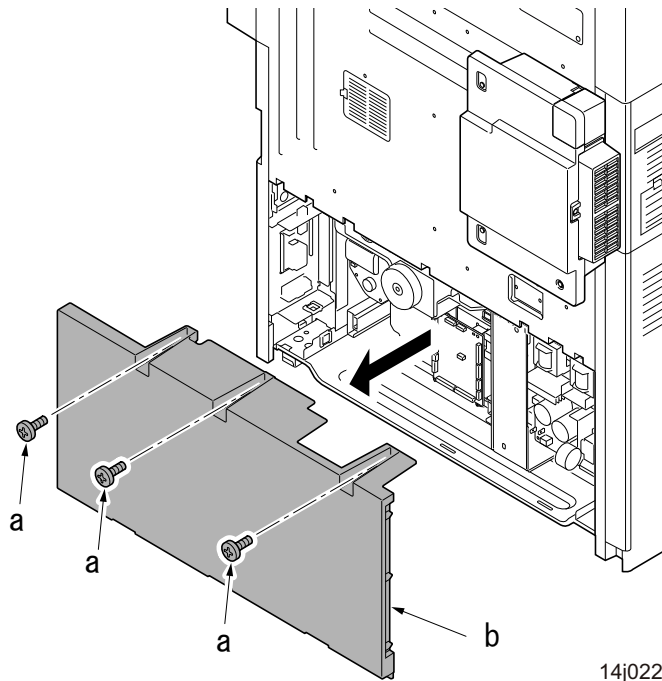
Connect the connector (d) (yellow) to the connector of paper feed clutch 1 (b) on stamp [YELLOW] side as before, when removing the connector (c) of the paper feed clutch 1(b) as the check of the feed drive unit (a) etc.



14j0272

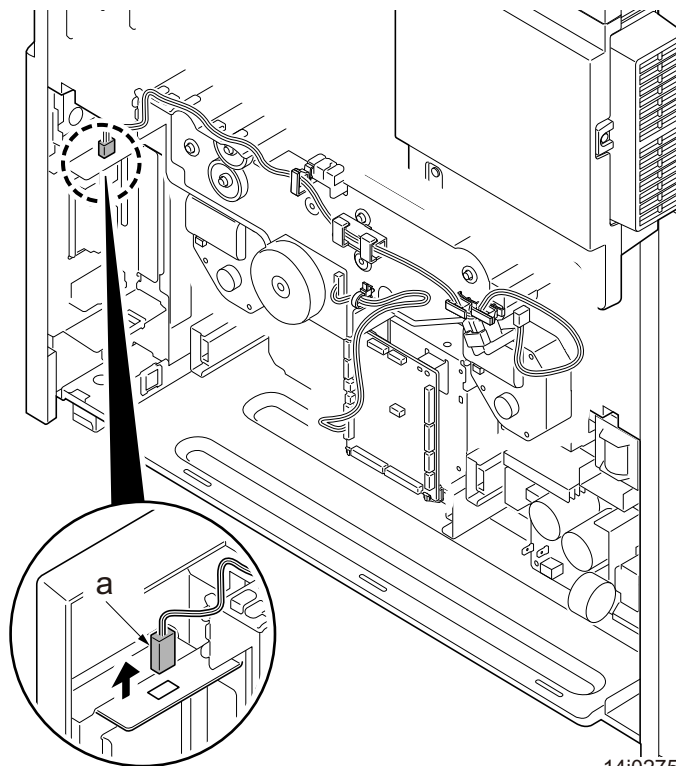
**(4-2) Detaching and reattaching the PF drive unit****Procedures**

- 1 Remove three screws (a)(M4x8) and remove the PF rear right cover (b).**



14j0225

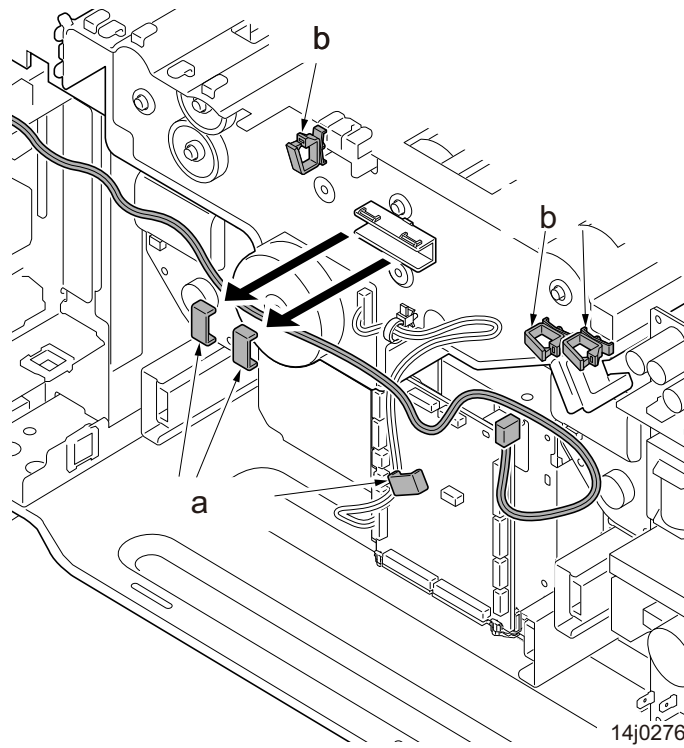
- 2 Remove one end of AC wire connector (a) from the paper feeder.**



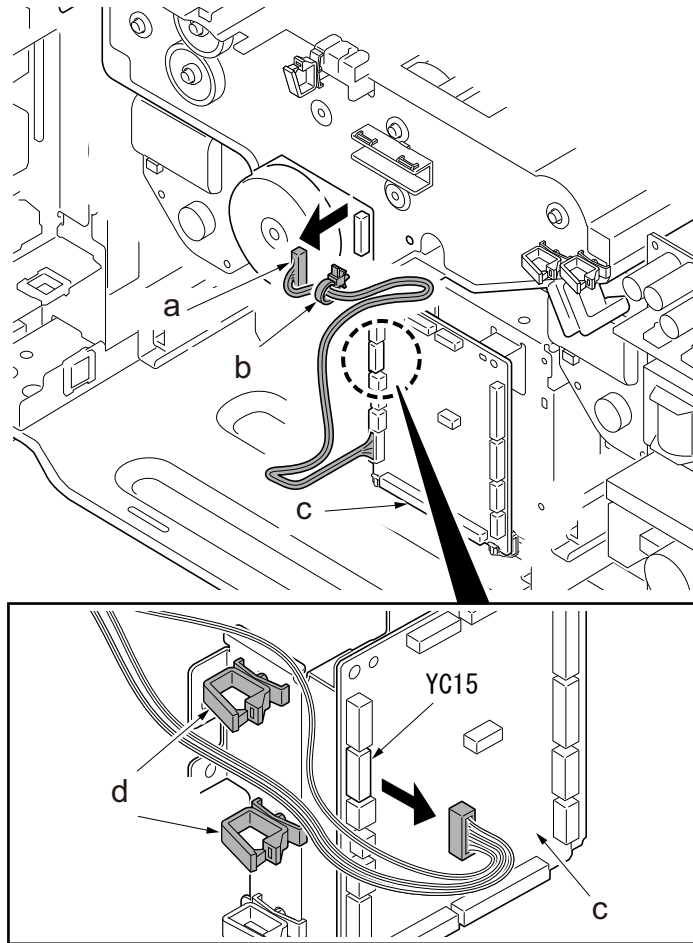
14j0275



- 3 Remove three wire holders (a).
- 4 Release three wire saddles (b) and remove the wire.

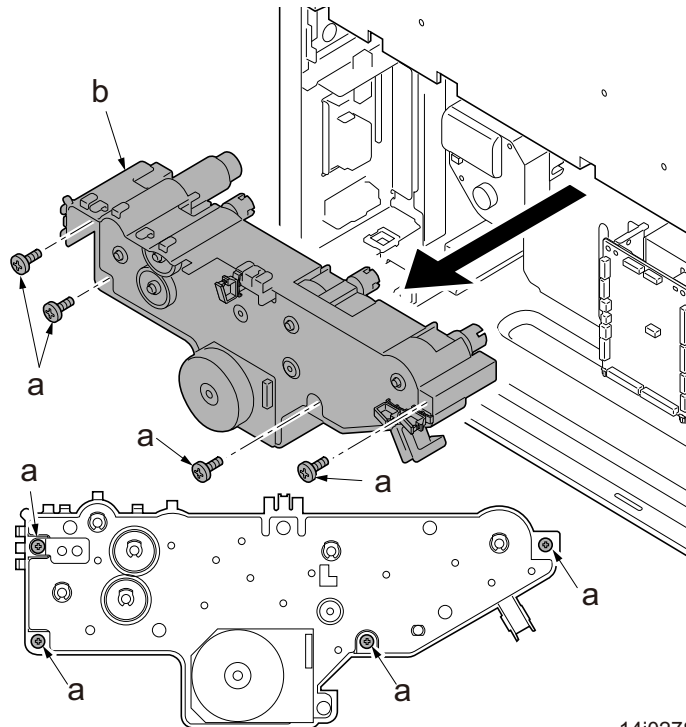


- 5 Remove the connector (a) and the band (b) of the PF paper feed motor.
- 6 Remove the connector (YC15) from the PF main PWB (c) and then release the wire from two wire saddles (d).



14j0277

- 7 Remove four screws (a)(M4x8) and remove the PF drive unit (b).
- 8 Check or replace the PF drive unit (b) and then reattach the parts in the original position.



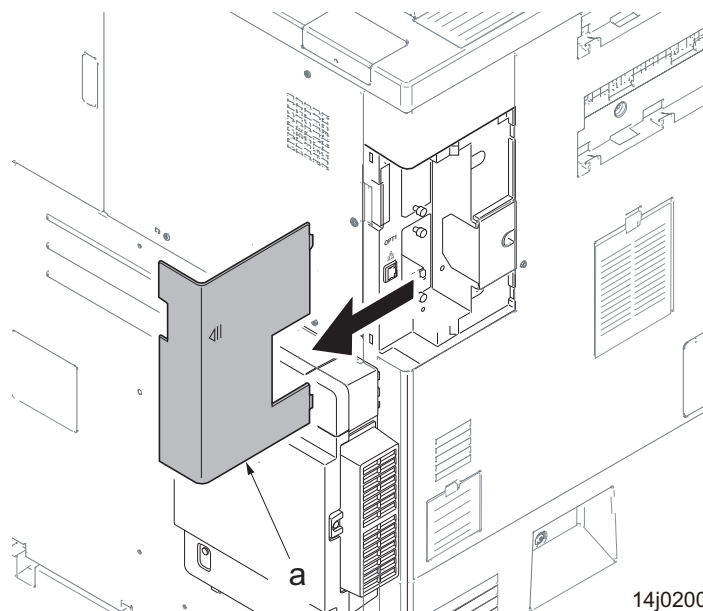
14j0278

### (4-3) Detaching and reattaching the drum K drive unit and drum MCY drive unit

#### Procedures

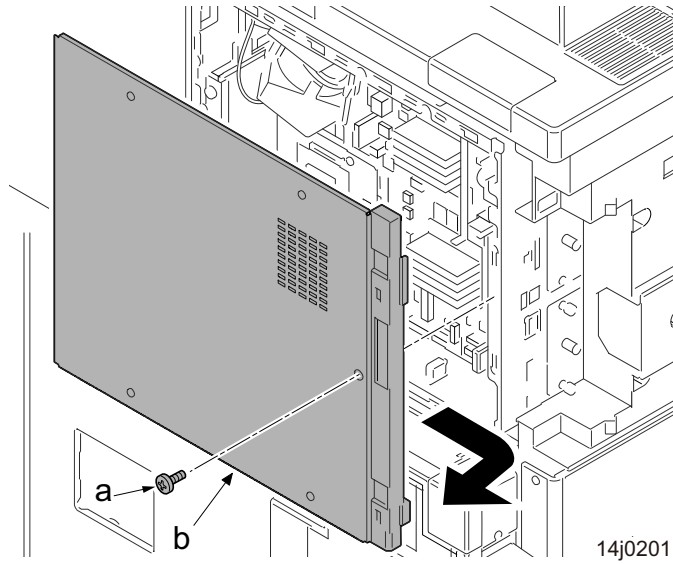
##### Detaching the drum K drive unit

- 1 Remove the controller cover (a).

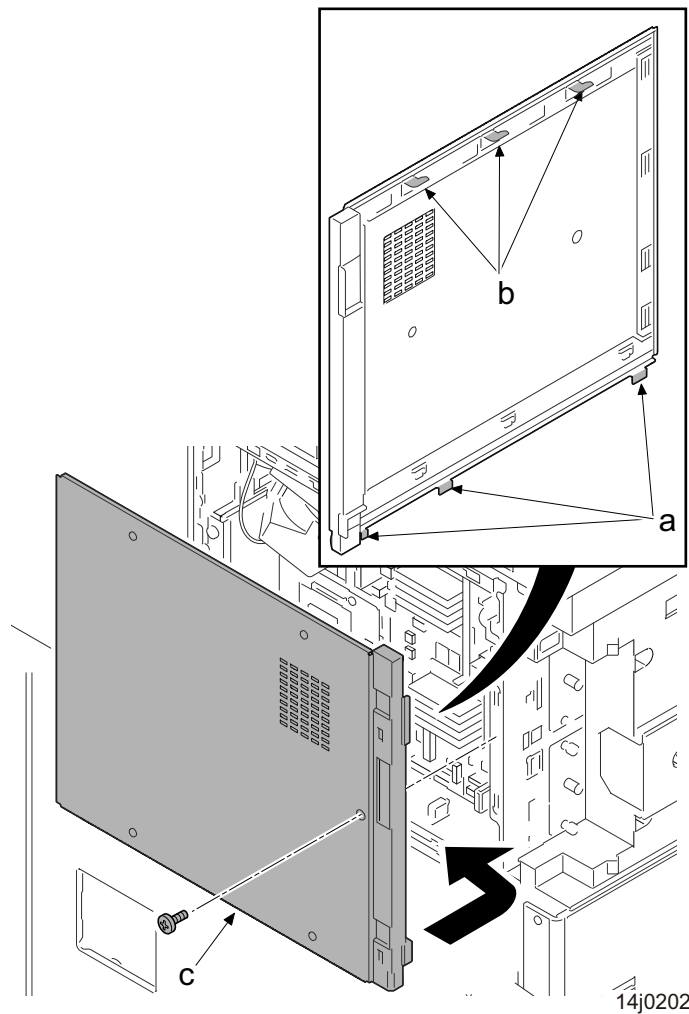


14j0200

- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.**

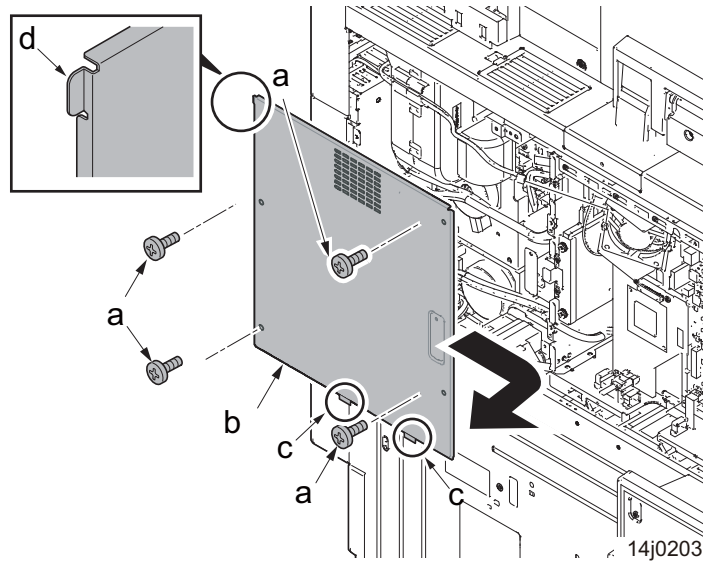


When reattaching the rear left cover (b), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.

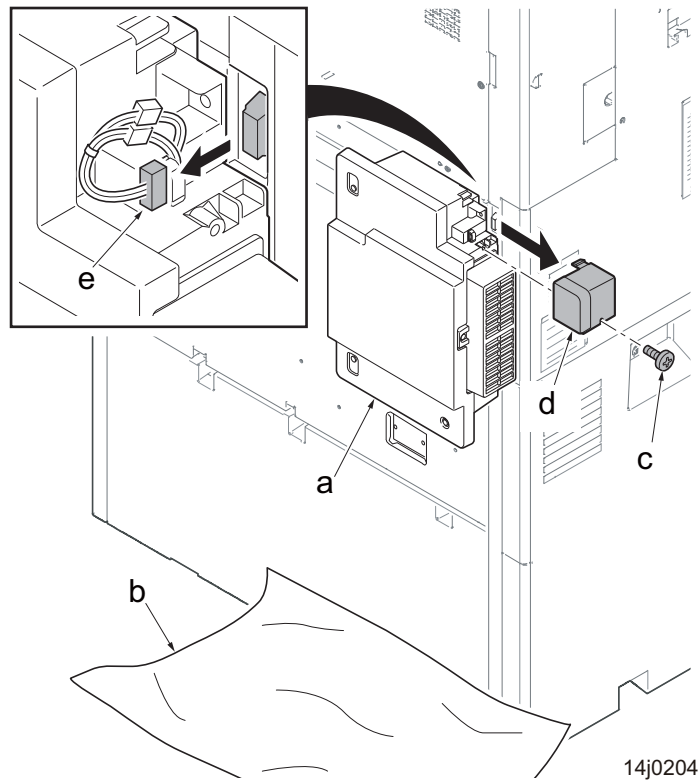


- 3 Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.**

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.

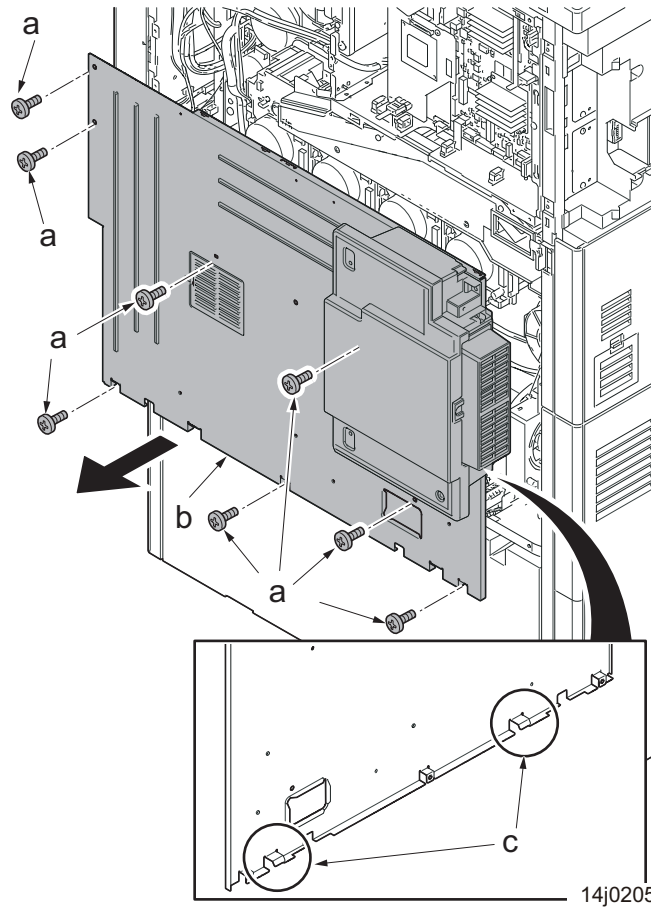


- 4 Cover the area under the waste toner box (a) to prevent contamination due to the scattered toner with the sheet (b).
- 5 Remove the screw (c)(M3x8) and remove the cable cover (d).
- 6 Disconnect the connector (e).



**7** Remove eight screws (a)(M3x8).

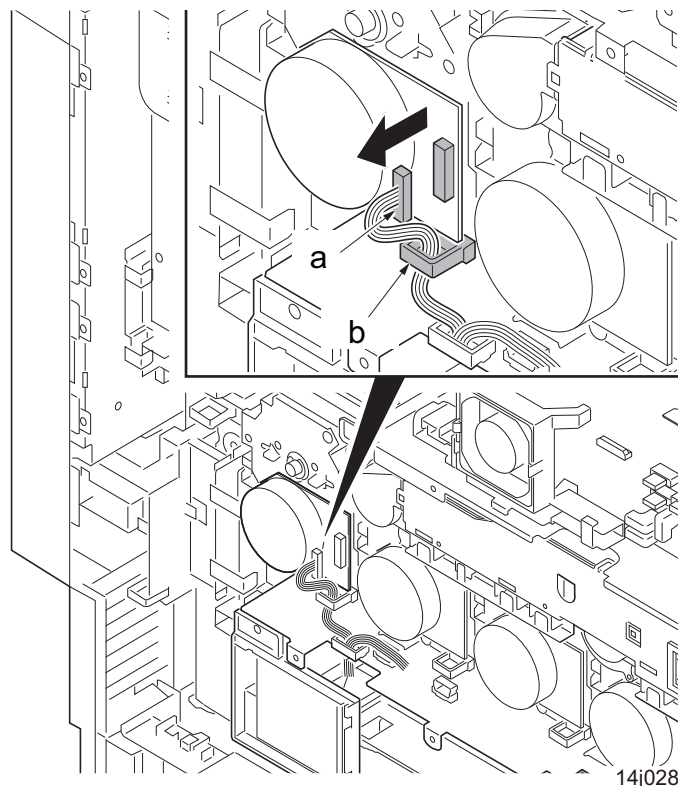
**8** Release two lower hooks (b) and remove the rear lower cover (c).



14j0205

**9** Disconnect the connector (a).

**10** Release the wire saddle (a).

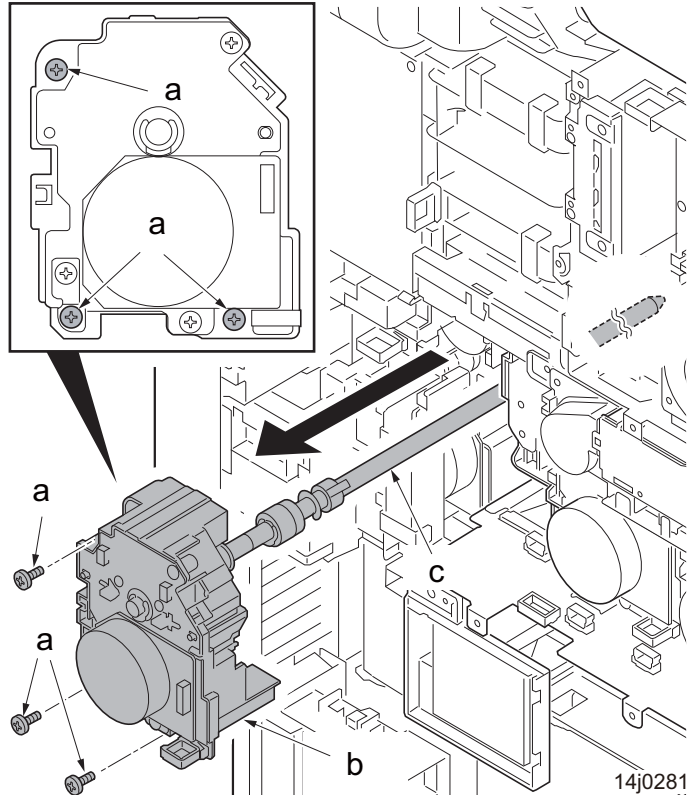


14j0280

**11 Remove three screws (a)(M4x8).****12 Detach the drum K drive unit (b).**

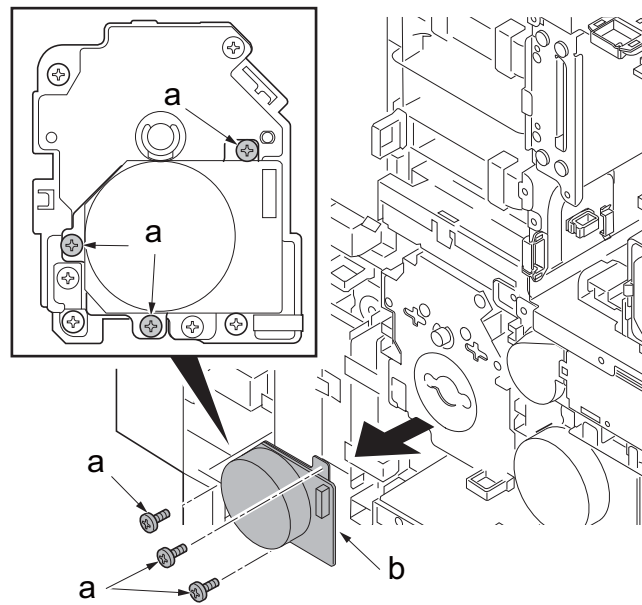
Do not hold the only shaft part (c), when carrying the drum K drive unit (b). (Have the housing.)

Put support on the tip of the shaft so that the shaft may become the horizontal when putting the drum K drive unit on the table etc.

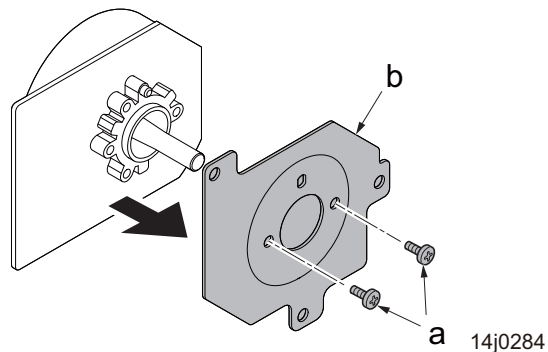


## Detaching the drum K motor

- 1 Remove the rear upper cover.
- 2 Remove the waste toner box.
- 3 Remove the rear lower cover.
- 4 Disconnect the connector (a).
- 5 Release the wire saddle (b).
- 6 Remove three screws (a)(M4x8).
- 7 Remove the drum K motor unit (b).



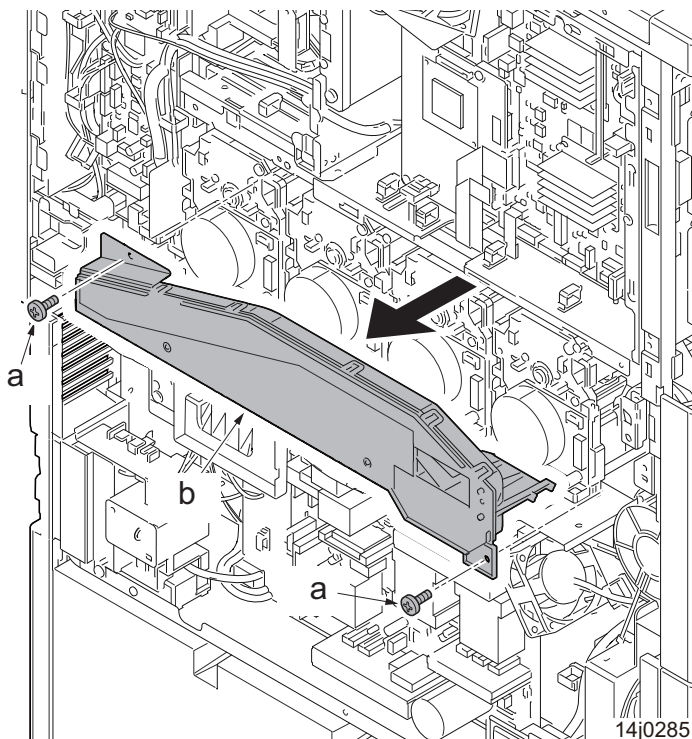
- 8 Remove two screws (a)(M3x8).
- 9 Remove the motor mounting plate (b).



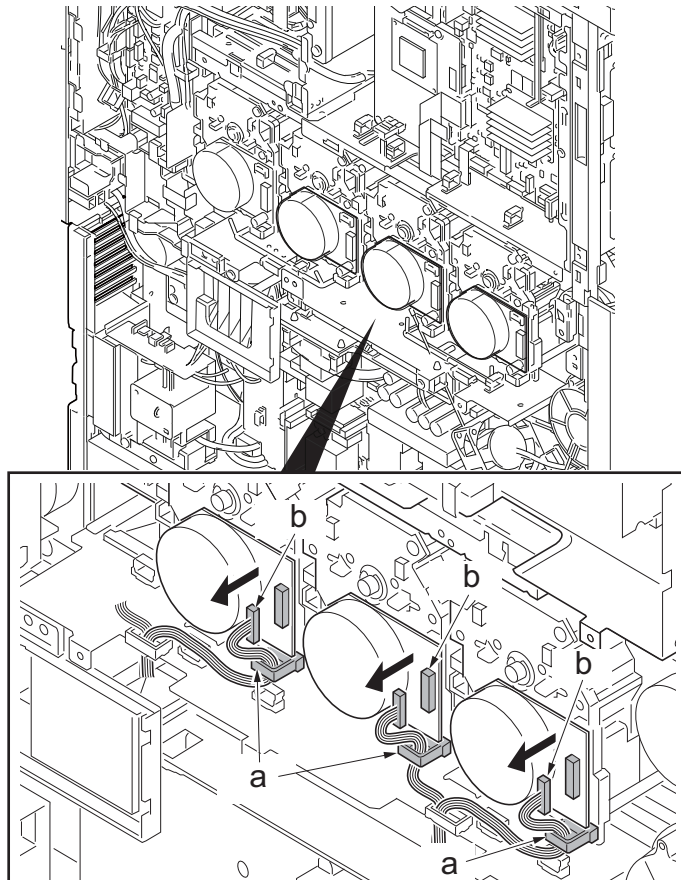


## Detaching the drum MCY drive unit

- 1 Remove the rear left cover and rear right cover.
- 2 Remove the waste toner box.
- 3 Remove the rear lower cover.
- 4 Remove two screws (a)(M4x8) and remove the toner duct unit (b).

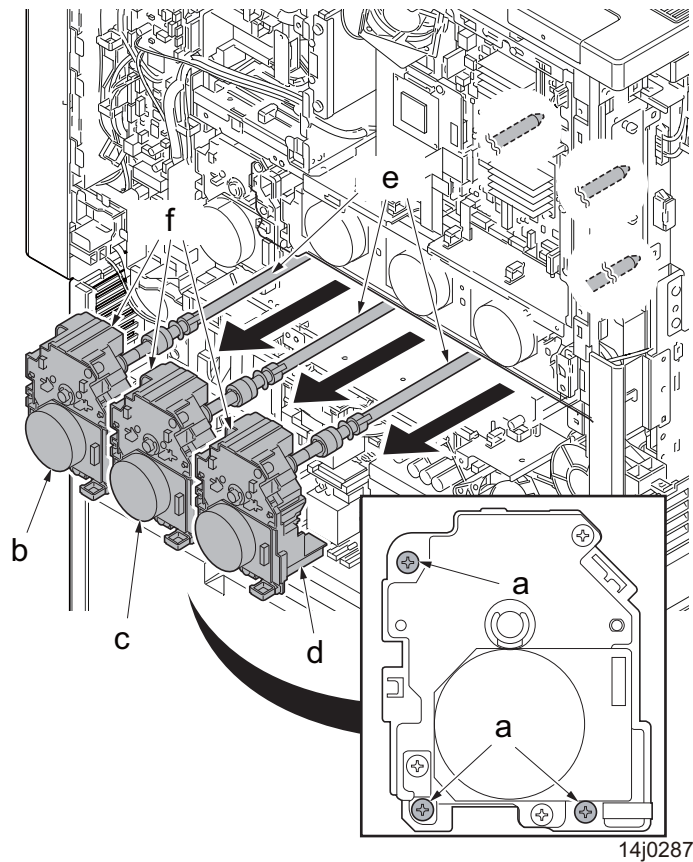


- 5 Release three wire saddles (a).
- 6 Disconnect three connectors (b).



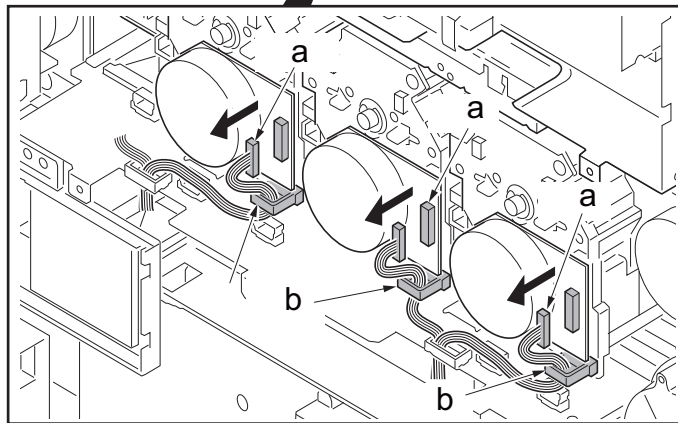
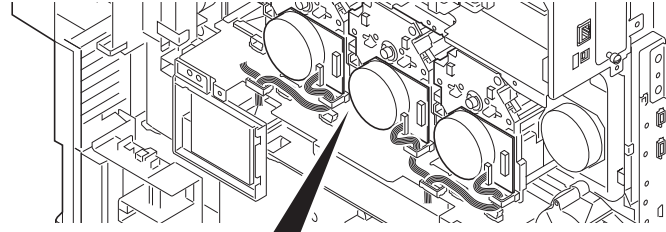
14j0286

- 7 Remove each three screws (a)(M4x8) and remove the drum M drive unit (b), drum C drive unit (c) and drum Y drive unit (d).
- 8 Do not hold the only shaft part (e), when carrying the drum drive unit. (Have the housing (f).)
- 9 Put support on the tip of the shaft so that the shaft may become the horizontal when putting the drum drive unit on the table etc.
- 10 Check or replace the drum K drive unit, drum M drive unit, drum C drive unit, drum Y drive unit and then reattach the parts in the original position.



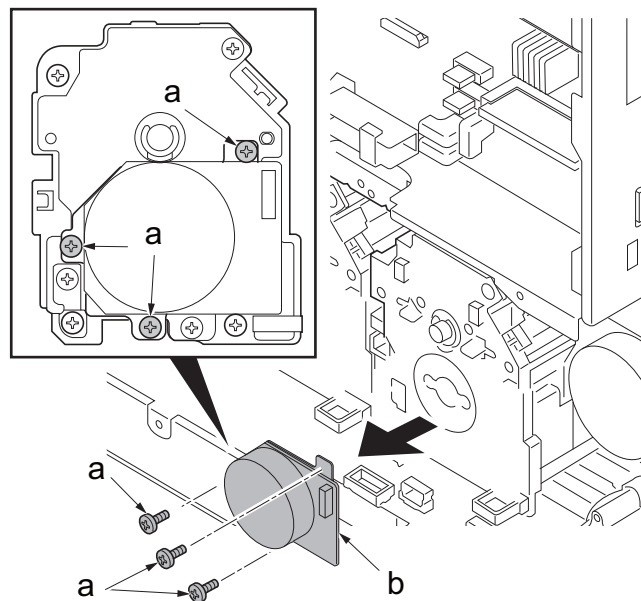
## Detaching the drum M,C,Y motor

- 1 Detach the toner duct unit.
- 2 Disconnect three connectors.
- 3 Release three wire saddles.



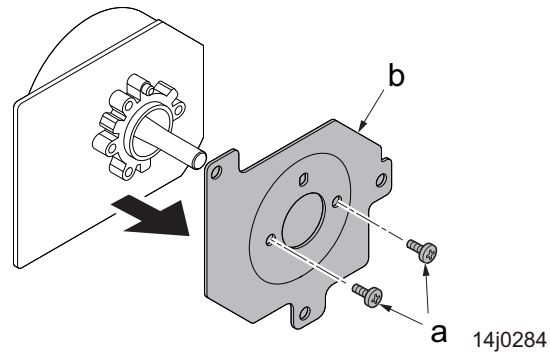
14i0288

- 4 Remove three screws (a)(M4x8).
- 5 Remove the drum M,C,Y motor unit (b).



14j0289

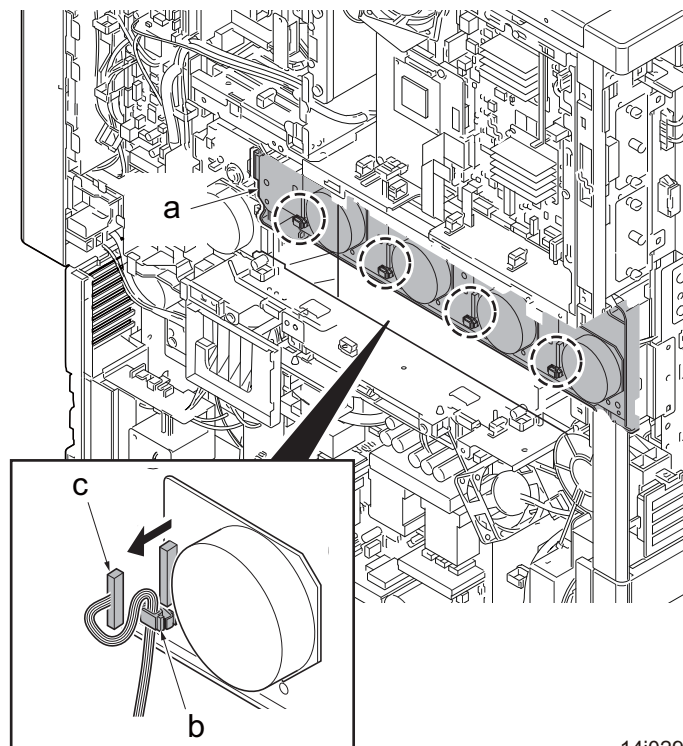
- 6 Remove two screws (a)(M3x8).
- 7 Remove the motor mounting plate (b).



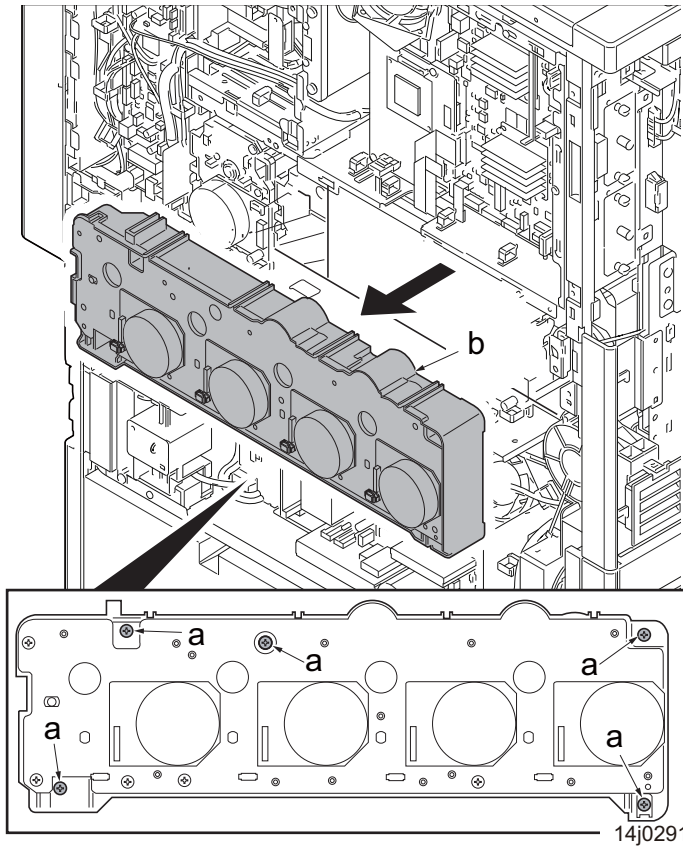
#### (4-4) Detaching and reattaching the main drive unit

##### Procedures

- 1 Remove the drum K drive unit, drum M drive unit, drum C drive unit, drum Y drive unit.
- 2 Release four wire saddles (b) of the main drive unit (a).
- 3 Disconnect four connectors (c).



- 4 Remove five screws (a)(M4x8).
- 5 Remove the main drive unit (b).
- 6 Check or replace the main drive unit (b) and then reattach the parts in the original position.

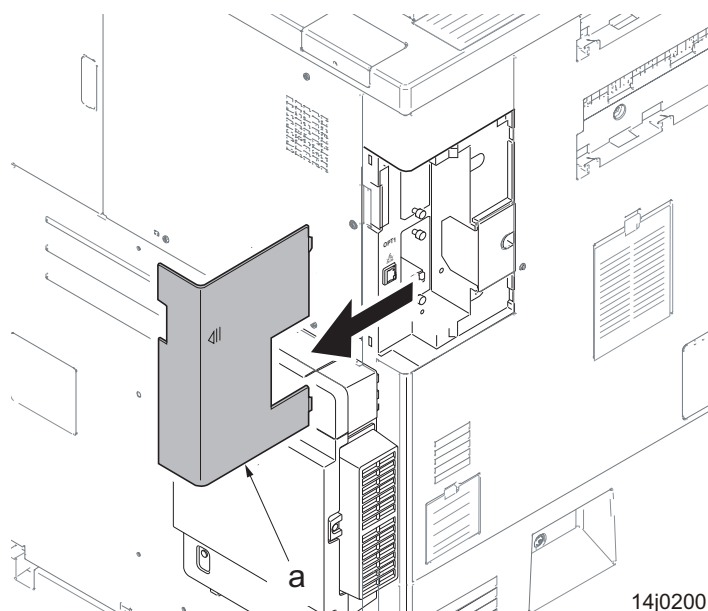


### (5)Others

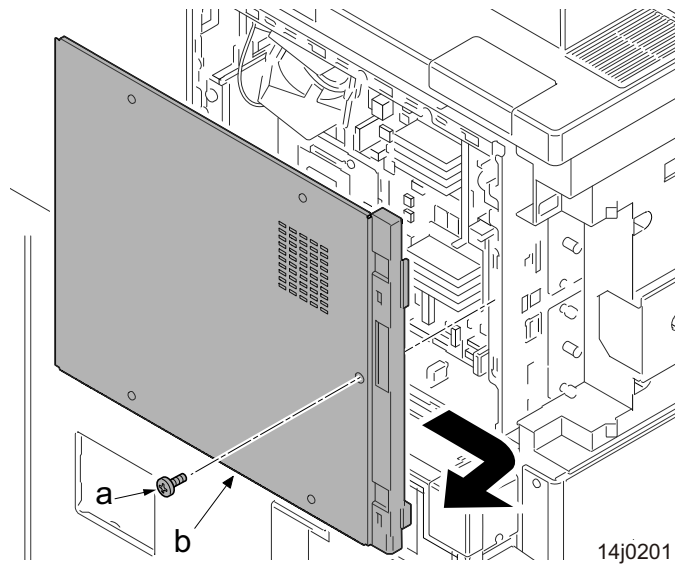
#### (5-1)Detaching and reattaching the SSD

#### Procedures

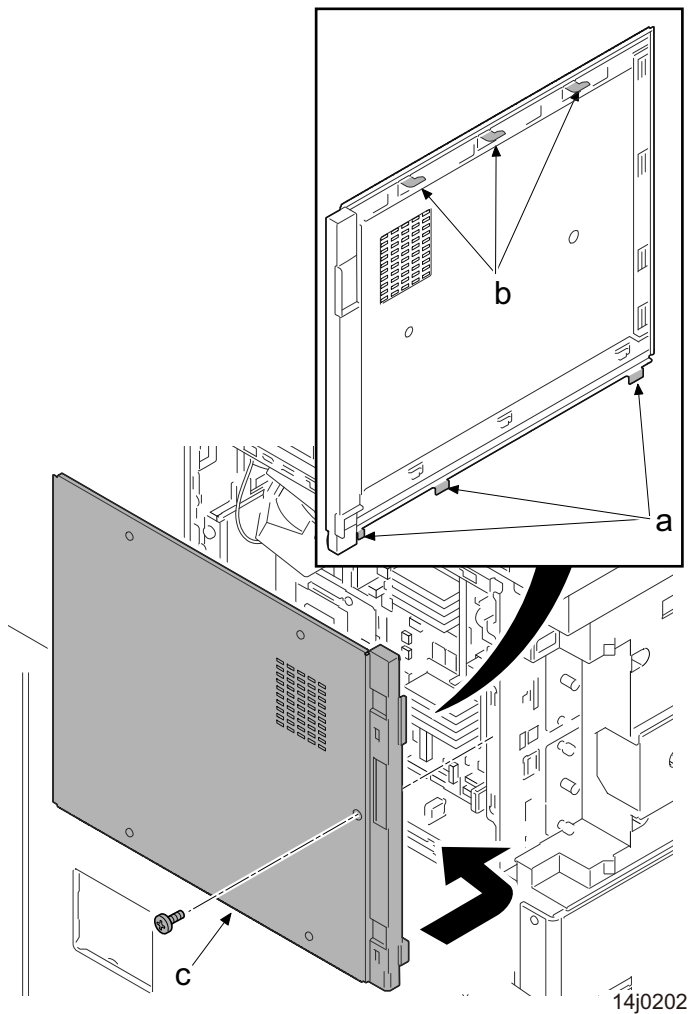
- 1 Remove the controller cover (a).



- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.



When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.



### 3 Remove one screw (a)(M2).

### 4 Remove the SSD (b) from the connector (c).

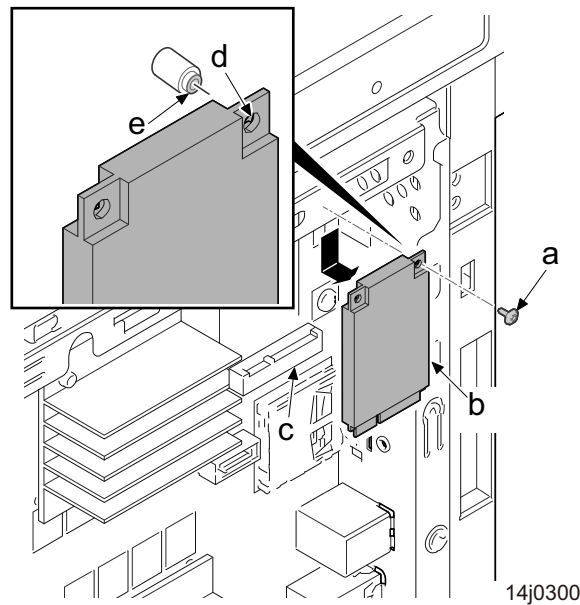
Use a Phillips 1 screwdriver and take care not to damage the screws.

This screw is exclusive. Please do not fix SSD (b) with screws other than the items below (7BB000204H BIND M SCREW 2x4)

#### ✔ IMPORTANT

To avoid damage when attaching the SSD (b), align the screw hole (d) to the positioning boss (e).

Do not replace the main PWB, engine PWB and SSD at the same time.



### SSD replacement procedures when the SSD replacement is indicated.

Data transfer by U026 is not available since data cannot be read when SSD is broken or it is in Read Only mode.

#### Procedures

Preparation: 2 USB memory (for firmware and data backup)

Before operating, perform data backup in U917.

### 1 Firmware storage in a USB memory (USB memory A)

- 1 Store the latest firmware upgrade pack and released firmware set (Main /MMI /BROWSER /DICTIONARY / Language /OCR) in a USB memory.

Check the firmware applicable to the target model. When inputting the software of outside the target, becomes unstable in action. In order to reboot, require minimum main.

### 2 SSD data backup (USB memory B)

A 64GB USB memory is necessary to backup the 32GB SSD.



- 1 Install the USB memory B.
- 2 Execute maintenance mode U026.
- 3 Input "026" using the numeric keys and press the [Start] key.
- 4 Select [SSE].
- 5 Select [Backup]
- 6 Press the [Start] key.
- 7 Turn the power off after completion.

### 3 Replace the new SSD.

When equipping with SSD (8G/32G) which the capacity is different from the specification, pay attention as F010 (SSD and communication error) happen.

### 4 Turn ON the power with equipping with USB memory A.

As the program from SSD can't load, SSD recovery program which is SNOR on the main PWB start up, is formatted automatically.

When forgot the equipment of USB memory, pay attention as F010 displays.

### 5 If UPDATE completion is displayed on the control panel, turn OFF/ON the power with inserted USB memory A.

### 6 Update firmware. (See page [P.5-1](#))

### 7 Retrieve the data backed up in the USB memory B.

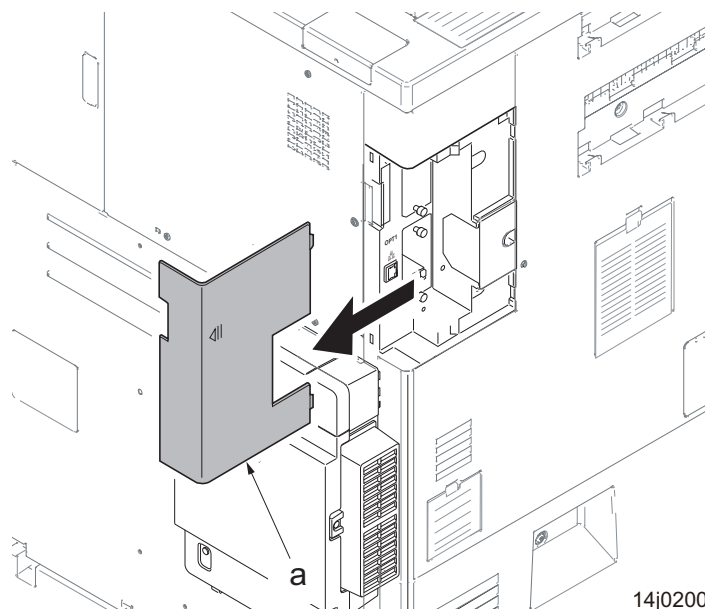
### 8 Install the HyPAS application (FMU, etc.) from the Application screen.

Confirm a kind of HyPAS application displayed with an application screen before SSD exchange, and install it again.

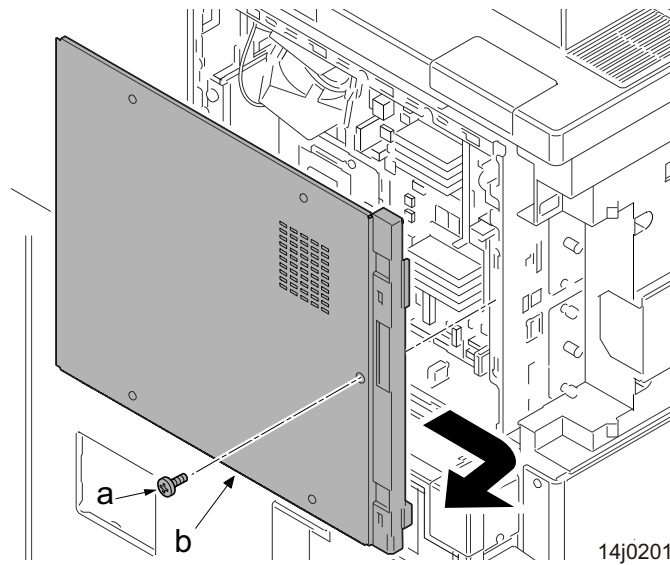
## (5-2) Detaching and reattaching the hard disk unit

### Procedures

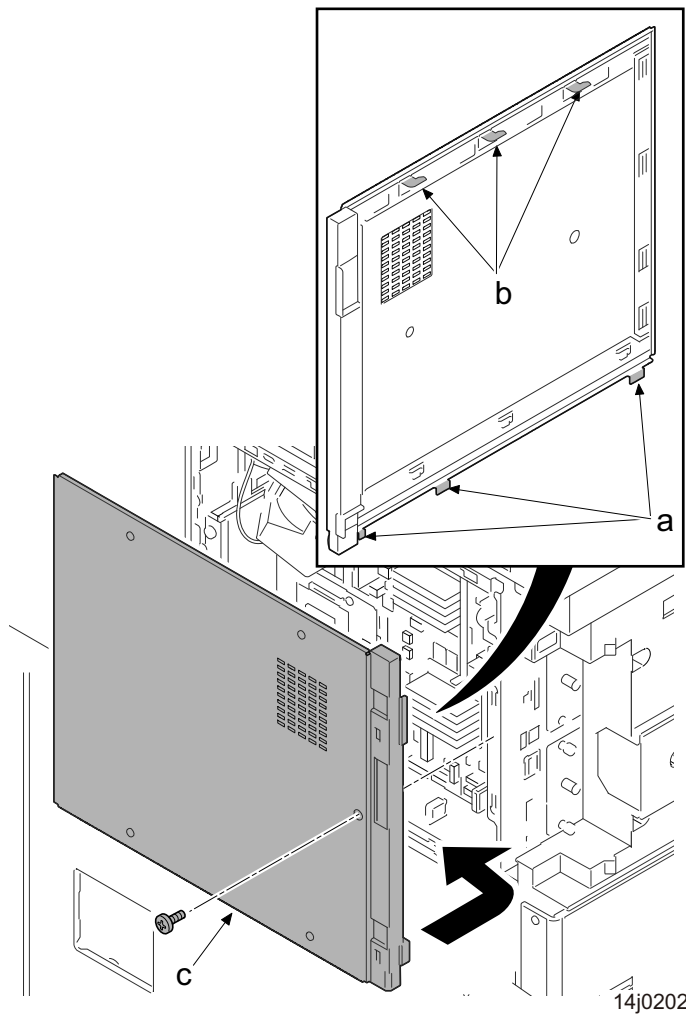
#### 1 Remove the controller cover (a).



- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.

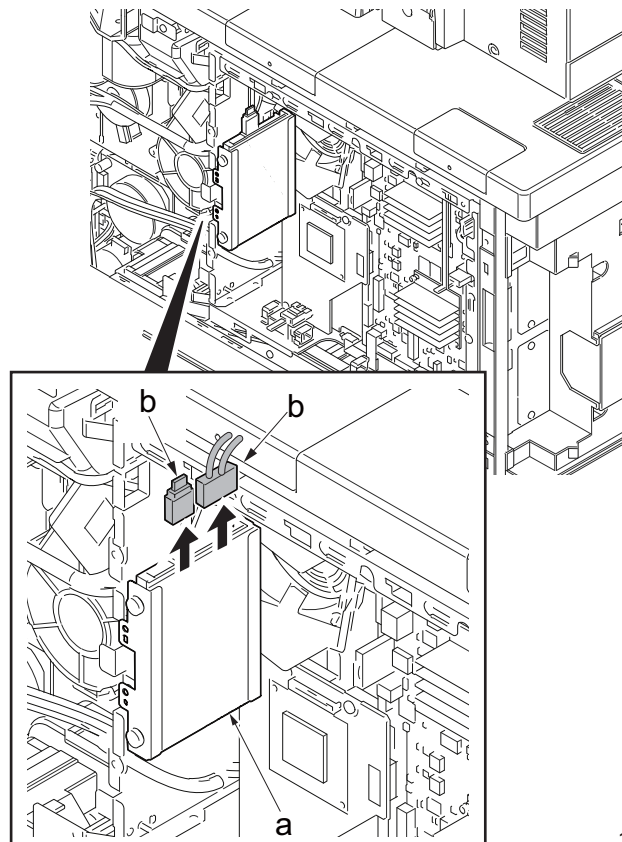


When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.



## Procedures

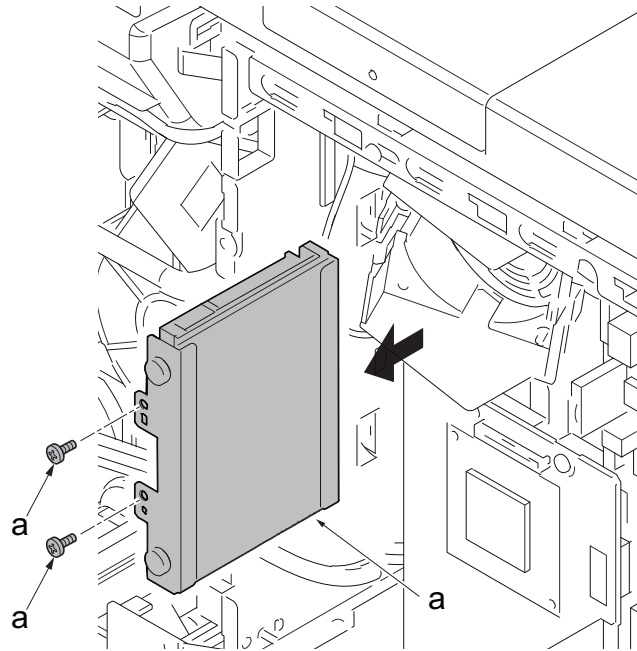
- 1 **Execute maintenance mode U917 (Backup data reading).**  
(Refer [P.6-335](#))
- 2 **Detach the rear left cover.**
- 3 **Disconnect two connectors (b) from the hard disk unit (a).**



14j0301

- 4 **Remove two screws (a)(M3x8) and remove the hard disk unit (b).**
- 5 **Check or replace the hard disk unit and then reattach the parts in the original position.**  
Handle the HDD so as not to drop or get it in touch with hard objects as it is susceptible to vibrations and impacts especially along the direction of disc rotation. Be careful not to apply shocks while securing the screws.

## 6 Execute maintenance mode U024 (HDD formatting) -Format - Full. (Refer [P.6-37](#))



14j0302

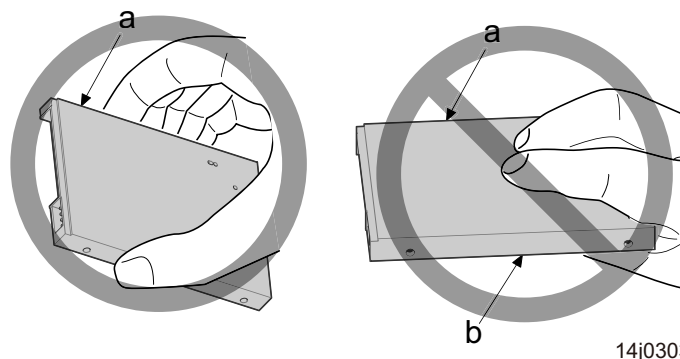
## 7 Install the firmwares by the following procedure.

- 1 Connect the USB memory that stored HyPAS application (FMU, etc.) to the main body. Install the firmwares from the application screen in the System Menu. (see the operation guide)
- 2 Confirm a kind of HyPAS application displayed with an application screen before HDD exchange, and install it again.
- 3 Copy two kind of Multi Color Tables (copiers and printers) from a USB memory by running U485.
- 4 Install the OCR dictionary software from a USB memory by toggling power on and off.

## 8 If backup data is saved by maintenance mode U917, execute import of the backup data by U917. (Refer [P.6-335](#))

### ✔ IMPORTANT

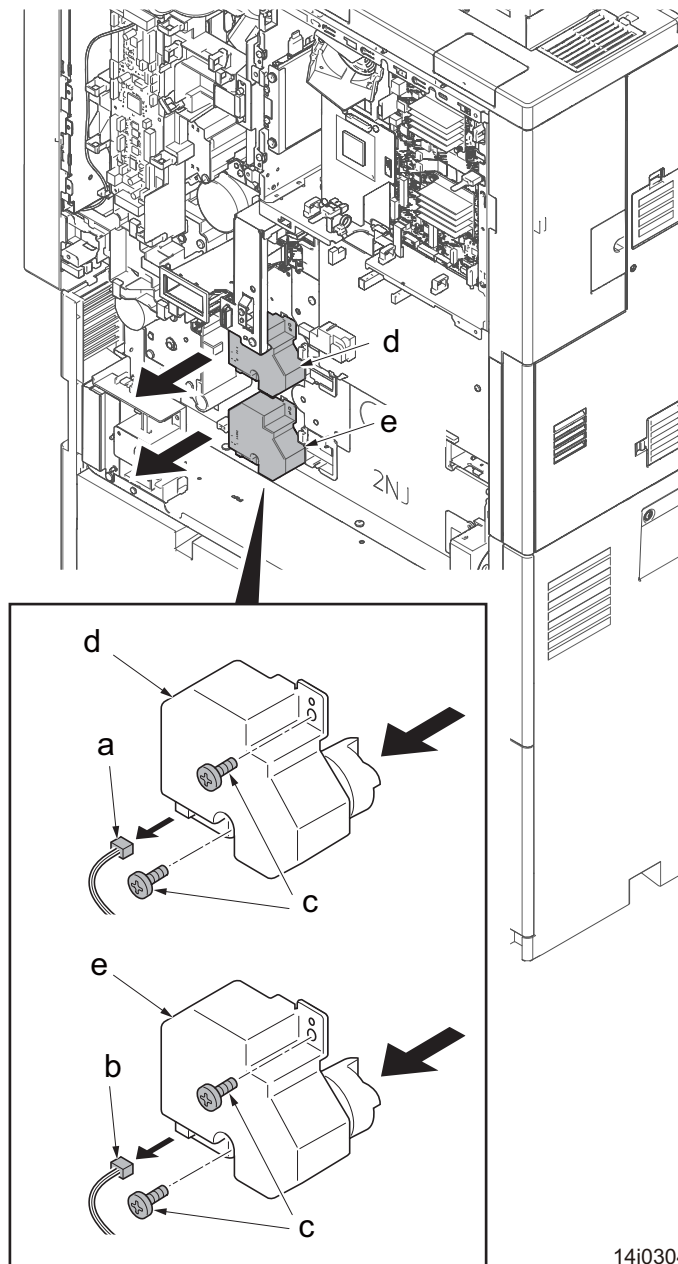
When installing the HDD (a), hold it without touching the PWB side (b) to avoid damage.



14j0303

**(5-3) Detaching and reattaching the lift motor****Procedures**

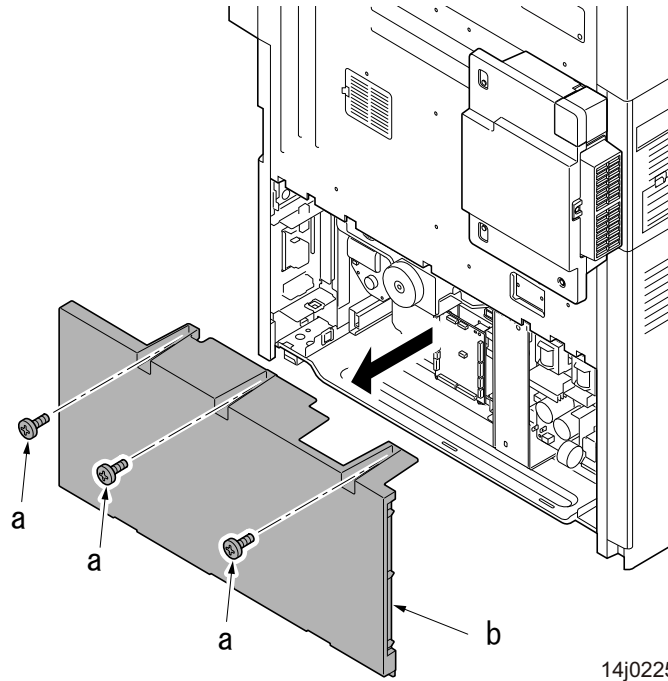
- 1** Remove the power source assembly.
- 2** Disconnect the connector (white) (a).
- 3** Disconnect the connector (gray) (b).
- 4** Remove each two screws (c) (M3x8) and remove the lift motor 1 (d) and the lift motor 2 (e).
- 5** Check or replace the lift motor and then reattach the parts in the original position.



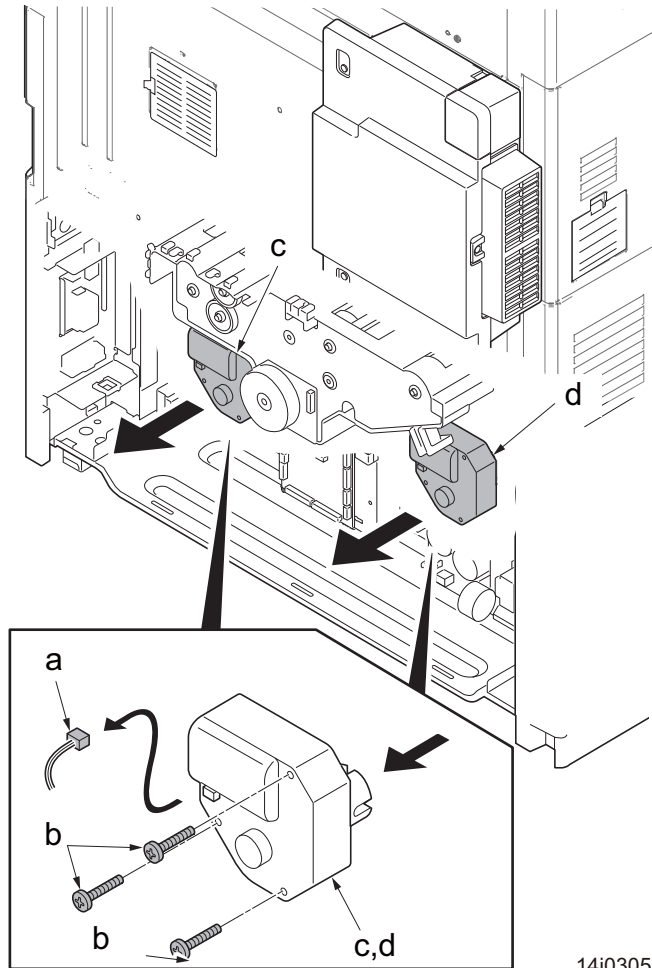
14j0304

**(5-4) Detaching and reattaching the PF lift motor****Procedures**

- 1 Remove three screws (a)(M4x8) and remove the PF rear cover (b).



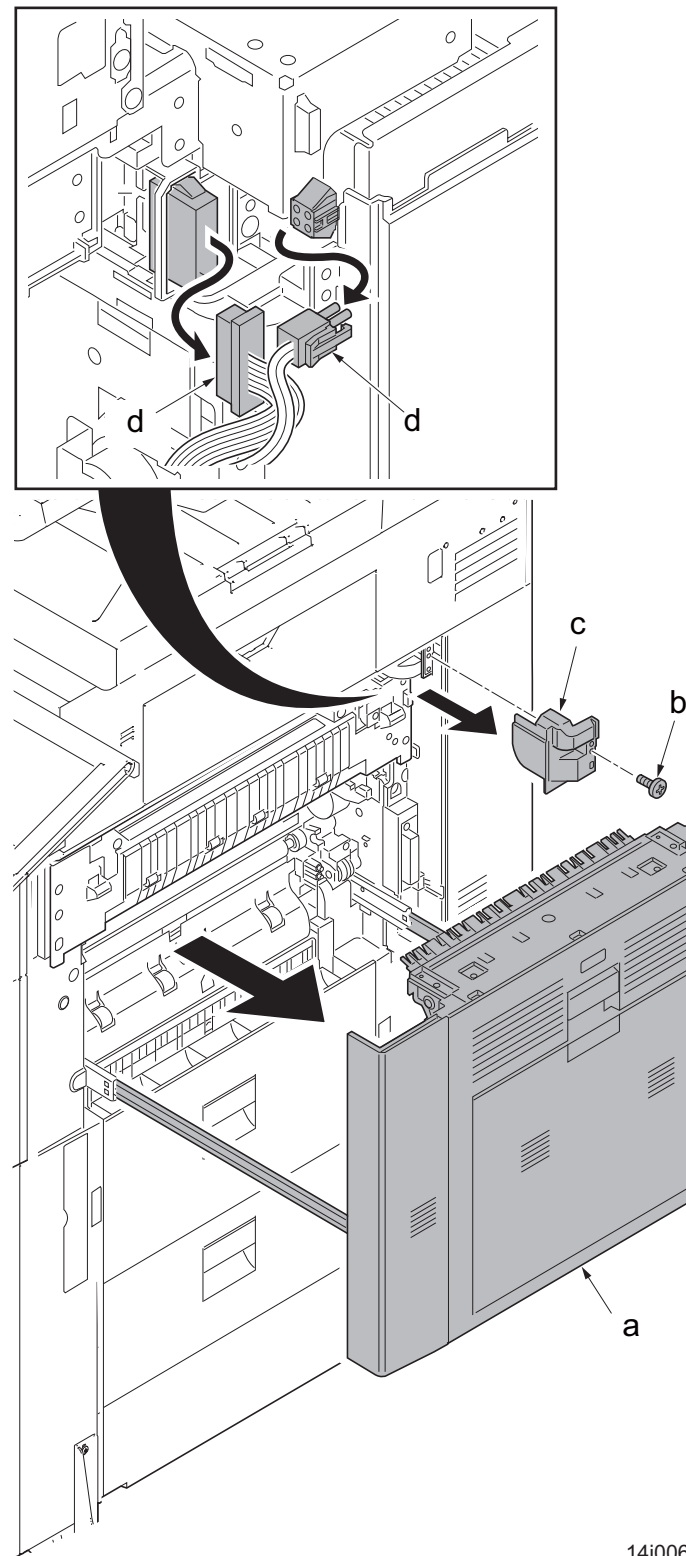
- 2 Disconnect each the connector (a).
- 3 Remove each three screws (b)(M3x8) and then remove the PF lift motor 1 (c) and the PF lift motor 2 (d).
- 4 Check or replace the PF lift motor and then reattach the parts in the original position.



14j0305

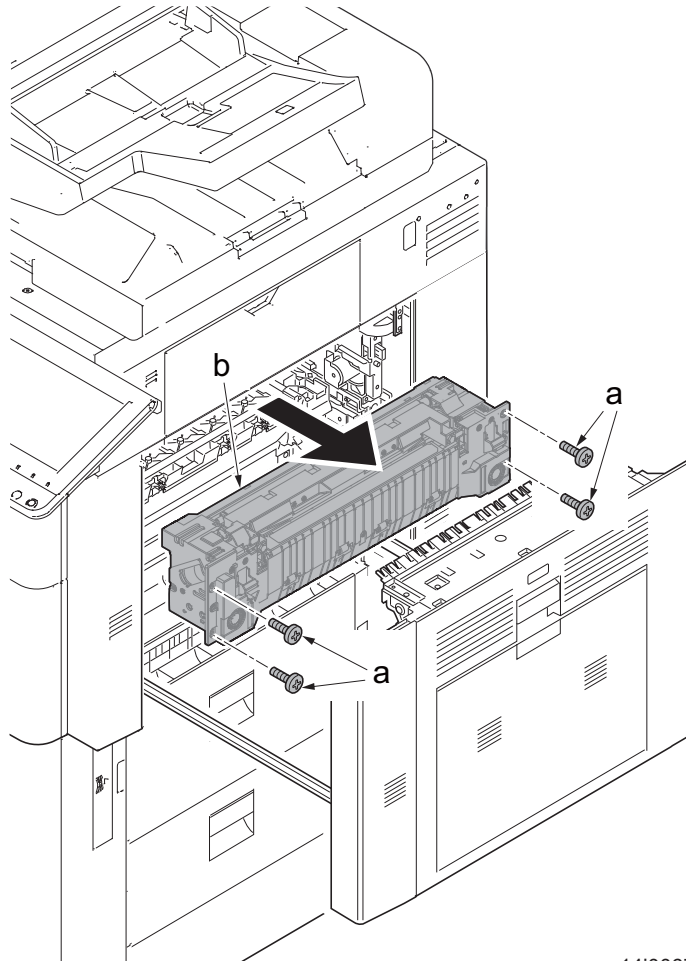
**(5-5) Detaching and reattaching the IH unit****Procedures**

- 1** Pull out the conveying unit (a).
- 2** Remove the screw (b)(M3x8) and remove the fuser wire cover (c).
- 3** Disconnect two connectors (d).

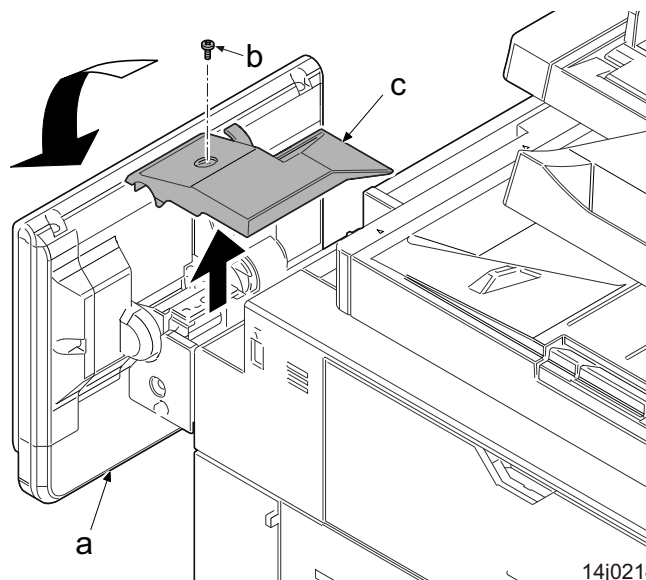


14j0066

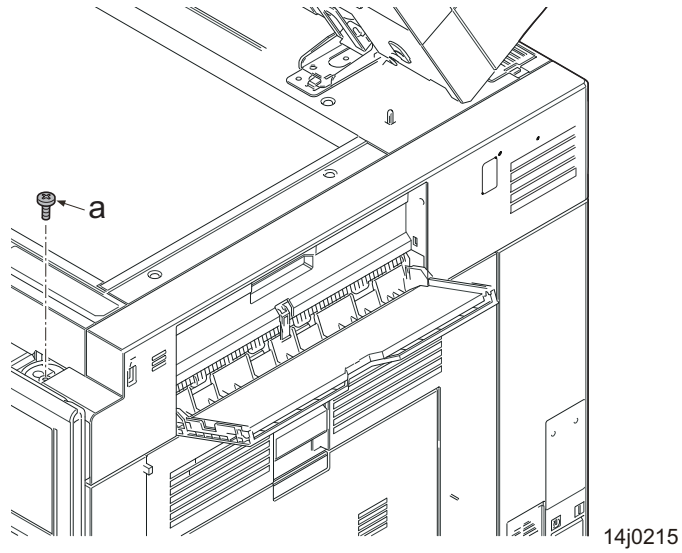
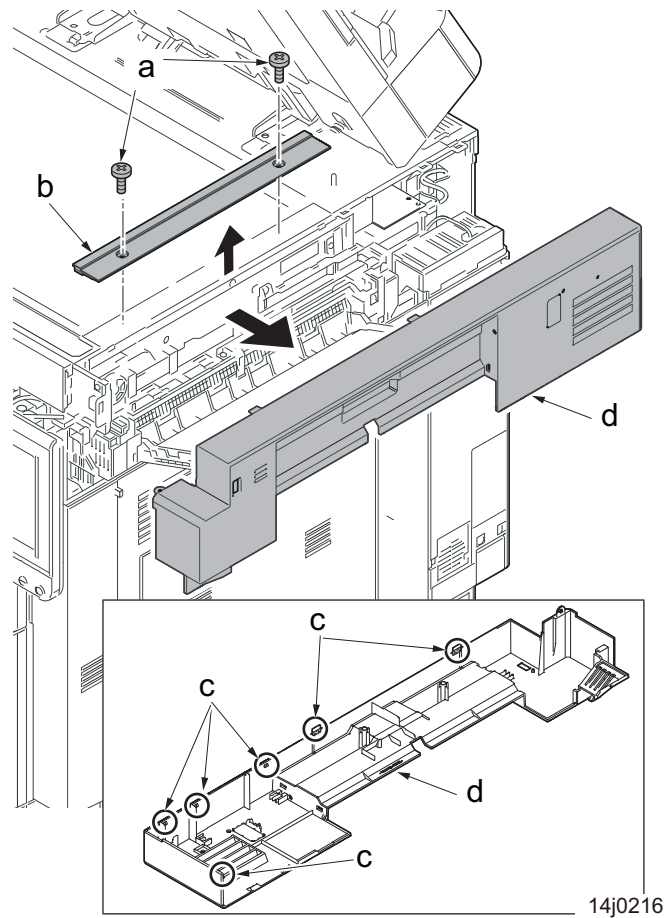


**4 Remove four screws (a)(M4x12) and remove the fuser unit (b).**

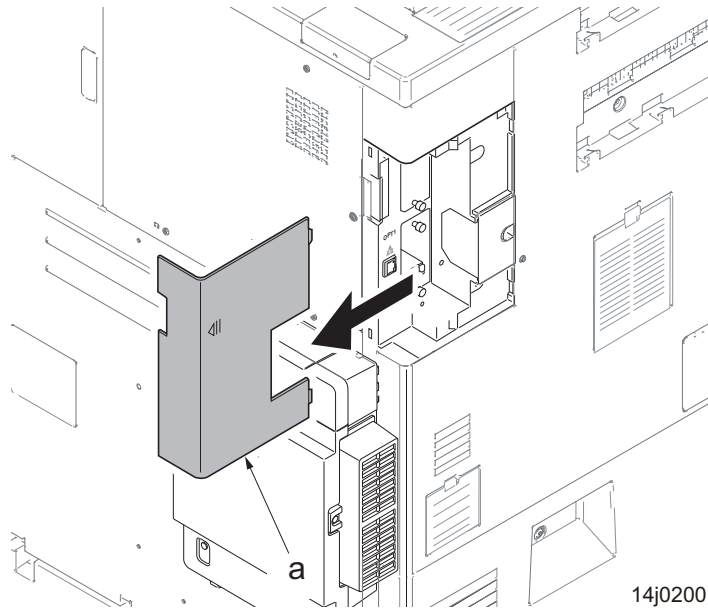
14j0067

**5 Tilt up the operation unit (a).****6 Remove the screw (b)(M3x8) and remove the operation unit rear side cover (c) in the direction of the arrow.**

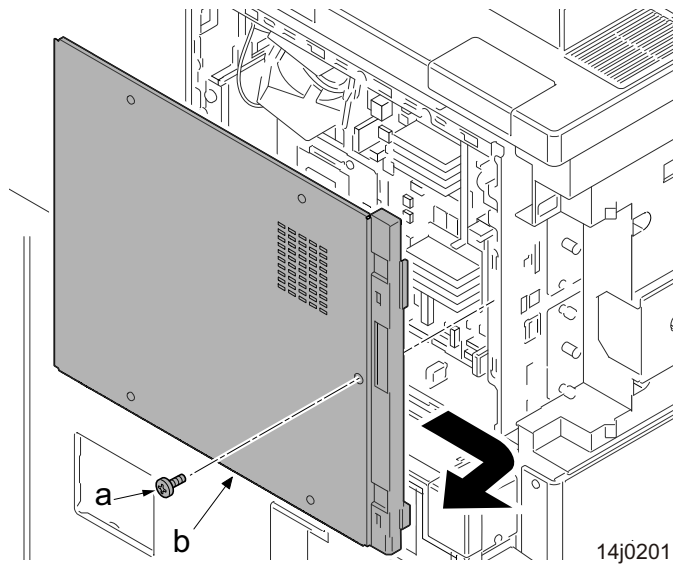
14j0214

**7 Remove the screw (a)(M4x8).****8 Remove two screws (a)(M4x8) and then remove the ISU right cover (b).****9 Release six hooks (c) and remove the right upper cover (d).**

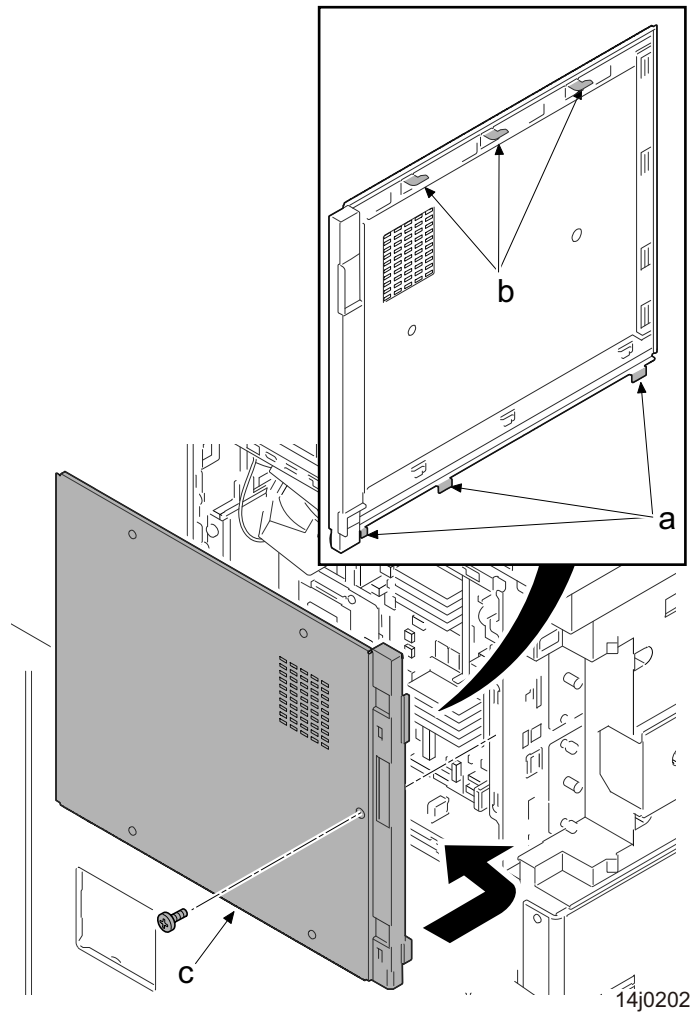
## 10 Remove the controller cover (a).



## 11 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.

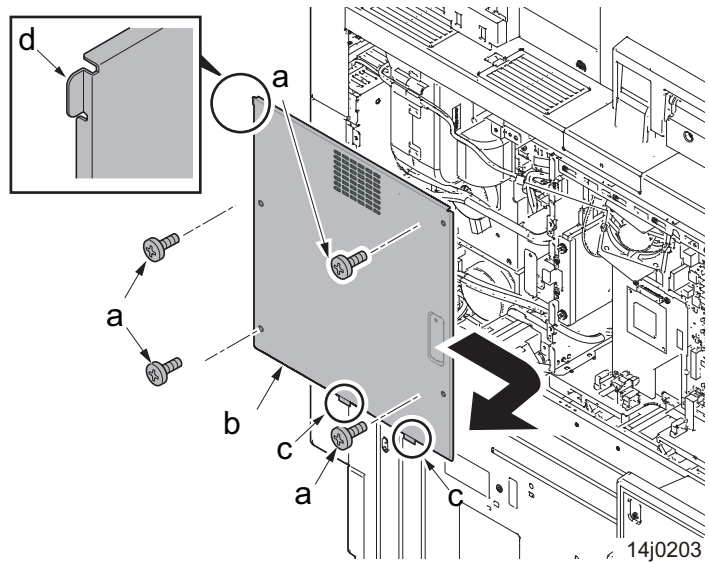


When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.



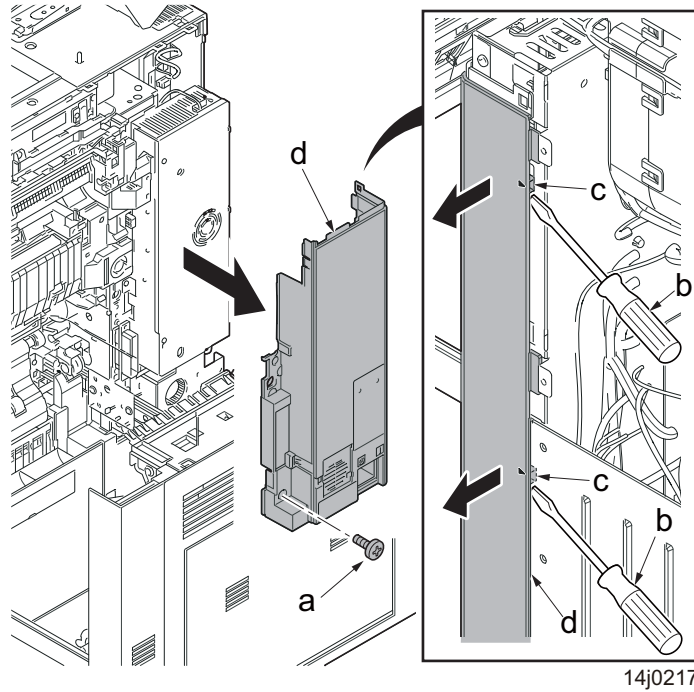
**12** Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.



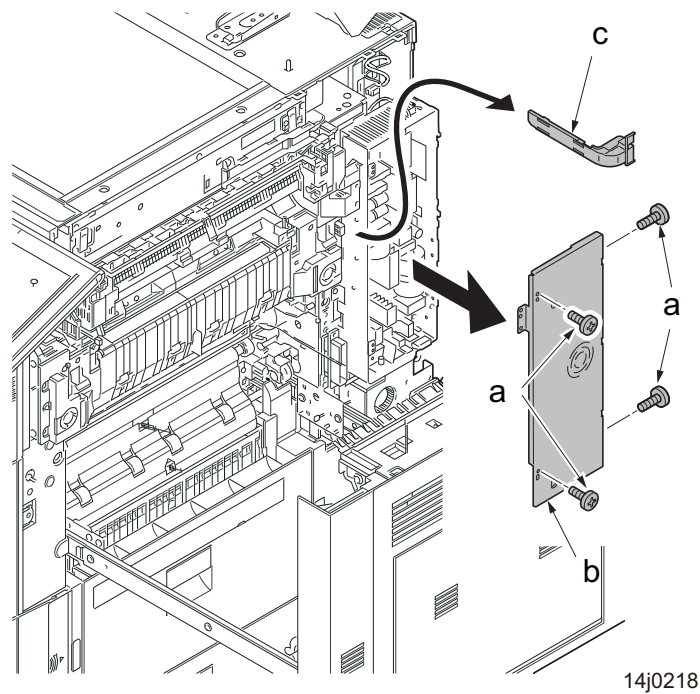
**13** Remove the screw (a)(M4x8).

**14** Release two hooks (c) using a flat blade screwdriver (b) and remove the right middle rear cover (d).



**15** Remove four screws (a)(M3x8) and then remove the IH PWB cover (b).

**16** Remove the IH wire cover (c).



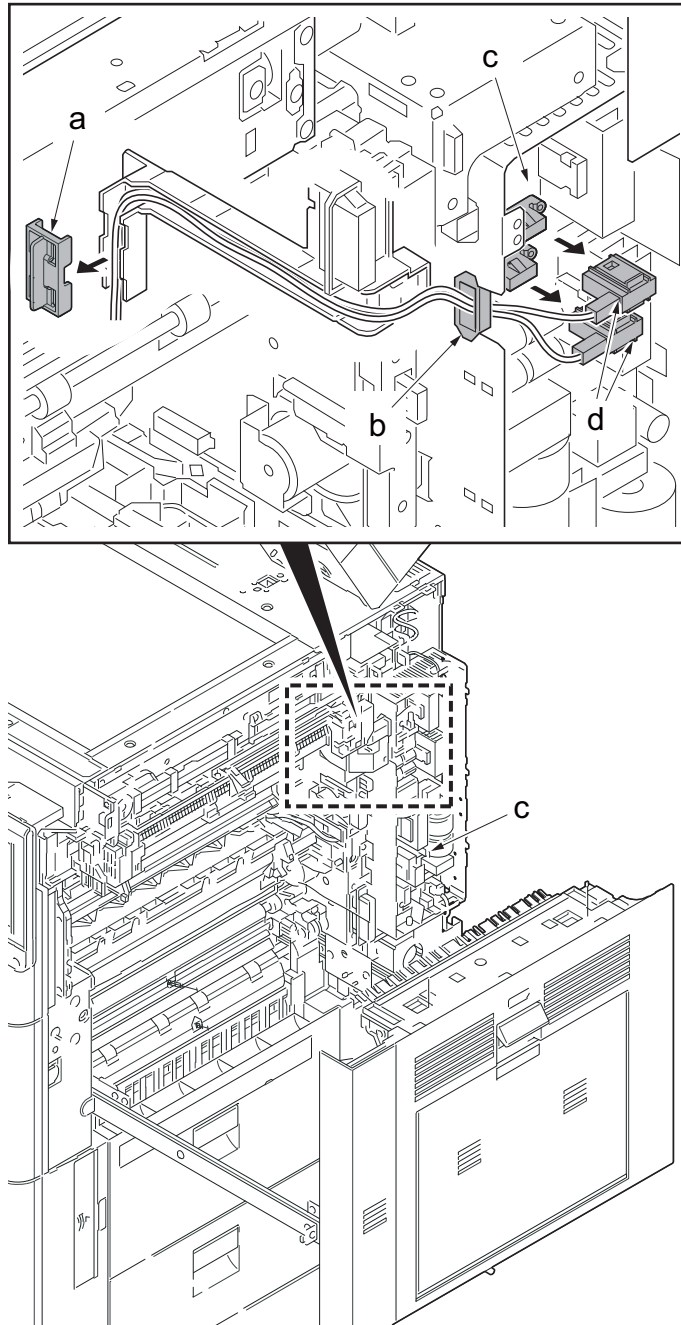
**17 Remove one wire holder (a).**

**18 Release one wire saddle (b).**

**19 Disconnect two connectors (d) from the IH PWB (c) according to the following notes.**

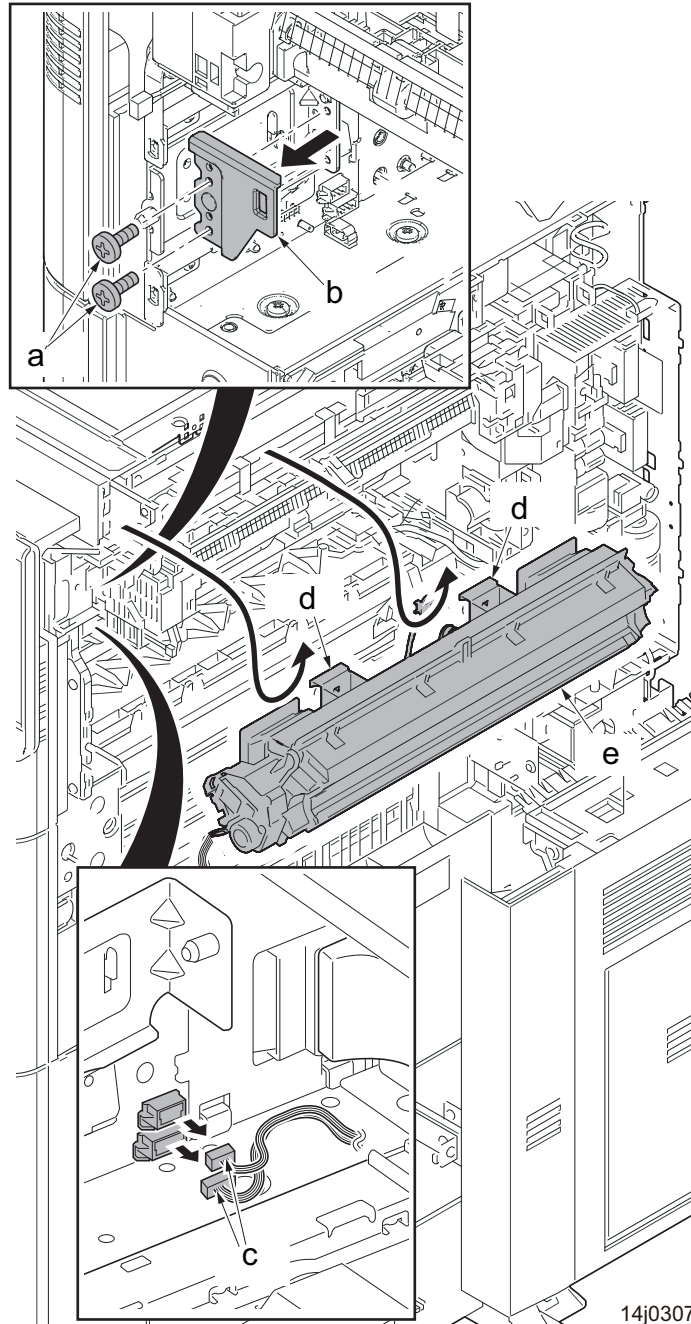
Confirm the power plug is removed from the outlet when you remove the connector, because a high current is supplied to the IH unit by this connector.

Confirm the connected connector was surely locked when you connect this connector again.



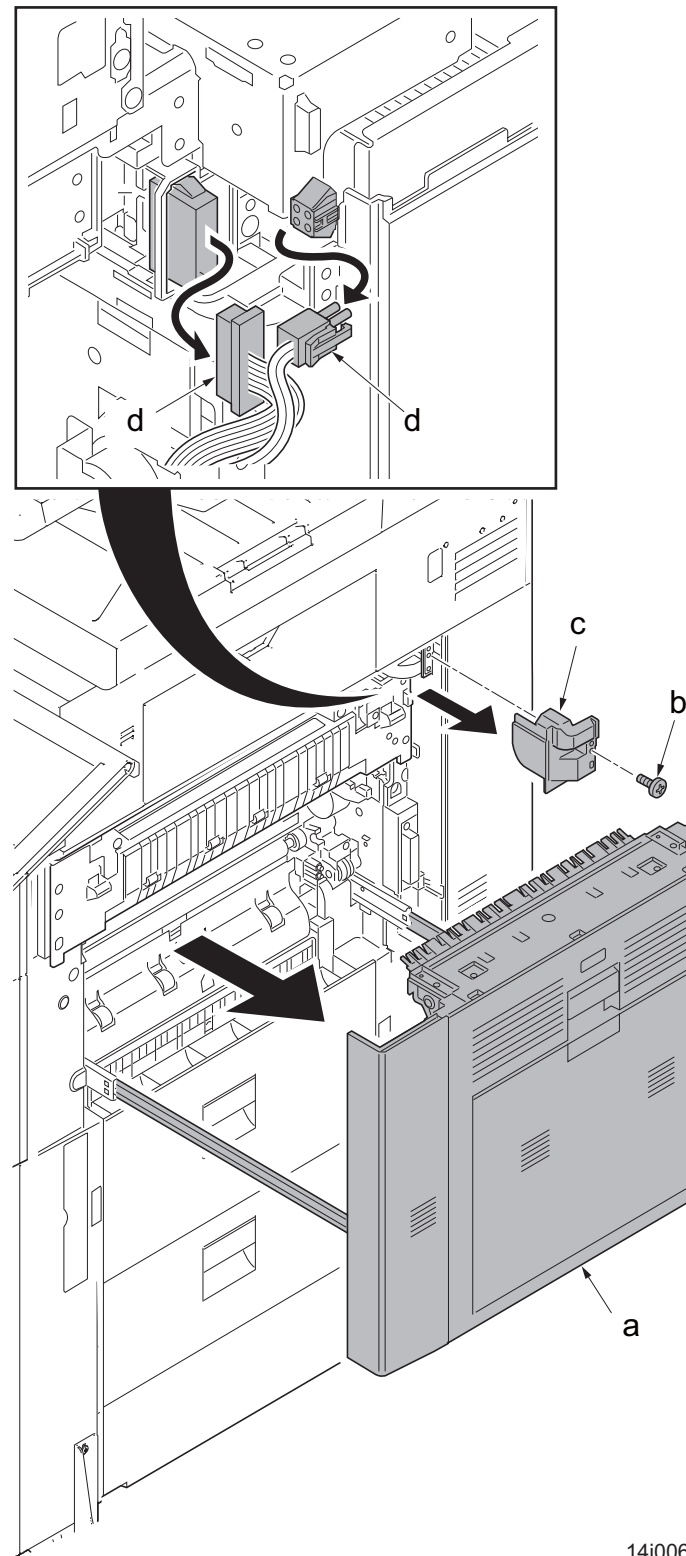
14j0306

- 20 Remove two screws (a)(M4x8) and then remove the Mount fuser adjust B (b).
- 21 Disconnect two connectors (c).
- 22 Release two hooks (d) and then remove the IH unit (e).
- 23 Check or replace the IH unit (e) and then reattach the parts in the original position.



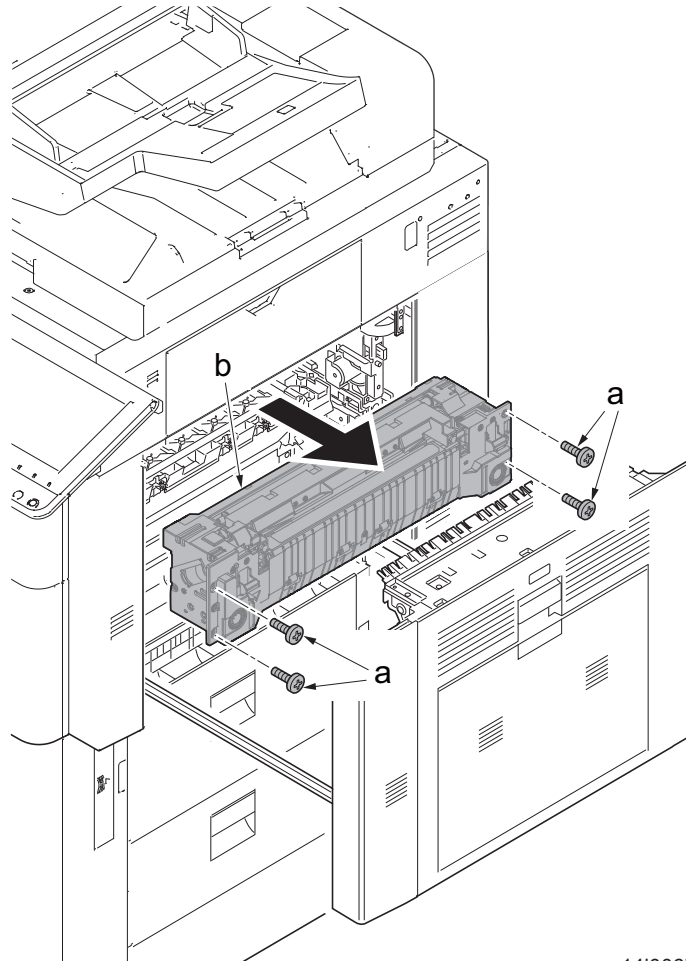
**(6) Feed-shift/switchback section****(6-1) Detaching and reattaching the job separator****Procedures**

- 1** Pull out the conveying unit (a).
- 2** Remove the screw (b)(M3x8) and remove the fuser wire cover (c).
- 3** Disconnect two connectors (d).

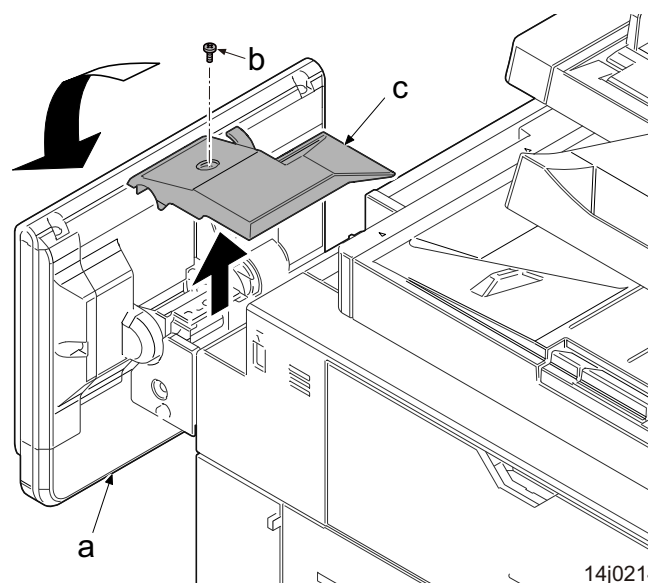


14j0066

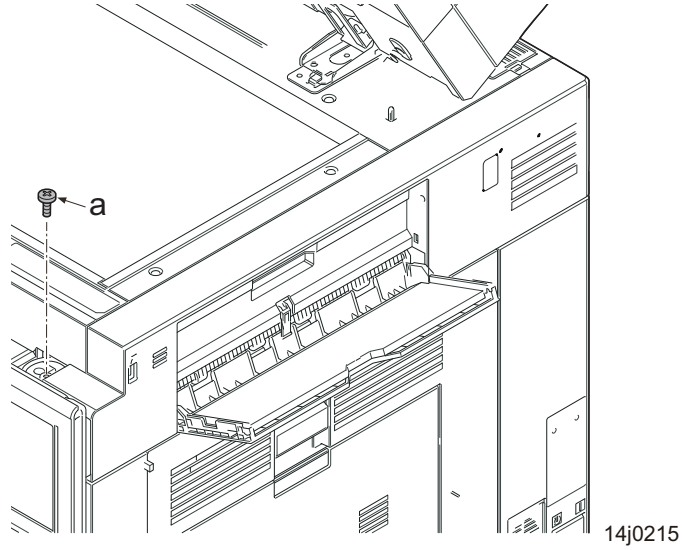
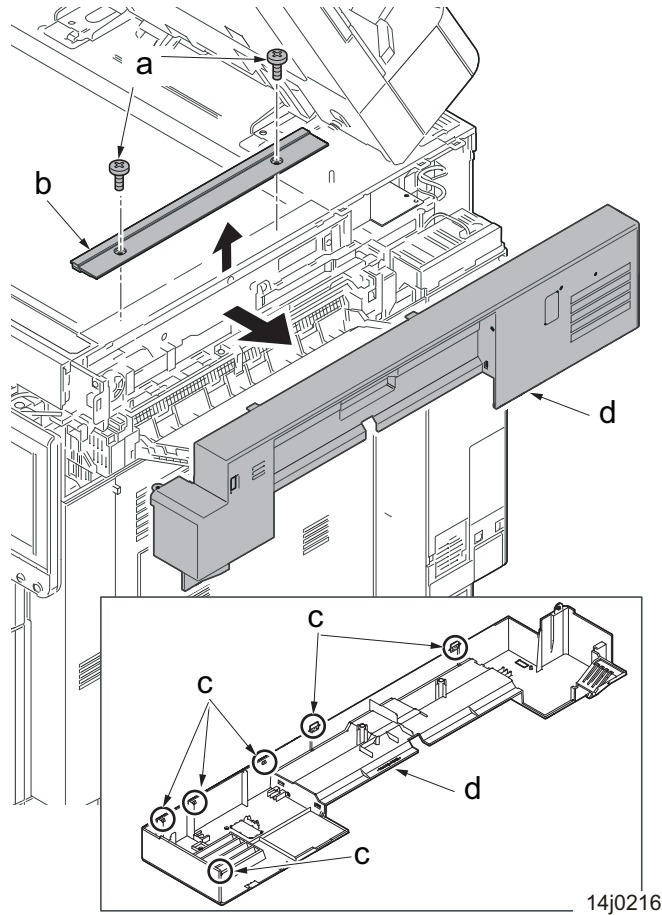


**4 Remove four screws (a)(M4x12) and remove the fuser unit (b).**

14j0067

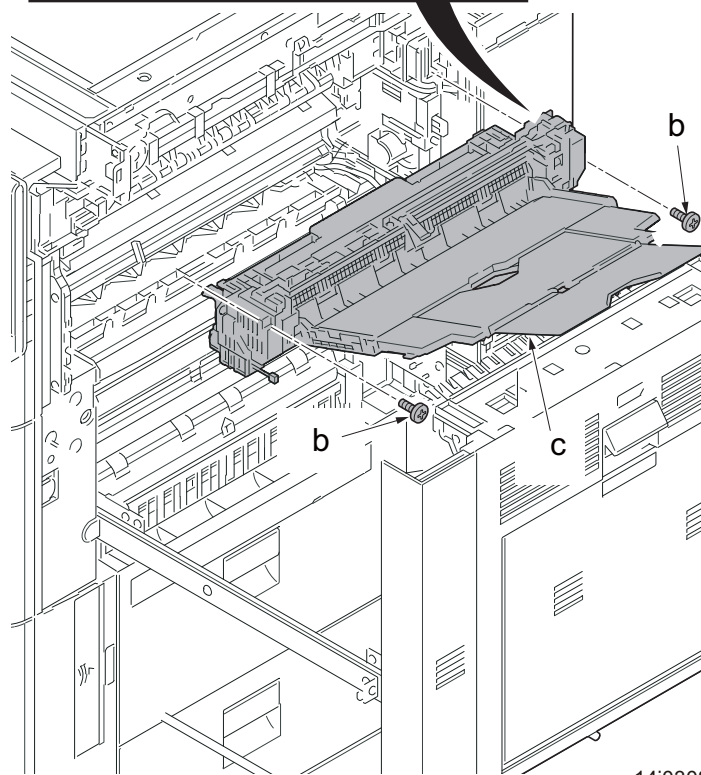
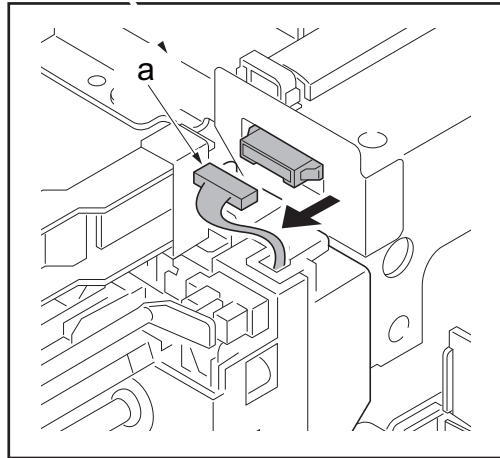
**5 Tilt up the operation unit (a).****6 Remove the screw (b)(M3x8) and remove the operation unit rear side cover (c) in the direction of the arrow.**

14j0214

**7 Remove the screw (a)(M4x8).****8 Remove two screws (a)(M4x8) and then remove the ISU right cover (b).****9 Release six hooks (c) and remove the right upper cover (d).**

**10** Disconnect the connector (a).

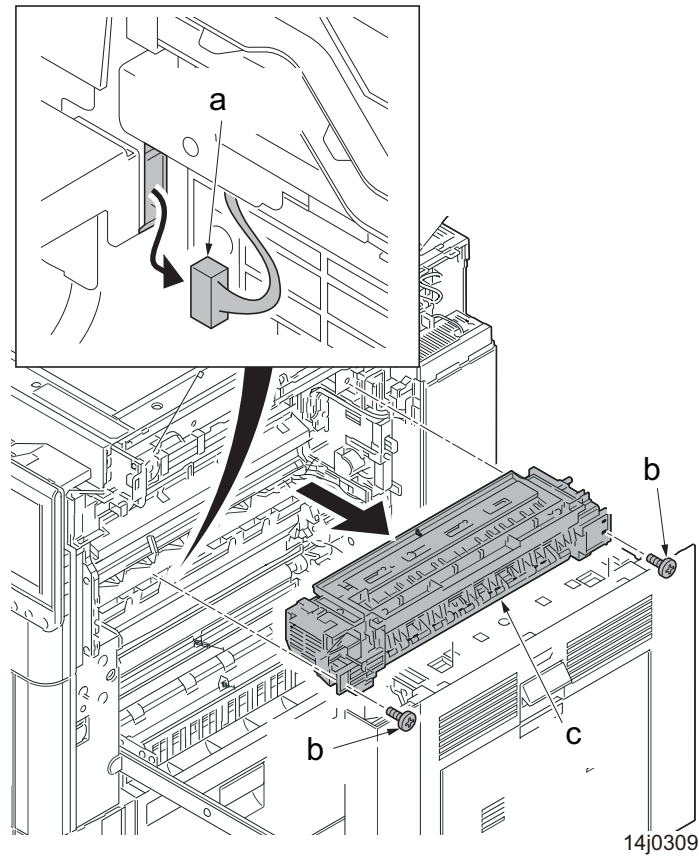
**11** Remove two screws (b)(M3x8) and remove the job separator (c).



14j0308

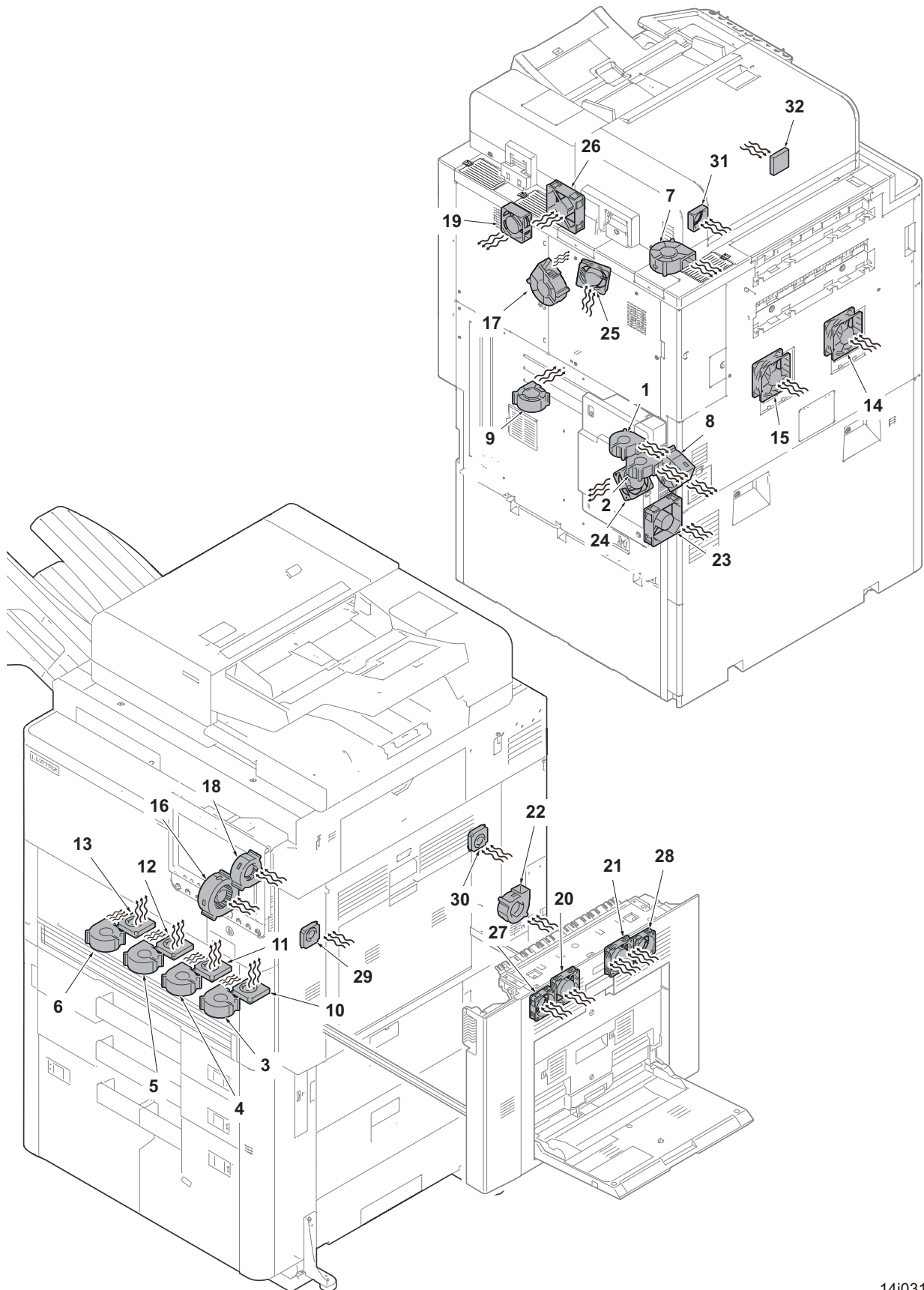
**(6-2) Detaching and reattaching the eject unit****Procedures**

- 1** Remove the job separator.
- 2** Disconnect the connector (a).
- 3** Remove two screws (b)(M4x8) and remove the eject unit (c).



### (6-3) Fan motor attachment direction

\*: When reattaching the fan motor, be aware of the attachment direction (intake/exhaust).

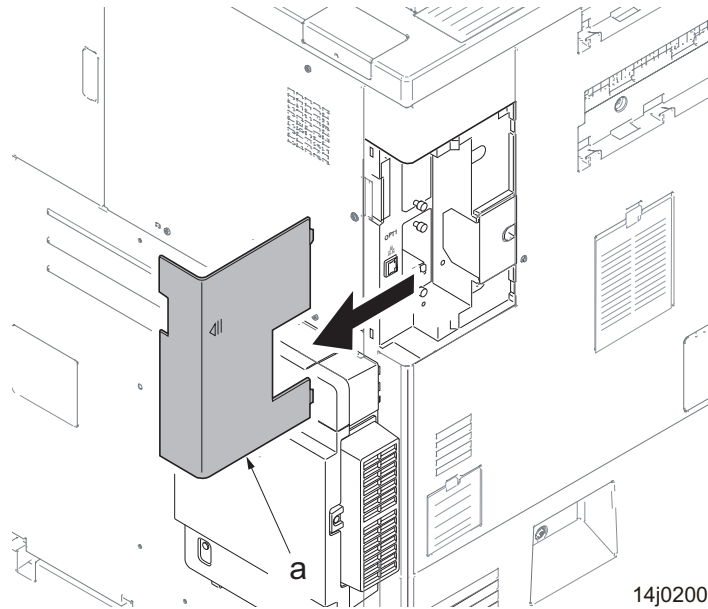


14j0310

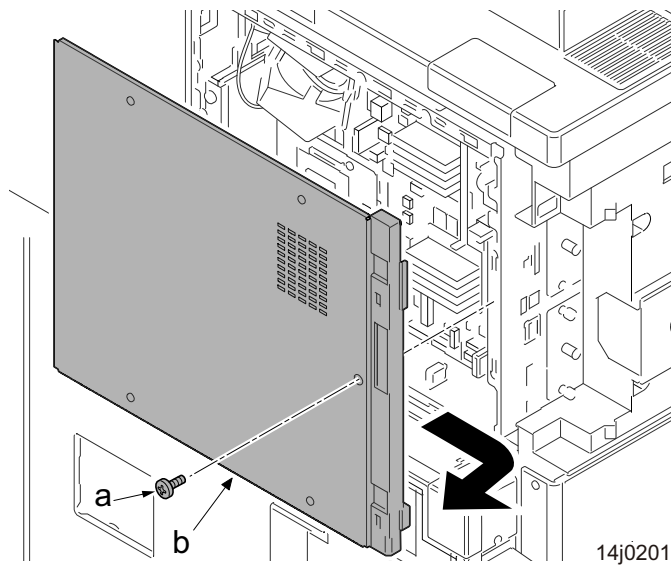
- 
- |                                    |  |  |
|------------------------------------|--|--|
| 1 Toner fan motor 1: exhaust       | 12 LSU fan motor C: intake               | 23 Power source fan motor 1: intake      |
| 2 Toner fan motor 2: exhaust       | 13 LSU fan motor Y: intake               | 24 Power source fan motor 2: intake      |
| 3 Developer fan motor K: intake    | 14 Front belt fan motor: intake          | 25 Controller fan motor: intake          |
| 4 Developer fan motor M: intake    | 15 Rear belt fan motor: intake           | 26 BR fan motor: intake                  |
| 5 Developer fan motor C: intake    | 16 IH core fan motor: intake             | 27 Right front eject fan motor 2: intake |
| 6 Developer fan motor Y: intake    | 17 Rear fuser fan motor: intake          | 28 Right rear eject fan motor 2: intake  |
| 7 Exhaust fan motor: exhaust       | 18 Front eject fan motor: intake         | 29 Front fuser edge fan motor: intake    |
| 8 Left exhaust fan motor: exhaust  | 19 Rear eject fan motor: intake          | 30 Rear fuser edge fan motor: intake     |
| 9 Right exhaust fan motor: exhaust | 20 Right front eject fan motor 1: intake | 31 DP drive fan motor: intake            |
| 10 LSU fan motor K: intake         | 21 Right rear eject fan motor 1: intake  | 32 DPCIS fan motor: intake               |
| 11 LSU fan motor M: intake         | 22 IH fan motor: intake                  |  |

**(7)PWBs****(7-1)Detaching and reattaching the engine PWB****Procedures**

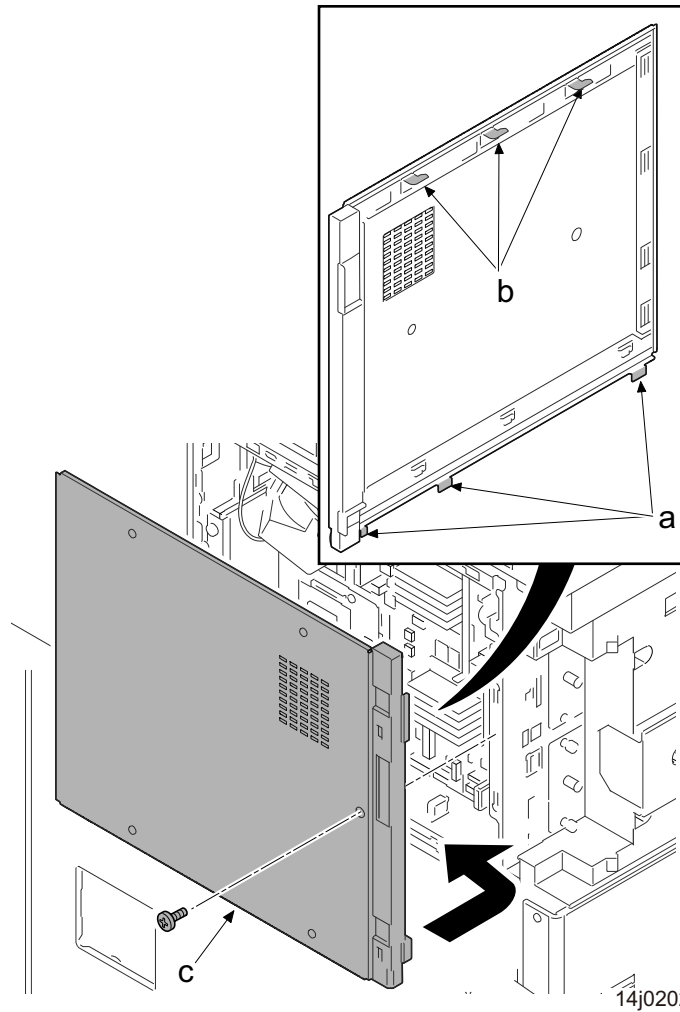
- 1 Remove the controller cover (a).**



- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.**

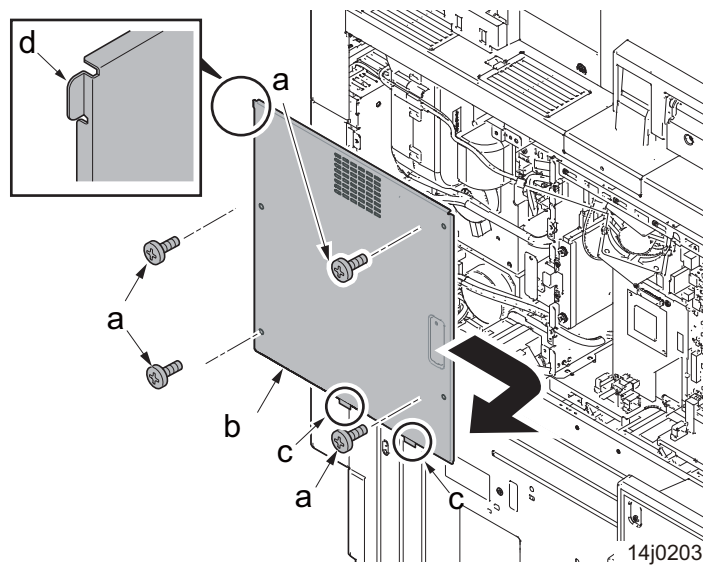


When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.

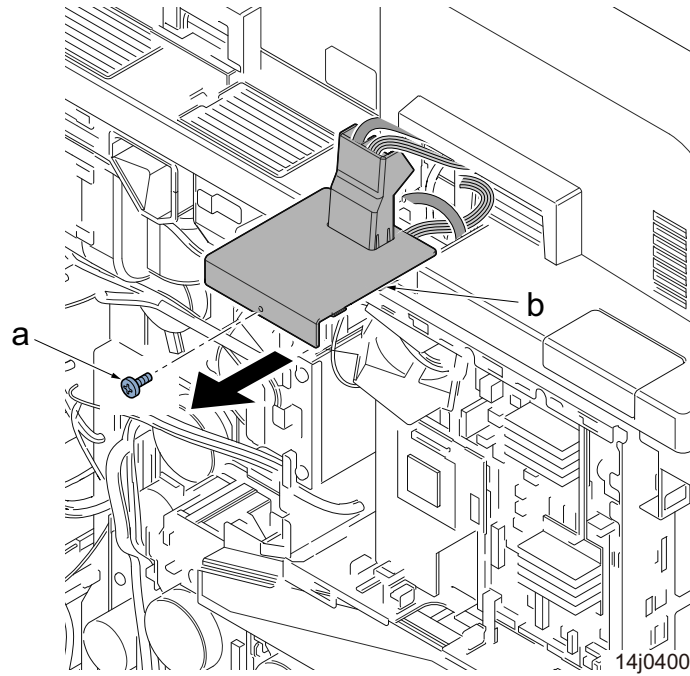
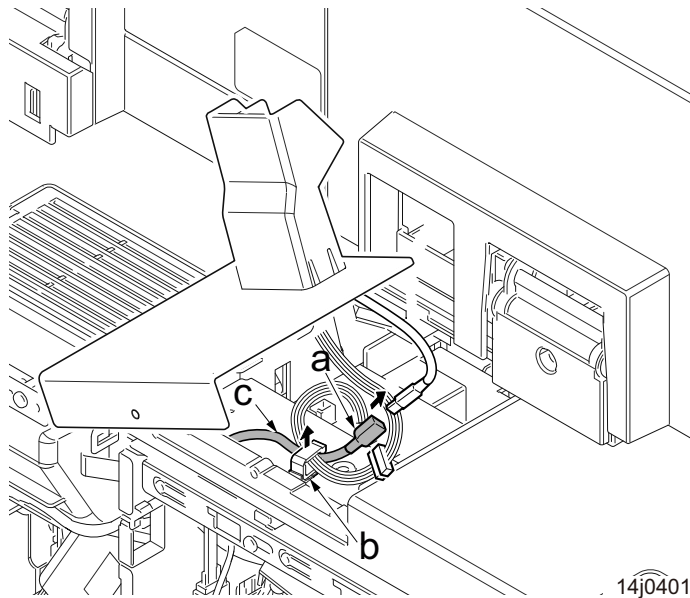


**3 Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.**

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.



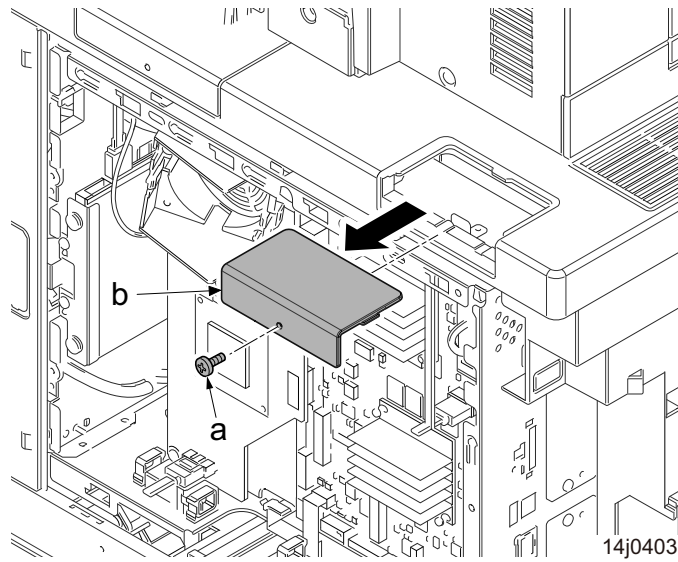


**4 Remove the screw (a)(M3x8) and remove the DPIF lid (b).****5 Disconnect the connector (a) and release the wire saddle (b) to remove the wire (c).**

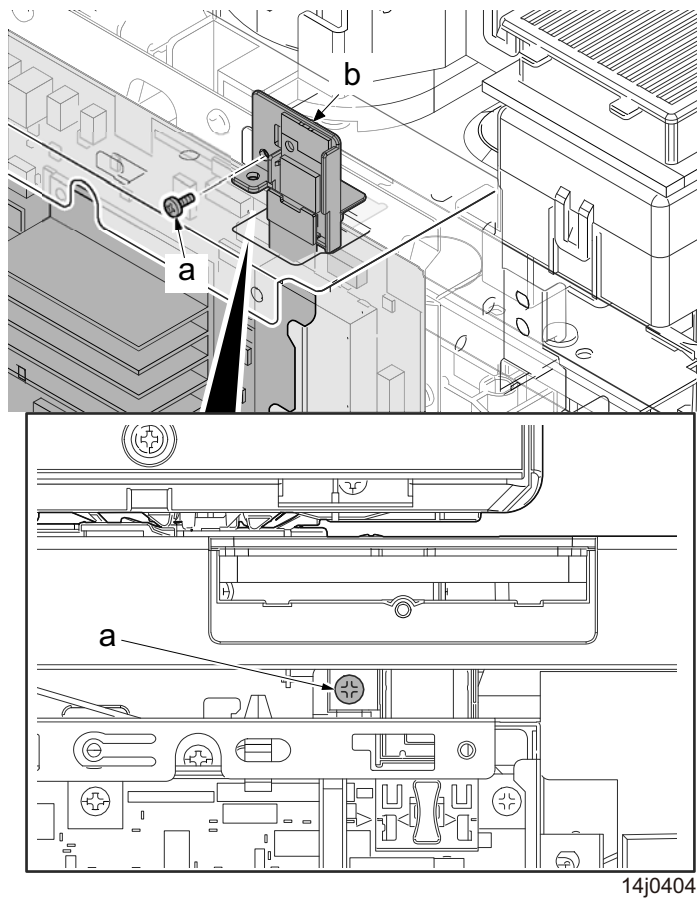
When IB-35 is installed, remove it by the following procedure (steps 6 to 10).

Other than that, go to step 11.

- 6 Remove the screw (a)(M3x8).
- 7 Detach the IF lid (b) in the direction of the arrow.



- 8 Remove the screw (a)(M3x6) that secures the PWB unit (b).



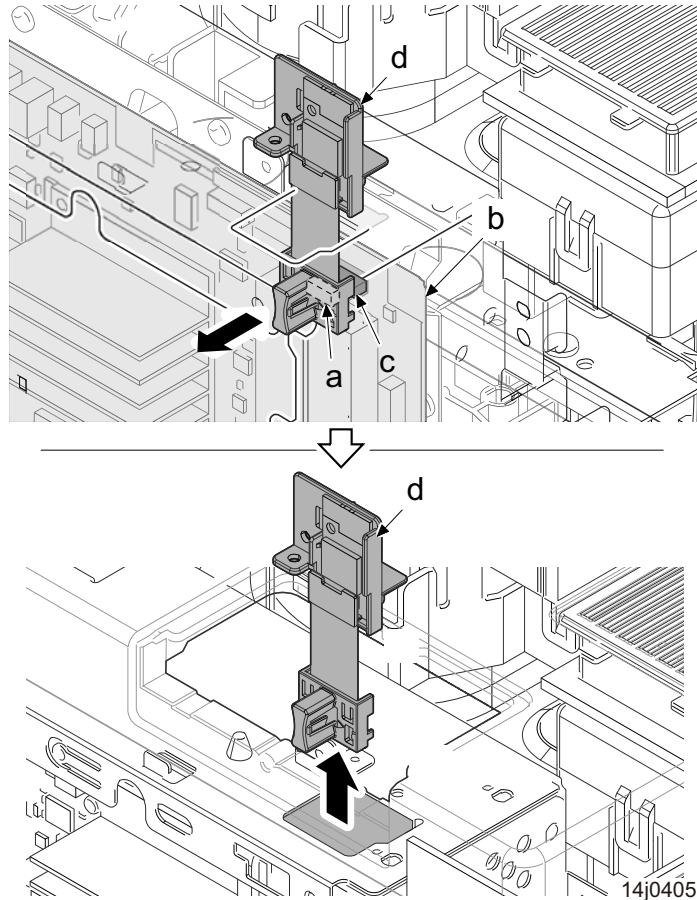
9 Disconnect the connector (a) from the main PWB connector (c).

10 Remove the PWB unit (d).

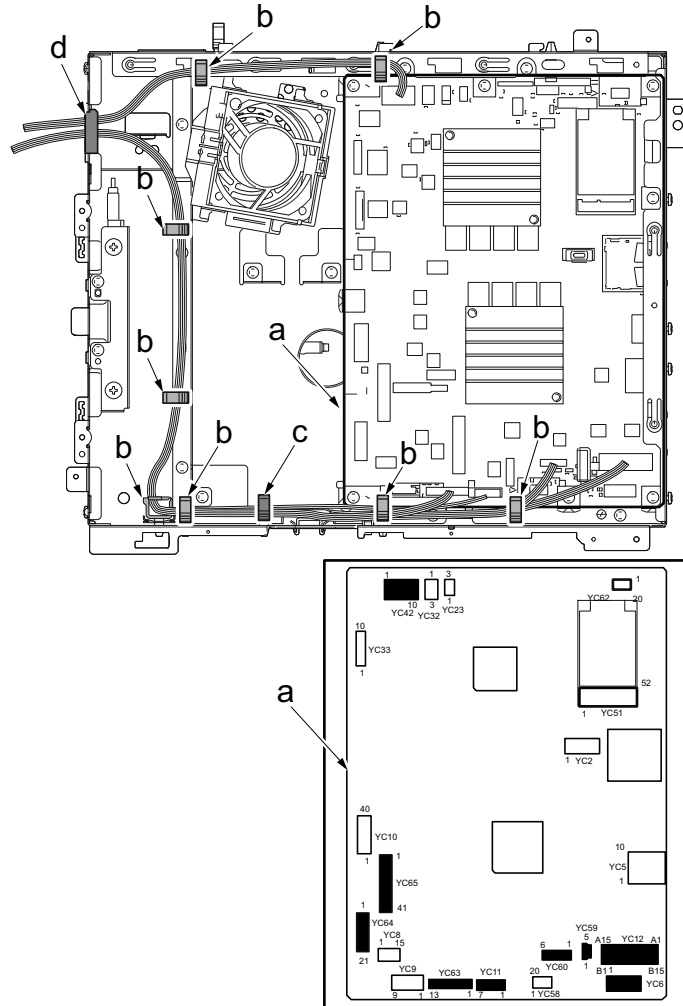
✔ **IMPORTANT**

When disconnect the connector (a) from the connector of main PWB (b), straightly pull out against the main PWB (b) and do not pull out on the skew.

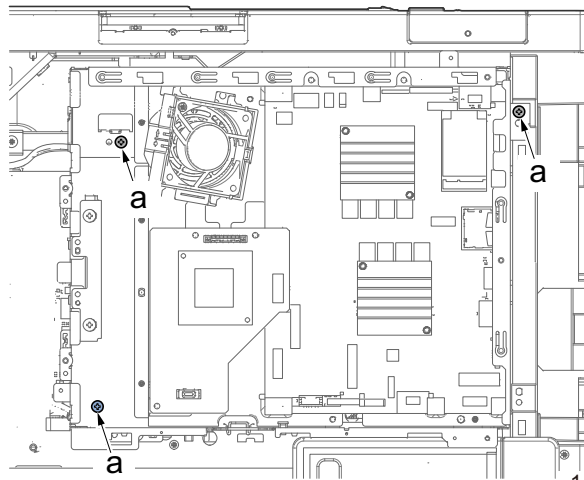
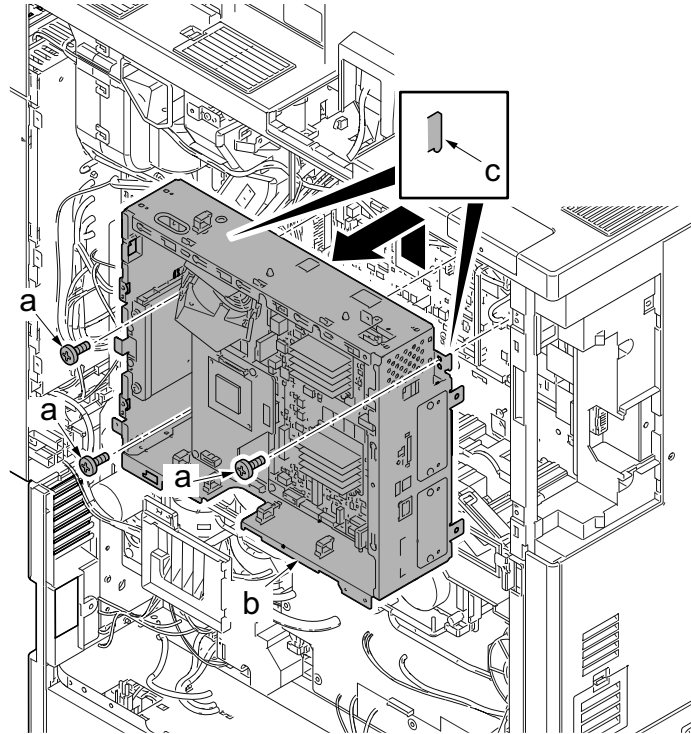
When pulling out on the skew, it causes the damage of FPC (f).



- 11 Disconnect nine connectors from the main PWB (a).
- 12 Release seven wire saddles (b) and remove the wire.
- 13 Release the cable tie with a snap (c).
- 14 Remove the edge saddle (d) and remove the wire.

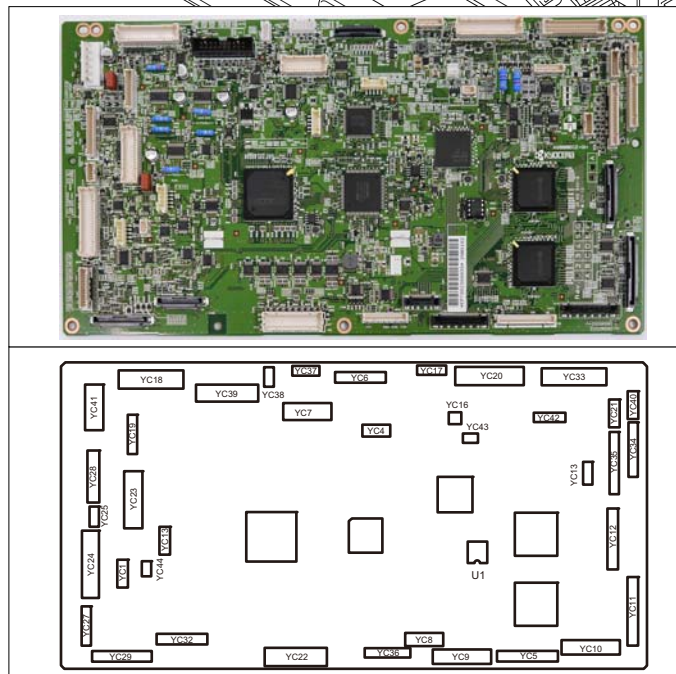
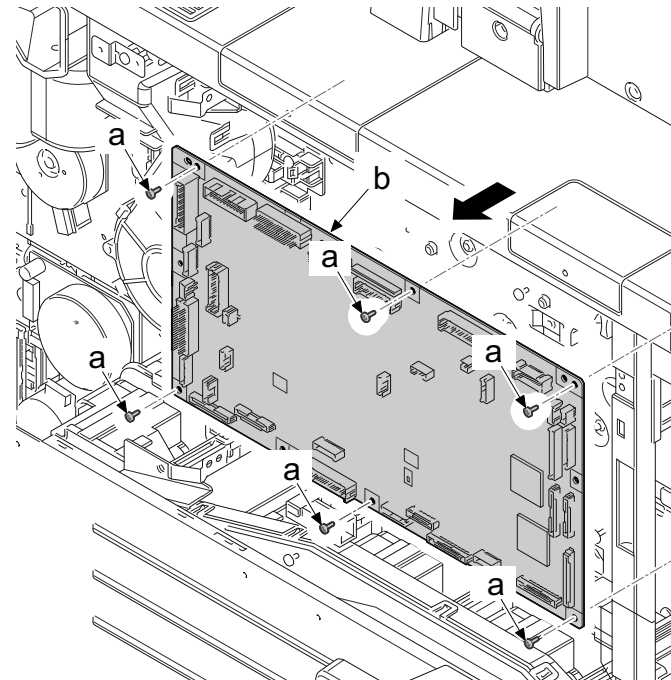


14j0406



14j0407

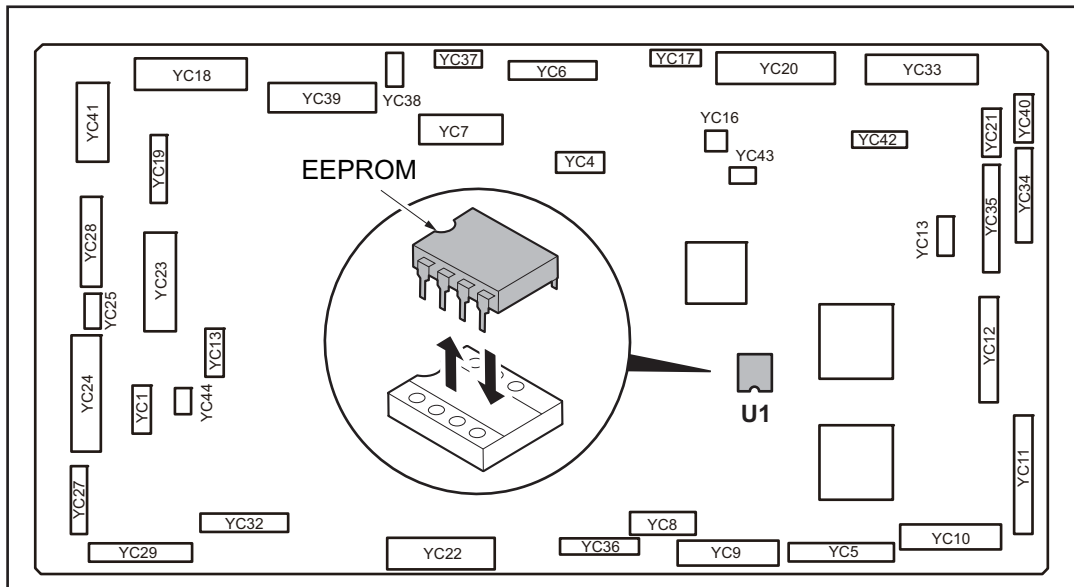
- 15 Disconnect all the connectors from the engine PWB (b).
- 16 Remove six screws (a)(M3x8) and then remove the engine PWB (b).
- 17 Check or replace the engine PWB (b), and then reattach the parts in the original position.



14j0408

 **NOTE**
**When replacing the engine PWB**

When replacing the engine PWB, make sure to remove the EEPROM (U1) from the old board and install it in the new board.



14j0409

**Execute the following setting after replacing the engine PWB.**

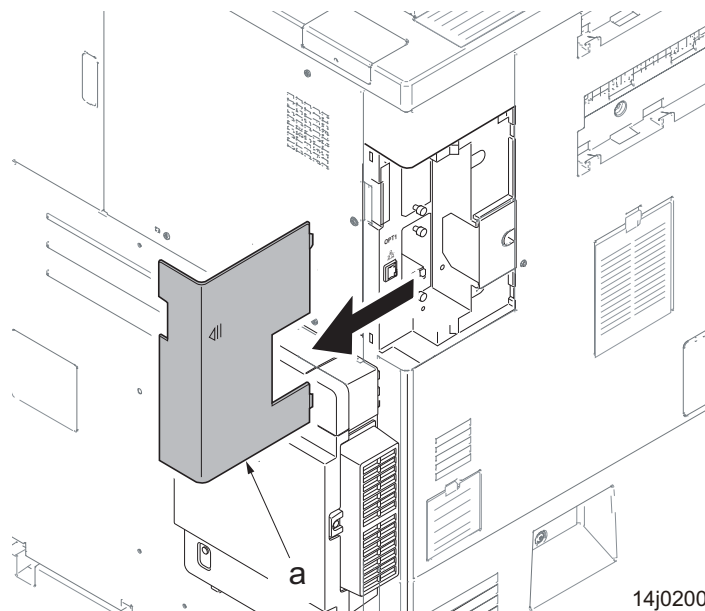
Auto scanner adjusting (maintenance mode U411): Table (ChartA)

Adjust using the digital color chart (part number: 7505000005).

## (7-2) Detaching and reattaching the main PWB

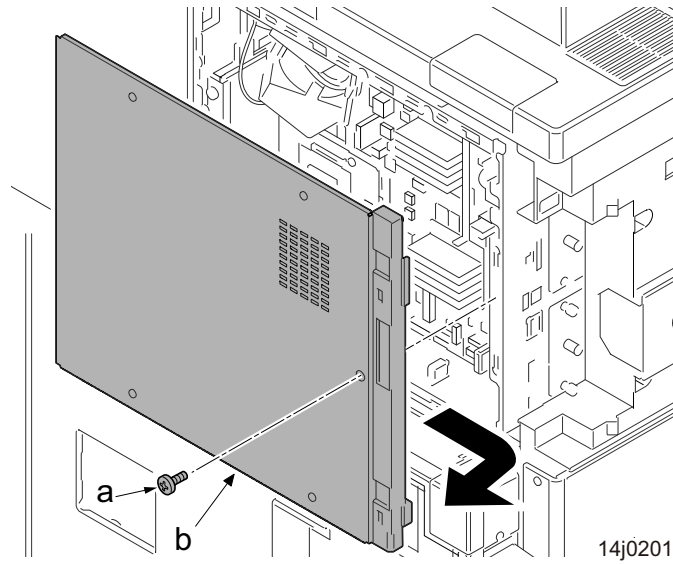
### Procedures

- 1 Remove the controller cover (a).

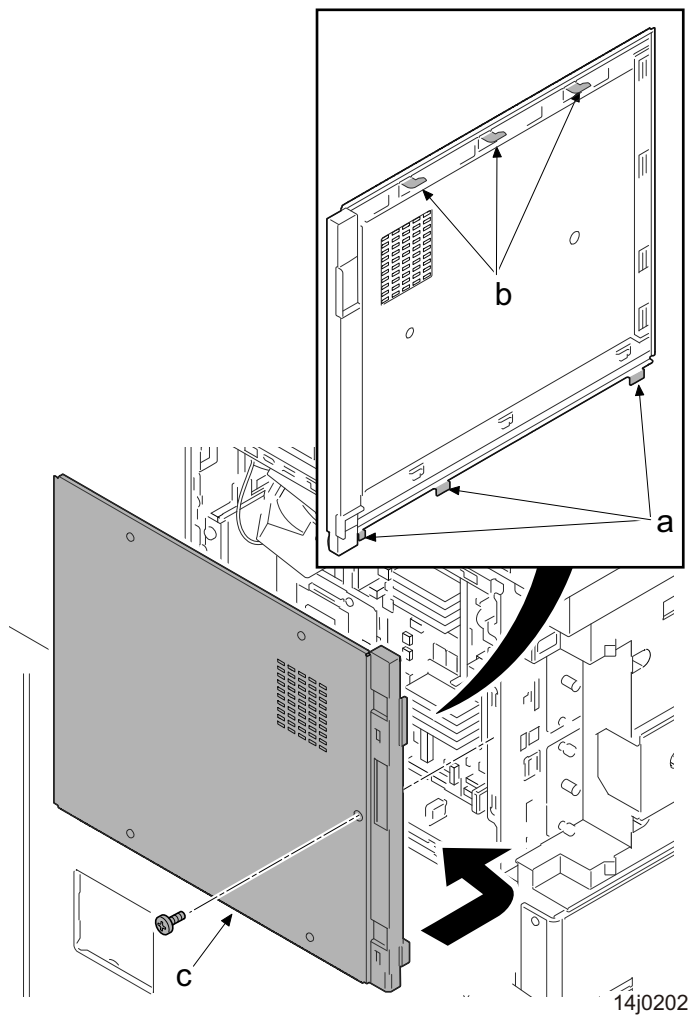


14j0200

- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.



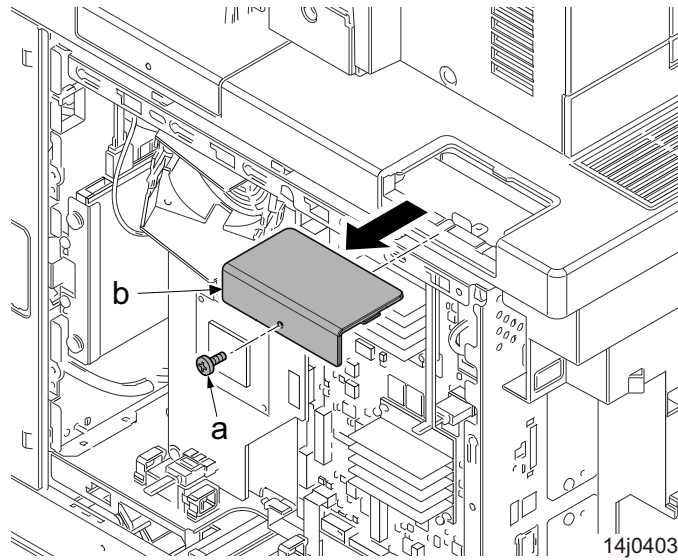
When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.



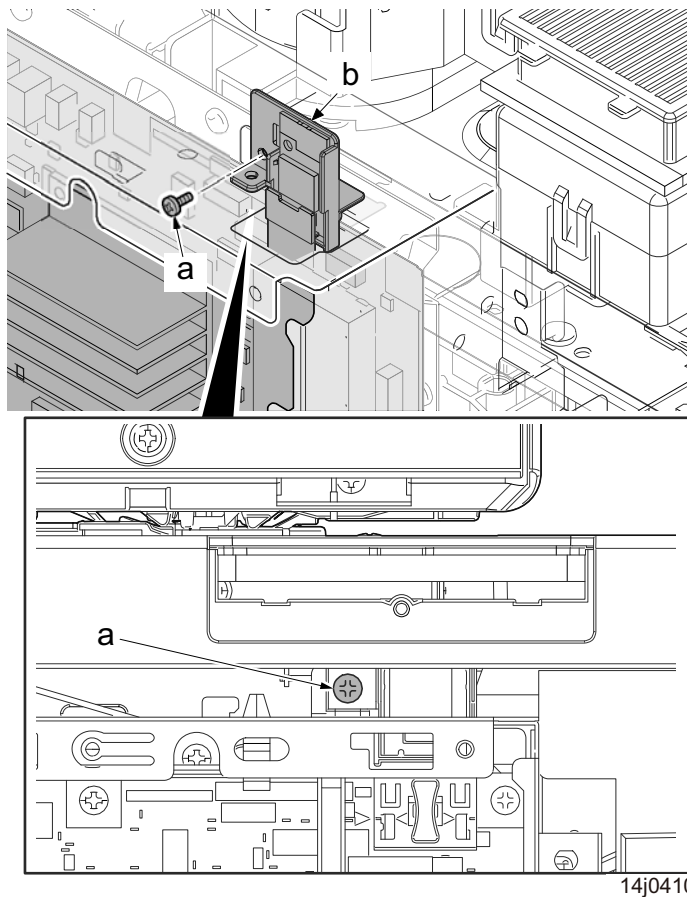


(Steps 3 to 7: IB-35 equipped machine only)

- 3 Remove the screw (a)(M3x8).
- 4 Detach the IF lid (b) in the direction of the arrow.



- 5 Remove the screw (a)(M3x6) that secures the PWB unit (b).

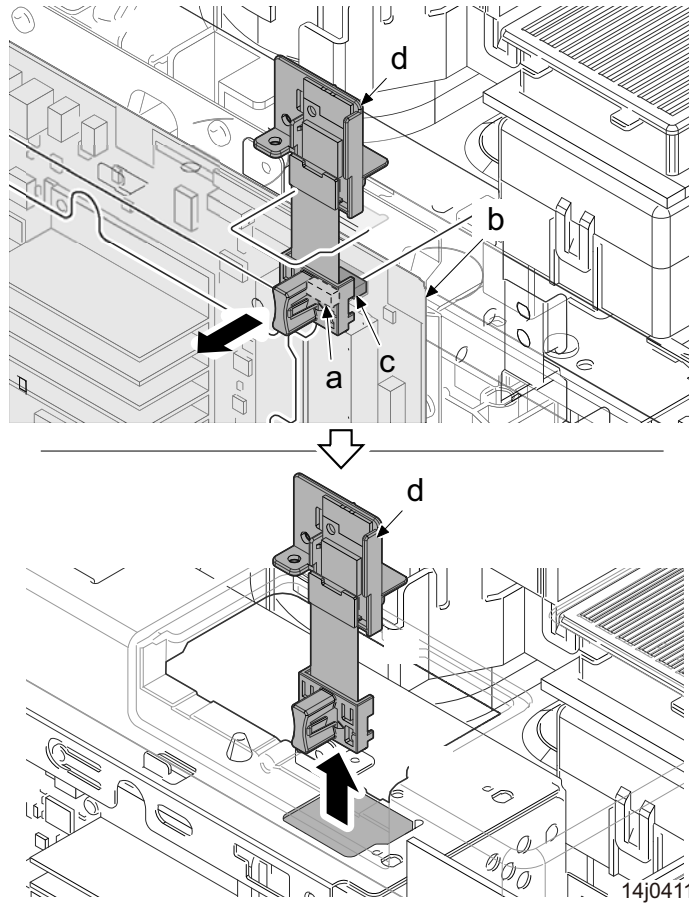


- 6 Disconnect the connector (a) from the main PWB connector (c).
- 7 Remove the PWB unit (d).

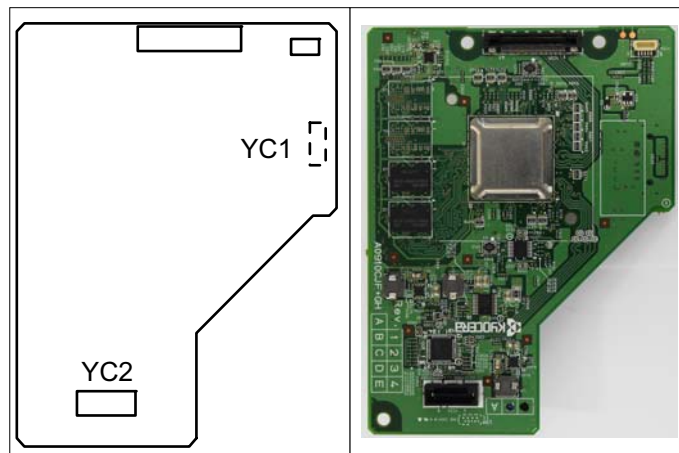
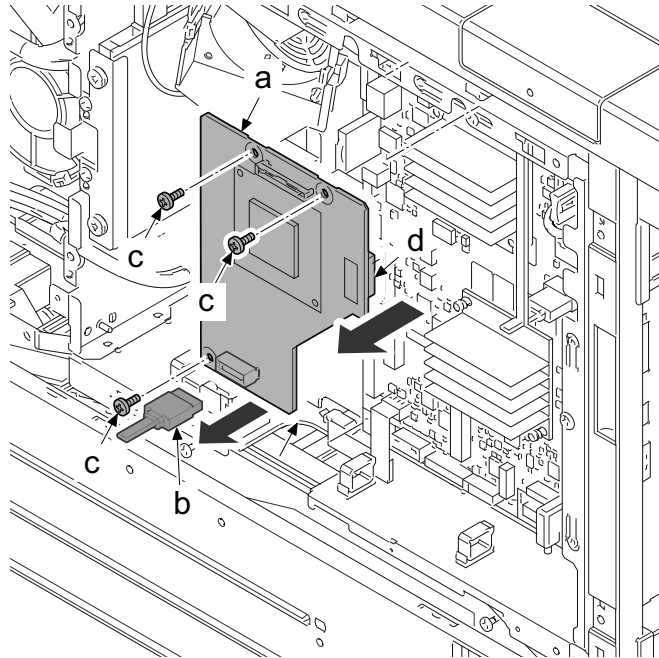
✔ **IMPORTANT**

When disconnect the connector (a) from the connector of main PWB (b), straightly pull out against the main PWB (b) and do not pull out on the skew.

When pulling out on the skew, it causes the damage of FPC (f).

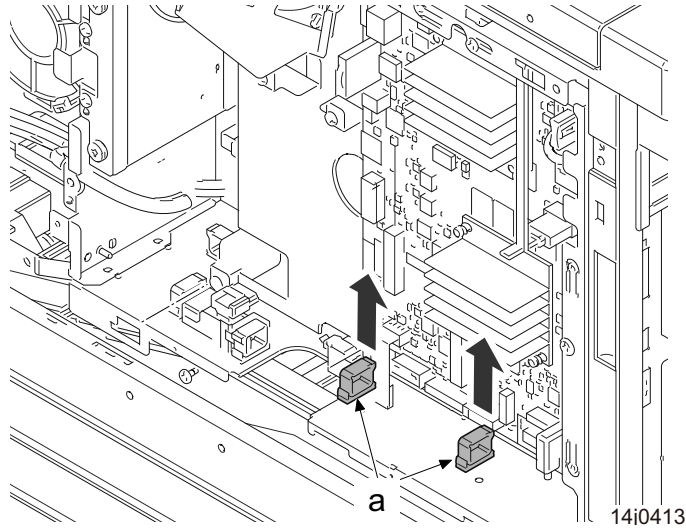


- 8 Disconnect the connector from the DP relay PWB (a).
- 9 Remove three screws (a)(M3x8).
- 10 Detach the DP relay PWB (a) while removing the backside connector (d).



14j0412

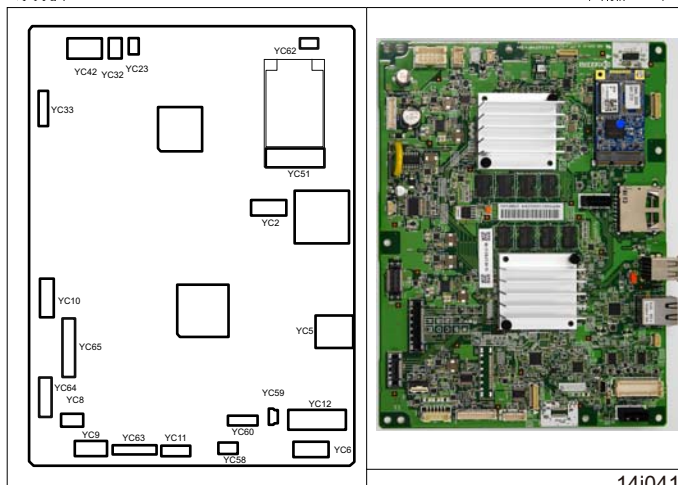
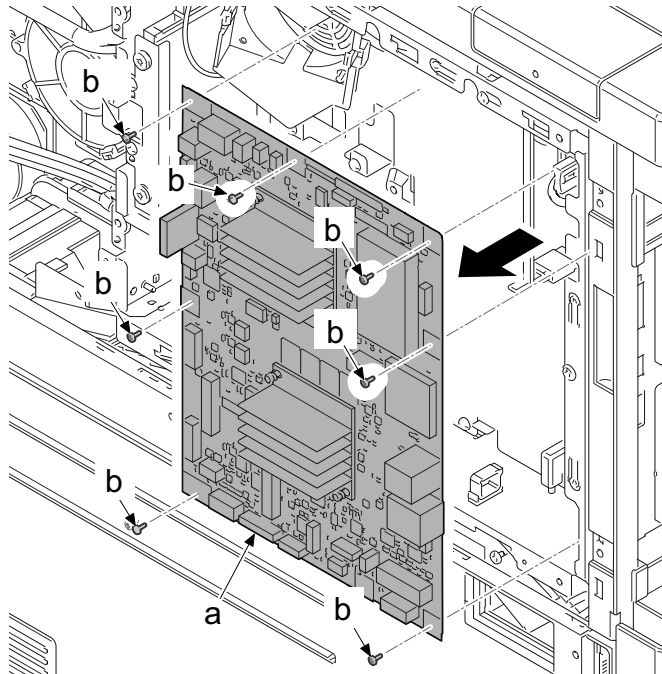
**11 Release two wire saddles (a).**



14i0413

**12 Disconnect all the connectors from the main PWB (a).**

**13 Remove seven screws (b)(M3x8) and remove the main PWB (a).**



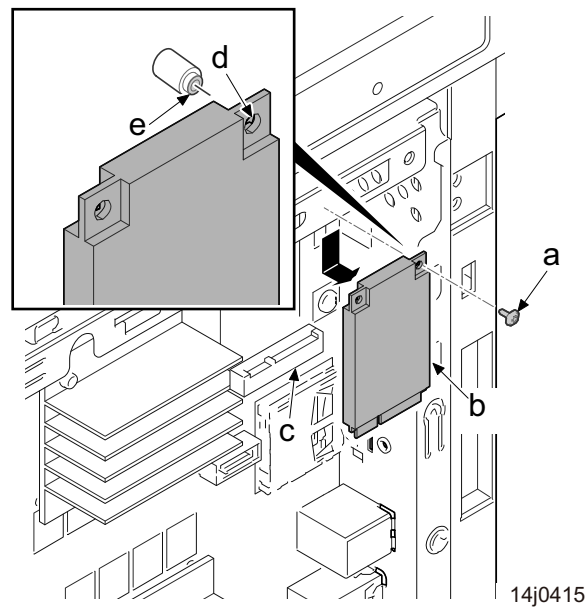
14j0414

- 14 When replacing the main PWB, remove the SSD by the following procedure.
- 15 Remove one screw (a)(M2).
- 16 Remove the SSD (b) from the connector (c).  
Use a Phillips 1 screwdriver and take care not to damage the screws.
- 17 Check or replace the main PWB (a) and then reattach the parts in the original position.

✔ **IMPORTANT**

To avoid damage when attaching the SSD (b), align the screw hole (d) to the positioning boss (e).

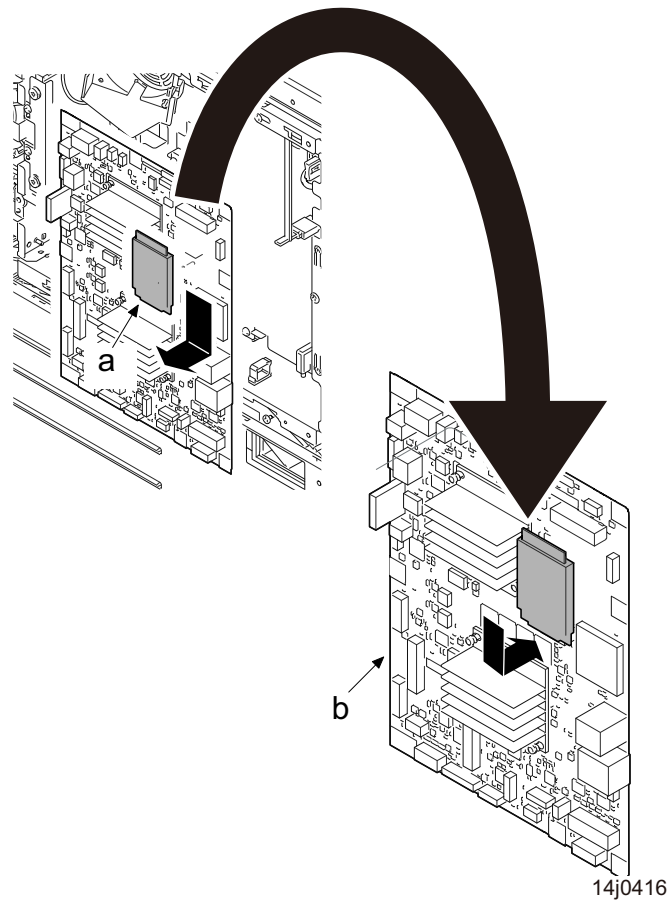
Do not replace the main PWB, engine PWB and SSD at the same time.



💡 **NOTE**

**Notes when replacing the main PWB**

When replacing the main PWB, make sure to remove the SSD (a) from the old board and install it in the new board (b)



**✓ IMPORTANT**

A machine without the SSD does not start up.

Do not replace the main PWB, engine PWB and SSD at the same time.

**Execute the following setting after replacing the main PWB.**

**1 Return the SSD back up data.**

Before executing U004, make sure to execute.

Execute maintenance mode U026/ Flash/ Restore.

**2 Setting the machine number**

When the power is turned on, C0180 error occurs if there is no machine number data. Execute U004 to match the serial numbers stored in the PWBs.

Execute it after confirming the engine PWB machine serial number matches the main unit serial number. Wrong data will be written when there is a discrepancy in U004.

**Executing maintenance mode U004**

- 1 Input "004" using the numeric keys and press the [Start] key.
- 2 Select [Execute] and press the [Start] key.
- 3 Turn the power switch off then on. Wait more than 5 seconds between the power off and on.

**3 Execute maintenance mode U917 to import the settings once exported.**

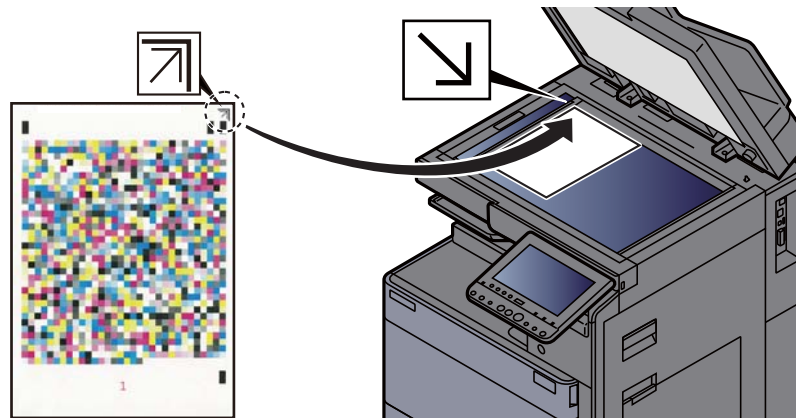
Before operating, perform data backup in U917.

## 4 ID correction operation setting (maintenance mode U464): Calib

- 1 Input "464" using the numeric keys and press the [Start] key.
- 2 Select [Calib].
- 3 Select [Execute] and press the [Start] key.  
Calibration starts.
- 4 Press the [Stop] key.

## 5 Adjusting the halftone automatically (maintenance mode U410)

- 1 Input "410" using the numeric keys.
- 2 Press the [Start] key.  
Display the execution information screen.  
Test pattern 1, Test pattern 2 and Test pattern 3 are output on the A4/ letter paper.
- 3 Set the test pattern output on the original glass with the arrow facing the rear side and print side face-down.  
Load about 20 sheets of the blank paper on Test Pattern 1.



- 4 Press [Start] key.  
The first auto adjustment is executed.
- 5 Set the output Test Pattern 2 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 2.
- 6 Press [Stop] key.  
The second auto adjustment is executed.
- 7 Set the output Test Pattern 3 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 3.
- 8 Press the [Start] key.  
The third auto adjustment is executed.
- 9 [Finish] appears after normal completion.  
An error code appears when an error occurs.

## 6 Resetting the setting values

Check and enter the setting values from Maintenance Report printed beforehand.

U251: cassette counter

U265: OEM purchaser code

U065: Main Scan adjustment

U402: Print margin adjustment

Setting data modified at setup

## 7 Re-registering the certificate (network).

In case of custom setting on the operation panel: U224: re-register Home screen

If "Interface Block setting" or "Security Level" were changed in system menu, reset them.

If Security Kit is installed, enter the encrypted code that was initially set.

Reconfigure the network since the MAC address (Printer name) is changed, according to the environment setting.

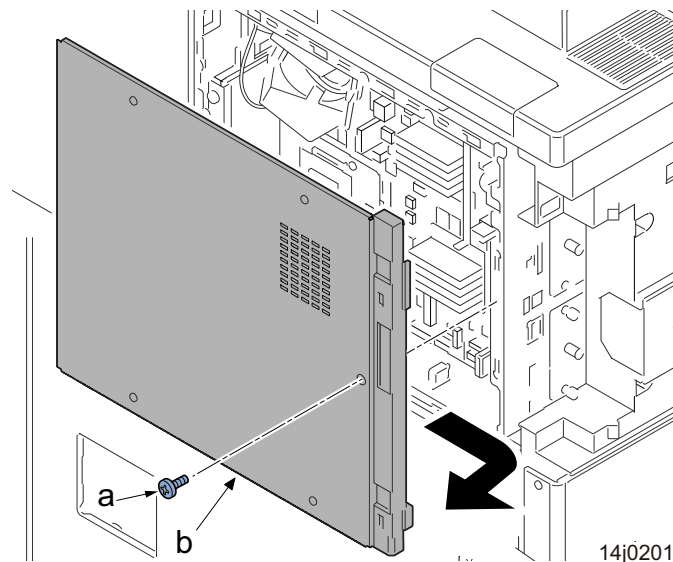
## 8 Exiting from the maintenance mode

Input "001" using the numeric keys and press the [Start] key.

### (7-3) Detaching and reattaching the power source PWB

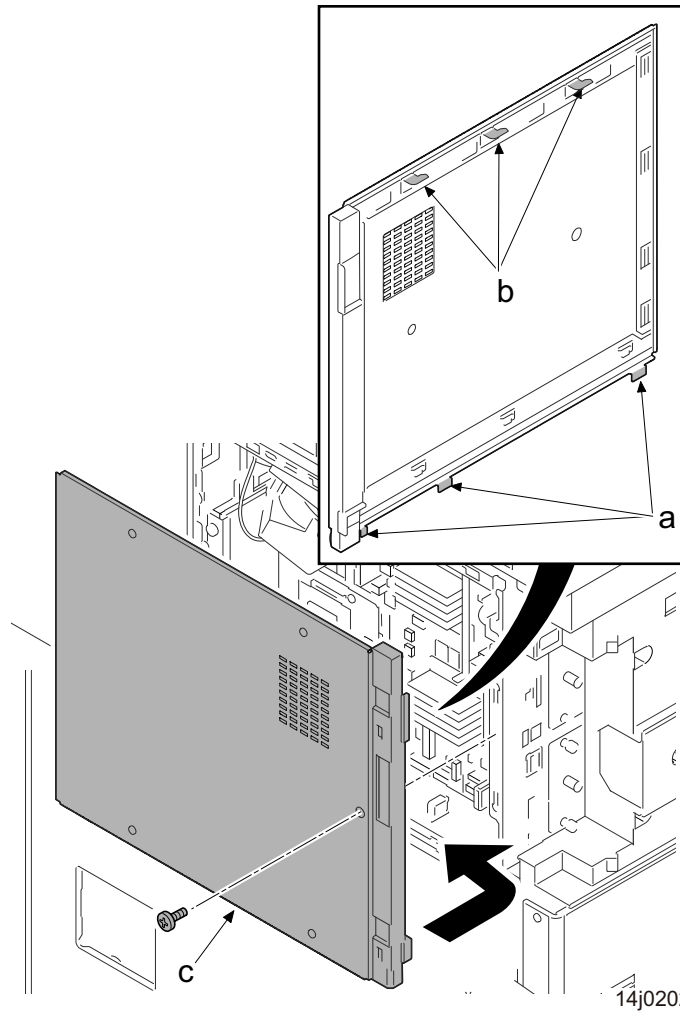
#### Procedures

- 1 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.



When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.

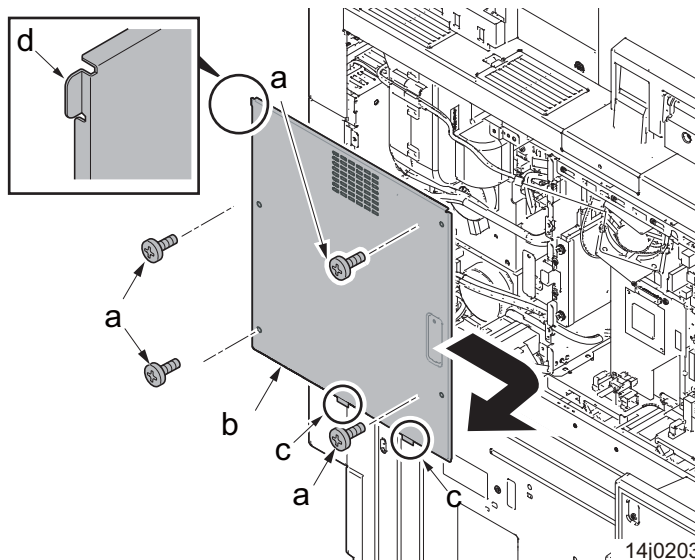




14j0202

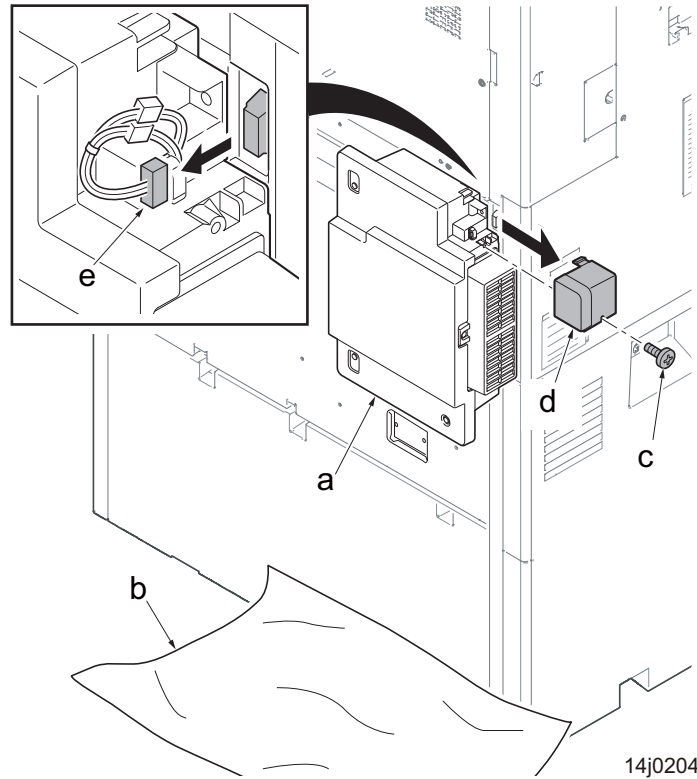
**2 Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.**

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.



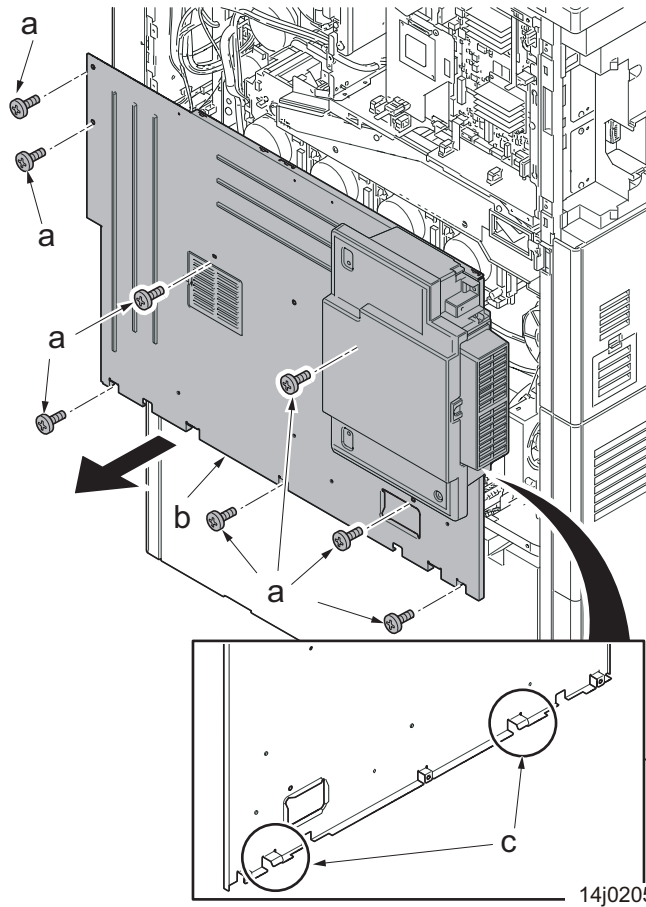
14j0203

- 3 Cover the area under the waste toner box (a) to prevent contamination due to the scattered toner with the sheet (b).
- 4 Remove the screw (c)(M3x8) and remove the cable cover (d).
- 5 Disconnect the connector (e).



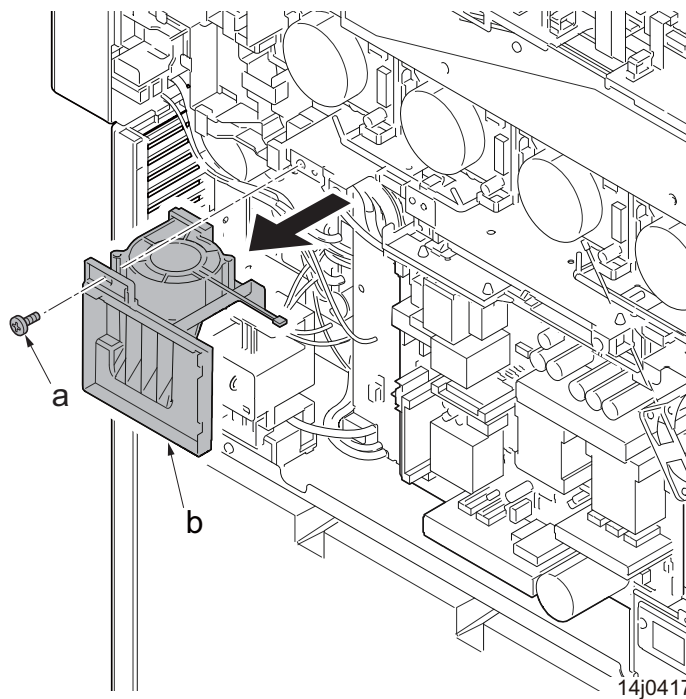
**6** Remove eight screws (a)(M3x8).

**7** Release two lower hooks (b) and remove the rear lower cover (c).

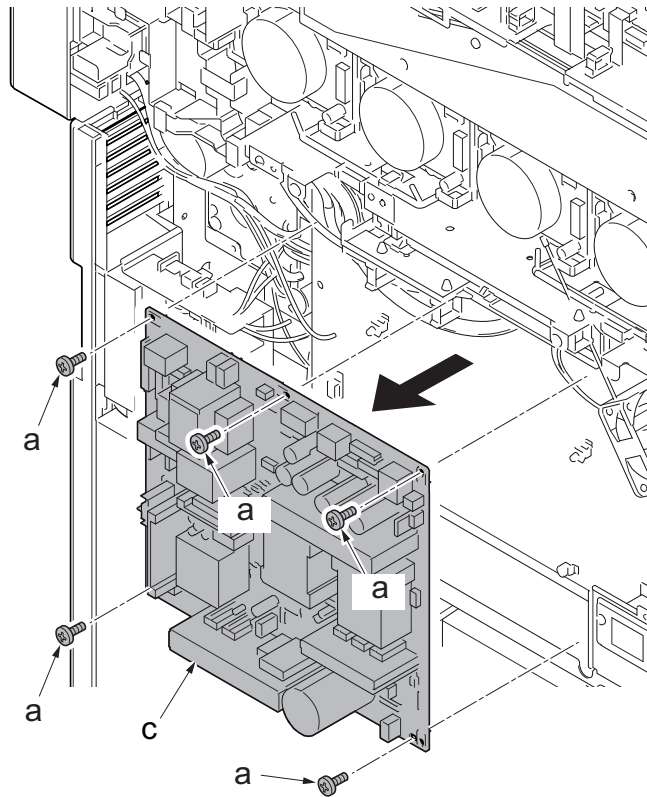


**8** Remove the screw (a)(M4x8).

**9** Remove the cooling duct 2 (b).



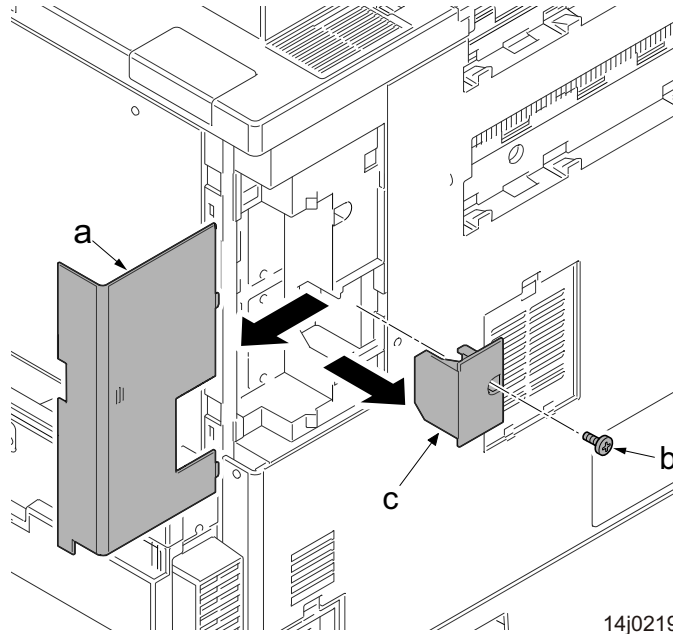
- 10 Disconnect all the connectors and tab from the power source PWB.
- 11 Remove five screws (a)(M3x8).
- 12 Release two board supports (b) and remove the power source PWB (c).
- 13 Check or replace the power source PWB (c) and then reattach the parts in the original position.



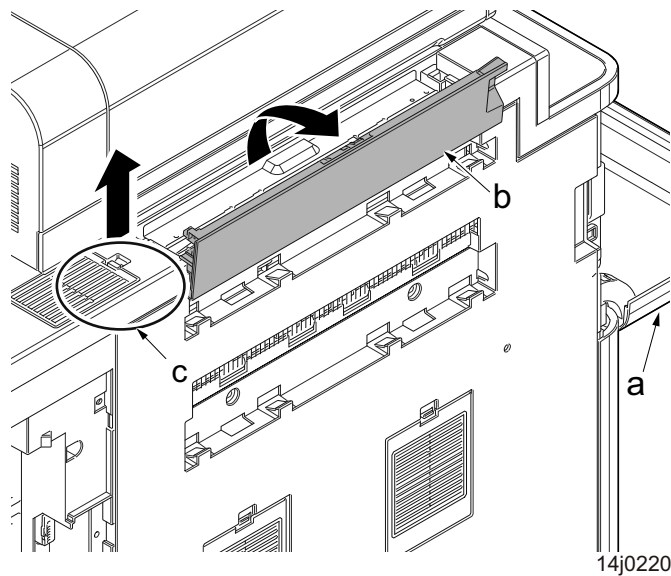
14j0418

**(7-4) Detaching and reattaching the main high-voltage PWB****Procedures**

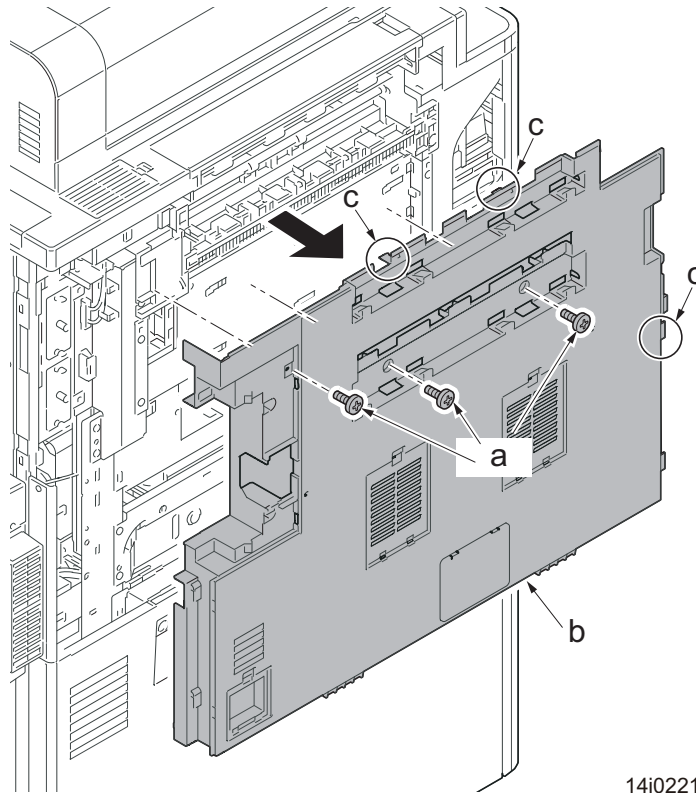
- 1** Remove the controller cover (a).
- 2** Remove the screw (b)(M3x8) and then remove the controller lid (c).



- 3** Open the front cover (a).
- 4** Open the bridge eject cover (b).
- 5** Unhook the rib by lifting up the ISU rear cover edge (c).

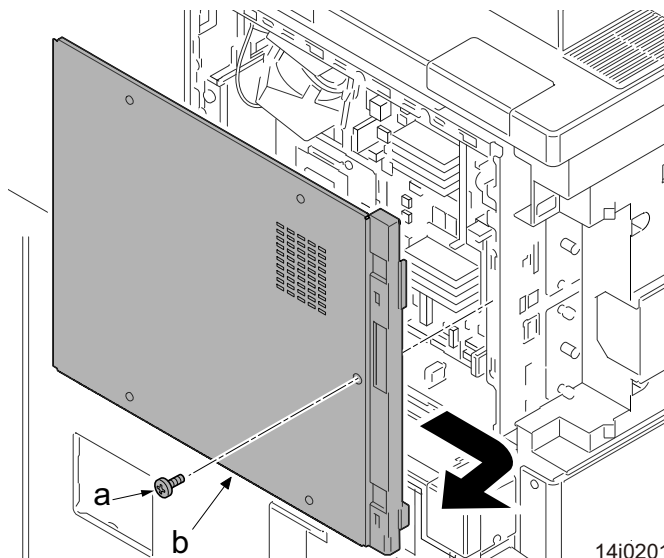


- 6 Remove three screws (a)(M4x8).
- 7 Release three hooks (c) and remove the left upper cover (b).



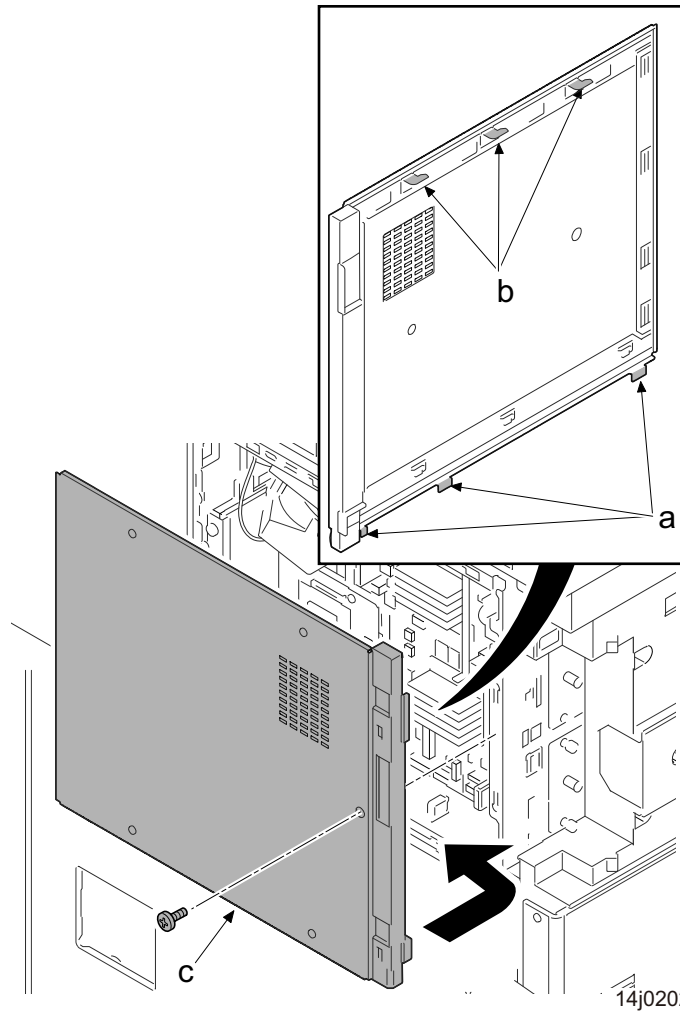
14j0221

- 8 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.



14j0201

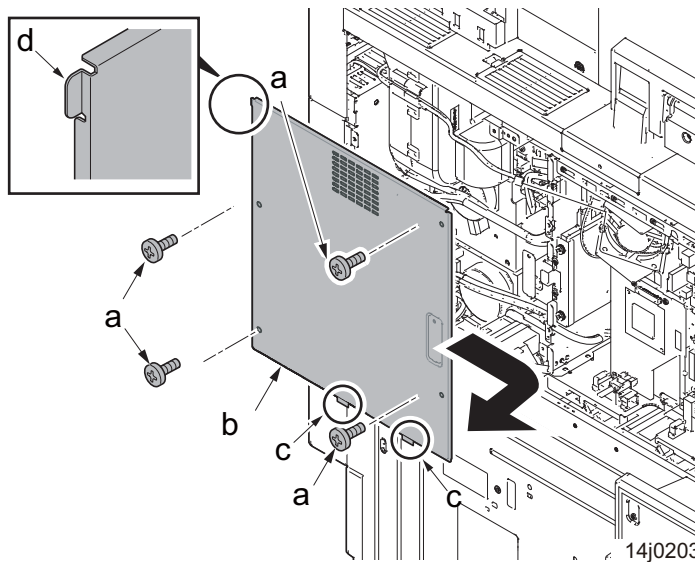
When reattaching the rear left cover (c), latch three lower hooks (a) and then latch three upper hooks (b) while sliding in the direction of the arrow.



14j0202

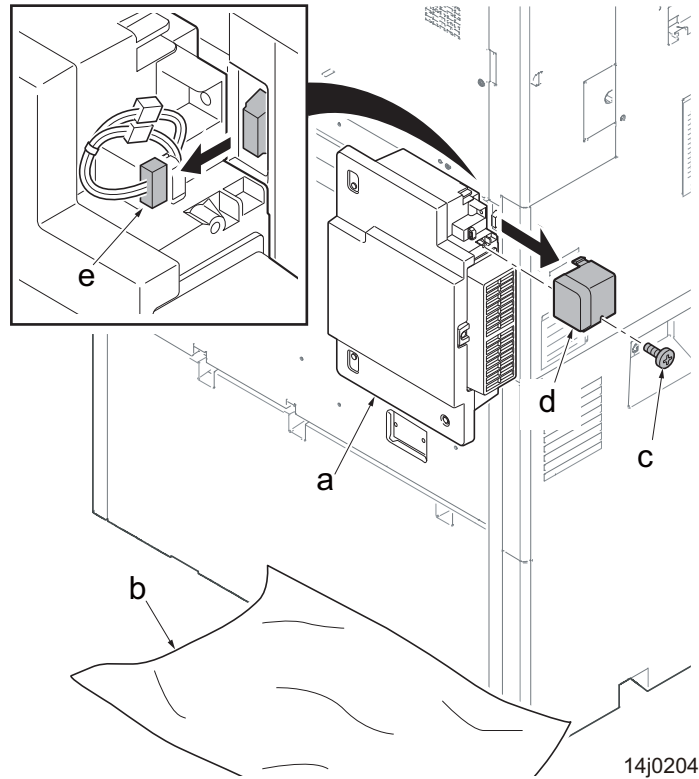
**9 Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.**

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.



14j0203

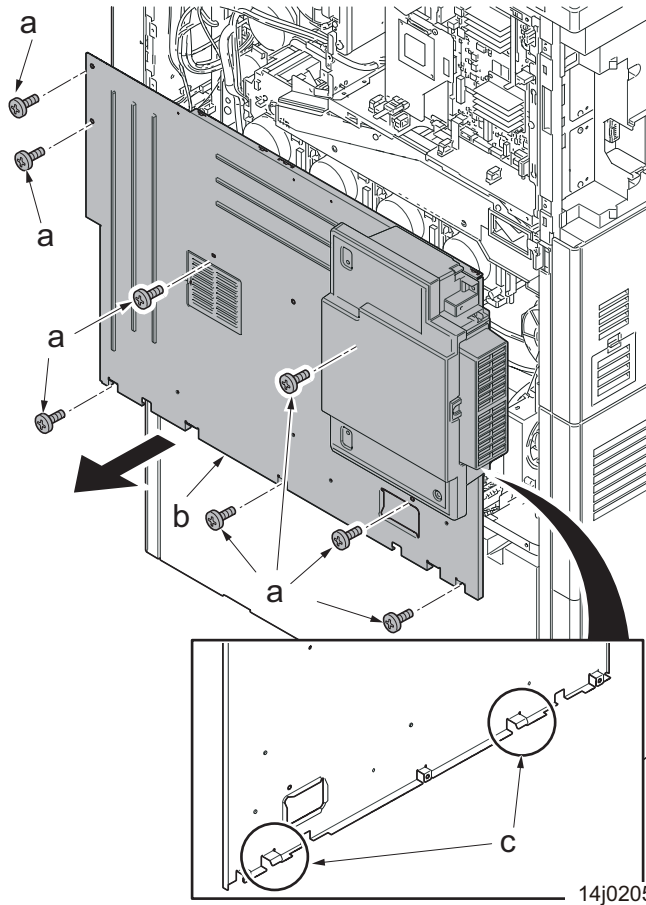
- 10 Cover the area under the waste toner box (a) to prevent contamination due to the scattered toner with the sheet (b).
- 11 Remove the screw (c)(M3x8) and remove the cable cover (d).
- 12 Disconnect the connector (e).



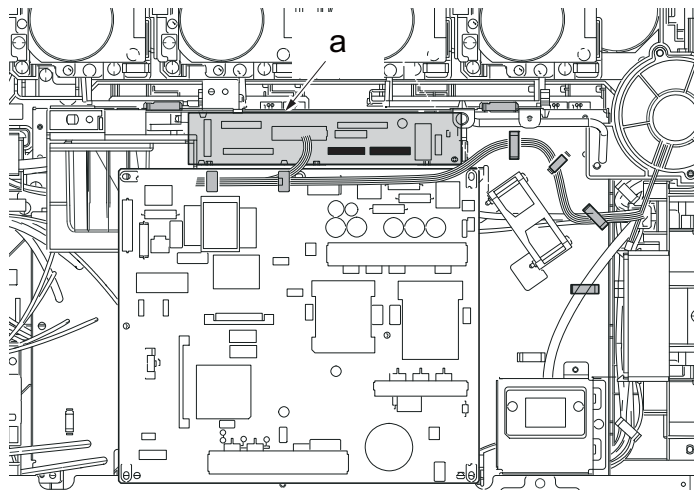


**13** Remove nine screws (a)(M3x8).

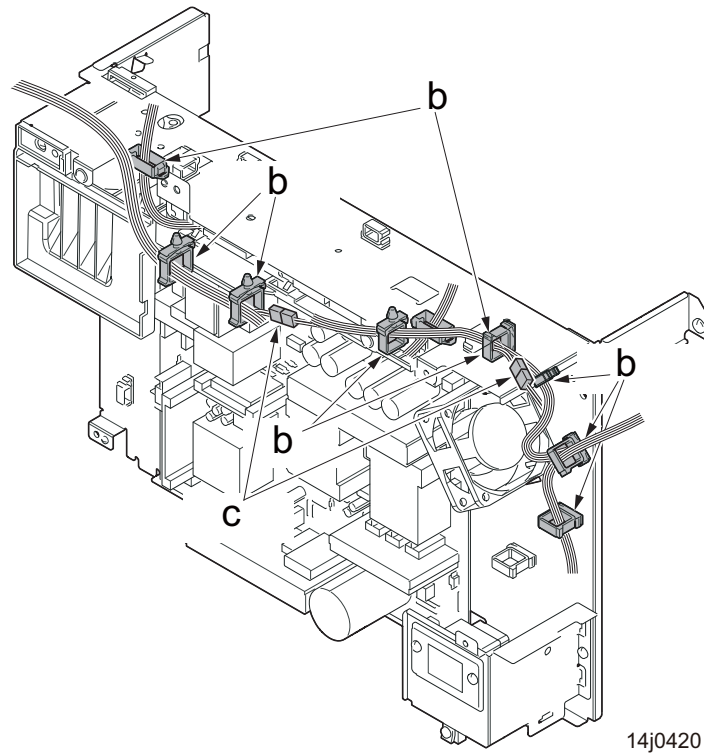
**14** Release two lower hooks (b) and remove the rear lower cover (c).



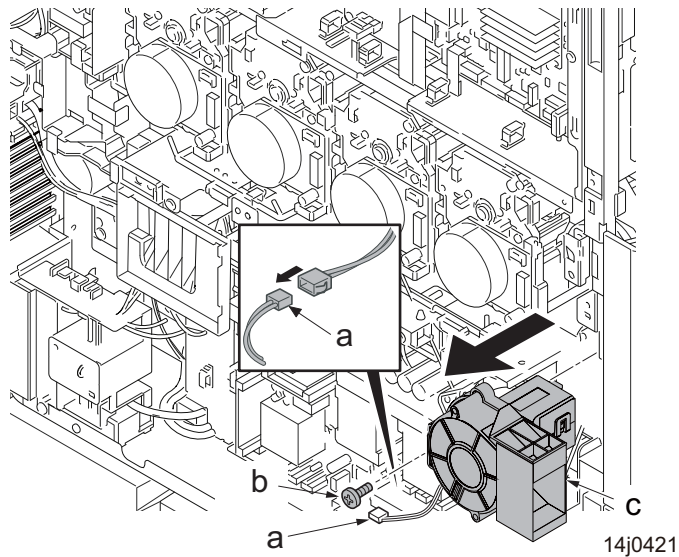
**15** Disconnect all the connectors from the motor relay PWB (a).



- 16 Release eight wire saddles (b) and remove the wire.
- 17 Disconnect all the connectors and tab from the power source PWB.
- 18 Disconnect two 2-pin connectors (2).

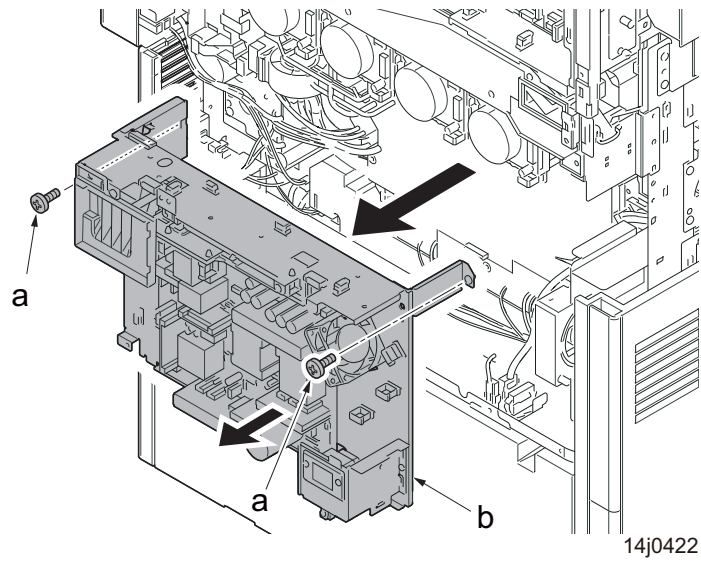


- 19 Disconnect the connector (a).
- 20 Remove the screw (b)(M4x8) and remove the exhaust fan unit (c).

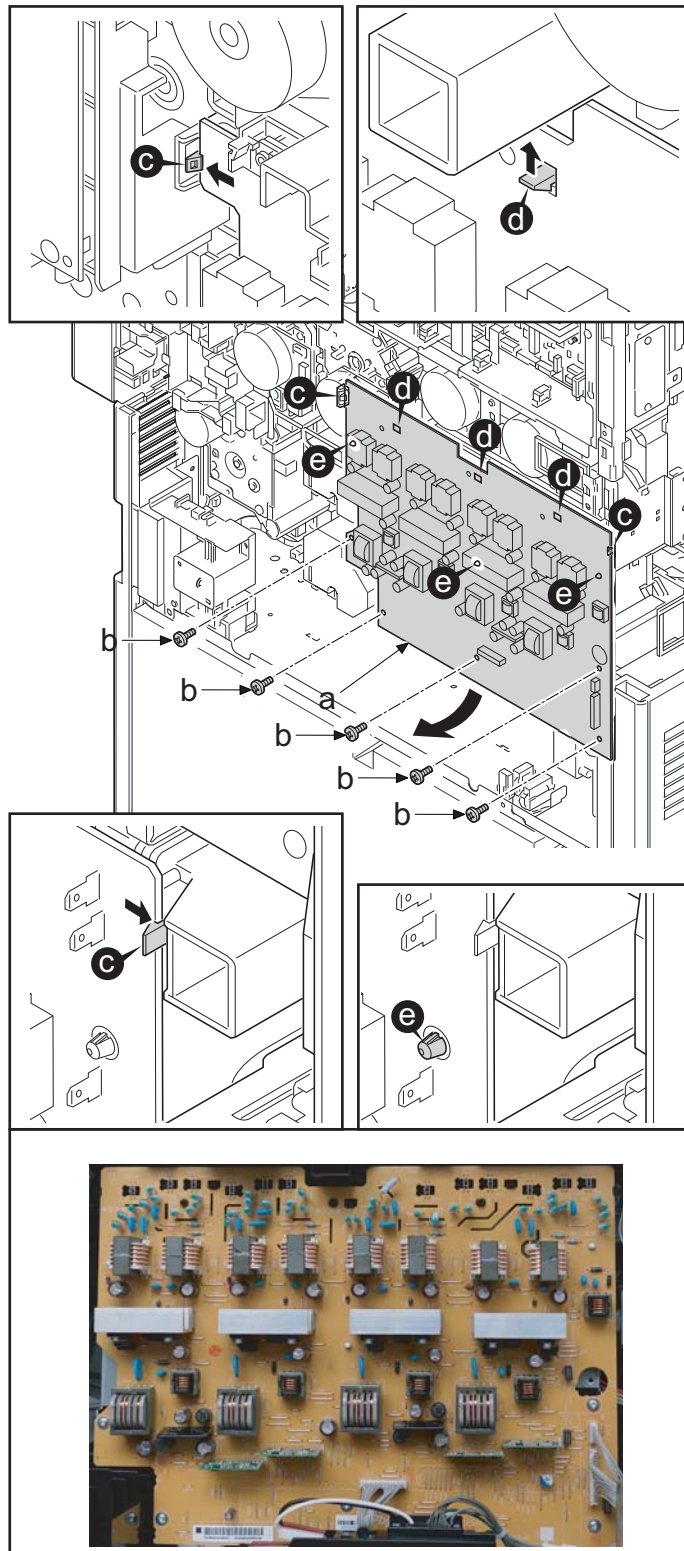


**21** Remove two screws (a)(M4x8).

**22** Remove the power source assembly (b).



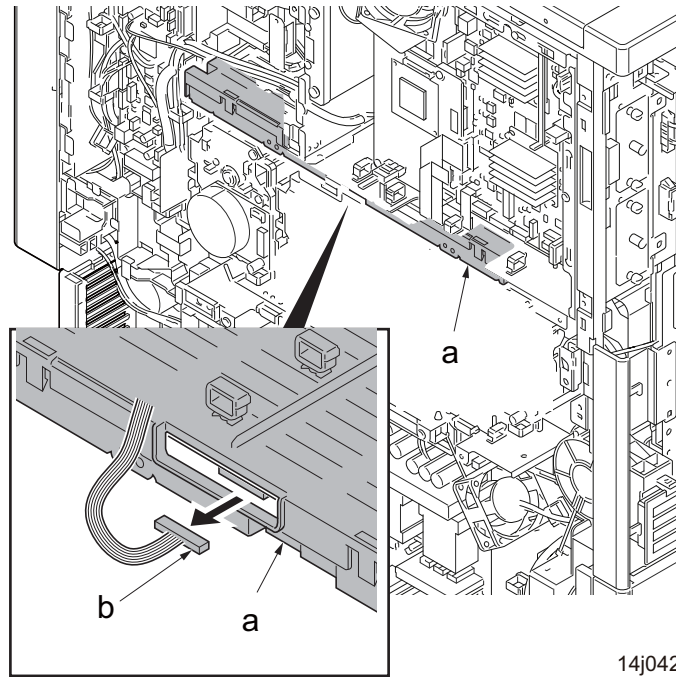
- 
- 23** Disconnect all the connectors from the main high-voltage PWB (a).
  - 24** Remove five screws (b)(M3x8).
  - 25** Release three board supports (e).
  - 26** Release two hooks (c) at the left and right side.
  - 27** Release three upper side hooks (d) and remove the main high voltage PWB (a).
  - 28** Check or replace the main high voltage PWB (a), and then reattach the parts in the original position.



14j0423

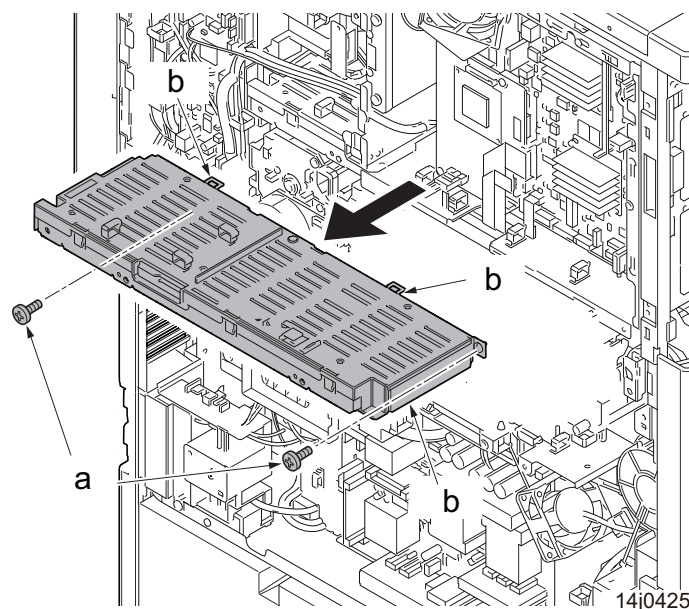
**(7-5) Detaching and reattaching the transfer high voltage PWB****Procedures**

- 1** Remove the main drive unit.
- 2** Pull the primary transfer unit out a little.
- 3** Remove one connector (b) from the transfer high-voltage PWB assembly (a).



14j0424

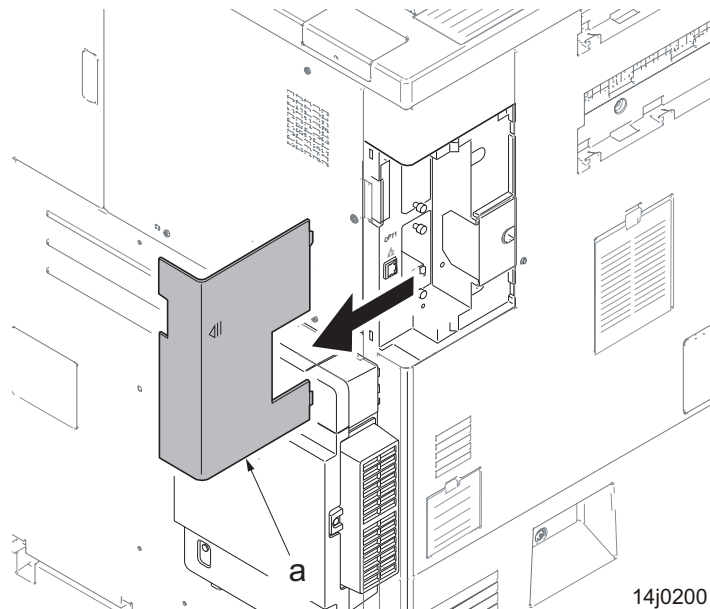
- 4** Remove two screws (a)(M4x8).
- 5** Release two hooks (b) and remove the transfer high-voltage PWB assembly (c).
- 6** Check or replace the transfer high-voltage PWB assembly and then reattach the parts in the original position.



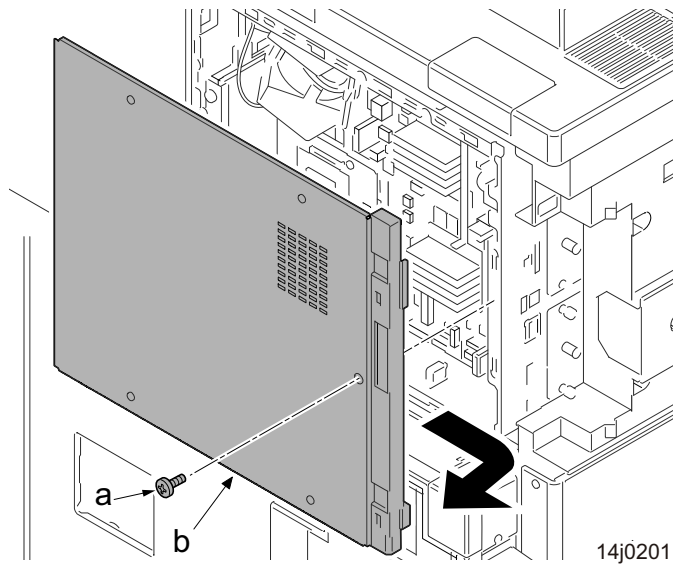
14j0425

**(7-6) Detaching and reattaching the IH PWB****Procedures**

- 1 Remove the controller cover (a).**

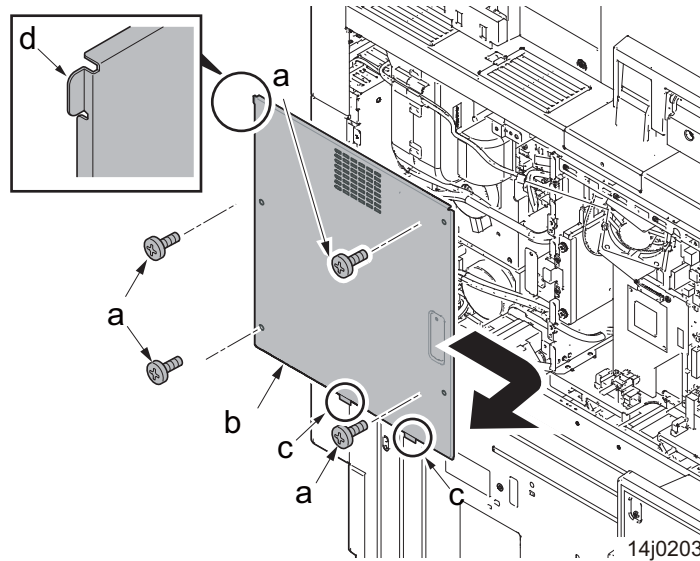


- 2 Remove the screw (a)(M3x8TP) and remove the rear left cover (b) by sliding it in the direction of the arrow.**

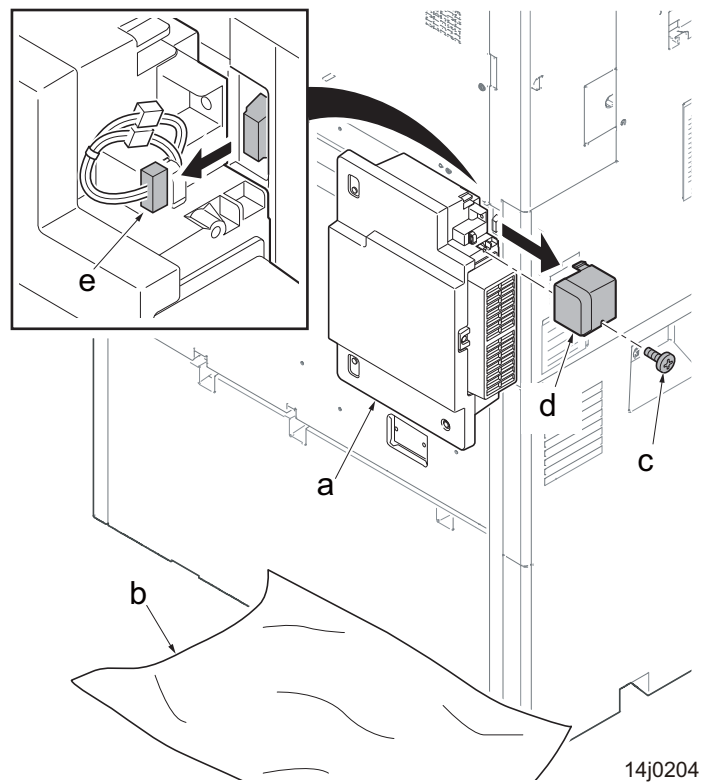


- 3 Remove four screws (a)(M3x8) and remove the rear right cover (b) in the direction of the arrow.**

When reattaching the cover, latch two lower hooks (c) and then latch the hook (d) at the upper left.

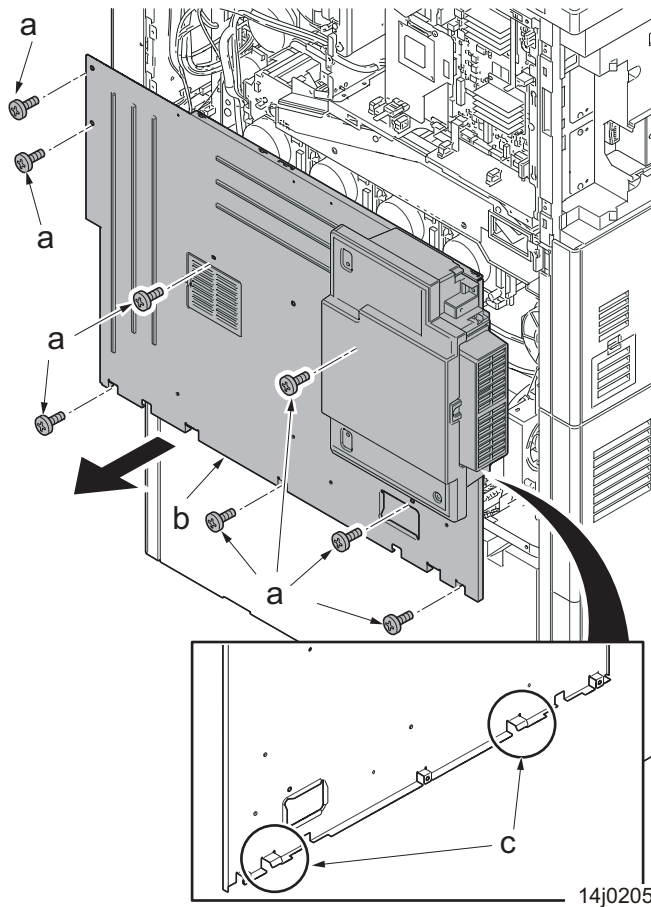


- 4 Cover the area under the waste toner box (a) to prevent contamination due to the scattered toner with the sheet (b).
- 5 Remove the screw (c)(M3x8) and remove the cable cover (d).
- 6 Disconnect the connector (e).

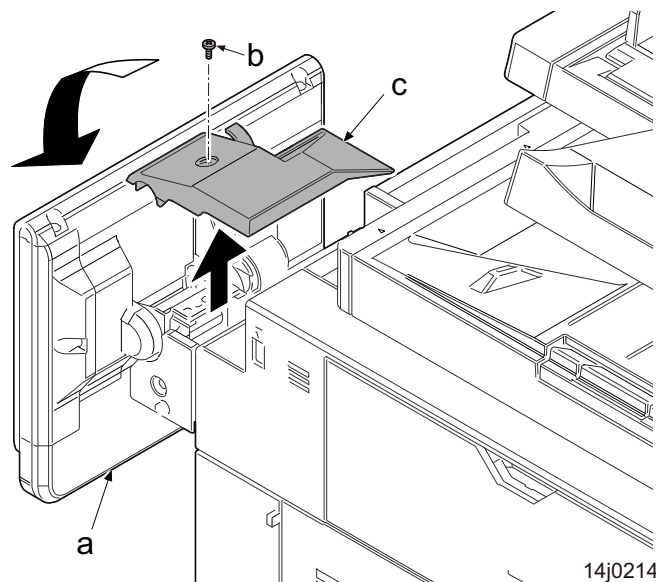


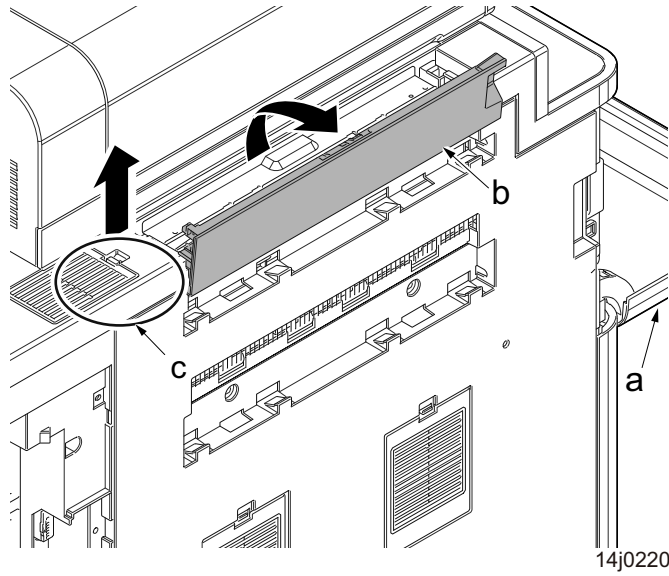
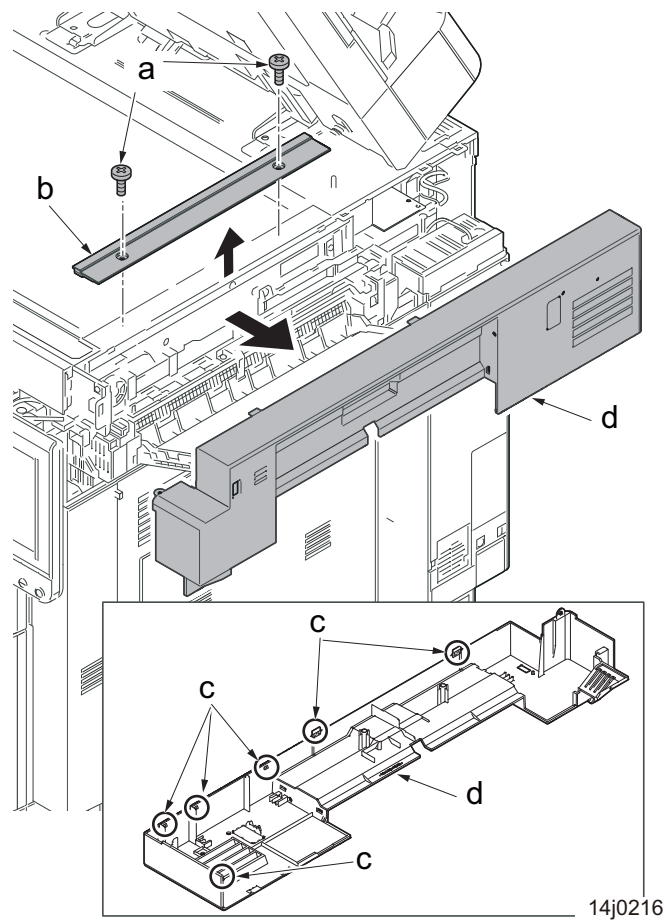


- 7 Remove eight screws (a)(M3x8).
- 8 Release two lower hooks (b) and remove the rear lower cover (c).



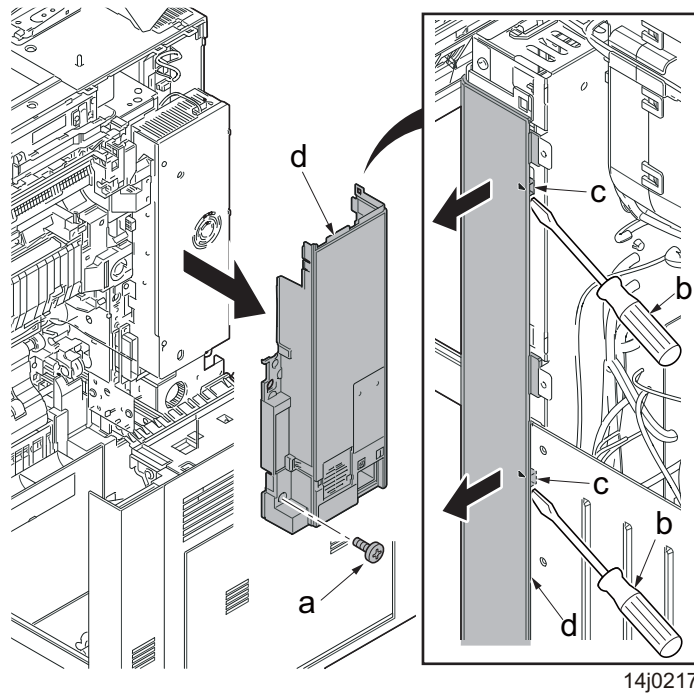
- 9 Remove the fuser unit.
- 10 Tilt up the operation unit (a).
- 11 Remove the screw (b)(M3x8) and remove the operation rear cover (c) in the direction of the arrow.



**12 Remove the screw (a)(M4x8).****13 Remove two screws (a)(M4x8) and then remove the ISU right cover (b).****14 Release six hooks (c) and remove the right upper cover (d).**

**15** Remove the screw (a)(M4x8).

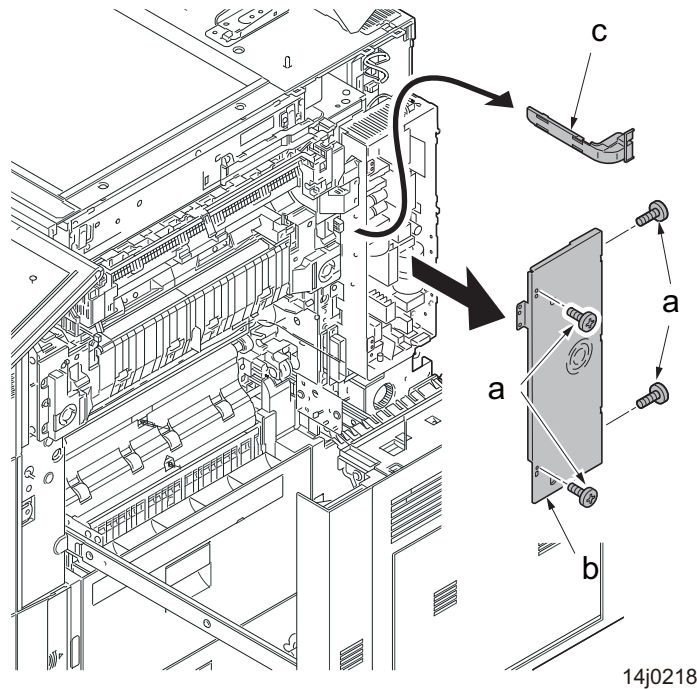
**16** Release two hooks (c) using a flat blade screwdriver (b) and remove the right middle rear cover (d).



**17** Remove the right middle rear cover.

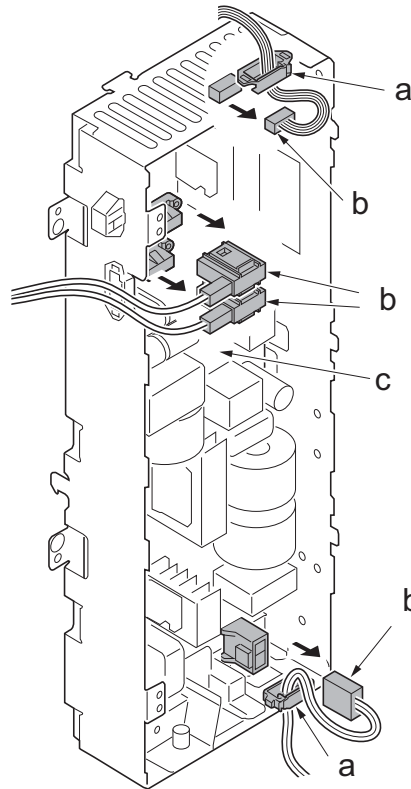
**18** Remove four screws (a)(M3x8) and then remove the IH cover (b).

**19** Remove the IH wire cover (c).



**20** Release two wire saddles (a).

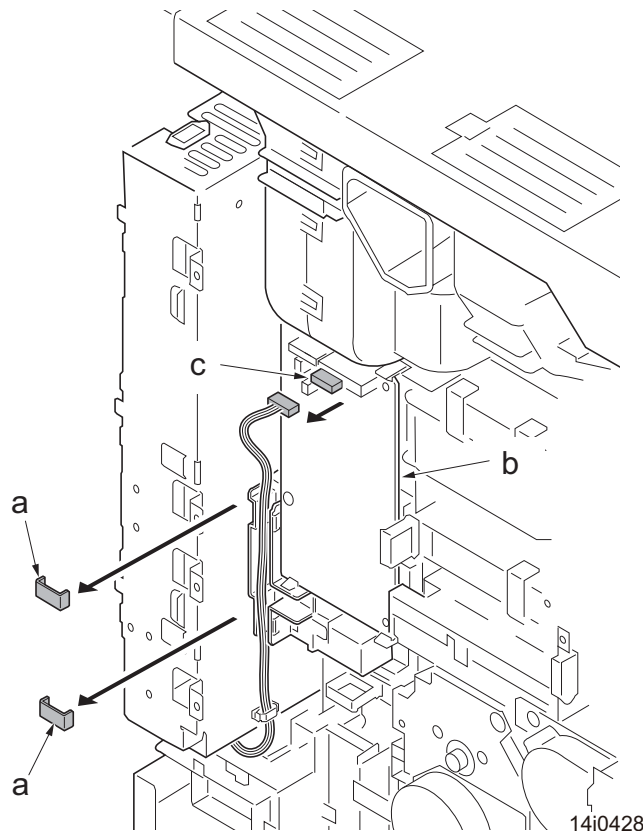
**21** Disconnect four connectors (b) from the IH PWB (c).



14j0427

**22** Remove two wire holder (a).

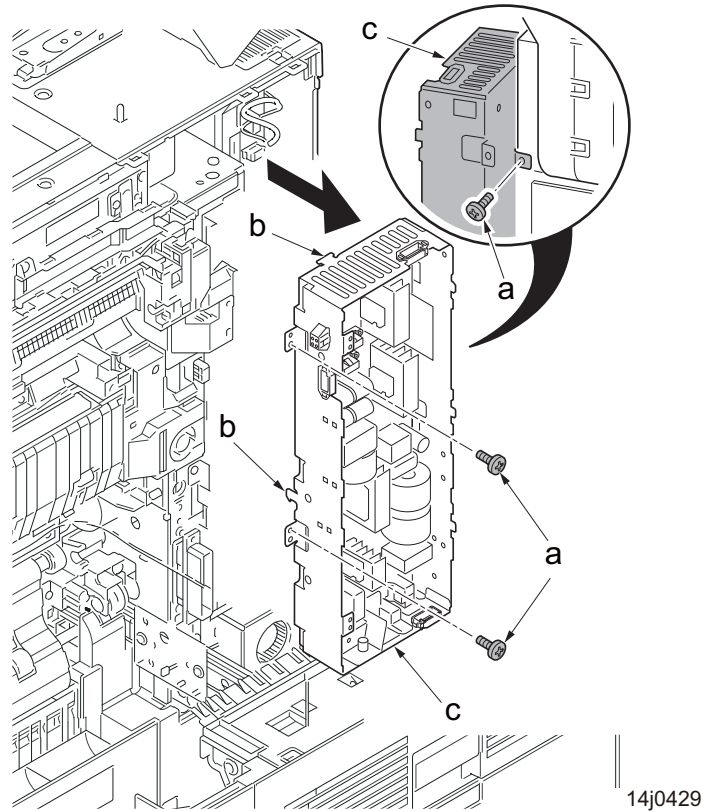
**23** Disconnect the connector (c)(YC27) from the feed PWB (b).



14j0428

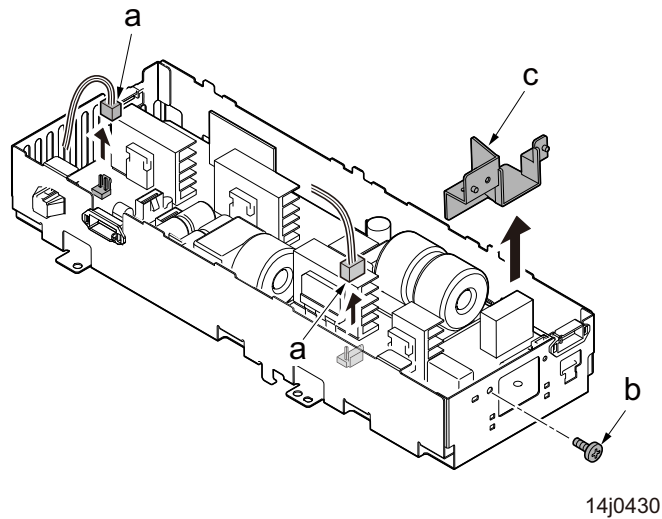
**24** Remove three screws (a)(M4x8).

**25** Release two hooks (b) and remove the IH box assembly (c).



**26** Disconnect two connectors (a).

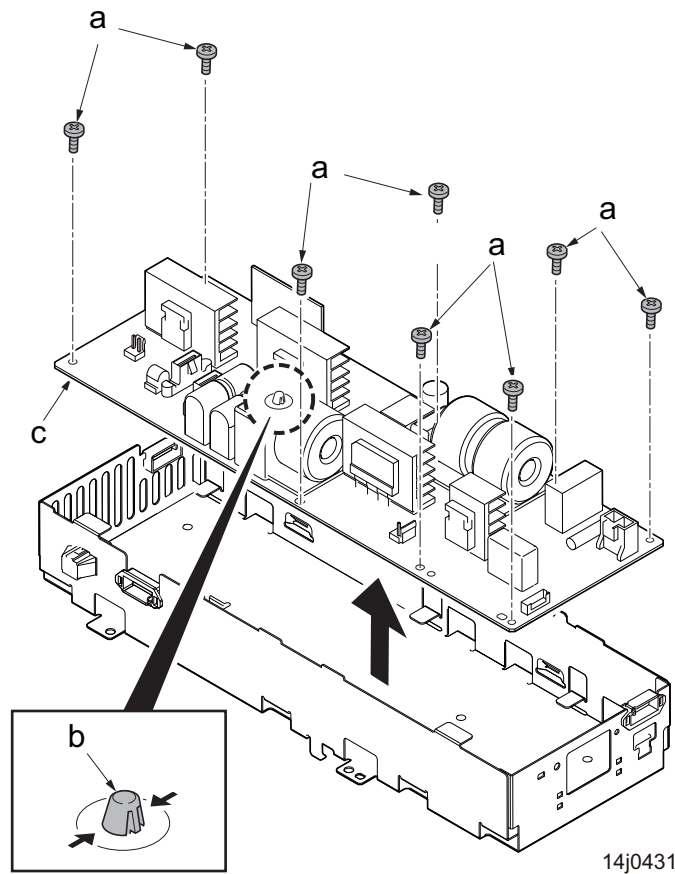
**27** Remove one screw (b)(M3x8) and remove the duct (c).



**28** Remove eight screws (a)(M3x8).

**29** Release the board support (b) and remove the IH PWB (c).

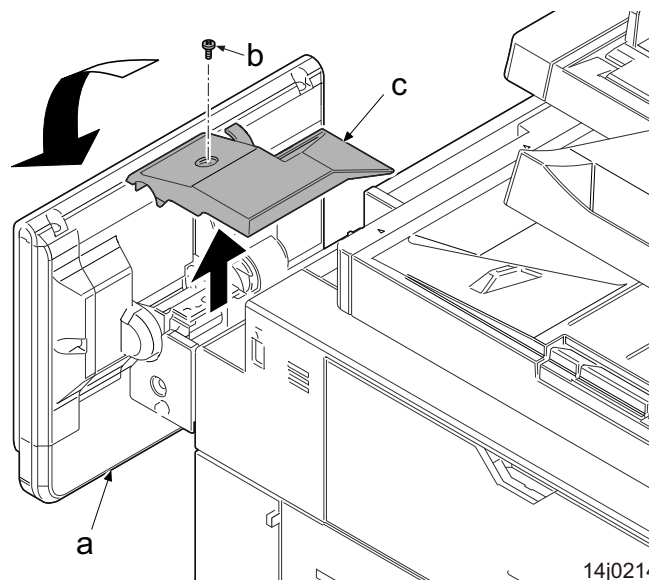
**30** Check or replace the IH PWB (c) and then reattach the parts in the original position.



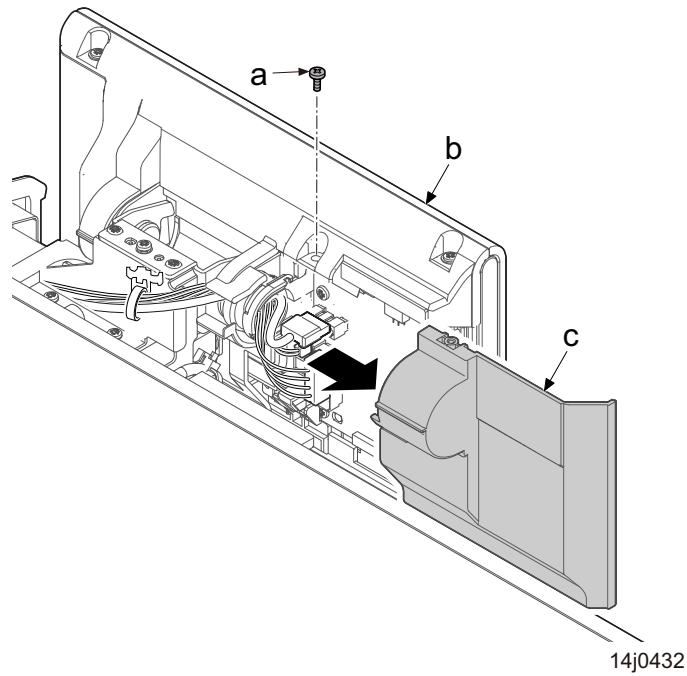
### (7-7) Detaching and reattaching the operation panel PWB

#### Procedures

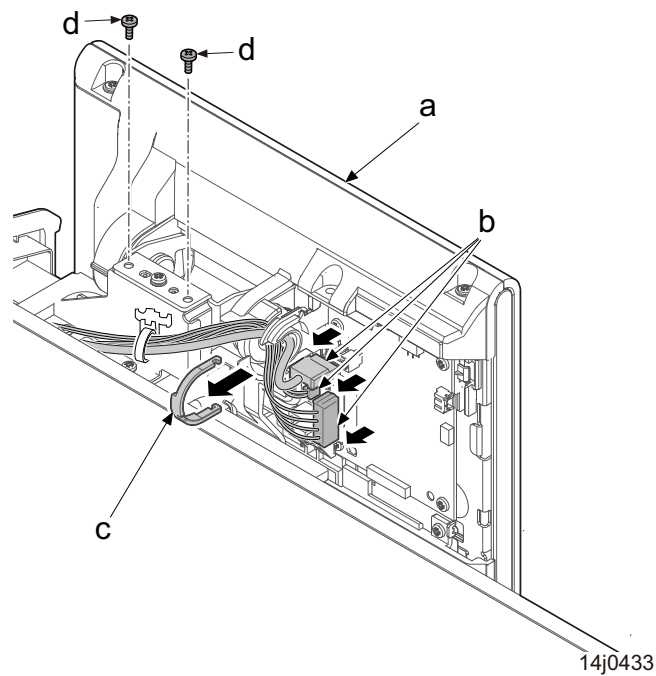
- 1** Tilt up the operation unit (a).
- 2** Remove the screw (b)(M3x8) and remove the operation rear cover (c) in the direction of the arrow.



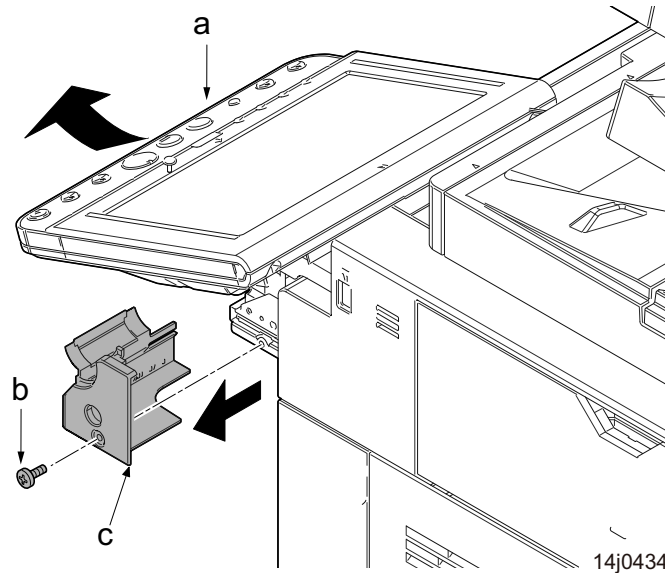
- 3 Remove one screw (a)(M3x8).
- 4 Remove the operation lid (c) from the operation unit (b) in the direction of the arrow.



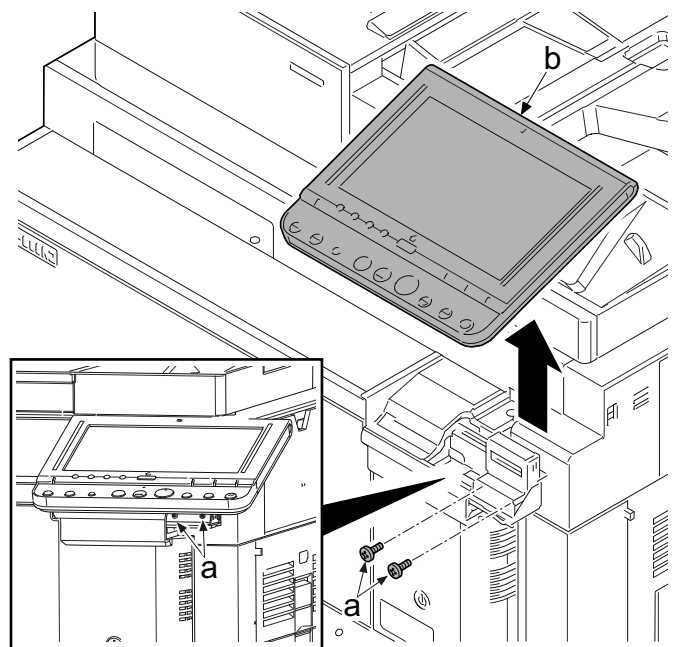
- 5 Disconnect three connectors (b) from the operation unit (a).
- 6 Detach the wire guide (c).
- 7 Remove two screws (d)(M3x8).



- 8 Tilt down the operation unit (a).
- 9 Remove the screw (b)(M3x8) and remove the operation right cover (d).

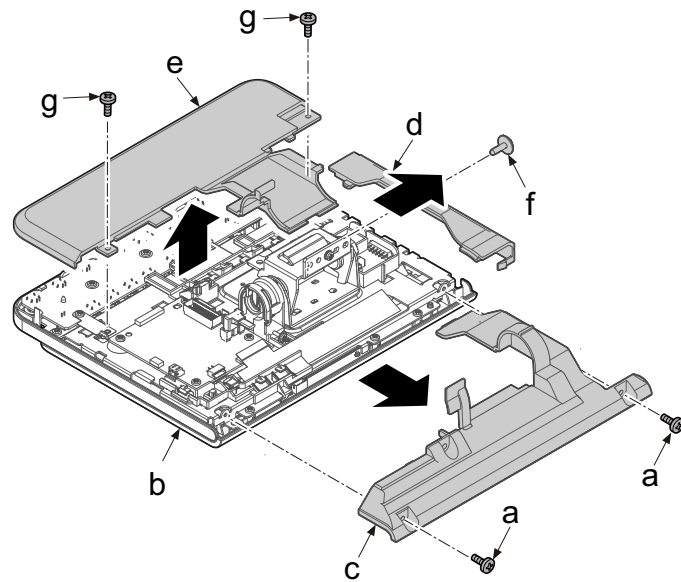


- 10 Remove two screws (a)(M3x8) and remove the operation section (b).
- 11 Remove two screws (a)(M3x8) and remove the operation section (b).



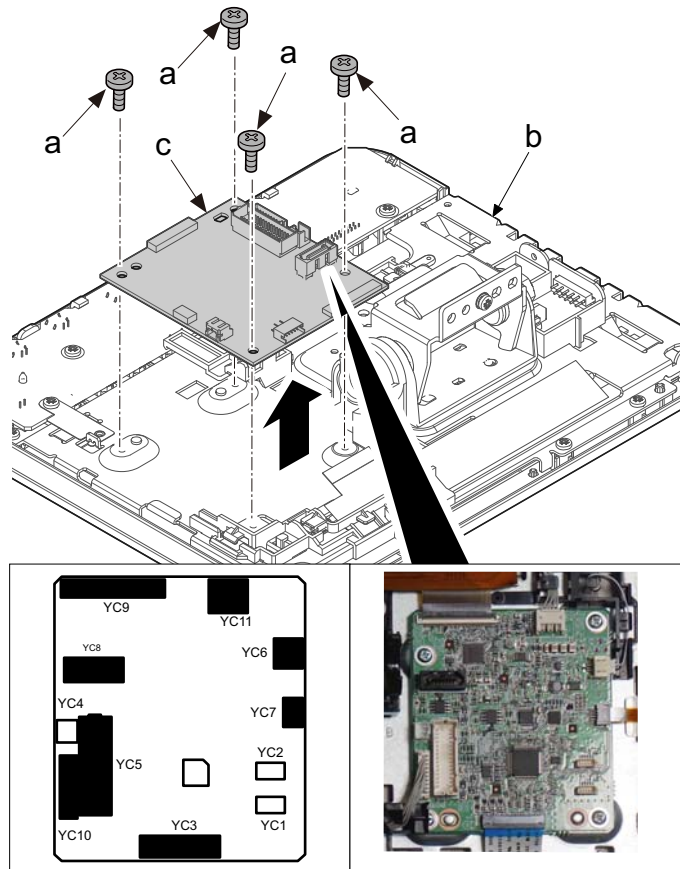


- 12 Remove two screws (a)(M3x8).
- 13 Remove the operation rear top cover (c) from the operation (b).
- 14 Remove one screw (f)(M3x8).
- 15 Detach the operation cover (d) from the operation unit (b).
- 16 Remove two screws (g)(M3x8).
- 17 Remove the operation rear lower cover (e) from the operation unit (b).



14j0436

- 18 Disconnect all FFCs, FPCs and the connectors from the operation PWB (c).
- 19 Remove four screws (a)(M3x8).
- 20 Remove the operation panel main PWB (c) from the operation section (b).
- 21 Check or replace the operation panel main PWB (c) and then reattach the parts which are removed.

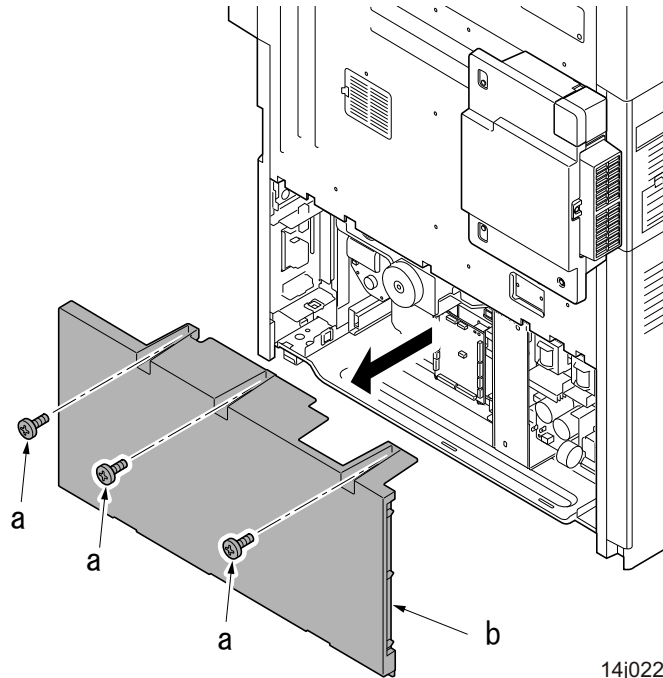


14j0437

**(7-8) Detaching and reattaching the PF main PWB and PF power source PWB**

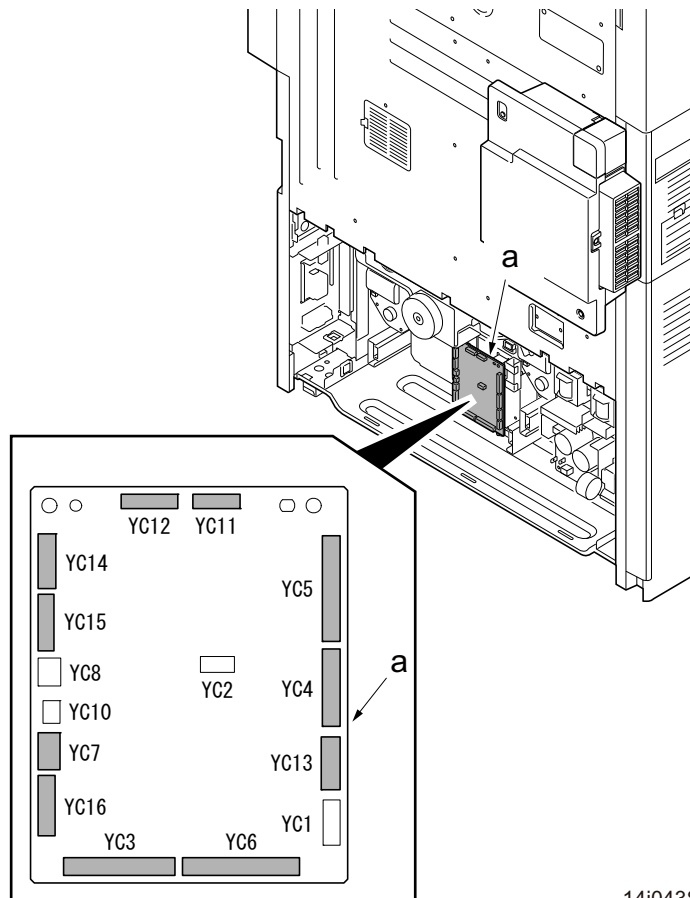
**Procedures**

- 1 Remove three screws (a)(M4x8) and remove the PF rear cover (b).**



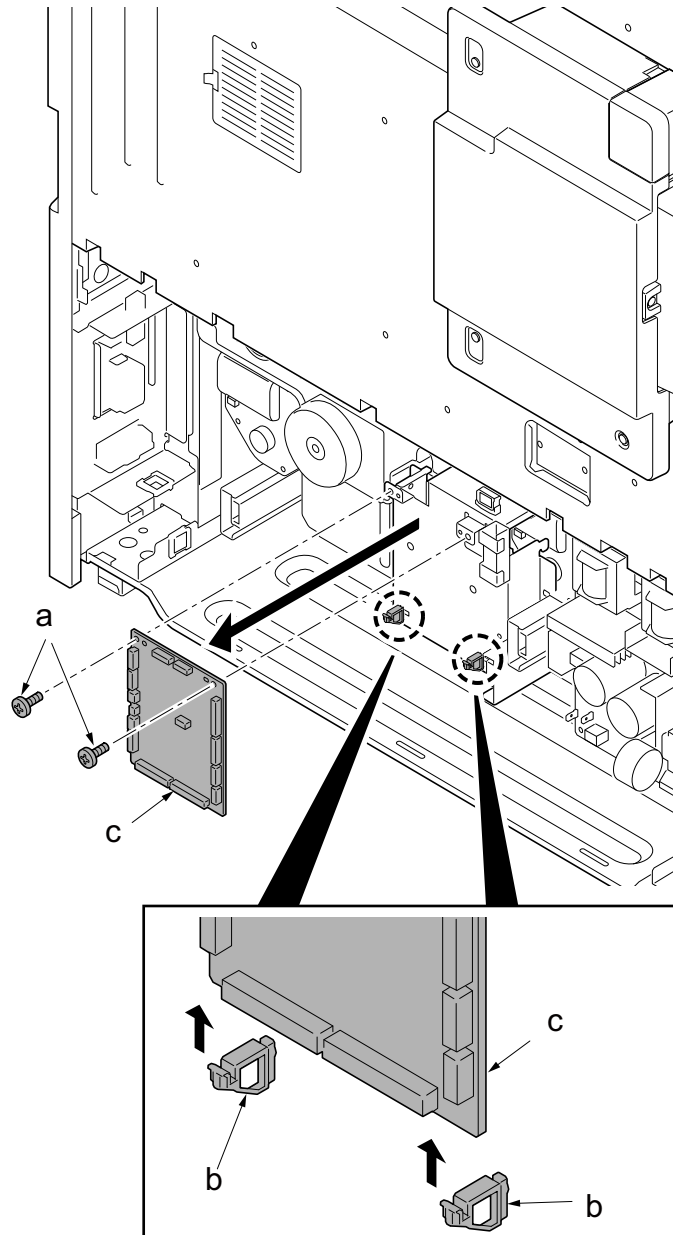
14j0225

- 2 Disconnect all the connectors from the PF main PWB (a).**



14j0438

- 3 Remove two screws (a)(M3x8) and remove the PF main PWB (c) from two holders (b).
- 4 Check or replace the PF main PWB (c) and then reattach the parts in the original position.
- 5 After power on, port the counters on the engine board to the PF main board using maintenance mode U901. (Refer [P.6-326](#))

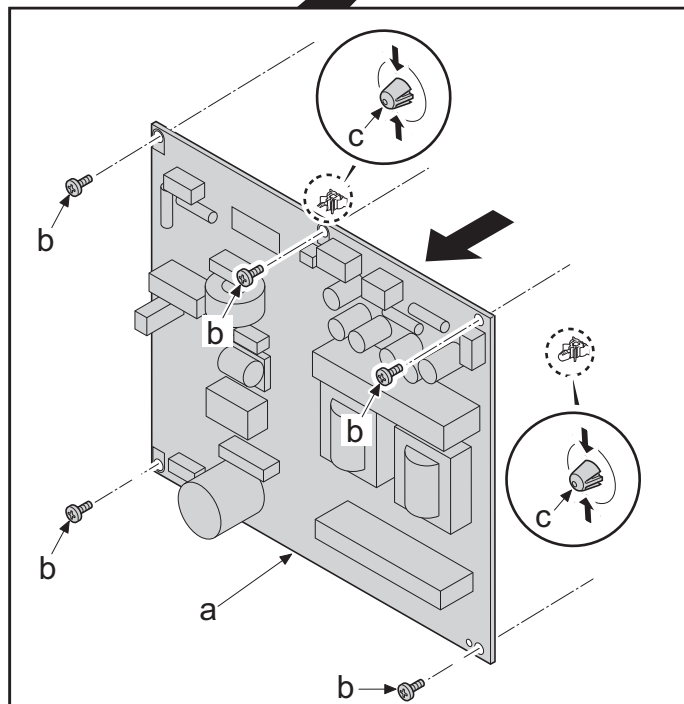
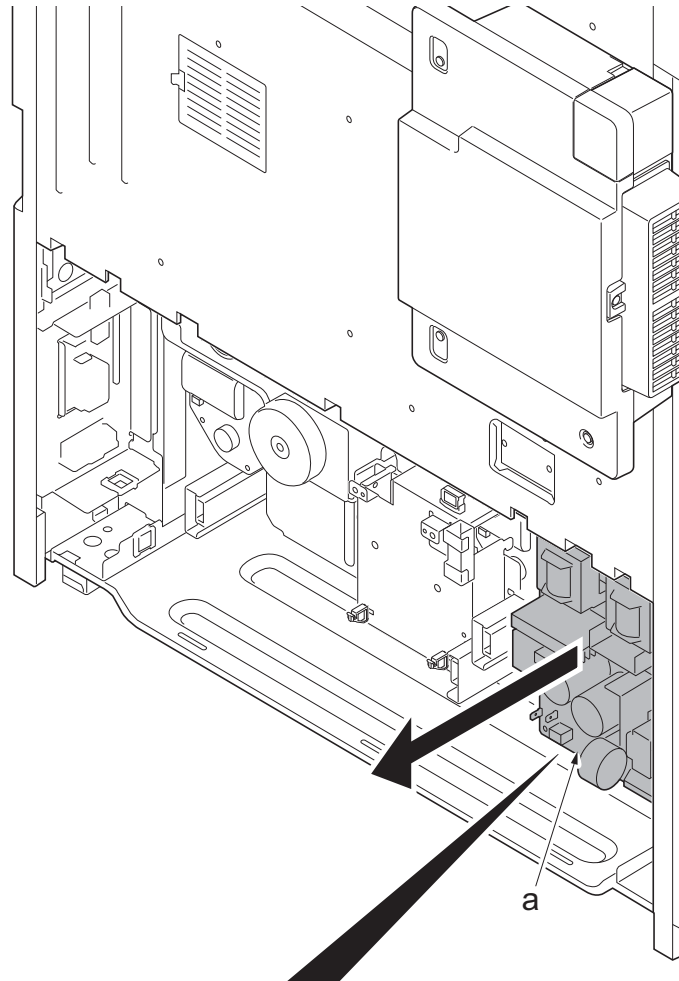


14j0439

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## Detaching the PF power source PWB

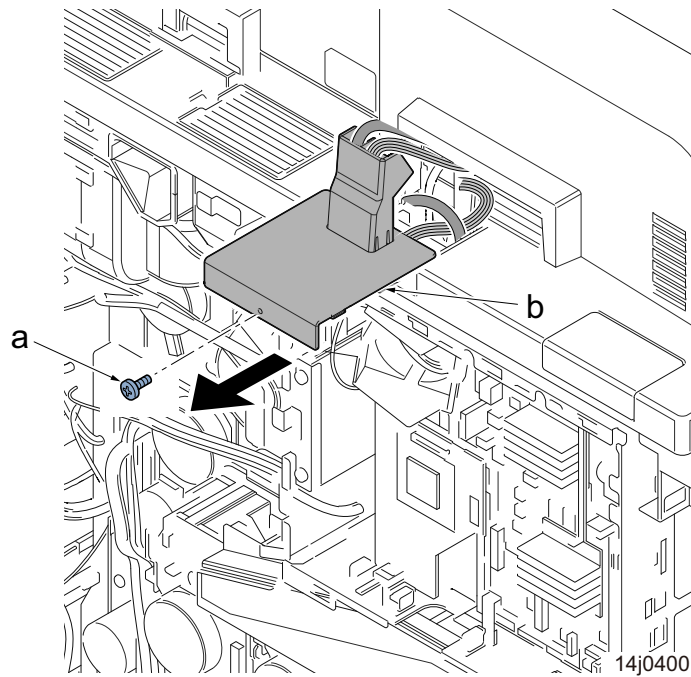
- 6 Disconnect all the connectors from the PF power source PWB (a).
- 7 Remove five screws (b)(M3x8).
- 8 Release two board supports (c) and remove the PF power source PWB (a).
- 9 Check or replace the PF power source PWB (a) and then reattach the parts in the original position.



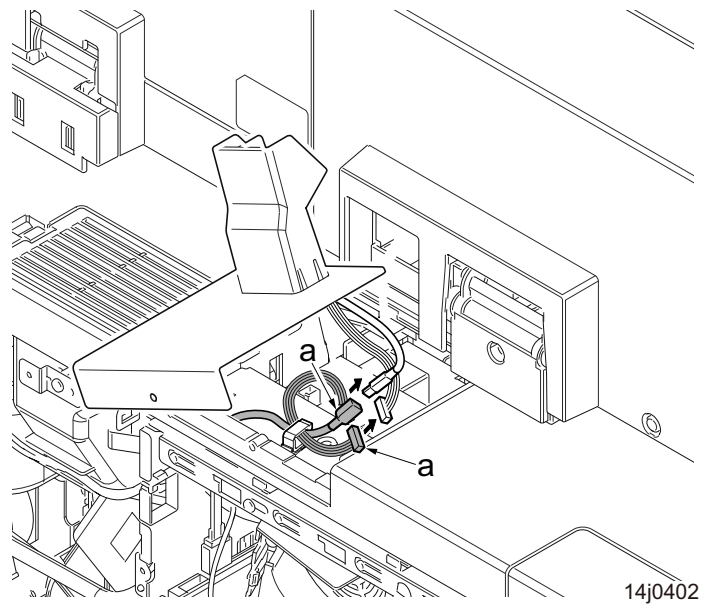
14j0440

**(8) Document processor****(8-1) Detaching and reattaching the document processor****Procedures**

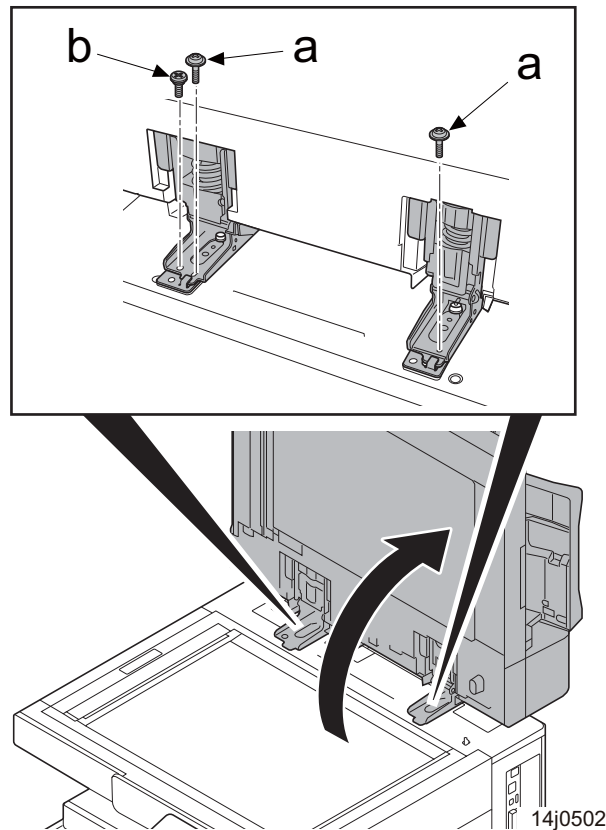
- 1 Remove the screw (a)(M3x8) and remove the DPIF lid (b).**



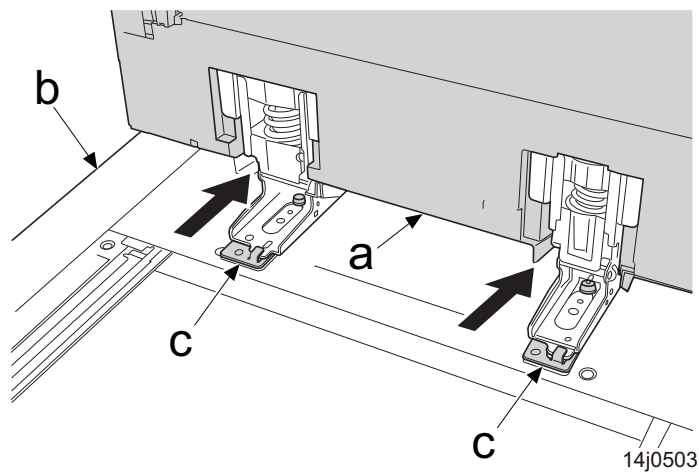
- 2 Disconnect two connectors (a).**



- 3 Open the document processor.
- 4 Remove two screws (a)(M3x8) and the pin (b).



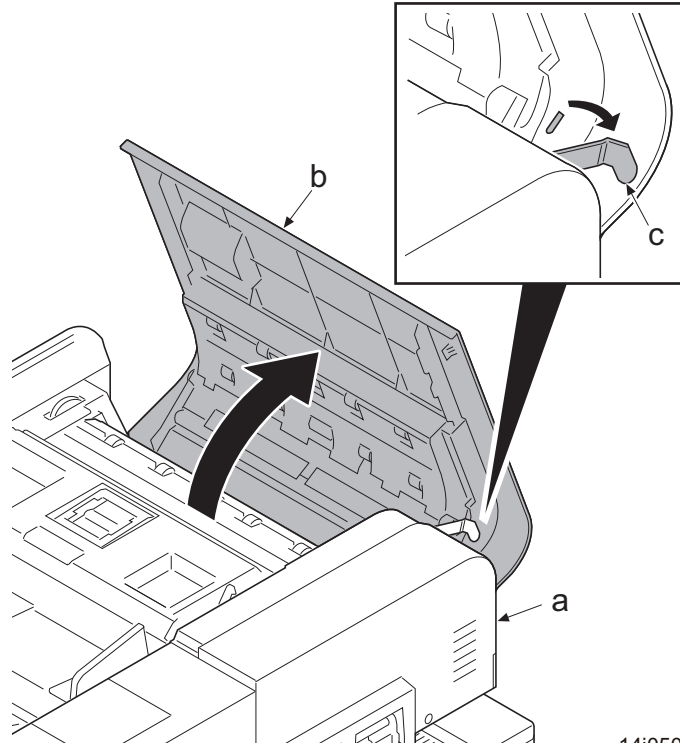
- 5 Slide the document processor (a) in the direction of the arrow and remove the hinge (c) from the main unit (b).
- 6 Detach the document processor by lifting up.





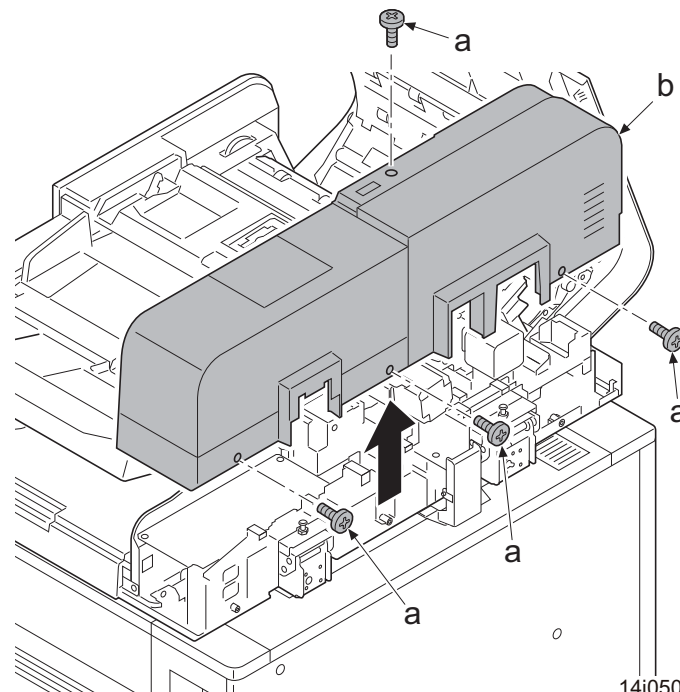
**(8-2) Detaching and reattaching the DP rear cover****Procedures**

- 1 Open the DP top cover (b) of the document processor (a).
- 2 Remove the strap (c) from DP top cover.



14j0504

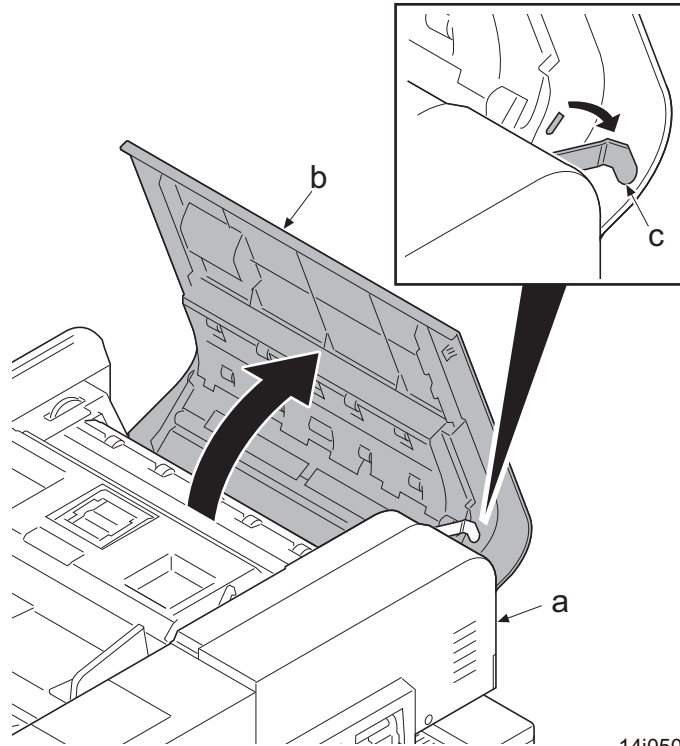
- 3 Remove four screws (a)(M3x8) and detach the DP rear cover (b).



14j0505

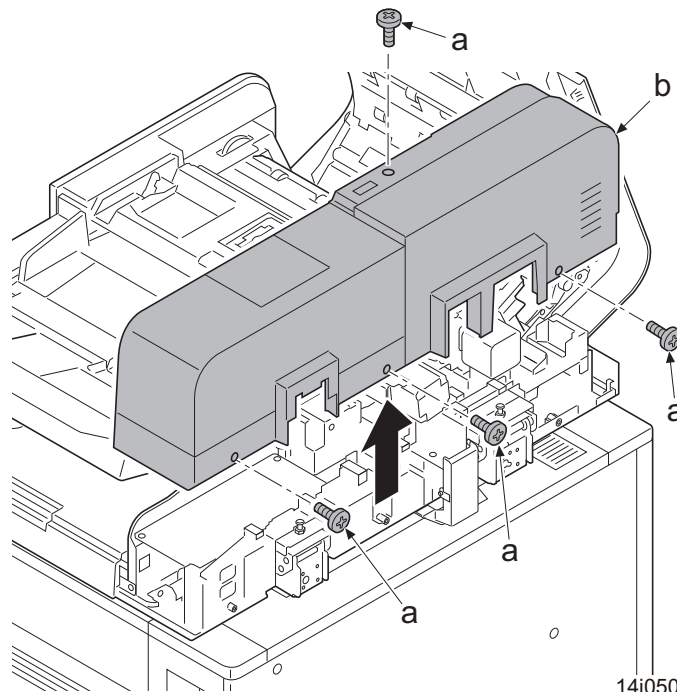
**(8-3) Detaching and reattaching the DP main PWB****Procedures**

- 1 Open the DP top cover (b) of the document processor (a).
- 2 Detach the Strap (c) from the DP top cover (b).



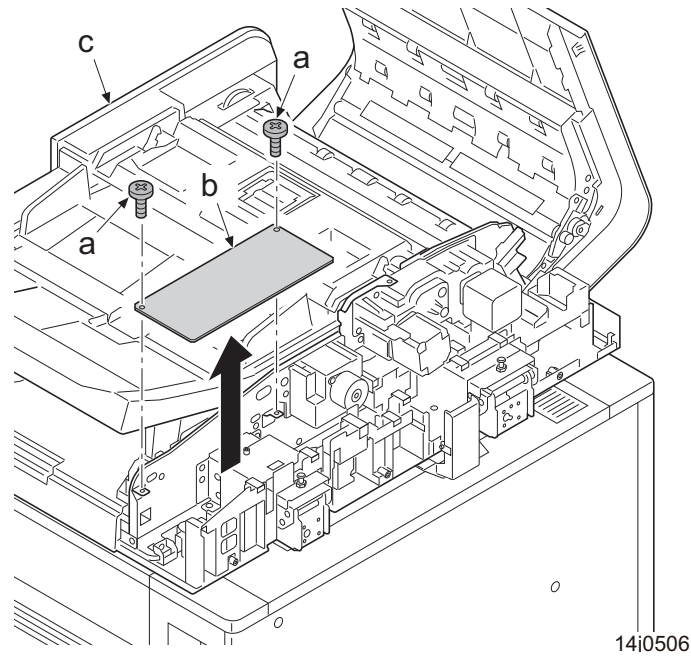
14j0504

- 3 Remove four screws (a)(M3x8) and detach the DP rear cover (b).



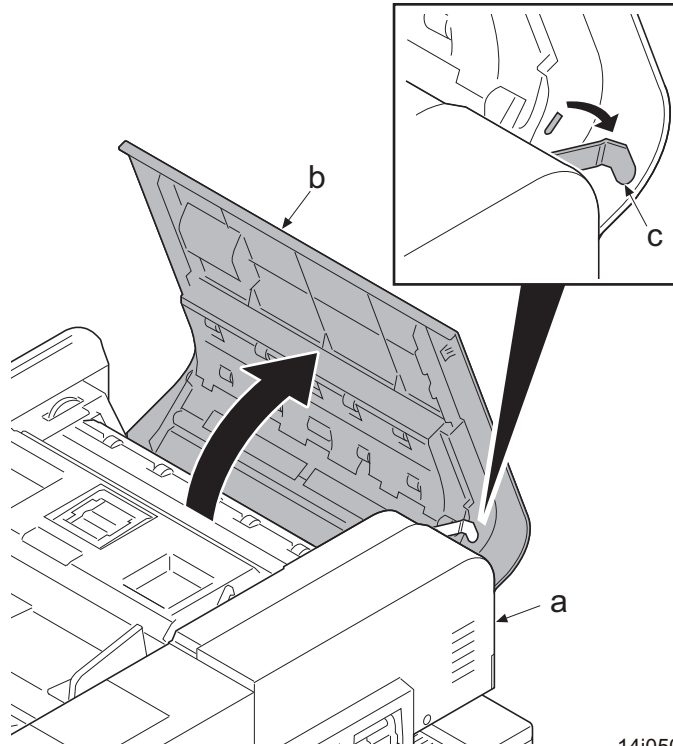
14j0505

- 4 Disconnect all the connectors from the DP main PWB (b).
- 5 Remove two screws (a)(M3x8).
- 6 Detach the DP main PWB (b) from the document processor (c).
- 7 Check or replace the DP main PWB (b), and then reattach the parts in the original position.



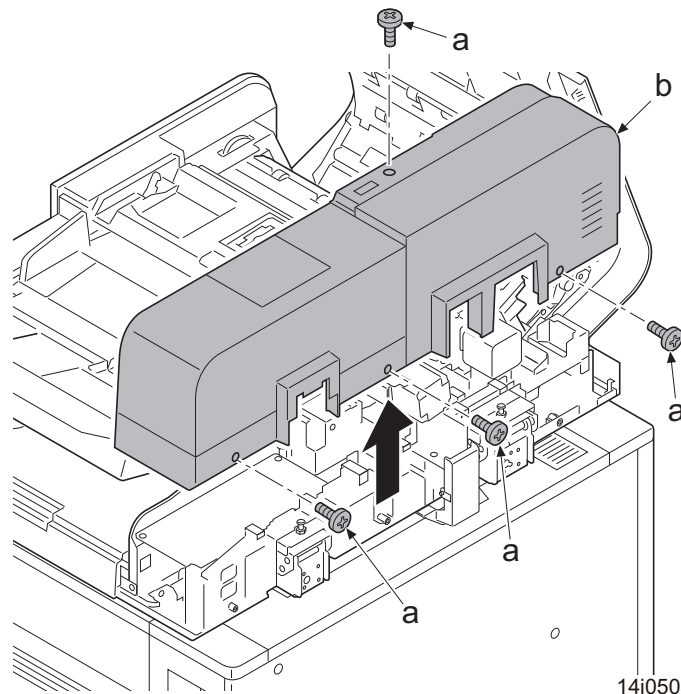
**(8-4) Detaching and reattaching the CIS****Procedures**

- 1 Open the DP top cover (b) of the document processor (a).
- 2 Detach the Strap (c) from the DP top cover (b).



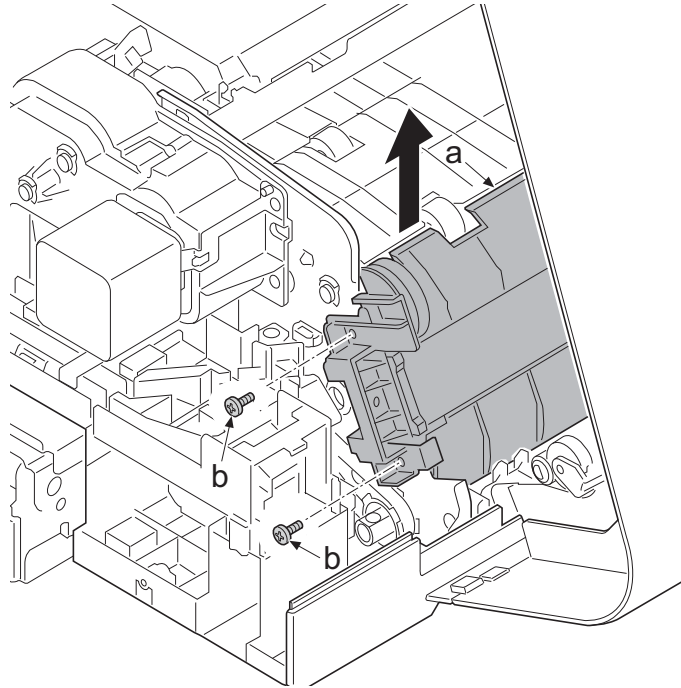
14j0504

- 3 Remove four screws (a)(M3x8) and detach the DP rear cover (b).



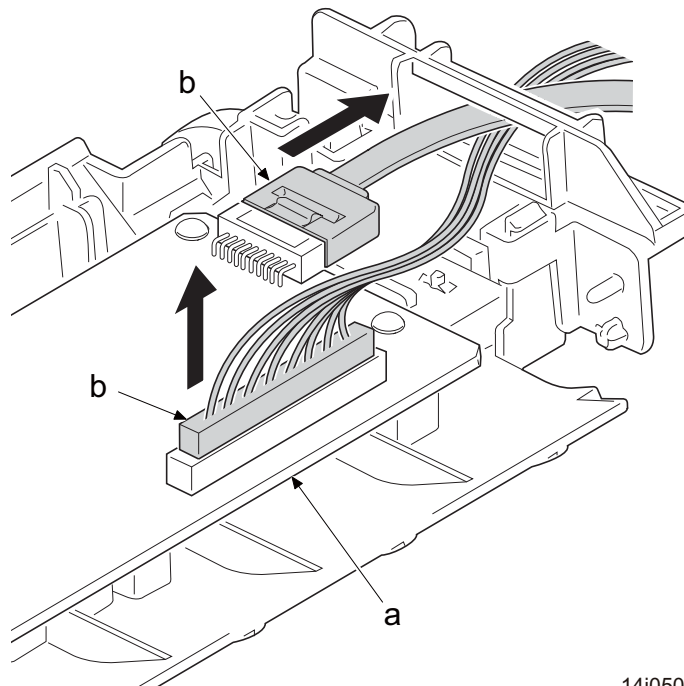
14j0505

- 4** Remove two screws (b)(M3x8) at the machine rear side, detach CIS unit (a) the upward.



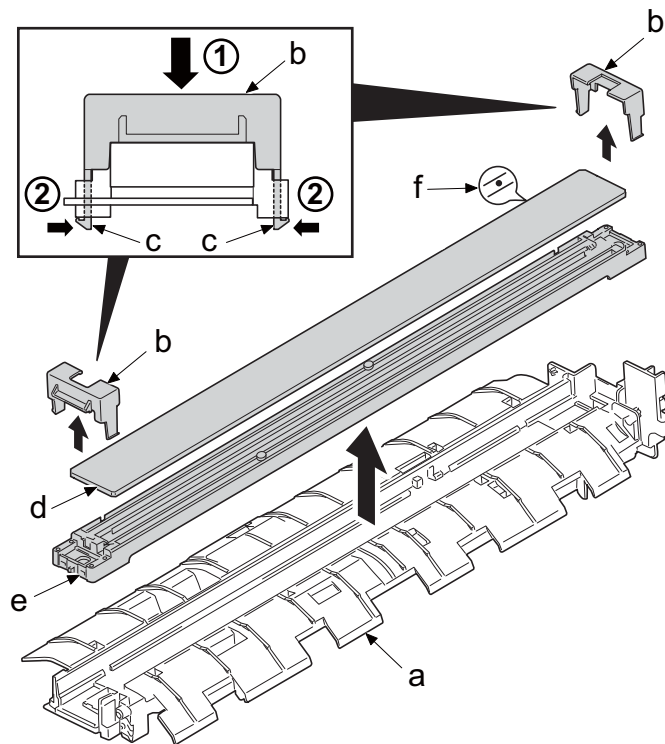
14j0507

- 5** Disconnect two connectors (b) from the DPSHD PWB (a).



14j0508

- 6 Remove the CIS unit (a) while pushing the two hooks (c) of the front and rear glass holder (b) in the direction of the arrow to unlatch them.
- 7 Detach the CIS glass (d) or CIS (e) from CIS assembly (a).



14i0509

**✔ IMPORTANT**

Check the position of black marking (f) for distinction of the surface / back side of the glass.

Also, make sure not to touch the glass surface.

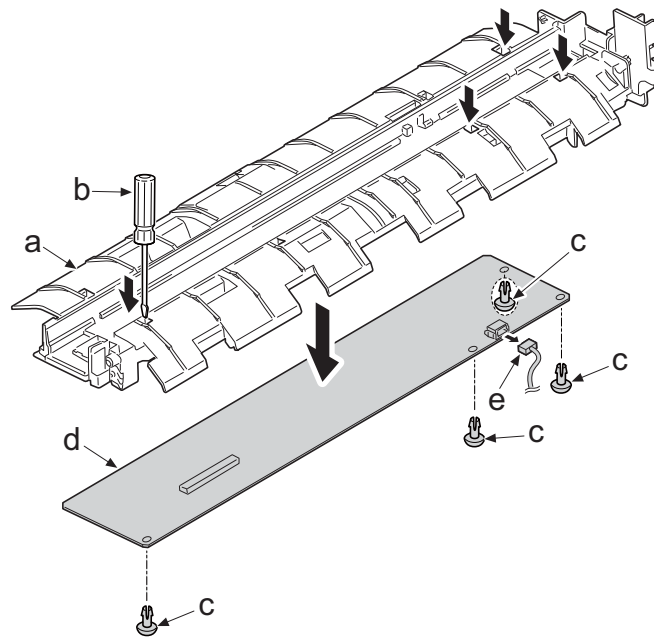
If it is dirty, wipe it off with a dry cloth.

Take care of the front and rear side when attaching the CIS glass.

Take care of the marking in the figure

Paper dust easily adheres if mistaken and it is affected when scanning originals.

- 8 Disconnect the connector (e).
- 9 Remove four pins (c) using a flat blade screwdriver (b) and remove the DPSHD PWB (d).
- 10 Replace the CIS assembly (a), and then reattach the parts in the original position.
- 11 When replacing the new CIS assembly, execute the following procedures.
- 12 Clean the CIS roller and contact glass (CIS).
- 13 Execute maintenance mode U091 (White lines correction setting). (Refer [P.6-90](#))
- 14 Make test copy with gray originals.
- 15 When white streak appears on the image of the test copy, executing step 13, 14 again, repeating till white streak disappears.
- 16 Execute maintenance mode U411 (scanner auto adjustment) (Refer [P.6-242](#))



14j0510

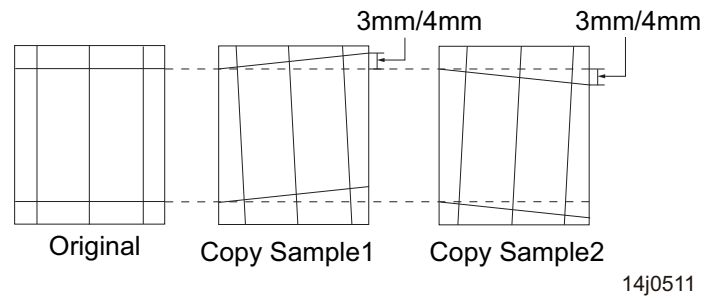
### (8-5) Adjusting the angle of leading edge

Perform the following adjustment if the leading edge of the copy image is laterally skewed.

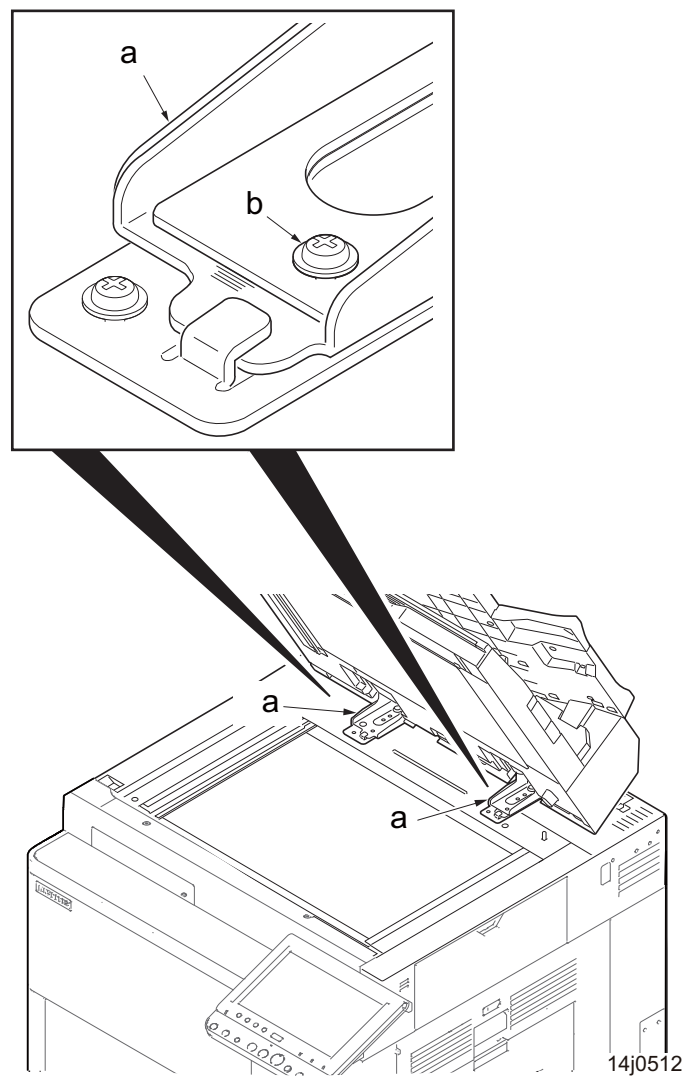
#### Procedures

- 1 Place an original on the DP and press the [start] key to make a test copy.
- 2 If the gap of leading edge exceeds the Reference value, perform the following adjustment.

Reference value For simplex copying: Within  $\pm 3.0$  mm For duplex copying: Within  $\pm 4.0$  mm



**3 Loosen two screws (b) of right and left fixing fittings (a).**



**4 Remove the right hinge cover (a).**

**5 Turn the adjusting screw (b) at the rear side of the right hinge to adjust the DP position.**

**For copy example 1**

Turn the adjusting screw counterclockwise and move the DP to the rear side

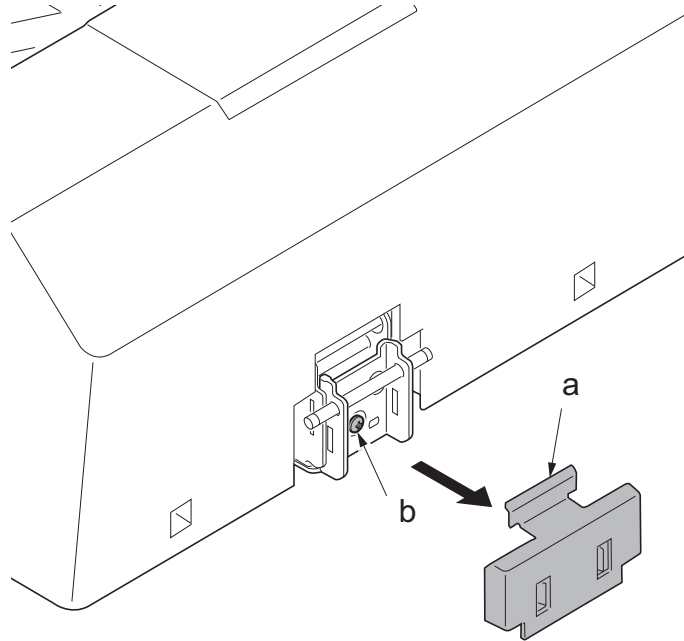
**For copy example 2:**

Turn the adjusting screw clockwise and move the DP to the front side.

Amount of change per scale: Approx. 1 mm

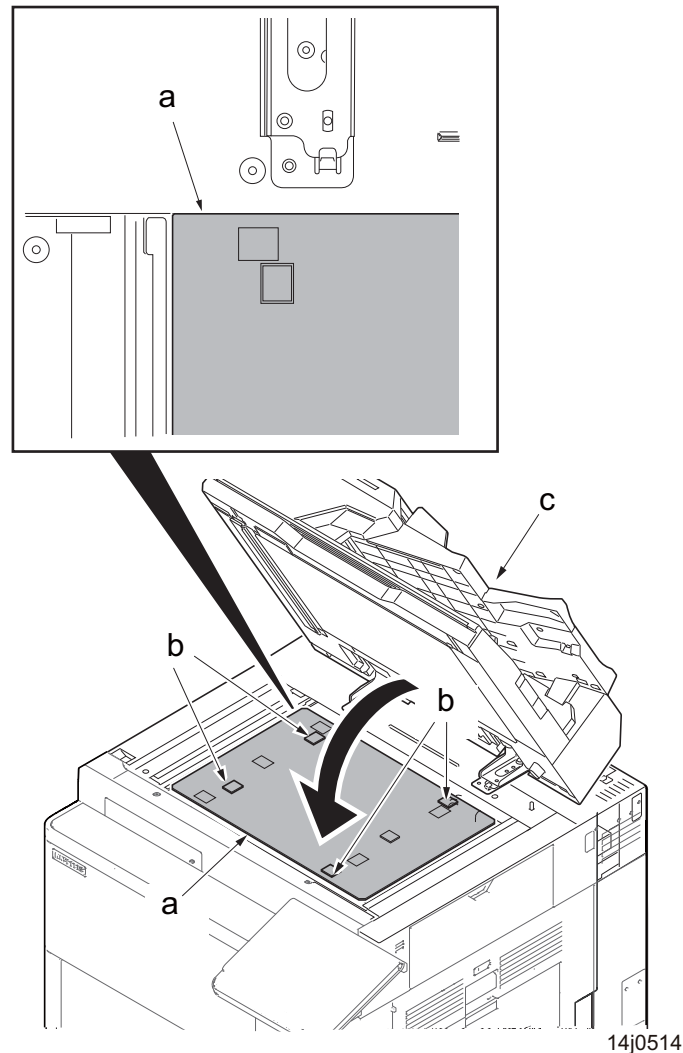


- 6 **Make a test copy.**
- 7 **Repeat the steps above until the gap of the leading edge falls within the Reference values.**
- 8 **After adjustment is completed, retighten two screws that have been loosened in step 3.**



14j0513

- 9 Remove the original mat (a).
- 10 Place original mat (a) with its Velcro (b) upward over the contact glass.
- 11 Align original mat corner that has 90 degrees of angle with the rear left corner of the original instruction panel.
- 12 Close the DP (c) and attach the original mat (a) onto DP (c) with Velcro.



### (8-6) Adjusting the angle of trailing edge

Perform the following adjustment if the trailing edge of the copy image is laterally skewed.

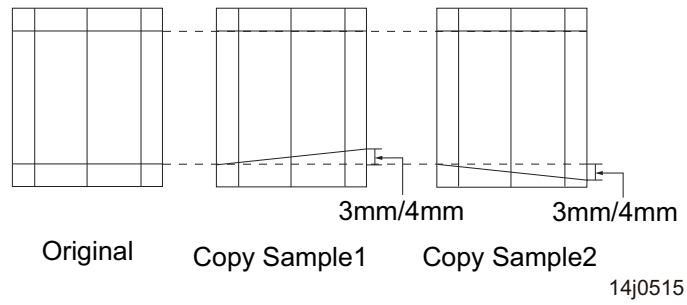
#### Procedures

- 1 Place an original on the DP and press the [start] key to make a test copy.
- 2 If the gap of trailing edge exceeds the Reference value, perform the following adjustment.

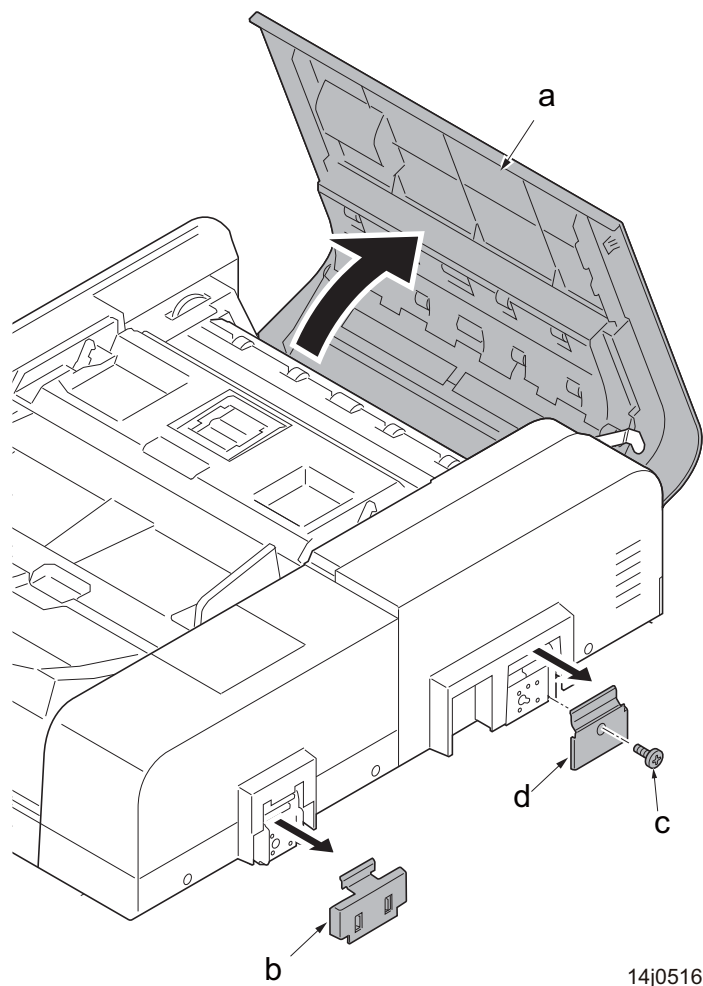
#### Reference value

For simplex copying: Within  $\pm 3.0$  mm

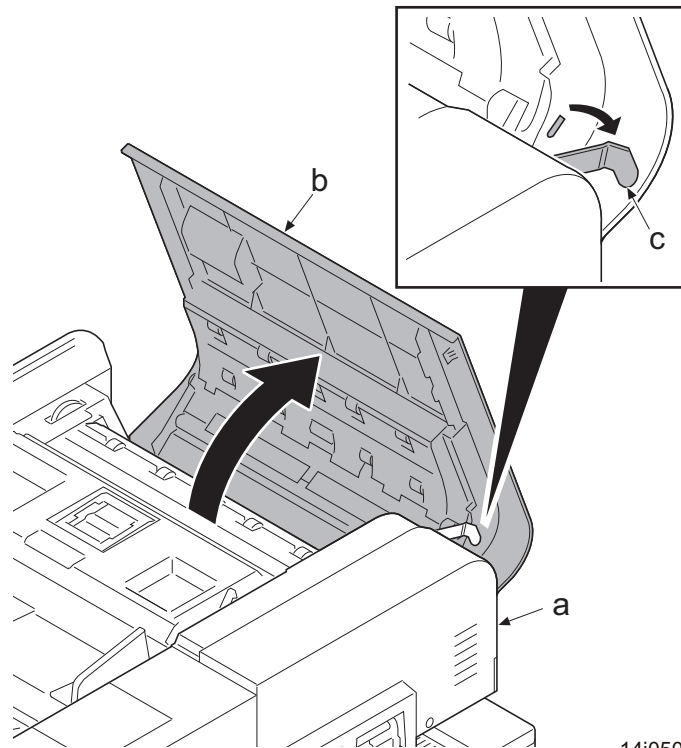
For duplex copying: Within  $\pm 4.0$  mm



- 3 Open the DP upper cover (a).
- 4 Remove the right hinge cover (b).
- 5 Remove the screw (c) and then remove the left hinge cover (d).

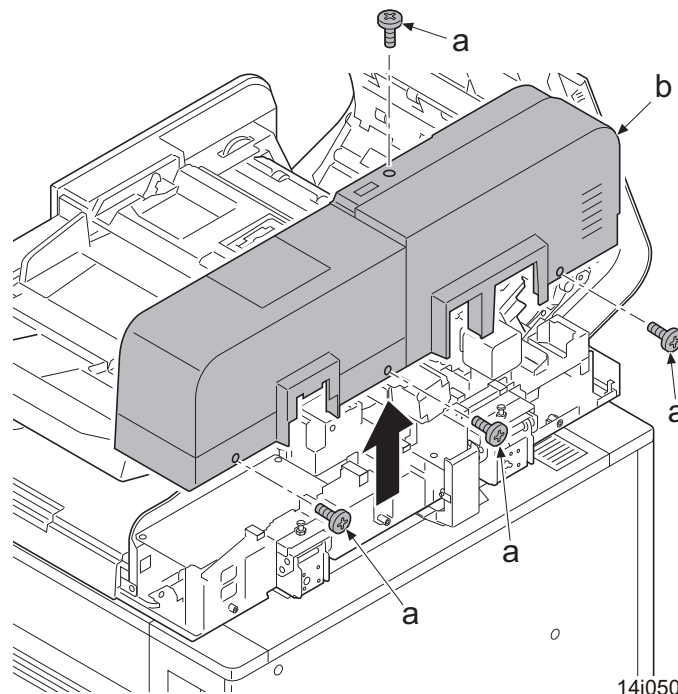


- 6 Open the DP top cover (b) of the document processor (a).
- 7 Remove the strap (c) from DP top cover.



14j0504

- 8 Remove four screws (a)(M3x8) and detach the DP rear cover (b).



14j0505

## Adjust the height of DP.

- 1 Loosen the nut (a).

**For copy example 1:**

Loosen the adjusting screw (b).

**For copy example 2:**

Tighten the adjusting screw (b).

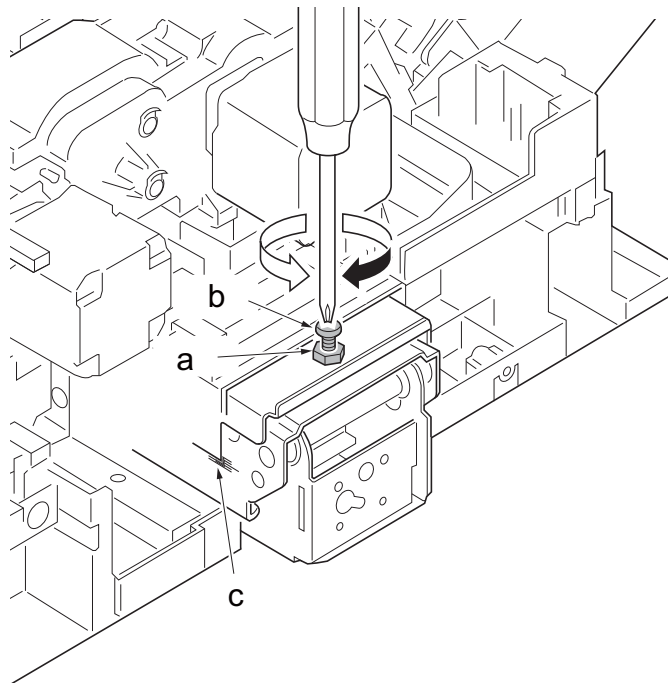
**scale (c)**

Amount of change per: Approx. 0.5 mm

- 2 Retighten the nut (a).

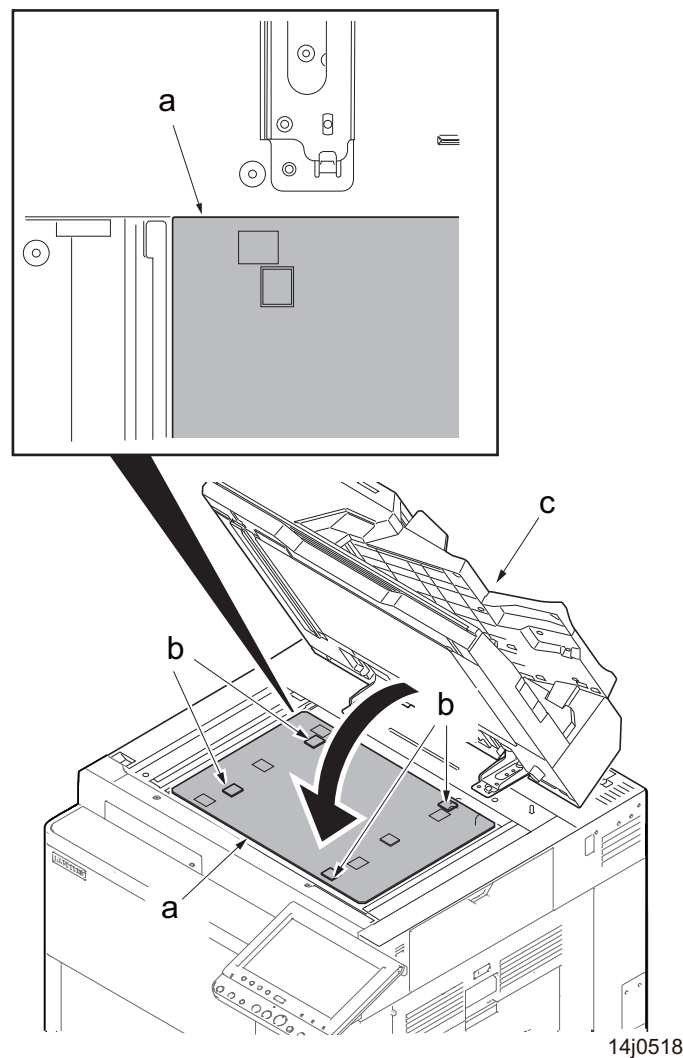
## 9 Reattach the DP rear cover in the original position.

## 10 Reattach the right hinge cover and left hinge cover in the original position.



14j0517

- 11 Open the document processor.
- 12 Remove the original mat (a).
- 13 Place original mat (a) with its Velcro (b) upward over the contact glass.
- 14 Align original mat corner that has 90 degrees of angle with the rear left corner of the original instruction panel.
- 15 Close the DP (c) and attach the original mat (a) onto DP (c) with Velcro.
- 16 Make a test copy again.
- 17 Repeat the steps 1 to 16 until the gap of the trailing edge falls within the Reference values.

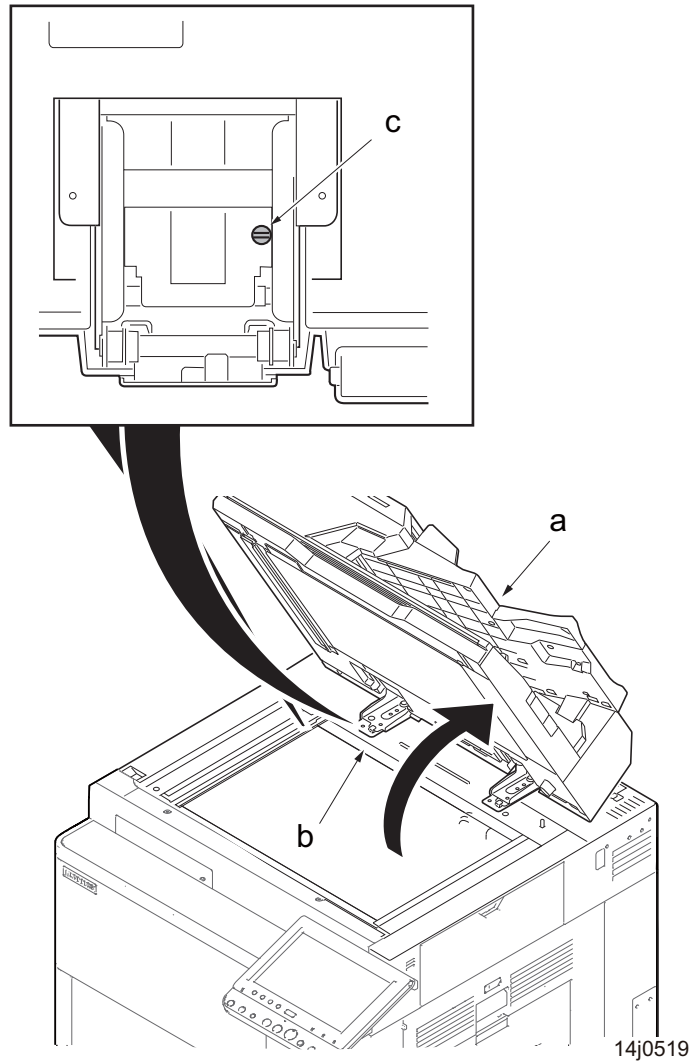


### (8-7) Adjusting the hinge

Perform this adjustment when the DP trails down when it is open.

## Procedures

- 1 Open the document processor (a).
- 2 Rotate the adjusting screws (c) at the front of the left hinge (b) using a flat blade screwdriver so that the DP won't trail down.
- 3 Close the document processor (a) after adjustment was done.



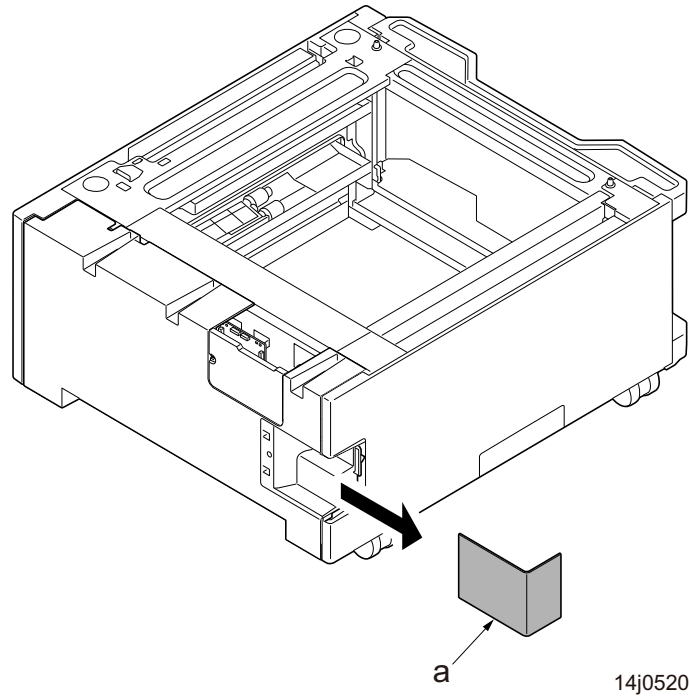
## 4 - 7 Disassembly & Reassembly (option)

### (1) Paper feeder (PF-730(B))

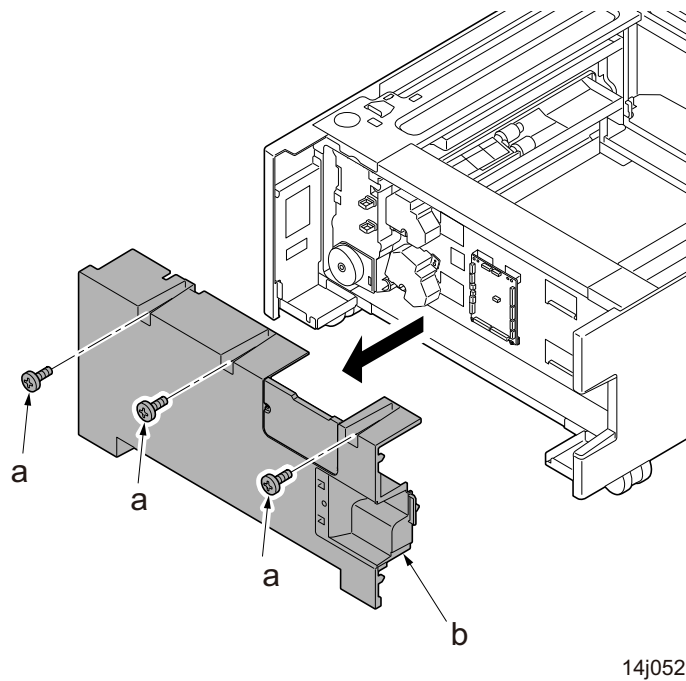
#### (1-1) Detaching and reattaching the PF main PWB

#### Procedures

- 1 Detach the wire cover (a).

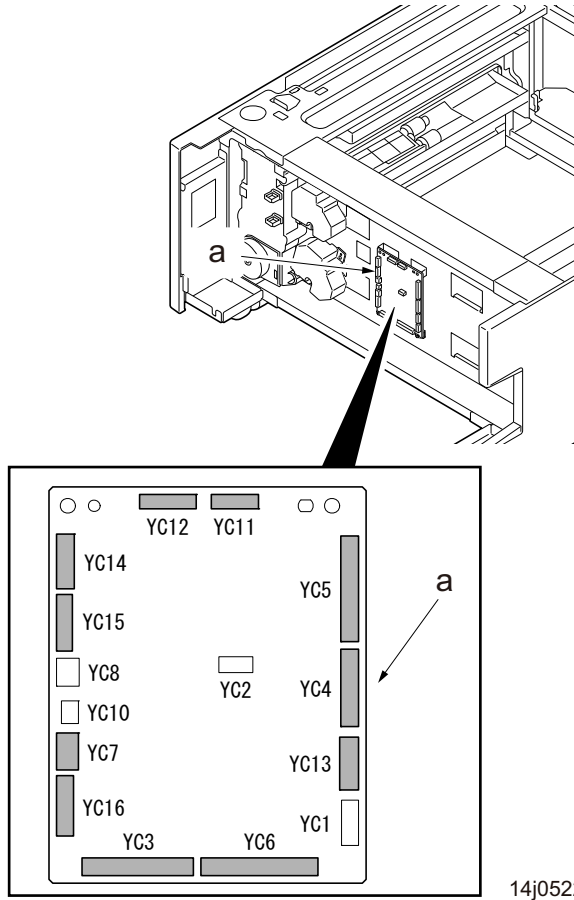


- 2 Remove three screws (a)(M4x8) and remove the rear cover (b).

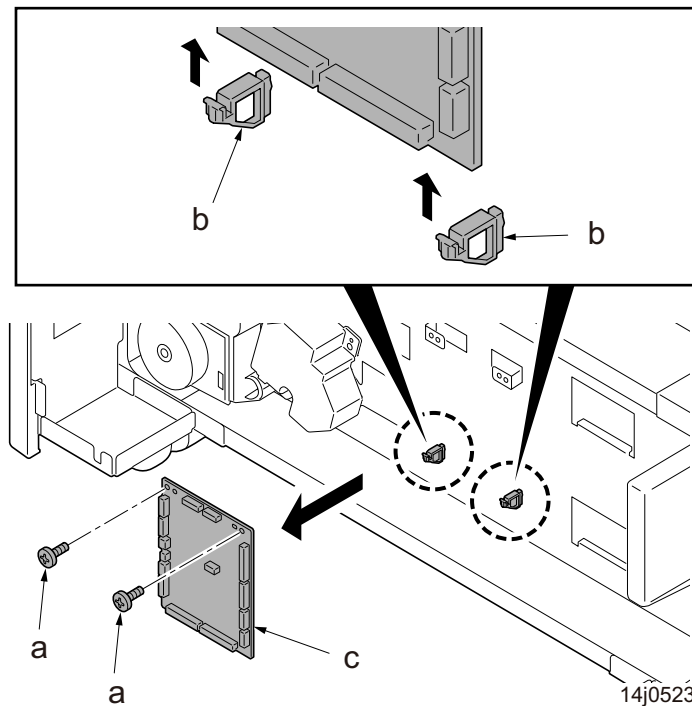




**3 Disconnect all the connectors from the PF main PWB (a).**

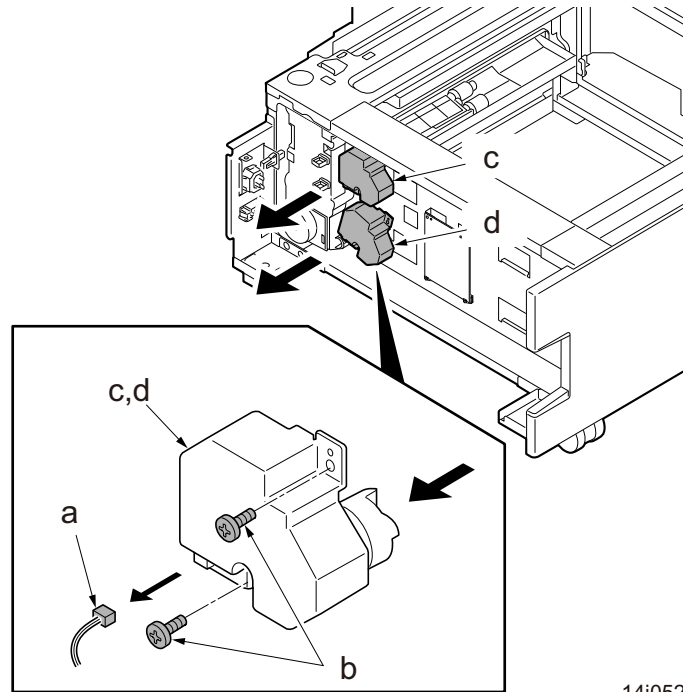


- 4 Remove two screws (a)(M3x8) and remove the PF main PWB (c) from two holders (b).**
- 5 Check or replace the PF main PWB (c) and then reattach the parts in the original position.**



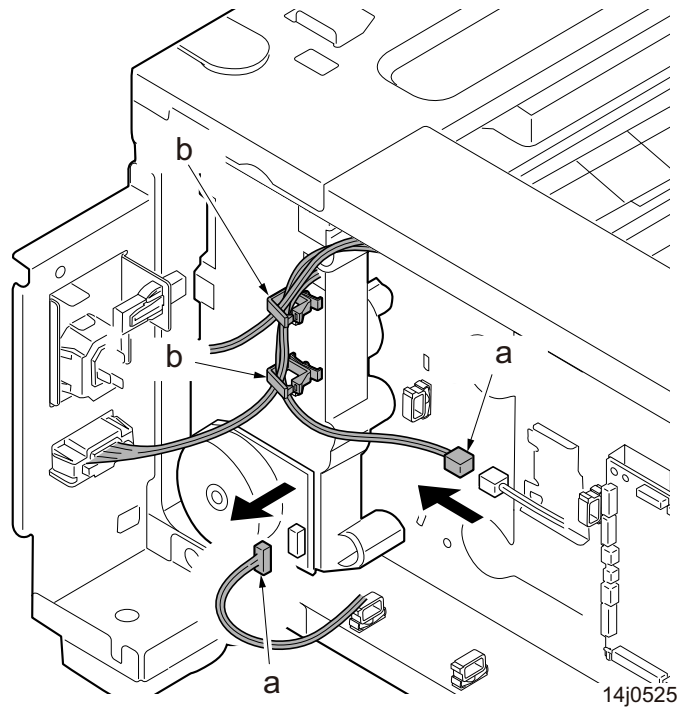
**(1-2) Detaching and reattaching the PF drive unit****Procedures**

- 1** Remove the rear cover.
- 2** Remove the right cover.
- 3** Disconnect each the connector (a).
- 4** Remove each two screws (b)(M3x8) and then remove the PF lift motor 1 (c) and the PF lift motor 2 (d).

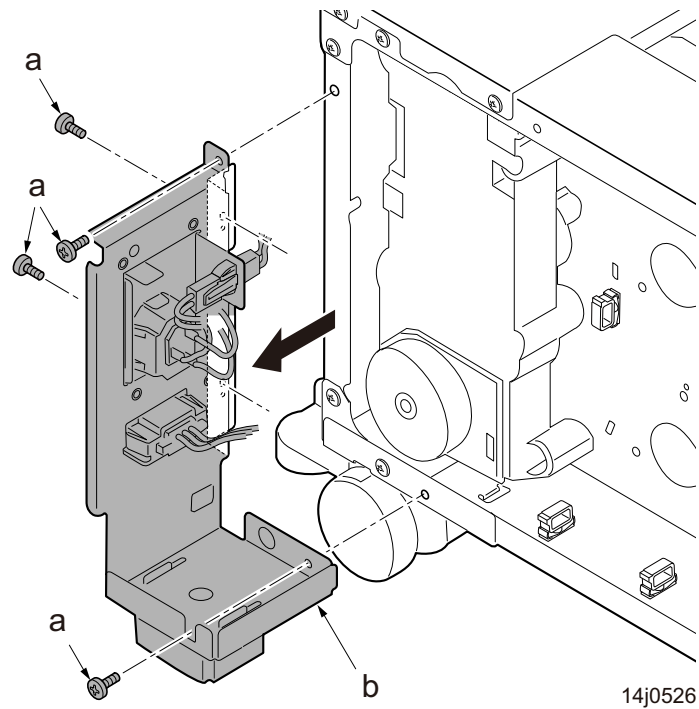


14j0524

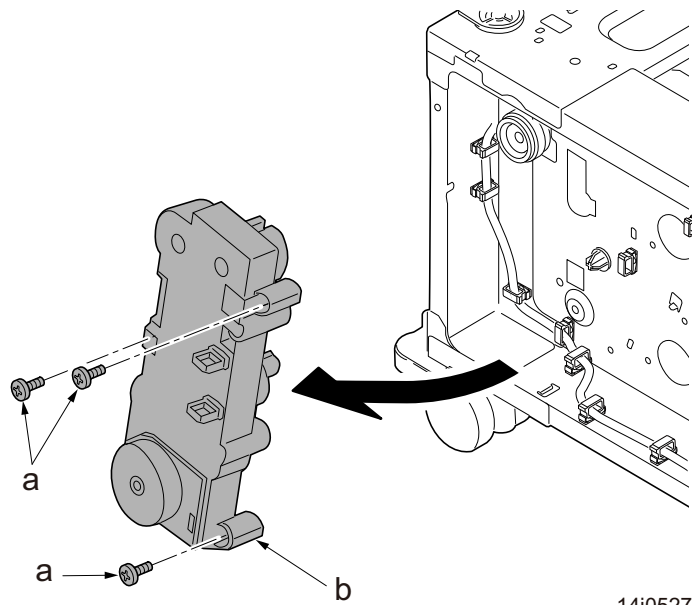
- 5 Disconnect two connectors (a).
- 6 Release two wire saddles (b) and remove the wire.



- 7 Remove four screws (a)(M4x8) and remove the connector mounting plate (b).



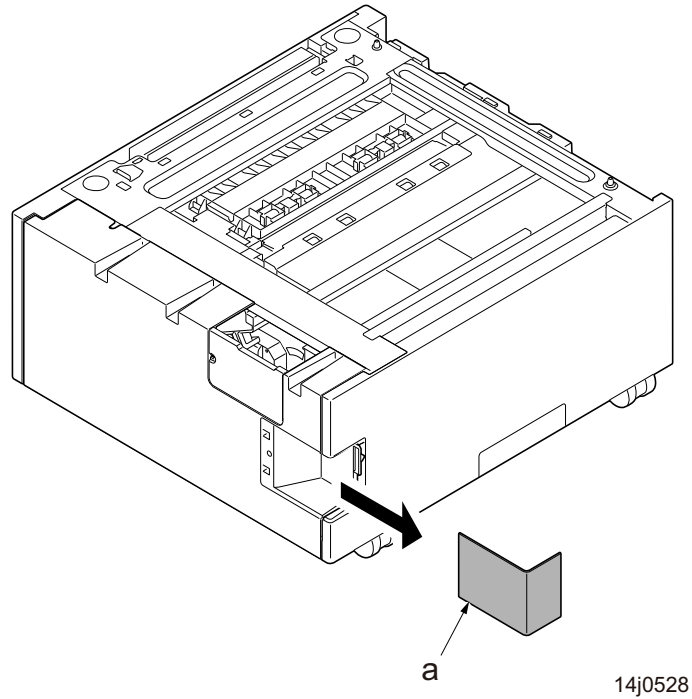
- 8 Remove three screws (a)(M4x8) and then remove the PF drive unit (b) while pulling lower side.
- 9 Check or replace the lift motor and PF drive unit and then reattach the parts in the original position.



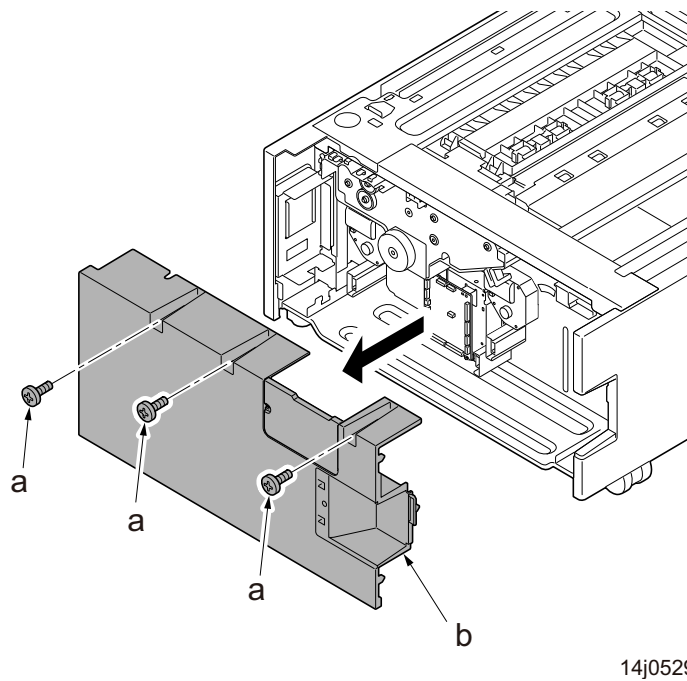
14j0527

**(2) Paper feeder (PF-740(B))****(2-1) Detaching and reattaching the PF main PWB****Procedures**

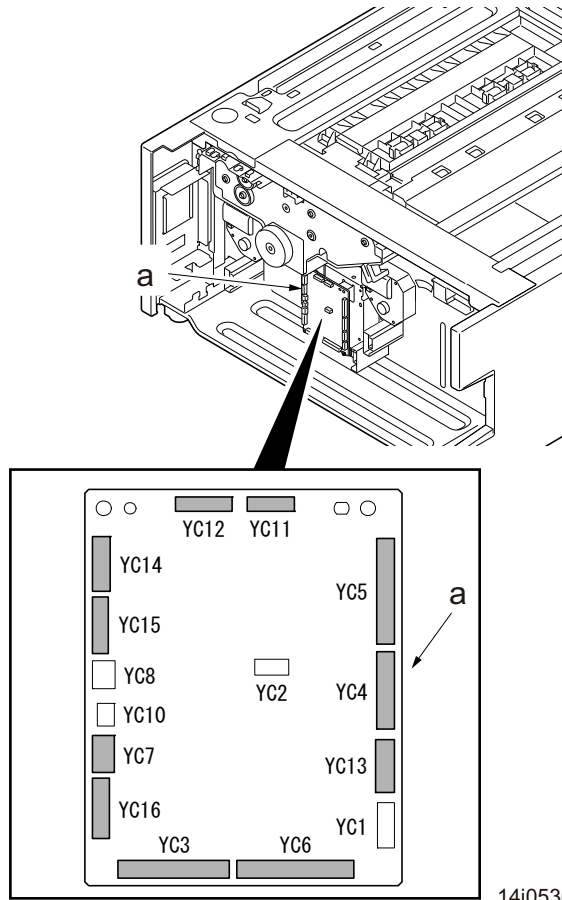
- 1 Detach the wire cover (a).**



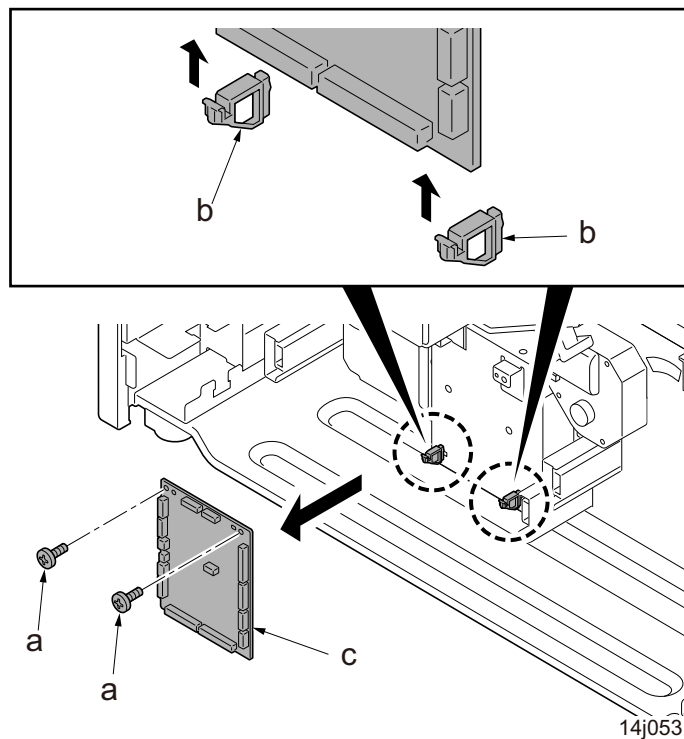
- 2 Remove three screws and remove the rear cover.**



**3 Disconnect all the connectors from the PF main PWB (a).**

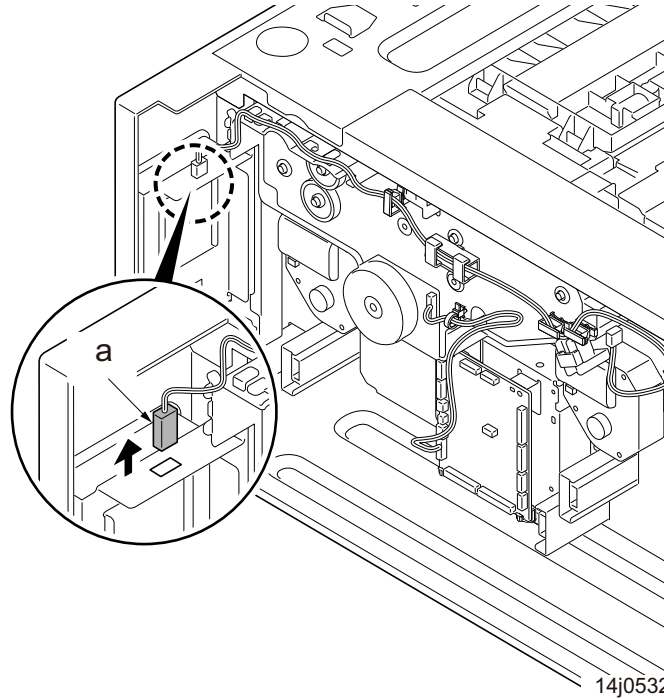


- 4 Remove two screws (a)(M3x8) and remove the PF main PWB (c) from two holders (b).**
- 5 Check or replace the PF main PWB (c) and then reattach the parts in the original position.**

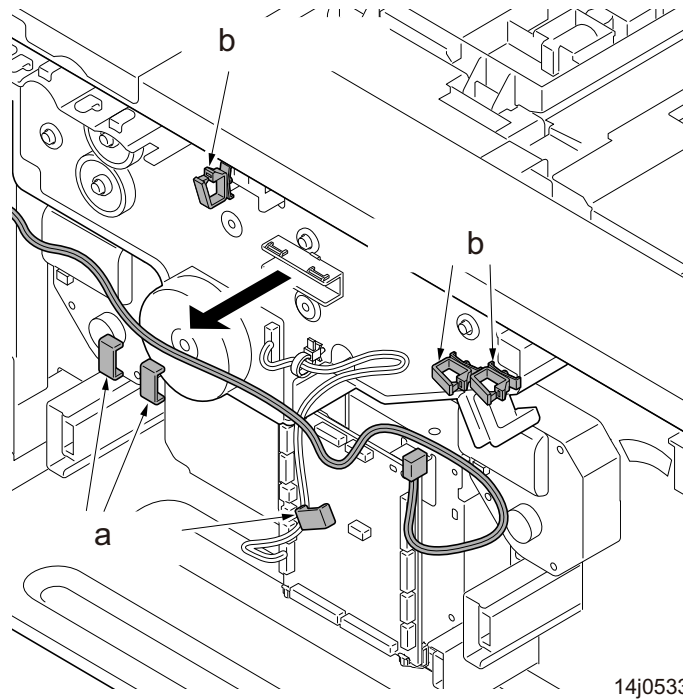


**(2-2) Detaching and reattaching the PF drive unit****Procedures**

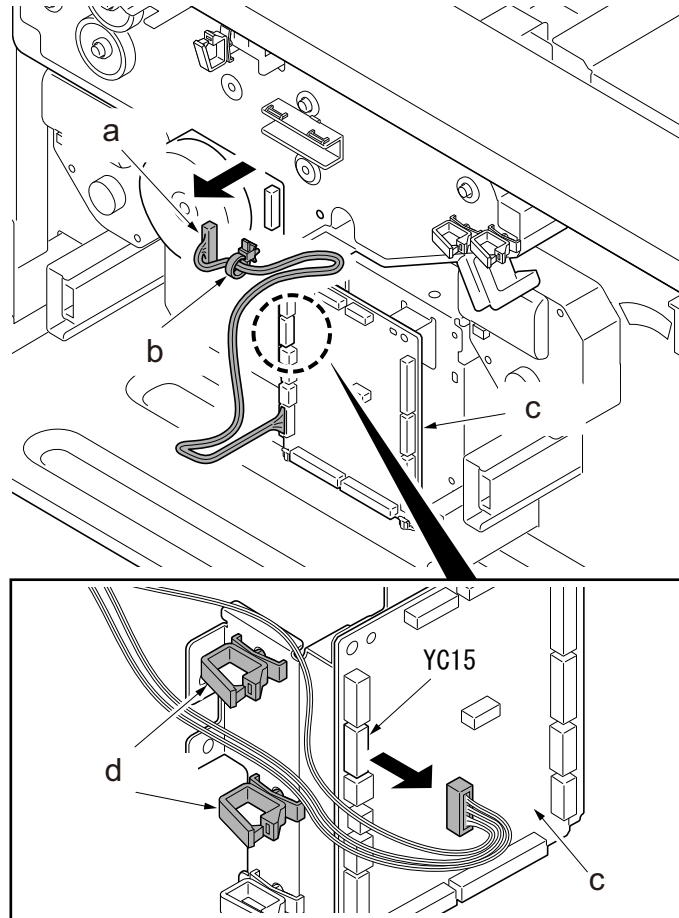
- 1 Remove the rear cover.**
- 2 Remove one end of AC wire connector (a) from the paper feeder.**



- 3 Remove three wire holders (a).**
- 4 Release three wire saddles (b) and remove the wire.**

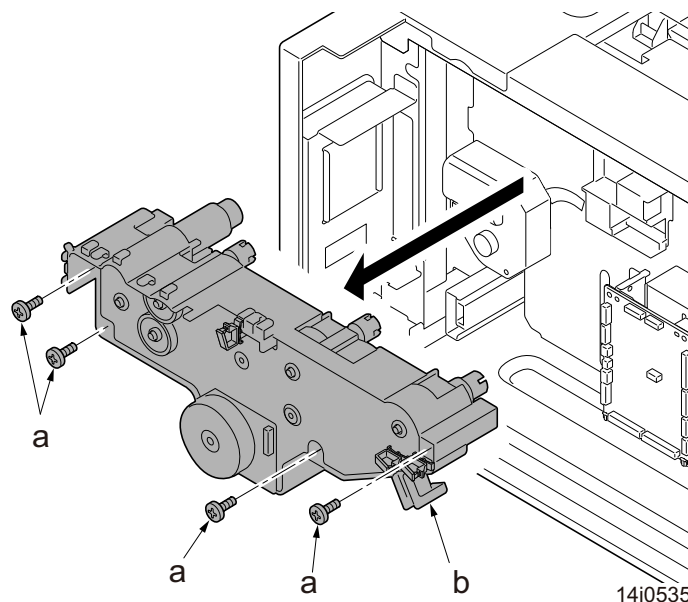


- 5 Remove the connector (a) and the band (b) of the PF paper feed motor.
- 6 Remove the connector (YC15) from the PF main PWB (c) and then release the wire from two wire saddles (d).



14j0534

- 7 Remove four screws (a)(M3x8) and remove the PF drive unit (b).
- 8 Check or replace the PF drive unit (b) and then reattach the parts in the original position.

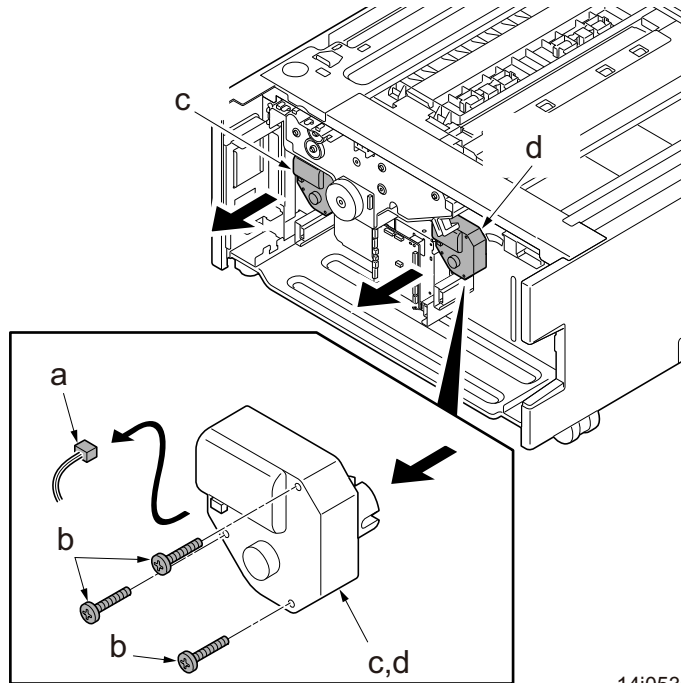


14j0535



**(2-3) Detaching and reattaching the PF lift motor****Procedures**

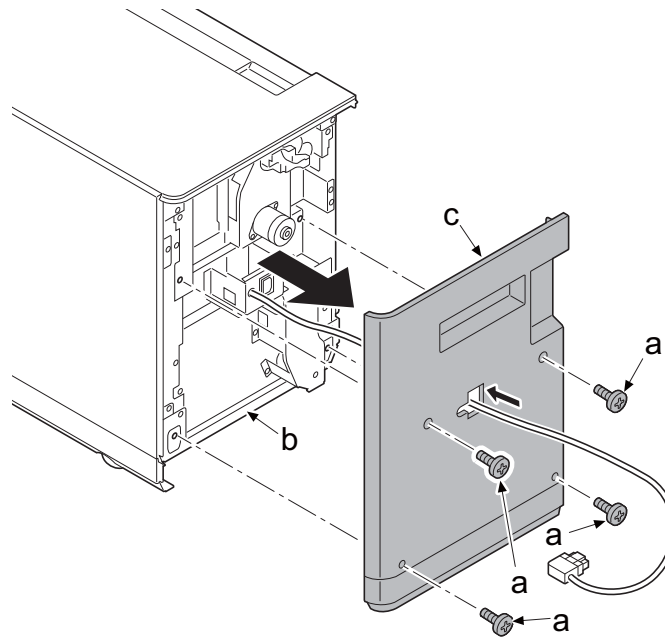
- 1** Remove the rear cover.
- 2** Disconnect each the connector (a).
- 3** Remove each two screws (b)(M3x8) and then remove the PF lift motor 1 (c) and the PF lift motor 2 (d).
- 4** Check or replace the PF lift motor and then reattach the parts in the original position.



14j0536

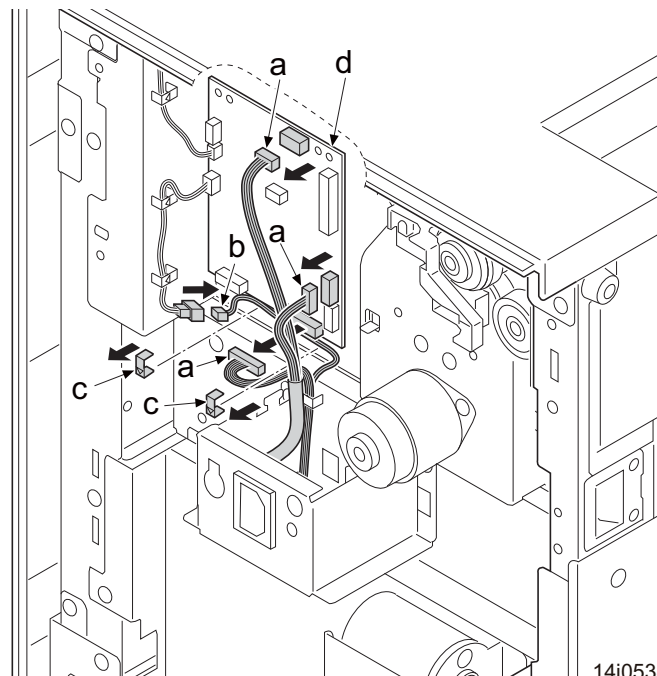
**(3)Side feeder (PF-7120)****(3-1)Detaching and reattaching the PF drive unit****Procedures**

- 1** Remove four screws (a)(M4x8).
- 2** Remove PF rear cover (c) from the paper feed unit (b).



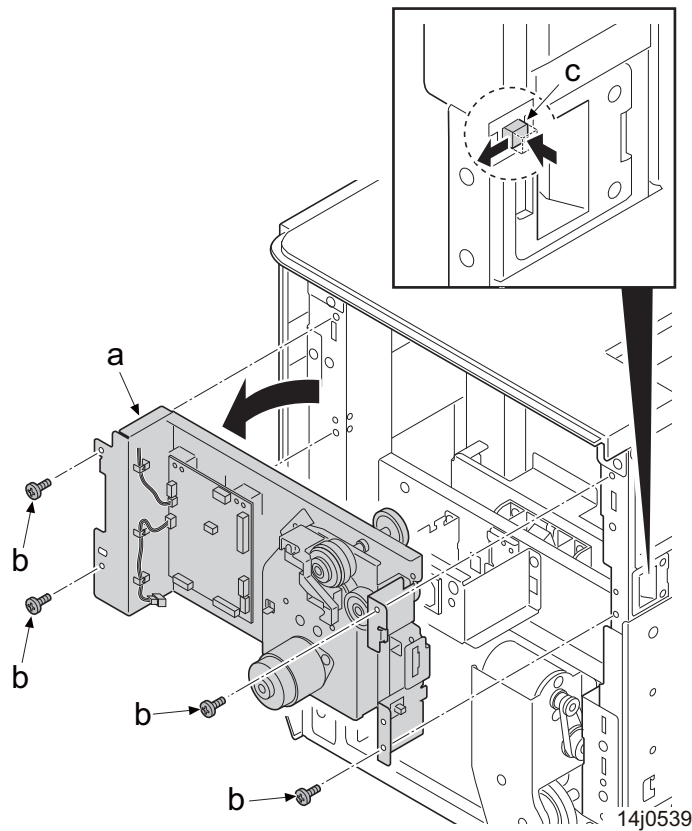
14i0537

- 3** Disconnect the three connectors (a) and the connector (b) from the PF main PWB (d).
- 4** Remove two wire stoppers (c) and remove the wire.



14j0538

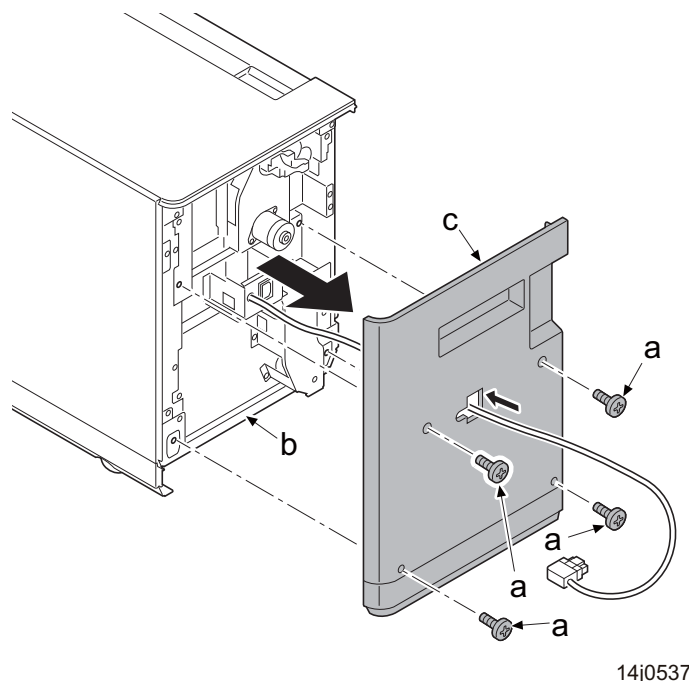
- 5** Remove four screws (b) (M3x8) and detach the PF drive unit (a) from the main unit while pushing in the switch lever (c).



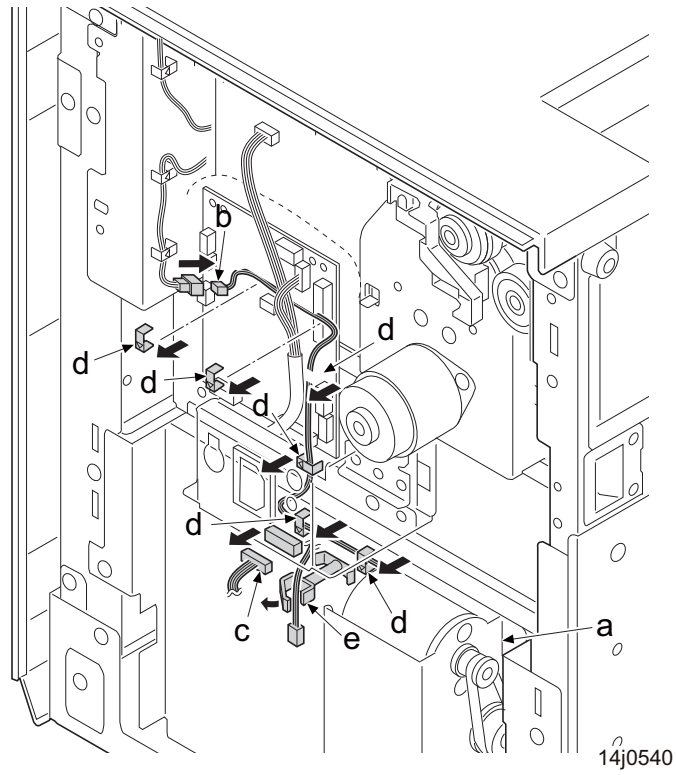
### (3-2) Detaching and reattaching the PF lift motor

#### Procedures

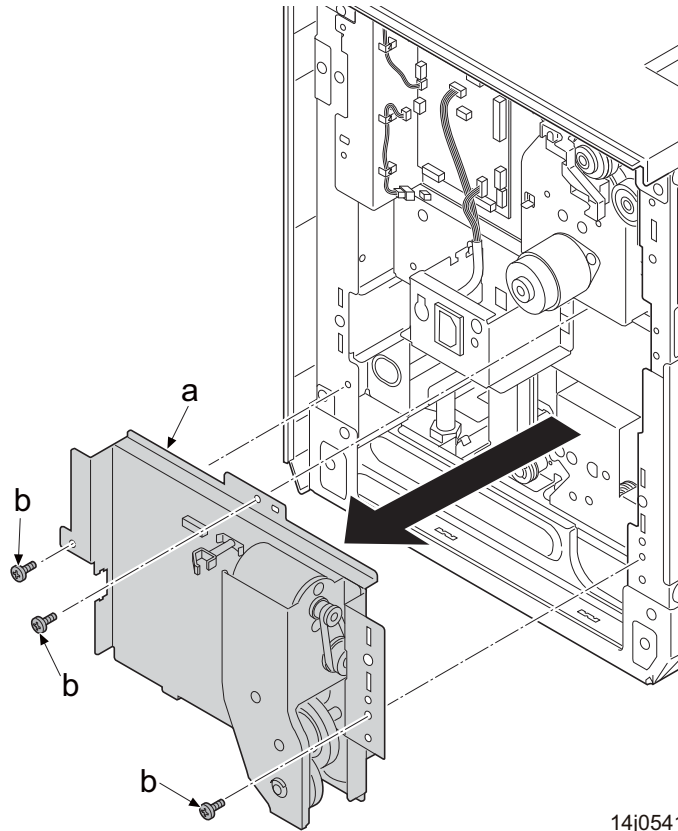
- 1** Remove four screws (a) (M3x8).
- 2** Remove PF rear cover (c) from the paper feed unit (b).



- 3 Release six wire stoppers (d) and one cable lamp, and then remove the wire of PF lift motor (a).
- 4 Disconnect the connector (b) and the connector (c).



- 5 Remove three screws (b)(M3x8) and detach the PF lift motor (a).
- 6 Check or replace the PF lift motor unit (a), and then reattach the parts in the original position.

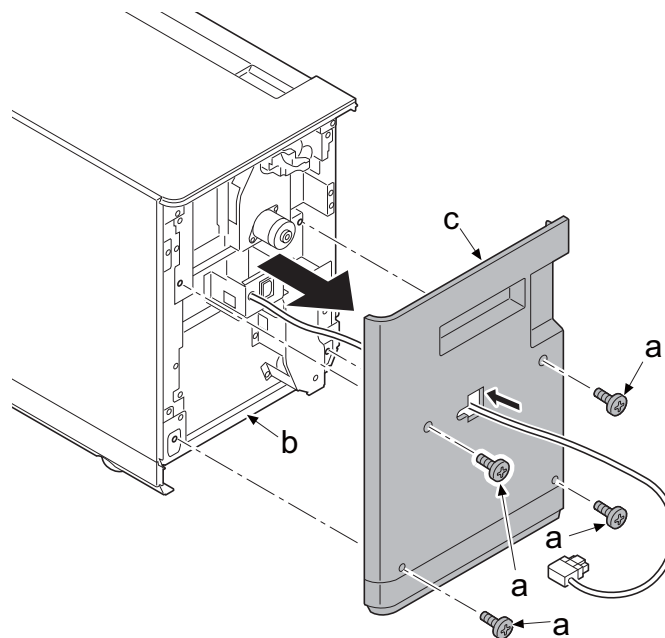


14j0541

### (3-3) Detaching and reattaching the PF main PWB

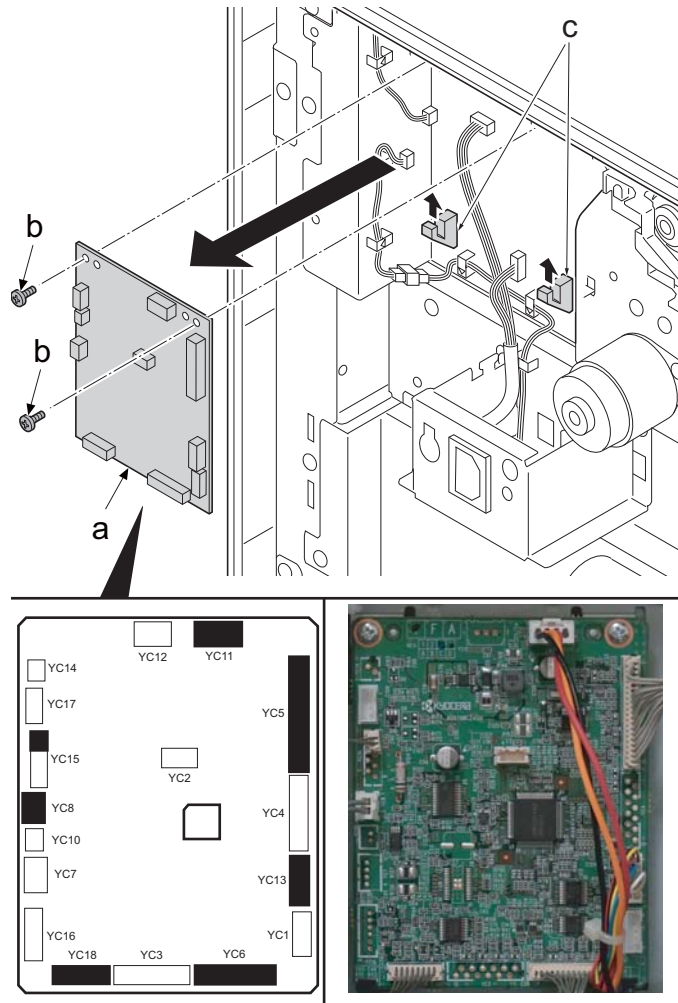
#### Procedures

- 1 Remove four screws (a)(M3x8).
- 2 Remove PF rear cover (c) from the paper feed unit (b).



14j0537

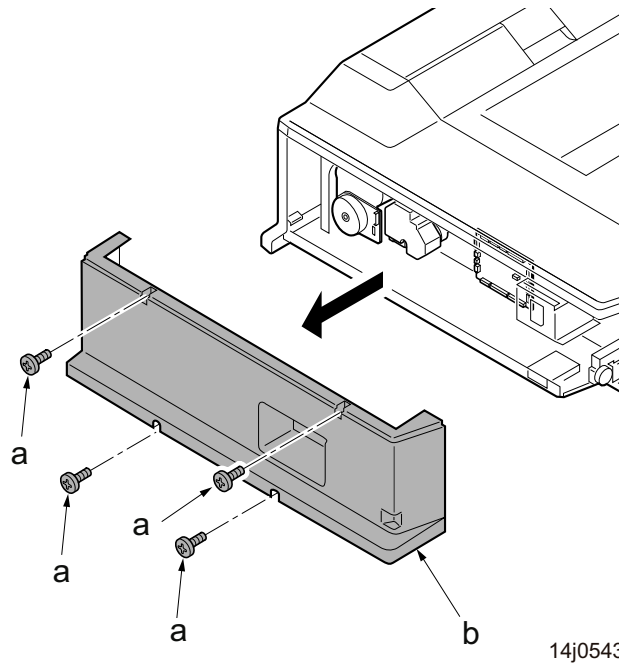
- 3 Disconnect all the connectors from the PF main PWB (a).
- 4 Remove two screws (b)(M3x8).
- 5 Remove the PF main PWB (a) from two hooks (c).
- 6 Check or replace the PF main PWB (a), and then reattach the parts in the original position.



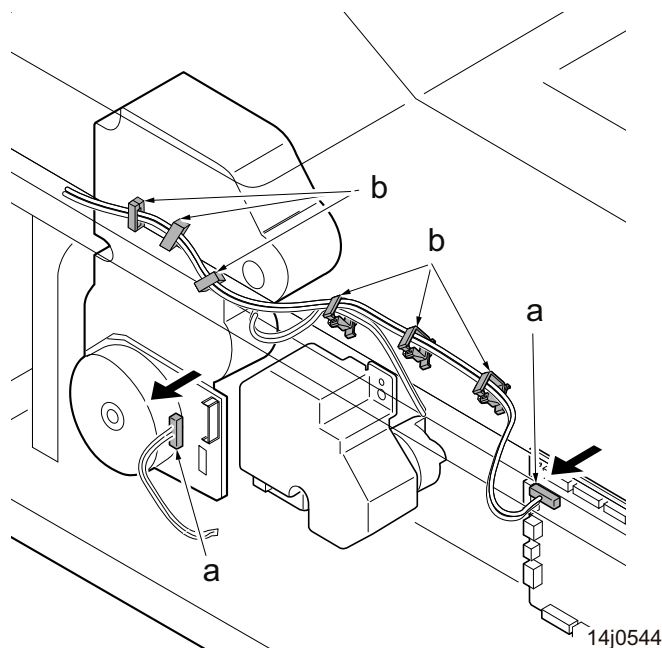
14j0542

**(4)Side Multi Feeder (PF-7130)****(4-1)Detaching and reattaching the PF drive unit****Procedures**

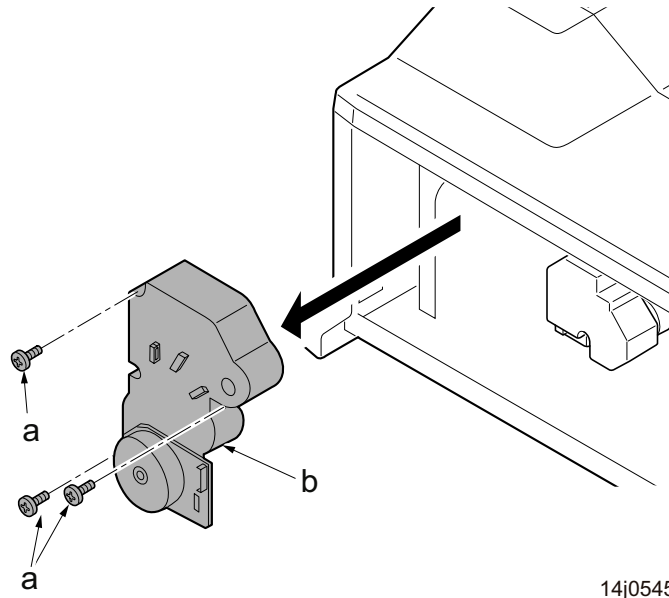
- 1 Remove four screws (a)(M4x8) and remove the rear cover.**



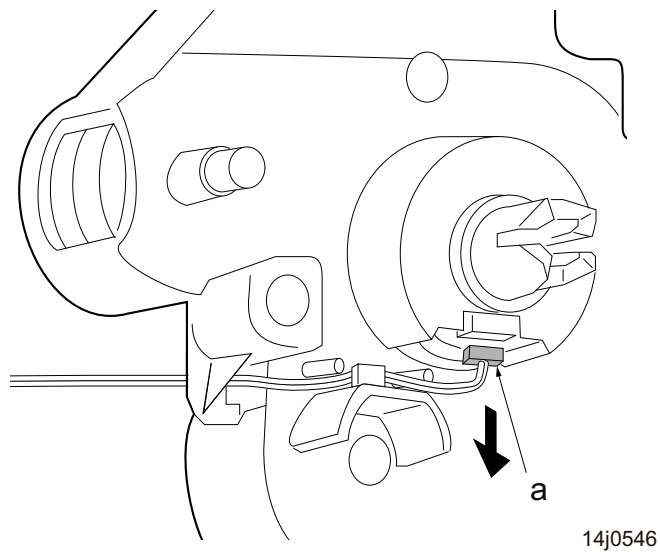
- 2 Disconnect two connectors (a).**
- 3 Release six wire saddles (b) and remove the wire.**



- 4 Remove three screws (a)(M4x8) and remove the PF drive unit (b).**



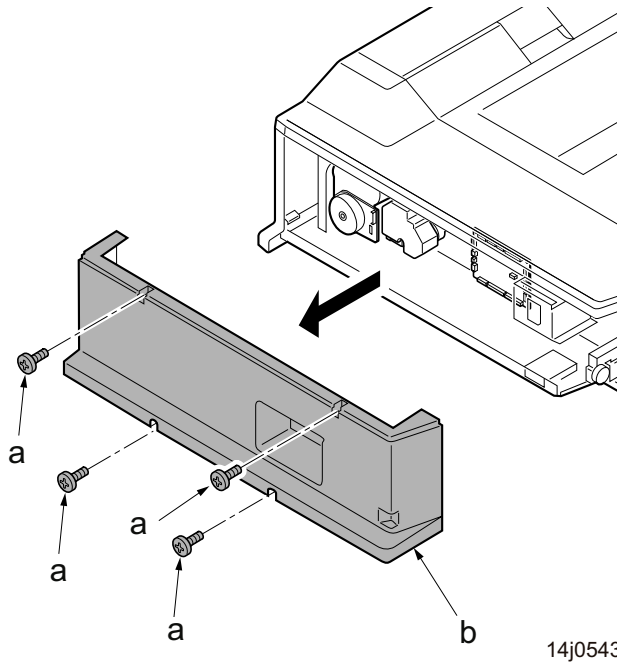
- 5 Disconnect the connector (a).**
- 6 Check or replace the PF drive unit and then reattach the parts in the original position.**



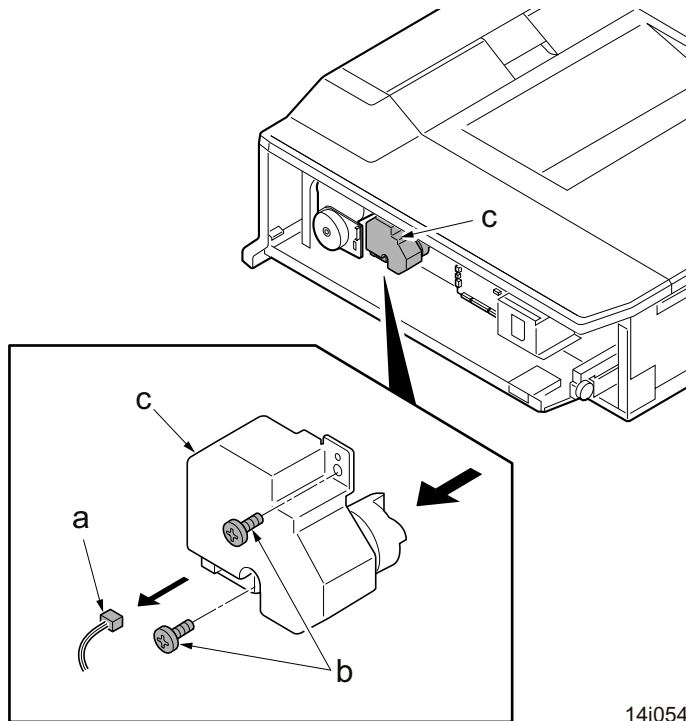


**(4-2) Detaching and reattaching the lift motor****Procedures**

- 1 Remove four screws (a)(M4x8) and remove the rear cover.**

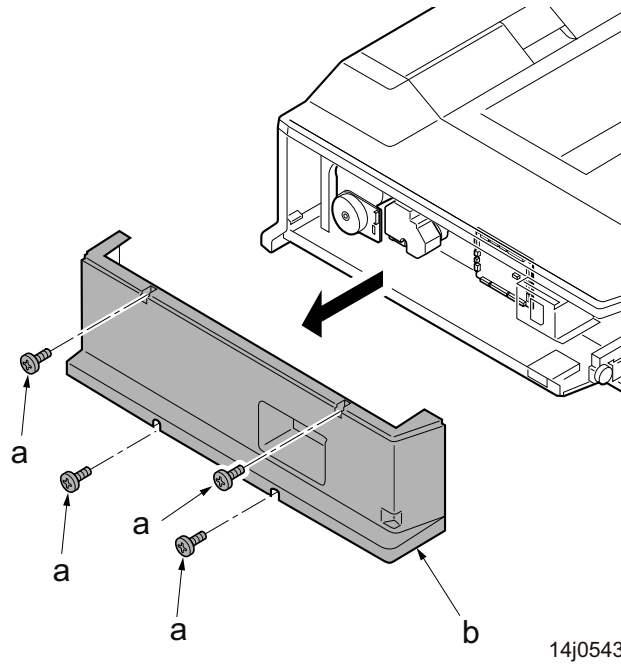


- 2 Disconnect the connector (a).**
- 3 Remove two screws (b)(M4x8) and remove the Pf lift motor (c).**
- 4 Check or replace the PF lift motor (c) and then reattach the parts in the original position.**

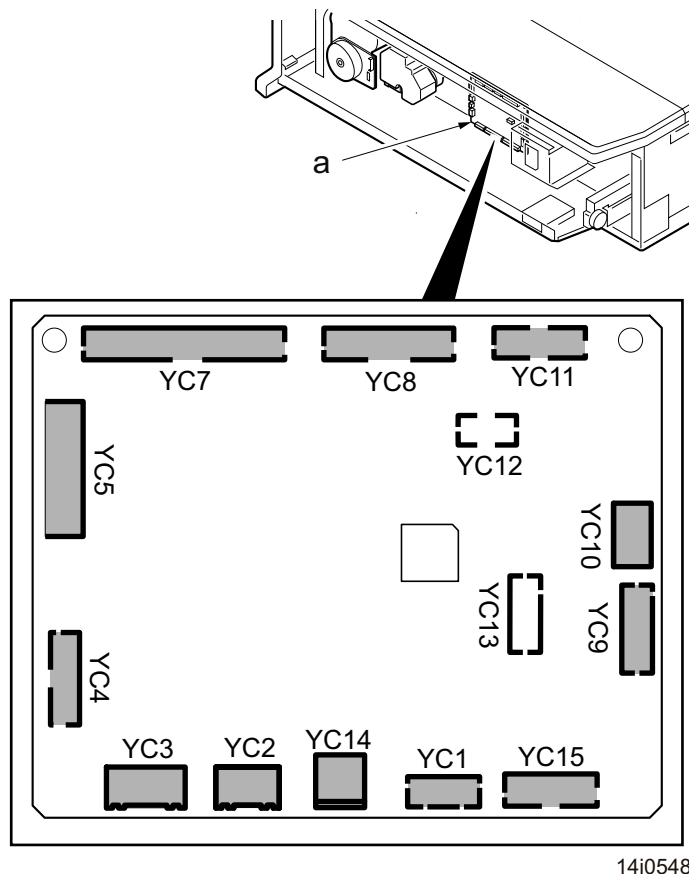


**(4-3) Detaching and reattaching the PF main PWB****Procedures**

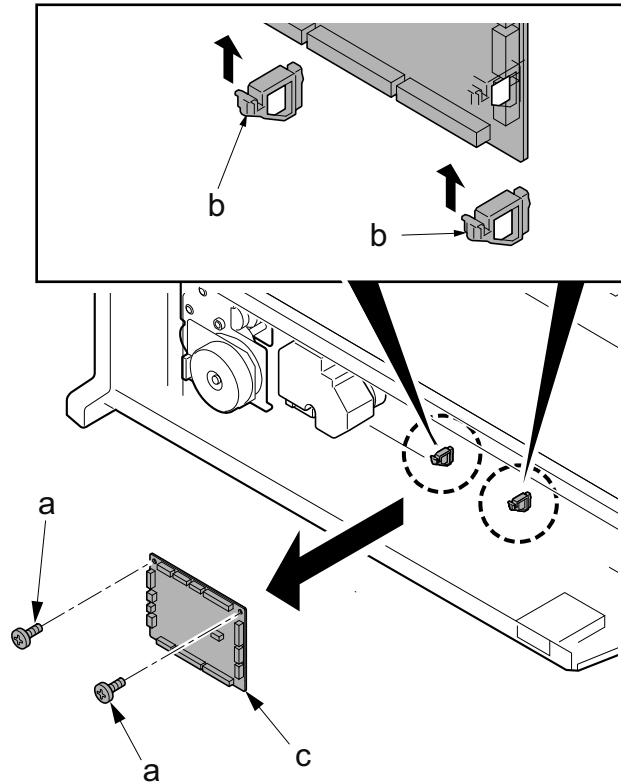
- 1 Remove four screws (a)(M4x8) and remove the rear cover.



- 2 Disconnect all the connectors from the PF main PWB (a).



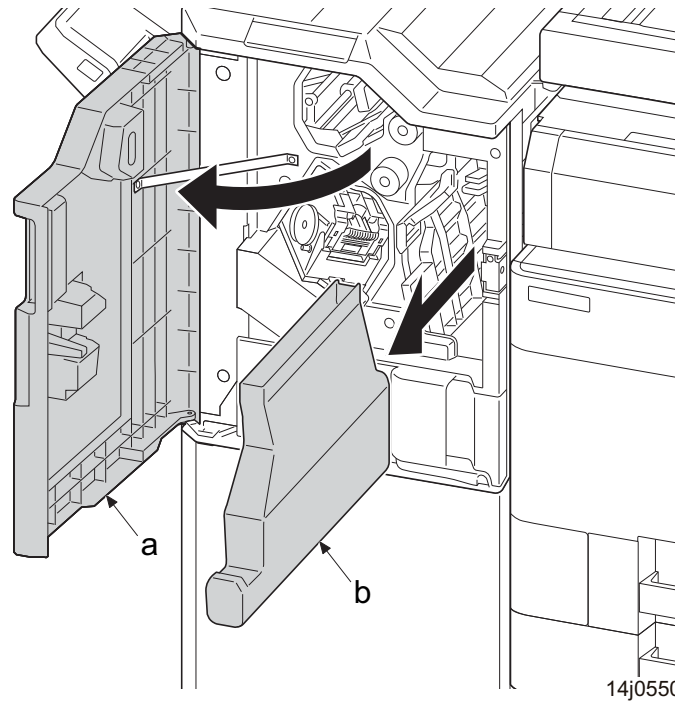
- 3 Remove two screws (a)(M3x8) and remove the PF main PWB (c) from two holders (b).
- 4 Check or replace the PF main PWB (c) and then reattach the parts in the original position.



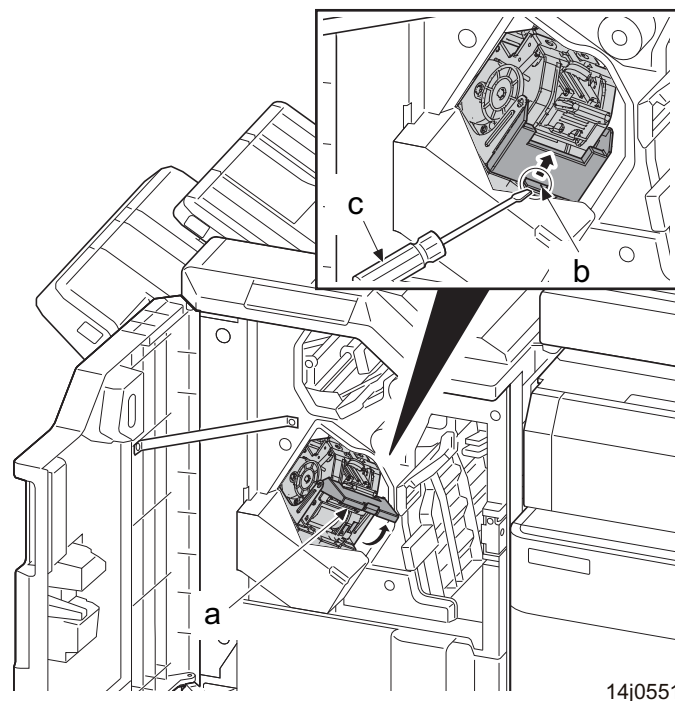
14j0549

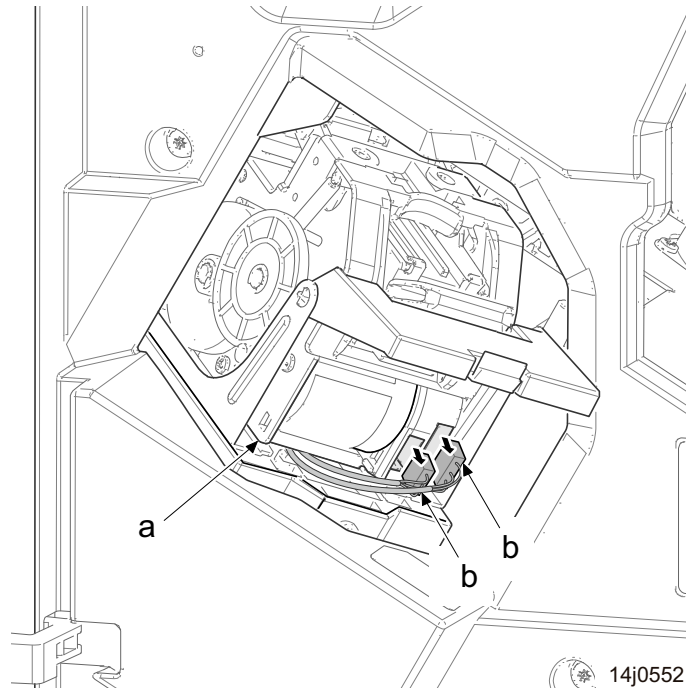
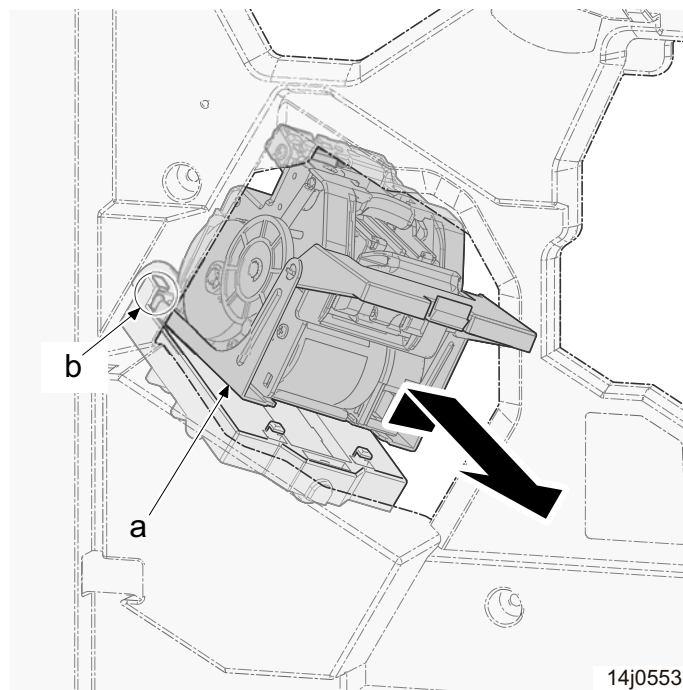
**(5)4000-sheet Finisher (DF-7110)****(5-1)Detaching and reattaching the staple unit****Procedures**

- 1** Open the DF front cover (a).
- 2** Pull out the waste toner box (b) and then remove it.



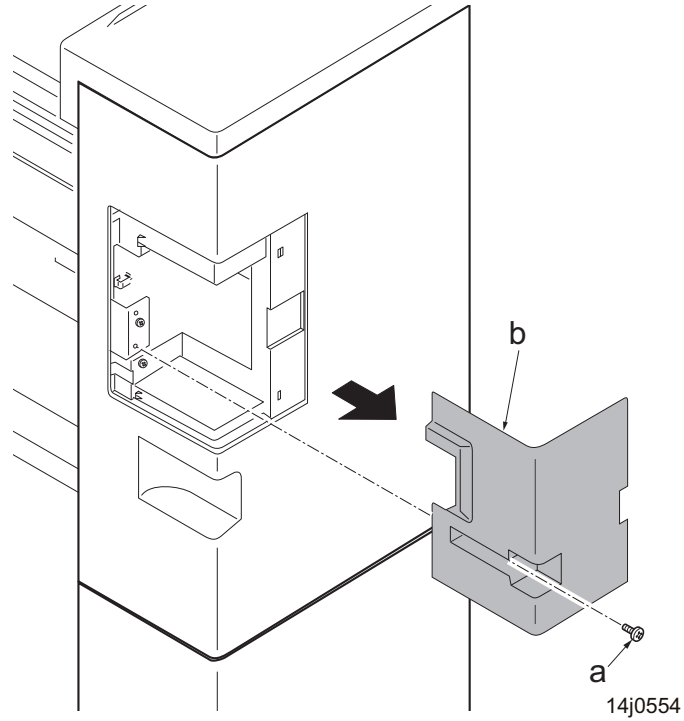
- 3** Insert a flat blade screwdriver (c) under the lever (b) of the staple cover (a) and lift it up to release the lock and open the staple cover (a).



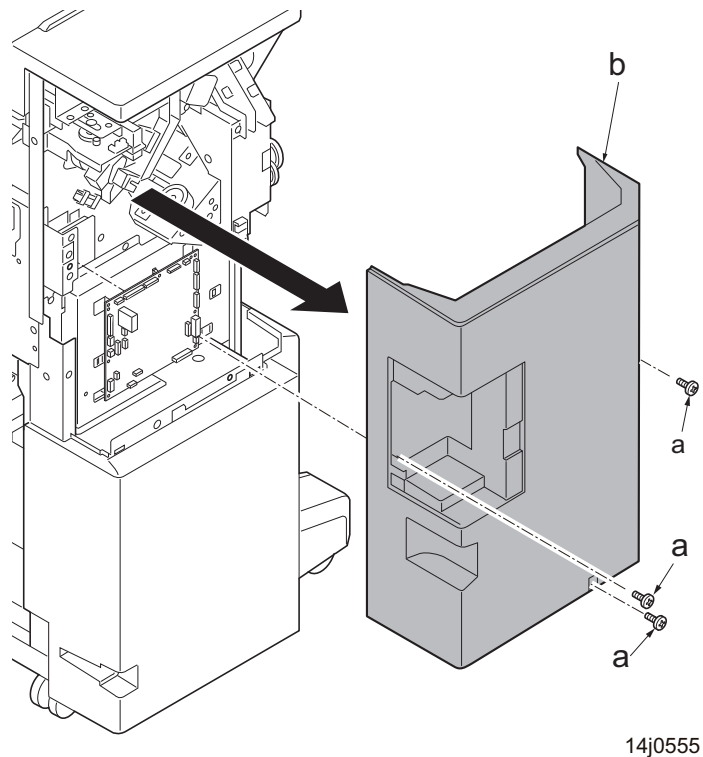
**4 Disconnect two connectors (b) from the staple unit (a).****5 Lift up the staple unit (a) from the front side to release the hook (b) and pull it out toward you.****6 Check or replace the staple unit (a), and then reattach the parts in the original position.**

**(5-2) Detaching and reattaching the DF main PWB****Procedures**

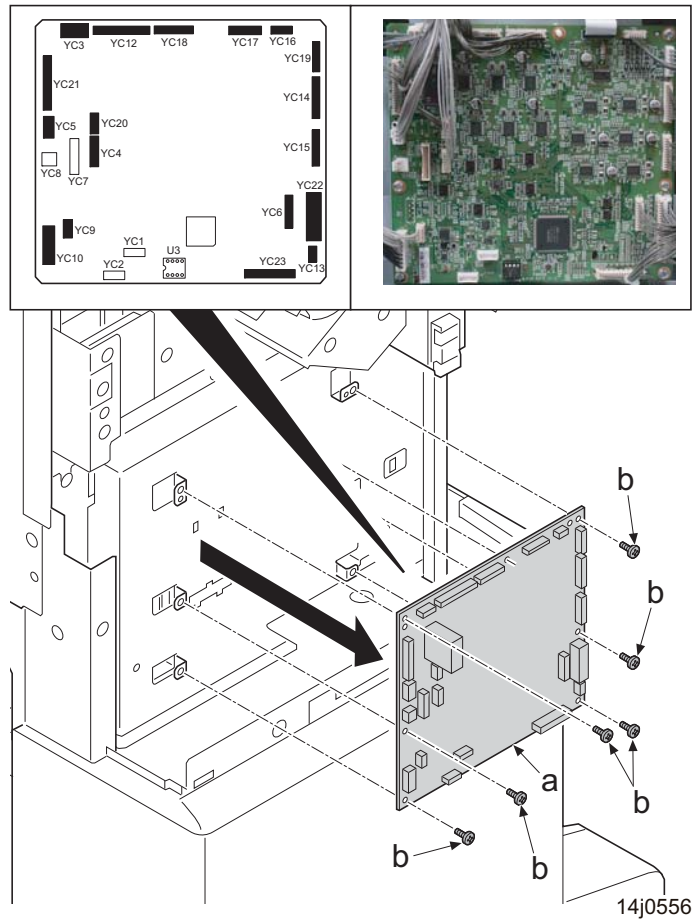
- 1 Remove one screw (a)(M4x8).
- 2 Detach the lid rear cover (b).



- 3 Remove three screws (a)(M4x8).
- 4 Detach the DF rear cover (b).



- 5 Disconnect all the connectors from the DF main PWB (a).
- 6 Remove six screws (b)(M3x8) and remove the DF main PWB (a).
- 7 Check or replace the DF main PWB (a), and then reattach the parts in the original position.

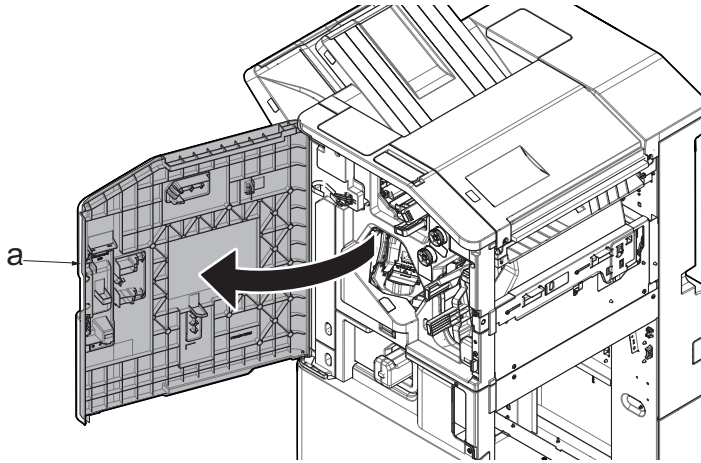


**(6)100 sheet staple finisher (DF-7130)****(6-1)Separation of enhancement units****NOTE**

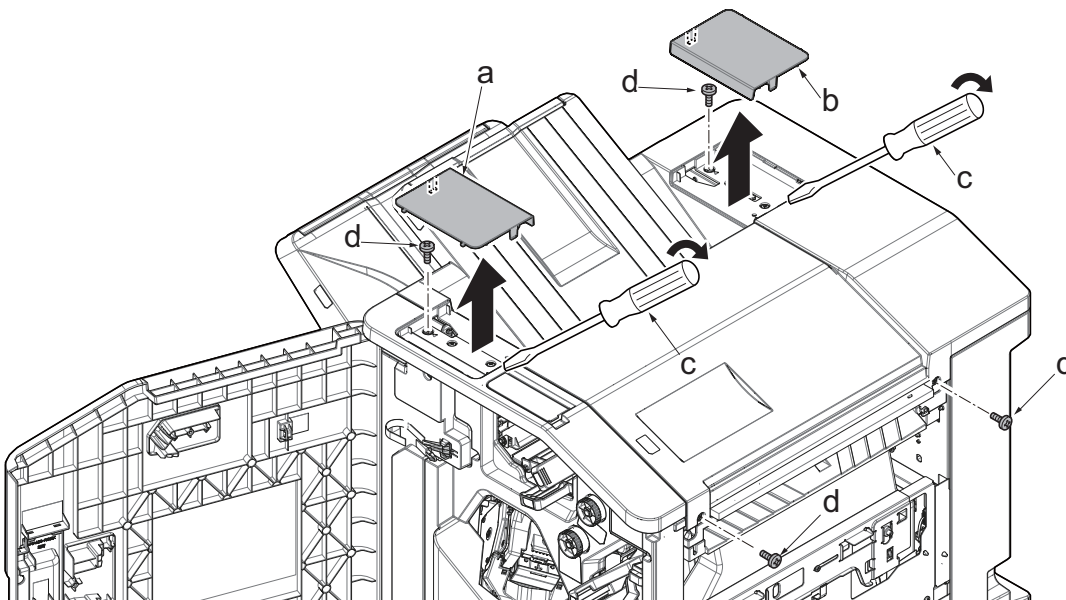
In case of maintenance for enhancement, separate them if necessary.  
See Installation guide for the detail of separation.

**(6-2)Detaching and attaching the front cover****Top cover/Upper inner cover/Upper rear cover/Lower rear cover**

- 1 Open upper front cover (a).

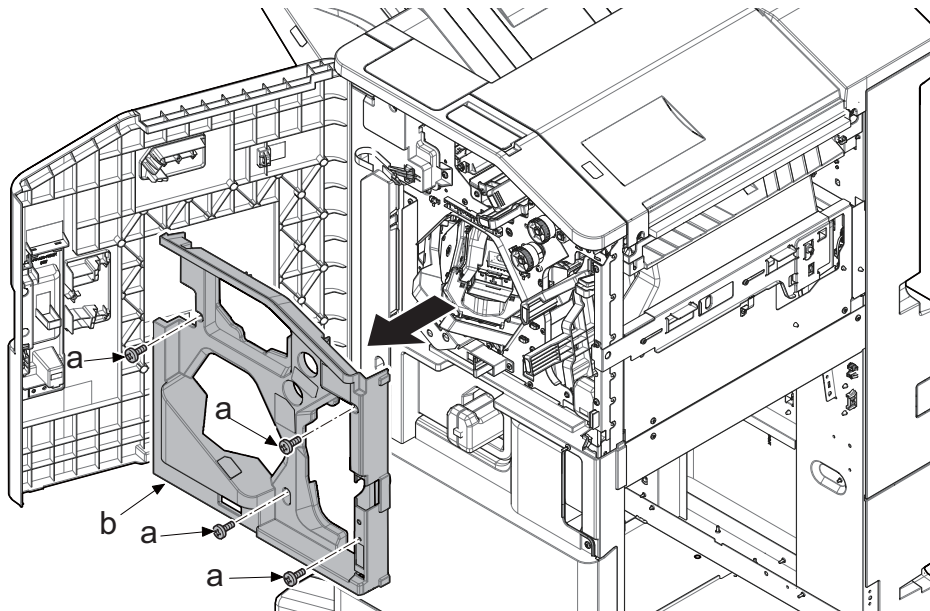


- 2 Remove top cover front lid (a) and rear lid (b) with flat screwdriver (c).
- 3 Remove four screws (d) (M3x8).

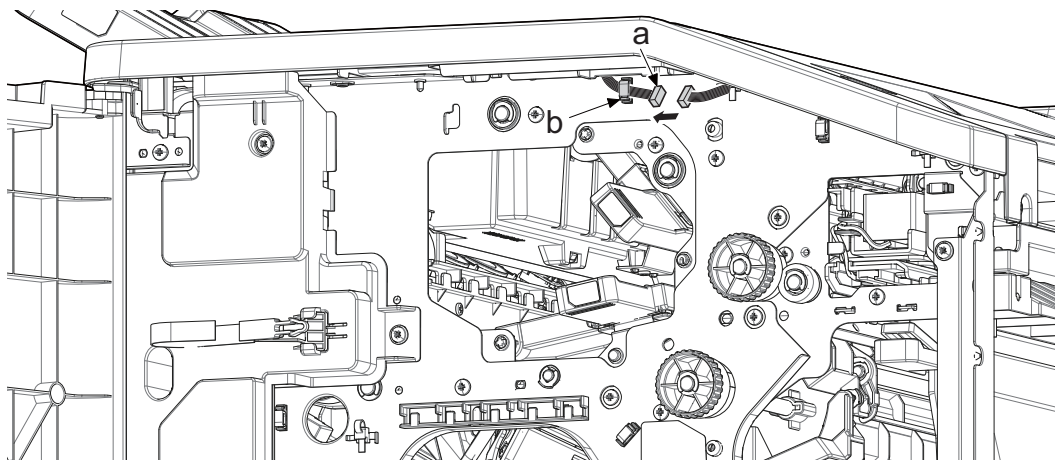




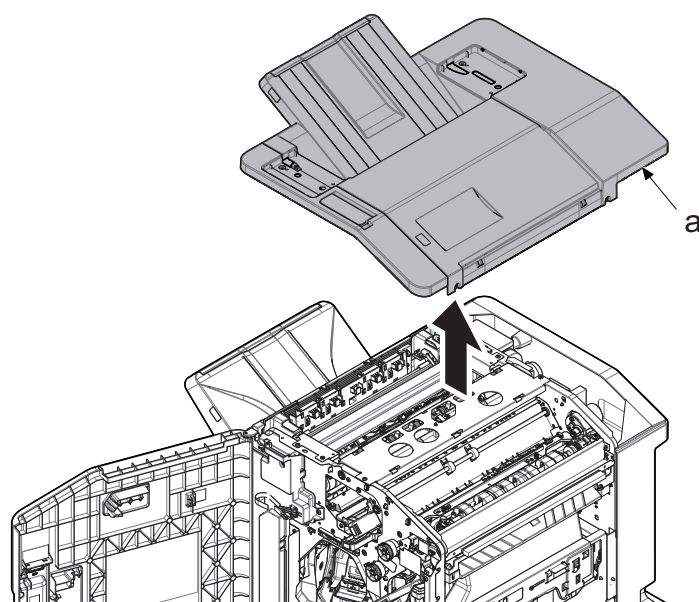
- 4 Remove 4 screws (a) (M3x8) and then remove the upper inner cover (b).



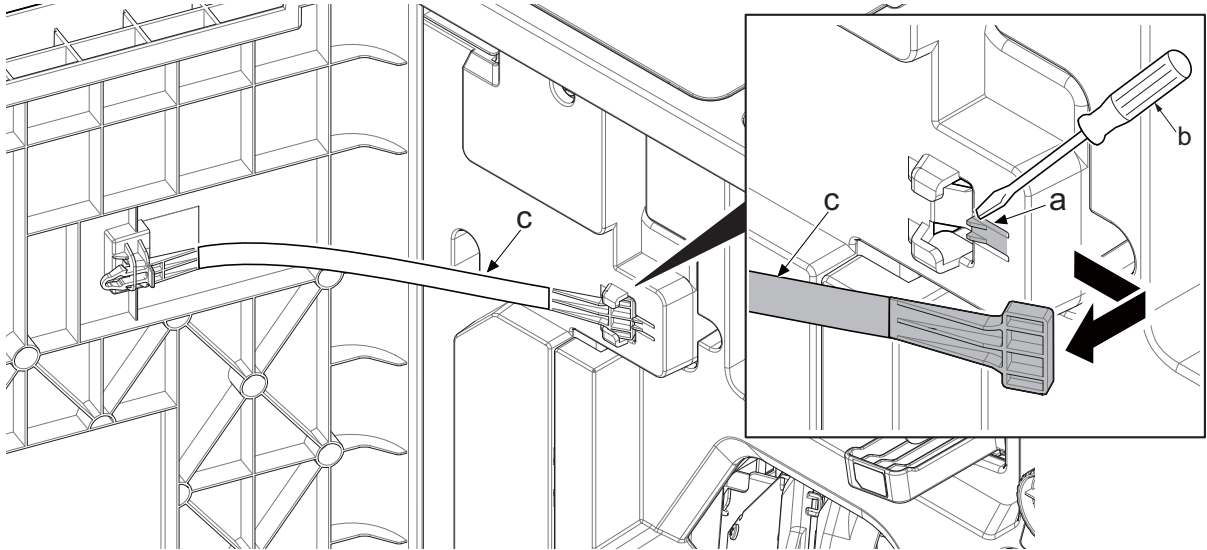
- 5 Remove connector (a) and wire form clamp (b).



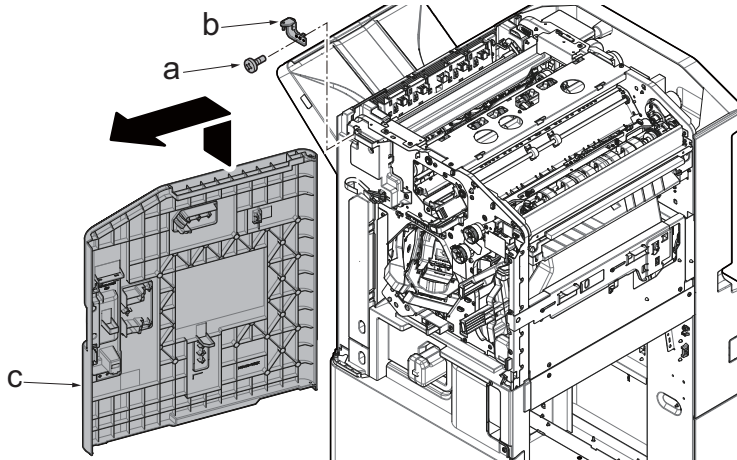
- 6 Detach the top cover (a) in the direction of the arrow.



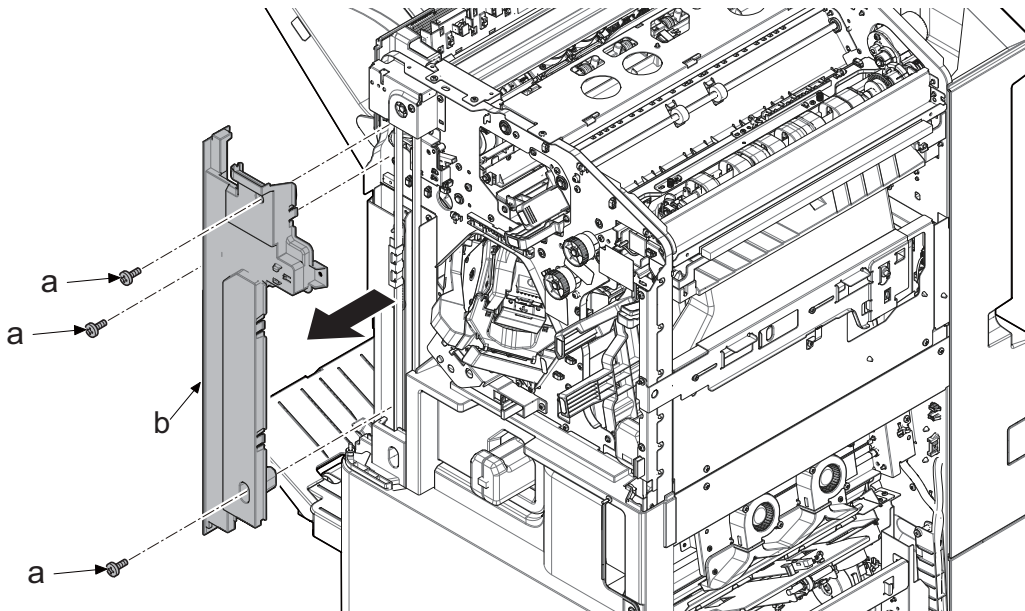
- 7 Remove the strap (c) in the direction of the arrow by pushing hook (a) with screwdriver (b).



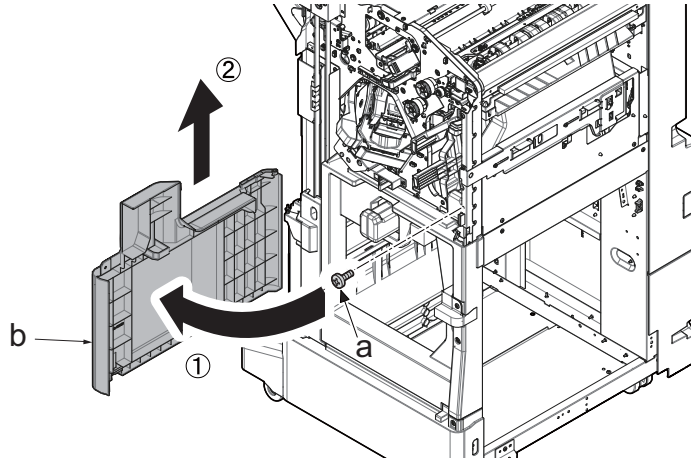
- 8 Remove three screws (a) (M3x8) and fulcrum shaft bracket (b) and upper front cover (c) in the direction of the arrow.



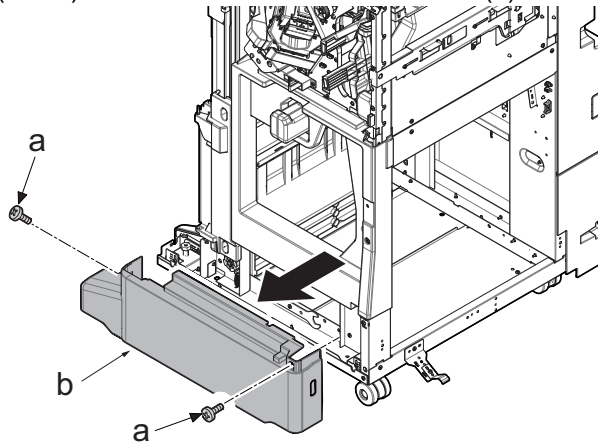
- 9 Remove three screws (a) (M3x8) and remove the upper left cover (b) in the direction of the arrow.



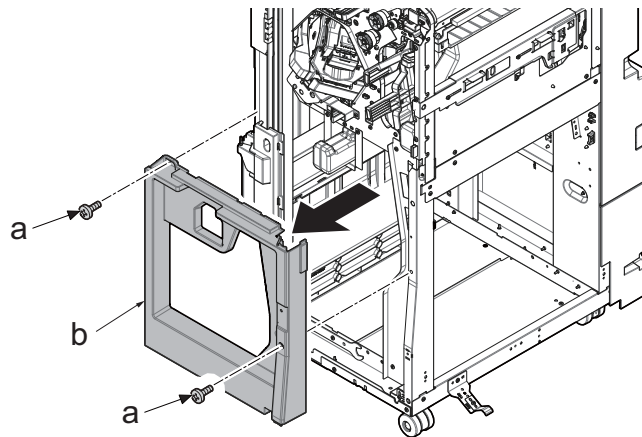
10 Remove screw (a) (M3x8) and remove the middle front cover (b) in the direction of the arrow.



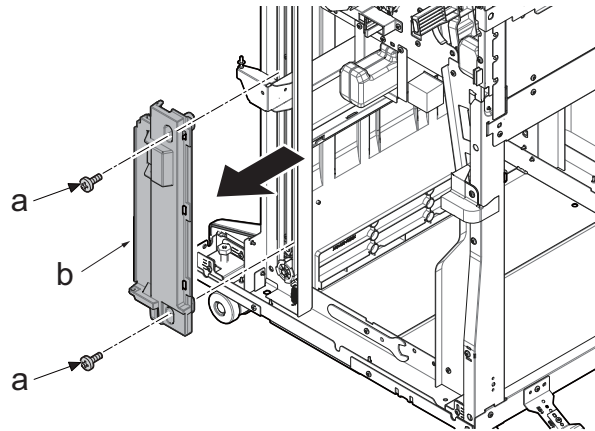
11 Remove 2 screws (a) (M3x8) and remove the lower front cover (b) in the direction of the arrow.



12 Remove 2 screws (a) (M3x8) and then remove the lower inner cover (b).

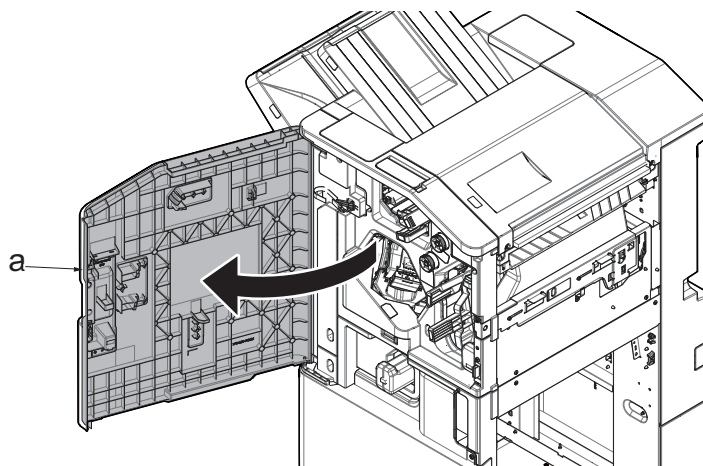


- 13 Remove 2 screws (a) (M3x8) and remove the lower left cover (b) in the direction of the arrow.

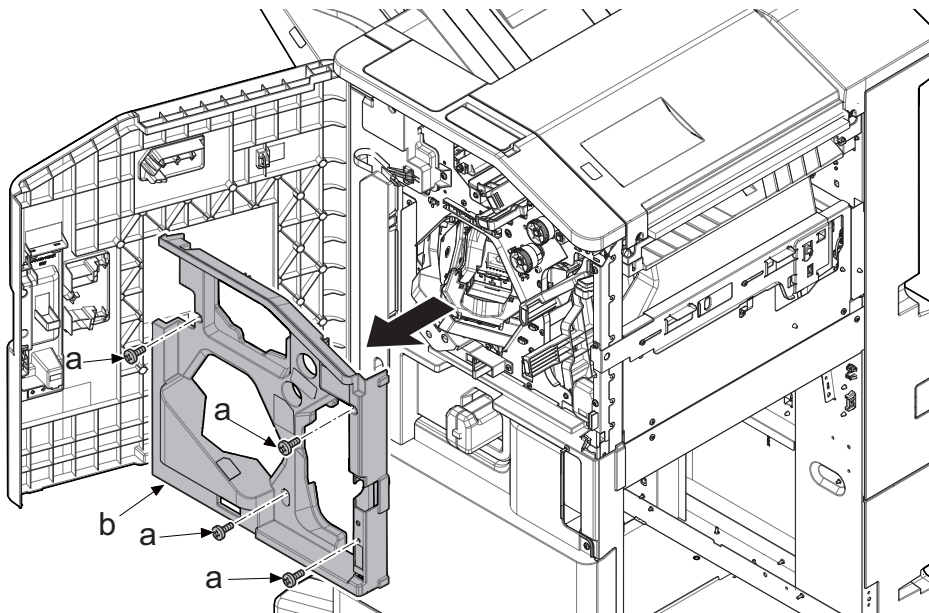


### Detaching and reattaching the DF staple unit

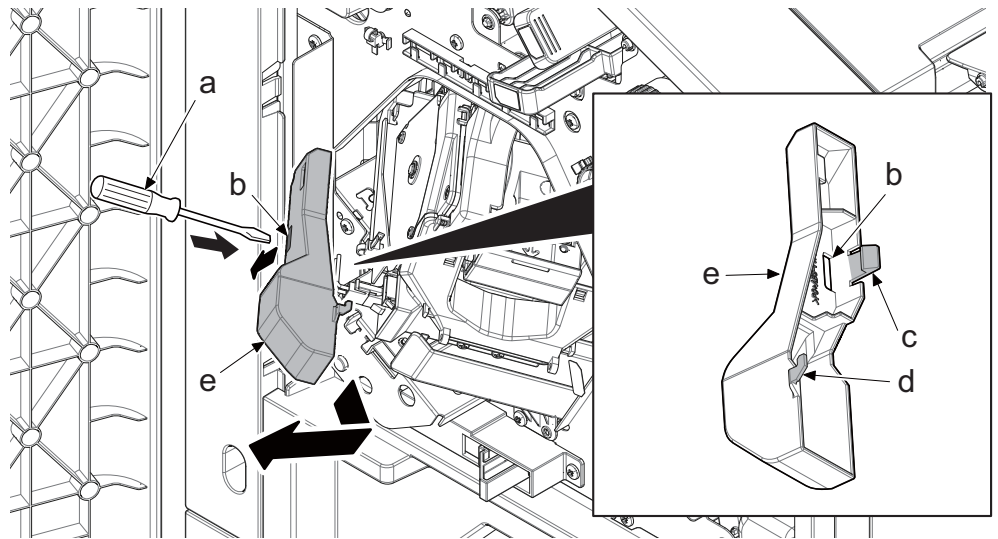
- 1 Open upper front cover (a).



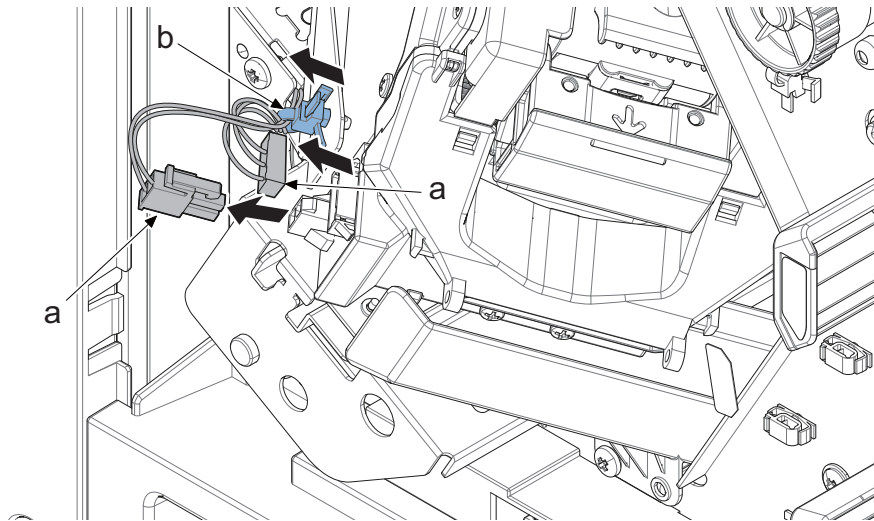
- 2 Remove 4 screws (a) (M3x8) and then remove the upper inner cover (b).



- 3 Insert the flat-blade screwdriver (a) into the opening (b), release the hook (c) and detach the connector cover (e) in the direction of the arrow.
- Hang the hook (d) first and attach it.

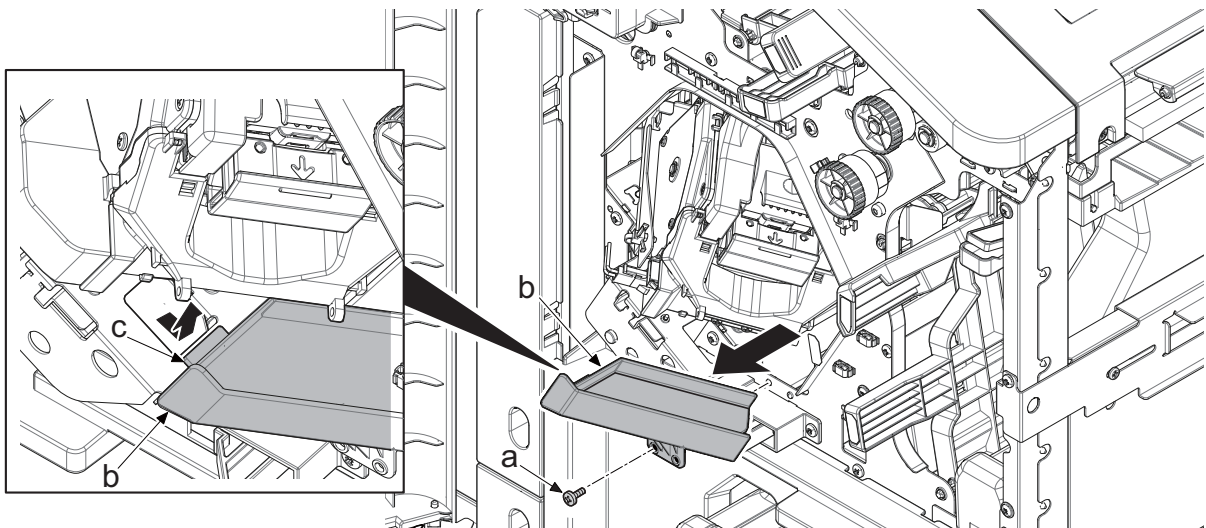


- 4 Remove 2 connectors (a) and clamp (b).

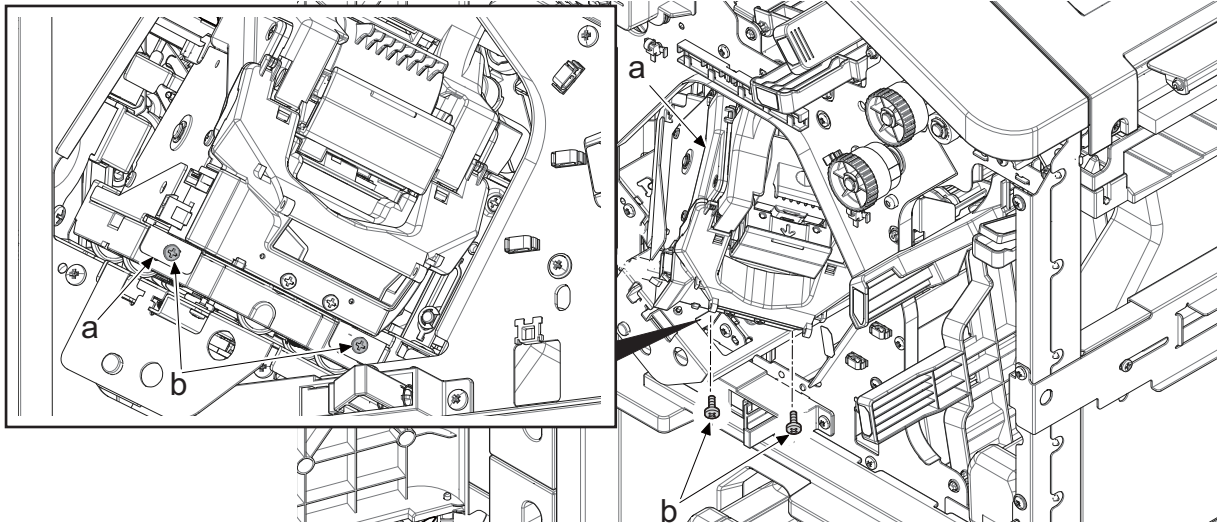


- 5 Remove screw (a) (M4x8).

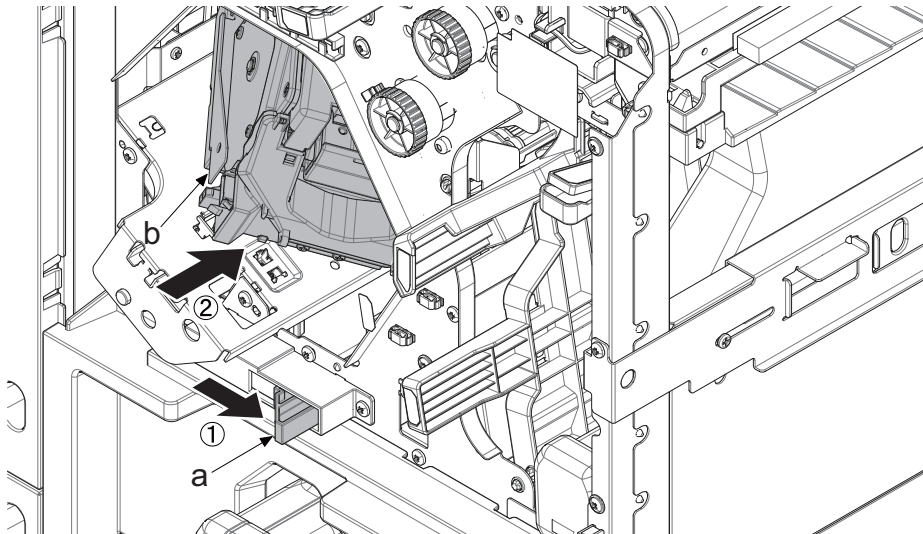
- 6 Release the projection (c) and detach the waste duct (b) in the direction of the arrow.



- 7 Remove two screws (b) (M4x10) from DP staple unit (a).

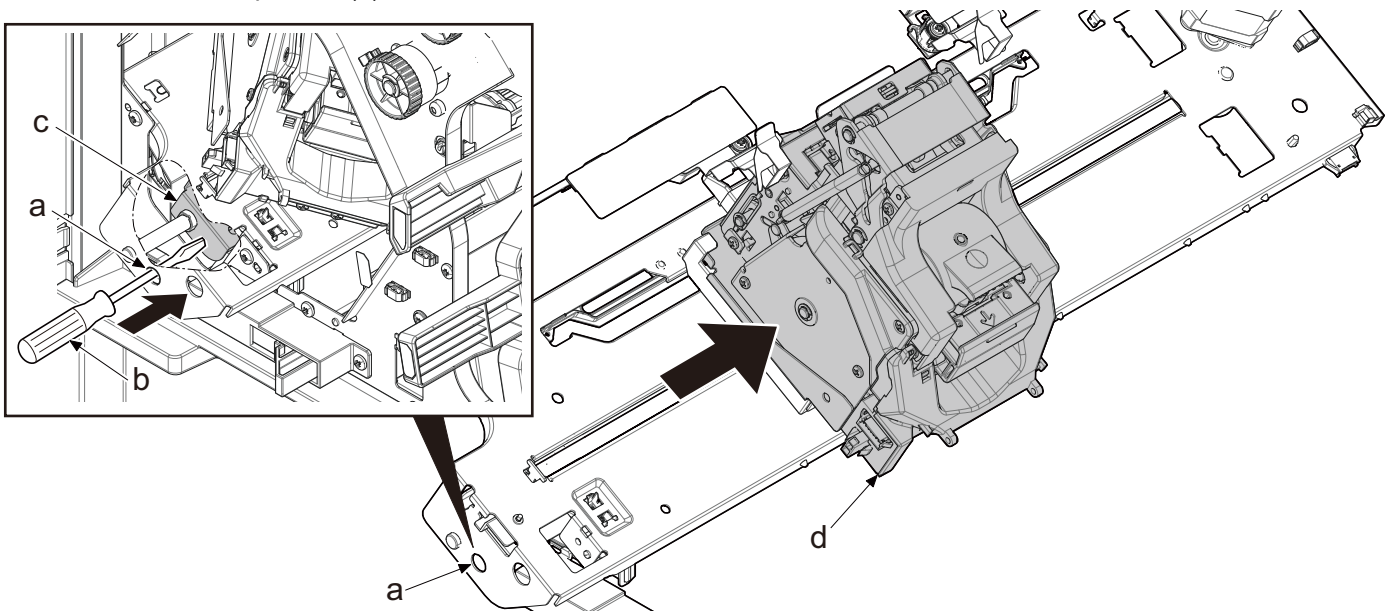


- 8 Slide the staple lock cover (a) in the direction of the arrow to release the lock and move the staple unit (b)

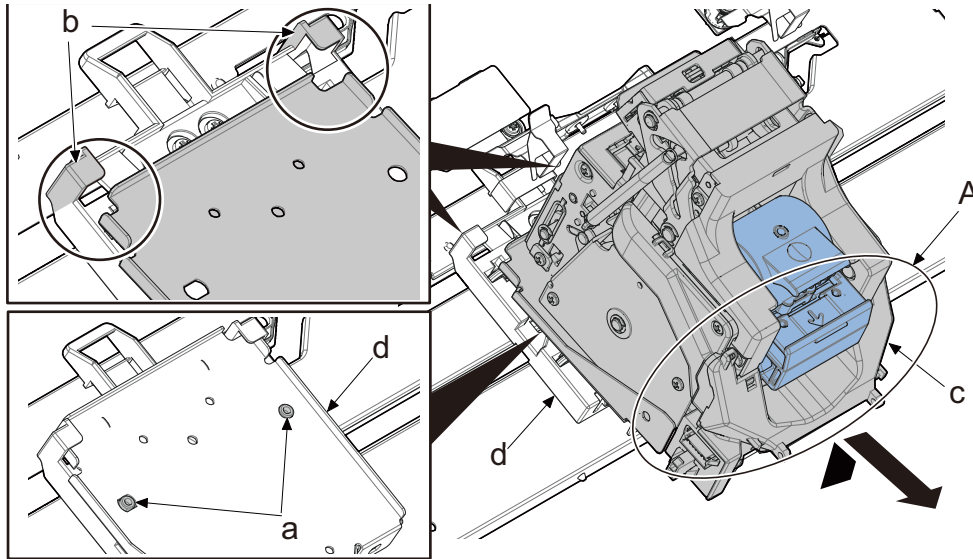


- 9 Insert the screwdriver (b) through the round hole (a) and press the staple shift plate (c) in the direction of the arrow to release the lock.

- 10 Move DF staple unit (d) close to the center.

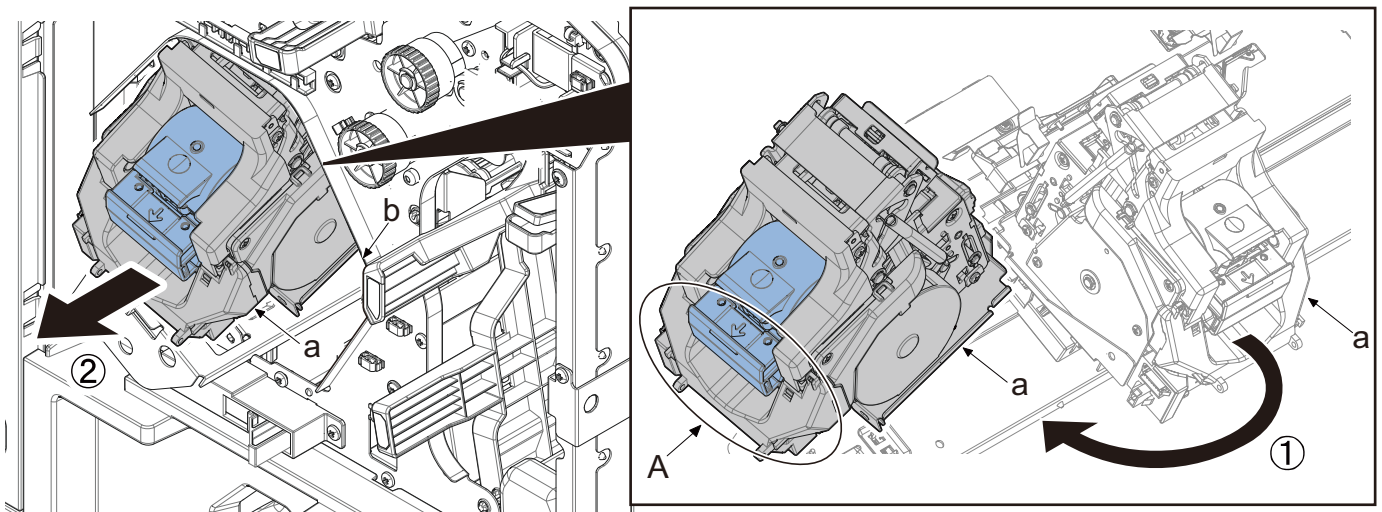


- 11 After lifting up Section A and releasing two positioning bosses (a), release two hooks (b) and detach the DF staple unit (c) from the base (d).

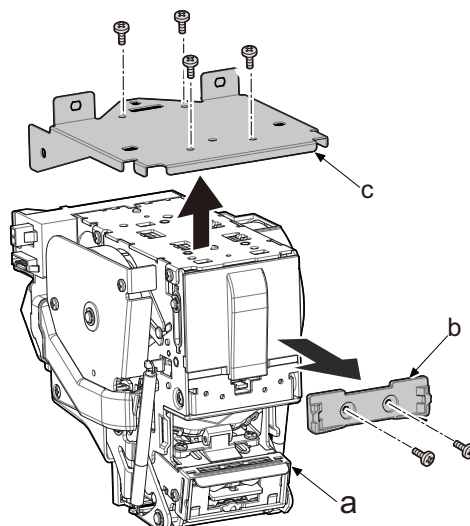


- 12 Rotate Section A so that it is on the side of the opening (b). Then, detach the DF staple unit (a).

- 13 Check or replace the DF staple unit (a), and then reattach the parts in the original position.



- When replacing the DF staple unit (a), detach the staple guide (b) and staple mounting plate (c) to attach the new DF staple unit.







### 4 - 8 Periodic maintenance Procedures

Check the maintenance counts by the maintenance mode U901.

#### (1)Main body

CH:Check/ CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No	PM maintenance (x1000 count)							Remark	
		Set up	User Call	600	1200	1800	2400			
Please do not use spray containing flammable gas for air-blow or air-brush purposes.										
A	<Set up>									
1	TONER(CARTRIDGE)	-----								
2	IMAGE QUALITY	-----	CH AD	CH AD	CH AD	CH AD	CH AD	CH AD		Execute in A3 or Ledger size.
	MK-8725A	-----			RE	RE	RE	RE		DK(BK), DV(BK),TR, 2ND TR ROLLER, FK, FILTER 3TYPE, DISPOSAL UNIT, FEED PULLEYx4 sets
	MK-8725B	-----			RE	RE	RE	RE		COLOR DK-3UNIT, COLOR DV-3UNIT
B	<External appearance and Covers>									
1	OUTER COVERS	-----	CH		CL	CL	CL	CL		CL: Alcohol or dry cloth Do not use alcohol when cleaning the transparent front table. (Water or dry cloth)
2	PARTS COVER FILTER LSU ASSY SP	302K994761		CL	CL	CL	CL	CL		VACUUM Inner air intake filter assy
3	PARTS FILTER DUST PU SP X4	302K994A20		CL	CL	CL	CL	CL		VACUUM Four inner air intake filter assy
4	FILTER DLP COOLING	302LC33500		CL	CL	CL	CL	CL		VACUUM DLP/LSU cooling air intake filter
5	FILTER BELT UNIT(M2) X2	302NH58950		CL	CL	CL	CL	CL		VACUUM Two primary transfer cooling air intake filter assy
6	FILTER LEFT SIDE	302LC33370		CL	RE	RE	RE	RE		600K: RE (MK KIT) DLP/LSU cooling air exhaust filter
7	FILTER TOP X3	302N433010		CL	RE	RE	RE	RE		600K: RE (MK KIT) Three Eject cooling air exhaust/IH cooling air exhaust filters
8	PARTS TONER DISPOSAL UNIT (M3) SP	302NH94080		CL	RE	RE	RE	RE		600K: RE (MK KIT) Rear cover section
9	TONER COLLECT DUCT & TONER DUCT UNIT			CL	CL	CL	CL	CL		VACUUM Rear cover section  *Only when the toner in the duct is visible from the toner collection opening after detaching the developer unit.
10	PARTS INNER UNIT SP	302NH9420		CL	CL	CL	CL	CL		VACUUM

Parts name	Parts No	PM maintenance (x1000 count)							Remark
		Set up	User Call	600	1200	1800	2400	Please do not use spray containing flammable gas for air-blow or air-brush purposes.	
									Lower front cover section
C	<Developer>								
1	DV-8720K,C,M,Y	302NH93020/30/40/50		CL	RE	RE	RE	RE	600K: RE (MK KIT) *VACUUM: Developer unit (On a user call)
D	<Drum>								
1	DK-8720	302NH93060		CL	RE	RE	RE	RE	600K: RE (MK KIT) *VACUUM: Top surface and both sides of the drum unit (On a user call)
E	<Primary transfer>								
1	TR-8720	302NH93140		CL	RE	RE	RE	RE	600K: RE (MK KIT) *VACUUM (On a user call)
F	<Fuser>								
1	FK-8720/21/22(100V/120V/230V)	302NH93080/90/100		CL	RE	RE	RE	RE	600K: RE (MK KIT) *CL: Fuser belt, Fuser roller (On a user call)
G	<Paper feed and Conveying>								
1	PULLEY FEED Forward,Paper feed X8	302N406030		CH CL	CH RE	CH RE	CH RE	CH RE	CL: Alcohol or dry cloth (If no replacement) CH: Performing U251 and check feeding count: Target to replace at 300K. RE (MK KIT)
2	PULLEY RETARD Separation X4	302N406040		CH CL	CH RE	CH RE	CH RE	CH RE	CL: Alcohol or dry cloth (If no replacement) CH: Performing U251 and check feeding count: Target to replace at 300K. RE (MK KIT)
3	PARTS ROLLER REGIST L SP	302K994A00		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
4	PARTS ROLLER REGIST R SP	302K994440		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
5	PARTS ROLLER MIDDLE L SP	302LC94551		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
6	PARTS ROLLER FEED LOW SP	302NH94350		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
7	PARTS ROLLER ASSIST SP	302K994420		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
8	PARTS ROLLER SECONDLY TRANSFER SP	302NH94440		CL	RE	RE	RE	RE	Every 600K: RE *CL: Using an equipped cleaning brush
9	GUIDE CONVEYING UNIT SP	302NH94430		CL RE	CL	CL	CL	CL	CL: Alcohol or dry cloth *CL: Using an equipped cleaning brush, *RE: If the dirt is not removed

Parts name	Parts No	PM maintenance (x1000 count)							Remark	
		Set up	User Call	600	1200	1800	2400			
Please do not use spray containing flammable gas for air-blow or air-brush purposes.										
<MP tray>										
1	PULLEY PAPER FEED	2AR07220		CH CL	CH RE	CH RE	CH RE	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Performing U901 and check feeding count: Target to replace at 150K.
2	PULLEY SEPARATION X2	2AR07230		CH CL	CH RE	CH RE	CH RE	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Performing U901 and check feeding count: Target to replace at 150K.
H	<Eject and Duplex>									
1	PARTS ROLLER DU LOW SP	302K994470		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
2	PARTS ROLLER DU MID SP	302K994480		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
3	PARTS ROLLER DU UP SP	302K994490		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
4	PARTS ROLLER EXIT B SP	302K994A40		CL	CL	CL	CL	CL		CL: Dry cloth
5	PARTS ROLLER EXIT SP	302NH94130		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
6	PARTS ROLLER RELAY MIDDLE SP	302LF94430		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
7	PARTS ROLLER RELAY EXIT LOWER SP	302LF94440		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
8	PARTS ROLLER RELAY EXIT MIDDLE SP	302LF94030		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
9	PARTS ROLLER EXIT RIGHT SP	303NM94010		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth
10	UPPER/ LOWER CHANGE GUIDES	-----		CL	CL	CL	CL	CL		CL: Alcohol or dry cloth (Rib)
I	<Scanner (reading)>									
1	PARTS CONTACT-GLASS ASSY(C) SP	302NH94420	CL		CL	CL	CL	CL		CL: Dry cloth or water (DP slit glass) Contact glass for putting the original on: Dry cloth after cleaning with alcohol (only FACE SIDE)
	PARTS CONTACT-GLASS ASSY(I) SP	302NH94410	CL		CL	CL	CL	CL		Clean the back side only at an image failure (streaks and dirt). (Wipe with a dry cloth after cleaning with alcohol.)

Parts name	Parts No	PM maintenance (x1000 count)							Remark	
		Set up	User Call	600	1200	1800	2400			
Please do not use spray containing flammable gas for air-blow or air-brush purposes.										
2	MIRROR A/B/C	-----		CL						Clean only at an image failure (streaks) (Air blowing after wiping with a dry cloth)
3	LENS ISU	-----		CL						Clean only on an image failure (streaks) (Air blowing after wiping with a dry cloth)
4	PARTS MOUNT LED ASSY SP	302ND93120 302ND9K120		CH RE						Replace at the image failure
5	RAIL ISU R/F	-----		LU						Apply grease only at an abnormal sound, shake, etc Grease to the optical rail: PG-671(P/N: 60170000)
6	SENSOR ORIGINAL	7NXPS181EL1MH0 1		CH CL						Clean with alcohol or wipe with a dry cloth only at an error (sensor transmitter and receiver only)
7	PARTS ISU ASSY H SP	302ND93110		CH RE						Replace at the image failure
J	<Drive and Others>									
1	CLUTCHES	-----		CH RE	CH	CH	CH	CH		Check the copy registration and paper feed condition on paper feed (registration) section.
2	SENSORS  Only loop sensor (SENSOR OPT.)	-----  7NXGP2Y0A51SH0 1		CH RE CL	CH CL	CH CL	CH CL	CH CL		Wiping with a dry cloth or air blowing the receiver.  CL: Air blowing or dry cloth
3	IMAGE QUALITY	-----		CH AD	CH AD	CH AD	CH AD	CH AD		U474: LSU cleaning, U464: Calibration, U410: Half tone auto adjustment
K	<DP paper feed>									
1	BELT PF	303LL07531		CL	RE	RE	RE	RE		CL: Alcohol or dry cloth (If no replacement) CH: Performing U905 and check feeding count: Target to replace at 300K.
2	PULLEY LF	303M407480		CL	RE	RE	RE	RE		CL: Alcohol
3	PULLEY SEPARATION	303LL07190		CL	RE	RE	RE	RE		CL: Alcohol
4	SENSOR OPT.  X3	7NXSG2A141++H0 1		CL	CL	CL	CL	CL		CL: Air blowing or dry cloth

Parts name		Parts No	PM maintenance (x1000 count)						Remark
			Set up	User Call	600	1200	1800	2400	Please do not use spray containing flammable gas for air-blow or air-brush purposes.
5	SENSOR OPT.	7NXPS133GD1+H01		CL	CL	CL	CL	CL	CL: Air blowing or dry cloth
6	PARTS GUIDE SEPARATE ASSY SP	303M494200		CL	RE	RE	RE	RE	CL: Alcohol
L	<DP conveying and reversing>								
1	PARTS ROLLER REGISTRATION SP	303M494070		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
2	PULLEY,REGISTRATION BK X8	303M424300		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
3	PULLEY REG B BK	303M424310		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
4	PARTS ROLLER CONVEYING LEFT SP	303M494090		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
5	PULLEY GUIDE READING X10	303LL24190		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
6	PARTS ROLLER CONVEYING RIGHT SP	303M494100		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
7	PARTS ROLLER CONVEYING UPPER SP	303M494080		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
8	PARTS ROLLER EJECT SP	303M494110		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
9	GUIDE READING	303M424250		CL	CL	CL	CL	CL	CL: Alcohol or dry cloth
10	SENSOR OPT. X2	7NXSG2A141++H01		CL	CL	CL	CL	CL	CL: Air-brush or dry cloth
M	<DP table>								
1	SENSOR OPT.	7NXPSR11GD6FH01		CL	CL	CL	CL	CL	CL: Air blowing or dry cloth
N	<DP others>								
1	PLATE ORIGINAL	303JC04200		CL	CL	CL	CL	CL	CL: Dry cloth or Alcohol

	Parts name	Parts No	PM maintenance (x1000 count)						Remark
			Set up	User Call	600	1200	1800	2400	
									Please do not use spray containing flammable gas for air-blow or air-brush purposes.
0	<DP CIS>								
1	PARTS ROLLER CIS SP	303M494060		CL	CL	CL	CL	CL	CL: Dry cloth or Alcohol
2	GLASS CIS	303NW24020		CL	CL	CL	CL	CL	CL: Dry cloth or Alcohol

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.

**(2)Option**  
**(2-1)PF-730(B)**

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User Call	*	*Based on the main installation	
A <Set up>						
1	PAPER LINE	-----	CH AD			CH: Check the image center alignment gap (Check after the center adjustment of copier.)
B <Paper feed>						
From initial production to new parts launch						
1	PARTS PRIMARY FEED UNIT HI SP	302NJ94110 2NJ94110	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) The following parts are installed depends on the unit. CH: Check feeding count in simulation: Target to replace at 150K.
After new parts launch						
2	PULLEY FEED Paper feed X4	302N406030 2N406030	CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 150K.
3	PULLEY RETARD Separation X2	302N406040 2N406040	CL			CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 150K.
4	PULLEY PICKUP Forward X2	302N406030 2N406030	CL			CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 150K.
5	PARTS ROLLER CONVEYING VF SP	303NF94070 3NF94070				CL: Alcohol or dry cloth
6	PARTS ROLLER FEED LOW SP X2	302K994430 2K994430		CL		CL: Alcohol or dry cloth
7	PARTS ROLLER ASSIST SP X2	303NJ94050 3NJ94050		CL		CL: Alcohol or dry cloth
8	CLUTCH 50 Z35R X2	302KV44041 2KV44041	CH RE	CH		CH: Check the paper feed status.

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.

(2-2)PF-740(B)

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
<b>Please do not use spray containing flammable gas for air-blow or air-brush purposes.</b>						
A	<Set up>					
1	PAPER LINE	-----	CH AD			CH: Check the image center alignment gap (Check after the center adjustment of copier.)
B	<Paper feed>					
	From initial production to new parts launch					
1	PARTS PRIMARY FEED UNIT HI SP	302N294030 2N294030	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) The following parts are installed depends on the unit. CH: Check feeding count in simulation: Target to replace at 150K.
	After new parts launch					
2	PULLEY FEED Paper feed X4	302N406030 2N406030	CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 150K.
3	PULLEY RETARD Separation X2	302N406040 2N406040	CL			CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 150K.
4	PULLEY PICKUP Forward X2	302N406030 2N406030	CL			CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 150K.
5	PARTS ROLLER CONVEYING VF SP	303NF94070 3NF94070	CL			CL: Alcohol or dry cloth
6	PARTS ROLLER CONVEYING DECK SP X2	303NF94100 3NF94100	CL	CL		CL: Alcohol or dry cloth
7	PARTS ROLLER ASSIST SP X2	303NJ94050 3RC94070	CL	CL		CL: Alcohol or dry cloth
8	CLUTCH 50 Z35R X2	302KV44041 2KV44041	CH RE	CH		CH: Check the paper feed status.

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.



(2-3)PF-7120

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
<b>Please do not use spray containing flammable gas for air-blow or air-brush purposes.</b>						
A	<Set up>					
1	PAPER LINE	-----	CH AD			CH: Check the image center alignment gap (Check after the center adjustment of copier.)
B	<Paper feed>					
1	PULLEY FEED	302K906350 2K906350	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 300K.
2	PULLEY RETARD	302K906360 2K906360	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 300K.
3	PULLEY PICKUP	302K906370 2K906370	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 300K.
4	PARTS ROLLER ASSIST SP	303NG94060 3NG94060		CL		CL: Alcohol or dry cloth
5	CLUTCH 50 Z35R X2	302KV44041 2KV44041	CH RE	CH		CH: Check the paper feed status, abnormal sound etc.

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.

## (2-4)PF-7130

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
Please do not use spray containing flammable gas for air-blow or air-brush purposes.						
A	<Set up>					
1	PAPER LINE	-----	CH AD			CH: Check the image center alignment gap (Check after the center adjustment of copier.)
B	<Paper feed>					
1	PULLEY FEED Paper feed X2	302N406030 2N406030	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 300K.
2	PULLEY RETARD Separation X1	302N406040 2N406040	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 300K.
3	PULLEY PICKUP	302N406030 2N406030	CH CL	CH RE		CL: Alcohol or dry cloth (If no replacement) CH: Check feeding count in simulation: Target to replace at 300K.
4	PARTS ROLLER EXIT B SP	303NL94030 3NL94030		CL		CL: Alcohol or dry cloth
5	PARTS ROLLER CONVEYING A X2	303NL94040 3NL94040		CL		CL: Alcohol or dry cloth
5'	PARTS ROLLER CONVEYING SP	303S094030 3S094030		CL		CL: Alcohol or dry cloth
6	PARTS ROLLER CONVEYING B X2	303NL94050 3NL94050		CL		CL: Alcohol or dry cloth
7	PARTS ROLLER ASSIST SP	303NJ94050 3NJ94050		CL		CL: Alcohol or dry cloth
8	CLUTCH 50 Z35R X2	302NH44090 2NH44090	CH RE	CH		CH: Check the paper feed status, abnormal sound etc.

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.

## (2-5)DF-7110

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
Please do not use spray containing flammable gas for air-blow or air-brush purposes.						
A	<External appearance and Covers>					
1	OUTER COVER, TRAY	-----			CL	CL: Alcohol or dry cloth
B	<Paper feed, Conveying and Eject>					
1	ROLLER FEED LOWER	303RW07010 3RW07010			CL	CL: Alcohol or dry cloth
2	ROLLER FEED UPPER	303RW07030 3RW07030			CL	CL: Alcohol or dry cloth
3	ROLLER MIDDLE	303RW36010 3RW36010			CL	CL: Alcohol or dry cloth
4	PULLEY MIDDLE x2	303NB36661 3NB36661			CL	CL: Alcohol or dry cloth
5	ROLLER EXIT	303NB36340 3NB36340			CL	CL: Alcohol or dry cloth
6	PULLEY EXIT x2	303NB36200 3NB36200			CL	CL: Alcohol or dry cloth
7	ROLLER SUB CONVEYING	303RW24040 3RW24040			CL	CL: Alcohol or dry cloth
8	ROLLER SUB EXIT	303RW24050 3RW24050			CL	CL: Alcohol or dry cloth
9	PULLEY SUB EJECT x2	303B817020 3B817020			CL	CL: Alcohol or dry cloth
10	PULLEY SUB EJECT x4	303NB24311 3NB24311			CL	CL: Alcohol or dry cloth

Parts name		Parts No.	PM maintenance (x1000 counts)				Remark
			Set up	User call	*	*Based on the main installation	
<b>Please do not use spray containing flammable gas for air-blow or air-brush purposes.</b>							
11	STATIC ELIMINATOR EJECT	63212210 63212210			CH		CH; Remove if there is paper dust at the end of brush.
12	STATIC-ELIMINATOR EJECT CENTER	303NB36500 3NB36500			CH		CH; Remove if there is paper dust at the end of brush.
13	STATIC-ELIMINATOR EJECT SIDE x2	303NB36490 3NB36490			CH		CH; Remove if there is paper dust at the end of brush.
14	STATIC-ELIMINATOR SUB EJECT	303NB24300 3NB24300			CH		CH; Remove if there is paper dust at the end of brush.
C	<Sensors>						
1	SENSOR OPT x2	7NXPS133GD1+H0 1			CL		CL: Air blowing
2	SENSOR OPT x16	7NXSG2A141++H0 1			CL		CL: Air blowing
3	SENSOR OPT	7NXSG2A241++H0 1			CL		CL: Air blowing
4	SENSOR A, SEPARATION	303H327460 3H327460			CL		CL: Air blowing
5	SENSOR OPT	7NXKB1281AA2H0 1			CL		CL: Air blowing
6	SENSOR OPT	7NXPSR11GD6FH 01			CL		CL: Air blowing

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.

## (2-6)DF-7130

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
Please do not use spray containing flammable gas for air-blow or air-brush purposes.						
A	Appearance/Cover					
1	Cover, Tray			CL		Wipe with alcohol or dry material
B	DF convey/exit section					
1	ROLLER FEED LOW	303S80705_		CL		Wipe with alcohol or dry material
2	ROLLER FEED UP	303S80703_		CL		Wipe with alcohol or dry material
3	ROLLER MIDDLE FEED LOW	303S83657_		CL		Wipe with alcohol or dry material
4	PULLEY MIDDLE A	302H72276_		CL		Wipe with alcohol or dry material x2
5	PULLEY PAPER FEED B	303S83667_		CL		Wipe with alcohol or dry material x2
6	ROLLER MIDDLE UPPER	303S83626_		CL		Wipe with alcohol or dry material
7	PULLEY PAPER FEED	303S83654_		CL		Wipe with alcohol or dry material x2
8	PULLEY EJECT ROLLER	303S82846_		CL		Wipe with alcohol or dry material x4
9	ROLLER SUB CONVEYING	303S82604_		CL		Wipe with alcohol or dry material
10	PULLEY FEED	303S82429_		CL		Wipe with alcohol or dry material x2
11	ROLLER SUB EJECT	303S82602_		CL		Wipe with alcohol or dry material
12	PULLEY MIDDLE	303NB3666_		CL		Wipe with alcohol or dry material x4
13	ROLLER SIDETRACK	303S82413_		CL		Wipe with alcohol or dry material

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
14	STATIC ELIMINATOR	303S80711_			CH	CH: Remove dust from brush. x2
15	STATIC ELIMINATOR CURSOR	303JY3722_			CH	CH: Remove dust from brush. x2
16	STATIC-ELIMINATOR SUB EJECT	303NB2430_			CH	CH: Remove dust from brush.
C	DF Sensors					
1	SENSOR OPT.	7NXPS133GD1+H01			CL	CL: Air blowx4
2	SENSOR OPT.	7NXPS124GD1+H01			CL	CL: Air blow
3	SENSOR OPT.	7NXSG2A241++H01			CL	CL: Air blowx21
4	SENSOR A,SEPARATION	303H32746_			CL	CL: Air blowx2
5	SENSOR OPT.	7NXKB1281AA2H01			CL	CL: Air blowx2
6	SENSOR OPT.	7NXPSR11GD6FH01			CL	CL: Air blow
7	PWB SENSOR C ASSY	303R10104_			CL	CL: Air blow
8	PWB SENSOR D ASSY	303R10105_			CL	CL: Air blow

 **IMPORTANT**

Do not use burnable spray for air blow in this list.

## (2-7)BF-730

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
Please do not use spray containing flammable gas for air-blow or air-brush purposes.						
A	<External appearance and Covers>					
1	OUTER COVER, TRAY	-----			CL	CL: Alcohol or dry cloth
B	<Paper feed and Conveying >					
1	PARTS ROLLER EJECT SP	303ND94030 3ND94030			CL	CL: Alcohol or dry cloth
2	PARTS ROLLER EJECT 3 FOLD SP	303ND94040 3ND94040			CL	CL: Alcohol or dry cloth
3	BRUSH PAPER EJ REGIST ( X2)	-----			CL	CL: Alcohol or dry cloth  *The rubber attached on PARTS ROLLER EJECT SP
4	PARTS ROLLER FEED IN SP	303ND94020 3ND94020			CL	CL: Alcohol or dry cloth
5	PARTS ROLLER BRIDGE LOW SP X2	303ND94090 3ND94090			CL	CL: Alcohol or dry cloth
6	PARTS ROLLER BRIDGE UP SP	303ND94080 3ND94080				CL: Alcohol or dry cloth
7	PULLEY DU LOW X2	-----			CL	CL: Alcohol or dry cloth  *The pulley at the eject guide section
8	PULLEY MIDDLE X2	-----			CL	CL: Alcohol or dry cloth  *The pulley at the eject guide section
9	PULLEY FEED IN X4	-----			CL	CL: Alcohol or dry cloth  *The pulley at the BF paper entry section

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
10 PULLEY,EJECT  X4	-----			CL		CL: Alcohol or dry cloth  *The pulley at the BF paper entry section
11 RUBBER FEED IN  X4	-----			CL		CL: Alcohol or dry cloth  *The rubber at the BF paper entry section
12 PULLEY MIDDLE A  X4	-----			CL		CL: Alcohol or dry cloth  *The pulley at the BF paper entry section
C <Folding>						
1 PARTS ROLLER PRESS A SP	303ND94051  3ND94051			CL		CL: Alcohol or dry cloth
2 ARTS ROLLER PRESS B SP	303ND94061  3ND94061			CL		CL: Alcohol or dry cloth
3 PARTS ROLLER PRESS C SP	303ND94070  3ND94070			CL		CL: Alcohol or dry cloth
D <Sensors>						
1 PARTS SENSOR OPT SP  X8	303M894260  3M894260			CL		CL: Air blowing
2 PARTS SENSOR OPT. SP  X2	303NW94060  3NW94060			CL		CL: Air blowing

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.



## (2-8)BF-9100

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
Please do not use spray containing flammable gas for air-blow or air-brush purposes.						
A	Appearance/Cover					
1	Cover, Tray			CL		Wipe with alcohol or dry material
B	DF convey/exit section					
1	ROLLER EJECT	303SP2816_		CL		Wipe with alcohol or dry material
2	ROLLER EJECT 3 FOLD	303SP2817_		CL		Wipe with alcohol or dry material
3	BRUSH PAPER EJ REGIST	303ND2830_		CL		Wipe with alcohol or dry material x2
4	ROLLER FEED IN	303SP2409_		CL		Wipe with alcohol or dry material
5	ROLLER BRIDGE LOW	303SP3704_		CL		Wipe with alcohol or dry material
6	ROLLER BRIDGE UP	303SP3703_		CL		Wipe with alcohol or dry material
7	PULLEY DU LOW	302F92926_		CL		Wipe with alcohol or dry material x2
8	PULLEY CONVEYING	303JX2916_		CL		Wipe with alcohol or dry material x2
9	PULLEY FEED IN	303SP2401_		CL		Wipe with alcohol or dry material x4
10	RUBBER FEED IN	303ND2424_		CL		Wipe with alcohol or dry material X6
11	PULLEY MIDDLE A	302H72276_		CL		Wipe with alcohol or dry material X4
12	SHEET PADDLE	303PX3670_		CL		Wipe with alcohol or dry material X2
13	SHEET PADDLE	303SP2414_		CL		Wipe with alcohol or dry material X2
14	BELT EJECT CONVEYING	303SP2855_		CL		Wipe with alcohol or dry material X4
15	DISCHARGER GUIDE UP	303JY3740_		CL		Wipe with alcohol or dry material

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
						Please do not use spray containing flammable gas for air-blow or air-brush purposes.
C	BF center fold section					
1	ROLLER PRESS A			CL		Wipe with alcohol or dry material
2	ROLLER PRESS B			CL		Wipe with alcohol or dry material
3	ROLLER PRESS C			CL		Wipe with alcohol or dry material
4	BLADE MID PRESSING		CH/RE	CL		Wipe with alcohol or dry material CH: Replace it if there is deformation, bet, etc.
D	BF Sensors					
	SENSOR OPT.	7NXSG2A141++H01		CL		Air blow X3
	SENSOR OPT.	7NXPS133GD1+H01		CL		Air blow X3
	SENSOR OPT.	7NXSG2A241++H01		CL		Air blow X6

 **IMPORTANT**

Do not use burnable spray for air blow in this list.

**(2-9)MT-730(B)**

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
Please do not use spray containing flammable gas for air-blow or air-brush purposes.						
A	<External appearance and Covers>					
1	OUTER COVER, TRAY	-----			CL	CL: Alcohol or dry cloth
B	<Paper feed>					
1	PARTS ROLLER CONVEYING X3	303LW94010 3LW94010			CL	CL: Alcohol or dry cloth
2	PARTS ROLLER EJECT A X6	303LW94020 3LW94020			CL	CL: Alcohol or dry cloth
3	PARTS ROLLER EJECT C SP	303N094020 3N094020			CL	CL: Alcohol or dry cloth

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.

**(2-10)PH-7A/7B/7C/7D**

CH:Check / CL:Clean / AD:Adjust / LU:Lubrication / RE:Replace

Parts name	Parts No.	PM maintenance (x1000 counts)				Remark
		Set up	User call	*	*Based on the main installation	
Please do not use spray containing flammable gas for air-blow or air-brush purposes.						
A	<Drive>					
1	GEAR 40 CAM DRIVE	3H416110			LU	LU: Apply EM-50LP to gear teeth surface  (PN 7BG010009H GREASE MOLYKOTE EM-50LP 50G)
2	GEAR 16-51 IDLE	3H416120			LU	LU: Apply EM-50LP to gear teeth surface  (PN 7BG010009H GREASE MOLYKOTE EM-50LP 50G)
3	PARTS MOTOR-PM MOVING SP	303NB94040 3NB94040			LU	LU: Apply EM-50LP to gear teeth surface  (PN 7BG010009H GREASE MOLYKOTE EM-50LP 50G)
B	<Sensors>					
1	SENSOR FEED B	303H327500 3H327500			CL	CL: Air blowing or dry cloth

If replaced at check, return to the original maintenance at the next maintenance. If not replaced at check, check again at the next maintenance.

## 5 Firmware

### 5 - 1 Firmware update

Execute the following to update the firmware below.

\*The processing time is reduced with parallel processing by group.

#### [GROUP 1 UPDATE]

UPDATE step	Target	Master file name	Message
1	Controller Package	DL_PKG_CTRL.2XN	CPKG
	Product Line Platform	DL_CTRL_PLP.2XN	PLP
	Common Basic App	DL_CTRL_STDAPP_CMN.2XN	CMN
	System Setting App	DL_CTRL_STDAPP_SST.2XN	SST
	Maintenance App	DL_CTRL_STDAPP_MNT.2XN	MNT
	Copy App	DL_CTRL_STDAPP_CPY.2XN	CPY
	Print App	DL_CTRL_STDAPP_PRT.2XN	PRT
	Send App	DL_CTRL_STDAPP_SND.2XN	SND
	Box App	DL_CTRL_STDAPP_BOX.2XN	BOX
	Fax App	DL_CTRL_STDAPP_FAX.2XN	SFAX
	Web Page App	DL_CTRL_STDAPP_WPG.2XN	WPG
	Auth App	DL_CTRL_STDAPP_AUTH.2XN	AUTH
	External Print App	DL_CTRL_STDAPP_EPRT.2XN	EPRT
	Panel Control System App	DL_CTRL_STDAPP_PCS.2XN	PCS
	Service Cooperation App	DL_CTRL_STDAPP_SCO.2XN	SCO
	Extension Service Platform	DL_CTRL_EXSP.2XN	EXSP
	Package Version Info	DL_CTRL_VINF.2XN	VINF
1	Option Language Data	DL_OPT.2V8	OPT
1	Color Table Data (Printer 1)	DL_PCLT1.2XN	PCLT1
1	Color Table Data (Printer 2)	DL_PCLT2.2XN	PCLT2
1	Color Table Data (Copy 1)	DL_CCLT1.2XN	CCLT1
1	Color Table Data (Copy 2)	DL_CCLT2.2XN	CCLT2
1	OCR Dictionary Data	DL_OCR.2V8	OCR

Each FW-Update targets in Group 1 are updated by Parallel Update method.

#### [GROUP2 UPDATE]

UPDATE step	Target	Master file name	Message
1	FAX Board	DL_FAX.3R2	FAX1,2

## [GROUP 3 UPDATE]

UPDATE step	Target	Master file name	Message
1	Engine Firmware	DL_ENGN.2XN	ENGN
2	Paper Feeder External (for SMT)	DL_03NJ.2NH	500x2PF2
3	Large Capacity Feeder (3000)	DL_FEED.2NH	PF-UNDER
4	Large Capacity Feeder External (for SMT)	DL_03NF.2NH	3000PF2
5	Paper Feeder Side Deck	DL_03RL.2ND	PF-SIDE
6	Side Multi Tray	DL_03S0.2ND	M-TRAY
7	100-staple Document Finisher	DL_03SW.2V8	STP-DF
8	100-staple Document Finisher Booklet	DL_03SP.2TJ	BKLT-ADV
9	100-staple Document Finisher (Sub)	DL_M3S8.2TJ	SUB-DF
10	3000/4000 Document Finisher Main	DL_03RW.2ND	DF
11	3000/4000 Document Finisher Mail Box	DL_03N0.2ND	MAIL-BOX
12	4000 Document Finisher Booklet	DL_03ND.2ND	BOOKLET
13	3000 Document Finisher Punch Unit	DL_03NK.2RH	P-UNIT
14	Document Processor Main (CIS)	DL_03R8.2ND	DP-CIS

## [GROUP 4 UPDATE]

UPDATE step	Target	Master file name	Message
1	Scanner Board	DL_SCAN.2NH	SCAN

## [GROUP 5 UPDATE]

UPDATE step	Target	Master file name	Message
1	Sub Panel Board (Sub Panel)	DL_SPNL.2V8	SPNL
	Sub Panel Board (Configuration File)	DL_SPCF.2V8	SPCF

## Verify the signature at firmware update

Verify the signature of the update file to prevent the firmware update with illegally falsified data.

## File names of the signature and firmware certificate

Target	Signature file name	Firmware certificate file name
Product Line Platform	2XN_CTRL_PLP_sign.bin	2XN_CTRL_PLP_cert.pem
Common Basic App	2XN_CTRL_STDAPP_CMN_sign.bin	2XN_CTRL_STDAPP_CMN_cert.pem
System Setting App	2XN_CTRL_STDAPP_SST_sign.bin	2XN_CTRL_STDAPP_SST_cert.pem
Maintenance App	2XN_CTRL_STDAPP_MNT_sign.bin	2XN_CTRL_STDAPP_MNT_cert.pem
Copy App	2XN_CTRL_STDAPP_CPY_sign.bin	2XN_CTRL_STDAPP_CPY_cert.pem
Print App	2XN_CTRL_STDAPP_PRT_sign.bin	2XN_CTRL_STDAPP_PRT_cert.pem
Send App	2XN_CTRL_STDAPP_SND_sign.bin	2XN_CTRL_STDAPP_SND_cert.pem
Box App	2XN_CTRL_STDAPP_BOX_sign.bin	2XN_CTRL_STDAPP_BOX_cert.pem
Fax App	2XN_CTRL_STDAPP_FAX_sign.bin	2XN_CTRL_STDAPP_FAX_cert.pem

Target	Signature file name	Firmware certificate file name
Web Page App	2XN_CTRL_STDAPP_WPG_sign.bin	2XN_CTRL_STDAPP_WPG_cert.pem
Auth App	2XN_CTRL_STDAPP_AUTH_sign.bin	2XN_CTRL_STDAPP_AUTH_cert.pem
Panel Control System App	2XN_CTRL_STDAPP_PCS_sign.bin	2XN_CTRL_STDAPP_PCS_cert.pem
Service Cooperation App	2XN_CTRL_STDAPP_SCO_sign.bin	2XN_CTRL_STDAPP_SCO_cert.pem
Extension Service Platform	2XN_CTRL_EXSP_sign.bin	2XN_CTRL_EXSP_cert.pem
Package Version Info	2XN_CTRL_VINF_sign.bin	2XN_CTRL_VINF_cert.pem
Option Language Data	2V8_OPT_sign.bin	2V8_OPT_cert.pem
OCR Dictionary Data	2V8_OCR_sign.bin	2V8_OCR_cert.pem
FAX Board	3R2_FAX_sign.bin	3R2_FAX_cert.pem
Engine Firmware	2XN_ENGN_sign.bin	2XN_ENGN_cert.pem
Paper Feeder External (for SMT)	2NH_03NJ_sign.bin	2NH_03NJ_cert.pem
Large Capacity Feeder(3000)	2NH_FEED_sign.bin	2NH_FEED_cert.pem
Large Capacity Feeder External (for SMT)	2NH_03NF_sign.bin	2NH_03NF_cert.pem
Paper Feeder Side Deck	2ND_03RL_sign.bin	2ND_03RL_cert.pem
Side Multi Tray	2ND_03S0_sign.bin	2ND_03S0_cert.pem
100-staple Document Finisher	2V8_03SW_sign.bin	2V8_03SW_cert.pem
100-staple Document Finisher Booklet	2TJ_03SP_sign.bin	2TJ_03SP_cert.pem
100-staple Document Finisher (Sub)	2TJ_M3S8_sign.bin	2TJ_M3S8_cert.pem
3000/4000 Document Finisher Main	2ND_03RW_sign.bin	2ND_03RW_cert.pem
3000/4000 Document Finisher Mail Box	2ND_03N0_sign.bin	2ND_03N0_cert.pem
4000 Document Finisher Booklet	2ND_03ND_sign.bin	2ND_03ND_cert.pem
3000 Document Finisher Punch Unit	2RH_03NK_sign.bin	2RH_03NK_cert.pem
Document Processor Main (CIS)	2ND_03R8_sign.bin	2ND_03R8_cert.pem
Scanner Board	2NH_SCAN_sign.bin	2NH_SCAN_cert.pem
Sub Panel Board (Sub Panel)	2V8_SPNL_sign.bin	2V8_SPNL_cert.pem
Sub Panel Board (Configuration File)	2V8_SPCF_sign.bin	2V8_SPCF_cert.pem

### Note for upgrading the firmware

In case that a USB drive takes time to get ready, the time may be longer than the main unit starts up and fail firmware update mode.

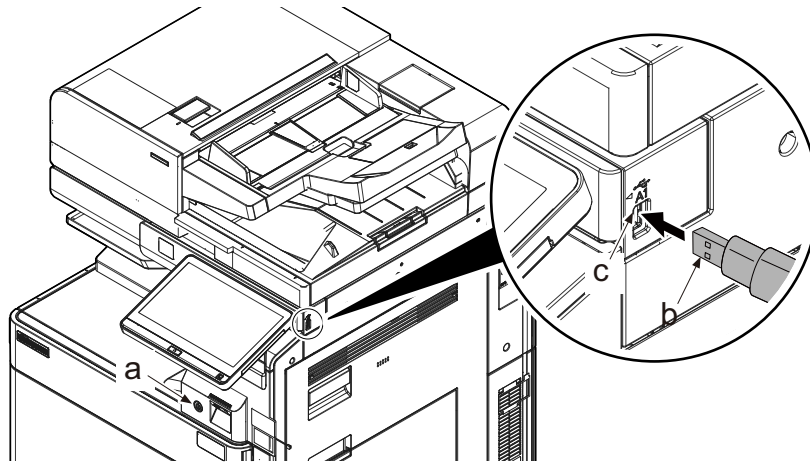
Maintenance mode U025 firmware update (S): Execute the firmware upgrade at Firmware Update (Security)

### Preparations

Unzip the file containing the downloaded firmware and then copy the firmware and high-speed master file (skip files: ES\_SKIP.ON) to "FWUP\_02VK" folder that is made in the root of the USB drive.

\* The high-speed master file has the same version firmware update skip.

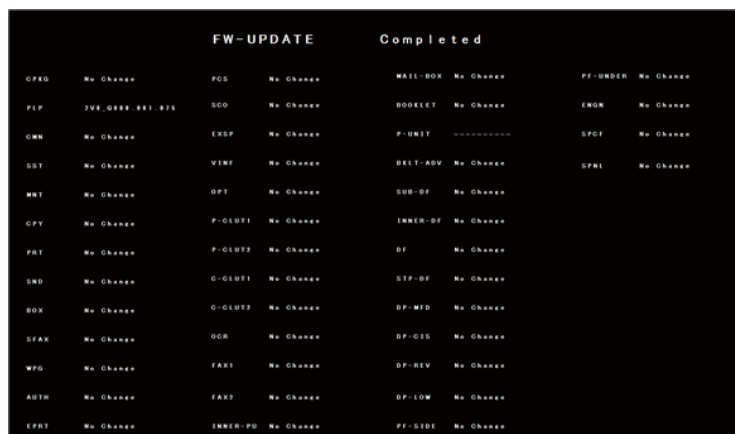
- 1 After turning the power switch (a) on and the screen is properly displayed, turn the power switch (a) off.
- 2 Insert the USB drive (b) with the firmware into the USB drive slot and turn the power switch (a) on.



- Several kinds of firmware updates are processed in parallel.



- "Completed" comes up as the firmware update is complete.
- Check if the new firmware versions are displayed.



- In case of no corresponding master file, "No Change" is displayed. "\*" is displayed after the firmware version update that has been skipped.
- "-----" is displayed when the FAX PWB, the option equipment, etc. is not installed.

In case of an error



- When an error occurs during the firmware upgrade, the process is immediately interrupted and the error code and error message come up.

Error code	Error content	Error code	Error content
0000	Other	S000	Other signature verification error *1
0100	No Master file	S001	Signature verification file is inadequate
0200	Version mismatch of the master file	N001	Network connection failed. *2 (There is no upgrade target)
03xx	No Download File (No.xx)		
04xx	File (No.xx) Checksum mismatch	N002	Network connection failed. *3 (There is an upgrade target)
05xx	File (No.xx) Preparation failure		
06xx	File (No.xx) Oversize		
08xx	File (No.xx) Writing failure		

The file numbers in this table are for “xx” in the error codes.

File number	Target	File number	Target
01	Product Line Platform	09	Fax App
02	Common Basic App	10	Web Page App
03	System Setting App	11	Auth App
04	Maintenance App	12	External Print App
05	Copy App	13	Panel Control System App
06	Print App	15	Service Cooperation App
07	Send App	16	Extension Service Platform
08	Box App	17	Package Version Info

\*1: Including the expired FW certificate

\*2: Automatically restarted for the normal start-up since the normal start-up is available next time.

\*3: Transferred to the USB upgrade mode instead of the automatic restart since the normal start-up may not be available next time.



- 1 Unplug the power cord and disconnect the USB memory.
- 2 Plug in the power cord and turn the power switch (a) on.
- 3 Check that the "Home" screen is displayed and then turn the power switch (a) off.

**IMPORTANT**

Never turn the power switch (a) off or disconnect the USB drive (b) during the firmware update.

### Safe-Update

When the firmware update was interrupted by power shut-off or disconnecting the USB drive during the firmware update, then try again at the next power-on.

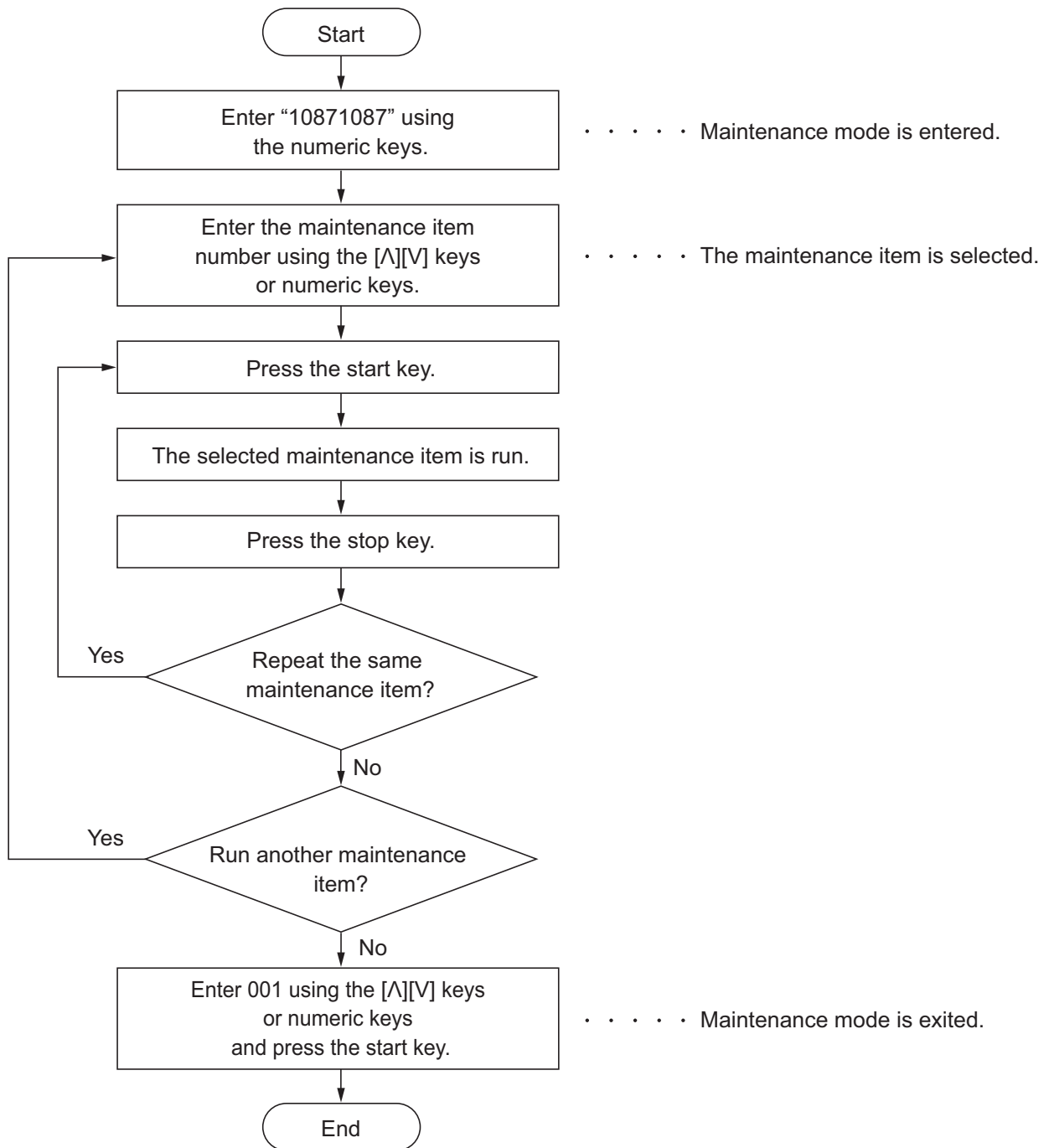
Turn the main power on again while the USB drive is installed.

## 6 Maintenance mode

### 6 - 1 Maintenance mode

The machine is equipped with a maintenance function which can be used to maintain and service the machine.

#### (1) Procedure of the maintenance mode execution



**(2)Maintenance modes list**

Section	Maintenance item	Outline
General	<a href="#">U000 Printing Maintenance Report</a>	Printing each report and exporting them to a USB drive
	<a href="#">U001 Exit the maintenance mode</a>	Exit from the maintenance mode
	<a href="#">U002 Set Factory Default</a>	Initializing to the factory-default setting
	<a href="#">U003 Setting the telephone number of the service person</a>	Set the telephone number of the service person
	<a href="#">U004 Machine Number</a>	Display the machine serial number settings
	<a href="#">U010 Setting the maintenance mode ID</a>	Set the maintenance mode ID
	<a href="#">U018 Firmware self verification</a>	Check the Firmware falsification
	<a href="#">U019 Firmware Version</a>	Display the Firmware version of the PWB
Initializing	<a href="#">U021 Initializes Memory</a>	Initializing the backup RAM
	<a href="#">U023 Reset Settings</a>	Store and recover the adjustment related data stored in the scanner engine PWB
	<a href="#">U024 Formatting HDD</a>	Format/configure the HDD
	<a href="#">U025 Firmware update (S)</a>	Update the Firmware
	<a href="#">U026 Retrieve the backup data</a>	Retrieve the backup data
Drive Paper feed Conveying Cooling	<a href="#">U030 Motor operation check</a>	Drive the drive motor
	<a href="#">U031 Check the conveying switch</a>	Check the conveying switch On/Off
	<a href="#">U032 Clutch operation check</a>	Check the paper conveying clutch operation
	<a href="#">U033 Solenoid operation check</a>	Drive the paper conveying and toner supply solenoids
	<a href="#">U034 Paper timing data adjustment</a>	Adjust the leading edge timing and the center line
	<a href="#">U035 Folio size setting</a>	Set the Folio paper length and width.
	<a href="#">U037 Fan operation check</a>	Drive each fan motor
	<a href="#">U051 Registration paper loop amount adjustment</a>	Adjusts the paper loop amount between the rollers
	<a href="#">U052 Fuser motor speed adjustment</a>	Input the sensor data value and correct the fuser motor speed
	<a href="#">U053 Adjusting the motor speed</a>	Set each motor speed
<a href="#">U059 Fan mode setting</a>	Set the drive mode of the conveying fan motor	
Optical	<a href="#">U061 Lamp lighting check</a>	Turn the exposure lamp on
	<a href="#">U063 Shading position adjustment</a>	Change the shading position of the scanner
	<a href="#">U065 Adjusting the magnification for table scanning</a>	Adjust the magnification for table scanning
	<a href="#">U066 Adjusting the table scanning timing</a>	Adjust the leading edge timing for table scanning
	<a href="#">U067 Adjusting the table scanning center</a>	Adjust the center line for table scanning
	<a href="#">U068 DP Scanning position adjustment</a>	Adjust the starting position for DP scanning
	<a href="#">U070 DP magnification adjustment</a>	Adjust the magnification of DP scanning

Section	Maintenance item	Outline
Optical	<a href="#">U071 Adjust the DP leading edge Timing</a>	Adjust the DP scanning timing
	<a href="#">U072 Adjusting the DP original center</a>	Adjust the center line for DP scanning
	<a href="#">U073 Scanner motor operation check</a>	Move the scanner in the set condition
	<a href="#">U074 Adjust DP input characteristics</a>	Set the DP image scanning density from the document processor
	<a href="#">U087 Setting the DP scanning position change operation</a>	Change the scanning position as the corrective measures for the black lines
	<a href="#">U089 MIP-PG pattern output</a>	Output MIP-PG pattern
	<a href="#">U091 White lines correction setting</a>	Set the white lines detection threshold
	<a href="#">U099 Original size detection setting</a>	Set the original size detection check and detection threshold
High voltage system	<a href="#">U100 Main High voltage adjustment</a>	Adjust the drum surface potential
	<a href="#">U101 Primary transfer voltage adjustment</a>	Set/output the primary transfer voltage
	<a href="#">U106 Secondary transfer voltage adjustment</a>	Set the adjustment value of the secondary transfer voltage
	<a href="#">U107 Primary transfer cleaning voltage adjustment</a>	Set the cleaning voltage of the transfer belt
	<a href="#">U108 Separation Shift bias adjustment</a>	Set the control voltage of the transfer belt unit cleaning
	<a href="#">U110 Drum counter</a>	Display the drum counter
	<a href="#">U111 Drive driving time</a>	Display/set the drum drive time
	<a href="#">U117 Drum unit number</a>	Display the drum number
	<a href="#">U118 Drum unit history</a>	Display the drum history
	<a href="#">U119 Setting the drum</a>	Set the initial LSU light intensity
	<a href="#">U122 Display the primary transfer unit number</a>	Display the primary transfer unit number
	<a href="#">U123 Primary transfer unit history</a>	Display the machine number and the primary transfer unit counter history
	<a href="#">U127 Clearing the transfer count</a>	Display the transfer counter value
	<a href="#">U128 Transfer timing adjustment</a>	Adjust the transfer high voltage output ON/OFF timing
Developer system	<a href="#">U130 Developer initial setting</a>	Set the toner sensor control voltage so that the sensor output value becomes the target one in initial developer.
	<a href="#">U131 Toner sensor control voltage adjustment</a>	Adjust toner sensor control voltage
	<a href="#">U132 Forcible toner supply operation</a>	Execute toner supply up to toner control level
	<a href="#">U135 Checking the toner motor operation</a>	Drive toner motor
	<a href="#">U136 Toner level detection setting</a>	Set the number of printable pages at toner near end
	<a href="#">U139 Temperature, humidity</a>	Display the machine inside and outside temperature/humidity
	<a href="#">U140 Developer bias adjustment</a>	Adjust the developer bias value and set the high altitude mode

Section	Maintenance item	Outline
Fuser	<a href="#">U148 Drum refresh mode setting</a>	Set auto drum refresh mode
	<a href="#">U155 Toner sensor output</a>	Display toner sensor output
	<a href="#">U156 Toner control level adjustment</a>	Display/adjust toner empty level
	<a href="#">U157 Developer drive time</a>	Display/set the developer drive time
	<a href="#">U158 Developer counter</a>	Display/set the developer counter
	<a href="#">U159 Set Toner container function setting</a>	Display/set the accumulated dot counts
	<a href="#">U161 Fuser temperature adjustment</a>	Set the fuser control temperature
	<a href="#">U164 Fuser unit history</a>	Display the machine number and the fuser unit history
	<a href="#">U165 Fuser unit number</a>	Display the fuser unit number
	<a href="#">U167 Clearing the fuser count</a>	Display/clear the counter value
	<a href="#">U169 Setting the fuser power source</a>	Display/set the IH PWB control voltage specification
	<a href="#">U193 Fuser drive control setting</a>	Change the fuser drive control setting
	<a href="#">U199 Fuser temperature</a>	Monitor the fuser temperature
Operation Section Support equipment	<a href="#">U200 All LEDs lighting</a>	Light all the LED on the operation panel
	<a href="#">U201 Initializing the touch panel</a>	Correct the X and Y axis position of the touch screen
	<a href="#">U203 Check DP operation</a>	Check the DP conveying operation for DP itself
	<a href="#">U204 Key card/key counter setting</a>	Key card/key counter connection setting
	<a href="#">U206 Set the coin vendor</a>	Set the coin vendor
	<a href="#">U207 Operation key check</a>	Check the key operation of the operation panel
	<a href="#">U208 Setting the paper size for the side feeder</a>	Set paper size in the side feeder
	<a href="#">U221 USB host lock function setting</a>	Set ON/OFF of the USB Host lock function
	<a href="#">U222 Setting the IC card type</a>	Set the ID card type
	<a href="#">U223 Operation panel lock</a>	Set ON/OFF of the operation panel lock function
	<a href="#">U224 Setting Original Panel Display</a>	Set the opening screen
	<a href="#">U230 Optional device serial number</a>	Display the serial number of the enhancement devices
	<a href="#">U234 Setting destination for punch</a>	Set the punch destination
	<a href="#">U237 Finisher eject volume limit</a>	Set the main tray stack capacity
	<a href="#">U240 Finisher operation check</a>	Check the drive operation
	<a href="#">U241 Finisher switch check</a>	Check the switch operation
	<a href="#">U243 Checking the DP motor</a>	Drive the DP motor/solenoid
	<a href="#">U244 DP switch check</a>	Drive the DP sensor
	<a href="#">U246 Finisher adjustment</a>	Set the finisher adjustment value
<a href="#">U247 Paper feed operation check</a>	Drive the PF motor/clutch	
Mode setting	<a href="#">U250 Set Maintenance Counter Pre-set</a>	Change the preset value
	<a href="#">U251 clearing the maintenance counter</a>	Display/clear/change the counter value

Section	Maintenance item	Outline
Mode setting	<a href="#">U252 Destination</a>	Set the machine operation/display to the each specification
	<a href="#">U253 Switching the double/single counts</a>	Set the counting type
	<a href="#">U260 Switching the timing for copy counting</a>	Set the count-up timing
	<a href="#">U265 Setting by destination</a>	Set the OEM code
	<a href="#">U271 Setting the paper count unit</a>	Set the counting type of the long sized paper
	<a href="#">U276 Switching the copy count mode</a>	Set the counting mode of the mono color copy
	<a href="#">U278 Delivery date setting</a>	Register delivery date
	<a href="#">U283 China Red setting</a>	Set China Red copy function
	<a href="#">U284 Setting the 2-color copy</a>	Switch 2-color copy function
	<a href="#">U285 Set Service Status Page</a>	Set the display of the print coverage report
	<a href="#">U286 Optional language setting</a>	Add/delete/change the optional language
	<a href="#">U287 Automatic recovery function</a>	Set the auto recovery function after the error
	<a href="#">U323 Abnormal temperature and humidity notification setting</a>	Change the display mode of the abnormal temperature/humidity detection
	<a href="#">U325 Paper interval setting</a>	Set the print interval at the high print coverage
	<a href="#">U326 Black line cleaning indication</a>	Change the setting of the black line cleaning guidance display
	<a href="#">U327 Cassette heater control setting</a>	Select the setting of the cassette heater control
	<a href="#">U332 Adjusting the black coverage coefficient</a>	Set coefficient of the custom size paper
	<a href="#">U340 Setting the applied mode</a>	Set the memory allocation
	<a href="#">U341 Printer cassette setting</a>	Set the cassette for print only
	<a href="#">U342 Paper eject control setting</a>	Set/release the continuous no. of output limit
<a href="#">U343 Duplex priority mode</a>	Change to set the duplex printing priority mode	
<a href="#">U345 Setting the value for maintenance due indication</a>	Set to display the maintenance timing	
<a href="#">U346 Selecting Sleep Mode</a>	Set BAM related sleep mode	
Image processing	<a href="#">U402 Adjusting the printing margins</a>	Adjust the scan image margin
	<a href="#">U403 Adjusting margins for scanning an original on the contact glass</a>	Adjust the scan original margin (Table)
	<a href="#">U404 Adjusting margins for scanning an original from the document processor</a>	Adjust the scan original margin (DP)
	<a href="#">U407 Adjusting the writing timing (Duplex/Reversal)</a>	Adjust writing timing when duplexing
	<a href="#">U410 Adjusting the halftone automatically</a>	Acquiring the data for the automatic halftone adjustment and the ID correction
	<a href="#">U411 Scanner auto adjustment</a>	Adjust the scanner/DP automatically
	<a href="#">U412 Adjusting the uneven density</a>	Adjust uneven density of the LSU

Section	Maintenance item	Outline
Image processing	<a href="#">U415 Adjusting the print position automatically</a>	Timing related automatic adjustment
	<a href="#">U425 Set Target</a>	Input Lab value described in the adjustment chart
	<a href="#">U429 Adjusting the color balance offset</a>	Adjust the color balance offset
	<a href="#">U460 Conveying sensor adjustment</a>	Adjust the multi-feed sensor threshold of the DP
	<a href="#">U464 ID correction setting</a>	Set the ID correction
	<a href="#">U465 ID correction data</a>	Display the light intensity control value after the ID correction
	<a href="#">U467 Color registration correction operation setting</a>	Set the color registration correction
	<a href="#">U468 Color registration correction data</a>	Display the color registration correction data
	<a href="#">U469 Primary transfer unit initial setting</a>	Set the primary transfer unit
	<a href="#">U470 Setting the JPEG compression rate</a>	Set the JPEG compression rate
	<a href="#">U474 Checking the LSU cleaning</a>	Set the LSU cleaning operation check and cleaning cycle
	<a href="#">U485 Image process mode setting</a>	Set the image processing
	<a href="#">U486 Color/BW mode setting</a>	Change the setting of the color/BW speed
	<a href="#">U520 Remote Service Setting</a>	Set the remote service
FAX	<a href="#">U600 Initialize: All Data</a>	Initialize all the data/image memories
	<a href="#">U601 Initialize: Keep data</a>	Initialize the software switches except the machine data
	<a href="#">U603 User data 1</a>	Set the FAX user1
	<a href="#">U604 User data 2</a>	Set the FAX user2
	<a href="#">U605 Data clear</a>	Initialize the data for the FAX communication
	<a href="#">U610 System 1</a>	Set no. of lines to discard when 100% magnification RX/auto reduction mode
	<a href="#">U611 System 2</a>	Set the no. of lines to adjust at auto reduction mode
	<a href="#">U612 System 3</a>	Set the operation for the FAX communication
	<a href="#">U615 System 6</a>	Set the recording paper size/RX image size at FAX RX
	<a href="#">U620 FAX System</a>	Set the signal detection method at remote switching
	<a href="#">U625 Communication settings</a>	Set auto redial interval/no. of times
	<a href="#">U630 Communication control 1</a>	Set the FAX communication
	<a href="#">U631 Communication control 2</a>	Set the FAX communication
	<a href="#">U632 Communication control 3</a>	Set the FAX communication
	<a href="#">U633 Communication control 4</a>	Set the FAX communication
	<a href="#">U634 Communication control 5</a>	Set the allowable error when judging the RX TCF signal
	<a href="#">U640 Communication time setting 1</a>	Set the detection time by the remote switching mode
	<a href="#">U641 Communication time setting 2</a>	Set the timeout time at the FAX communication
<a href="#">U650 Modem 1</a>	Set the G3 cable equalizer	

Section	Maintenance item	Outline
	<a href="#">U651 Modem 2</a>	Set the modem output level
	<a href="#">U660 Call Setting</a>	Set the NCU
	<a href="#">U670 List output</a>	Output the list of the FAX communication
	<a href="#">U671 FAX backup data clear</a>	Clear the FAX backup data
	<a href="#">U695 FAX function customization</a>	Set ON/OFF of the FAX bulk TX
	<a href="#">U698 Setting the maintenance port</a>	Set the applicable port
	<a href="#">U699 Software switch: Set</a>	Set the software switches individually
Others	<a href="#">U901 Clearing the counters by paper source</a>	Display/clear the counter by paper source
	<a href="#">U903 Clearing the jam counter</a>	Display/clear the no. of occurrence triggered by jam code
	<a href="#">U904 Clearing the service call error counter</a>	Display/clear the no. of occurrence of service call error/ system error
	<a href="#">U905 Optional counter</a>	Display the counter value
	<a href="#">U906 Resetting the partial operation</a>	Reset the partial operation
	<a href="#">U908 Total counter</a>	Display the total counter
	<a href="#">U910 Black rate data</a>	Clear the print coverage data and period
	<a href="#">U911 Counter by media type</a>	Display/clear the no. of sheets by the media type
Others	<a href="#">U917 Read/Write Backup Data</a>	Read/write the data in the USB drive
	<a href="#">U920 Billing counter</a>	Display the charge count set
	<a href="#">U927 Clearing all the billing/life counters</a>	Clear the charge count/machine life counter value
	<a href="#">U928 Machine life counter</a>	Display the machine life counter value
	<a href="#">U930 Clear the main charger roller counts</a>	Display/Set the MC roller counter value
	<a href="#">U933 Setting the maintenance mode log</a>	Set the maintenance mode log
	<a href="#">U942 DP loop amount setting</a>	Adjust paper loop amount when DP is used
	<a href="#">U952 Maintenance mode workflow</a>	Execute the maintenance flow by the work flow data
	<a href="#">U964 Retrieve Log Flow</a>	Transfer the log files stored in the HDD to the USB drive
	<a href="#">U977 Setting the data capture mode</a>	Store the data sent to the main unit in the USB drive.
	<a href="#">U981 Setting/Checking of predictive maintenance alert data</a>	Refer/change the CBM (Condition Based Maintenance) information in KFS
	<a href="#">U984 Developer unit number</a>	Display the developer unit number
	<a href="#">U985 Developer unit history</a>	Display the developer unit number history
	<a href="#">U989 HDD scan disk</a>	Execute the HDD scan disk
	<a href="#">U990 Clearing the scanner lighting time</a>	Display the accumulated CIS lighting time
	<a href="#">U991 Scanner counter</a>	Display the scanner counter



## (2-1)Content of the maintenance mode

### U000 Printing Maintenance Report

(Message: Output Maintenance Report)

#### Content

Prints the list of the current settings of the maintenance items, paper jam and service call error occurrences. Output the event log and service status page.

Also, sends output data to a USB device.

#### Purpose

Check the current settings of maintenance items, paper jam and service call error occurrences.

When initializing the backup memory or replacing it, print the list of the current settings of the maintenance mode beforehand in order to re-enter the setting value.

#### Method

- 1 Press [Start] key.
- 2 Select the item to output.

Items	Output list
Maintenance	Maintenance mode setting list
User Status	Output User Status Report
Service Status	Output Service Status Report
Event	Output Event Log report
Network Status	Output Network Status Report
Fax System Config *1	Output the list of the own telephone number, confidential box, FAX board ROM version
Fax Action List *1	Output the error history, communication line list
Fax Self Status *1	Output the maintenance mode setting, FAX communication setting
Fax Protocol List *1	Output the communication procedure list
Fax Error List *1	Output the error list
Configuration List	Output the setting information list
LLU Report	Output LLU report
All	Output all reports

\*1: Only if FAX is installed

- 3 Press [Start] key and output the list.



#### NOTE

If A4/Letter paper is available, it is output with this size. Select an alternative cassette in case of missing A4 or Letter size paper. Outputting status is displayed.

#### Method: Send to USB drive.

- 1 Press [Start] key.

- 2 Insert USB drive into the USB drive slot in the main unit.
- 3 Select the item of the list to send.
- 4 Select [USB (Text)] or [USB (HTML)].

Items	Output list
Print	Print report.
USB (Text)	Destination: Send to USB drive (TEXT format)
USB(HTML)	Destination: Send to USB drive (HTML format)

- 5 Press [Start] key.  
send output contents to USB device.

**NOTE**

LLU report cannot be sent to USB device. Only print output is possible.

**Completion**

- 1 Press [Stop] key.  
The screen for selecting a maintenance item No. is displayed.

**(3)Detail of Event Log**

**Event Log**



MFP

XXX9500000

**TASKalfa 8353ci**

(2) 2019/06/14 15:15

(1) Firmware version 2XN\_S000.001.609 2019.06.14

[2XN\_1000.001.004][2NH\_1100.001.002]

(3) (4)

(5) Machine No.:XX9500000

(6) Total Life Count:25481

(7) Color Life Count:6874

**(8) Paper Jam Log**

#	Count.	Event Descriptions	Date and Time
12	5555( 5558)	0501.01.08.01.00	2019/06/12 17:30
11	4444( 4448)	4002.01.08.01.00	2019/06/12 17:30
10	3333( 3338)	0501.01.08.01.00	2019/06/12 17:30
9	2222( 2228)	4002.01.08.01.00	2019/06/12 17:30
8	1111( 1118)	0501.01.08.01.00	2019/06/12 17:30
7	9999( 998)	4002.01.08.01.00	2019/06/12 17:30
6	8888( 888)	0501.01.08.01.00	2019/06/12 17:30
5	7777( 778)	0501.01.08.01.00	2019/06/12 17:30
4	6666( 668)	0501.01.08.01.00	2019/06/12 17:30
3	5555( 558)	0501.01.08.01.00	2019/06/12 17:30
2	4444( 448)	0501.01.08.01.00	2019/06/12 17:30
1	3333( 338)	4002.01.08.01.00	2019/06/12 17:30

**0501.01.08.01.00**

(a) (b) (c) (d) (e)

**(9) Service Call Log**

#	Count.	Service Code	Data and Time
8	1111( 1118)	01.00.6000	2019/06/12 17:30
7	9999( 998)	01.01.2100	2019/06/12 17:30
6	8888( 888)	01.01.0000	2019/06/12 17:30
5	7777( 778)	01.00.6000	2019/06/12 17:30
4	6666( 668)	01.00.2100	2019/06/12 17:30
3	5555( 558)	01.01.4000	2019/06/12 17:30
2	4444( 448)	01.00.6000	2019/06/12 17:30
1	3333( 338)	01.00.2100	2019/06/12 17:30

**(10) Maintenance Log**

#	Count.	Item.	Data and Time
2	5555( 558)	02.01	2019/06/12 17:30
1	4444( 448)	02.02	2019/06/12 17:30

**(11) Toner Log**

#	Count.	Item.	Serial Number	Data and Time	Detail
4	6666( 6668)	01.00	0123456789ABCDEF	2019/06/12 17:30	A.000
3	5555( 5558)	01.00	0123456789ABCDEF	2019/06/12 17:30	B.010
2	4444( 4448)	01.00	0123456789ABCDEF	2019/06/12 17:30	B.100
1	3333( 3338)	01.00	0123456789ABCDEF	2019/06/12 17:30	C.029

# Event Log

MFP

TASKalfa 8353ci

Firmware version 2V8\_S000.001.609 2019.06.14



XXX9500000

2019/06/14 15:15

[2XN\_1000.001.004][2NH\_1100.001.002]

Machine No.:XXX9500000

Total Life Count:25481

Color Life Count:6874

## (12) Counter Log

(f) J0000:	0	J4202:	0	J7300:	0
J0100:	1	J4203:	1	J7310:	1
J0101:	11	J4204:	1	J7404:	11
J0104:	22	J4205:	0	J7500:	2
J0105:	1	J4208:	1	J7600:	1
J0106:	1	J4209:	11	J7700:	0
J0107:	1	J4211:	2	J7710:	1
J0110:	1	J4212:	2	J7800:	1
J0111:	1	J4213:	1	J7810:	2
J0114:	1	J4214:	2	J7900:	1
J0212:	1	J4215:	1	J7901:	1
J0213:	9	J4218:	1	J7902:	0
J0300:	1	J4219:	9	J9000:	1
J0501:	1	J4301:	1	J9001:	1
J0502:	1	J4302:	1	J9002:	2
J0503:	1	J4303:	1	J9004:	1
J0504:	1	J4304:	1	J9005:	1
J0508:	1	J4305:	1	J9226:	2
J0509:	1	J4309:	1	J9007:	1
J0511:	1	J4311:	1	J9008:	1
J0512:	1	J4312:	1	J9009:	2
J0513:	1	J4313:	1	J9010:	1
J0514:	1	J4314:	1	J9011:	1
J0518:	1	J4315:	1	J9020:	2
J0519:	1	J4319:	1	J9030:	1
J0523:	1	J4401:	1	J9110:	1
J0524:	1	J4402:	1	J9210:	2
J0533:	1	J4403:	1	J9300:	1
J0534:	1	J4404:	1	J9310:	1
J0555:	1	J4405:	1	J9400:	2
J1403:	1	J4409:	1	J9410:	1
J1413:	1	J4701:	1	J9600:	1
J1414:	1	J4702:	1	J9610:	2
J1604:	1	J4703:	1	(g)C1020:	1
J1614:	1	J4704:	1	CF245:	11( 0)
J4002:	1	J4705:	1	CF248:	12( 0)
J4003:	1	J4709:	1	CF345:	13( 0)
J4004:	1	J4711:	1	(h)T00:	10
J4005:	1	J4712:	1	M00:	20
J4012:	1	J4713:	1	M01:	30
J4013:	1	J4714:	0		
J4014:	1	J4715:	1		
J4015:	1	J4719:	1		
J4101:	1	J4901:	0		
J4102:	1	J4902:	1		
J4103:	1	J4903:	11		
J4104:	1	J4904:	2		
J4105:	1	J4905:	1		
J4108:	1	J4908:	2		
J4109:	1	J4909:	1		
J4111:	1	J4911:	2		
J4112:	1	J4912:	1		
J4113:	1	J4913:	2		
J4114:	1				

**(3-1)Contents of Event Log**

No.	Contents
(1)	System version
(2)	System date
(3)	Engine Firmware version
(4)	Engine boot version
(5)	Machine serial number
(6)	Total life counter
(7)	Color life counter

No.	Contents			
(8)	Paper Jam Log			
#	Count.	Event Contents	Date and Time	
Records 1 to 16 occurrences. If the past paper jam occurrence is less than 16, all of them are indicated. The oldest log is deleted when exceeding 16 occurrences.	The total page count at the time of a paper jam.	Log code (5 types in hexadecimal)  (a) Cause of paper jam (b) Paper source (c) Paper size (d) Media type (e) Output tray	Date and time of occurrence	
(a) Detail of Cause of paper jam (Hexadecimal)				
• Refer to "(2-1) Paper misfeed indication", for the details of paper jam causes. <a href="#">(P.7-78)</a>				
(b) Detail of paper source (Hexadecimal)				
00: MP tray 01: Cassette 1 02: Cassette 2 (paper feeder) 03: Cassette 3 (paper feeder) 04: Cassette 4 (paper feeder) 05: Cassette 5 (paper feeder) 06: Cassette 6 (paper feeder) 07: Cassette 7 (paper feeder) 08 to 09: Reserved				
(c) Detail of paper size (Hexadecimal)				
00: Not specified 01: Monarch 02: Business 03: International DL 04: International C5 05: Executive 06: Letter-R 86: Letter-E 07: Legal 08: A4R 88: A4E 09: B5R 89: B5E 0A: A3	0B: B4 0C: Ledger 0D: A5R 8D: A5E 0E: A6 0F: B6 10: Commercial #9 11: Commercial #6 12: ISO B5 13: Custom size 1E: C4 1F: Hagaki 20: Oufuku Hagaki 21: Oficio II	22: Special 1 23: Special 2 24: A3 Wide 25: Ledger Wide 26: Full bleed paper (12x8) 27: 8K 28: 16K-R A8: 16K-E 32: Statement-R B2: Statement-E 33: Folio 34: Youkei type 2 35: Youkei type 4		

No.	Contents		
(7)	Paper Jam Log		
cont.	(d) Detail of paper type (Hexadecimal)		
	01: Plain 02: Transparency 03: Preprinted 04: Labels 05: Bond 06: Recycled 07: Vellum 08: Rough 09: Letterhead	0A: Color 0B: Prepunched 0C: Envelope 0D: Hagaki 0E: Coated 0F: 2nd side 10: Media 16 11: High quality	15: Custom 1 16: Custom 2 17: Custom 3 18: Custom 4 19: Custom 5 1A: Custom 6 1B: Custom 7 1C: Custom 8
	(e) Eject paper details (Hexadecimal number)		
	01: Main unit face down (FD) 02: Main unit face up (FU)/4000-sheet finisher left sub tray (FU) 03: 4000-sheet finisher main tray (FD) 05: job separator tray 06: 4000-sheet finisher right sub tray (FU) 07: 4000-sheet finisher left sub tray (FD) 09: 4000-sheet finisher 0A: middle folding unit tray 0B: mail box tray 1 (FD) 0C: mail box tray 1 (FU) 15: mail box tray 2 (FD) 16: mail box tray 2 (FU) 1F: mail box tray 3 (FD) 20: mail box tray 3 (FU) 29: mail box tray 4 (FD) 2A: mail box tray 4 (FU) 33: mail box tray 5 (FD) 34: mail box tray 5 (FU) 3D: mail box tray 6 (FD) 3E: mail box tray 6 (FU) 47: mail box tray 7 (FD) 48: mail box tray 7 (FU) 04/0D/0E: Unused		

No.	Contents			
(8)	Service Call Log			
	#	Count.	Service Code	Date and Time
	Up to 8 times of Self diagnostics errors are recorded. If the occurrence of the previous self-diagnostic error is 8 or less, all of the diagnostics errors are logged.	The total page count at the time of the self diagnostic error. (Refer to <a href="#">P.7-282</a> )	The first two digits (ID number) 01: Service call/System error 02 Unit replacement Next two digits (Auto reboot information) 00: Without auto reboot 01: Auto reboot Last 4 digits Self diagnostic error code (Refer to <a href="#">P.7-282</a> ) (Example) 01.00.6000 01 indicates self diagnostic error, 00 is without auto reboot and 6000 indicates self diagnostic error code. The auto reboot function is set by U287	Date and time of occurrence
(10)	Maintenance Log			
	#	Count.	item	Date and Time
	Records 1 to 8 occurrences of unknown toner detection. If the occurrence of the previous unknown toner detection is less than 8, all of the unknown toner detection are logged.	Total page counts at the time of the replacement of the maintenance item.	Maintenance item code (1-byte value to indicate 2 items) First byte (Replacing item) First byte (Replacing item) 02: Maintenance kit Second 1 byte (replacement item type) 01: MK-8725	Date and time of occurrence
(11)	toner Log			
	#	Count.	Item. Serial Number	Date and Time
	Records 1 to 32 occurrences of unknown toner detection. If the occurrence of the previous unknown toner detection is less than 32, all of the unknown toner detection are logged.	Records the log (Total page) at the timing when the toner container is replaced. (Both genuine and non-genuine) If installing the same toner container twice or used toner container, all of them are counted.	Log code First 1 byte (Replacement item) 01: Genuine product 02: Non-genuine product Next 1 byte (type of replacement item) 00: Black Last 16 digits Display the serial number of the toner container. <ul style="list-style-type: none"><li>* When detecting non-genuine toner, no serial number is displayed.</li></ul>	Date and time of occurrence



No.	Contents			
(11) cont.	Detail  Further information of toner replacement <ul style="list-style-type: none"> <li>• - The first letter</li> </ul> A: Start B: Replace with the new toner C: Replaced with the used or non-genuine toner <ul style="list-style-type: none"> <li>• - Next 3 digits</li> </ul> Toner remaining (%)			
(12)	Counter Log			
	(f) Paper jam  Indicate the log counter of paper jams by causes. See Paper Jam Log. <ul style="list-style-type: none"> <li>• - All causes are displayed even no record.</li> </ul>	(g) Self diagnostic error  Indicate the log counter of self diagnostic errors by causes.  Service call/System error includes the number of auto reboots either.  (Example) CF245: 4 (2) System Error 245 occurred last four times and then executed the auto reboot twice.	(h) Replacement for the Maintenance item Item  Indicate the log counter by the maintenance replacing items.  T: Toner container 00: Black  M: Maintenance kit 02: MK-8725  (Example) T00: 1 Ink container (Black) replaced once.  Toner container replacement log counts the time of replacement since the 1st container. If installing the same toner container twice or used toner container, all of them are counted. (genuine toner only)	Configure with 3 log counters, paper jams, self diagnostic errors, and maintenance replacement items.

(4)Detail of the service status page

# Service Status Page

**MFP**  
**TASKalfa 8353ci**

(2) **ZS39500009**  
(3) 27/06/2019 04:11  
(4) [2.1.11]

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(1) Firmware version 2XN\_S000.001.609 2019.06.14
[2XN\_1000.001.004][2NH\_1100.001.002]

(5)
(6)

<b>Controller Information</b>				
<b>Memory Status</b>		Default Pattern Switch	B8	00
(7) Total Size 4.5 GB		Page Orientation	C1	00
<b>Time</b>				
(8) Local Time Zone				
GMT Greenwich Mean Time: Dublin, Edinburgh, Lisbon, London				
(9) Date and Time	27/06/2019 04:11			
(10) Time Server				
<b>Installed Options</b>				
(11) Side Feeder	Not Installed			
(12) SD Card	Not Installed			
(13) Finisher	4000Finisher(100)			
(14) Mail Box	Not Installed			
(15) Job Separator	Not Installed			
(16) Card Authentication Kit (B)	Not Installed			
(17) Internet FAX Kit(A)	Not Installed			
(18) UG-33	Not Installed			
(19) UG-34	Not Installed			
(20) USB Keyboard	Not Connected			
(21) USB Keyboard Type	US-English			
<b>Print Coverage</b>				
(22) Average (%)	/ Usage Page(A4/Letter Conversion)			
(23) Total				
K(Total):	0.00 / 0.00			
K(Color):	0.00 / 0.00			
K(B&W):	0.00 / 0.00			
C:	0.00 / 0.00			
M:	0.00 / 0.00			
Y:	0.00 / 0.00			
(24) Copy				
K(Total):	0.00 / 0.00			
K(Color):	0.00 / 0.00			
K(B&W):	0.00 / 0.00			
C:	0.00 / 0.00			
M:	0.00 / 0.00			
Y:	0.00 / 0.00			
(25) Printer				
K(Total):	0.00 / 0.00			
K(Color):	0.00 / 0.00			
K(B&W):	0.00 / 0.00			
C:	0.00 / 0.00			
M:	0.00 / 0.00			
Y:	0.00 / 0.00			
(26) FAX(Total)				
K:	0.00 / 0.00			
(27) Period	(2017/06/23 - 2017/07/03 01:46)			
(28) Last Page K/C/M/Y (%)	0.00			
(29) Last Job				
Total K (%)	0.00			
Color K/C/M/Y (%)	0.00 / 0.00 / 0.00 / 0.00			
B&W K (%)	0.00			
(30) <b>FAX Information</b>				
Rings (Normal)	2			
Rings (FAX/TEL)	0			
Rings (TAD)	15			
(31) <b>FRPO Status</b>		PDF mode	Y5	00
User Top Margin	A1+A2/100	e-MPS error control	Y6	03
User Left Margin	A3+A4/100			
User Page Length	A5+A6/100			
User Page Width	A7+A8/100			
Reserved	B0			00

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1

# Service Status Page



MFP  
TASKalfa 8353ci

ZS39500009

27/06/2019 04:11

[2.1.11]

Firmware version 2XN\_S000.001.609 2019.06.14

[2XN\_1000.001.001][2NH\_1100.001.002]

## Controller Information

### RP Code

(32) 0008 01E2 3177  
0008 027A C873  
FFFF FFFF FFFF  
0008 01E2 31F5

### (33) Print Settings

MP Tray Priority Off

### (34) Storage Status

Hard Disk 320GB  
SSD 8GB  
SD Card 4.0GB  
USB Memory 256.0MB

### (35) System Firmware(Details)

2V8\_Q000.001.146  
2V8\_QA00.001.146  
2V8\_R000.001.146  
2V8\_R100.001.146  
2V8\_R200.001.146  
2V8\_R300.001.146  
2V8\_R400.001.146  
2V8\_R500.001.146  
2V8\_R600.001.146  
2V8\_R700.001.146  
2V8\_R800.001.146  
2V8\_R900.001.146  
2V8\_RB00.001.146  
2V8\_RD00.001.146  
2V8\_RA00.001.146  
2V8\_S100.001.146

## Engine Information

(36) NVRAM Version \_Cb26630\_Cb26630  
(37) MAC Address 00:17:C8:16:84:04  
(38) DP Counters  
Total 2677



No.	Items	Contents
(1)	Firmware Version	-
(2)	Machine serial number	-
(3)	System date	-
(4)	API version of the HyPAS application	
(5)	Engine Firmware version	-
(6)	Engine boot version	-
(7)	Total memory size	-
(8)	Local time zone	-
(9)	Date and time	Day/Month/Year hour: minute
(10)	Time Server	-
(11)	Side deck installation	Available/Not available
(12)	SD memory card	Available/Not available
(13)	Finisher installation	4000-sheet finisher/inner finisher/4000-sheet finisher/100-staple finisher/Not available
(14)	Mailbox installation	Available/Not available
(15)	Job separator installation	Available/Not available
(16)	ID Card Authentication Kit	Introduced/Before introduction/Trial
(17)	Availability of the Internet FAX Kit (A)	Installed/Not Installed
(18)	Availability of UG-33	Introduced/Before introduction/Trial
(19)	Availability of UG-34	Installed/Not Installed
(20)	USB keyboard connection status	Connected/Not connected
(21)	Type of the USB keyboard	US-English/US-English with Euro symbol/German/French
(22)	Print coverage	Print Coverage provides just a reference of toner consumption and is not actual toner consumption.
(23)	Average coverage for total	Black/Cyan/Magenta/Yellow
(24)	Average coverage for copy	Black/Cyan/Magenta/Yellow
(25)	Average coverage for print	Black/Cyan/Magenta/Yellow
(26)	Average coverage for FAX	Black/Cyan/Magenta/Yellow
(27)	Cleared and output date	-
(28)	Coverage on the last page	Black/Cyan/Magenta/Yellow
(29)	Coverage information of the last job	Black/Cyan/Magenta/Yellow
(30)	FAX information	Number of fax rings (Normal): 0 to 15 Number of fax rings before auto switching 0 to 15 Number of rings before connecting to the answering machine 0 to 15
(31)	FRPO setting	-

No.	Items	Contents
(32)	RP code	Coding the engine software version and the date of the latest update.
		Coding the main software version and the date of the latest update.
		Coding the engine Firmware version and the date of the previous update.
		Coding the main software version and the date of the previous update.
(33)	MP tray priority setting	Off (No setting)/Auto (Auto paper feed)/Always (All times)
(34)	Storage availability	Hard disk (HDD)/SSD
(35)	System Firmware (Detail)	-
(36)	NVRAM version	<p>_ 1F3 1225 _ 1F3 1225</p> <p>(a) (b) (c) (d) (e) (f)</p> <p>(a) Consistency of the current Firmware version and the database _ (Underscore): OK * (Asterisk): NG</p> <p>(b) Database version</p> <p>(c) The oldest time stamp of database version</p> <p>(d) Consistency of the present software version and the ME Firmware version _ (Underscore): OK * (Asterisk): NG</p> <p>(e) ME Firmware version</p> <p>(f) The oldest time stamp of the ME Firmware version</p> <p>It is normal in conditions of; (a) and (d) are underscored, (b) and (e) are same and (c) and (f) are same.</p>
(37)	Mac address	-
(38)	DP counter	Scan counts of DP
(39)	Destination information	-
(40)	Area information	-
(41)	Margin setting	Top margin/Left margin
(42)	L parameters	Integer part of top margin/Decimal part of top margin/Integer part of left margin/Decimal part of left margin
(43)	Life counter (The first line)	Machine life/ Color life/MP tray/Cassette1/Cassette 2/Cassette3/ Cassette4/Cassette5/Duplex
	Life counter (The second line)	Drum unit K/Drum unit C/Drum unit M/Drum unit Y/Primary transfer unit/Secondary transfer unit/Developer unit K/Developer unit C/ Developer unit M/Developer unit Y/the main charger roller K/the main charger roller C/the main charger roller M/the main charger roller Y/Fuser unit/Fuser discharge unit
	Life counter (The third line)	Maintenance kit/Maintenance kit preset
(44)	Panel lock information	<p>F00: OFF</p> <p>F01: Partial lock1</p> <p>F02: Partial lock2</p> <p>F03: Partial lock3</p> <p>F04: Full Lock</p>

No.	Items	Contents
(45)	USB information	U00: Not Connected U01: Full speed U02: Hi speed
(46)	Paper handling information	0: Paper source select 1: Paper source fixed
(47)	Auto cassette change mode	0: OFF 1: ON (Default)
(48)	Color printing double count mode	0: All single counts 3: Folio (Less than 330 mm length), Single counts
(49)	Black and white printing double count mode	0: All single counts 3: Folio (Less than 330 mm length), Single counts
(50)	Billing counts timing	0: When secondary paper feed starts 1: When the paper is ejected
(51)	Internal temperature	-
(52)	External temperature	-
(53)	External relative humidity	-
(54)	External absolute humidity	-
(55)	Machine inside humidity	
(56)	LSU1 humidity information	
(57)	LSU 2 humidity information	
(58)	Asset Number	-
(59)	Job end timeout	-
(60)	Job end detection mode	0: Detect as one job, even if contained multiple jobs 1: Detect as individual job, dividing multiple jobs at a break in job
(61)	Prescribe environment reset	0: Off 1: On
(62)	Scan to SMB mode setting	0: Off 1: On
(63)	Display logo	0: Off 1: On
(64)	Media type properties 1 to 28 (18, 19, 20 are not available)  See MDAT command in "Prescribe Commands Reference Manual" for further information.	Weight settings Fuser settings 0: Light 1: Normal 1 2: Normal 2 3: Normal 3 4: Heavy 1 5: Heavy 2 0: Disable 7: Heavy 4 8: Heavy 5 9: Heavy 4
(65)	Calibration information	-

No.	Items	Contents
(66)	RFID information (K)	-
(67)	RFID reader/writer version	-
(68)	Optional paper feeder Firmware version	-
(69)	Optional language Firmware version	-
(70)	Color table version for printer	-
(71)	Color table 2 version for printer	-
(72)	Color table version for copy	-
(73)	Color table 2 version for copy	-
(74)	Altitude Adjustment setting	0: Normal 0 1: 1001 - 2000m 2: 2001 - 3000m 3: 3001 - 3500m
(75)	Auto color conversion judgment	0: Off 1: On
(76)	Toner coverage setting	0: Full-color count display 1: Color coverage count display
(77)	Low coverage setting	0.1 to 100.0
(78)	Middle coverage setting	0.1 to 100.0
(79)	Data sanitization information	FAX Board/Main Memory/Panel Memory/HDD/SSD/Execute time 1: Success 0: Fail -: Not performed or Not installed
(80)	Toner low setting	0: Disabled 1: Enabled
(81)	Toner low detection level	0 to 100 (%)
(82)	Shift limitation setting for one copy original.	0: Disable (Limitation OFF) 1: Enable (Limitation ON)
(83)	Banner print confirmation display setting	0: No display 1: Display every page
(84)	ErP mode setting	0: ErP not available 1: ErP available
(85)	Full-page print mode	0: Normal mode (Factory setting) 1: Full-page mode
(86)	Wake-up mode	0: Off (No wake up) 1: On (Wake up)
(87)	Drum serial number	Black/Cyan/Magenta/Yellow
(88)	Developer serial number	Black/Cyan/Magenta/Yellow



## U001 Exit the maintenance mode

(Message: Set Factory Default)

### Contents

Exit the maintenance mode and return to the copy mode.

### Purpose

Exit from the maintenance mode.

### Method

- 1 Press [Start] key.  
Return to copy mode.

## U002 Set Factory Default

### Contents

Initializing to the factory-default setting

### Purpose

Set the machine setting values to the factory default

### Method

- 1 Press [Start] key.
- 2 Select [Mode1(All)].
- 3 Press [Start] key.

Items	Contents
Mode1(All)	Set the machine setting values to the factory default

- 4 Turn the power switch off.



### NOTE

An error code is displayed in case of the initialization error.

When errors occur, turn the power switch off then on, and execute initialization by using maintenance mode U002 again.

Wait more than 5 seconds between the power off and on.

### Error code list

Codes	Contents
0002	Initialize failure of setting information
0003	Initialize failure of address book information
0004	Initialize failure of Job accounting information
0005	Initialize failure of Event log/Fax communication log/Job log information
0006	Initialize failure of fax memory transfer/panel program information
0007	Initialize failure of shortcut key information
0008	Initialize failure of fax reserve information
0009	Initialize failure of account information
0010	Back up failure of RP code
0011	Initialize failure of counters in Event log/billing/maintenance category
0012	Initialize failure of coverage counter
0013	Initialize failure of machine life counter information
0014	Initialize failure of engine information
0015	Initialize failure of scanner information
0016	Initialize failure of log verification
0017	Initialize failure of device information
0018	Initialize failure of unit log information

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Codes	Contents
0019	Initialize failure of counter information by coverage/Job/CBM alert feeding
0020	Initialize failure of Destination history and information

## U003 Setting the telephone number of the service person

(Message: Set Telephone Number for Service Call)

### Contents

Set phone number that will be displayed at the service call error.

### Purpose

Set telephone number for service call at the installation of machine.

### Setting

- 1 Press [Start] key.  
Input keys are indicated on the touch screen.
- 2 Input telephone number (15 digits maximum).
- 3 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U004 Machine Number

(Message: Machine No.)

### Contents

Set or display the machine serial number.

### Purpose

Check the machine serial number

Execute in case of displaying "C0180 machine number mismatch" after replace main or engine PWB.

### IMPORTANT

Do not execute U004, or select [Execute] and press [Start] key, if machine serial number in engine PWB is different from main unit serial number. Different machine serial number is overwritten in the main PWB.

### Method

- 1 Press [Start] key.

**In case of matching the machine serial number between engine PWB and main PWB,**

Items	Contents
Machine No.:	Display the machine serial number in the main PWB.

**In case that the machine serial number in the engine PWB does not match the one in the main PWB,**

Items	Contents
Machine No.: (Main)	Display the machine serial number in the main PWB.
Machine No.: (Eng)	Display the machine serial number in the engine PWB.

### Setting

In case that the machine serial number in the engine PWB does not match the one in the main PWB,

- 1 Select [Execute].
- 2 Press [Start] key.  
Start serial number writing.
- 3 Turn the power switch OFF/ON.  
Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U010 Setting the maintenance mode ID

(Message: Set Maintenance Mode ID)

### Contents

Change the maintenance mode ID for service.

### Purpose

Changing the maintenance mode ID makes service activity more secure.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
New ID	Enter a new 8-digit maintenance ID
[New ID (Reconfirm)].	Enter a new 8-digit maintenance ID (to confirm)
Initialize	Initialize the maintenance mode ID for service.

### Setting: New ID

- 1 Select [New ID].
- 2 Press numeric keys (0–9, \*, #) to enter a new 8-digit ID.



### NOTE

Either [\*] or [#] must be included.

- 3 Press [Start] key to set the setting value.
- 4 Select [New ID (Reconfirm)].
- 5 Press numeric keys (0–9, \*, #) to enter the new 8-digit ID again.
- 6 Press [Start] key to set the setting value.

### Method: Initialize

- 1 Select [Initialize].
- 2 Press [Start] key to initialize the ID.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.
- When executing to change the maintenance mode ID for the field service, following error code come up in case that new ID has inappropriate manner.

### Error message list

Contents	Error message
No "#" or "*" in the ID.	No "#" or "*" is included in the ID.
New ID does not match with New ID (Reconfirm).	ID does not match.
ID entered is less than 8-digits.	Input 8-digit ID.

## U018 Firmware self verification

(Message: Check Firmware Checksum)

### Contents

Verify that the Firmware is not falsified.

### Purpose

Calculate the checksum and verify the Firmware is not falsified.

### Method

- 1 Press [Start] key.

Items	Contents
Expected	Display the checksum expected value
Result	Display the checksum calculation result
Execute	Execute self-verification

- 2 Select [Execute].

- 3 Press [Start] key.

After execution, display the checksum that obtained in [Expected].

The following code come up if the verification result is injustice.

Items	Contents
f001	The expected value file does not exist
f002	Expected value file read failure
f003	Illegal data of the expected value file (not 64-byte data)
s001	Obtain the checksum failure
NG	Discrepancy in check sum value

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U019 Firmware Version

(Message: Firmware Version)

### Contents

Display the Firmware version installed in each PWB.

### Purpose

Check the Firmware version installed in each PWB.

### Method

- 1 Press [Start] key.  
The Firmware version is displayed.
- 2 Change the screen using the [▲][▼] key.

Items	Contents
Controller	Main Firmware
CMN App	CMN App Firmware
SST App	SST App Firmware
MNT App	MNT App Firmware
CPY App	CPY App Firmware
PRT App	PRT App Firmware
SND App	SND App Firmware
BOX App	Box App Firmware
FAX App	FAX App Firmware
WPG App	WPG App Firmware
AUTH App	AUTH App Firmware
PCS App	PCS App Firmware
EPRT App	EPRT App Firmware
SCO App	SCO App Firmware
PLP	PLP Firmware
EXSP	EXSP Firmware
Version Info	Version Info Firmware
RFID	RFID Firmware
OCR	OCR Firmware
Sub MMI	Sub MMI Firmware
Sub MMI Boot	Sub MMI Boot
Sub MMI Conf	Sub MMI Configuration Firmware
Engine	Engine Firmware
Engine Boot	Engine Boot
Scanner	Scanner Firmware
Scanner Boot	Scanner Boot
HyPAS- Embedded API	HyPAS - Embedded API Firmware



Items	Contents
Option Language	Option Language Firmware
Color Table 1(Prn)	Color table 1 (Prn) Firmware
Color Table 2(Prn)	Color table 2 (Prn) firmware
Color Table 1(Copy)	Color table 1 (Copy) Firmware
Color Table 2(Copy)	Color table 2 (Copy) firmware
DP	Document Processor Firmware
DP Boot	Document Processor Boot
DP SSW	Document Processor SSW Firmware
PF1 *8	Paper Feeder Firmware
PF1 Boot*8	Paper Feeder Boot
Side PF	Side Paper Feeder Firmware
Side PF Boot	Side Paper Feeder Boot
PF2 *8	Paper Feeder Firmware
PF2 Boot*8	Paper Feeder Boot
DF *2	Document Finisher Firmware
DF Boot *2	Document Finisher Boot
DF Sub*3	Document Finisher Sub Firmware
DF Sub Boot *3	Document Finisher Sub Boot
PH*4	Punch Firmware
PH Boot*4	Punch Boot
MT*5	Mail Box Firmware
MT Boot*5	Mail Box Boot
BF*6	Booklet Unit Firmware
BF Boot*6	Booklet Unit Boot
Fax APL1 *1	Fax APL1 Firmware
Fax Boot1 *1	Fax1 Boot
Fax IPL1 *1	Fax IPL1 Firmware
Fax APL2 *1	Fax APL2 Firmware
Fax Boot2 *1	Fax2 Boot
Fax IPL2 *1	Fax2 IPL Firmware
Application Name 01	Application 1 Firmware
Application Name 02	Application 2 Firmware
Application Name 03	Application 3 Firmware
Application Name 04	Application 4 Firmware
Application Name 05	Application 5 Firmware
Application Name 06	Application 6 Firmware
Application Name 07	Application 7 Firmware

Items	Contents
Application Name 08	Application 8 Firmware
Application Name 09	Application 9 Firmware
Application Name 10	Application 10 Firmware
Application Name 11	Application 11 Firmware
Application Name 12	Application 12 Firmware
Application Name 13	Application 13 Firmware
Application Name 14	Application 14 Firmware
Application Name 15	Application 15 Firmware
Application Name 16	Application 16 Firmware

\*1: Only if fax is installed/\*2: Only if DF is installed/\*3: Only if DF (100 sheets staple) is install/\*4: Only if PH is install/\*5 Only if MT is installed/\*6: Only if BF is installed

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U021 Initializes Memory

(Message: Initialize Memory)

### Contents

Initialize all settings, except not adjustable setting such as each counter, service call error history and mode setting, and also initialize the backup RAM according to the settings selected in the maintenance mode U252 (Setting the destination).

### Purpose

Initialize the backup data except not adjustable settings in the field.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Initialize data according to the destination information.

- 1 Press [Start] key.



### NOTE

All data other than for adjustments is initialized by the destination setting.

- 2 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

**NOTE**

An error code is displayed in case of the initialization error.

When errors occur, turn the power switch off then on, and execute initialization by using maintenance mode U021 again.

**Error code list**

Items	Contents
0002	Initialize failure of setting information
0003	Initialize failure of address book information
0004	Initialize failure of Job accounting information
0005	Initialize failure of Event log/Fax communication log/Job log information
0006	Initialize failure of fax memory transfer/panel program information
0007	Initialize failure of shortcut key information
0008	Initialize failure of fax reserve information
0009	Initialize failure of account information
0010	Back up failure of RP code
0011	Initialize failure of counters in Event log/billing/maintenance category
0012	Initialize failure of coverage counter
0013	Initialize failure of machine life counter information
0014	Initialize failure of engine information
0015	Initialize failure of scanner information
0016	Initialize failure of log verification
0017	Initialize failure of device information
0018	Initialize failure of unit log information
0019	Initialize failure of counter information by coverage/Job/CBM alert feeding
0020	Initialize failure of Destination history and information

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U023 Reset Settings

(Message: Reset Settings)

### Contents

Store and recover the adjustment related data stored in the scanner engine PWB

### Purpose

Recover to the default setting of the adjustment related data when the scanner engine PWB becomes error.

### Method

- 1 Press [Start] key.
- 2 Select [Initialize].

Items	Contents
Installation	Store or recover the setting of the default value.

- 3 Select the item to execute.

Items	Contents
Backup	Store
Restore	Recover



### NOTE

Restore cannot be executed if the settings were not stored.

When completing correctly, OK is displayed and when completing abnormally, NG is displayed.

- 4 Press [Start] key to start processing.
- 5 After [Restore] is completed, turn the power switch OFF/ON.  
Wait more than 5 seconds between the power off and on.

## U024 Formatting HDD

(Message: Format HDD)

### Contents

Initialize HDD.

### Purpose

Initialize the HDD when replacing the HDD in the field.

### IMPORTANT

The following settings are also initialized with this HDD initialize.

System Menu (User Management, Job Accounting, Address Book, One Touch Key, Document Box, etc.), Shortcut key, Panel program.

The following installed firmwares are deleted with Full format function.

Optional language, HyPAS application (FMU, etc.), OCR dictionary software, Color table.

### Method

- 1 Press [Start] key.
- 2 Select the item to execute.

Items	Contents
HDD Format	Execute the HDD format
SSD Format	Execute the SSD format

#### Method: HDD Format

- 1 Select [HDD Format].
- 2 Select the item to execute. Display the item to delete.

Items	Contents
Full	Full Format
Data	Data Format (The application software is saved)

- 3 Select [Execute].

Items	Contents
Execute	Start operation

- 4 Press [Start] key to execute the initialization.
- 5 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

#### Method: SSD

- 1 Select [SSD Format].
- 2 Select the item to execute. Display the item to delete.

Items	Contents
Full (BOX Priority)	Full Format (BOX priority)
Full (HyPAS Priority)	Full Format (HyPAS priority)
Data	Data Format (The application software is saved)

- 3 Select [Execute].

Items	Contents
Execute	Start operation

- 4 Press [Start] key to execute the initialization.
- 5 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

**NOTE**

Reinstall deleted Firmware manually.

Optional language, OCR dictionary software, (OCRDATA): Install using a USB drive.

Install the HyPAS application (FMU, etc.) from the Application screen.

If there is no OCR dictionary Software, a warning dialog is displayed, and the OCR function cannot be used.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U025 Firmware update (S)

(Message: Firm Updatability)

### Contents

Update Firmware with USB drive in case of selecting security level “Very High” in the System Menu.

### Supplement

Start the firmware updating by executing U025 with USB drive.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Update the Firmware

- 3 Press [Start] key.



### NOTE

This mode does not work without USB drive.

- 4 Turn the power switch off then on after completed. Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U026 Retrieve the backup data

### (Message: Pulling Backup Data)

#### Contents

Execute to retrieve backup data after replacing the main PWB.

#### Purpose

Restore the setting values that backup from the HDD to the flash memory on the main PWB.

Transfer the backup data from origin SSD to destination SSD via USB drive.

#### Method

- 1 Press [Start] key.
- 2 Select the item to execute.

Items	Contents
Flash	Restore the backup data
SSD	Backup and restore SSD data when USB drive is installed.

#### Method: Flash

- 1 Select [Restore].

Items	Contents
Restore	Restore the backup data

- 2 Press [Start] key.
- 3 Turn the power switch OFF/ON.  
Wait more than 5 seconds between the power off and on.

#### Method: SSD

- 1 Select the item to execute.

Items	Contents
Backup	Backup the SSD data
Restore	Restore the backup data

- 2 Press [Start] key.
- 3 After [Restore] is completed, turn the power switch OFF/ON.  
Wait more than 5 seconds between the power off and on.



#### NOTE

Indicate "NG" when completing abnormally

Saved data:

U278 Delivery date setting

U402 Print Margin adjustment

U952 Maintenance workflow data

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U030 Motor operation check

(Message: Check Motor Operation)

### Contents

Drive each motor.

### Purpose

Execute to check each motor's operation.

### Method

- 1 Press [Start] key.

- 2 Select the motor to operate.
- 3 Press [Start] key.

Each operation starts.

Items	Contents
Feed	Operate the paper feed motor
DLP(K)	Operate developer motor K
DLP(CMY)	Operate developer motor CMY
Fuser	Operate the fuser motor
SB(CW)	Operate the exit reversing motor (CW)
SB(CCW)	Operate the exit reversing motor (CCW)
CMY Release	Operate CMY release motor
Job Separator	Operate the Job Separator motor
Regist	Operate Regist motor
Decurl1	Operate the Decurl motor
Decurl Guide	Operate the Decurl guide motor
Bridge 1	Operate BR Conveying motor1
Bridge 2	Operate BR Conveying motor 2
Belt Meand	Operate the Belt Meand motor
Press Release	Operate the Press Release motor
IH Core	Operate IH Core motor
Fuser Release	Operate the Fuser Release motor
DU1	Drive the DU 1 motor
DU2	Drive the DU 2 motor
Mid Roller	Operate the Mid Roller motor
Vibration	Operate the Vibration motor
Exit(CW)	Operate the Exit motor (CW)
Exit(CCW)	Operate the Exit motor (CCW)
V Feed	Operate V Feed motor
Process	Operate the Process motor



#### NOTE

Press [Stop] key to quit operation.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U031 Check the conveying switch

(Message: Check Conveying Switch)

### Contents

Display the on/off status of each switches and sensors that detect paper on the conveying path.

### Purpose

Check if the conveying switches and sensors are operating correctly.

### Method

- 1 Press [Start] key.
- Check the switches and sensors by manually turning them on/off.
- Indication of the switches turn to blue when the switches are on.

Items	Contents
MPT Jam	Display the switching status of the MP Feed sensor
Casste1 Feed	Display the switching status of the Feed sensor 1
Casste2 Feed	Display the switching status of the Feed sensor 2
Feed2 Feed B)	Display the switching status of the Conveying sensor
Regist	Display the switching status of the Registration sensor
Belt Jam	Display the switching status of the Belt Wound sensor
Exit Feed	Display the switching status of the Eject sensor
DU1	Display the switching status of the Duplex sensor 1
DU2	Display the switching status of the Duplex sensor 2
Bridge1 Feed	Display the switching status of the Bridge Conveying sensor 1
Bridge2 Feed	Display the switching status of the Bridge Conveying sensor 2
Bridge Exit	Display the switching status of the Bridge Eject sensor
Exit Paper	Display the switching status of the Eject Reverse sensor
Fuser Feed	Display the switching status of the Fuser sensor
Feed1(Mid)	Display the switching status of the Middle sensor
Exit Job Separator	Display the switching status of the JS Exit sensor
Decurl HP	Displays switching status of the BR Decurler sensor
Setting	Set paper source
Print	Execute to print with the set contents

### Setting: Setting

- 1 Select [Setting].

- 2 Select the item to set.
- 3 Pressing [Cassette] [Duplex] key to switch the screen.

Items	Contents	Setting range	Default setting value
Cassette	Set paper source	Casette1 Casette2 Casette3 Casette4 Casette5 Casette6 Casette7 MPT	Casette1
Duplex	Set duplex print	Off On	Off

#### Method: Print

- 1 Select [Print].
- 2 Press [Start] key.  
Print is executed.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U032 Clutch operation check

(Message: Check Clutch Operation)

### Contents

Supply power and turn each clutch on.

### Purpose

Check if each clutch works.

### Method

- 1 Press [Start] key.
- 2 Select the clutch to operate.
- 3 Press [Start] key.

]Each operation starts.

The clutch operation is available while the motor is driving

Items	Contents
Feed1	Operate the feed clutch1
Feed2	Operate the feed clutch2
MPT Feed	Operate the MP clutch
Motor	Operate the motor



### NOTE

Press [Stop] key to quit operation.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U033 Solenoid operation check

(Message: Check Solenoid Operation)

### Contents

Supply power and turn each solenoid on.

### Purpose

Check if each solenoid works.

### Method

1 Press [Start] key.

2 Select the solenoid to operate.

3 Press [Start] key.

Each operation starts.

In case of checking with motor drive, select the motor first.

It can not work with "Front cover open".

Also It can not work during "Prepare for print".

The solenoid operation is available while the motor is driving

Items	Contents
Branch Left	Operate the BR switchback solenoid
Branch Exit	Operate the switchback solenoid
Job Separator	Operate the JS switchback solenoid
ID Clean	Operate the ID Cleaning solenoid
Container Cover(C)	Operate the Container solenoid (C)
Container Cover(M)	Operate the Container solenoid (M)
Container Cover(Y)	Operate the Container solenoid (Y)
Container Cover(K)	Operate the Container solenoid (K)
CMY Release	Operate the CMY Release solenoid
Motor	Operate the motor



### NOTE

Press [Stop] key to quit operation.

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U034 Paper timing data adjustment

(Message: Adj Paper Timing Data)

### Contents

Adjust the leading edge registration or center line.

### Purpose

Execute in case of a consistent error between the leading edges of the copy image and original.

Run this mode in case of a consistent error between the center lines of the copy image and original.

### Method

1 Press [Start] key.

2 Select the item to set.

Display screen for setting.

Items	Contents
Start Position	Adjust the lead edge timing
Center Line	Adjust the center line
Start Position B/W	Adjust the leading edge timing (B/W)
Start Position 3/4	Adjust the leading edge timing (3/4)

### Adjust: Start Position

1 Select the item to set.

2 Press [System Menu/Counter] key.



#### NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

3 Press [Start] key and output test chart.

4 Press [System Menu/Counter] key.

Items	Contents	Setting range	Initial setting	Data variation
MPT(L)	Adjust the leading edge timing for the MP tray (L)	-3.0 to 3.0	0	0.1mm
MPT Half(L)	Adjust the leading edge timing for the MP tray Half (L)	-3.0 to 3.0	0	0.1mm
Cassette(L)	Adjust the leading edge timing for the cassette paper feed (L)	-3.0 to 3.0	0	0.1mm
Cassette Half(L)	Adjust the leading edge timing for the cassette paper feed Half (L)	-3.0 to 3.0	0	0.1mm
Duplex(L)	Adjust the leading edge timing for the duplex copy (L)	-3.0 to 3.0	0	0.1mm
Duplex Half(L)	Adjust the leading edge timing for the duplex copy Half (L)	-3.0 to 3.0	0	0.1mm
MPT(S)	Adjust the leading edge timing for the MP tray (S)	-3.0 to 3.0	0	0.1mm
MPT Half(S)	Adjust the leading edge timing for the MP tray Half (S)	-3.0 to 3.0	0	0.1mm
Cassette(S)	Adjust the leading edge timing for the cassette paper feed (S)	-3.0 to 3.0	0	0.1mm

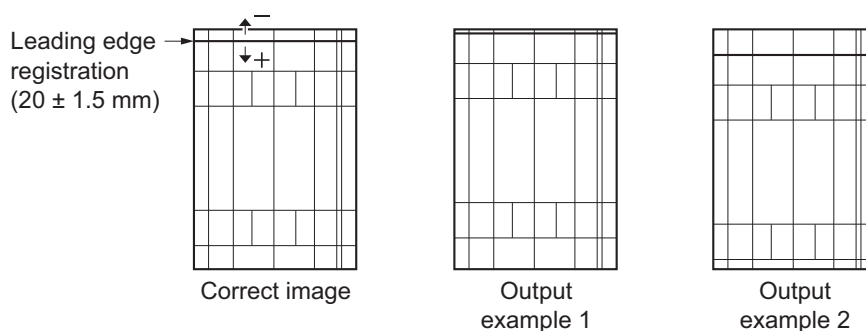


Items	Contents	Setting range	Initial setting	Data variation
Cassette Half(S)	Adjust the leading edge timing for the cassette paper feed Half (S)	-3.0 to 3.0	0	0.1mm
Duplex(S)	Adjust the leading edge timing for the duplex copy (S)	-3.0 to 3.0	0	0.1mm
Duplex Half(S)	Adjust the leading edge timing for the duplex copy Half (S)	-3.0 to 3.0	0	0.1mm
Test Copy*1	Run the test copy	-	-	-

\*1: Display when USB drive is installed

- Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value in case of test chart 1.  
Decrease the value in case of test chart 2.

The image moves backward by increasing setting value and moves forward by decreasing the value.



- Press [Start] key to set the setting value.

#### ✓ IMPORTANT

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034 > U066 ([75 page](#)) > U071 ([79 page](#))

#### Adjust: Center Line

- Select the item to set.
- Press [System Menu/Counter] key.

#### 💡 NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- Press [Start] key and output test chart.
- Press [System Menu/Counter] key.

Items	Contents	Setting range	Initial setting	Data variation
MPT	Adjust the center line for the MP tray	-3.0 to 3.0	0	0.1mm
Cassette1	Adjust the center line for cassette 1 feed	-3.0 to 3.0	0	0.1mm
Cassette2	Adjust the center line for cassette 2 feed	-3.0 to 3.0	0	0.1mm

Items	Contents	Setting range	Initial setting	Data variation
Cassette3	Adjust the center line for cassette 3 (Optional unit) feed	-3.0 to 3.0	0	0.1mm
Cassette4	Adjust the center line for cassette 4 (Optional unit) feed	-3.0 to 3.0	0	0.1mm
Cassette5	Adjust the center line for cassette 5 (Optional unit) feed	-3.0 to 3.0	0	0.1mm
Cassette6	Adjust the center line for cassette 6 (Optional unit) feed	-3.0 to 3.0	0	0.1mm
Cassette7	Adjust the center line for cassette 7 (Optional unit) feed	-3.0 to 3.0	0	0.1mm
Duplex	Adjust the center line when duplex copying (Back page)	-3.0 to 3.0	0	0.1mm
Test Copy*1	Run the test copy	-	-	-

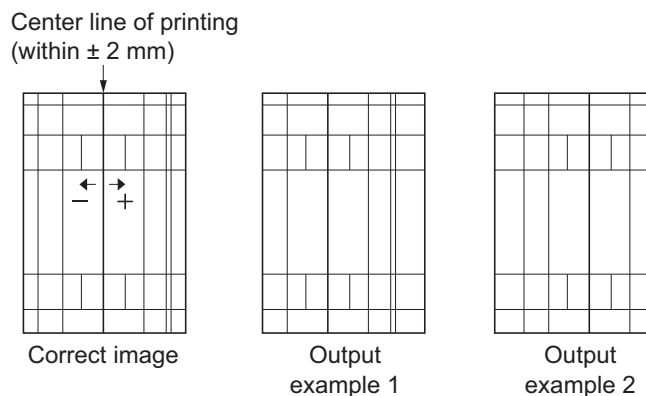
\*1: Display when USB drive is installed

5 Change the setting value by using [+] [-] keys or the numeric keys.

Increase the value in case of test chart 1.

Decrease the value in case of test chart 2.

The image moves to the right side by increasing setting value and moves to the left side by decreasing the value.



6 Press [Start] key to set the setting value.


 **IMPORTANT**

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034 > U067 ([76 page](#)) > U072 ([81 page](#))

**Adjust: Start Position (BW)**

- 1 Select the item to set.
- 2 Press [System Menu/Counter] key.

 **NOTE**

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- 3 Press [Start] key and output test chart.
- 4 Press [System Menu/Counter] key.

Items	Contents	Setting range	Initial setting	Data variation
MPT(L)	Adjust the leading edge timing for the MP tray (L)	-3.0 to 3.0	0	0.1mm
MPT(S)	Adjust the leading edge timing for the MP tray (S)	-3.0 to 3.0	0	0.1mm
Cassette(L)	Adjust the leading edge timing for cassette (L)	-3.0 to 3.0	0	0.1mm
Cassette(S)	Adjust the leading edge timing for cassette (S)	-3.0 to 3.0	0	0.1mm
Duplex(L)	Adjust the leading edge timing for B/W duplex copying (L)	-3.0 to 3.0	0	0.1mm
Duplex(S)	Adjust the leading edge timing for B/W duplex copying (S)	-3.0 to 3.0	0	0.1mm
Test Copy*1	Run the test copy	-	-	-

\*1: Display when USB drive is installed

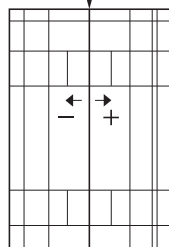
- 5 Change the setting value by using [+] [-] keys or the numeric keys.

Increase the value in case of test chart 1.

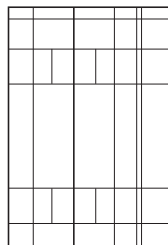
Decrease the value in case of test chart 2.

The image moves to the right side by increasing setting value and moves to the left side by decreasing the value.

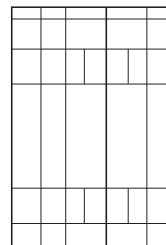
Center line of printing  
(within  $\pm 2$  mm)



Correct image



Output example 1



Output example 2

- 6 Press [Start] key to set the setting value.

#### IMPORTANT

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034 > U067 ([76 page](#)) > U072 ([81 page](#))

#### Adjust: Start Position (3/4)

- 1 Select the item to set.
- 2 Press [System Menu/Counter] key.

#### NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- 3 Press [Start] key and output test chart.
- 4 Press [System Menu/Counter] key.

Items	Contents	Setting range	Initial setting	Data variation
MPT(L)	Adjust the leading edge timing for the MP tray (L)	-3.0 to 3.0	0	0.1mm
MPT(S)	Adjust the leading edge timing for the MP tray (S)	-3.0 to 3.0	0	0.1mm
Cassette(L)	Adjust the leading edge timing for cassette (L)	-3.0 to 3.0	0	0.1mm
Cassette(S)	Adjust the leading edge timing for cassette (S)	-3.0 to 3.0	0	0.1mm
Duplex(L)	Adjust the leading edge timing for B/W duplex copying (L)	-3.0 to 3.0	0	0.1mm
Duplex(S)	Adjust the leading edge timing for B/W duplex copying (S)	-3.0 to 3.0	0	0.1mm
Test Copy*1	Run the test copy	-	-	-

\*1: Display when USB drive is installed

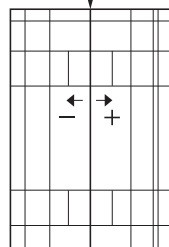
- 5 Change the setting value by using [+] [-] keys or the numeric keys.

Increase the value in case of test chart 1.

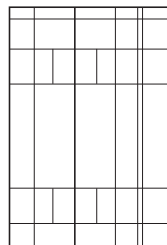
Decrease the value in case of test chart 2.

The image moves to the right side by increasing setting value and moves to the left side by decreasing the value.

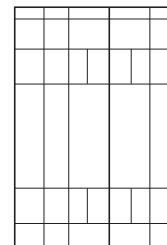
Center line of printing  
(within  $\pm 2$  mm)



Correct image



Output example 1



Output example 2

- 6 Press [Start] key to set the setting value.

#### IMPORTANT

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034 > U067 ([76 page](#)) > U072 ([81 page](#))

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U035 Folio size setting

(Message: Adjust Folio Size)

### Contents

Change the printable area in case of copying with Folio paper.

### Purpose

Set the actual size of Folio and avoid from image missing on the trailing edge or right/left edges.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Length	Set the Folio paper length	330 to 356 (mm)	330	1 mm
Width	Set the Folio paper width	200 to 220 (mm)	210	1 mm

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U037 Fan operation check

(Message: Check Fan Motor Operation)

### Contents

Drive each fan.

### Purpose

Check if each fan works.

### Method

- 1 Press [Start] key.
- 2 Select the fan to operate.
- 3 Press [Start] key.  
Each operation starts.

Items	Contents	Group
Fuser Cooling	Operate the rear fuser fan motor	B
DLP Rear	Operate the rear DLP fan motor	A
LSU Cooling	Operate the LSU fan motor	B
Belt Cooling	Operate the Belt fan motor	A
Exit Cooling	Operate the front eject fan motor	B
Toner	Operate the toner collection fan motor 1,2	A
Low Volt	Operate the power supply fan motor	A
Exit Rear Cooling	Operate the rear eject fan motor	B
IH PWB	Operate IH fan motor	A
IH Coil	Operate the IH core fan motor	A
DLP front	Operate the front DLP fan motor	A
Conv Edge	Operate the front right 1/rear right 1 fuser fan motor	A
Fuser Edge	Operate the front/rear fuser edge fan motor	A
GroupA	Operate the group A fan motor	A
GroupB	Operate the group B fan motor	B

Press [Stop] key to quit operation.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U051 Registration paper loop amount adjustment

(Message: Adjust Paper Loop Amount)

### Contents

Adjust the paper loop level.

### Purpose

Adjust loop level in case of missing image or inconsistent on the leading edge, or Z-shape fold.

Or use for check/adjust skew feed.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
Display screen for setting.

Items	Contents
Paper Loop Amount	Paper loop amount adjustment
Paper Loop Amount B/W	Paper loop amount adjustment (B/W)
Paper Loop Amount 3/4	Paper loop amount adjustment (3/4 speed)

### Adjustment: Paper Loop Amount

- 1 Select the item to set.
- 2 Press [System Menu/Counter] key.



### NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- 3 Place an original and press [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.  
Display screen for setting.

Items	Contents	Setting range	Data variation
MPT(L)	Paper loop amount adjustment for the MP tray feed (L)	-30 to 20	1mm
MPT Half(L)	Paper loop amount adjustment for the MP tray feed (L) at half speed	-30 to 20	1mm
Cassette(L)	Paper loop amount adjustment for the cassette feed (L)	-30 to 20	1mm
Cassette Half(L)	Paper loop amount adjustment for the cassette feed (L) at half speed	-30 to 20	1mm
Duplex(L)	Paper loop amount adjustment for the duplex (L)	-30 to 20	1mm
Duplex Half(L)	Paper loop amount adjustment for the duplex (L) at half speed	-30 to 20	1mm
MPT(S)	Paper loop amount adjustment for the MP tray feed (S)	-30 to 20	1mm
MPT Half(S)	Paper loop amount adjustment for the MP tray feed (S) at half speed	-30 to 20	1mm
Cassette(S)	Paper loop amount adjustment for the cassette feed (S)	-30 to 20	1mm
Cassette Half(S)	Paper loop amount adjustment for the cassette feed (S) at half speed	-30 to 20	1mm
Duplex(S)	Paper loop amount adjustment for the Duplex (S)	-30 to 20	1mm
Duplex Half(S)	Paper loop amount adjustment for the Duplex (S) at half speed	-30 to 20	1mm

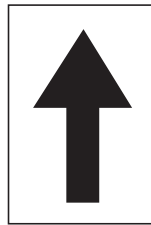
#### Default setting value

Items	83/70ppm	73/65ppm
MPT(L)	-4	-4
MPT Half(L)	-2	-2
Cassette(L)	-3	-3
Cassette Half(L)	-2	-2
Duplex(L)	-4	-4
Duplex Half(L)	-2	-2
MPT(S)	-4	-4
MPT Half(S)	-2	-2
Cassette(S)	-3	-3
Cassette Half(S)	-2	-2
Duplex(S)	-4	-4
Duplex Half(S)	-2	-2

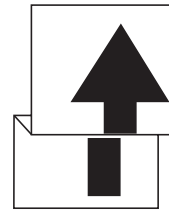


- 5 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Increase the value for the copy sample 2.

Increasing setting value makes high loop level and decreasing makes low loop level.



Original

Copy  
example 1Copy  
example 2

- 6 Press [Start] key to set the setting value.

#### Adjustment: Paper Loop Amount B/W

- 1 Select the item to set.
- 2 Press [System Menu/Counter] key.



#### NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- 3 Place an original and press [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.  
Display screen for setting.

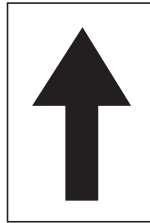
Items	Contents	Setting range	Data variation
MPT(L)	Paper loop amount adjustment for the MP tray feed (L)	-30 to 20	1mm
Cassette(L)	Paper loop amount adjustment for the cassette feed (L)	-30 to 20	1mm
Duplex(L)	Paper loop amount adjustment for the duplex (L)	-30 to 20	1mm
MPT(S)	Paper loop amount adjustment for the MP tray feed (S)	-30 to 20	1mm
Cassette(S)	Paper loop amount adjustment for the cassette feed (S)	-30 to 20	1mm
Duplex(S)	Paper loop amount adjustment for the Duplex (S)	-30 to 20	1mm

#### Default setting value

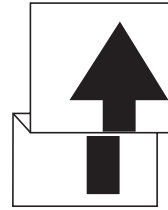
Items	83/70ppm	73/65ppm
MPT(L)	-4	-4
Cassette(L)	-5	-5
Duplex(L)	-6	-6
MPT(S)	-4	-4
Cassette(S)	-5	-5
Duplex(S)	-6	-6

- 5 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Increase the value for the copy sample 2.

Increasing setting value makes high loop level and decreasing makes low loop level.



Original

Copy  
example 1Copy  
example 2

- 6 Press [Start] key to set the setting value.

#### Adjustment: Paper Loop Amount 3/4

- 1 Select the item to set.
- 2 Press [System Menu/Counter] key.



#### NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- 3 Place an original and press [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.  
Display screen for setting.

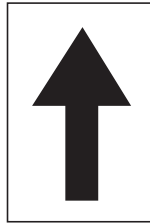
Items	Contents	Setting range	Data variation
MPT(L)	Paper loop amount adjustment for the MP tray feed (L)	-30 to 20	1mm
Cassette(L)	Paper loop amount adjustment for the cassette feed (L)	-30 to 20	1mm
Duplex(L)	Paper loop amount adjustment for the duplex (L)	-30 to 20	1mm
MPT(S)	Paper loop amount adjustment for the MP tray feed (S)	-30 to 20	1mm
Cassette(S)	Paper loop amount adjustment for the cassette feed (S)	-30 to 20	1mm
Duplex(S)	Paper loop amount adjustment for the Duplex (S)	-30 to 20	1mm

#### Default setting value

Items	83/70ppm	73/65ppm
MPT(L)	-3	-3
Cassette(L)	-3	-3
Duplex(L)	-3	-3
MPT(S)	-3	-3
Cassette(S)	-3	-3
Duplex(S)	-3	-3

- 5 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Increase the value for the copy sample 2.

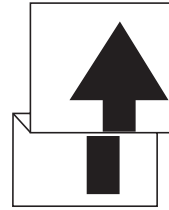
Increasing setting value makes high loop level and decreasing makes low loop level.



Original



Copy  
example 1



Copy  
example 2

- 6 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U052 Fuser motor speed adjustment

(Message: Set Fuser Motor Speed)

### Contents

Input the sensor data value and correct the fuser motor speed

### Purpose

Perform when replacing the loop sensor or the conveying unit.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
Display screen for setting.

Items	Contents
Set Loop Sensor	Input the loop sensor data value
Set Loop Sensor Valid	Set availability of the loop sensor
Check Loop Sensor	Display the loop sensor value

### Adjustment: Set Loop Sensor

- 1 Select [Scanning Board1].
- 2 Using [+] [-] keys to input the sensor data value of the bundled sheet DATA1.
- 3 Select [Scanning Board2.]
- 4 Using [+] [-] keys to input the sensor data value of the bundled sheet DATA2.

Items	Contents	Setting value	Data Variation	Default setting value	
				83/70ppm	73/65ppm
Scanning Board1	Setting of the Scanning Board1	150 to 250	0.01V	0	0
Scanning Board2	Setting of the Scanning Board2	130 to 230	0.01V	0	0
Board1- Board2	Setting of the value between the Scanning Board1 and the scanning Board2.	10 to 50	0.01V	0	0

- 5 Press [Start] key to set the setting value.

### Method: Set Loop Sensor Valid

- 1 Select [On] or [Off].

Items	Contents	Default setting value
Set Loop Sensor Valid	Set availability of the loop sensor	1 (ON)

- 2 Press [Start] key to set the setting value.

### Method: Check Loop Sensor

1 Display only

**Completion**

**Press [Stop] key.**

**Return to the screen for selecting maintenance number.**

## U053 Adjusting the motor speed

(Message: Adjust Motor Speed)

### Contents

Execute the motor speed fine tuning.

### Purpose

No need to change the basic settings. Change the set value when an image failure occurs.



### NOTE

Press “+” gets motor slower and “-” gets it faster.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
Display screen for setting.

Items	Contents
Motor1	Set drum motor K
Motor2	Set developer K/transfer belt motor
Motor3	Set eject motor, fuser motor, BR conveying motor, feed motor, PF feed motor (Option)
Motor4	Set drum motor K at B/W high speed mode Set drum motor K at B/W mode (3 color release)
Motor5	Set developer K/transfer belt motor at B/W high speed mode
Motor6	Set eject motor, fuser motor, BR conveying motor, feed motor, PF feed motor (Option) at B/W high speed mode
Motor1 Half	Set drum motor K at half speed mode
Motor2 Half	Set developer K/transfer belt motor at half speed mode
Motor3 Half	Set eject motor, fuser motor, BR conveying motor, feed motor, PF feed motor (Option) at half speed mode
Motor1 3/4	Set drum motor K, drum motor CMY at 3/4 speed mode
Motor2 3/4	Set developer motor CMY, developer K/transfer belt motor at 3/4 speed mode
Motor3 3/4	Set eject motor, fuser motor, BR conveying motor, feed motor, feed motor (Option) at 3/4 speed mode

### Setting: Motor1

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Drum(CMY)	Adjust drum motor CMY	-5000 to 5000	-
Drum(K)	Adjust drum motor K	-5000 to 5000	-

### Default setting value

Items	83/70ppm	73/65ppm
Drum(CMY)	6	6
Drum(K)	6	6

3 Press [Start] key to set the setting value.

### Setting: Motor2

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Dev(K)	Adjust the developer motor K	-5000 to 5000	
Dev(CMY)	Adjust the developer motor CMY	-5000 to 5000	
Trans Belt	Adjust the transfer belt motor	-5000 to 5000	
Regist	Adjust the registration motor	-5000 to 5000	
Belt Clean	Adjust the transfer cleaning motor	-5000 to 5000	
V Feed	Adjust the middle conveying motor	-5000 to 5000	
Exit	Adjust eject motor.	-5000 to 5000	

### Default setting value

Items	83/70ppm	73/65ppm
Dev(K)	0	0
Dev(CMY)	0	0
Trans Belt	0	0
Regist	13	14
Belt Clean	0	0
V Feed	15	15
Exit	0	0

3 Press [Start] key to set the setting value.

### Setting: Motor3

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
SB	Adjust the eject motor	-5000 to 5000	-
Fixing	Adjust the user motor	-5000 to 5000	-
Decurl1	Adjust the BR conveying decurl motor	-5000 to 5000	-
Bridge1	Adjust the BR conveying motor1	-5000 to 5000	-
Bridge2	Adjust the BR conveying motor2	-5000 to 5000	-
Feed	Adjust the feed motor	-5000 to 5000	-
Job Separator	Adjust the JS eject motor	-5000 to 5000	-
Mid Roller	Adjust the middle conveying motor	-5000 to 5000	-
DU1	Adjust the duplex motor?	-5000 to 5000	-
DU2	Adjust the duplex motor2	-5000 to 5000	-
Bridge1 DF High	Adjust the BR conveying motor1 (High speed)	-5000 to 5000	-
Bridge1 DF Low	Adjust the BR conveying motor1 (Low speed)	-5000 to 5000	-
Bridge2 DF High	Adjust the BR conveying motor2 (High speed)	-5000 to 5000	-
Bridge2 DF Low	Adjust the BR conveying motor2 (Low speed)	-5000 to 5000	-

#### Default setting value

Items	83/70ppm	73/65ppm
SB	0	0
Fixing	-83	-96
Decurl1	0	0
Bridge1	0	0
Bridge2	0	0
Feed	13	14
Job Separator	0	0
Mid Roller	51	54
DU1	-18	-20
DU2	-21	-23
Bridge1 DF High	0	0
Bridge1 DF Low	0	0
Bridge2 DF High	0	0
Bridge2 DF Low	0	0

3 Press [Start] key to set the setting value.

#### Setting: Motor4

1 Select the item to set.



- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Drum B/W(K)	Adjust the drum motor K at B/W high speed mode	-5000 to 5000	-
Drum Mono(K)	Adjust the drum motor K at B/W mode (3 color release)	-5000 to 5000	-

**Default setting value**

Items	83/70ppm	73/65ppm
Drum B/W(K)	25	29
Drum Mono(K)	29	31

- 3 Press [Start] key to set the setting value.

**Setting: Motor5**

- 1 Select the item to set.  
2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Dev B/W(K)	Adjust the developer motor K at B/W mode	-5000 to 5000	-
Trans Belt B/W	Adjust the transfer motor at B/W mode	-5000 to 5000	-
Regist B/W	Adjust the registration motor at B/W mode	-5000 to 5000	-
Belt Clean B/W	Adjust the transfer cleaning motor at B/W mode	-5000 to 5000	-
V Feed B/W	Adjust the middle conveying motor at B/W mode	-5000 to 5000	-
Exit B/W	Adjust the eject motor at B/W mode	-5000 to 5000	-

**Default setting value**

Items	83/70ppm	73/65ppm
Dev B/W(K)	0	0
Trans Belt B/W	0	0
Regist B/W	12	13
Belt Clean B/W	0	0
V Feed B/W	13	15
Exit B/W	0	0

- 3 Press [Start] key to set the setting value.

**Setting: Motor6**

- 1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
SB B/W	The eject motor at B/W mode	-5000 to 5000	-
Fixing B/W	The fuser motor at B/W mode	-5000 to 5000	-
Decal B/W	The conveying decurler motor at B/W mode	-5000 to 5000	-
Bridge1 B/W	The BR Conveying motor 1 at B/W mode	-5000 to 5000	-
Bridge2 B/W	The BR Conveying motor 2 at B/W mode	-5000 to 5000	-
Feed B/W	The feed motor at B/W mode	-5000 to 5000	-
Job Separator B/W	The JS eject motor at B/W mode	-5000 to 5000	-
Mid Roller B/W	The middle Conveying motor at B/W mode	-5000 to 5000	-
DU1 B/W	The duplex motor 1 at B/W mode	-5000 to 5000	-
DU2 B/W	The duplex motor 2 at B/W mode	-5000 to 5000	-

#### Default setting value

Items	83/70ppm	73/65ppm
SB B/W	0	0
Fixing B/W	-79	-91
Decal B/W	0	0
Bridge1 B/W	0	0
Bridge2 B/W	0	0
Feed B/W	11	13
Job Separator B/W	0	0
Mid Roller B/W	44	51
DU1 B/W	-16	-18
DU2 B/W	-18	-21

3 Press [Start] key to set the setting value.

#### Setting: Motor1 Half

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Drum(CMY)	Adjust drum motor CMY	-5000 to 5000	-
Drum(K)	Adjust drum motor K	-5000 to 5000	-

#### Default setting value

Items	83/70ppm	73/65ppm
Drum(CMY)	12	12
Drum(K)	12	12

- 3 Press [Start] key to set the setting value.

### Setting: Motor2 Half

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Dev(K)	Adjust the developer motor K at half speed	-5000 to 5000	
Dev(CMY)	Adjust the developer motor C/M/Y at half speed	-5000 to 5000	
Trans Belt	Adjust the transfer belt motor at half speed	-5000 to 5000	
Regist	Adjust the registration motor at half speed	-5000 to 5000	
Belt Clean	Adjust the transfer cleaning motor at half speed	-5000 to 5000	
V Feed	Adjust the middle conveying motor at half speed	-5000 to 5000	
Exit	Adjust the eject motor at half speed	-5000 to 5000	

#### Default setting value

Items	83/70ppm	73/65ppm
Dev(K)	0	0
Dev(CMY)	0	0
Trans Belt	0	0
Regist	27	27
Belt Clean	0	0
V Feed	29	29
Exit	0	0

- 3 Press [Start] key to set the setting value.

### Setting: Motor3 Half

- 1 Select the item to set.  
Display screen for setting.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
SB	Adjust the eject motor at half speed	-5000 to 5000	-
Fixing	Adjust the fuser motor at half speed	-5000 to 5000	-
Decurl1	Adjust the BR conveying decurl motor	-5000 to 5000	-
Bridge1	Adjust the BR conveying motor 1 at half speed	-5000 to 5000	-
Bridge2	Adjust the BR conveying motor 2 at half speed	-5000 to 5000	-
Feed	Adjust the feed motor at half speed	-5000 to 5000	-
Job Separator	Adjust the JS eject motor	-5000 to 5000	-
Mid Roller	Adjust the middle conveying motor	-5000 to 5000	-
DU1	Adjust the duplex motor?	-5000 to 5000	-
DU2	Adjust the duplex motor2	-5000 to 5000	-

#### Default setting value

Items	83/70ppm	73/65ppm
SB	0	0
Fixing	-73	-73
Decurl1	0	0
Bridge1	0	0
Bridge2	0	0
Feed	26	26
Job Separator	0	0
Mid Roller	103	103
DU1	-36	-38
DU2	-42	-44

Press [Start] key to set the setting value.

#### Setting: Motor1 3/4

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Drum(CMY)	Adjust drum motor CMY	-5000 to 5000	-
Drum(K)	Adjust drum motor K	-5000 to 5000	-

#### Default setting value

Items	83/70ppm	73/65ppm
Drum(CMY)	7	7
Drum(K)	7	7

3 Press [Start] key to set the setting value.

#### Setting: Motor2 3/4

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Dev(K)	Adjust the developer motor K at half speed	-5000 to 5000	
Dev(CMY)	Adjust the developer motor C/M/Y at half speed	-5000 to 5000	
Trans Belt	Adjust the transfer belt motor at half speed	-5000 to 5000	
Regist	Adjust the registration motor at half speed	-5000 to 5000	
Belt Clean	Adjust the transfer cleaning motor at half speed	-5000 to 5000	
V Feed	Adjust the middle conveying motor at half speed	-5000 to 5000	
Exit	Adjust the eject motor at half speed	-5000 to 5000	

#### Default setting value

Items	83/70ppm	73/65ppm
Dev(K)	0	0
Dev(CMY)	0	0
Trans Belt	0	0
Regist	17	17
Belt Clean	0	0
V Feed	18	18
Exit	0	0

3 Press [Start] key to set the setting value.

#### Setting: Motor3 3/4

1 Select the item to set.

Display screen for setting.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
SB	Adjust the eject motor at half speed	-5000 to 5000	-
Fixing	Adjust the fuser motor at half speed	-5000 to 5000	-
Decurl1	Adjust the BR conveying decurl motor	-5000 to 5000	-
Bridge1	Adjust the BR conveying motor 1 at half speed	-5000 to 5000	-
Bridge2	Adjust the BR conveying motor 2 at half speed	-5000 to 5000	-
Feed	Adjust the feed motor at half speed	-5000 to 5000	-
Job Separator	Adjust the JS eject motor	-5000 to 5000	-
Mid Roller	Adjust the middle conveying motor	-5000 to 5000	-
DU1	Adjust the duplex motor?	-5000 to 5000	-
DU2	Adjust the duplex motor2	-5000 to 5000	-

#### Default setting value

Items	83/70ppm	73/65ppm
SB	0	0
Fixing	-45	-45
Decurl1	0	0
Bridge1	0	0
Bridge2	0	0
Feed	16	16
Job Separator	0	0
Mid Roller	63	63
DU1	-23	-23
DU2	-27	-27

3 Press [Start] key to set the setting value.

#### NOTE

Test copy of the original is available by pressing [System Menu] key as interruption copy mode when executing this maintenance mode.

Pressing [System Menu] allows you to adjust setting on the screen showed below.

(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

#### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U059 Fan mode setting

(Message: Set Fan Mode)

### Contents

Set the condition to drive all the fans at cooling mode

### Purpose

Change the temperature for shifting to the cooling mode that drives all the fans at full speed when the machine inside temperature becomes high at continuous printing.

### Setting

- 1 Press [Start] key.

Select the item to set.

Items	Contents
Cooling Mode	Set the Cooling Mode

### Setting: Cooling Mode

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Cooling Mode	Set the Cooling Mode	-3 to 3	?

### Default setting value

Items	83/70ppm	73/65ppm
Cooling Mode	0	0

- 3 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U061 Lamp lighting check

(Message: Check Lamp ON)

### Contents

Turn the exposure lamp on

### Purpose

Turn the exposure lamp on for confirmation

### Method

- 1 Press [Start] key.
- 2 Select the item to display.

Items	Contents
CCD	Turn the exposure lamp on
CIS	Turn the CIS lamp on (when the dual scan is available)

- 3 Press [Start] key. Lamps are lit.  
Press [Stop] key to turn the lamp off.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U063 Shading position adjustment

(Message: Adjust Shading position)

### Contents

Change the shading position of the scanner

### Purpose

Execute when the vertical void area appears on the image and they are not improved after cleaning the shading plate, namely there are scratches or dirt inside the shading plate.

By changing the shading position makes available where is no influence of dirt or scratch on the shading plate.

### Setting

- 1 Press [Start] key.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Position	Shading position	0 to 18	0	0.158mm

If the set value is increased, the shading position moves toward the machine left side and toward the right side if the value is reduced.

- 3 Press [Start] key to set the setting value.



### NOTE

Test copy of the original is available by pressing [System Menu] key as interruption copy mode when executing this maintenance mode.

Pressing [System Menu] allows you to adjust setting on the screen showed below.

(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U065 Adjusting the magnification for table scanning

(Message: Adjust Scanner Motor Speed)

### Contents

Adjust the magnification in the main and sub scan directions of the table scanning if it is incorrect.

### Purpose

Adjust the magnification in the main and sub scan directions of the table scanning if it is incorrect.

### ✔ IMPORTANT

The magnification adjustment in the main scan direction could cause black streaks depending on the original document.

Follow the orders below in case of an adjustment in time of scanning.

U065 (Main scanning direction) ([P.6-73](#)) > U065 (Sub scanning direction) ([P.6-73](#))

### Method

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.

### 💡 NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.

(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

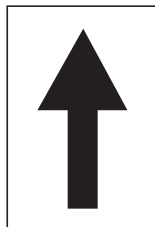
- 3 Place an original and press [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.
- 5 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
Main Scan	Adjust the magnification of the scanner in the main scanning direction	-15 to 15	0	0.02%
Sub Scan	Adjust the magnification of the scanner in the sub scanning direction	-125 to 125	0	0.02%

### Adjustment: Main Scan

- 1 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Decrease the value for the copy sample 2.

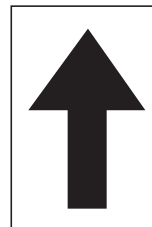
Increasing the setting value makes the image wider, and decreasing makes it narrow.



Original



Copy example 1



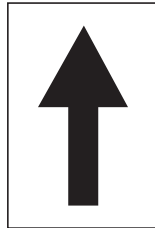
Copy example 2

- 2 Press [Start] key to set the setting value.

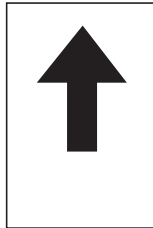
**Adjustment: Sub Scan**

- 1 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Decrease the value for the copy sample 2.

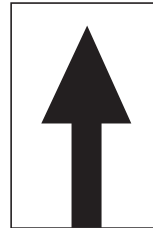
Increasing the setting value makes the image long, and decreasing makes it short.



Original



Copy  
example 1



Copy  
example 2

- 2 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U066 Adjusting the table scanning timing

(Message: Adjust Table Leading Edge Timing)

### Contents

Adjust the leading edge timing for the table scanning.

### Purpose

Execute in case of a consistent error between the leading edges of the copy image and original.

### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.



### NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.

(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

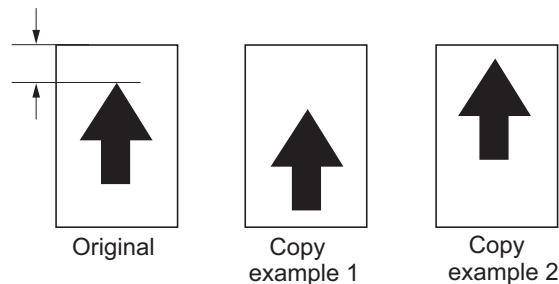
- 3 Place an original and press [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.

Items	Contents	Setting range	Initial setting	Data variation
Front	Adjust the leading edge timing of table scanning.	-30 to 30	0	0.158 mm

- 5 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Decrease the value for the copy sample 2.

The image moves backward by increasing setting value and moves forward by decreasing the value.

Leading edge registration of the copy image (+1.0/-1.5 mm)



- 6 Press [Start] key to set the setting value.



### IMPORTANT

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034([47 page](#))> U065([73 page](#))> U066

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## UJ067 Adjusting the table scanning center

(Message: Adjust Table Center)

### Contents

Adjust the center line for the table scanning.

### Purpose

Run this mode in case of a consistent error between the center lines of the copy image and original.

### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.

#### NOTE

Pressing [System Menu] allows you to adjust setting on the screen showed below.  
(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

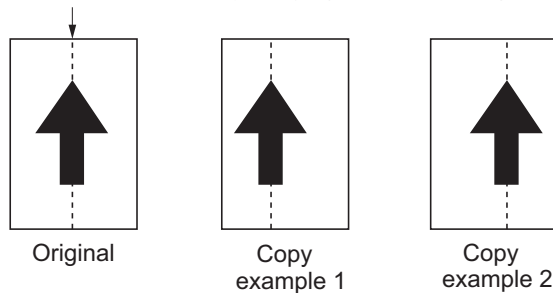
- 3 Place an original and press [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.

Items	Contents	Setting range	Initial setting	Data variation
Front	Adjust the center line of table scanning	-60 to 60	0	0.085 mm

- 5 Change the setting value by using [+] [-] keys or the numeric keys.  
Decrease the value for the copy sample 1.  
Increase the value for the copy sample 2.

The image moves to the right side by increasing setting value and moves to the left side by decreasing the value.

Center line of the copy image (within  $\pm 2.0$  mm)



- 6 Press [Start] key to set the setting value.

#### IMPORTANT

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034([47 page](#))> U065([73 page](#))> U067

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U068 DP Scanning position adjustment

(Message: Adjust DP Scan Position)

### Contents

Adjust the starting position for scanning originals from the DP.

Execute test copy at the four scanning positions after adjustment.

### Purpose

Execute if the background of the image occurs due to the scanning position is not correct when the DP is used.

When the scanning position is changed, adjust the DP leading edge timing by U071.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
DP Read	Adjust the starting position of DP scanning	-38 to 38	0	0.158 mm
Black Line	Adjust the scanning position of the test copy original	0 to 3	0	-

#### Adjustment: DP Read

- 1 Select [DP Read].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.
- 3 The image moves backward by increasing setting value and moves forward by decreasing the value.
- 4 Press [Start] key to set the setting value.

#### Adjustment: Black Line

- 1 Select [Black Line].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.
- 3 Press [Start] key to set the setting value.
- 4 Set the original (the one of which density is known) in the DP and press the [System Menu/Counter] key.



#### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

- 5 Press the [Start] key to execute the test copy.
- 6 Run the test copy at each scanning position (0 to 3) and confirm if no black line appears and the image can be scanned correctly.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U070 DP magnification adjustment

(Message: Adjust DP Motor Speed)

### Contents

Adjust the magnification of DP scanning

### Purpose

Adjust if the magnification is incorrect in the main and sub scanning direction with the DP.

### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.

#### NOTE

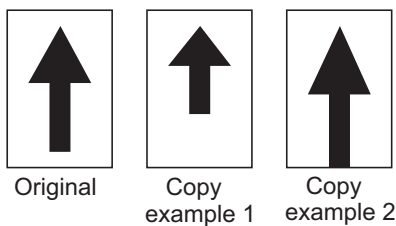
Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

- 3 Place an original on the DP and press the [Start] key to make a test copy.
- 4 Set [Duplex] in case of checking duplex scanning in test copying.
- 5 Press [System Menu/Counter] key.
- 6 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
Sub Scan (F)	Adjust the magnification of the sub scanning direction at the single sided scan	-125 to 125	0	0.02%
Sub Scan (CIS)	Adjust the second side magnification of the sub scanning direction at the double sided scan (DP CIS)	-125 to 125	0	0.02%

- 7 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Decrease the value for the copy sample 2.

Increasing the setting value makes the image long, and decreasing makes it short.



- 8 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U071 Adjust the DP leading edge Timing

(Message: Adjust DP Leading Edge Timing)

### Contents

Adjust the DP original scanning timing.

### Purpose

Adjust if observed consistent error between the leading or trailing edges of the original and the copy image from DP scan.

### Method

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.



### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

- 3 Place an original on the DP and press the [Start] key to make a test copy.
- 4 Set [Duplex] in case of checking duplex scanning in test copying.
- 5 Press [System Menu/Counter] key.
- 6 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
Front Head	Adjust the leading edge timing (Front side)	-27 to 27	0	0.297 mm
Front Tail	Adjust the trailing edge timing (Front side)	-27 to 27	0	0.297 mm
CIS Head	Adjust the leading edge timing (DP CIS)	-27 to 27	0	0.297 mm
CIS Tail	Adjust the trailing edge timing (DP CIS)	-27 to 27	0	0.297 mm

### Adjustment: Front Head/CIS Head

- 1 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Decrease the value for the copy sample 2.

The image moves backward by increasing setting value and moves forward by decreasing the value.



Original



Copy example 1



Copy example 2



- 2 Press [Start] key to set the setting value.

 **IMPORTANT**

Check the back side after adjusting the front side. Adjust if it is necessary to adjust.

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034([47 page](#)) > U071

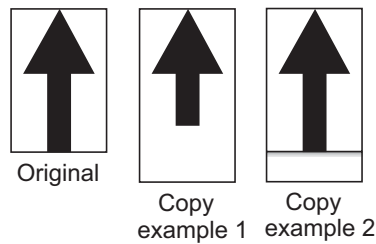
**Adjustment: Front Tail/CIS Tail**

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Increase the value for the copy sample 1.

Decrease the value for the copy sample 2.

Increasing the setting value makes the image long, and decreasing makes it short.



- 2 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U072 Adjusting the DP original center

(Message: Adjust DP Original Center)

### Contents

Adjust the DP original center line.

### Purpose

Adjust if observed consistent error between the leading or trailing edges of the original and the copy image from DP scan.

### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.



### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette/Duplex printing/Rotation/No. of sets/(double sided/single sided scan)/output tray)

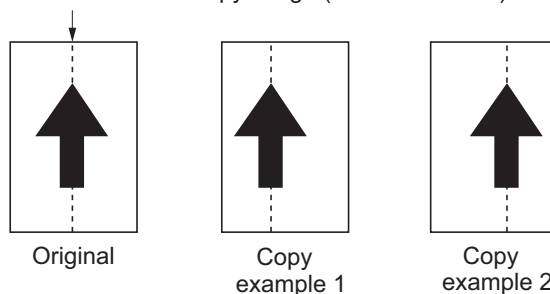
- 3 Place an original on the DP and press the [Start] key to make a test copy.
- 4 Set [Duplex] in case of checking duplex scanning in test copying.
- 5 Press [System Menu/Counter] key.
- 6 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
Front	Adjust the DP center line (Front side)	-60 to 60	0	0.085 mm
CIS	Adjust the DP CIS center line	-39 to 39	0	0.085 mm

- 7 Change the setting value by using [+] [-] keys or the numeric keys.  
Decrease the value for the copy sample 1.  
Increase the value for the copy sample 2.

The image moves to the right side by increasing setting value and moves to the left side by decreasing the value.

Center line of the copy image (within  $\pm 2.0$  mm)



- 8 Press [Start] key to set the setting value.

 **IMPORTANT**

Check the back side after adjusting the front side. Adjust if it is necessary to adjust.

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034([47 page](#))> U065([73 page](#))> U067([76 page](#))> U072

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U073 Scanner motor operation check

(Message: Check Scanner Motor Operation)

### Contents

Simulate the scanner operation in any condition.

### Purpose

Execute the scanner operation to check the abnormal operation and dust adhesion on the slit glass.

### Method

- 1 Press [Start] key.
- 2 Select the item to execute.

Items	Contents
Scanner Motor	Execute the scan operation
Home Position	Execute home position operation
Dust Check	Execute to check if there is a dust by turning the exposure lamp on
DP Reading	Execute the DP scan position operation

- 3 Select [Execute].
- 4 Press [Start] key.
- 5 Start scan operation with the condition specified.
- 6 Press [Stop] key to quit operation.

### Setting: Scanner Motor

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Zoom	Magnification	25 to 400 (%)	100	1%
Size	Original size	3400 to 10200	10200	100
Lamp	Turning the exposure lamp ON/OFF	0: OFF 1: ON	1: ON	-
Execute	Table scanning operation			

### Paper size for each setting values

Setting	Paper size	Setting	Paper size	Setting	Paper size
4300	B5	6100	B5R	8600	B4
5000	A4	6600	8 1/2"×11"	9000	11"×15"
5000	A5R	7100	A4R	10000	A3
5100	11"×8 1/2"	7800	Folio	10200	11"×17"
5100	5 1/2"×8 1/2"	8400	8 1/2"×14"		

- 3 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U074 Adjust DP input characteristics

(Message: Adjust DP Input)

### Contents

Set the image density correction for scanning

### Purpose

Changes the setting value at background image occurrence when scanning bluish original and originals with slightly thick background are scanned. Adjusts when there is the image difference between the table scanning and DP scanning. CIS scanning is not corrected.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
Coefficient	Density correction at DP image scanning	0: No correction 1: Low-level correction 2: Middle-level correction 3: High-level correction	1
DP Color Regist	Operation approval setting of the DP color registration correction	1: On 2: Off	1

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U087 Setting the DP scanning position change operation

(Message: Set DP Scanning Position Operation)

### Contents

If dust can be detected by comparing the original trailing edge scanned data with the scanned data after the original feed, change the original scan position next time.

Also, reduce the black lines by image correction.

### Purpose

Use as the corrective measures for the black lines appearing with dust on the original scanning position when using the document processor.

### Setting

- 1 Press [Start] key.
- 2 Select the item to check.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
Front	Set the front side scanning data threshold	0 to 128	48
Back	Set the back side scanning data threshold at duplex scanning	0 to 128	48
Black Line	Initialize the original scanning position	-	-



### NOTE

If the set value is reduced, dark density image is regarded as dust and dust detection becomes more likely.  
If the set value is increased, dust detection becomes less likely.

### Method: Black Line

- 1 Select [Clear].
- 2 Press [Start] key.  
Original scanning position returns to the initial line.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U089 MIP-PG pattern output

(Message: Output MIP-PG Pattern)

### Contents

Select and output the MIP-PG chart generated by the main unit.

### Purpose

Run this mode is to check main frame conditions except scanning section in time of adjusting scan setting, by using the MIP-PG chart that is output without scan process.



### NOTE

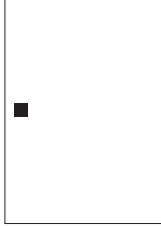
Output in Maintenance mode such as test chart never affect print coverage and counter on Service status page.

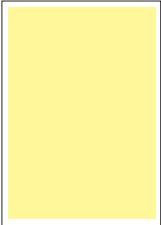


### Method

- 1 Select the MIP-PG chart to output



- 2 Press [System Menu/Counter] key.
- 3 Select [Copies].
- 4 Press [Start] key.

Items	Contents
Color Belt	PG for the developer status and engine ID check (four color PG) 
White	PG for checking the gray (density: 0) 
White (Color)	
Gray(C)	For checking the drum quality (Cyan PG) 
Gray(M)	For checking the drum quality (Magenta PG) 

Items	Contents
Gray(Y)	For checking the drum quality (Yellow PG) 
Gray(K)	For checking the drum quality (Black PG) 
Mono Belt	PG for checking the vertical streaks 
Sample Set	Output the following charts for the long life unit warranty application PG for the developer status and engine ID check (four color PG) For checking the quality (Yellow PG) For checking the quality (Cyan PG) For checking the quality (Magenta PG) For checking the quality (Gray PG)

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U091 White lines correction setting

(Message: Set White Line Correction)

### Contents

Set the error detection threshold for white lines correction and display the abnormal pixel count result.

### Purpose

Execute when replacing the DP CIS, DP PWB or DP CIS roller.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Coefficient(R)	Display the red pixel error counts	0 to 8191	-	-
Coefficient(G)	Display the green pixel error counts	0 to 8191	-	-
Coefficient(B)	Display the Blue pixel error counts	0 to 8191	-	-
Threshold(R)	Set the red color error detection threshold	0 to 1023	112	-
Threshold(G)	Set the green color error detection threshold	0 to 1023	112	-
Threshold(B)	Set the blue color error detection threshold	0 to 1023	112	-
Threshold (Abnormal)	Set the abnormal pixel threshold	0 to 8191	75	-
Mode	Set the white line correction mode	0: No correction 1: Correction 2: Test mode	0	-
Execute	Execute retaining the white reference data	-	-	-



### NOTE

Normally do not change the threshold from the initial value of 112.  
 Increase the value if white lines appear while the CIS roller/glass is not dirty.  
 Decrease the value when thin lines disappear in any types of original.  
 Set the setting range between 50 to 200. (Out of range may affect an image output)

- 4 Press [Start] key to set the setting value.

### Method: Execute

- 1 Select [Execute].

- 2 Press [Start] key.
- 3 Start retaining the white reference data
- 4 Press [System Menu/Counter] key.
- 5 Set the gray original face-down on the document processor and set paper in cassette.
- 6 Match the original and paper size.
- 7 Press [Start] key.
- 8 Output 2 sheets of the test pattern.  
1st sheet: black band of about 60mm width, 2nd sheet: blank (or may be gray band of about 60mm width)
- 9 Setting is correctly completed if no vertical lines are observed on both sheets.  
If a vertical black line appears on blank paper or a gray band or vertical white line appear on the black band, execute the white line correction again after cleaning the DP CIS roller or DP CIS glass.  
White line correction is completed if both sheets have vertical black lines or vertical white lines. However, check the engine since there are factors of vertical streaks at the engine Side.
- 10 Press [System Menu/Counter] key.  
Mode is set to [1].

#### How to check the test copy

Blank paper	Black band	Factor	Corrective measures
No streaks	No streaks	-	Completion
Black streaks	White streaks	DP CIS roller/glass contamination	After cleaning the DP CIS roller/glass, execute U091
Black streaks	No streaks	Engine PWB	Exit from U091 and check the Engine PWB
No streaks	White streaks	Engine PWB	Exit from U091 and check the Engine PWB

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U099 Original size detection setting

(Message: Set Original Size Detection)

### Contents

Check the original size detection and set the detection threshold

### Purpose

Changes the detection threshold if the original size is often mis-detected with entirely dark originals (high density) or originals dark at edges only

Change the threshold.

### Setting

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Data1	Display the width of the original
B/W Level1	Set threshold of the original size detection
Data2	Display the width of the original (The document processor is installed)

### Execute: Data1/Data2

3 Place an original on the table and close the document processor.

4 The light source turn on and the CCD sensor detects the original width. The original size sensor detects the original lengthwise. (Detect twice if the document processor is installed)

Items	Contents	Setting range	Initial setting	Data variation
Original Area(dot)	Detected number of pixels in the original width (dot)	0 to 7352	0	-
Original Area(mm)	Detected the original width (mm)	0 to 308	0	-
Size SW L	Display ON/OFF of the original length sensor (0:Off/1: On)	0 to 1	0	-

### Setting: B/W Level1

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Original1	Set the threshold to judge if it is the original	0 to 255	20*1/50*2	-
Original2	Set the threshold to judge if it is the original	0 to 255	30*1/50*2	-
Original3	Set the threshold to judge if it is the original	0 to 255	40*1/50*2	-

\*1: With DP, \*2: Without DP

### NOTE

Decreasing the setting value makes the sensor's sensitivity high and allows to detect high density originals but the original mat may be detected as an original. Detection error may occur in any positions of original when values are too much difference each other.

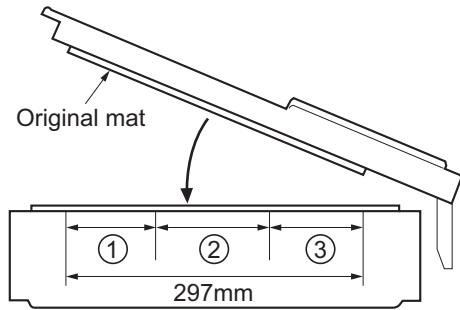


Fig.	Original R/G/B	Original width size range	
①	1	A4R to A3	8.5" to 11"
②	2	B6R to A4R	5.5" to 8.5"
③	3	to B6R	to 5.5"

- 3 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U100 Main High voltage adjustment

(Message: Adjust Main High Voltage Output)

### Contents

Adjust the surface potential by changing the voltage impressed to the main charge roller.

### Purpose

Change the set value to adjust the image when an image failure (background image, etc.) occurs.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Adj AC Bias	Adjust the main charge AC bias of each color
Set AC Auto Adj	Set the automatic AC bias adjustment
Set DC Bias	Display the main charger DC bias correction value for each color.
Adj AC Bias	Adjust the surface potential additional value
Set Low Temp	Set the time at the low temperature environment
Set Charger Freq	Set the main charger frequency
Chk Current	Display the electric current flows
Set AC Gain	Set the AC Gain

### Setting: Adj AC Bias

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.  
Increasing the setting value makes the image density light, and decreasing makes it dark.  
Setting value is variable depending on the environment.  
  
In case that [AC Auto Adj] is on, depending on the condition, charger correction operates and adjust to proper value automatically.  
  
In case that [AC Auto Adj] is off, keep the changed value unless change it manually.

Items	Contents	Setting range	Initial setting
AC Bias(K)	Black main charger AC bias value after adjustment	0 to 255	-
AC Bias(C)	Cyan main charger AC bias value after adjustment	0 to 255	
AC Bias(M)	Magenta main charger AC bias value after adjustment	0 to 255	
AC Bias(Y)	Yellow main charger AC bias value after adjustment	0 to 255	
AC Bias BW(K)	Black main charger AC bias value after adjustment (BW)	0 to 255	

- 3 Press [Start] key to set the setting value.

### Setting: Set AC Auto Adj

- 1 Select the item to set.

Items	Contents	Setting range
On	Adjust automatically	0: (Off) to 1: (On)
Off	Not adjust automatically	0: (Off) to 1: (On)

Initial setting: On

- 2 Press [Start] key to set the setting value.

### Setting: Set DC Bias

- 1 Display the current settings

Items	Contents	Setting range	Initial setting
DC1 Bias(C)	Base of Cyan main charger DC bias correction value (Full speed)	0 to 255	-
DC1 Bias Half(C)	Base of Cyan main charger DC bias correction value (Half speed)	0 to 255	-
DC1 Bias(M)	Base of Magenta main charger DC bias correction value (Full speed)	0 to 255	-
DC1 Bias Half(M)	Base of Magenta main charger DC bias correction value (Half speed)	0 to 255	-
DC1 Bias(Y)	Base of Yellow main charger DC bias correction value (Full speed)	0 to 255	-
DC1 Bias Half(Y)	Base of Yellow main charger DC bias correction value (Half speed)	0 to 255	-
DC1 Bias(K)	Base of Black main charger DC bias correction value (Full speed)	0 to 255	-
DC1 Bias Half(K)	Base of Black main charger DC bias correction value (Half speed)	0 to 255	-
DC1 Bias B/W(K)	Base of Black main charger DC bias correction value (BW)	0 to 255	-

### Setting: Adj DC bias

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Increasing the setting value makes the image density light, and decreasing makes it dark.

In case of increasing the setting value too much, there might be the possibility to occur the image failure due to the developer leakage.

Items	Contents	Setting range	Initial setting
DC2 Bias(C)	Cyan main charger DC bias additional value (Full speed)	-128 to 127	0
DC2 Bias Half(C)	Cyan main charger DC bias additional value (Half speed)	-128 to 127	0
DC2 Bias(M)	Magenta main charger DC bias additional value (Full speed)	-128 to 127	0
DC2 Bias Half(M)	Magenta main charger DC bias additional value (Half speed)	-128 to 127	0
DC2 Bias(Y)	Yellow main charger DC bias additional value (Full speed)	-128 to 127	0
DC2 Bias Half(Y)	Yellow main charger DC bias additional value (Half speed)	-128 to 127	0
DC2 Bias(K)	Black main charger DC bias additional value (Full speed)	-128 to 127	0
DC1 Bias Half(K)	Black main charger DC bias additional value (Half speed)	-128 to 127	0
DC1 Bias B/W(K)	Black main charger DC bias additional value (BW)	-128 to 127	0

- 3 Press [Start] key to set the setting value.

### Setting: Set Low Temp



- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
Set Low Temp	Set the pre-charge time at power ON	0 to 6	1

### Setting: Set Charger Freq

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.  
Interference fringes may occur by changing the setting.

Items	Contents	Setting range
Generally	Set the main charger frequency (Normal speed)	500 to 4000
Half	Set the main charger frequency (Half speed)	500 to 4000
B/W	Set the main charger frequency (BW)	500 to 4000
3/4	Set the main charger frequency (3/4 speed)	500 to 4000

### Default setting value

Items	83/70ppm	73/65ppm
Generally	3000	3000
Half	3000	3000
B/W	3000	3000
3/4	3000	3000

- 3 Press [Start] key to set the setting value.

### Setting: Chk Current

- 1 Measure the current value by charging the drum with the current setting value

Items	Contents
C	Cyan inflow current
M	Magenta inflow current
Y	Yellow inflow current
K	Black inflow current

Do not run [Chk Current] for more than 10 seconds.

Run drum refresh after this mode since discharge product stick on drum.

### Setting: Set AC Gain

- 1 Select the item to set.

The screen for setting is displayed.

Items	Contents	Setting range	Initial setting
Auto	Default (Automatic control)	0 to 3	0
Mode1	Multiplication value setting 0.95	0 to 3	0
Mode2	Multiplication value setting 1.15	0 to 3	0
Mode3	Multiplication value setting 1.05	0 to 3	0

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U101 Primary transfer voltage adjustment

(Message: Adjust 1st Transfer Voltage Output)

### Contents

Reference/setting of high pressure control value other than main high pressure and confirm its output.

### Purpose

Change setting if a failure such as faint image, etc. occurs.

### Setting

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Voltage	Set the primary transfer feedback voltage
Altitude Adjustment	Altitude Adjustment setting
Current	Set the primary transfer feedback current
Final Current	Set the primary transfer feedback final current
Prohibit Reflection	Primary transfer FB result reflection prohibition setting
Force Execute	Forced primary transfer FB execution setting
Surround Current	Primary transfer FB surround correct prohibition setting
Temperature	Temperature setting
Humidity	Humidity setting
Degree A	Tilt setting
Intercept B	Intercept setting
Delta V Full	V full setting

### Setting: Voltage

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Target	Set the primary transfer feedback voltage target
Step	Set the primary transfer feedback voltage step
Value	Set the primary transfer feedback voltage (Front side)
Value 2nd	Set the primary transfer feedback voltage (Back side)

### Setting: Target

1 Select the item to set.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
C	Cyan primary transfer feedback voltage target value	0 to 290	-
M	Magenta primary transfer feedback voltage target value	0 to 290	-
Y	Yellow primary transfer feedback voltage target value	0 to 290	-
K	Black primary transfer feedback voltage target value	0 to 290	-

#### Default setting value

Items	83/70ppm	73/65ppm
C	30	30
M	30	30
Y	30	30
K	30	30

- 3 Press [Start] key to set the setting value.

#### Setting: Step

- 1 Select the item to set.  
2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Step	Primary transfer feedback voltage step		

#### Default setting value

Items	83/70ppm	73/65ppm
Step	15	15

- 3 Press [Start] key to set the setting value.

#### Setting: Value

- 1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Normal C	Cyan primary transfer feedback voltage (Normal speed)	0 to 290	-
Normal M	Magenta primary transfer feedback voltage (Normal speed)	0 to 290	-
Normal Y	Yellow primary transfer feedback voltage (Normal speed)	0 to 290	-
Normal K	Black primary transfer feedback voltage (Normal speed)	0 to 290	-
B/W	Monochrome primary transfer feedback voltage (Monochrome printing at Normal speed)	0 to 290	-
3/4 (C)	Cyan primary transfer feedback voltage (3/4 speed)	0 to 290	-
3/4 (M)	Magenta primary transfer feedback voltage (3/4 speed)	0 to 290	-
3/4 (Y)	Yellow primary transfer feedback voltage (3/4 speed)	0 to 290	-
3/4 (K)	Black primary transfer feedback voltage (3/4 speed)	0 to 290	-
Half (C)	Cyan primary transfer feedback current target (Half speed)	0 to 290	-
Half (M)	Magenta primary transfer feedback voltage (Half speed)	0 to 290	-
Half (Y)	Yellow primary transfer feedback voltage (Half speed)	0 to 290	-
Half (K)	Black primary transfer feedback voltage (Half speed)	0 to 290	-

#### Default setting value

Items	83/70ppm	73/65ppm
Normal C	187	181
Normal M	187	187
Normal Y	192	186
Normal K	182	176
B/W	193	177
3/4 (C)	160	160
3/4 (M)	160	160
3/4 (Y)	150	150
3/4 (K)	160	160
Half (C)	150	150
Half (M)	150	150
Half (Y)	140	140
Half (K)	150	150

3 Press [Start] key to set the setting value.

#### Setting: Value 2nd

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Normal C	Cyan primary transfer feedback voltage (Normal speed)	0 to 290	-
Normal M	Magenta primary transfer feedback voltage (Normal speed)	0 to 290	-
Normal Y	Yellow primary transfer feedback voltage (Normal speed)	0 to 290	-
Normal K	Black primary transfer feedback voltage (Normal speed)	0 to 290	-
B/W	Monochrome primary transfer feedback voltage (Monochrome printing at Normal speed)	0 to 290	-
3/4 (C)	Cyan primary transfer feedback voltage (3/4 speed)	0 to 290	-
3/4 (M)	Magenta primary transfer feedback voltage (3/4 speed)	0 to 290	-
3/4 (Y)	Yellow primary transfer feedback voltage (3/4 speed)	0 to 290	-
3/4 (K)	Black primary transfer feedback voltage (3/4 speed)	0 to 290	-
Half (C)	Cyan primary transfer feedback current target (Half speed)	0 to 290	-
Half (M)	Magenta primary transfer feedback voltage (Half speed)	0 to 290	-
Half (Y)	Yellow primary transfer feedback voltage (Half speed)	0 to 290	-
Half (K)	Black primary transfer feedback voltage (Half speed)	0 to 290	-

#### Default setting value

Items	83/70ppm	73/65ppm
Normal C	181	176
Normal M	181	176
Normal Y	185	179
Normal K	177	172
B/W	193	177
3/4 (C)	169	169
3/4 (M)	169	169
3/4 (Y)	172	172
3/4 (K)	165	165
Half (C)	129	129
Half (M)	129	129
Half (Y)	131	131
Half (K)	127	127

3 Press [Start] key to set the setting value.

#### Setting: Altitude Adjustment

1 Press [Start] key.

## 2 Select the item to set.

The screen for setting is displayed.

Items	Contents
1st Side	High altitude (Front side) setting
2nd Side	High altitude (Back side) setting

**Setting: 1st side**

## 1 Select the item to set.

## 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
C	High altitude mode (C) setting	-250 / -250	-
M	High altitude mode (M) setting	-250 / -250	-
Y	High altitude mode (Y) setting	-250 / -250	-
K	High altitude mode (K) setting	-250 / -250	-

**Default setting value**

Items	83/70ppm	73/65ppm
C	0	0
M	0	0
Y	0	0
K	0	0

## 3 Press [Start] key to set the setting value.

**Setting: 2nd side**

## 1 Select the item to set.

## 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
C	High altitude mode (C) setting	-250 to 250	-
M	High altitude mode (M) setting	-250 to 250	-
Y	High altitude mode (Y) setting	-250 to 250	-
K	High altitude mode (K) setting	-250 to 250	-

**Default setting value**

Items	83/70ppm	73/65ppm
C	0	0
M	0	0
Y	0	0
K	0	0

## 3 Press [Start] key to set the setting value.

**Setting: Current**

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Target	Primary transfer feedback current target setting (Front side)
Target 2nd	Primary transfer feedback current target setting (Back side)

### Setting: Target

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Normal C	Cyan primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal M	Magenta primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal Y	Yellow primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal K	Black primary transfer feedback voltage (Normal speed)	0 to 500	-
B/W	Monochrome primary transfer feedback voltage (Monochrome printing at Normal speed)	0 to 500	-
3/4 (C)	Cyan primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (M)	Magenta primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (Y)	Yellow primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (K)	Black primary transfer feedback voltage (3/4 speed)	0 to 500	-
Half (C)	Cyan primary transfer feedback voltage (Half speed)	0 to 500	-
Half (M)	Magenta primary transfer feedback voltage (Half speed)	0 to 500	-
Half (Y)	Yellow primary transfer feedback voltage (Half speed)	0 to 500	-
Half (K)	Black primary transfer feedback voltage (Half speed)	0 to 500	-

### Default setting value

Items	83/70ppm	73/65ppm
Normal C	220	209
Normal M	220	209
Normal Y	230	219
Normal K	210	200
B/W	232	200
3/4 (C)	187	187
3/4 (M)	187	187
3/4 (Y)	197	197
3/4 (K)	177	177
Half (C)	108	108
Half (M)	108	108



Items	83/70ppm	73/65ppm
Half (Y)	117	117
Half (K)	100	100

3 Press [Start] key to set the setting value.

### Setting: Target 2st

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Normal C	Cyan primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal M	Magenta primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal Y	Yellow primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal K	Black primary transfer feedback voltage (Normal speed)	0 to 500	-
B/W	Monochrome primary transfer feedback voltage (Monochrome printing at Normal speed)	0 to 500	-
3/4 (C)	Cyan primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (M)	Magenta primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (Y)	Yellow primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (K)	Black primary transfer feedback voltage (3/4 speed)	0 to 500	-
Half (C)	Cyan primary transfer feedback voltage (Half speed)	0 to 500	-
Half (M)	Magenta primary transfer feedback voltage (Half speed)	0 to 500	-
Half (Y)	Yellow primary transfer feedback voltage (Half speed)	0 to 500	-
Half (K)	Black primary transfer feedback voltage (Half speed)	0 to 500	-

### Default setting value

Items	83/70ppm	73/65ppm
Normal C	208	198
Normal M	208	198
Normal Y	217	206
Normal K	200	190
B/W	232	200
3/4 (C)	184	184
3/4 (M)	184	184
3/4 (Y)	192	192
3/4 (K)	177	177
Half (C)	104	104
Half (M)	104	104
Half (Y)	108	108
Half (K)	100	100

- 3 Press [Start] key to set the setting value.

### Setting: Final Current

- 1 Press [Start] key.

- 2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Target	Primary transfer feedback current target setting (Front side)
Target 2nd	Primary transfer feedback current target setting (Back side)

### Setting: Target

- 1 Select the item to set.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Normal C	Cyan primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal M	Magenta primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal Y	Yellow primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal K	Black primary transfer feedback voltage (Normal speed)	0 to 500	-
B/W	Monochrome primary transfer feedback voltage (Monochrome printing at Normal speed)	0 to 500	-
3/4 (C)	Cyan primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (M)	Magenta primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (Y)	Yellow primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (K)	Black primary transfer feedback voltage (3/4 speed)	0 to 500	-
Half (C)	Cyan primary transfer feedback voltage (Half speed)	0 to 500	-
Half (M)	Magenta primary transfer feedback voltage (Half speed)	0 to 500	-
Half (Y)	Yellow primary transfer feedback voltage (Half speed)	0 to 500	-
Half (K)	Black primary transfer feedback voltage (Half speed)	0 to 500	-

### Default setting value

Items	83/70ppm	73/65ppm
Normal C	220	209
Normal M	220	209
Normal Y	230	219
Normal K	210	200
B/W	232	200
3/4 (C)	187	187
3/4 (M)	187	187
3/4 (Y)	197	197
3/4 (K)	177	177

Items	83/70ppm	73/65ppm
Half (C)	108	108
Half (M)	108	108
Half (Y)	117	117
Half (K)	100	100

3 Press [Start] key to set the setting value.

### Setting: Target 2st

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Normal C	Cyan primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal M	Magenta primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal Y	Yellow primary transfer feedback voltage (Normal speed)	0 to 500	-
Normal K	Black primary transfer feedback voltage (Normal speed)	0 to 500	-
B/W	Monochrome primary transfer feedback voltage (Monochrome printing at Normal speed)	0 to 500	-
3/4 (C)	Cyan primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (M)	Magenta primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (Y)	Yellow primary transfer feedback voltage (3/4 speed)	0 to 500	-
3/4 (K)	Black primary transfer feedback voltage (3/4 speed)	0 to 500	-
Half (C)	Cyan primary transfer feedback voltage (Half speed)	0 to 500	-
Half (M)	Magenta primary transfer feedback voltage (Half speed)	0 to 500	-
Half (Y)	Yellow primary transfer feedback voltage (Half speed)	0 to 500	-
Half (K)	Black primary transfer feedback voltage (Half speed)	0 to 500	-

### Default setting value

Items	83/70ppm	73/65ppm
Normal C	208	198
Normal M	208	198
Normal Y	217	206
Normal K	200	190
B/W	232	200
3/4 (C)	184	184
3/4 (M)	184	184
3/4 (Y)	192	192
3/4 (K)	177	177
Half (C)	104	104
Half (M)	104	104

Items	83/70ppm	73/65ppm
Half (Y)	108	108
Half (K)	100	100

3 Press [Start] key to set the setting value.

### Setting: Prohibit Reflection

1 Select the item to set.

Items	Contents
ON	Prohibitive setting of the primary transfer feedback result reflection On (1)
OFF	Prohibitive setting of the primary transfer feedback result reflection Off (0)

Default setting: 0 (Off)

2 Press [Start] key to set the setting value.

### Setting: Force Execute

1 Select [Execute] and press [Start] key.

Operation starts.

### Setting: Surround Correct

1 Select the item to set.

Items	Contents
ON	Prohibitive setting of the primary transfer feedback environmental correction On
OFF	Prohibitive setting of the primary transfer feedback environmental correction Off

Default setting: 0 (Off)

2 Press [Start] key to set the setting value.

### Setting: Temperature

1 Select the item to set.

Items	Contents
Last External Temp	Temperature outside machine at latest adjustment
Full External Temp	Temperature outside machine at full adjustment

2 Press [Start] key to set the setting value.

### Setting: Humidity

1 Select the item to set.

Items	Contents
Last Humidity	Humidity outside machine at latest adjustment
Full Humidity	Humidity outside machine at full adjustment

2 Press [Start] key to set the setting value.

### Setting: Degree A

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
C	Degree: a (C)	0 to 3500	-
M	Degree: a (M)	0 to 3500	-
Y	Degree: a (Y)	0 to 3500	-
K	Degree: a (K)	0 to 3500	-

#### Default setting value

Items	83/70ppm	73/65ppm
C	31	31
M	31	31
Y	31	31
K	31	31

3 Press [Start] key to set the setting value.

#### Setting: Intercept B

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
C	Section: b (C)	0 to 3500	-
M	Section: b (M)	0 to 3500	-
Y	Section: b (Y)	0 to 3500	-
K	Section: b (K)	0 to 3500	-

#### Default setting value

Items	83/70ppm	73/65ppm
C	847	847
M	847	847
Y	847	847
K	847	847

3 Press [Start] key to set the setting value.

#### Setting: Delta V Full

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
C	Δ V full (C)	0 to 2000	-
M	Δ V full (M)	0 to 2000	-
Y	Δ V full (Y)	0 to 2000	-
K	Δ V full (K)	0 to 2000	-

#### Default setting value

Items	83/70ppm	73/65ppm
C	847	847
M	847	847
Y	847	847
K	847	847

3 Press [Start] key to set the setting value.

#### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U106 Secondary transfer voltage adjustment

(Message: Adjust 2nd transfer Roller Output)

### Contents

Set the secondary transfer control voltage.

### Purpose

Change setting if a failure such as faint image, etc. occurs.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Light/Normal1	Transfer control value for Light/Normal1
Normal2/3	Transfer control value for Normal 2/3
Heavy1	Transfer control value for Heavy1
Heavy2/3	Transfer control value for Heavy 2/3
Heavy4/5	Transfer control value for Heavy 4/5
OHP	Transfer control value for Transparency
Bias	Bias Setting

### Setting: Light/Normal1

- 1 Select the item to set.  
The screen for setting is displayed.

Items	Contents
1st	Surface transfer control value at full speed
2nd	Back side transfer control value at full speed
1st 3/4(Gloss)	Surface transfer control value of gloss mode at 3/4 speed
2nd 3/4(Gloss)	Back side transfer control value of gloss mode at 3/4 speed
1st B/W	Surface transfer control value of B/W at full speed
2nd B/W	Back side transfer control value of B/W at full speed

### Setting: 1st/2nd/1st 3/4 (Gloss)/2nd 3/4 (Gloss)/1st BW/2nd BW

- 1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Width=105	Set paper width = 105	0 to 255	-
Width=210	Set paper width = 210	0 to 255	-
Width=297	Set paper width = 297	0 to 255	-

[1st]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	167	158
Width=210	128	124
Width=297	116	112

[2nd]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	188	188
Width=210	150	137
Width=297	102	99

[1st 3/4(Gloss)]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	143	143
Width=210	110	110
Width=297	101	101

[2nd 3/4(Gloss)]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	159	159
Width=210	131	131
Width=297	91	91

[1st B/W]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	153	138
Width=210	114	107
Width=297	134	121

[2nd B/W]

**Default setting value**



Items	83/70ppm	73/65ppm
Width=105	139	125
Width=210	101	96
Width=297	189	168

3 Press [Start] key to set the setting value.

**Setting: Normal2/3**

1 Select the item to set.

The screen for setting is displayed.

Items	Contents
1st	Surface transfer control value at full speed
2nd	Back side transfer control value at full speed
1st 3/4(Gloss)	Surface transfer control value of gloss mode at 3/4 speed
2nd 3/4(Gloss)	Back side transfer control value of gloss mode at 3/4 speed
1st B/W	Surface transfer control value of B/W at full speed
2nd B/W	Back side transfer control value of B/W at full speed

**Setting: 1st/2nd/1st 3/4 (Gloss)/2nd 3/4 (Gloss)/1st BW/2nd BW**

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Width=105	Set paper width = 105	0 to 255	-
Width=210	Set paper width = 210	0 to 255	-
Width=297	Set paper width = 297	0 to 255	-

[1st]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	172	162
Width=210	133	128
Width=297	121	115

[2nd]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	188	188
Width=210	150	137
Width=297	102	99

[1st 3/4(Gloss)]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	146	146
Width=210	114	114
Width=297	105	105

[2nd 3/4(Gloss)]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	159	159
Width=210	131	131
Width=297	91	91

[1st B/W]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	153	138
Width=210	116	107
Width=297	107	98

[2nd B/W]

**Default setting value**

Items	83/70ppm	73/65ppm
Width=105	139	125
Width=210	101	96
Width=297	79	72

3 Press [Start] key to set the setting value.

### Setting: Heavy1

1 Select the item to set.

The screen for setting is displayed.

Items	Contents
1st 3/4	Surface transfer control value at 3/4 speed
2nd 3/4	Back side transfer control value at 3/4 speed

**Setting: 1st 3/4 /2nd 3/4 Select the item to check.**

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Width=105	Set paper width = 105	0 to 255	-
Width=210	Set paper width = 210	0 to 255	-
Width=297	Set paper width = 297	0 to 255	-

[1st 3/4]

### Default setting value

Items	83/70ppm	73/65ppm
Width=105	133	133
Width=210	102	102
Width=297	96	96

[2nd 3/4]

### Default setting value

Items	83/70ppm	73/65ppm
Width=105	161	161
Width=210	133	133
Width=297	96	96

3 Press [Start] key to set the setting value.

### Setting: Heavy2/3

- 1 Select the item to set.

The screen for setting is displayed.

Items	Contents
1st Half	Surface transfer control value at half speed
2nd Half	Back side transfer control value at half speed

#### Setting: 1st Half/2nd Half

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Width=105	Set paper width = 105	0 to 255	-
Width=210	Set paper width = 210	0 to 255	-
Width=297	Set paper width = 297	0 to 255	-

[1st Half]

#### Default setting value

Items	83/70ppm	73/65ppm
Width=105	98	98
Width=210	81	81
Width=297	76	76

[2nd Half]

#### Default setting value

Items	83/70ppm	73/65ppm
Width=105	118	118
Width=210	98	98
Width=297	76	76

- 3 Press [Start] key to set the setting value.

#### Setting: OHP

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Width=105	Set paper width = 105	0 to 255	-
Width=210	Set paper width = 210	0 to 255	-
Width=297	Set paper width = 297	0 to 255	-

#### Default setting value

Items	83/70ppm	73/65ppm
Width=105	116	116

Items	83/70ppm	73/65ppm
Width=210	107	107
Width=297	98	98

3 Press [Start] key to set the setting value.

### Setting: Bias

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Reverse	Reverse bias setting (Full speed)	0 to 255	-
Reverse Half	Reverse bias setting (Half speed)	0 to 255	-
Reserve 3/4	Reverse bias setting (3/4 speed)	0 to 255	-
Reserve B/W	Reverse bias setting (B/W)	0 to 255	-
Cleaning	Cleaning (Full speed)	0 to 255	-
Cleaning Half	Cleaning (Half speed)	0 to 255	-
Cleaning 3/4	Cleaning (3/4 speed)	0 to 255	-

### Default setting value

Items	83/70ppm	73/65ppm
Reverse	1	1
Reverse Half	1	1
Reserve 3/4	1	1
Reserve B/W	1	1
Cleaning	123	118
Cleaning Half	133	133
Cleaning 3/4	111	111

3 Press [Start] key to set the setting value.

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U107 Primary transfer cleaning voltage adjustment

(Message: Adjust 1st Transfer Unit Cleaning Output)

### Contents

Belt(A)/(B): Set the transfer belt cleaning control voltage

1st sheet CLN B/W: Printing size gets off from cleaning position.

### Purpose

Belt(A): Change the setting when offset images appear because of the transfer belt cleaning failure.

1st sheet CLN B/W: Set if transfer belt cleaning failure happen only in the first page for continuous B/W printing.



### NOTE

First copy time gets slower with this function.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Belt(A)	Belt A setting
Belt(B)	Belt B setting

### Setting: Belt(A)

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Full	Full speed setting	0 to 255	1[ $\mu$ A]
Half	Half speed setting	0 to 255	1[ $\mu$ A]
B/W	B/W setting	0 to 255	1[ $\mu$ A]
3/4	3/4 speed setting	0 to 255	1[ $\mu$ A]

### Default setting value

Items	83/70ppm	73/65ppm
Full	70	67
Half	63	60
B/W	70	67
3/4	70	67

- 3 Press [Start] key to set the setting value.

### Setting: Belt(B)

- 1 Select the item to set.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Full	Full speed setting	0 to 255	1[uA]
Half	Half speed setting	0 to 255	1[uA]
B/W	B/W setting	0 to 255	1[uA]
3/4	3/4 speed setting	0 to 255	1[uA]

#### Default setting value

Items	83/70ppm	73/65ppm
Full	213	204
Half	213	204
B/W	213	204
3/4	213	204

- 3 Press [Start] key to set the setting value.



#### NOTE

Test copy is available by pressing [System Menu] key as interruption copy mode while this maintenance mode is running.

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.

(Feed cassette/Conveying speed/Duplex printing/Color BW setting/Print Set/Output tray)

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U108 Separation Shift bias adjustment

(Message: Adjust Separation Shift Bias)

### Contents

Adjusts output of separation shift bias and ON/OFF timing.

### Purpose

Change the setting value if paper separation failure occurs.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Output	Separation Shift bias output adjustment
Output 3/4	Separation Shift bias output adjustment at 3/4 speed
Output B/W	Separation Shift bias output adjustment at B/W mode
Timing	ON/OFF timing adjustment by paper position

### Setting: Output

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Light 1st	Separation shift bias setting for front side of light paper at full speed	0 to 255	-
Light 2nd	Separation shift bias setting for back side of light paper at full speed	0 to 255	-
Normal 1st	Separation shift bias setting for front side of normal paper at full speed	0 to 255	-
Normal 2nd	Separation shift bias setting for back side of normal paper at full speed	0 to 255	-
Add Normal Lead	Additive setting for the leading edge of normal paper	-127 to 127	-
Heavy/OHP	Separation shift bias setting for Heavy and OHP	0 to 255	-

### Default setting value

Items	83/70ppm	73/65ppm
Light 1st	57	57
Light 2nd	57	57
Normal 1st	38	38
Normal 2nd	57	57
Add Normal Lead	0	0
Heavy/OHP	38	38

- 3 Press [Start] key to set the setting value.

### Setting: Output 3/4 /Output B/W



- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Light 1st	Separation shift bias setting for front side of light paper at full speed	0 to 255	-
Light 2nd	Separation shift bias setting for back side of light paper at full speed	0 to 255	-
Normal 1st	Separation shift bias setting for front side of normal paper at full speed	0 to 255	-
Normal 2nd	Separation shift bias setting for back side of normal paper at full speed	0 to 255	-

### Default setting value

Output 3/4

Items	83/70ppm	73/65ppm
Light 1st	57	57
Light 2nd	57	57
Normal 1st	57	57
Normal 2nd	57	57

Output B/W

Items	83/70ppm	73/65ppm
Light 1st	57	57
Light 2nd	57	57
Normal 1st	38	38
Normal 2nd	57	57

- 3 Press [Start] key to set the setting value.

### Setting: Timing

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
On Timing Lead	Separation shift bias ON timing at the leading edge	-200 to 200	0	-
On Timing Center	Separation shift bias ON timing at the center of page	-200 to 200	0	-
Off Timing	Separation shift bias OFF timing	-200 to 200	0	-

- 3 Press [Start] key to set the setting value.

**NOTE**

Test copy of the original is available by pressing [System Menu/Counter] key as interruption copy mode when executing this maintenance mode.

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.

(Feed cassette/Conveying speed/Duplex printing/Color BW setting/Print Set/Output tray)

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U110 Drum counter

(Message: Drum Unit Counter)

### Contents

Display the drum counter value.

### Purpose

Execute to check the drum usage status.

### Method

- 1 Press [Start] key.

Each drum counter is displayed.

Items	Contents
C	Display Cyan drum counter
M	Display Magenta drum counter
Y	Display Yellow drum counter
K	Display Black drum counter

### Completion

- 2 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U111 Drive driving time

(Message: Drum Driving Time)

### Contents

Display the drum drive time

### Purpose

Execute to check the drum usage status.

### Method

- 1 Press [Start] key.  
Display the drum drive time.

Items	Contents
C	Display Cyan drum drive time
M	Display Magenta drum drive time
Y	Display Yellow drum drive time
K	Display Black drum drive time

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U117 Drum unit number

(Message: Drum Unit Number)

### Contents

Display the drum number.

### Purpose

Execute to check the drum number.

### Method

- 1 Press [Start] key.

Display the drum number.

Items	Contents
C	Display Cyan drum number
M	Display Magenta drum number
Y	Display Yellow drum number
K	Display Black drum number

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U118 Drum unit history

(Message: Drum Unit History)

### Contents

Display the machine serial number and drum counter history.

### Purpose

**Execute to check the machine serial number and drum counter values.**

### Method

- 1 Press [Start] key.

Select the item to display.

Items	Contents
C	Display Cyan drum history
M	Display Magenta drum history
Y	Display Yellow drum history
K	Display Black drum history

Display the machine serial number and drum counter history back to 3 cases.

Items	Contents
Machine History1 to 3	Machine serial number history
Cnt History1 to 3	Drum counter history

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U119 Setting the drum

(Message: Set Up Drum Unit)

### Contents

Set the initial LSU light based on the drum sensitivity.

### Purpose

Execute when the drum unit or laser scanner unit is replaced.

After completing, execute maintenance mode U464 [Calibration] and U412 [Adjusting the uneven density].

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Send the drum sensitivity data in EEPROM to engine PWB and correct LSU laser power.

- 3 Press [Start] key.  
Start the drum setup operation.
- 4 Turn the power switch OFF/ON.  
Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U122 Display the primary transfer unit number

(Message: 1st Transfer Unit Number)

### Contents

Display the primary transfer unit number.

### Purpose

Execute to check the primary transfer unit number.

### Method

- 1 Press [Start] key.  
Display the primary transfer unit number.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U123 Primary transfer unit history

(Message: 1st Transfer Unit History)

### Contents

Display the machine number and the primary transfer unit counter history.

### Purpose

Confirms to check the machine number and primary transfer unit counter.

### Method

- 1 Press [Start] key.

Displays the machine number and 3 cases of the primary transfer unit counter history.

Items	Contents
Machine History1 to 3	Machine serial number history
Cnt History1 to 3	Primary transfer unit counter history

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U127 Clearing the transfer count

(Message: Clear Transfer Roller Counter)

### Contents

Display and clear the transfer counts for the transfer high-voltage output correction etc.

### Purpose

Execute when checking the counts after replacing the primary transfer unit or secondary transfer roller unit.

Also execute when clearing the secondary transfer counts after replacing.

### Method

- 1 Press [Start] key.

Transfer counter value is displayed.

Items	Contents
Mid Trans(Cnt)	Display the primary transfer counts
2nd Trans(Cnt)	Display the secondary transfer counts
Mid Trans(Time)	Display the primary transfer unit drive time counts
2nd Trans(Time)	Display the secondary transfer roller unit drive time counts

### Method: Clear

- 1 Select [Clear].
- 2 Press [Start] key to clear the second transfer counter value.  
2nd Trans (Cnt)/ 2nd Trans (Time) only

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U128 Transfer timing adjustment

(Message: Adjust Transfer Timing)

### Contents

Adjust On/Off timing of the transfer high voltage output.

### Purpose

Prevent paper from being rolled up in the drum.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
On Timing 1st	Surface transfer On timing adjustment value	-200 to 200	0.1mm
On Timing 2nd	Back side transfer On timing adjustment value	-200 to 200	0.1mm
Off Timing	Transfer Off timing adjustment value	-200 to 200	0.1mm

### Default setting value

Items	83/70ppm	73/65ppm
On Timing 1st	0	0
On Timing 2nd	0	0
Off Timing	0	0

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U130 Developer initial setting

(Message: Set Toner Install)

### Contents

Set the toner sensor control voltage so that the sensor output value becomes the target one in initial developer.

### Purpose

Execute automatically when exchanging the developer unit which includes the initial developer.

### Method

1 Press [Start] key.

2 Select [Execute].

3 Press [Start] key.

Start the initial developer setting and display the control voltage value of toner sensor.

Items	Contents
C	Toner sensor C control voltage value
M	Toner sensor M control voltage value
Y	Toner sensor Y control voltage value
K	Toner sensor K control voltage value

### Completion

1 Press [Stop] key.

## U131 Toner sensor control voltage adjustment

(Message: Adjust Toner Sensor Control Voltage)

### Contents

Adjusts the toner sensor control voltage

### Purpose

if control values are not correctly read out due to the developer unit EEPROM failure etc., set manual adjustment and fix temporarily control value in manual.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Manual	Toner sensor control voltage manual adjustment
Auto	Toner sensor control voltage Automatic adjustment
Mode	Mode setting

#### Method: Manual

1 Display current setting.

Items	Contents	Setting range	Initial setting	Data variation
Control(C)	Toner sensor C control voltage	0 to 255	150	-
Control(M)	Toner sensor M control voltage	0 to 255	150	-
Control(Y)	Toner sensor Y control voltage	0 to 255	150	-
Control(K)	Toner sensor K control voltage	0 to 255	150	-

#### Method: Auto

1 Display current setting.

Items	Contents	Setting range
Default(C)	Toner sensor C control voltage basic value	0 to 1023
Default(M)	Toner sensor M control voltage basic value	0 to 1023
Default(Y)	Toner sensor Y control voltage basic value	0 to 1023
Default(K)	Toner sensor K control voltage basic value	0 to 1023
Control(C)	Toner sensor C control voltage controlled value	0 to 1023
Control(M)	Toner sensor M control voltage controlled value	0 to 1023
Control(Y)	Toner sensor Y control voltage controlled value	0 to 1023
Control(K)	Toner sensor K control voltage controlled value	0 to 1023

#### Method: Mode

- 1 Select the item to check.

Items	Contents
Manual	Toner sensor control voltage manual adjustment
Auto	Toner sensor control voltage Automatic adjustment

Initial setting: Auto

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U132 Forcible toner supply operation

(Message: Supply Toner Forcefully)

### Contents

Toner is supplied forcibly until the toner sensor output value reaches the toner supply level.

### Purpose

Execute if toner empty is often detected.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Install toner

- 3 Press [Start] key.

Execute toner supply forcibly until the toner sensor output value reaches the toner supply level.

Items	Contents	Setting range
Supply(C)	Cyan toner supply level	0 to 1023
Supply(M)	Magenta toner supply level	0 to 1023
Supply(Y)	Yellow toner supply level	0 to 1023
Supply(K)	Black toner supply level	0 to 1023
Sensor(C)	Cyan toner sensor output value	0 to 1023
Sensor(M)	Magenta toner sensor output value	0 to 1023
Sensor(Y)	Yellow toner sensor output value	0 to 1023
Sensor(K)	Black toner sensor output value	0 to 1023

- 4 Press [Stop] key to quit operation.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U135 Checking the toner motor operation

(Message: Check Toner Motor Operation)

### Contents

Drives the toner motor.

### Purpose

Execute to check the toner motor operation.

### IMPORTANT

If driven for a long time or several times repeatedly, the developer unit will be full of toner inside and it may lock up.

### Method

- 1 Press [Start] key.
- 2 Select the item to display.
- 3 Press [Start] key.  
The operation starts.

Items	Contents
Toner	Drive toner supply motor
Hopper	Drive toner hopper supply motor (BK drive)

\*1: Display only (Updates regularly)

- 4 Press [Stop] key to quit operation.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U136 Toner level detection setting

(Message: Set Toner Near End Detection)

### Contents

Execute the level setting of printable pages between toner near end and toner empty.

### Purpose

Change the timing of detecting toner near end earlier than the current setting if the interval between toner near end and toner empty is too short.

### Setting

1 Press [Start] key.

2 Select the item to set.

Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
CMY	Cyan/Magenta/Yellow toner level setting	0 to 9	3	-
K	Black toner level Setting	0 to 9	3	-

If the set value is increased, the time interval from the toner near end to the toner empty becomes longer.

If the set value is reduced, the time interval from toner near end to toner empty becomes shorter.

0: no toner near end detection

3 Press [Start] key to set the setting value.



### NOTE

The setting value can not work if the change has done while "Toner Low" is already displaying.

Main switch has to be turned on and off in case of changing the value while "Toner Low" is already displaying.

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U139 Temperature, humidity

(Message: Temperature/Humidity)

### Contents

Display the machine inside and outside temperature and machine outside humidity.

### Purpose

Check the machine inside and outside temperature and machine outside humidity.

### Method

- 1 Press [Start] key.
- 2 Select the item to check.

Items	Contents
Ext/Int	Machine inside and outside temperature (°C) and machine outside humidity (%)
LSU	Machine inside temperature around LSU (°C)
Developing	Machine inside temperature around developer (°C)

#### Method: Ext/Int

- 1 Display the current temperature and humidity

Items	Contents
External Temp	Machine outside temperature (°C)
External Humidity	Machine outside humidity (%)
Internal Temp	Machine inside temperature (°C)

#### Method: LSU

- 1 The current temperature is displayed.

Items	Contents
Internal Temp (K)	The LSU temperature inside the machine (K)

#### Method: Developing

- 1 Display the current temperature and humidity

Items	Contents
Internal Temp (C)	Temperature inside the machine of developer unit C (°C)
Internal Temp (M)	Temperature inside the machine of developer unit M (°C)
Internal Temp (Y)	Temperature inside the machine of developer unit Y (°C)
Internal Temp (K)	Temperature inside the machine of developer unit K (°C)

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U140 Developer bias adjustment

(Message: Adjusting Developing Bias)

### Contents

Displays/changes the developer bias set values or sets high altitude mode.

### Purpose

Execute to check/change the developer bias set values.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Sleeve DC	Set the developer sleeve roller DC bias
Sleeve AC	Set the developer sleeve roller AC bias
Mag DC	Set the developer magnet roller DC bias
Mag AC	Set the developer magnet roller AC bias
Sleeve Freq	Set the developer sleeve roller frequency
Sleeve Duty	Set the developer sleeve roller duty
Mag Duty	Set the developer magnet roller duty
AC Calib	Execute and set AC calibration
Image Preference	Set the toner density
Altitude Adjustment	Set the altitude adjustment mode

### Setting: Sleeve DC

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
C	Cyan developer sleeve DC bias setting	0 to 255	66
M	Magenta developer sleeve DC bias setting	0 to 255	66
Y	Yellow developer sleeve DC bias setting	0 to 255	66
K	Black developer sleeve DC bias setting	0 to 255	82
B/W	Developer sleeve DC bias setting at B/W mode	0 to 255	82

- 3 Press [Start] key to set the setting value.

### Setting: Sleeve AC

- 1 Select the item to set.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
C	Cyan developer sleeve AC bias setting	0 to 255	180
M	Magenta developer sleeve AC bias setting	0 to 255	180
Y	Yellow developer sleeve AC bias setting	0 to 255	180
K	Black developer sleeve AC bias setting	0 to 255	180
B/W	Developer sleeve AC bias setting at B/W mode	0 to 255	180

- 3 Press [Start] key to set the setting value.

#### Setting: Mag DC

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
C	Cyan developer magnet roller DC bias setting	0 to 255	118
M	Magenta developer magnet roller DC bias setting	0 to 255	118
Y	Yellow developer magnet roller DC bias setting	0 to 255	118
K	Black developer magnet roller DC bias setting	0 to 255	122
B/W	Developer magnet roller DC bias setting at B/W mode	0 to 255	122

- 3 Press [Start] key to set the setting value.

#### Setting: Mag AC

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
C	Cyan developer magnet roller AC bias setting	0 to 255	229
M	Magenta developer magnet roller AC bias setting	0 to 255	229
Y	Yellow developer magnet roller AC bias setting	0 to 255	229
K	Black developer magnet roller AC bias setting	0 to 255	229
B/W	Developer magnet roller AC bias setting at B/W mode	0 to 255	229

- 3 Press [Start] key to set the setting value.

#### Setting: Sleeve Freq

- 1 Select the item to set.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Normal	Developer (K) sleeve roller frequency (Full speed)	0 to 6200	4000
B/W	Developer sleeve roller frequency at B/W mode	0 to 6200	4000
Half	Developer (K) sleeve roller frequency (Half speed)	0 to 6200	4000
3/4	Developer (K) sleeve roller frequency (3/4 speed)	0 to 6200	4000

- 3 Press [Start] key to set the setting value.

#### Setting: Sleeve Duty

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Normal	Developer (K) sleeve roller duty (Full speed)	1 to 99	43	%
B/W	Developer (K) sleeve roller duty at B/W mode	1 to 99	43	%

- 3 Press [Start] key to set the setting value.

#### Setting: Mag Duty

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Normal	Developer (K) magnet roller duty (Full speed)	1 to 99	68	%
B/W	Developer (K) magnet roller duty (B/W mode)	1 to 99	68	%

- 3 Press [Start] key to set the setting value.

#### Setting: AC Calib

- 1 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Calibration	Executing AC calibration (Developer AC bias setting) Execution timing Setup at high altitude When replacing the developer unit or drum unit When the developer leakage occurs When the solid image density is low after executing the AC calibration
Magnification	Setting the AC calibration target bias value Execution timing When the developer leak occurs after executing the AC calibration

#### Setting: Calibration

- 1 Select the item to set.
- 2 Press [Start] key to start processing.

Items	Contents	Setting range	Default setting value
C	Switch Cyan developer On/Off	0: Off / 1: On	-
M	Switch Magenta developer On/Off	0: Off / 1: On	-
Y	Switch Yellow developer On/Off	0: Off / 1: On	-
K	Switch Black developer On/Off	0: Off / 1: On	-
Type	High altitude grain mode setting	0 to 2	-
Execute	Executing Calibration		

- 3 Select [Execute].
- 4 Press [Start] key. AC calibration is started.
- 5 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

**NOTE**

An error code appears when there is an error.

**Setting: Magnification**

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
C	Set when Cyan developer leakage occurs	-10 to 15	10
M	Set when Magenta developer leakage occurs	-10 to 15	10
Y	Set when Yellow developer leakage occurs	-10 to 15	10
K	Set when Black developer leakage occurs	-10 to 15	10

- 3 Press [Start] key to set the setting value.

**Setting: Image Preference**

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Copy	Set toner density when copying	-1 to 1	0

- 3 Press [Start] key to set the setting value.  
If the set value is reduced, toner consumption decreases.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

**Setting: Altitude Adjustment**

- 1 Select the item to set.

Items	Contents
Normal	Set at 1000m or less
1001 - 2000m	Set at 1001 to 2000m
2001 - 3000m	Set at 2001 to 3000m
3001 / 3500	Set at 3001 to 3500m

3: Normal (0)

Setting range: 0 (0m) to 4 (4000m)

- 2 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U148 Drum refresh mode setting

(Message: Set Drum Refresh Mode)

### Contents

Sets the mode to use the drum refresh in the user adjustment.

### Purpose

Change the setting if the drum refresh is frequently operated.

### Setting

- 1 Press [Start] key.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Mode	Set auto drum refresh	0: Off 1: Short 2: Standard 3: Long	2	-
Dew Condensation	Set dew condensation drum refresh mode*	0: Mode0 1: Mode1 2: Mode2 3: Mode3	0	

\* Increasing the value, the drum refresh time increases.

Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U155 Toner sensor output

### (Message: Toner Sensor Output Value)

#### Contents

Displays the toner sensor output

#### Purpose

Execute to check output value when an image failure occurs.

#### Method

- 1 Press [Start] key.
- 2 Select the item to display.  
Switch to each reference screen.

Items	Contents
Waste toner	Display the waste toner sensor value
Toner	Display the toner sensor value and supply level value

#### Method: Waste toner

- 1 Display the waste toner sensor value

Items	Contents	Setting range
Full	Display the waste toner sensor value 1	0 to 1
Near Full	Display the waste toner sensor value 2	0 to 1

#### Method: Toner

- 1 Display the toner sensor value.

Items	Contents	Setting range
Sensor (C)	Display the difference between Cyan toner sensor output value and target value	0 to 1023
Sensor (M)	Display the difference between Magenta toner sensor output value and target value	0 to 1023
Sensor (Y)	Display the difference between Yellow toner sensor output value and target value	0 to 1023
Sensor (K)	Display the difference between Black toner sensor output value and target value	0 to 1023
Supply (C)	Display Cyan toner supply level	0 to 1023
Supply (M)	Display Magenta toner supply level	0 to 1023
Supply (Y)	Display Yellow toner supply level	0 to 1023
Supply (K)	Display Black toner supply level	0 to 1023

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U156 Toner control level adjustment

(Message: Adjust Toner Control Level)

### Contents

Display/adjust toner empty level

### Purpose

Execute Displaying/adjusting toner empty level

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Supply	Display toner supply level
Empty	Display toner empty level

### Display toner supply level

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
C	Display Cyan toner supply level*	0 to 900	512
M	Display Magenta toner supply level*	0 to 900	512
Y	Display Yellow toner supply level*	0 to 900	512
K	Display Black toner supply level*	0 to 900	512
B/W	Display toner supply level at B/W mode*	0 to 900	512

\* Increasing the setting value makes the image lighter, and decreasing makes it darker.

- 2 Press [Start] key to set the setting value.

### Display toner empty level

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
C	Display Cyan toner empty level	To 1023	100
M	Display Magenta toner empty level*	To 1023	100
Y	Display Yellow toner empty level*	To 1023	100
K	Display Black toner empty level*	To 1023	100
B/W	Display toner empty level at B/W mode*	To 1023	100

When the setting value is increased, the toner empty gets later, when the setting value is decreased, the toner empty gets sooner.

- 2 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U157 Developer drive time

(Message: Developing Unit Drive Time)

### Contents

Displays the developer drive time to be a reference for the toner density control correction.

### Purpose

Execute to check the developer drive time since replacing the developer unit.

### Method

- 1 Press [Start] key.

Displays the developer drive time.

Items	Contents
C	Display Cyan developer unit drive time.
M	Display Magenta developer unit drive time
Y	Display Yellow developer unit drive time
K	Display Black developer unit drive time

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U158 Developer counter

(Message: Developing Unit Counter)

### Contents

Display the developer counter.

### Purpose

Execute to check the developer unit usage status.

### Method

- 1 Press [Start] key.

The developer counter is displayed.

Items	Contents
C	Display Cyan developer counter
M	Display Magenta developer counter
Y	Display Yellow developer counter
K	Display Black developer counter

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U159 Set Toner container function setting

### (Message: Set Toner Container Function)

#### Contents

Set the toner cover lock and display the lock release operation.

#### Purpose

.Set when changing the toner cover lock setting and displaying the lock release operation

\* In case if the container cover should always be released from the lock condition, disable the lock condition.

#### Method

1 Press [Start] key.

2 Select the item to set.

Switch to each reference screen.

Items	Contents
Container Lock	Container lock setting
Container Unlock Display	Setting to display the toner container lock release operation

#### Setting: Container Lock

1 Select the item to set.

Items	Contents
Off	Disable the lock
Low	Enable the lock: Set the release timing to Toner Low
Empty	Enable the lock: Set the release timing to Toner Empty

\* Initial setting: Empty

2 Press [Start] key to set the setting value.

#### Setting: Container Unlock

1 Select the item to set.

Items	Contents
On	The lock/unlock selection is displayed at [Adjustment/Maintenance] in System Menu
Off	The lock/unlock selection is not displayed at [Adjustment/Maintenance] in System Menu

\*Initial setting:

100V model: Off

120V model: On

220V-240V model: On

2 Press [Start] key to set the setting value.

#### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U161 Fuser temperature adjustment

(Message: Adjust Fuser Control Temperature)

### Contents

Set the fuser control temperature

### Purpose

Normally, no need to change the basic settings. However, change the setting as corrective measures for paper curl, creases and fusing failure on thick paper.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Warm Up	Control temperature except at printing
Print	Control temperature at printing
Low Power Mode	Heating power suppression control setting
Grain Mode	Control for the impalpable unevenness in glossiness
Belt Mode	Fuser drive control setting
Ready Time Adjust	Setting the low-temperature aging temperature

### Setting: Warm Up

- 1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Ready(Center)	Control temperature at displaying Ready (Center)	130 to 200	1°C
Ready(Edge)	Control temperature at displaying Ready (Edge)	100 to 200	1°C
Ready(Press)	Control temperature at displaying Ready (Press)	0 to 200	1°C
Drive(Center)	Stable temperature during driving (Center)	130 to 200	1°C
Wait(Center)	Stable temperature during halt (Center)	130 to 200	1°C
Low Power (Press)	Control temperature at low power (Press)	0 to 200	1°C
Full Speed Shift (Center)	Full speed shift temperature (Center)	0 to 200	1°C
Pressure (Press)	Pressurization beginning temperature (Press)	0 to 200	1°C

### Default setting value

100V

Items	83/70ppm	73/65ppm
Ready(Center)	135	135
Ready(Edge)	90	90
Ready(Press)	40	40
Drive(Center)	150	150
Wait(Center)	150	150
Low Power (Press)	100	100
Full Speed Shift (Center)	50	50
Pressure (Press)	100	100

120V/220-240V

Items	83/70ppm	73/65ppm
Ready(Center)	145	145
Ready(Edge)	100	100
Ready(Press)	40	40
Drive(Center)	160	160
Wait(Center)	160	160
Low Power (Press)	100	100
Full Speed Shift (Center)	50	50
Pressure (Press)	100	100

3 Press [Start] key to set the setting value.

### Setting: Print

1 Select the item to set.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range
Full Speed Print(Center)	Temperature during printing at full speed (Center)	130 to 200
Duplex Shift(Center)	Shift temperature during duplex printing at full speed (Center)	-20 to 20

#### Default setting value

100V

Items	83/70ppm	73/65ppm
Full Speed Print (Center)	150	150
Duplex Shift(Center)	0	0

120V/220-240V

Items	83/70ppm	73/65ppm
Full Speed Print (Center)	160	160
Duplex Shift(Center)	0	0

- 3 Press [Start] key to set the setting value.

#### Setting: Low Power Mode

- 1 Select the item to set.

Items	Contents	Setting range	Data variation
Mode0	Current level (No special control is performed)	0 to 2	1
Mode1	Fuser control temperature step lowering mode	0 to 2	1
Mode2	Productivity decreasing mode	0 to 2	1

Initial setting: Mode 0

- 2 Press [Start] key to set the setting value.

#### Setting: Grain Mode

- 1 Select the item to set.

Items	Contents	Setting range	Data variation
Mode 0	Current level (No special control is performed)	0 to 2	1
Mode1	Improve granular image	0 to 2	1
Mode2	Further improvement other than Mode 1	0 to 2	1

Initial setting: Mode0

- 2 Press [Start] key to set the setting value.

#### Setting: Belt Mode

- 1 Select the item to set.

Items	Contents
ON	On setting
OFF	Off setting

Initial setting: On



- 2 Press [Start] key to set the setting value.

**Setting: Ready Time Adjust**

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Value	Activating temperature correction value of the low temperature aging ( $\alpha$ )	0 to 5	2	1

- 2 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U164 Fuser unit history

(Message: Fuser Unit History)

### Contents

Display the machine serial number and the fuser unit history.

### Purpose

Execute to check the machine serial number and the fuser unit counter values.

### Method

- 1 Press [Start] key.

Display the machine serial number and 3 cases of the fuser unit history.

Items	Contents
Machine History1 to 3	Machine serial number history
Cnt History1 to 3	Fuser unit history

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U165 Fuser unit number

(Message: Fuser Unit Number)

### Contents

Display the fuser unit number.

### Purpose

Execute to check the fuser unit number.

### Method

- 1 Press [Start] key.  
Displays the fuser unit number.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U167 Clearing the fuser count

(Message: Clear Fuser Counter)

### Contents

Display and clear the fuser count, fuser discharge needle bias correction counter.

### Purpose

Execute to check the fuser counter value. Also, clear the bias correction counts after replacing IH unit, fuser discharge needle unit.

### Method

- 1 Press [Start] key.

The fuser unit counter value is displayed.

Items	Contents
Cnt	Display the fuser unit counter value
Release(Time)	Display the fuser unit drive time counter value (release)
Press(Time)	Display the fuser unit drive time counter value (press)
Correction	Display and change the fuser discharge needle bias correction counter value
Clear	Clear the fuser discharge needle bias correction counter value Clear the counter after replacing the fuser discharge needle unit

### Setting: Correction

- 1 Select [Correction].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.
- 3 Press [Start] key to set the setting value.

### Method: Clear

- 1 Select [Clear].
- 2 Press [Start] key.

Corrected fuser counter value is cleared.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U169 Setting the fuser power source

(Message: Set Fuser Power Source)

### Contents

Display/set the IH PWB control voltage specification

### Purpose

Execute to check the control voltage specification

When U021 is executed, set to the same voltage specification as the IH PWB.

### Setting

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Set Fuser	Set the Fuser unit destination
CT Mode	Current sensor mode setting

3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Mode	Set the fuser unit destination	1: 100V specification 2: 200V specification 3: 120V specification 4: 110V specification	- (Destination)

4 Press [Start] key to set the setting value.

### Setting

1 Select the item to set.

The screen for setting is displayed.

Items	Contents
On	Current sensor mode setting: On
Off	Current sensor mode setting: Off

2 Press [Start] key to set the setting value.

Initial setting: On

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U193 Fuser drive control setting

(Message: Set Fuser Drive Control)

### Contents

Display and set bias value for fuser belt charging needle.

### Purpose

Check or set bias current value for fuser belt surface as corrective measure for fuser static offset that comes from over charge on fuser belt.

### IMPORTANT

Increasing the value reduce sticking toner on the fuser belt, but pay attention that too much change gets the charging needle to stick organic substance and it makes the static offset. In case that this adjustment does not work, replace the fuser discharge unit and clear the count with U167.

### Setting

- 1 Press [Start] key.

Items	Contents
Bias	Display and set bias value for fuser belt charging needle

- 2 Press [Start] key.

Items	Contents	Setting range	Data variation
B/W	B/W (High speed)	0 to 200	-
Color	Color (Full speed)	0 to 200	-
3/4	3/4 speed	0 to 200	-
Half	Half speed	0 to 200	-

### Default setting value

Items	83/70ppm	73/65ppm
B/W	35	35
Color	35	35
3/4	35	35
Half	35	35

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U199 Fuser temperature

(Message: Fuser Temperature)

### Contents

Display the fuser temperature.

### Purpose

Execute to check the fuser temperature.

### Method

- 1 Press [Start] key.

Fuser temperature is displayed.

Items	Contents
Heat Roller Edge1	Display the edge section 1 temperature (°C) of the fuser belt
Heat Roller Edge 2	Display the edge section 2 temperature (°C) of the fuser belt
Heat Roller Center	Display the center temperature (°C) of the fuser belt
Press Roller Center	Display the center temperature (°C) of the fuser pressure roller

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U200 All LEDs lighting

(Message: Turn ON All Panel LEDs)

### Contents

Light all the LED on the operation panel

### Purpose

Execute to check the operation panel LED lighting.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].
- 3 Press [Start] key.
- 4 Blink all the LEDs on the operation panel.
- 5 Press [Stop] key to turn the display off.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U201 Initializing the touch panel

(Message: Initialize Touch Panel)

### Contents

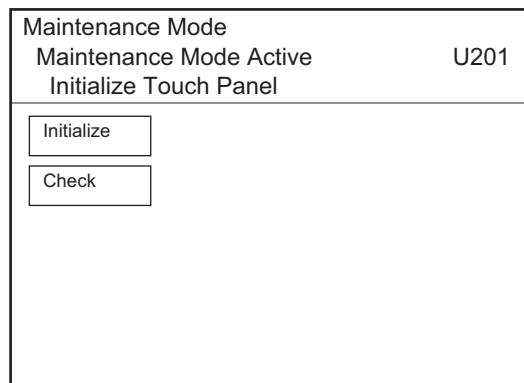
Adjusts touch panel detecting positions.

### Purpose

Correct and confirm the touch panel detecting positions, when the panel PWB or the operation panel is replaced or if the detecting positions are not aligned.

### NOTE

When it is not possible to press the soft keypad and not possible to enter in the maintenance mode as the touch panel positioning adjustment is not aligned, U201 is started up with three operation panel keys ([Home] + [Stop] + [Reset]) press continuing three seconds.

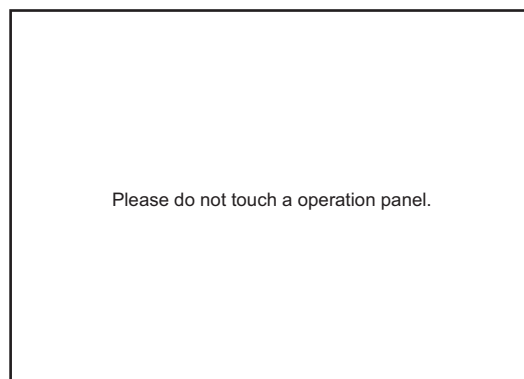


### Method

- 1 Press [Start] key.
- 2 Select the item to execute.
- 3 Press [Start] key.  
Switch to selection screen.

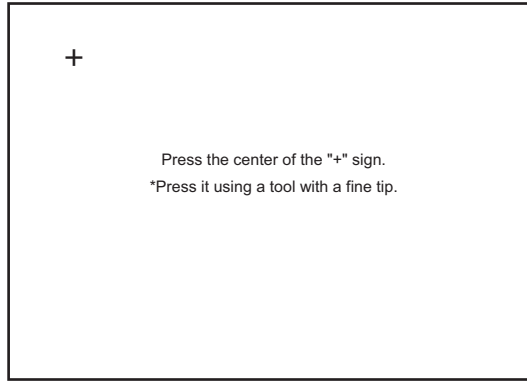
Items	Contents
Initialize	Automatically corrects the touch panel display position
Check	Checks the touch panel display position

### Method: Initialize

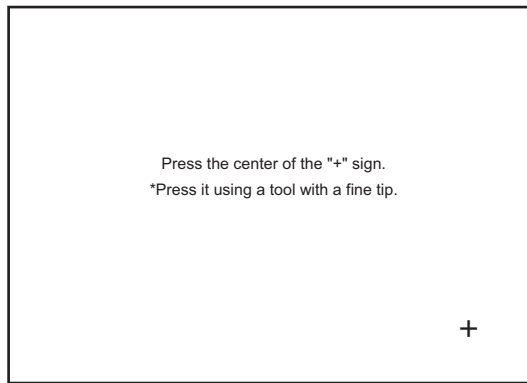


Do not touch the touch panel.

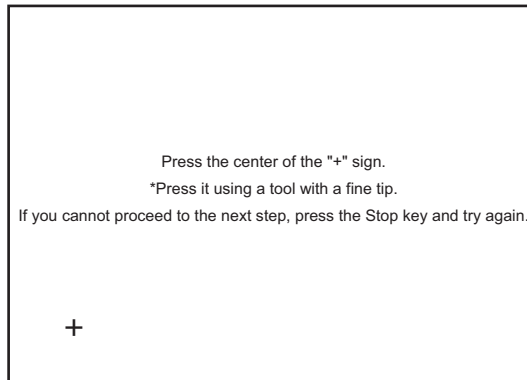
- 1 Press the center of [+] that appears on screen.



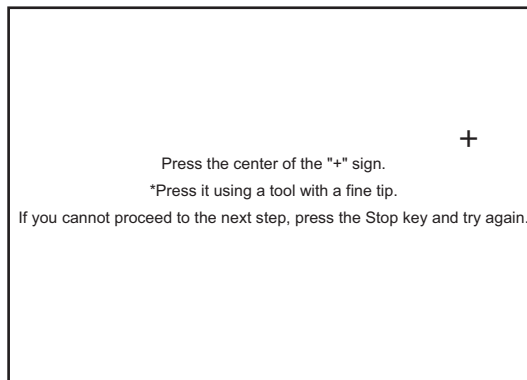
- 2 Press the center of [+] that appears on screen.



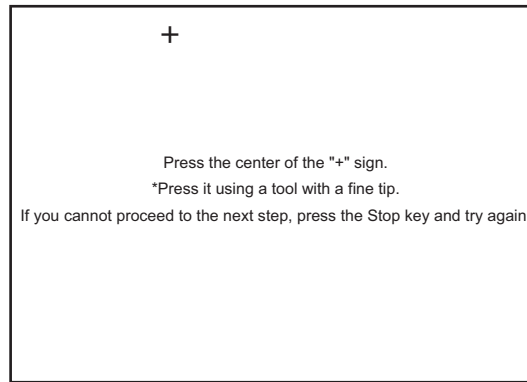
- 3 Press the center of [+] that appears on screen.



- 4 Press the center of [+] that appears on screen.



- 5 Press the center of [+] that appears on screen.



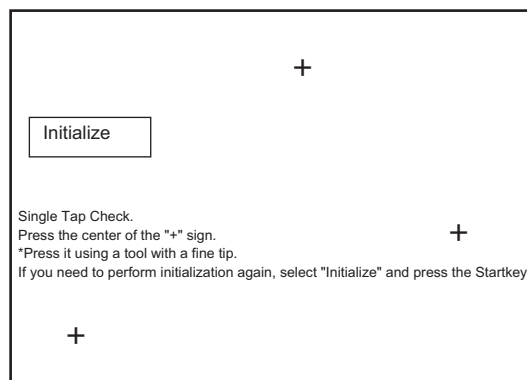
- 6 After completing the setting, display [Initialize Completed.] and touch panel is corrected automatically.  
7 After the correction, [Check] screen is automatically displayed.



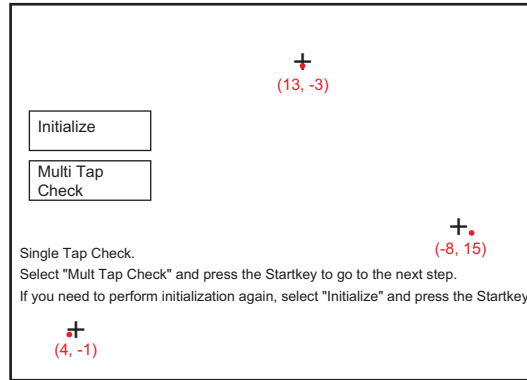
### Method: Check

#### Single Tap Check

- 1 Press the center of indicated three [+], and then check the display position.



- 2 Check if the misalignment of each X and Y axis of the coordinate displayed is within 6.

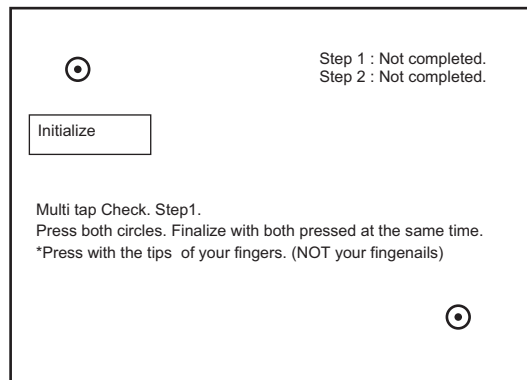


## NOTE

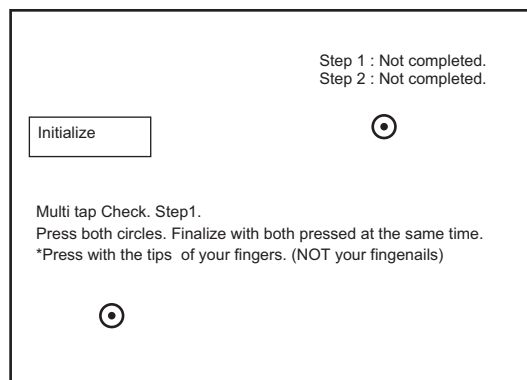
If the setting value is misaligned, select [Initialize] and press [Start] key to back to Step.1.

### Multi Tap Check

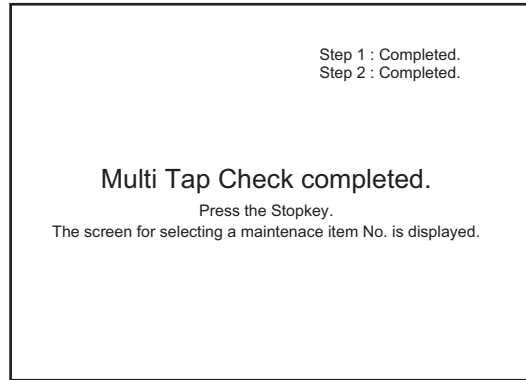
- 1 Select [Multi Tap Check] and press [Start] key.
- 2 Press 2 points [ ] of at the same time. (Step1)  
Display the detected point with a red dot if it is out of the default value.  
If out of the specified value, select [Initialize] and press [Start] key to back to Step.1.



- 3 Press 2 points [ ] of at the same time. (Step2)  
[Completed] appears in Step1 and Step2 if it is within the default value.



- 4 [Multi Tap Check completed.] appears when the setting is complete.



### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U203 Check DP operation

(Message: Check DP Operation)

### Contents

Simulate the original conveying operation separately in the DP.

### Purpose

Execute to check the DP operation.

### Method

- 1 Press [Start] key.
- 2 Place an original on DP in case of running this mode with paper.
- 3 Select the scan speed to operate.

Items	Contents
Normal Speed	Normal scanning (600dpi)
High Speed	High speed scanning
Mode	Set inspection mode for conveying timing
Reset	Reset inspection data for conveying timing
Result	Check the conveying timing

### Method: Normal Speed/High Speed

- 1 Select the item to operate.

Items	Contents
CCD ADP	With paper, a single-sided original is fed to the CCD
CCD RADP*1	With paper, a double-sided original is fed to the CCD
CIS*2	With paper, a double-sided original is fed to the CIS
CCD ADP(Non-P)	Without paper, a single-sided original is fed to the CCD (continuous operation)
CCD RADP(Non-P)*1	Without paper, a double-sided original is fed to the CCD (continuous operation)
CIS(Non-P)*2	Without paper, a double-sided original is fed to the CIS (continuous operation)

\*1: DP-7100/ DP-7120 only, \*2: DP-7110/ DP-7130 only

- 2 Press [Start] key.  
The operation starts.
- 3 Press [Stop] key to quit operation.

### Setting: Mode

- 1 Select the item to set.

Items	Contents
On	Set the conveying timing inspection mode to On
Off	Set the conveying timing inspection mode to Off

Default setting: Off

- 2 Press [Start] key to set the setting value.

### Method: Reset

- 1 Select [Execute].
- 2 Press [Start] key to reset.

**Method: Result**

- 1 Select [Result].  
Displays the conveying timing data.

Items	Contents
Check Point 01 to 09	Conveying timing data

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U204 Key card/key counter setting

(Message: Set Key-Card/Key-Counter)

### Contents

Sets the optional key card or key counter connection.

### Purpose

Execute when installing the key card or key counter.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Device	Sets the key card/key counter connection
Message*	Sets the message indicated when the device is not installed

\*: Displays in case of U206 On/Off Config is On

### Setting: Device

1 Select the type of the optional counter.

Items	Contents
Key-Card	Key card installation
Key-Counter	key counter connection
Parallel Coin Vendor*	Parallel Coin Vendor installation
Off	Not installed

\*: Displays in case of U206 On/Off Config is Off

\*: No display in case that designate cassette for FAX is set by system menu.

Default setting: Off

2 Press [Start] key to set the setting value.

3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Setting: Message

1 Select the item to set.

Items	Contents
Key Device	Prioritized display of the key device on the login screen when multiple devices are used
Coin Vendor	Prioritized display of the coin vendor on the login screen when multiple devices are used

Initial setting: Coin Vendor

2 Press [Start] key to set the setting value.

3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.



## U206 Set the coin vendor

(Message: Set Coin vendor Mode)

### Contents

Sets the optional Coin Vendor connection.

Also, sets the details such as the operation mode and unit price when the coin vendor is installed. (Support the Japanese specification only)

### Purpose

Execute when a coin vendor is installed.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
On/Off Config *	Set if the coin vendor is installed
No Coin Action	Set behavior when change runs out during copying
Price	Charge per copy by size and color
Boot Mode	Set activation mode
Apl Charge Mode	Set extended charge unit

\*: Not displayed when selecting Parallel Coin Vendor in U204.

\*: No display in case that designate cassette for FAX is set by system menu.

### Setting: On/Off Config

- 1 Select the item to set.

Items	Contents
On	The coin vendor is installed
Off	The coin vendor is not installed

Default setting: Off

- 2 Press [Start] key to set the setting value.
- 3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Setting: No Coin Action

- 1 Select the item to set.

Items	Contents
All Clear	All clear at coin shortage when printing
Auto Clear	Auto clear at coin shortage when printing
Off	Do nothing at coin shortage when printing

Default setting: Off

- 2 Press [Start] key to set the setting value.

### Setting: Price

- 1 Select the item to set.

Items	Contents
Normal	Charge setting: Normal
AD	Charge setting: Commercial
Print	Charge setting: print
Apl*	Charge setting: Extended

\*: Display only if Apl Charge Mode is On

### Setting: Normal/AD

- 1 Select the item to set.

Items	Contents
B/W	Black and White
CMY	Single color C, M, Y
RGB	Single color R, G B
Full Color Copy	Full color

- 2 Change the setting value of the unit price by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	
			BW	CMY/RGB/ Full Color
A3-Ledger	A3/Ledger size	0 to 300	10	100
B4	B4 size	0 to 300	10	50
Card	Hagaki	0 to 300	10	30
Other	Others	0 to 300	10	50

Settable in 10-yen increments

Value of 0 allows non-restricted copying. (At a periodic maintenance, etc.)

- 3 Press [Start] key to set the setting value.

### Setting: Print

- 1 Select the item to set.

Items	Contents
B/W	Black and White
Full Color	Full color

- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	
			BW	Full Color
A3-Ledger	A3/Ledger size	0 to 300	10	100
B4	B4 size	0 to 300	10	50
Card	Hagaki	0 to 300	10	30
Other	Others	0 to 300	10	50

Settable in 10-yen increments

Value of 0 allows non-restricted copying. (At a periodic maintenance, etc.)

- 4 Press [Start] key to set the setting value.

#### Setting: Apl

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Apl1	Expanded charging unit 1	0 to 300	10
Apl2	Expanded charging unit 2	0 to 300	10
Apl3	Expanded charging unit 3	0 to 300	10
Apl4	Expanded charging unit 4	0 to 300	10
Apl5	Expanded charging unit 5	0 to 300	10

- 3 Press [Start] key to set the setting value.

#### Setting: Boot Mode

- 1 Select the item to set.

Items	Contents
Normal	Assign activation to normal mode
Copy Service	Assign activation to copy service display

Initial setting: Copy Service

- 2 Press [Start] key to set the setting value.
- 3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

#### Setting: Apl Charge Mode

- 1 Select the item to set.

Items	Contents
On	The extended charge unit is used
Off	The extended charge unit is not used

Default setting: Off

- 2 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U207 Operation key check

(Message: Check Panel Key Operation)

### Contents

Check the operation panel keys.

### Purpose

Check the operation of all the keys and LEDs on the operation panel.

### Method

- 1 Press [Start] key to start processing.
- 2 [Count 0] appears and the LED at the most left column in the operation panel is turned on.
- 3 Pressing the keys in order from the top at the row where the LED is lit, count increases one by one. When pressing all the keys at the row and there is an LED at the next right side row, the LED is lit.  
The job separator LED is lit during execution and turns off when completing.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U208 Setting the paper size for the side feeder

(Message: Set Deck Paper Size)

### Contents

Set the size of paper used in Side Paper Feeder

### Purpose

To change the setting when installing the side paper feeder or the size of paper used in the side paper feeder is changed.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Cassette5*	Setting the paper size for Cassette5

### Setting

- 1 Select the item to set.

Items	Contents
A4	Paper size of the side paper feeder: A4
B5	Paper size of the side paper feeder: B5
Letter	Paper size of the side paper feeder: Letter

Initial setting: Letter (Inch specifications), A4 (Other specifications)

- 2 Press [Start] key to set the setting value.
- 3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U221 USB host lock function setting

(Message: Set USB Host Lock Function)

### Contents

Set ON/OFF of the USB Host lock function. When setting it to on, the device connected to the USB host is not recognized.

### Purpose

Change the setting according to the user's request

### Method

1 Press [Start] key.

2 Select [Host Lock].

The screen for setting is displayed.

Items	Contents
Host Lock	Turns the USB Host lock function on/off

3 Select the item to set.

Items	Contents
On	The USB Host lock function is available
Off	The USB Host lock function is not available

Default setting: Off

4 Press [Start] key to set the setting value.

5 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U222 Setting the IC card type

(Message: Set IC Card Type)

### Contents

Set the ID card type

### Purpose

Change the type of ID card

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Other	Select when the ID card type is other than SSFC
SSFC	Select when the ID card type is SSFC

Initial setting: Other

SSFC: Shared Security Formats Cooperation

- 3 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U223 Operation panel lock

(Message: Set Panel Operation Lock)

### Contents

Execute setting the operation panel function.

### Purpose

Execute to prohibit the system menu and job cancel operations from the operation panel by the users other than those with administrator privileges.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Unlock	Unlock System Menu operation
Partial Lock 1	Lock System Menu operation and Input/Output setting
Partial Lock 2	Lock System Menu operation, Input/Output setting and Job execution setting
Partial Lock 3	Lock System Menu operation, Input/Output setting, Job execution setting and Paper settings
Lock	Lock System Menu operation and Job Cancel operation

Initial setting: Unlock

- 1 Press [Start] key to set the setting value.

Items	Partial Lock 1	Partial Lock 2	Partial Lock 3	Lock
Entering the maintenance mode	Permission	Permission	Permission	Permission
Switching to System Menu	Permission	Permission	Prohibition	Prohibition
Send, Send from Document Box	Permission	Permission	Permission	Permission
Switching to Address book for registration/edition	Permission	Prohibition	Prohibition	Prohibition
Switching to Document Box for registration/edition	Prohibition	Prohibition	Prohibition	Prohibition
Press [Stop] key	Permission	Permission	Permission	Prohibition
Press [Status/Job Cancel] key	Permission	Permission	Permission	Prohibition
Disconnect the FAX line	Permission	Permission	Permission	Prohibition

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U224 Setting Original Panel Display

(Message: Install Original Panel Display)

### Contents

Changes the image data and the message of the opening screen at the machine startup and the image data and the message of the service call screen to user specified data.

### Purpose

Change the setting according to the user's request

### Setting

- 1 Write the image data or the message data to USB drive.
- 2 Insert USB drive into the USB drive slot in main unit.
- 3 Turn the power switch On.
- 4 Press [Start] key.
- 5 Select the item to set.

Items	Contents
Install	Installs the image data or the message data
UnInstall	Restores the original image data or message data

- 6 Select the item to set.

Items	Partial Lock 1	Lock
Opening Img	Startup screen	Entire start display
Call Img	Service call screen	Graphic display area
Home Menu Img	Home Menu background	Home Menu display area
Call Msg top	Service call message 1	Message display area (top)
Call Msg Detail	Service call message 2	Message display area (descriptive area)

- 7 Press [Start] key.  
Installation or uninstallation is started.

8 [OK] is displayed when complete properly

#### Supplement 1: File information

Description	File Name	Image size (Pixels)	File format
Startup screen	opening_ext_image.png	Length: 480 Width: 800	PNG
Service call screen	callwin_ext_image.png	Length: 200 Width: 180	PNG
Home Menu screen Background screen	menu_background.png	Length: 480 Width: 800	PNG
Service call Message 1	callwin_ext_mes_top.txt	-	TEXT (Unicode)
Service call Message 2	callwin_ext_mes_detail.txt	-	TEXT (Unicode)



#### NOTE

Supplement 2: Displaying Startup screen

The pre-installed graphics file is displayed at power on or recovering from sleeping.

Display graphic on service call screen

The pre-installed graphics file is displayed at a service call.

How to change the message

Entering #562 (4 letters) using the numeric keypad during a service call display will let service call messages 1 and 2.

How to reset the message display

When shifting the maintenance mode, it will be back to the message before changing.



#### IMPORTANT

As the image file of startup screen can be seen to overlap with the back one at a sleep recovery, execute an opaque treatment.

UP to 4 MB in total size can be installed.

#### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U230 Optional device serial number

(Message: Optional Device Serial No)

### Contents

Display the optional device serial number

### Purpose

Specify the production lot from the serial number to make it help of investigation at problem occurrence.

### Method

- 1 Press [Start] key.

Display the serial number.

Items	Contents
Finisher	Display the Finisher serial number
Booklet	Displays the Booklet Folder serial number
PF2	Displays the Paper Feeder 2 serial number
PF3	Displays the Paper Feeder 3 serial number

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U234 Setting destination for punch

(Message: Set Punch Destination)

### Contents

Set destination of the punch unit for the finisher.

### Purpose

Execute when installing the punch unit for the destination different from the main unit.

### Setting

- 1 Press [Start] key.
- 2 Select [Destination].

Items	Contents
Auto	Match the destination setting
Japan Metric	Japan Metric
Inch	North American inch specification
Europe Metric	European metric

- 3 Press [Start] key to set the setting value.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U237 Finisher eject volume limit

(Message: Set Finisher Paper Stack Limit)

### Contents

Set the stacking count of the main tray and middle tray.

### Purpose

Execute when stacking failure occurs.

### Method

- 1 Press [Start] key.
- 2 Select [Main Tray] or [Middle Tray].
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
Main Tray	Set the main tray stack capacity	0 to 1	0
Middle tray	Set the middle tray stack capacity	0 to 1	0

- 4 Press [Start] key to set the setting value.
- 5 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Main tray

Input value	4000-sheet Finisher (DF-9100)	DF-7130 "100 sheet staple finisher"	1000-sheet Finisher
0	4000 sheets	4000 sheets	1000 sheets
1	2000 sheets	2000 sheets	500 sheets

### Middle tray

Input value	4000-sheet Finisher	DF-7130 "100 sheet staple finisher"	1000-sheet Finisher
0	65 sheets	100 sheets	50 sheets
1	30 sheets	50 sheets	30 sheets

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U240 Finisher operation check

(Message: Check Finisher Operation)

### Contents

Turn the finisher's motors and solenoids on.

### Purpose

Execute for the finisher's motors and solenoids operation check.

### Method

- 1 Press [Start] key.
- 2 Select the item to operate.  
The screen for setting is displayed.

Items	Contents
Motor	Finisher motor operation check
Solenoid	Finisher solenoid operation check
Mail Box	Mail Box motor operation check
Booklet	Booklet operation check

### Method: Motor

- 1 Select the item to operate.

## 2 Press [Start] key.

The operation starts.

Items	Contents
Feed In(H)	Drive the DF paper entry motor at a high speed
Feed In(L)	Drive the DF paper entry motor at a low speed
Middle(H)	Drive the DF middle motor at a high speed
Middle(L)	Drive the DF middle motor at a low speed
Eject(H)	Drive the DF eject motor at a high speed
Eject(L)	Drive the DF eject motor at a low speed
Save(H) *1	Drive the DF save drum motor at a high speed
Save(L) *1	Drive the DF save drum motor at a low speed
Tray	Drive the DF tray motor Operation pattern: After descending to the lower limit, ascends and descends again when passing 1s after detecting the middle sensor off. Ascends again when detecting the middle sensor on and stops at the upper limit
Staple Move	Drive the DF slide motor
Staple	Drive the DF staple motor
Width Test(A3)	Drive the DF side registration motor 1, 2
Width Test(LD)	Drive the DF side registration motor 1, 2
Beat	Drive the DF paddle motor
Eject Unlock(HP)	Drive the DF eject release motor at a home position
Sort Test *1	Execute the DF shift operation
Eject Unlock(30)	Drive the DF eject release motor at the 30-sheet bundle position
Eject Unlock(50)	Drive the DF eject release motor at the 50-sheet bundle position
Eject Unlock(Fix)	Drive the DF eject release motor at the fixed position
Eject Unlock(Full)	Drive the DF eject release motor at the full open position
Punch	Drive the punch motor
Punch Move *2	Drive the punch slide motor
Eject Conv(H)	Drive the DF drum motor at high speed
Eject Conv(L)	Drive the DF drum motor at low speed
Cooling Fan *1	Drive exit fan motor
Eject Up Pull	DF upper exit motor (draw-in)
Eject Down Pull	DF lower exit motor (draw-in)
Eject Up Feed	DF upper exit motor (conveying)
Eject Down Feed*3	Drive lower exit motor
B Tray Eject(H)*3	Drive the DF tray exit motor at high speed
B Tray Eject(L)*3	Drive the DF tray exit motor at low speed
Tray Down*3	Descend Main Tray motor
Tray Width Init*3	Process tray width alignment initial operation



Items	Contents
Tray Cursor Init*3	Main Tray cursor initial operation
Pull Pressure*3	Drive the draw-in pressure motor
Match Pressure*3	Drive the DF match release motor
Match Coro*3	Drive the DF match pulley motor
Eject Guide*3	Drive the DF ejection support guide
Tray Eject Paddle*3	Drive the exit paddle
Press Paper*3	Drive paper hold
Bundle Eject*3	Bundle ejection operation
Bundle Up*3	Drive the bundle eject motor
Staple(NoSt)*3	Drive the staple motor (No staples)

\*1: Only for 4000 sheets DF, \*2: Except Inner DF, \*3: Only for 100 sheets staple

Press [Stop] key to quit operation.

#### Method: Solenoid

- 1 Select the item to operate.
- 2 Press [Start] key.  
The operation starts.

Items	Contents
Sub Tray *1	Turn the DF feed-shift solenoid 1 on
Save Drum *1	Turn the DF feed-shift solenoid 2 on
Booklet *1	Turn the DF feed-shift solenoid 3 on
Punch	Turn the PH solenoid on
Three Fold *1	Turn the BF feed-shift solenoid on
Eject Guide(REM)*3	Turn the eject switch solenoid REM on
Eject Guide(RET)*3	Turn the eject switch solenoid RET on

\*1: Only for 4000 sheets DF, \*2: Except Inner DF, \*3: Only for 100 sheets staple

Press [Stop] key to quit operation.

#### Method: Mail Box

- 1 Select the item to operate.
- 2 Press [Start] key.  
The operation starts.

Items	Contents
Conv	Drive the MB drive motor to convey paper
Branch	Drive the MB drive motor for feed-shift

Press [Stop] key to quit operation.

#### Method: Booklet

- 1 Select the item to operate.

## 2 Press [Start] key.

The operation starts.

Items	Contents
Folding	Drive the BF main motor
Blade	Drive the BF blade motor
Bundle Up	Drive the BF adjuster motor 2
Bundle Down	Drive the BF adjuster motor 1
Staple	Drive the DF staple motor
Width Test(A3)	Execute the side registration test (A3)
Width Test(LD)	Execute the side registration test (LD)
Feed In	Drive conveying motor
Paddle*1	Drive the paddle motor
Feed Tray*1	Drive the conveying tray motor
EjectPressUnlock*1	Drive exit pressure release motor
Feed Fan*1	Drive conveying fan

100 sheets staple only

Press [Stop] key to quit operation.

**Completion**

## 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U241 Finisher switch check

(Message: Check Finisher Switches)

### Contents

Display the status of finisher's switches and sensors operation.

### Purpose

Execute for the finisher's switches and sensors operation check.

### Method

- 1 Press [Start] key.
- 2 Select the item to operate.  
The screen for setting is displayed.

Items	Contents
Finisher	Check the finisher switch and sensor operation
Mail Box	Check the mail Box switch and sensor operation
Booklet	Check the booklet switch and sensor operation
Punch	Check the punch unit switch and sensor operation

**Method: Finisher**

1 Check the switches and sensors by manually turning them on/off.

The switch indication is inverted when the switch is detected

Items	Contents
Front Cover	DF front cover sensor
Eject Cover	DF eject cover sensor
Tray U-Limit *3	DF tray sensor 1
Tray HP2 *1	DF tray sensor 2
Tray Middle *3	DF tray sensor 3
Tray L-Limit	DF tray sensor 4
Tray L-Limit(BL) *1	DF tray sensor 5
Tray top *3	DF tray upper side sensor
HP	DF paper entry sensor
Sub Tray Eject *1	DF sub tray exit sensor
Middle Tray Eject *3	DF middle exit sensor
Drum *1	DF drum sensor
Staple HP	DF slide sensor
Middle Tray	DF bundle exit sensor
Width Front HP	DF width adjustment 1
Width Tail HP	DF width adjustment 2
Bundle Eject HP	DF bundle exit sensor
Match Paddle	DF adjustment sensor
Lead Paddle	DF paddle sensor
Shift Front HP *1	DF shift sensor 1
Shift Tail HP *1	DF shift sensor 2
Shift Unlock HP *1	DF shift release sensor
Sub Tray Full *1	DF sub tray full sensor
Shift Set *1	DF shift set sensor
Middle*5	Middle sensor
Paper Guide HP*5	Paper support guide HP sensor
Rear Beat HP*5	DF trail press HP sensor
Eject Paddle HP*5	DF paper exit paddle HP sensor
Press Paper HP*5	Paper press HP sensor
Match Coro HP*5	DF match pulley pressure release HP sensor
Pull Coro HP*5	DF draw-in pulley pressure release HP sensor
Eject Press HP*5	Exit pressure release HP sensor
Bundle Eject HP1*5	Bundle exit HP sensor 1
Bundle Eject HP2*5	Bundle exit HP sensor 2
Eject*5	Exit sensor

Items	Contents
Staple Tank*5	Staple waste tank sensor
Staple Tank Full*5	Staple waste tank full sensor
Feed In Timing*5	Entry timing sensor
Drum Timing*5	Drum timing sensor

\*1: Only for 4000 sheets DF, \*2: Only for 1000 sheet DF, \*3: Except inner DF, \*4: Only for inner DF, \*5: Only for 100 sheets staple

#### Method: Mail Box

- 1 Check the switches and sensors by manually turning them on/off.

The switch indication is inverted when the switch is detected.

Items	Contents
Eject	MT tray exit sensor
Cover	MT cover open close switch
Over Flow1	MT tray sensor 1
Over Flow2	MT tray sensor 2
Over Flow3	MT tray sensor 3
Over Flow4	MT tray sensor 4
Over Flow5	MT tray sensor 5
Over Flow6	MT tray sensor 6
Over Flow7	MT tray sensor 7
Motor HP	MT home position switch

#### Method: Booklet

- 1 Check the switches and sensors by manually turning them on/off.

The switch indication is inverted when the switch is detected.

Items	Contents
HP	BF paper entry sensor
Eject	BF exit sensor
Paper	BF paper sensor
Tray Full	BF tray full sensor
Bundle Up HP	BF adjustment sensor 2
Bundle Down HP	BF adjustment sensor 1
Width Up HP	BF side registration sensor 1
Width Down HP	BF side registration sensor 2
Blade HP	BF blade sensor
Tray	BF tray open/close detection switch
Set	BF shift set sensor
left Guide	BF Left cover sensor
Vertical Feed	Vertical feed sensor

Items	Contents
Paddle HP*1	Paddle HP sensor
Eject Press HP*1	Exit pressure release HP sensor
Feed Tray*1	Conveying tray paper sensor

\*1: 100 sheets staple only

#### Method: Punch

- 1 Check the switches and sensors by manually turning them on/off.

The switch indication is inverted when the switch is detected.

Items	Contents
Punch HP *1	PH home position sensor
Edge Face1 *1	PH Paper edge sensor 1
Edge Face2 *1	PH Paper edge sensor 2
Edge Face3 *1	PH Paper edge sensor 3
Edge Face4 *1	PH Paper edge sensor 4
Tank	PH tank set switch
Tank Full	PH dust tank full sensor

\*1: Except inner DF, \*2: Inner DF only

#### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U243 Checking the DP motor

(Message: Check DP Motors)

### Contents

Drive motor or solenoid of the document processor.

### Purpose

Check the operation of the motor or solenoid of the document processor.

### Method

- 1 Press [Start] key.
- 2 Select the item to operate.

Items	Contents
Feed Motor *3	Drive the DP paper feed motor for normal rotation
Conv Motor	DP conveying motor
Rev Motor *2	Drive DP feedshift motor
Lift Motor *3	DP lift motor
Feed Clutch *2	Drive DP feed clutch
Regist clutch *2	DP registration clutch
Eject motor *3	DP eject motor
Regist Motor *1	DP registration motor
DP Fan *1	DP drive fan motor
CIS Fan *1	DP CIS fan motor

\*1: DP-7110/7130 only, \*2: DP-7120 only, \*3: Except DP-7120

- 3 Press [Start] key.]Each operation starts.  
Press [Stop] key to quit operation.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U244 DP switch check

(Message: Check DP Switches)

### Contents

Display each switch and sensor status of the document processor.

### Purpose

Execute to check the operation of switches and sensors of the document processor.

### Method

- 1 Press [Start] key.
- 2 Check the switches and sensors by manually turning them on/off.  
Indication of the switches turn to blue when the switches are on.

Items	Contents
Feed	Check DP feed sensor.
Regist	Check DP registration sensor.
Timing	Check DP timing sensor.
CIS Head *2	Check DP timing sensor.
Set	Check DP original length sensor
Longitudinal	Check DP original length sensor
Lift U-Limit *3	Check DP lift upper limit sensor
Lift L-Limit *3	Check DP lift lower limit sensor
Cover Open	Check DP top cover switch
Open	Check DP open/close switch
Eject *3	Check DP eject sensor
Branch Motor HP *1	Check DP feedshift sensor

\*1: DP-7100 only, \*2:DP-7110/7130 only, \*3:Except DP-7120

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U246 Finisher adjustment

(Message: Adjust Finisher)

### Contents

Execute adjustment for the finisher installation.

### Purpose

- Punch registration stop timing adjustment in the punch mode.  
Adjust if paper skews or is folded in Z-shape in the punch mode.
- Stop timing adjustment of punch position.  
Adjust if the punch hole position is not as specified in the punch mode.
- Center position timing adjustment in the punch mode.  
Adjust the punch center position if it is shifted in the punch mode.
- Home position adjustment of front/rear width alignment.  
Adjust when the consistency of the side registration guides and paper is not good and paper jam occurs.
- Home position adjustment of front/rear shift.  
No width alignment in ejected paper.
- Home position adjustment of front/rear staple.  
Adjust if the staple is not centered on the paper in the staple mode.
- Adjustment of relief drum.  
Adjust if paper with 2-ply or 3-ply on the relief drum are misaligned.
- Pull-in start timing and amount adjustment.  
Adjust the leading edge timing of up to the 3rd sheet and 4th sheet and after.
- Front/Rear bind staple adjustment.  
Adjust the front/rear staple position if it is different from the specified in the staple mode.
- Punch entry registration thick paper correction.  
Adjust the skew conveying or punch position shift on thick paper in the PH mode.
- Home position adjustment of upper/lower side width alignment.  
Adjust when the consistency of the side registration guides and paper is not good and paper jam occurs.
- Adjustment of booklet stapling position.  
Adjust the booklet stapling position in the stitching mode if the position is not proper.
- Adjustment of center folding position.  
Adjust the center folding position in the stitching mode if the position is not proper.
- Adjustment of tri- folding position.  
Adjust the tri-folding position in the stitching mode if the position is not proper.
- Adjustment of bundle down position.  
Adjust the position of the BF lower moving plate according to paper length.

### Setting

- 1 Press [Start] key.

## 2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Finisher	Set the finisher adjustment value
Booklet	Set the booklet unit adjustment value

**Setting: Finisher**

## 1 Select the item to set.

Items	Contents
Punch Regist	Punch registration stop timing adjustment in the punch mode.
Punch Feed	Stop timing adjustment of punch position.
Punch Width *2	Center position timing adjustment in the punch mode.
Width Front HP	Front width adjuster home position adjustment
Width Tail HP	Rear width adjuster home position adjustment
Shift Front HP *1	Adjustment of front shift home position
Shift Tail HP *1	Adjustment of rear shift home position
Staple HP	Front/rear staple home position adjustment
Save Drum(2nd F)*3	Relief drum adjustment value (2nd sheet entry)
Save Drum(3rd C)*3	Relief drum adjustment value (3rd sheet confluence)
Save Drum(2nd C)*3	Relief drum adjustment value (2nd sheet Confluence)
Pull Timing*3	Pulling start timing (4th sheet and after)
Pull Amount*3	Pulling level adjustment (4th sheet and after)
Pull Timing(Conf)*3	Pulling start timing (Confluence: up to the 3rd sheet)
Pull Amount(Conf)*3	Pulling level adjustment (Confluence: up to the 3rd sheet)
Front Bind Staple*3	Front binding adjustment
Back Bind Staple*3	Back binding adjustment
Punch(T) Resist *3	Punch entry registration thick paper correction

\*1: Only for 4000 sheets DF, \*2: Except Inner DF, \*3: Only for 100 sheets staple

**Setting: Punch Regist**

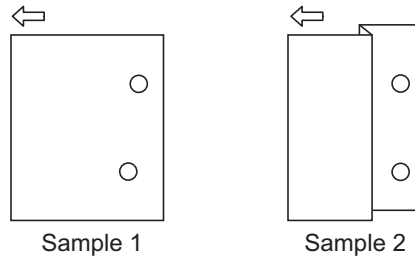
## 1 Select [Punch Regist].

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Adjusting the punch registration stop timing	-20 to 20	0	0.25mm

Increase the value if paper is skewed (sample 1).

Decrease the set value if paper is folded in a Z-shape (sample2).



Sample 1

Sample 2

- 3 Press [Start] key to set the setting value.

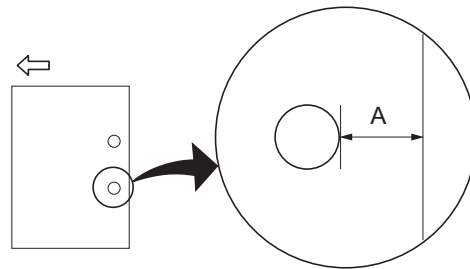
### Setting: Punch Feed

- 1 Select [Punch Feed].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Adjusting the punch stop timing	-10 to 10	0	0.5236mm

Increase the specified value if the punch position is shorter than specified.

Decrease the specified value if the punch position is longer than specified.



Preset value A : 9.75 mm (metric model)  
0.25 inch (6.25 mm) (inch model)

- 3 Press [Start] key to set the setting value.

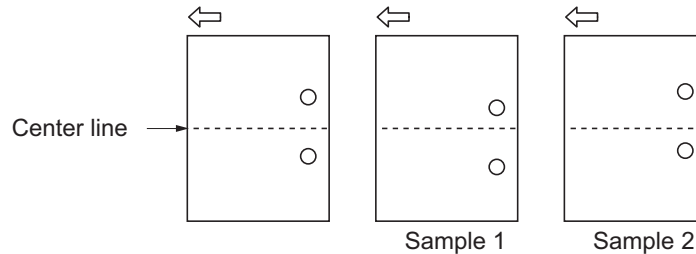
### Setting: Punch Width

- 1 Select [Punch Width].

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
PH center position timing adjustment	-4 to 4	0	0.5235 mm

Increase the set value if the punch position is shifted to the machine front side.  
Decrease the set value if the punch position is shifted to the machine rear side.



- 3 Press [Start] key to set the setting value.

#### Setting: Width Front HP / Width Tail HP

- 1 Select [Width Front HP] or [Width Tail HP]/
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Front width adjuster home position adjustment	-15 to 15	0	0.1945mm
Rear width adjuster home position adjustment	-15 to 15	0	0.1945mm

- 3 Press [Start] key to set the setting value.
- 4 Press [Stop] key and return to the screen for selecting the maintenance item number.
- 5 Enter U240 and select [Motor] and then [Width Test(A3)].
- 6 The width guides of the center-folding unit will move to A3-size position.
- 7 Insert paper into the side registration guides to check the consistence.
- 8 Repeat the above adjustment until paper is properly in position.

#### Setting: Shift Front HP / Shift Tail HP

- 1 Select [Width Front HP] or [Width HP].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Adjustment of front shift home position	-15 to 15	0	0.1945mm
Adjustment of rear shift home position	-15 to 15	0	0.1945mm

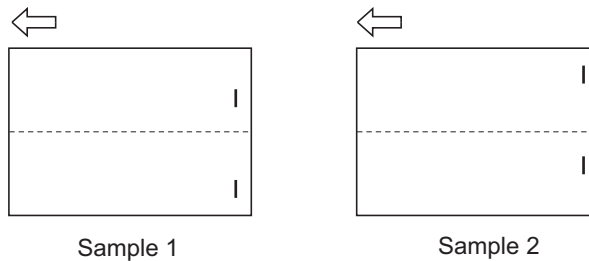
- 3 Press [Start] key to set the setting value.
- 4 Press [Stop] key and return to the screen for selecting the maintenance item number.
- 5 Enter U240 and select [Motor] and then [Sort Test].
- 6 Repeat the above adjustment until paper is properly in position.

**Setting: Staple HP**

- 1 Select [Staple HP].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Front/rear staple home position adjustment	-15 to 15	0	0.1945mm

Increase the set value if the staple position is shifted to the machine front side (sample1).  
Decrease the set value if the staple position is shifted to the machine rear side (sample2).



Sample 1

Sample 2

- 3 Press [Start] key to set the setting value.

**Setting: Save Drum (2nd F)**

- 1 Select [Save Drum (2nd F)]
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Relief drum adjustment value (2nd sheet entry)	-15 to 15	0	0.305 mm

- 3 Press [Start] key to set the setting value.

**Setting: Save Drum (3rd C)**

- 1 Select [Save Drum (3rd C)]
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Relief drum adjustment value (3rd sheet confluence)	-15 to 15	0	0.305 mm

- 3 Press [Start] key to set the setting value.

**Setting: Save Drum (2nd C)**

- 1 Select [Save Drum (2nd C)]

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation (mm)
Relief drum adjustment value (2nd sheet Confluence)	-15 to 15	0	0.305 mm

- 3 Press [Start] key to set the setting value.

#### Setting: Pull Timing

- 1 Select [Pull Timing].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Pulling start timing	0 to 30	0	2msec

- 3 Press [Start] key to set the setting value.

#### Setting: Pull Amount

- 1 Select [Pull Amount].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Pulling level adjustment	0 to 30	0	2msec

- 3 Press [Start] key to set the setting value.

#### Setting: Pull Timing (Conf)

- 1 Select [Pull Timing(Conf)].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Pulling start timing (Confluence)	0 to 30	0	2msec

- 3 Press [Start] key to set the setting value.

#### Setting: Pull Amount (Conf)

- 1 Select [Pull Amount(Conf)].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Pulling level adjustment (Confluence)	0 to 30	0	2msec

- 3 Press [Start] key to set the setting value.

#### Setting: Front Bind Staple

- 1 Select [Front Bind Staple].

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Front binding adjustment	-30 to 30	0	0.1910 mm

- 3 Press [Start] key to set the setting value.

#### Setting: Back Bind Staple

- 1 Select [Back Bind Staple].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Back binding adjustment	-30 to 30	0	0.1910 mm

- 3 Press [Start] key to set the setting value.

#### Setting: Punch (T) Resist

- 1 Select [Punch(T) Resist].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Punch entry registration thick paper correction	-20 to 20	0	0.305 mm

- 3 Press [Start] key to set the setting value.

#### Method: Booklet

- 1 Select the item to set.

Items	Contents
Width Up HP	Adjustment of upper side registration home position
Width Down HP	Adjustment of lower side registration home position
Staple Pos1	Adjustment of booklet stapling position for A4/Letter size
Staple Pos2	Adjustment of booklet stapling position for B4/Legal size.
Staple Pos3	Adjustment of booklet stapling position for A3/ Ledger/ 8K size
Booklet Pos1	Adjustment of center folding position for A4/Letter size
Booklet Pos2	Adjustment of center folding position for B4/ Legal size
Booklet Pos3	Adjustment of center folding position for A3/ Ledger/ 8K size
Three Fold	Adjustment of tri- folding position.
Bundle Down*1	Adjustment of bundle down position

\*1: 100 sheets staple only

#### Setting: Width Up HP / Width Down HP

- 1 Select [Width Up HP] or [Width Down HP].

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Adjustment of upper side registration home position	-15 to 15	0	0.3403 mm
Adjustment of lower side registration home position	-15 to 15	0	0.3403 mm

- 3 Press [Start] key to set the setting value.
- 4 Press [Stop] key and return to the screen for selecting the maintenance item number.
- 5 Enter U240 and select [Booklet] and then [Width Test(A3)].
- 6 The width guides of the center-folding unit will move to A3-size position.
- 7 Insert paper into the side registration guides to check the consistence.
- 8 Repeat the above adjustment until paper is properly in position.

**Setting: Staple Pos1/2/3**

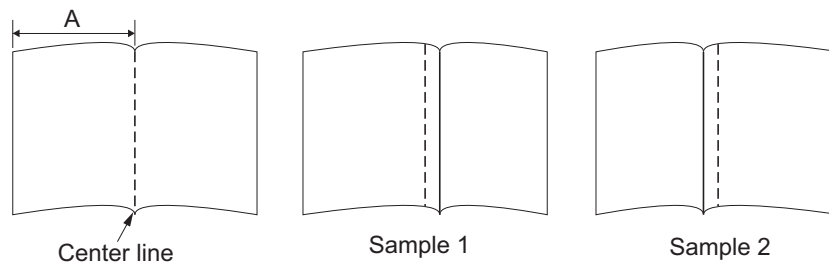
- 1 Select [Staple Pos1], [Staple Pos2] or [Staple Pos3].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Adjustment of booklet stapling position for A4/Letter size	-15 to 15	0	0.3247 mm
Adjustment of booklet stapling position for B4/Legal size.	-15 to 15	0	0.3247 mm
Adjustment of booklet stapling position for A3/ Ledger/ 8K size	-15 to 15	0	0.3247 mm

Increase the set value if the staple position is shifted to the right side (sample 1).

Decrease the set value if the staple position is shifted to the left side (sample 2).

Reference value A: A4, Letter: Length of paper x 1/2 ± 2 mm A3, Ledger, B4: Length of paper x 1/2 ± 3 mm



- 3 Press [Start] key to set the setting value.

**Setting: Booklet Pos 1/2/3**

- 1 Select [Booklet Pos 1], [Booklet Pos 2] or [Booklet Pos 3].



- 2 Change the setting value by using [+] [-] keys or the numeric keys.

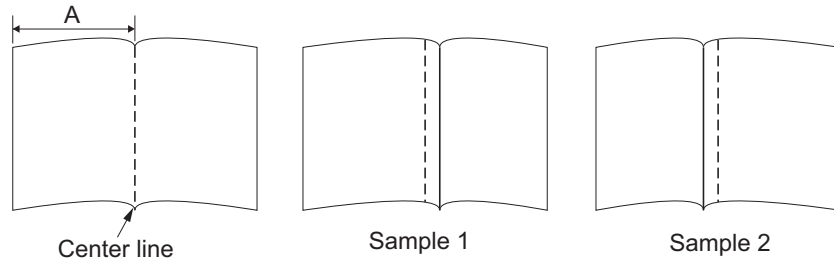
Content of Adjustment	Setting range	Default setting value	Data variation
Adjustment of center folding position for A4/Letter size	-15 to 15	0	0.3247 mm
Adjustment of center folding position for B4/ Legal size	-15 to 15	0	0.3247 mm
Adjustment of center folding position for A3/ Ledger/ 8K size	-15 to 15	0	0.3247 mm

Increase the set value if the center folding position is shifted to the right side (sample 1).

Decrease the set value if the center folding position is shifted to the left side (sample 2).

Reference value A: A4, Letter: Length of paper x 1/2 ± 2 mm

A3, Ledger, B4: Length of paper x 1/2 ± 3mm



- 3 Press [Start] key to set the setting value.

### Setting: Three Fold

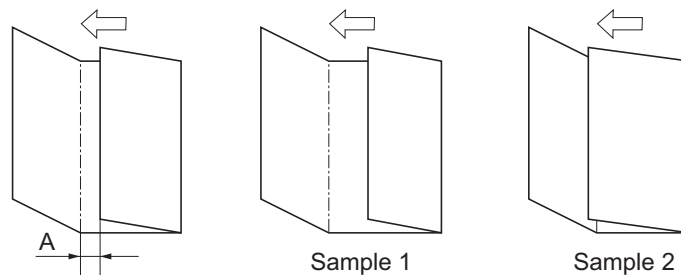
- 1 Select [Three Fold].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Adjustment of tri- folding position.	-15 to 15	0	0.3247 mm

Increase the set value if the tri- folding position is shifted to the right side (sample 1).

Decrease the set value if the tri- folding position is shifted to the left side (sample 2).

Reference value A: 7.0 ± 2mm



- 3 Press [Start] key to set the setting value.

### Setting: Bundle Down

- 1 Select [Bundle Down].
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Content of Adjustment	Setting range	Default setting value	Data variation
Adjustment of bundle down position.	-15 to 15	0	0.3247 mm

- 3 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U247 Paper feed operation check

(Message: Check Paper Feeder)

### Contents

Display sensor status for each feed unit.

### Purpose

This mode is to check sensor status of each feed unit.

### Method

- 1 Press [Start] key.
- 2 Select the item to operate.  
The screen for setting is displayed.

Items	Contents
2PF	Operates 2-tray paper feeder
LCF	Operate the large capacity feeder
Side Deck	Operate the side deck
SMT	Operate the side multi-tray
Side 2PF	Operate the side 2-tray paper feeder
Side LCF	Operate the side large capacity feeder
2PF Switch	Operate the feed unit switch

### Setting: 2PF

- 1 Select the item to set and check status of sensors.

Display Inverted text when the status is ON.

Display		Contents
Motor	Off	PF paper feed motor OFF
	On	PF paper feed motor ON
Clutch	C1 Clutch	PF paper feed clutch 1: ON
	C2 Clutch	PF paper feed clutch 2: ON
	Feed1 Clutch	PF Conveying clutch 1: ON
	Feed2 Clutch	PF Conveying clutch 2: ON
Execute		Start operation

- 2 Select [Execute].
- 3 Press [Start] key. The motor operation starts.  
Press [Stop] key to quit operation.

### Setting: LCF

- 1 Select the item to set and check status of sensors.

Display Inverted text when the status is ON.

Display		Contents
Motor	Off	PF paper feed motor OFF
	On	PF paper feed motor ON
Clutch	C1 Clutch	PF paper feed clutch 1: ON
	C2 Clutch	PF paper feed clutch 2: ON
	Feed1 Clutch	PF horizontal Conveying clutch 1: ON
	Feed2 Clutch	PF horizontal Conveying clutch 2: ON
Execute		Start operation

- 2 Select [Execute].
- 3 Press [Start] key. The motor operation starts.  
Press [Stop] key to quit operation.

### Setting: Side Deck

- 1 Select the item to set and check status of sensors.

Display Inverted text when the status is ON.

Display		Contents
Motor	Off	PF paper feed motor OFF
	On	PF paper feed motor ON
Clutch	C1 Clutch	PF feed clutch ON
	Cassette1 Solenoid	PF feed solenoid ON
Execute		Start operation

- 2 Select [Execute].
- 3 Press [Start] key. The motor operation starts.  
Press [Stop] key to quit operation.

### Setting: SMT

- 1 Select the item to set and check status of sensors.

Display Inverted text when the status is ON.

Display		Contents
Motor	Off	PF paper feed motor OFF
	On	PF paper feed motor ON
Clutch	C1 Clutch	PF feed clutch ON
	Feed1 Clutch	PF Conveying clutch ON
	Feed2 Clutch	PF feed clutch ON
	Feed 3	PF feed clutch ON
	Cassette 1 Solenoid	PF cassette solenoid ON

Display		Contents
	Separator Solenoid	PF paper feed-shift solenoid ON
Execute		Start operation

- 2 Select [Execute].
- 3 Press [Start] key. The motor operation starts.  
Press [Stop] key to quit operation.

#### Setting: Side 2PF

- 1 Select the item to set and check status of sensors.

Display Inverted text when the status is ON.

Display		Contents
Motor	Off	PF paper feed motor OFF
	On	PF paper feed motor ON
Clutch	C1 Clutch	PF paper feed clutch 1 ON
	C2 Clutch	PF feed clutch 2 ON
	V Feed(H) Clutch	PF Conveying clutch 1 ON
	V Feed(L) Clutch	PF Conveying clutch 2 ON
Execute		Start operation

- 2 Select [Execute].
- 3 Press [Start] key. The motor operation starts.  
Press [Stop] key to quit operation.

#### Setting: Side LCF

- 1 Select the item to set and check status of sensors.

Display Inverted text when the status is ON.

Display		Contents
Motor	Off	PF paper feed motor OFF
	On	PF paper feed motor ON
Clutch	C1 Clutch	PF paper feed clutch 1: ON
	C2 Clutch	PF paper feed clutch 2: ON
	V Feed Clutch	PF Conveying clutch 1 ON
	H Feed1 Clutch	PF Conveying clutch 2 ON
	H Feed2 Clutch	PF Conveying clutch 3 ON
Execute		Start operation

- 2 Select [Execute].
- 3 Press [Start] key. The motor operation starts.  
Press [Stop] key to quit operation.

#### Setting: 2PF Switch

- 1 Select the item to set.

Display	Contents
Cassette3 Feed	Cassette3 paper feed sensor ON
Cassette4 Feed	Cassette4 paper feed sensor ON
Horizontal Convey	Horizontal conveying sensor ON
Vertical Convey	Vertical conveying sensor ON

- 2 The reacted switch is highlighted.

**Completion**

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U250 Set Maintenance Counter Pre-set

### (Message: Set Maintenance Counter Pre-set)

#### Contents

Changes the pre-set values for the maintenance cycle and automatic gray-scale adjustment.

#### Purpose

Change the timing to display the message for maintenance and automatic gray-scale adjustment.

#### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
M.Cnt A	Change the maintenance counter preset value (Kit A)	0 to 9999999	600000
M.Cnt B	Change the maintenance counter preset value (Kit B)	0 to 9999999	600000
M.Cnt HT	Change the maintenance counter preset value (HT adjustment)	0 to 9999999	
Cassette1	Change the maintenance counter preset value (Cassette 1)	0 to 9999999	300000
Cassette2	Change the maintenance counter preset value (Cassette 2)	0 to 9999999	300000
Cassette3 *1	Change the maintenance counter preset value (Cassette 3)	0 to 9999999	300000
Cassette4 *1	Change the maintenance counter preset value (Cassette 4)	0 to 9999999	300000
Cassette5 *2	Change the maintenance counter preset value (Cassette 5)	0 to 9999999	300000
Cassette6 *3	Change the maintenance counter preset value (Cassette 6)	0 to 9999999	300000
Cassette7 *4	Change the maintenance counter preset value (Cassette 7)	0 to 9999999	300000
MPT	Change the maintenance counter preset value (MPT)	0 to 9999999	300000
DP	Change the maintenance counter preset value (DP)	0 to 9999999	300000

\*1: 500 x 2 / 1500 x 2 only, \*2: 3000 sheet side feeder only, \*3: 3000 sheet large capacity A4 side deck only, \*4: 4500 x1 multi side tray only

- 4 Press [Start] key to set the setting value.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U251 clearing the maintenance counter

(Message: Clear Maintenance Counter)

### Contents

Display, clears or changes the maintenance count.

### Purpose

Execute to check the maintenance count.

Also, clear the count at the maintenance.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range
M.Cnt A	Maintenance cycle counter value (Kit A)	0 to 9999999
M.Cnt B	Maintenance cycle counter value (Kit B)	0 to 9999999
M.Cnt HT	Maintenance cycle counter value (HT adjustment)	0 to 9999999
Cassette1	Maintenance cycle counter value (cassette 1)	0 to 9999999
Cassette2	Maintenance cycle counter value (cassette 2)	0 to 9999999
Cassette3 *1	Maintenance cycle counter value (cassette 3)	0 to 9999999
Cassette4 *1	Maintenance cycle counter value (cassette 4)	0 to 9999999
Cassette5 *2	Maintenance cycle counter value (cassette 5)	0 to 9999999
Cassette6 *3	Maintenance cycle counter value (cassette 6)	0 to 9999999
Cassette7 *4	Maintenance cycle counter value (cassette 7)	0 to 9999999
MPT	Maintenance cycle counter value (MPT)	0 to 9999999
DP	Maintenance cycle counter value (DP)	0 to 9999999
Clear	Clears all the maintenance counter	0
CBM Alert(Print)	No. of CBM Alert occurrence	

\*1: 500 x 2 / 1500 x 2 only, \*2: 3000 sheet side feeder only, \*3: 3000 sheet large capacity A4 side deck only, \*4: 4500 x 1 multi side tray only

### Clear

- 1 Select [Clear].
- 2 Press [Start] key to set the setting value.

### Setting: CBM Alert

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents
Tin Concentration	Total no. of the background images (Total of CMYK)
Background Of Printing	Total no. of the light images (Total of CMYK)



- 3 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U252 Destination

(Message: Set Destination)

### Contents

Switch the operations and screens of the main unit according to the destination.

### Purpose

Execute after initializing the backup RAM by U021, in order to return the setting to the value before replacement or initialization

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Japan Metric *1	Japan Metric
Inch *2	Inch
Europe Metric *2	Europe Metric
Asia Pacific *2	Asia Pacific
Australia *2	Australia
China *2	China
Korea *2	Korea

\*1: 100 V model only, \*2: Except 100 V model

Initial setting: Destination

- 3 Press [Start] key.  
Initializes according to the destination.
- 4 Turn the power switch Off/On Wait more than 5 seconds between the power off and on.  
An error code is displayed when an error occurs.  
When errors occur, turn the power switch off then on, and execute initialization by using maintenance mode U252 again.

### Error code list

Items	Contents
0001	Controller (Entity Error)
0002	Controller error
0020	Engine error
0040	Scanner error

## U253 Switching the double/single counts

### (Message: Set Double/Single Count)

#### Contents

Switch the count timing for the total counter and other counters by color mode.

#### Purpose

Select, according to user's request (copy service provider), if the maximum size paper is to be counted as one sheet (single count) or two sheets (double count)

#### Setting

- 1 Press [Start] key.
- 2 Select [Color] or [B/W].

Items	Contents
Full Color	Switch the counter for full color mode (Single/Double Count)
Mono Color	Switch the counter for mono color (Single/Double Count)
B/W	Switch the counter for B/W mode (Single/Double Count)

- 3 Select [SGL] or [DBL].

Items	Contents
SGL(All)	Set single count for all the paper sizes
DBL(A3/Ledger)	Set double count for Folio size or larger *2
DBL(B4)	Set single count for Legal (356mm) size or smaller
DBL(Folio)	Set double count for Folio size or larger *2

Initial setting:

Initial setting: SGL(All) (100V machine), DBL(A3/Ledger) (120V/220-240V machine)

\*2: The Folio length can be set to between 330 and 356 mm using maintenance mode U035, however, the double count will be applied when the set value is 330mm (Initial value) or longer.

- 4 Press [Start] key to set the setting value.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U260 Switching the timing for copy counting

(Message: Set Copy Count Mode)

### Contents

Switches the count timing for the total counter and other counters between paper feed and eject.

### Purpose

Change the count timing according to the user's request.

### Setting

- 1 Press [Start] key.
- 2 Selects the copy count timing.

Items	Contents
Feed	When secondary paper feed starts
Eject	Selects the paper eject timing

Initial setting: Eject

- 3 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U265 Setting by destination

(Message: Set Model Destination)

### Contents

Set the OEM code.

### Purpose

Execute when replacing the main PWB, etc.

### Setting

- 1 Press [Start] key.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
No.	Set the OEM code	0 to 255	-

- 3 Press [Start] key to set the setting value.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U271 Setting the paper count unit

(Message: Set Page Count Unit)

### Contents

Execute the long paper count setting.

### Purpose

Execute to change the long paper count.



### NOTE

If double count is set in U253, the value multiplied with this is the long paper count.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Banner A	Count setting of Long Paper A (470.1mm to 915mm/18.51" to 36")	2 to 30	2	-
Banner B	Count setting of Long Paper B (915.1 to 1220mm/36.01 to 48")	2 to 30	3	-

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U276 Switching the copy count mode

(Message: Set Charge Count Mode)

### Contents

Set the mono color copy count mode

### Purpose

Execute to change the billing counter to count up (Full color count/mono color count) in the mono color copy mode.

### NOTE

In case of setting the MODE to 0, mono color count function is disabled.

Therefore,

1. U253: Double count setting: [Mono Color] item is disabled. When disabling it, the setting value of [Mono Color] changes to the same setting value of [Full Color].
2. U284: 2 color copy mode setting: [[Mono Color] item is disabled. When disabling it, the default setting value of [Mono Color] changes to the same setting value of [B&W].

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Mode0	Count the mono color copy count in the full color count
Mode1	Count the mono color copy count in the mono color count

Initial setting: Mode1(100V), Mode0(120/220-240V)

- 3 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U278 Delivery date setting

(Message: Set Delivery Date)

### Contents

Registers the delivery date of the machine.

### Purpose

Execute when installing the machine. Execute to check the delivery date of the machine.

### Method

- 1 Press [Start] key.
- 2 Select [Today].
- 3 Press [Start] key.  
Set the delivery date of the machine.

### Clear

- 1 Select [Clear].
- 2 Press [Start] key.  
Clear the delivery date of the machine.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U283 China Red setting

(Message: Set China Red Mode)

### Contents

Set China red function.

### Purpose

Change setting to China red function.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
On	Enable China Red setting
Off	Disable China Red setting

Default setting: Off

- 3 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U284 Setting the 2-color copy

(Message: Set 2 Color Copy)

### Contents

Sets whether to use the 2-color copy.

### Purpose

Sets whether to use the 2-color copy.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
On	2-color copy enabled
B/W	2-color copy enabled, B/W count
Mono Color	2-color copy enabled, mono color count
Off	2-color copy disabled

Initial setting: Mono Color (100V)

Initial setting: Off (120/220-240V)

- 3 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U285 Set Service Status Page

(Message: Set Service Status Page)

### Contents

Set whether to display the print coverage report in the report output.

### Purpose

Change the setting according to the user's request

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Coverage	Set the coverage information on Service status page
Rep Permit	Set permission of service report

### Setting: Coverage

- 1 Select the item to set.

Items	Contents
On	Display the print coverage report
Off	Not to display the print coverage report

Initial setting: On

- 2 Press [Start] key. Confirm the setting values.

### Setting: Rep Permit

- 1 Select the item to check.

Items	Contents
On	Enable to output the service report
Off	Disable to output the service report

Default setting: Off

- 2 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U286 Optional language setting

(Message: Set Option Language)

### Contents

Add/delete/change the optional language.

### Purpose

Set the optional languages selectable from System Menu

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Option Language 1	Optional language 1 setting
Option Language 2	Optional language 2 setting
Option Language 3	Optional language 3 setting
Option Language 4	Optional language 4 setting
Option Language 5	Optional language 5 setting

Initial setting: 0 (None)

- 3 Press [Start] key. Confirm the setting values.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
ARABIC	Installed language list
CHINESE-S	
DANISH	
JAPANESE	
PORTUGUESE	
SWEDISH	
VIETNAMESE	
None	

Display varies depending on installed optional language package.

- 3 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U287 Automatic recovery function

(Message: Set Auto Reset Function)

### Contents

Set whether to enable the automatic recovery function after the service call error.

### Purpose

Set the automatic recovery function after the service call error or system error

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
C0XXX	Set whether to enable the automatic recovery function after the C0xxx code service call error
C1XXX	Set whether to enable the automatic recovery function after the C1xxx code service call error
C2XXX	Set whether to enable the automatic recovery function after the C2xxx code service call error
C3XXX	Set whether to enable the automatic recovery function after the C3xxx code service call error
C4XXX	Set whether to enable the automatic recovery function after the C4xxx code service call error
C5XXX	Set whether to enable the automatic recovery function after the C5xxx code service call error
C6XXX	Set whether to enable the automatic recovery function after the C6xxx code service call error
C7XXX	Set whether to enable the automatic recovery function after the C7xxx code service call error
C8XXX	Set whether to enable the automatic recovery function after the C8xxx code service call error
C9XXX	Set whether to enable the automatic recovery function after the C9xx code service call error
CFXXX	Set whether to enable the automatic recovery function after the CF code system error

- 3 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U323 Abnormal temperature and humidity notification setting

(Message: Set Abnormal Heat and Humidity Warning)

### Contents

Set whether to display the notification on the operation panel when detecting abnormal temperature and humidity.

### Purpose

Change the setting according to the user's request

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
On	Display the abnormal temperature and humidity notification
Off	Not to display the abnormal temperature and humidity notification

Initial setting: On

- 3 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U325 Paper interval setting

(Message: Set Paper Interval (Add toner))

### Contents

Set the print interval at high coverage.

### Purpose

Change the print interval at high coverage.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting
Interval	Set On/Off of print interval at high coverage.	On/Off	Off
Mode	Set the print interval mode at high coverage	1 to 10	1

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U326 Black line cleaning indication

(Message: Set Black Line Clean Display)

### Contents

Sets whether to indicate the black lines cleaning guidance when detecting black lines.

### Purpose

Displays the cleaning guidance to reduce the service call with the black lines by dust on the contact glass when scanning from the document processor.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 The screen for setting is displayed.

Items	Contents
Black Line Mode	Set On/Off of the black line cleaning guidance indication

- 4 Select the item to set.

Items	Contents
On	Indicate the black lines cleaning guidance
Off	Black line cleaning guidance is not indicated

Initial setting: On

- 5 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U327 Cassette heater control setting

(Message: Set Cassette Heater Control)

### Contents

Select the cassette heater control setting.

### Purpose

Select the cassette heater control setting.

Set the cassette heater for the optional cassette.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Mode1	Set the cassette heater control Mode1.
Mode2	Set the cassette heater control Mode2.
Off	Set the cassette heater control off. (Not installed)

Default setting: Off

In case of the cassette heater control is [On], the drum refresh will not be performed when turning the power switch On.

Mode1: ON at 65% or more of the machine outside humidity (During drive: OFF), Mode2: always ON

- 3 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U332 Adjusting the black coverage coefficient

(Message: Adjust Coverage Size Calculation Rate)

### Contents

Set the corrective rate of custom size against A4/Letter size. The coefficient set here is used to convert the black ratio in relation to the A4/Letter size and to display the result in the service status page.

### Purpose

Set the coefficient for converting the black ratio for custom sizes in relation to the A4/Letter size.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Rate	Set the coefficient for converting the black ratio for custom sizes in relation to the A4/Letter size	0.1 to 3.0	1.0	0.1
Mode	Switch full-color count and color coverage count display	0 to 1	0: Full color 1: by coverage	-
Level 1	Set low coverage threshold value	0.1 to 99.8	5	-
Level 2	Set middle coverage threshold value	0.1 to 99.9	12	-

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U340 Setting the applied mode

### (Message: Set Applied Mode)

#### Contents

Allocate memory to ensure that there is sufficient memory available for the printer to use as a working area.

#### Purpose

Modify the memory allocation if insufficient memory for transparency support or XPS direct printing occurs.

#### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Adj Memory	Set the memory allocation
Adj Max Job(Prn)	Setting the maximum of multiple jobs
Adj Max Job(Send)	Setting the maximum of multiple jobs

#### Setting: Adj Memory

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Image	Area temporarily used to create output image	-100 to 100 (MB)	0	1MB

Set the values below in case that print failure occurs with the memory shortage. (recommended value)  
Image: +100

If making the setting value large, the work area for copy gets smaller and it might cause output failure.

- 2 Press [Start] key. Confirm the setting values.
- 3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

#### Setting: Adj Max Job (Prn)

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Copy	Maximum copy (Scan To Print) Jobs	10 to 50	10
Printer	Maximum printer (Host To Print) Jobs	10 to 50	50

The maximum [Printer] jobs should be maximum jobs.

- 2 Press [Start] key. Confirm the setting values.

#### Setting: Adj Max Job (Send)

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Send	Upper limit job for Send (Scan To Host)	0 to 10	10
Fax	Upper limit of FAX job	0 to 210	210

The maximum [Printer] jobs should be maximum jobs.

- 2 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U341 Printer cassette setting

(Message: Set Printer Exclusive Cassette)

### Contents

Set the cassette to print output only.

### Purpose

Execute it when securing a cassette for printer. The cassette that is set on is for printer only and it cannot be used for copy.

- Cassette designated for FAX on system menu can not be set.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Multiple items are selectable.

Items	Contents
Cassette1	Set cassette 1 as printer only
Cassette2	Set cassette 2 as printer only
Cassette3 *1	Set cassette 3 as printer only (Paper feeder)
Cassette4 *1	Set cassette 4 as printer only (Paper feeder)
Cassette5 *2	Set cassette 5 as printer only (Paper feeder)
Cassette6 *3	Set cassette 6 as printer only (Paper feeder)
Cassette7 *4	Set cassette 7 as printer only (Paper feeder)

\*1: 500 x 2 / 1500 x 2 only, \*2: 3000 sheet side feeder only, \*3: 3000 sheet large capacity A4 side deck only, \*4: 4500 x1 multi side tray only

Initial setting: Off (Cassette1 to 7)

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U342 Paper eject control setting

(Message: Set Finisher Paper Stack Limit)

### Contents

Set/release the consecutive eject sheet limit, when setting the eject place to the left eject output (Adapt to only the lower side of left eject outlet).

### Purpose

Set/release the consecutive eject sheet limit for the left eject output (Adapt to only the lower side of left eject outlet) depending on the user's demand.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 The screen for setting is displayed.

Items	Contents
Count Limit	Set limitation of continuous output

- 4 Select the item to set.

Items	Contents
On	Set limitation of continuous output to the left exit output
Off	Release the consecutive eject sheet limit for the left eject output

Initial setting: On

- 5 Press [Start] key. Confirm the setting values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U343 Duplex priority mode

(Message: Set Duplex Priority Mode)

### Contents

Switch between duplex or simplex copy for the initial copy mode.

### Purpose

Set the frequently used settings depending on the user's usage.

### Setting

- 1 Press [Start] key.  
Select the item to set.

Items	Contents
On	Duplex print priority is enabled
Off	Duplex print priority is disabled

Default setting: Off

- 2 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U345 Setting the value for maintenance due indication

(Message: Set Maintenance Time Soon Display)

### Contents

Set when to display a message notifying that the time for maintenance is about to reach, by setting the number of prints that can be made before the current maintenance cycle reaches.

Display the maintenance precaution message when the page count reaches the set value before the maintenance count.

### Purpose

Change the time for maintenance precaution display.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Cnt	Setting the maintenance time precaution display (Remaining number of prints that can be made before the current maintenance cycle reaches)	0 to 9999	0

- 4 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U346 Selecting Sleep Mode

(Message: Selecting Sleep Mode)

### Contents

Change the sleep mode settings.

### Purpose

Change the sleep mode settings.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Timer/Sleep Level	BAM conformity country setting
Auto sleep	Switch Auto Sleep function setting

### Setting: Timer/Sleep Level

- 1 Select the item to set.

Items	Contents
More Energy Save	BAM conformity setting On Sleep mode is disabled (Quick Recovery setting is disabled)
Less Energy Save	BAM conformity setting Off Set Sleep Level enable (Quick Recovery or Energy Saver)

Initial setting: More Energy Save

- 2 Press [Start] key. Confirm the setting values.
- 3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Setting: Auto sleep

- 1 Select the item to set.

Items	Contents
On	Enable auto sleep function
Off	Disable auto sleep function

Initial setting: On

Sleep mode can not work from system menu if disable this function.

Peel off the energy saver label when setting it to off.

- 2 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U402 Adjusting the printing margins

(Message: Adjust Print Margin)

### Contents

Adjusts the scan image margins.

### Purpose

Make the adjustment if margins are incorrect

#### NOTE

If the leading edge margin is less than the specified value, it may cause jam at the fuser.

If there is no bottom margin, when continuously printing, it may cause an image smudge on the second page.

### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.

#### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.

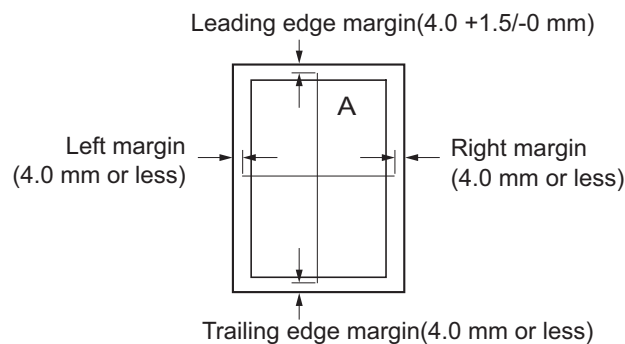
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- 3 Press [Start] key and output test chart.
- 4 Press [System Menu/Counter] key.
- 5 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
Lead	Adjust the printer leading edge margin	0.0 to 10.0	4.0	0.1 mm
A Margin	Printer left margin	0.0 to 10.0	3.0	0.1 mm
C Margin	Printer right margin	0.0 to 10.0	3.0	0.1 mm
Trail	Printer trailing edge margin	0.0 to 10.0	3.9	0.1 mm

- 6 Change the setting value by using [+] [-] keys or the numeric keys.

Increasing the setting value makes the margin wider, and decreasing makes it narrow.



- 7 Press [Start] key to set the setting value.

 **IMPORTANT**

Appropriate margins are not obtained after this adjustment, execute the following maintenance mode.

U034([47 page](#))> U402

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U403 Adjusting margins for scanning an original on the contact glass

(Message: Adjust Scanning Margin(Table))

### Contents

Adjust the margins for the table scanning.

### Purpose

Make the adjustment if margins are incorrect

### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.



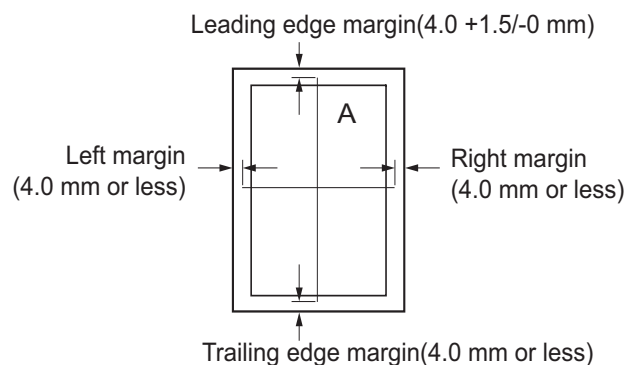
### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

- 3 Place an original and press [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.
- 5 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
A Margin	Adjust the scanner left margin	0.0 to 10.0	2.0	0.5mm
B Margin	Adjust the scanner leading edge margin	0.0 to 10.0	2.0	0.5mm
C Margin	Adjust the scanner right margin	0.0 to 10.0	2.0	0.5mm
D Margin	Adjust the scanner trailing edge margin	0.0 to 10.0	2.0	0.5mm

- 6 Change the setting value by using [+] [-] keys or the numeric keys.  
Increasing the setting value makes the margin wider, and decreasing makes it narrow.



- 7 Press [Start] key to set the setting value.



### IMPORTANT

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034([47 page](#))> U402([233 page](#))> U403

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U404 Adjusting margins for scanning an original from the document processor

### (Adjust Scanning Margin(DP))

#### Contents

Adjust the margins for the DP scanning.

#### Purpose

Make the adjustment if margins are incorrect

#### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.

#### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette, Conveying speed, Duplex printing, set of prints, output location)

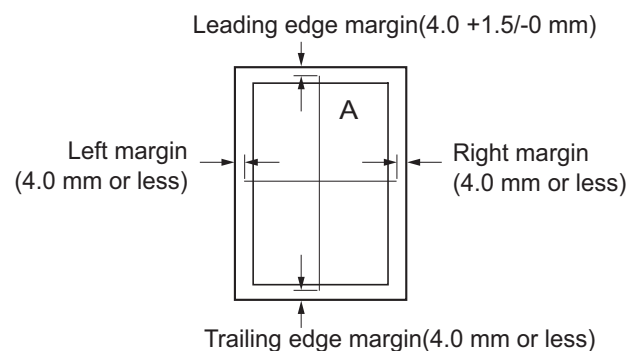
- 3 Place an original on the DP and press the [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.
- 5 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
A Margin	Adjust the DP left margin	0.0 to 10.0	3.0	0.5mm
B Margin	Adjust the DP leading edge margin	0.0 to 10.0	2.5	0.5mm
C Margin	Set the DP right margin	0.0 to 10.0	3.0	0.5mm
D Margin	Adjusts the DP trailing edge margin	0.0 to 10.0	4.0	0.5mm
A Margin(Back) *1	Adjusts the DP left margin (Back side)	0.0 to 10.0	3.0	0.5mm
B Margin(Back) *1	Adjusts the DP leading edge margin (Back side)	0.0 to 10.0	2.5	0.5mm
C Margin(Back) *1	Adjusts the DP right margin (Back side)	0.0 to 10.0	3.0	0.5mm
D Margin(Back) *1	Adjusts the DP trailing edge margin (Back side)	0.0 to 10.0	4.0	0.5mm

\*1: Dual scan model only

- 6 Change the setting value by using [+] [-] keys or the numeric keys.

Increasing the setting value makes the margin wider, and decreasing makes it narrow.



- 7 Press [Start] key to set the setting value.

 **IMPORTANT**

Check the copy image after the adjustment. If the image still have a problem, try to adjust by the following maintenance mode.

U034([47 page](#))> U402([233 page](#))> U403([235 page](#))> U404

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U407 Adjusting the writing timing (Duplex/Reversal)

### (Message: Adjust Writing Timing (Reverse))

#### Contents

Adjust write timing for copy with 180 rotation original.

#### Purpose

Adjusted when the back page image of duplex copying is printed in rotated 180 degrees from the scanner reading image (image on the memory)

#### IMPORTANT

Adjust this after finishing the following maintenance modes.

U034([47 page](#))> U402([233 page](#))> U066([75 page](#))>  
U403([235 page](#))> U071([79 page](#))> U404([237 page](#)):> U407

#### Adjustment

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.

#### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette/Conveying speed/Duplex printing/Color BW setting/Print Set/Output tray)

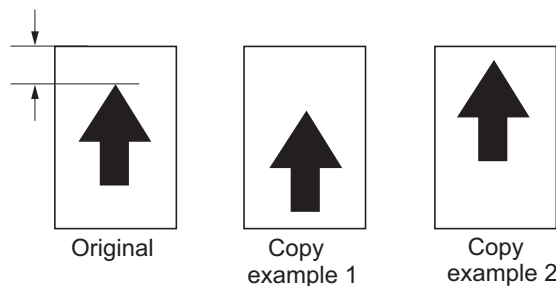
- 3 Place an original on the DP and press the [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.
- 5 Select [Adj Data].

Items	Contents	Setting range	Initial setting	Data variation
Adj Data	Adjusts the leading edge timing when writing the image in the memory	-47 to 47	0	1 dot

- 6 Change the setting value by using [+] [-] keys or the numeric keys.  
Increase the value for the copy sample 1.  
Decrease the value for the copy sample 2.

The image moves backward by increasing setting value and moves forward by decreasing the value.

Leading edge registration of the copy image (+1.0/-1.5 mm)



- 7 Press [Start] key to set the setting value.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U410 Adjusting the halftone automatically

(Message: Half Tone Auto Adjustment)

### Contents

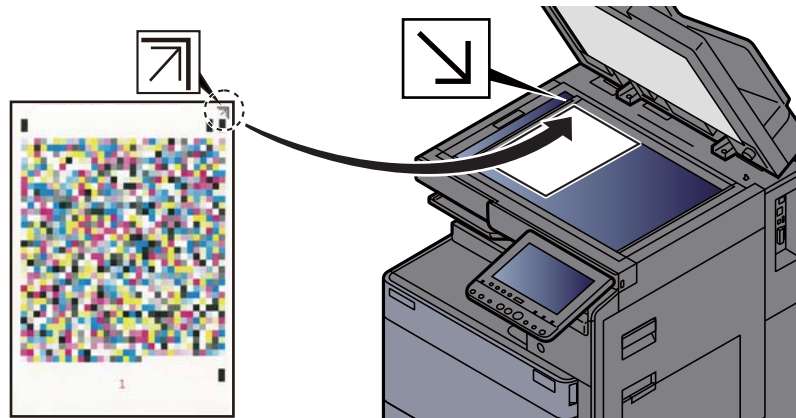
Acquire the data for the automatic halftone adjustment and ID correction.

### Purpose

Execute when the quality of reproduced halftones has dropped.

### Adjustment

- 1 Input "410" with numeric keys
- 2 Press [Start] key.  
Display the execution information screen.  
Test pattern 1, Test pattern 2 and Test pattern 3 are output on the A4/ letter paper.
- 3 Set the test pattern output on the original glass with the arrow facing the rear side and print side face-down.  
Load about 20 sheets of the blank paper on Test Pattern 1.



- 4 Press [Start] key.  
The first auto adjustment is executed.
- 5 Set the output Test Pattern 2 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 2.
- 6 Press [Stop] key.  
The second auto adjustment is executed.
- 7 Set the output Test Pattern 3 as the original.  
Load about 20 sheets of the blank paper on Test Pattern 3.
- 8 Press the [Start] key.  
The third auto adjustment is executed.
- 9 [Finish] appears after normal completion.  
An error code appears when an error occurs.

**Error code**

Occurrence position	Codes	Contents	Re-adjustment
Scanner	S001	Original type error	Enable
	S002	Original reference patch is not detected	Enable
	S003	Original deviation is in excess in the sub scanning direction	Enable
	S004	Original deviation is in excess in the main scanning direction	Enable
	S005	Original skew is in excess	Enable
	S006	Other scanner error	Enable
Engine	E001	Engine status error	Disable
	E002	Engine sensor error	Disable
	E003	Engine is driving	Enable
Controller	C101	Pause status	Disable
	C102	Adjustment value error	Disable
	C1FF	Other controller error	Disable
	C210	Table adjustment value error (K)	Disable
	C220	Table adjustment value error (C)	Disable
	C240	Table adjustment value error (M)	Disable
	C280	Table adjustment value error (Y)	Disable
	C310	Monotonic increase adjustment value error (K)	Disable
	C320	Monotonic increase adjustment value error (C)	Disable
	C340	Monotonic increase adjustment value error (M)	Disable
	C380	Monotonic increase adjustment value error (Y)	Disable

**Completion**

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U411 Scanner auto adjustment

(Message: Scanner Auto Adjustment)

### Contents

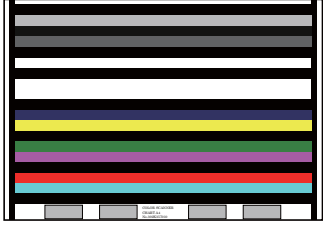
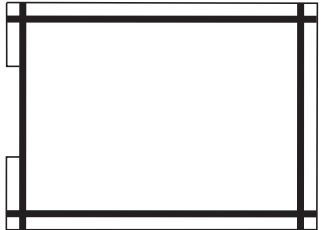
Use the specified originals and automatically adjusts the following items in the scanner and the DP scanning sections.

Scanner section: Original size magnification, leading edge timing, center line, chromatic aberration in main/sub scanning direction, MTF correction, color/B/W input gamma, color correction matrix automatic adjustment

DP scanning section: Original size magnification, leading edge timing and center line, MTF correction, Input gamma, automatic adjustment of color correction matrix

### Purpose

Automatically adjust the scanner and the DP scanning sections.

Items	Purpose	Contents	Original for adjustment (P/N)
Table(ChartA)	When replacing ISU (CCD unit), Optical LED lamp, Engine EEPROM, DP CIS. Use when setting up DP or executing U021 initialization	Execute automatic adjust the table scanning  Magnification in the sub scanning direction / Leading edge timing Center line / chromatic aberration Sub scanning chromatic aberration / MTF correction Gamma in color mode / color correction matrix Input gamma in B/W mode	7505000005  
DP FU(ChartB) *1  DP FD(ChartB) *2	Use when setting up DP or executing U021 initialization	Execute the front side automatic adjustment in the DP scanning section Execute the back side automatic adjustment in the DP scanning section  Magnification in the sub-scanning direction Leading edge timing Center line Trailing edge timing	302AC68243  
DP FU (Chart A) *1		Execute the front side automatic adjustment in the DP scanning section Main scanning chromatic aberration / sub scanning chromatic aberration / MTF correction Gamma in color mode / color correction matrix	7505000005
DP FD (Chart A) *2		Execute the back side automatic adjustment in the DP scanning section  Main scanning chromatic aberration / sub scanning chromatic aberration / MTF correction Gamma in color mode / color correction matrix	

Items	Purpose	Contents	Original for adjustment (P/N)
Target		Set the method to obtain the target value	7505000005
DP Auto Adj *1		Adjusting the document processor scanning section with the chart output by the own machine  Magnification in the sub-scanning direction Leading edge timing Center line	In case if the Chart B is not available, executed it as a simple method

\*1: DP installed machine only, \*2: Simultaneous duplex scanning DP machine only

### Method: Table (Chart A)

#### In case of automatic input of the target value

Normally, adjust it by the following.

- 1 Set the specified original (P/N: 7505000005) on the table.
- 2 Enter to Maintenance mode U411.
- 3 Select [Target].
- 4 Select [Auto].
- 5 Press [Start] key.
- 6 Select [Table(ChartA)].
- 7 Press the [Start] key to read the barcode of the original chart and to start the automatic adjustment.
- 8 [OK] is displayed when complete properly



#### NOTE

When the error code [1e] or [1f] is displayed during the automatic adjustment in the table scanning and the barcode is not read, adjust the following after manually inputting the target value.

#### In case of manual input of the target value

- 1 Enter the target values which are shown on the lower part of the front page of the adjustment original (P/N: 7505000005) by executing the maintenance mode U425.

- 2 Set the specified original (P/N: 7505000005) on the table.
- 3 Enter to Maintenance mode U411.
- 4 Select [Target].
- 5 Select [U425].
- 6 Press [Start] key.
- 7 Select [Table(ChartA)].
- 8 Press [Start] key to start the 2nd side automatic adjustment.
- 9 [OK] is displayed when complete properly

 **NOTE**

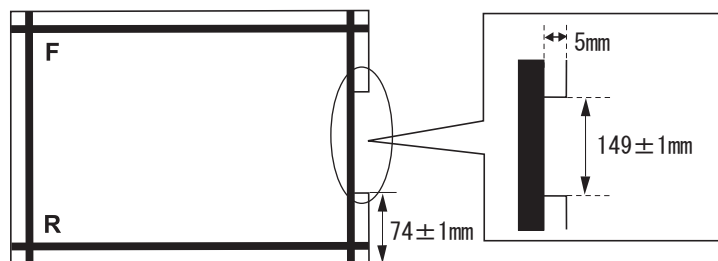
If the image position is shifted largely at the DP adjustment below, an error might occur when adjusting it with Chart A. First, use Chart B (image position) to adjust it and then use Chart A (color).

**Method: DP FU (Chart B)**

Adjusting the front side of the DP duplex scanning

- 1 Set the specified original (P/N: 302AC68243) face-up on the DP.

**DP adjustment original (ChartB)**



- 2 Enter to Maintenance mode U411.
- 3 Select [DP FU(ChartB)].
- 4 Press [Start] key to start automatic adjustment.
- 5 [OK] is displayed when complete properly

**Method: DP FD (Chart B)**

Adjusting the back side of the DP duplex scanning

- 1 Set the specified original (P/N: 302AC68243) face-up on the DP.
- 2 Enter to Maintenance mode U411.
- 3 Select [DP FD(ChartB)].
- 4 Press [Start] key to start automatic adjustment.
- 5 [OK] is displayed when complete properly

**Method: DP Auto Adj**

- 1 Set A4/Letter paper.

- 2 Press [Start] key to print the adjustment original.
- 3 Set the adjustment original output on the table and press [Start] key.
- 4 Set the output original with face-up on the DP.
- 5 Press [Start] key and scan the original.
- 6 Press [Start] key to start the front side automatic adjustment.
- 7 Set the output original with face-down on the DP.
- 8 Press [Start] key and scan the original.
- 9 Press [Start] key to start the back side automatic adjustment.

**Method: DP FU (Chart A)**

In case of automatic input of the target value

- 1 Set the specified original (P/N: 7505000005) face-up on the DP.
- 2 Enter to Maintenance mode U411.
- 3 Select [Target].
- 4 Select [Auto].
- 5 Press [Start] key.
- 6 Select [DP FU(ChartA)].
- 7 Press the [Start] key to read the barcode of the original chart and to start the automatic adjustment.
- 8 [OK] is displayed when complete properly

**NOTE**

When the error code [1e] or [1f] is displayed during the automatic adjustment in the DP scanning and the barcode is not read, adjust the following after manually inputting the target value.

In case of manual input of the target value

- 1 Enter the target values which are shown on the lower part of the front page of the adjustment original (P/N: 7505000005) by executing the maintenance mode U425.
- 2 Set the specified original (P/N: 7505000005) face-up on the DP.
- 3 Enter to Maintenance mode U411.
- 4 Select [Target].
- 5 Select [U425].
- 6 Press [Start] key.
- 7 Select [DP FU(ChartA)].
- 8 Press [Start] key to start automatic adjustment.
- 9 [OK] is displayed when complete properly

**Method: DP FD (Chart A)**

In case of automatic input of the target value

- 1 Set the specified original (P/N: 7505000005) face-down on the DP.

- 2 Enter to Maintenance mode U411.
- 3 Select [Target].
- 4 Select [Auto].
- 5 Press [Start] key.
- 6 Select [DP FD(ChartA)].
- 7 Press the [Start] key to read the barcode of the original chart and to start the automatic adjustment.
- 8 [OK] is displayed when complete properly

**NOTE**

When the error code [1e] or [1f] is displayed during the automatic adjustment in the DP scanning and the barcode is not read, adjust the following after manually inputting the target value.

In case of manual input of the target value

- 1 Enter the target values which are shown on the lower part of the front page of the adjustment original (P/N: 7505000005) by executing the maintenance mode U425.

- 2 Set the specified original (P/N: 7505000005) face-down on the DP.
- 3 Enter to Maintenance mode U411.
- 4 Select [Target].
- 5 Select [U425].
- 6 Press [Start] key.
- 7 Select [DP FD(CharA)].
- 8 Press [Start] key to start automatic adjustment.
- 9 [OK] is displayed when complete properly

**NOTE**

[OK] is displayed when complete properly If an error occurs during auto adjustment, error code [NG xx] is displayed and operation stops. this case, check the error and execute the automatic adjustment again.

**Error code**

Codes	Contents	Corrective measure
00	Automatic adjustment success	-
01	Black band detected position error (Table scanning leading edge skew in the sub scanning direction)	Set the original correctly and execute the adjustment again Check lighting of the lamp or replace it
04	Black band is not detected (Table leading edge in the sub-scanning direction)	
05	Black band is not detected (Table far end in the main scanning direction)	
06	Black band is not detected (Table near end in the main scanning direction)	
07	Black band is not detected (Table trailing edge in the sub-scanning direction)	
08	Black band is not detected (DP far end in the main scanning direction)	
09	Black band is not detected (DP near end in the main scanning direction)	
0a	Black band is not detected (DP leading edge in the sub-scanning direction)	
0b	Black band is not detected (Original check of DP leading edge in the sub-scanning direction)	
0c	Black band is not detected (DP trailing edge in the sub-scanning direction)	
0d	White band is not detected (DP trailing edge in the sub-scanning direction)	
0e	DMA time out	Turn the power switch Off/On, and execute it again



Codes	Contents	Corrective measure
0f	Magnification error in the sub-scanning direction	Turn the power switch Off/On, and execute it again Adjust manually (U065 to U067, U070 to U072)
10	Lead edge error in the sub-scanning direction	
11	Trailing edge error in the sub-scanning direction	
12	DP skew error in the sub-scanning direction	
13	Maintenance request error	Turn the power switch Off/On, and execute it again
14	Center line error in the main scanning direction	Turn the power switch Off/On, and execute it again Adjust manually (U065 to U067, U070 to U072)
15	DP skew error in the main scanning direction	
16	Magnification error in the main scanning direction	
17	Service call error	Turn the power switch Off/On, and execute it again
18	DP paper jam error	Set the original correctly and execute it again
19	PWB replacement error	-
1a	Original error	Clean the contact glass and slit glass Replace the adjustment original
1b	Input gamma adjustment original error	Set the original correctly and execute it again
1c	Matrix adjustment original error	
1d	Original for the white reference correction coefficient error	
1e	Lab value detection error	
1f	Lab value comparison error	Check the following and execute again Is the bar code dirty? Is the original position correct? Is the bar code position correct?
20	Input gamma correction coefficient error	Set the original correctly and execute it again
21	Color correction matrix coefficient error	
30	Chromatic aberration adjustment original error	
99	Completed to obtain the test RAW	-

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting the maintenance item number.

## U412 Adjusting the uneven density

(Message: Adjust Uneven Density)

### Contents

Scan the test chart image distribution directly from the scanner and adjust the LSU light amount

### Purpose

Execute when the drum unit or laser scanner unit is replaced.

Correct uneven developer/transfer density in the main scanning direction.

### IMPORTANT

After completing, execute maintenance mode U464 [Calibration].

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
Switch to selection screen.

Items	Contents
Normal Mode	Normal adjustment mode
On/Off Config	Uneven density correction On/Off setting

### Method: Normal Mode

- 1 Press [Start] key.  
Output the test patten with the initial light intensity setting. (1st sheet)
- 2 Set the output test chart and place approximately 20 sheets of white paper on it.
- 3 Press [Start] key. Scanning starts.  
Test chart is output after completing scanning. (2nd sheet)  
According to the test chart of 1st sheet, output with -20% light intensity setting.
- 4 Set the output test chart and place approximately 20 sheets of white paper on it.
- 5 Press [Start] key. Scanning starts.  
Test chart is output after completing scanning. (3rd sheet)
- 6 Set the output test chart and place approximately 20 sheets of white paper on it.
- 7 Press [Start] key.  
Confirm each setting value. [Finish] appears after normal completion.

### 1st retry

- 1 [Retry] appears unless completed correctly.
- 2 Execute Step 3 to 7

### 2nd retry

- 1 [Retry] appears unless completed correctly.

## 2 Execute Step 3 to 7

An error code appears when an error occurs.

### Error code

Codes	Occurrence position	Contents	Re-adjustment
S001	Scanner	Patch is not detected	Enable
S002		Misalignment of the original in the main scan direction	Enable
S003		Misalignment of the original in the sub scan direction	Enable
S004		Original skew error	Enable
S005		Original type error	Enable
SFFF		Other scanner error	Disable
E001	Engine	Engine status error	Disable
E002		Background image error	Disable
E003		Density error	Disable
E004		Uneven density error	Disable
EFFF		Other engine error	Disable
C001	Controller	Controller error	Disable
CFFF		Other controller error	Disable

### Setting: On/Off Config

#### 1 Select the item to set.

Items	Contents
On	Enable the uneven density correction
Off	Disable the uneven density correction

Initial setting: On

Automatically set to On after completing correction.

#### 2 Press [Start] key to set the setting value.

### Completion

#### 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U415 Adjusting the print position automatically

(Message: Print Position Auto Adjust)

### Contents

Execute the automatic adjustment of the timing at the print engine

Adjusting the leading edge timing, center line and margins

### Purpose

Used to make respective auto adjustments for the print engine.

In case if the Chart B (302AC68243) is not available, executed it as a simple method

### Method

- 1 Set A3/Ledger paper.  
Load A4/Letter when the large capacity feeder is used.
- 2 Press [Start] key.
- 3 Select [Execute].
- 4 Press [Start] key.  
Test pattern is output.
- 5 Set the output test pattern as the original.
- 6 Press [Start] key.  
Automatically perform adjustment from the top to bottom cassettes.
- 7 [OK] is displayed when complete properly  
An error code appears when there is an error.

### Error code list

Display	Contents	Display	Contents
S001	Black band is not detected (Table far end in the main scanning direction)	C103	Adjustment value error (leading edge timing)
S002	Black band is not detected (Table near end in the main scanning direction)	C104	Adjustment value error (center line)
S003	Black band is not detected (Table leading edge in the sub-scanning direction)	CFFF	Other controller error
S004	Black band is not detected (Table trailing edge in the sub-scanning direction)		
S005	Skew error in the sub-scanning direction (1.5mm or more)		
S006	Skew error in the main scanning direction (1.5mm or more)		
S007	Original error (detection of reverse original paper)		
S008	Original error (page mismatch)		
SFFF	Other scanner error		

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U425 Set Target

(Message: Set Target Adjustment Value)

### Contents

Enter the Lab values which are shown on the back page of the adjustment original (P/N: 7505000005).

### Purpose

Enter data in order to correct for differences in originals during the automatic adjustment

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
ChartA	Setting the adjustment value of the table scanning
ChartB	Set the adjustment value of the DP scanning

### Method: ChartA

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
White	Setting the white patch for the adjustment original
Black	Setting the black patch for the adjustment original
Gray1	Setting the Gray1 patch for the adjustment original
Gray2	Setting the Gray2 patch for the adjustment original
Gray3	Setting the Gray3 patch for the adjustment original
C	Setting the Cyan patch for the adjustment original
M	Setting the Magenta patch for the adjustment original
Y	Setting the Yellow patch for the adjustment original
R	Setting the Red patch for the adjustment original
G	Setting the Green patch for the adjustment original
B	Setting the Blue patch for the adjustment original
Adjust Original	Setting the main scanning and sub-scanning directions

### Setting: White

- 1 Select the item to set.
- 2 By using [+][.] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	93.6	-
a	A value setting	-200 to 200	0.9	-
b	B value setting	-200 to 200	-0.4	-

- 3 Press [Start] key to set the setting value.

**Setting: Black**

- 1 Select the item to set.
- 2 By using [+][-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	10.6	-
a	A value setting	-200 to 200	-0.2	-
b	B value setting	-200 to 200	-0.7	-

- 3 Press [Start] key to set the setting value.

**Setting: Gray1**

- 1 Select the item to set.
- 2 By using [+][-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	76.2	-
a	A value setting	-200 to 200	-0.2	-
b	B value setting	-200 to 200	1.2	-

- 3 Press [Start] key to set the setting value.

**Setting: Gray2**

- 1 Select the item to set.
- 2 By using [+][-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	25.2	-
a	A value setting	-200 to 200	-0.2	-
b	B value setting	-200 to 200	-0.2	-

- 3 Press [Start] key to set the setting value.

**Setting: Gray3**

- 1 Select the item to set.
- 2 By using [+][-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	51.3	-

Items	Contents	Setting range	Initial setting	Data variation
a	A value setting	-200 to 200	-0.3	-
b	B value setting	-200 to 200	0.3	-

3 Press [Start] key to set the setting value.

#### Setting: C

- 1 Select the item to set.
- 2 By using [+] [-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	72.6	-
a	A value setting	-200 to 200	-32.8	-
b	B value setting	-200 to 200	-11.5	-

3 Press [Start] key to set the setting value.

#### Setting: M

- 1 Select the item to set.
- 2 By using [+] [-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	48.1	-
a	A value setting	-200 to 200	69.9	-
b	B value setting	-200 to 200	-6.1	-

3 Press [Start] key to set the setting value.

#### Setting: Y

- 1 Select the item to set.
- 2 By using [+] [-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	86.2	-
a	A value setting	-200 to 200	-18.6	-
b	B value setting	-200 to 200	81.7	-

3 Press [Start] key to set the setting value.

#### Setting: R

- 1 Select the item to set.

- 2 By using [+] [-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	46.7	-
a	A value setting	-200 to 200	54.2	-
b	B value setting	-200 to 200	38.6	-

- 3 Press [Start] key to set the setting value.

#### Setting: G

- 1 Select the item to set.
- 2 By using [+] [-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	67.8	-
a	A value setting	-200 to 200	-51.3	-
b	B value setting	-200 to 200	48.9	-

- 3 Press [Start] key to set the setting value.

#### Setting: B

- 1 Select the item to set.
- 2 By using [+] [-] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
L	L parameter setting	0 to 100	38.8	-
a	A value setting	-200 to 200	25.3	-
b	B value setting	-200 to 200	-22.8	-

- 3 Press [Start] key to set the setting value.

#### Setting: Adjust Original



#### NOTE

This setting is normally not necessary.

Items	Contents	Setting range	Initial setting	Data variation
Lead	Set the adjustment value of the leading edge	0 to 6.0	5.0	0.1mm
Main Scan	Set the adjustment value of the left edge	0.0 to 11.0	10.0	0.1mm
Sub Scan	Set the adjustment value of the trailing edge	0.0 to 191.0	190.0	0.1mm

- 1 Measure the distances [A], [B] and [C] from the upper edge of black belt 1 to the lower edge of black belt 3 of the adjustment original.  
Measurement method

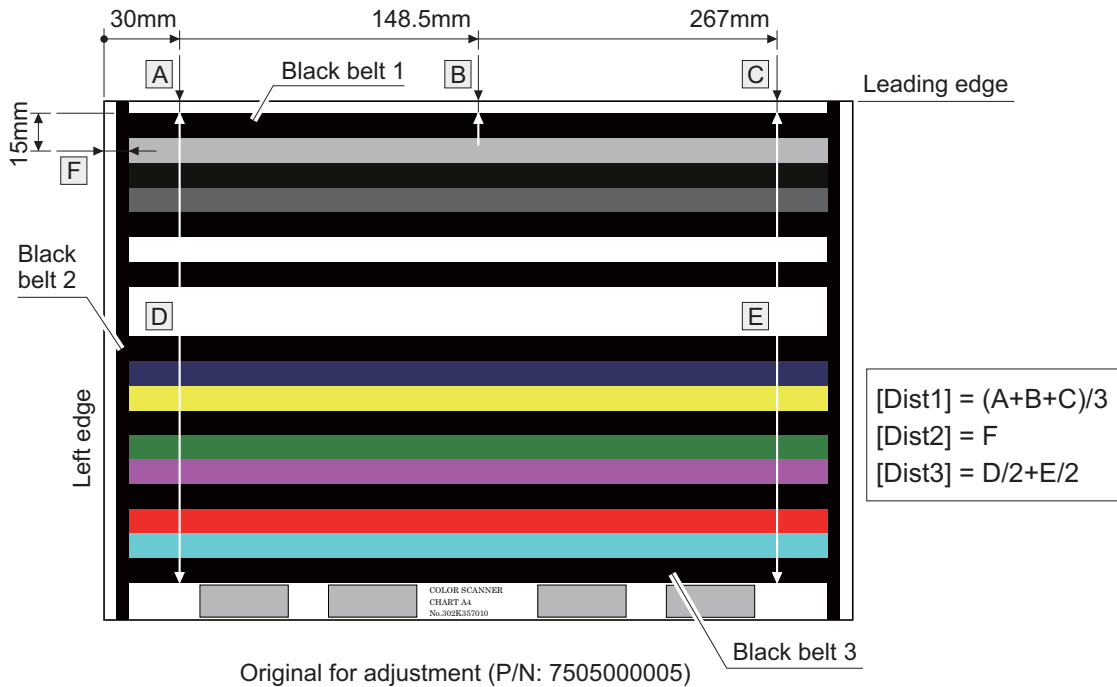


- 1) Measure the distance [A], [B] and [C] as follows. (A: Position of 30mm from the left edge, B: position of 105mm from the left edge, C: position of 180mm from the left edge)  
(Measure the distance up to the top edge of the black band 1.  
2) Apply the following formula for the values obtained:  $((A+B+C)/3)$
- 2 Enter the calculation result to [Lead] using the [+] [-] key.
- 3 Press [Start] key to set the setting value.
- 4 Measure the distance [F] from the left edge to the right edge of the black band 2 on the adjustment original.  
Measurement method  
1) Measure the distance [F] from the left edge at 21mm from the top edge of black band 1 to the right edge of black band 2.
- 5 Enter the measured values to [Main Scan] using the [+] [-] keys.
- 6 Press [Start] key to set the setting value.
- 7 Measure the distance [D] and [E] from the top edge of black band 1 to the bottom edge of black bar 3 on the adjustment original at two positions.  
Measurement method  
1) Measure the distance [D] and [E] between two points as follows. (D: Measure the distance from the leading edge to the trailing edge of black band 3 on the adjustment original at 30mm of the left edge and deduct A. E: Measure the distance from the leading edge to the trailing edge of black belt 3 on the adjustment original at

180mm of the left edge and deduct C.)

2) Apply the following formula for the values obtained:  $(D/2+E/2)$

- 8 Enter the result value to [Sub Scan] using the [+] [-] key.
- 9 Press [Start] key to set the setting value.



### Setting: DP(ChartB)

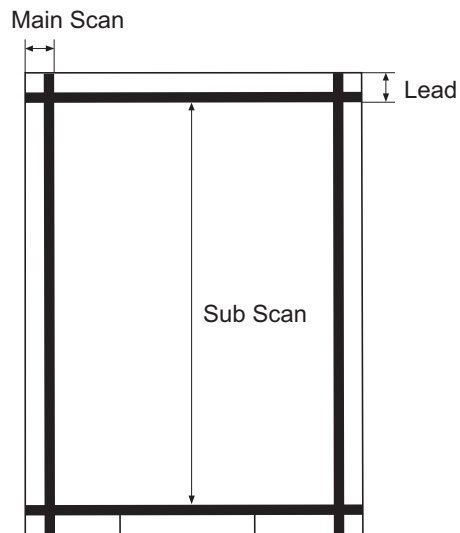
#### NOTE

This setting is normally not necessary.

Items	Contents	Setting range	Initial setting	Data variation
Lead	Set the adjustment value of the leading edge	0.0 to 16.0	15.0	0.1mm
Main Scan	Set the adjustment value of the left edge	0.0 to 16.0	15.0	0.1mm
Sub Scan	Set the adjustment value of the trailing edge	0.0 to 392.0	390.0	0.1mm

- 1 Measure the distance [A] from the leading edge to the black belt (inside) on the adjustment original.

- 2 Enter the measured value in [Lead] using the [+] [-] key.
- 3 Measure the distance [B] from the left edge to the black belt (inside) on the adjustment original.
- 4 Enter the measured values in [Main Scan] using the [+] [-] key.
- 5 Measure the distance [C] from the leading black belt (inside) to the trailing black belt (inside) on the adjustment original.
- 6 Enter the measured values in [Sub Scan] using the [+] [-] key.
- 7 Press [Start] key to set the setting value.



Original for adjustment Chart 2-2 (P/N: 302AC68243)

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U429 Adjusting the color balance offset

(Message: Adjust Color Balance Offset)

### Contents

Display/changes the density of each color in various image quality mode.

### Purpose

Execute to change each color balance.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Text+Photo	Density of each color in the text+photo mode
Photo	Density of each color in the photo mode
Photo/Printout	Density of each color in the printed photo mode
Text	Density of each color in the text mode
Graphics/Map	Density of each color in the map mode
Copy/Printout	Density of each color in the printed document mode

### Setting: Text+Photo/Photo/(Photo/Printout)/Text/(Graphics/Map)

- 1 Select the item to check.
- 2 By using [+] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
C	Cyan color balance offset value	-5 to 5	0	-
M	Magenta color balance offset value	-5 to 5	0	-
Y	Yellow color balance offset value	-5 to 5	0	-
K	Black color balance offset value	-5 to 5	0	-

When the setting value is increased, the image gets darker, and it is lighter when the setting value is decreased.

### Setting: Copy/Printout

- 1 Select the item to check.
- 2 By using [+] or the numeric keys, enter the Lab values which are shown on the surface page of the adjustment original.

Items	Contents	Setting range	Initial setting	Data variation
C	Cyan color balance offset value	0 to 10	5	-
M	Magenta color balance offset value	0 to 10	5	-
Y	Yellow color balance offset value	0 to 10	5	-
K	Black color balance offset value	0 to 10	5	-

When the setting value is increased, the image gets darker, and it is lighter when the setting value is decreased.

- 3 Press [Start] key to set the setting value.

**NOTE**

Test copy is available by pressing [System Menu/Counter] key as interruption copy mode while this maintenance mode is running.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U460 Conveying sensor adjustment

### (Message: Adjust Conveying Sensor)

#### Contents

Correct the threshold of multi feed sensor in DP.

- Only if DP-7130 and side multi tray are installed

#### Purpose

In case that multiple feed happen frequently, adjust the threshold based on the environment.

#### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
DP	Adjust/Set DP conveying sensor
SMT	Adjust/Set SMT conveying sensor

#### Execute: DP/SMT

1 Select the item to set.

Items	Contents
Conveying Sensor	Setting the multi feed sensor/Executing the calibration
On/Off Config	Setting the multi feed sensor switch ON/OFF

\* Initial setting: On

2 Press [Start] key to set the setting value.

#### Setting: Conveying Sensor

1 Select the item to set.

Items	Contents	Setting range	Initial setting	Data variation
Sensor(Non-P)*	Display the sensor value when there is no paper	Display only	-	-
Sensor*	Display the sensor value when there is paper	Display only	-	-
Threshold(Single)	Paper conveying threshold setting	0 to 255	0	1
Threshold(Multi)	Multi feed threshold setting	0 to 255	0	1
Execute	Executing Calibration	-	-	-

#### Setting: Threshold(Single)/(Multi)

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Threshold(Single)	Paper conveying threshold setting	0 to 255	0	1
Threshold(Multi)	Multi feed threshold setting	0 to 255	0	1

- 3 Press [Start] key to set the setting value.

**Method: Execute**

- 1 Select [Execute].
- 2 Press [Start] key.  
AC calibration is started.

**Setting: On/Off Config**

- 1 Select [On] or [Off].

Items	Contents
On	Enable multi feed detection
Off	Disable multi feed detection

Initial setting: On

- 2 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key  
Return to the screen for selecting the maintenance item number.

## U464 ID correction setting

(Message: Set ID Adjustment Mode)

### Contents

Set permission/prohibition of the ID correction operation (calibration). And also, execute each setting of the calibration.

### Purpose

Execute the calibration setting when an image failure occurs or depending on the user's request.

Execute Calibration when replacing the maintenance kit.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Permission	Permit/Prohibit Calibration
Time Interval	Set the time interval to execute calibration after completing printing
Mode	Set execution cycle of the calibration
On/Sleep Out	Calibration operation setting (power-up/recovery from sleep mode)
AP/NE	Calibration operation permission setting (AP/NE)
Leaving Time	Setting the time to determine whether to execute calibration when recovering from Sleep mode
Driving Time	Setting the time to determine whether to execute calibration when printing from driving time
Timing	Setting the execution timing by drive time
Target Value	Setting the target sensor value for the toner thick layer calibration and light intensity calibration
Print Rate(B/W)	Setting the B/W calibration target value
Calib	Executing Calibration

### Setting: Permission

1 Select [On] or [Off].

Items	Contents
On	1: Permit Calibration
Off	0: Prohibit Calibration

Initial setting: On

2 Press [Start] key to set the setting value.

### Setting: Time Interval

- In case of setting the mode to Custom, following changes are reflected.



- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Data variation
Time(sec)	Calibration execution interval time	0 to 9999	sec

Setting is changeable in 1 count increments

#### Default setting value

Items	83/70ppm	73/65ppm
Timing	480	480

- 2 Press [Start] key to set the setting value.

#### Setting: Mode

- 1 Select the item to set.

Items	Contents
Short	0: Calibration execution cycle setting: Short
Normal	1: Calibration execution cycle setting: Normal
Long	2: Calibration execution cycle setting: Long
Custom	3: Calibration execution cycle setting: Custom
Auto	4: Calibration execution cycle setting: Auto

Initial setting: Normal

- 2 Press [Start] key to set the setting value.

#### Setting: On/Sleep Out

- 1 Select [On] or [Off].

Items	Contents
On	1: Permit Calibration
Off	0: Prohibit Calibration

Initial setting: On

- 2 Press [Start] key to set the setting value.

#### Setting: AP/NE

- 1 Select [On] or [Off].

Items	Contents
On	1: Permit Calibration
Off	0: Prohibit Calibration

Initial setting: On

- 2 Press [Start] key to set the setting value.

#### Setting: Leaving Time

- In case of setting the mode to Custom, following changes are reflected.

- 1 By using [+] [-] keys change the setting value.

Items	Contents	Setting range	Default setting value	Data variation
Time(min)	Setting the sleep timer	0 to 480	480	min

- 2 Press [Start] key to set the setting value.

#### Setting: Driving Time

- In case of setting the mode to Custom, following changes are reflected.

- 1 By using [+] [-] keys change the setting value.

Items	Contents	Setting range	Default setting value	Data variation
Time(sec)	Setting the driving standard time	300 to 3000	300	sec

- 2 Press [Start] key to set the setting value.

#### Setting: Timing

- In case of setting the mode to Custom, following changes are reflected.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Time(sec)	Setting continuous printing standard time	0 to 3600	3600	sec

- 2 Press [Start] key to set the setting value.

#### Setting: Target Value

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Thickness (C)	Toner layer calibration (Cyan)	0 to 1000	870
Thickness (M)	Toner layer calibration (Magenta)	0 to 1000	890
Thickness (Y)	Toner layer calibration (Yellow)	0 to 1000	878
Thickness (K)	Toner layer calibration (Black)	0 to 1000	140
Gamma (C)	Light amount calibration (Cyan)	0 to 500	384
Gamma (M)	Light amount calibration (Magenta)	0 to 500	344
Gamma (Y)	Light amount calibration (Yellow)	0 to 500	366
Gamma (K)	Light amount calibration (Black)	0 to 500	364

- 3 Press [Start] key to set the setting value.

#### Setting: Print Rate(B/W)

- In case of setting the mode to Custom, following changes are reflected.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Threshold	Proportion of black/white printing (Threshold)	1 to 100	50	%

- 2 Press [Start] key to set the setting value.

**Method: Calib**

- 1 Select [Execute].
- 2 Press [Start] key.  
Calibration is started.

Items	Contents
Execute	Executes Full Calibration

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

**U465 ID correction data**

(Message: ID Adjustment Data)

**Contents**

Refers to the ID correction data

**Purpose**

Execute for data check

**Method**

- 1 Press [Start] key.
- 2 Select the item to check.  
Switch to each display screen.

Items	Contents
TCONT	Developer bias control value before and after ID correction
Laser Power	Display the light intensity control value
Laser Power(En)	Display the exposure level (En)
Laser Power(Drum)	Display the half exposure level of the drum (Drum)
Laser Power(Max)	Display the maximum exposure level (Max)
Bias Calib	Sensor value for the toner layer calibration
T7 CTD	T7 control value
Stress	Primary transfer belt durability

**Method: Execute**

## 1 Select [TCONT].

The current value is displayed.

Items	Contents	Setting range	Default setting value
Before (C)	Cyan developer bias control value before ID correction	-128 to 127	-
Before (M)	Magenta developer bias control value before ID correction	-128 to 127	-
Before (Y)	Yellow developer bias control value before ID correction	-128 to 127	-
Before (K)	Black developer bias control value before ID correction	-128 to 127	-
After (C)	Cyan developer bias control value after ID correction	-128 to 127	0
After (M)	Magenta developer bias control value after ID correction	-128 to 127	0
After (Y)	Yellow developer bias control value after ID correction	-128 to 127	0
After (K)	Black developer bias control value after ID correction	-128 to 127	0

**Setting: Laser Power**

The current value is displayed.

Items	Contents	Setting range	Default setting value
C	Display the Cyan light intensity control value	0 to 255	100
M	Display the Magenta light intensity control value	0 to 255	100
Y	Display the Yellow light intensity control value	0 to 255	100
K	Display the Black light intensity control value	0 to 255	100

**Setting: Laser Power(En)**

The current value is displayed.

Items	Contents	Setting range	Default setting value
C	Display the Cyan light intensity control value (En)	Display only	0
M	Display the Magenta light intensity control value (En)	Display only	0
Y	Display the Yellow light intensity control value (En)	Display only	0
K	Display the Black light intensity control value (En)	Display only	0

**Setting: Laser Power(Drum)**

The current value is displayed.

Items	Contents	Setting range	Default setting value
C	Display the Cyan light intensity control value (Drum)	Display only	0
M	Display the Magenta light intensity control value (Drum)	Display only	0
Y	Display the Yellow light intensity control value (Drum)	Display only	0
K	Display the Black light intensity control value (Drum)	Display only	0

**Setting: Laser Power(Max)**

The current value is displayed.

Items	Contents	Setting range	Default setting value
C	Display the Cyan light intensity control value (Max)	Display only	0
M	Display the Magenta light intensity control value (Max)	Display only	0
Y	Display the Yellow light intensity control value (Max)	Display only	0
K	Display the Black light intensity control value (Max)	Display only	0

**Method: Bias Calib**

The current value is displayed.

Items	Contents	Setting range	Default setting value
C	Sensor value for toner thick layer calibration (cyan)	-	-
M	Sensor value for toner thick layer calibration (Magenta)	-	-
Y	Sensor value for toner thick layer calibration (Yellow)	-	-
K	Sensor value for toner thick layer calibration (Black)	-	-

**Execute: T7 CTD**

The current value is displayed.

Items	Contents	Setting range	Default setting value
C	T7 control value (Cyan)	-	0
M	T7 control value (Magenta)	-	0
Y	T7 control value (Yellow)	-	0
K	T7 control value (Black)	-	0

**Method: Stress**

The current value is displayed.

Items	Contents	Setting range	Default setting value
Front	Primary transfer belt durability (Front)	Display only	Fluctuation due to sensor value
Rear	Primary transfer belt durability (Rear)	Display only	Fluctuation due to sensor value

**Completion**

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U467 Color registration correction operation setting

(Message: Set Color Regist Adjustment Mode)

### Contents

Color registration correction operation setting

Also, Set the execution condition of the color registration correction by the LSU temperature variation.

### Purpose

If the color registration is unstable due to the sensor failure, etc., set it to Off to temporarily fix the control value.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Color Regist	Set the color registration correction
Timing	Execute the color registration correction if the LSU temperature changes by the specified value after the previous correction

### Setting: Color Regist

1 Select the item to set.

Items	Contents
On	1: Permitting the color registration correction operation
Off	0: Prohibiting the color registration correction operation

Initial setting: On

2 Press [Start] key to set the setting value.

### Setting: Timing

1 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
LSU Temp	Execution condition by the LSU temperature variation	2 to 10	5	-

2 Press [Start] key to set the setting value.

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U468 Color registration correction data

(Message: Color Regist Adjustment Data)

### Contents

Display the color registration correction data and transfer belt speed correction data.

### Purpose

Execute for data check

### Method

- 1 Press [Start] key.
- 2 Select the item to display.  
Transit to selection screen.

Items	Contents
V Correction	Display the primary transfer belt speed adjustment value
Auto(C)	Display the automatic color registration correction value (Cyan)
Auto(M)	Display the automatic color registration correction value (Magenta)
Auto(Y)	Display the automatic color registration correction value (Yellow)
Manual(C)	Display the manual color registration correction value (Cyan)
Manual(M)	Display the manual color registration correction value (Magenta)
Manual(Y)	Display the manual color registration correction value (Yellow)

### Setting: V Correction

The current value is displayed.

Items	Contents
Status	Primary transfer belt speed adjustment value

### Reference: Auto(C)/Auto(M)/Auto(Y)

The current value is displayed.

Items	Contents
Main Scan	Automatic color registration adjustment value in the main scanning direction
Sub Scan	Automatic color registration adjustment value in the sub scanning direction
Magnification	Automatic color registration correction value for magnification

### Reference: Manual(C)/Manual(M)/Manual(Y)

The current value is displayed.

Items	Contents
Main Scan	Manual color registration adjustment value in the main scanning direction
Sub Scan	Manual color registration adjustment in the sub scanning direction
Magnification1-6	Manual color registration correction value 1 for magnification 1-6

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U469 Primary transfer unit initial setting

(Message: Initial Set 1st Transfer Unit)

### Contents

Set the operation of the color registration correction and transfer belt speed correction

### Purpose

Adjust in case of color shift in printing

Execute when the drum unit or laser scanner unit is replaced

### ✔ IMPORTANT

Make sure to execute U464 Calib before executing this maintenance mode.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.
  - Select [Auto] to output the automatic adjustment chart.
  - Select [Manual] to enter the setting display.

Items	Contents
Auto	Executing the auto color registration correction
Manual	Executing the manual color registration correction
Belt Initialize	Executing the primary transfer belt speed correction
Belt Check	Check the transfer belt position

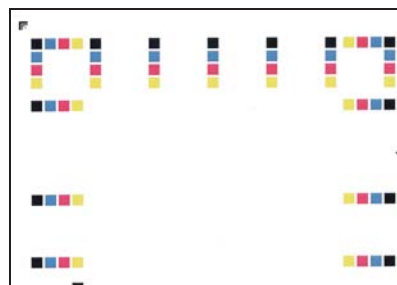
#### Method: Auto

- 1 Select the item to execute.

Items	Contents
Print	Output the automatic adjustment chart
Execute	Start scanning and execute the automatic adjustment

#### Method: Print

- 1 Press [Start] key.
  - Output the automatic adjustment chart.



Adjustment chart

#### Method: Execute

- 1 Place an original on the table and press [Start] key.
  - Execute the automatic adjustment.

- 2 When adjustment has normally completed, [OK] is displayed.

An error code appears when there is an error.

**Error code list**

Occurrence position	Error code	Paper factors
Scanner	S001	Original reference patch is not detected
	S002	Scanned image position shifted in excess in the main scanning direction
	S003	Scanned image position shifted in excess in the sub scanning direction
	S004	Original skew is in excess
	S005	Original type mismatch
	SFFF	Other scanning failure
Engine	E001	Engine status error
Controller	CFFF	Other errors

**Method: Manual**

- 1 Select the item to execute.

The screen for setting is displayed.

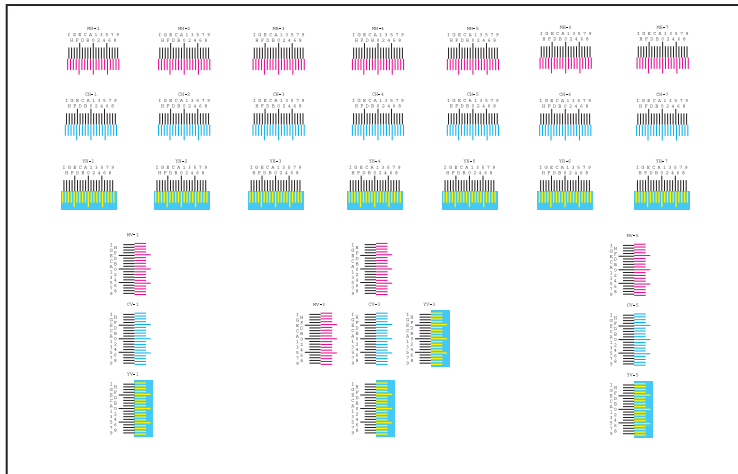
Items	Contents
Regist	Set the color registration adjustment value
Print	Output the manual adjustment chart

**Method: Print**

- 1 Press [Start] key to output the manual adjustment chart.

Chart sample

Print the chart that have H-1 to 7 for M (Magenta), C (Cyan) and Y (Yellow) (upper part) and V-1, 3, 5 (lower part).

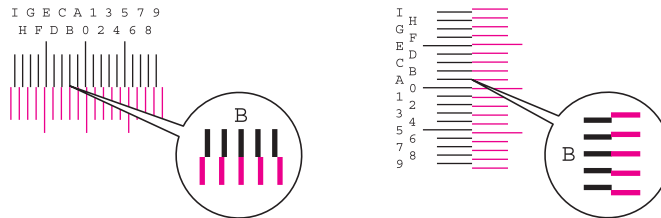


Find the positions where two lines are best matched on each chart.

If it is in [1] to [A], then the correction is unnecessary.

In case of the illustration below, [B] (-2) is the value that should be set.

A to I are for -1 to 9.



### Method: Regist

- 1 Select the item to set.
- 2 By using [\*] [#] keys change the setting value.
- 3 Change the screen using the [▲][▼] key.

Items	Contents	Setting range	Default setting value
CH-1	CH-1 adjustment value	-9 to 9	-
CH-2	CH-2 adjustment value	-9 to 9	-
CH-3	CH-3 adjustment value	-9 to 9	-
CH-4	CH-4 adjustment value	-9 to 9	-
CH-5	CH-5 adjustment value	-9 to 9	-
CH-6	CH-6 adjustment value	-9 to 9	-
CH-7	CH-7 adjustment value	-9 to 9	-
CV-3	CV-3 adjustment value	-9 to 9	-
MH-1	MH-1 adjustment value	-9 to 9	-
MH-2	MH-2 adjustment value	-9 to 9	-

Items	Contents	Setting range	Default setting value
MH-3	MH-3 adjustment value	-9 to 9	-
MH-4	MH-4 adjustment value	-9 to 9	-
MH-5	MH-5 adjustment value	-9 to 9	-
MH-6	MH-6 adjustment value	-9 to 9	-
MH-7	MH-7 adjustment value	-9 to 9	-
MV-3	MV-3 adjustment value	-9 to 9	-
YH-1	YH-1 adjustment value	-9 to 9	-
YH-2	YH-2 adjustment value	-9 to 9	-
YH-3	YH-3 adjustment value	-9 to 9	-
YH-4	YH-4 adjustment value	-9 to 9	-
YH-5	YH-5 adjustment value	-9 to 9	-
YH-6	YH-6 adjustment value	-9 to 9	-
YH-7	YH-7 adjustment value	-9 to 9	-
YV-3	YV-3 adjustment value	-9 to 9	-

- 4 Press [Start] key to set the setting value.
- 5 Press [Start] key after completing input number.  
Color registration correction starts.
- 6 Output the automatic adjustment chart again.
- 7 Confirm if the gauge match within [1] to [A].

**Method: Belt Initialize**

- 1 Select [Execute].
- 2 Press [Start] key.  
Primary transfer belt speed correction starts.

- 3 When adjustment has normally completed, [OK] is displayed.

An error code appears when there is an error.

#### Error code list

Codes	Contents	Codes	Contents
1	Main unit cover open	42	Background measurement error2
2	Toner empty	51	IO (AM) Calibration error 1
3	Waste toner over-filled	52	IO (AM) Calibration error 2
4	Detecting the service call error	53	IO (AM) Calibration error 3
19	No discharge detection error C	54	IO (AM) Calibration error 4
20	No discharge detection error M	55	IO Calibration error 5
21	No discharge detection error Y	56	IO (FM) Calibration error 1
22	No discharge detection error K	57	IO (FM) Calibration error 2
31	ID sensor correction error 1	58	IO (FM) Calibration error 3
32	ID sensor correction error 2	59	IO (FM) Calibration error 4
33	ID sensor solenoid operation error	60	Toner thick layer calibration error
34	ID sensor solenoid sequence error	70	Light amount calibration error
41	Background measurement error 1	80	Color registration correction error

#### Display: Result

- 1 Select [Result].

- 2 Press [Start] key.

The result is displayed on screen.

Items	Contents
Base Spd Temp	Transfer belt temperature
Belt Spd Adj	Primary transfer belt speed adjustment value

#### Method: Belt Check

- 1 Select [Mode].

Select [Color] or [B/W].

Display	Description
Angle	Display the cam position
Belt Position	Display the belt position
Mode	Operation mode (Initial setting value: B/W)
Execute	The execution of the belt position check

- 2 Select [Execute].

- 3 Press [Start] key.

The transfer belt position check is started and the value is displayed.

#### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U470 Setting the JPEG compression rate

### (Message: Adjust JPEG Compression Rate)

#### Contents

Set the JPEG compression rate by image mode.

#### Purpose

Change the setting depending on the image desired by the user. Lower the set value to reduce the image roughness by changing the compression rate in case of 200% or more of the enlarged copy. If the set value is reduced, compression is high and image quality is lowered. If the set value is increased, image quality is improved but processing speed is slower.

#### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Copy	Compression rate of the copy
Send	Compression rate of the Send
System	Compression rate of the temporary saving in the system
Print	Compression rate of the printer

#### Method: Copy

1 Select the item to set.

The screen for setting is displayed.

Items	Contents
Photo	Compression rate of the photo mode
Text	Compression rate of the text mode

#### Setting: Photo

1 Select the item to check.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Luminance	Compression rate of the brightness	1 to 10	10	1%
Chrominance	Compression rate of the color difference	1 to 10	10	1%

3 Press [Start] key to set the setting value.

#### Setting: Text

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Luminance	Compression rate of the brightness	1 to 10	10	1%
Chrominance	Compression rate of the color difference	1 to 10	10	1%

- 3 Press [Start] key to set the setting value.

**Method: Send**

- 1 Select the item to set.

The screen for setting is displayed.

Items	Contents
Photo	Compression rate of the photo mode
Text	Compression rate of the text mode
HC-PDF(BG)	Set the compression rate for high compression PDF
HC-PDF(Char)	Set the compression rate for High compression PDF (text color).
HC-PDF(File Size)	Set the compression rate for High compression PDF (compression priority).

**Setting: Photo**

- 1 Select the item to check.  
 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Y1	Compression rate of the brightness	1 to 100	30 (%)	1%
Y2	Compression rate of the brightness	1 to 100	40 (%)	1%
Y3	Compression rate of the brightness	1 to 100	51 (%)	1%
Y4	Compression rate of the brightness	1 to 100	70 (%)	1%
Y5	Compression rate of the brightness	1 to 100	90 (%)	1%
CbCr1	Compression rate of the color difference	1 to 100	30 (%)	1%
CbCr2	Compression rate of the color difference	1 to 100	40 (%)	1%
CbCr3	Compression rate of the color difference	1 to 100	51 (%)	1%
CbCr4	Compression rate of the color difference	1 to 100	70 (%)	1%
CbCr5	Compression rate of the color difference	1 to 100	90 (%)	1%

- 3 Press [Start] key to set the setting value.

**Setting: Text**

- 1 Select the item to set.  
 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Y1	Compression rate of the brightness	1 to 100	30 (%)	1%
Y2	Compression rate of the brightness	1 to 100	40 (%)	1%
Y3	Compression rate of the brightness	1 to 100	51 (%)	1%
Y4	Compression rate of the brightness	1 to 100	70 (%)	1%
Y5	Compression rate of the brightness	1 to 100	90 (%)	1%
CbCr1	Compression rate of the color difference	1 to 100	30 (%)	1%
CbCr2	Compression rate of the color difference	1 to 100	40 (%)	1%

Items	Contents	Setting range	Default setting value	Data variation
CbCr3	Compression rate of the color difference	1 to 100	51 (%)	1%
CbCr4	Compression rate of the color difference	1 to 100	70 (%)	1%
CbCr5	Compression rate of the color difference	1 to 100	90 (%)	1%

3 Press [Start] key to set the setting value.

#### Setting: HC-PDF(BG)

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Y1	Compression rate of the brightness	1 to 100	15 (%)	1%
Y2	Compression rate of the brightness	1 to 100	25 (%)	1%
Y3	Compression rate of the brightness	1 to 100	90 (%)	1%
CbCr1	Compression rate of the color difference	1 to 100	15 (%)	1%
CbCr2	Compression rate of the color difference	1 to 100	25 (%)	1%
CbCr3	Compression rate of the color difference	1 to 100	90 (%)	1%

3 Press [Start] key to set the setting value.

#### Setting: HC-PDF(Char)

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Y1	Compression rate of the brightness	1 to 100	15 (%)	1%
Y2	Compression rate of the brightness	1 to 100	75 (%)	1%
Y3	Compression rate of the brightness	1 to 100	90 (%)	1%
CbCr1	Compression rate of the color difference	1 to 100	15 (%)	1%
CbCr2	Compression rate of the color difference	1 to 100	75 (%)	1%
CbCr3	Compression rate of the color difference	1 to 100	90 (%)	1%

3 Press [Start] key to set the setting value.

#### Setting: HC-PDF(File Size)

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Y1	Compression rate of the brightness	1 to 100	15 (%)	1%
Y2	Compression rate of the brightness	1 to 100	25 (%)	1%
Y3	Compression rate of the brightness	1 to 100	75 (%)	1%



Items	Contents	Setting range	Default setting value	Data variation
CbCr1	Compression rate of the color difference	1 to 100	15 (%)	1%
CbCr2	Compression rate of the color difference	1 to 100	25 (%)	1%
CbCr3	Compression rate of the color difference	1 to 100	75 (%)	1%

3 Press [Start] key to set the setting value.

#### Setting: System

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Y	Compression rate of the brightness	1 to 100	90 (%)	1%
CbCr	Compression rate of the color difference	1 to 100	90 (%)	1%

3 Press [Start] key to set the setting value.

#### Setting: Print

1 Select the item to set.

2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Luminance	Compression rate of the brightness	1 to 10	7 (%)	1%
Chrominance	Compression rate of the color difference	1 to 10	7 (%)	1%

3 Press [Start] key to set the setting value.

#### NOTE

Test copy of the original is available by pressing [System Menu/Counter] key as interruption copy mode when executing this maintenance mode.

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.

(Feed cassette/Conveying speed/Duplex printing/Rotation/Print Set/Output tray)

#### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U474 Checking the LSU cleaning

(Message: Check LSU Cleaning Operation)

### Contents

Execute the LSU cleaning by operating the LSI cleaning motor. Also, Set the cleaning operation interval and timing to enter the operation.

### Method

- 1 Press [Start] key.
- 2 Select the item to execute.

Items	Contents
Execute	Executes the LSU cleaning operation
Cycle	Set the LSU cleaning operation

### Method: Execute

- 1 Press [Start] key.  
The LSU slit glass is cleaned.

### Method: Cycle

- 1 Select the item to set.

Items	Contents	Setting range	Default setting value
Cnt	Set the LSU cleaning cycle	0 to 5000	1000
Timing	Set the LSU cleaning timing	0: Print End 1: Print	1: Print

### Setting: Cnt

- 1 Change the setting value by using [+] [-] keys or the numeric keys.  
Possible to set by 1000 sheets increments
- 2 Press [Start] key to set the setting value.

### Setting: Timing

- 1 Select the item to set.

Display	Description
Print	Cleaning during the job
Print End	Cleaning after completing the job

\* Initial setting: Print

- 2 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U485 Image process mode setting

(Message: Set Image Process Mode)

### Contents

Set the PDF image rotation method. Also, change/install the color table.

### Purpose

Execute to change the PDF image rotation method.

Execute to change the copy and printer color mode.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Mode	Set the image process mode
Color Table	Set the color table

### Setting: Mode

1 Select the item to set.

Items	Contents
PDF Rotation	Rotate the PDF image

2 Change the setting value by using [+] [-] keys or the numeric keys.

Setting	Contents
0	The image rotation is designated to the internal parameter
1	The image rotation is designated to the actual parameter
2	The image rotation is designated to the internal parameter (CTM rotation)

Initial setting: 0

3 Press [Start] key to set the setting value.

### Setting: Color Table

1 Select the item to set.

The screen for setting is displayed.

Items	Contents
Color Table 1(Prn)	Setting the default printer color table
Color Table 2(Prn)	Setting the custom printer color table
Color Table 1(Copy)	Setting the default Copy color table
Color Table 2(Copy)	Setting the custom Copy color table
Install	Installing the color table
Uninstall(Prn)	Uninstalling the printer color table
Uninstall(Copy)	Uninstalling the copy color table

### Setting: Color Table 1(Prn)/Color Table 2(Prn)

- 1 Display color table that is installed.
- 2 Select the printer color table to set.

Setting value
TYPE_CA
TYPE_FU
TYPE_KO
TYPE_KY <sup>*1</sup>
TYPE_RH
TYPE_TO

\*1: TYPE\_KY can be used to back to factory default

- 3 Press [Start] key to set the setting value.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

#### Setting: Color Table 1(Copy)/Color Table 2(Copy)

- 1 Display color table that is installed.
- 2 Select the item to set.

Setting value
TYPE_CA
TYPE_FU
TYPE_KO
TYPE_KY <sup>*1</sup>
TYPE_RH
TYPE_TO

\*1: CTYPE\_KY can be used to back to factory default

- 3 Press [Start] key to set the setting value.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

#### Method: Install

Insert the USB drive with the color table files before selecting them.

Check if there is the color table file in the root folder of a USB drive.

- 1 Select [Execute].

Items	Contents
Execute	Installing the color table

- 2 Press [Start] key to start installing.

The following is displayed after completing installation.

Code	Contents
OK	Completed normally
E002	The error in file operation
EEEE	Other errors

#### Method: Uninstall(Prn)/Uninstall(Copy)

- 1 Selects the color table to uninstall.
- 2 Possible to uninstall multiple items at the same time.

Setting value
TYPE_CA
TYPE_FU
TYPE_KO
TYPE_KY*1
TYPE_RH
TYPE_TO

- 3 Press [Start] key to set the setting value.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U486 Color/BW mode setting

(Message: Set ACS mode (Color/BW Operation))

### Contents

Set the operation mode after detecting color originals with color/BW mixed originals.

### Purpose

Mode: To prioritize the productivity when copying color/BW mixed originals in ACS mode, change the setting to Mode3. However, if setting it to Mode3, even when B/W originals come after color originals, C/M/Y developer maintenance counts are counted up.

Permission: set in case of color background image when printing an envelope in BW half speed mode processed as color printing.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Mode	Color/BW mode setting
Permission	Permit B/W printing at half speed

### Setting: Mode

1 Select the item to set.

Items	Contents
Mode1	For users mostly printing in B/W mode and color/BW mixed mode is not high during continuous printing B/W printing remains in the color process speed after switching to color and other process is switched
Mode2	For users mostly printing in B/W mode and color/BW mixed mode is high during continuous printing Even when receiving a B/W print request during color printing, color printing operation is continued until 9 pages and color mode is switched to B/W mode when starting printing of the 10th page (Color process is stopped)
Mode3	Appropriate for users who mostly print in color Once switched to the color mode, B/W printing after that remains in the color process including the surface speed
Auto	Select the mode 1 to 3 is automatically depending on the usage condition of the user Select Mode 1 to 3 based on color print ratio and switch rate from the print volume during the specified period

Initial setting: Mode2

2 Press [Start] key to set the setting value.

### Setting: Permission

1 Press [Start] key.

2 Select the item to set.

Items	Contents
On	Permit: B/W printing (three colors separated)
Off	Prohibit: color printing (four color process)

Default setting: Off

- 3 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U520 Remote Service Setting

(Message: Set Remote Service)

### Contents

Set the remote service.

### Purpose

Execute to use the remote service function.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
On/Off Config	Changes to the remote service setting screen

### Setting: On/Off Config

- 1 Select the item to set.

Items	Contents
On	Enable remote service function
Off	Disable remote service function

Default setting: Off

- 2 Press [Start] key to set the setting value.
- 3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U600 Initialize: All Data

(Message: Initialize: All Data)

### Contents

Initializes software switches, and all data and image memory in the backup data on the FAX PWB according to the destination and OEM setting.

Initializes the file system and then initializes the communication record and the registered contents if the file system is checked and an error is detected there.

### Purpose

Initialize the FAX PWB

### Method

- 1 Press [Start] key.
- 2 The screen for entering the country code and OEM code is displayed.
- 3 Select [Country Code] and enter a country code using the numeric keys.

Refer to the following country code list.

Items	Contents	Setting range
Country Code	Set the country code	0 to 255
OEM Code	Set the OEM code	0 to 255
Execute	Executing data initialization	

No need to change the default value of [OEM Code].

- 4 Select [Execute].

5 Press [Start] key to set the setting value.

Data initialization starts.

Press [Stop] key to cancel the data initialization.

The firmware version is displayed after the data initialization.

The firmware version of 3 types of application, boot and IPL is displayed.

When initialization is successful, "Completed" is displayed for one second.

Where an irregular value is input, when it initializes, the following errors are displayed.

Kind of error
Unknown Country (When Country Code is unknown)
Unknown OEM (When OEM Code is unknown)
Unknown Country (When both are unknown)

**Country code table**

Country code	Destination	Country code	Destination
000	Japan	181	North America *2
156	All Asia *1	181	South America *3
254	Taiwan	253	All Europe *4
097	Korea	009	Australia
038	China	126	New Zealand *5

\*1: Sales company for Singapore, India, Thailand and Hong Kong.

\*2: Sales company for USA, Mexico and Canada.

\*3: Sales company for Bolivia, Chile, Peru, Argentine and Brazil.

\*4: Sales company for Italy, Germany, Spain, UK, Holland, Sweden, France, Australia, Switzerland, Belgium, Denmark, Finland, Portugal, Ireland, Norway, Turkey, Russia, and Saudi Arabia.

\*5: In case of handling in New Zealand, the country code has to be set at sales company. In this case, the country code 126 has to be input.

## U601 Initialize: Keep data

(Message: Initialize: Keep Data)

### Contents

Initializes software switches other than the machine data on the FAX PWB according to the destination and OEM setting.

### Purpose

Initialize the FAX PWB without changing the user registration data and the factory defaults.

### Method

- 1 Press [Start] key.
- 2 The screen for entering the country code and OEM code is displayed.
- 3 Select [Country Code] and enter a country code using the numeric keys.  
Refer to the following country code list.

Items	Contents	Setting range
Country Code	Set the country code	0 to 255
OEM Code	Set the OEM code	0 to 255
Execute	Executing data initialization	

No need to change the default value of [OEM Code].

- 4 Select [Execute].
- 5 Press [Start] key to set the setting value.  
Data initialization starts.  
Press [Stop] key to cancel the data initialization.  
  
The firmware version is displayed after the data initialization.  
The firmware version of 3 types of application, boot and IPL is displayed.  
  
When initialization is successful, "Completed" is displayed for one second.

**U603 User data 1**

(Message: User Data 1)

**Contents**

Set the line type for FAX use.

**Purpose**

Execute as required.

**Method**

- 1 Press [Start] key.
- 2 Select [Line Type].

Items	Contents
Line Type	Line Type

- 3 Select the item to set.

Items	Contents
DTMF	DTMF
10PPS	10PPS
20PPS	20PPS

- 4 Press [Start] key to set the setting value.  
[Completed] is displayed.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U604 User data 2

### (Message: User Data 2)

#### Contents

Set the number of rings for the automatic FAX/telephone switching for FAX use.

#### Purpose

Adjust the number of rings to longer or shorter at the automatic FAX/telephone switching.

#### Method

- 1 Press [Start] key.
- 2 Select [Rings(F/T)].
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Rings(F/T)	Number of fax/telephone rings	0 to 15	-

If the default is set to "0", the main unit will start FAX reception without any ringing.

- 4 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Completion

- 5 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U605 Data clear

(Message: Clear Data)

### Contents

Initializes data related to the fax transmission such as transmission history or various ID.

### Purpose

Clear the communication history.

### Method

- 1 Press [Start] key.
- 2 Select [Clear Com.Rec.].

Items	Contents
Com.Rec.	Delete data of communication history and protocol list of displayed port

- 3 Press [Start] key.  
When initialization is successful, "Completed" is displayed for one second.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U610 System 1

### (Message: System Setting 1)

#### Contents

Set the number of lines to be ignored when receiving a fax at 100% magnification and in the auto reduction mode.

#### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Cut Line: 100%	Set the number of lines to be ignored when receiving a fax at 100% magnification
Cut Line: Auto	Number of lines to be ignored when receiving in the auto reduction mode
Cut Line: A4	Set the number of lines to be ignored when receiving a fax (A4R/LetterR) in the auto reduction mode

#### Setting: Cut Line(100%)

Set the maximum number of lines to be ignored if the received data volume exceeds the recording capacity.

If the number of excess lines is below the setting, those lines are ignored. If it is over the setting, they are recorded on the next page.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Set the number of lines to be ignored when receiving a fax at 100% magnification	0 to 22	3	-

Increase the setting value if a blank second page is output in the full magnification reception. Decrease the value if there is dropout in received image.

- 2 Press [Start] key to set the setting value.

#### Setting: Cut Line:Auto

Set the maximum number of lines to be ignored if the received data volume exceeds the recording capacity.

If the number of excess lines is below the setting, those lines are ignored. If over the setting, the entire data on a page is further reduced so that it can be recorded on the same page.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Number of lines to be ignored when receiving in the auto reduction mode	0 to 22	0	-

Increase the setting value if a page received in the reduction mode is reduced too much with the trailing edge margin. Decrease the value if there is dropout in received image.

- 2 Press [Start] key to set the setting value.

#### Setting: Cut Line:A4

Set the maximum number of lines to be ignored if the received data volume exceeds the recording capacity when the data is recorded in the auto reduction mode onto A4R or Letter R paper.

If the number of excess lines is below the setting, those lines are ignored. If over the setting, the entire data on a page is further reduced so that it can be recorded on the same page.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Number of lines to be ignored when receiving in the A4R/Letter auto reduction mode.	0 to 22	0	-

Increase the setting value if a page received in the reduction mode is reduced too much with the trailing edge margin.  
Decrease the value if there is dropout in received image.

- 2 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U611 System 2

### (Message: System Setting 2)

#### Contents

Set the number of adjustment lines for automatic reduction.

#### Purpose

Set the number of adjustment lines for automatic reduction.

#### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
ADJ LINES	Set the number of adjustment lines for automatic reduction
ADJ LINES(A4)	Number of adjustment lines for automatic reduction when A4 size paper is set
ADJ LINES(LT)	Number of adjustment lines for automatic reduction when letter size paper is set

#### Setting: ADJ LINES

Set the number of adjustment lines for automatic reduction

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Set the no. of lines to adjust at auto reduction mode	0 to 22	7	-

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: ADJ LINES(A4)

Set the number of adjustment lines for automatic reduction

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Number of adjustment lines for automatic reduction when A4 size paper is set	0 to 22	22	-

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: ADJ LINES(LT)

Number of adjustment lines for automatic reduction when letter size paper is set

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Number of adjustment lines for automatic reduction when letter size paper is set	0 to 26	26	-

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### **Completion**

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U612 System 3

### (Message: System Setting 3)

#### Contents

Set the FAX operation and automatic printing of the protocol list.

#### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Auto Reduction	Select auto reduction in the sub-scanning direction
Protocol List	Set automatic output of the protocol list

#### Setting: Auto Reduct

Set whether to receive a long document by automatically reducing it in the sub-scanning direction or at actual size.

- 1 Change display by pressing key.

Items	Contents
On	Auto reduction is executed if the received document is longer than the FAX paper.
Off	Auto reduction is not performed

Initial setting: On

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: Protocol List

Set the automatic protocol list printing

- 1 Change display by pressing key.

Items	Contents
Off	The protocol list is not printed out automatically
Error	Automatically printed if a communication error occurs
On	Automatically printed out after communication

Default setting: Off

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U615 System 6

### (Message: System Setting 6)

#### Contents

Set the record width capacity and process if 11 inch width paper is set for the inch specification machine.

#### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
RX WIDTH FOR 11"	Communicates to the destination unit 11"

#### Setting: RX WIDTH FOR 11"

1 Select the item to set.

Items	Contents
LEDGER	Transmit as the A3 width to the destination machine
B4	Transmit as the B4 width to the destination machine

Initial setting: LEDGER

2 Press [Start] key to set the setting value.

#### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U620 FAX System

### (Message: FAX System)

#### Contents

Set the signal detection method for remote switching.

Change the setting according to the type of telephone connected to the main unit.

#### Purpose

Set the remote switching conditions according to the user's telephone type, preference, etc.

#### Setting

- 1 Press [Start] key.
- 2 Select [Remote Mode] and press [Start] key.

Items	Contents
Remote Mode	Setting the remote switching mode

- 3 Select the item to set.

Items	Contents
One	Set the one-shot type detection
Cont	Set the continuous type detection

Initial setting: One

- 4 Press [Start] key to set the setting value.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U625 Communication settings

### (Message: Set Communication)

#### Contents

Set the auto redialing interval and the number of times of auto redialing.

#### Purpose

FAX transmission may not be available if redialing interval is short. If long, it takes much time to complete transmission. Change the setting value if the above phenomenon occurs.

#### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Interval	Set auto redialing interval
Times	Set the number of times of auto redialing

#### Setting: Interval

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Set redialing interval	1 to 9 (Min.)	-	-

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: Times

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range	Initial setting	Data variation
Set the number of times of redialing	0 to 15 (Times)	Times	-

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U630 Communication control 1

### (Message: Communication Control 1)

#### Contents

Set the FAX communication.

#### Purpose

Set the following to correspond to field claims.

- Reducing the transmission time to improve the accuracy of reception when using a low quality line.
- Improving the accuracy of communication during the international communication.

#### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
TX Speed	Set the communication starting speed
RX Speed	Set the reception speed
TX Echo	Set the waiting period to prevent echo problems at the sender
RX Echo	Set the reception speed

#### Setting: TX Speed

Set the transmission speed of the sender. However, if the destination unit has the V.34 capability, V.34 is selected for transmission regardless of this setting.

1 Select the communication speed.

Items	Contents
14400bps/V17	Set to V.17 14400bps
9600bps/V29	Set to V.29 9600bps
4800bps/V27ter	Set to V.27ter 4800bps
2400bps/V27ter	Set to V.27ter 2400bps

2 Press [Start] key to set the setting value.

[Completed] is displayed.

#### Setting: RX Speed

Set the reception capacity to advise the transmitter by the DIS/NSF signal. However, if the destination unit has the V.34 capability, V.34 is selected for transmission regardless of this setting.

1 Select the reception speed.

Items	Contents
14400bps	Set to V.17, V.33, V.29, V.27ter
9600bps	Set to V.29, V.27ter
4800bps	Set to V.27ter
2400bps	Set to V.27ter (fallback only)

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: TX Echo

Set the time to send the DCS signal after the DIS signal is received. Execute when an error occurs with echo at the transmitter side.

- 1 Select the item to set.

Items	Contents
500	Sends the DCS 500 ms after receiving a DIS
300	Sends the DCS 300 ms after receiving a DIS

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: RX Echo

Set the time to send the NSF, CSI or DIS signal after the CED signal is received. Execute when an error occurs with echo at the receiver side.

- 1 Select the item to set.

Items	Contents
500	Sends the NSF, CSI or DIS 500ms after receiving the CED
75	Sends the NSF, CSI or DIS 75ms after receiving the CED

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.



## U631 Communication control 2

(Message: Communication Control 2)

### Contents

Set the FAX communication.

### Purpose

Set the transmission and reception of ECM.

Set the CED frequency.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
ECM TX	Set ECM transmission
ECM RX	Set ECM reception
CED Freq	Setting the frequency of CED signal

### Setting: ECM TX

Set to OFF when the reduction of transmission costs is of higher priority than image quality.



#### NOTE

Do not set it to OFF when connecting to the IP (Internet Protocol) telephone line.

1 Select the item to set.

Items	Contents
On	ECM transmission is enabled
Off	ECM transmission is disabled

1 Press [Start] key. Confirm the setting values.

[Completed] is displayed.

### Setting: ECM RX

Set to OFF when the reduction of transmission costs is of higher priority than image quality.



#### NOTE

Do not set it to OFF when connecting to the IP (Internet Protocol) telephone line.

1 Select the item to set.

Items	Contents
On	ECM reception is enabled
Off	ECM reception is disabled

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: CED Freq

Set the frequency of the CED signal. Execute it as one of the communication accuracy improvement measures for the international communication.

- 1 Select the item to set.

Items	Contents
2100	Set to 2100Hz
1100	Set to 1100Hz

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

**\_U632 Communication control 3****(Message: Communication Control 3)****Contents**

Set the FAX communication.

**Purpose**

Reducing the error communication when using a low quality line.

Corresponds to field claims when automatic FAX/telephone switching.

**Method**

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
DIS 4Byte	Set if the signal is fixed to 4 bytes
Num OF CNG(F/T)	Set the number of the CNG detection in the automatic FAX/telephone switching mode

**Setting: DIS 4Byte**

Set whether to send bit 33 and later bits of the DIS/DTC signal.

1 Select the item to set.

Items	Contents
On	Bit 33 and later bits of the DIS/DTC signal are not sent
Off	Bit 33 and later bits of the DIS/DTC signal are sent

2 Press [Start] key to set the setting value.

[Completed] is displayed.

**Setting: Num OF CNG(F/T)**

Set the CNG detection times in the automatic FAX/telephone switching mode.

1 Select the item to set.

Items	Contents
1Time	Setting to detect CNG once
2Time	Setting to detect CNG twice

2 Press [Start] key to set the setting value.

[Completed] is displayed.

**Completion**

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U633 Communication control 4

### (Message: Communication Control 4)

#### Contents

Set the FAX communication.

#### Purpose

Reducing the error communication when using a low quality line.

#### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
V.34	Enables or disables the V.34 communication
V.34-3429Hz	Set the V.34 symbol speed (3429 Hz)
DIS 2Res	Set the number of times of DIS signal reception
RTN Check	Set the reference for the RTN signal output

#### Setting: V.34

Set whether to enable/disable the V.34 communication individually for transmission and reception.

1 Select the item to set.

Items	Contents
On	V.34 communication is enabled for both transmission and reception
TX	V.34 communication is enabled for transmission only
RX	V.34 communication is enabled for reception only
Off	V.34 communication is disabled for both transmission and reception

2 Press [Start] key to set the setting value.

[Completed] is displayed.

#### Setting: V.34-3429Hz

Set if the V.34 symbol speed 3429 Hz is used.

1 Select the item to set.

Items	Contents
On	V.34 symbol speed 3429 Hz is used
Off	V.34 symbol speed 3429 Hz is not used

2 Press [Start] key to set the setting value.

[Completed] is displayed.

#### Setting: DIS 2Res

Set the number of times to receive the DIS signal to once or twice. it as one of the corrective measures for transmission errors and other problems.

- 1 Select the item to set.

Items	Contents
Once	Respond to the first signal
Twice	Respond to the second signal

- 1 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: RTN Check

Set the error line rate to be a reference to the RTN signal transmission. If transmission errors occur frequently due to the line quality, lower this setting to reduce them.

- 1 Select the item to set.

Items	Contents
5%	Setting the error line rate to 5%
10%	Setting the error line rate of 10%
15%	Setting the error line rate to 15%
20%	Setting the error line rate to 20%

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U634 Communication control 5

(Message: Communication Control 5)

### Contents

Set the maximum number of error bytes judged acceptable when receiving a TCF signal. Execute it as one of measures to ease transmission conditions if transmission errors occur.

### Purpose

Mitigate the communication conditions.

### Setting

- 1 Press [Start] key.
- 2 Select [TCF Check].
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range
TCF Check	Set the allowed error bytes when detecting the TCF signal	0 to 255

- 4 Press [Start] key to set the setting value.  
[Completed] is displayed.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U640 Communication time setting 1

### (Message: Communication Time 1)

#### Contents

Set the detection time when one-shot detection is selected for remote switching.

Set the detection time when continuous detection is selected for remote switching.

#### Purpose

Set the remote switching conditions according to the user's telephone type, preference, etc.

#### Method

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range
Time(One)	Set the one-shot detection time for remote switching	0 to 255
Time (Cont)	Set the continuous detection time for remote switching	0 to 255

- 4 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U641 Communication time setting 2

### (Message: Communication Time 2)

#### Contents

Set the time-out time for the fax communication.

#### Purpose

Mainly, executed to improve the accuracy of communication for international communication.

#### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
T0 TIME OUT	Set the T0 time-out time
T1 TIME OUT	Set the T1 time-out time
T2 TIME OUT	Set the T2 time-out time
Ta TIME OUT	Set the Ta time-out time
Tb1 TIME OUT	Set the Tb1 time-out time
Tb2 TIME OUT	Set the Tb2 time-out time
Tc TIME OUT	Set the Tc time-out time
Td TIME OUT	Set the Td time-out time

#### Setting: T0 Time Out

Set the time before detecting a CED or DIS signal after a dialing signal is sent.

Set to prevent disconnection of a line that occurs depending on the quality of the exchange, or when the destination unit Set the auto switching function.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the T0 time-out time	30 to 90 (s)

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: T1 Time Out

Set the time before receiving the correct signal after call reception.

This setting is normally not necessary.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the T1 time-out time	30 to 90 (s)

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: T2 Time Out

The T2 time-out time is specified as follows.



- From CFR signal output to image data reception
- From image data reception to the next signal reception
- In ECM, from RNR signal detection to the next signal reception

1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the T2 time-out time	1 to 255

2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: Ta Time Out

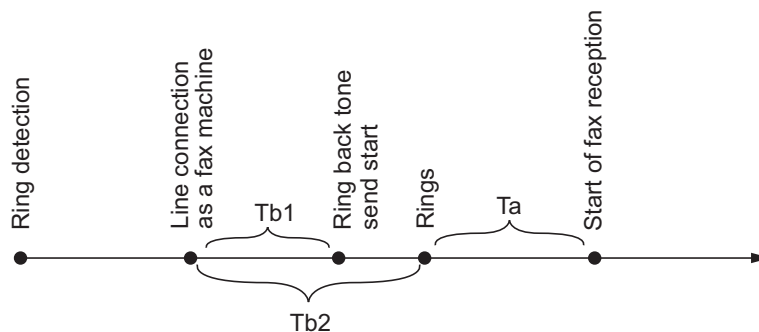
Set the time to start ringing for an operator through the external telephone after receiving a call in the FAX/telephone automatic switching mode (Refer to ). If either receiving a FAX signal within this time or passing this time, the mode automatically switches to the FAX reception mode. Execute when a reception error occurs when in the automatic FAX/telephone switching.

1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the Ta time-out time	1 to 255

2 Press [Start] key to set the setting value.

[Completed] is displayed.



### Setting: Tb1 Time Out

Set the time to start sending the ring back tone after receiving a call as a fax machine in the FAX/telephone automatic switching mode (Refer to ). Execute when a reception error occurs when in the automatic FAX/telephone switching.

1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the Tb1 time-out time	1 to 255

2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: Tb2 Time Out

Set the time to start ringing for an operator through the external telephone after receiving a call in the FAX/telephone automatic switching mode (Refer to ). Execute when a reception error occurs when in the automatic FAX/telephone switching.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the Tb2 time-out time	1 to 255

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: Tc Time Out

In the TAD mode, set the time to check if there are any triggers for shifting to FAX reception after a connected handset receives a call. Unless switched to FAX reception during this period, operated as a normal phone after this.

In the TAD mode, change the setting when fax reception is unsuccessful or a telephone fails to receive a call.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the Tc time-out time	1 to 255

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: Td Time Out

Set the length of time to determine silent status, one of the triggers for Tc time check.

In the TAD mode, change the setting when fax reception is unsuccessful or a telephone fails to receive a call. Be sure not to set too short, otherwise the mode may be switched to fax while the unit is being used as a telephone.

- 1 Change the setting value by using [+] [-] keys or the numeric keys.

Contents	Setting range
Set the Td time-out time	1 to 255

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U650 Modem 1

(Message: Modem 1)

### Contents

Set the G3 cable equalizer. Set the modem detection level.

### Purpose

Adjusts the equalizer to be compatible with the line characteristics.

Set to Improve the accuracy of communication when using a low quality line.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.

Items	Contents
Reg G3 TX Eqr	Set the G3 transmission cable equalizer
Reg G3 RX Eqr	Set the G3 reception cable equalizer
RX Modem Level	Set the modem detection level

### Setting: Reg G3 TX Eqr

- 1 Select [0dB], [4dB], [8dB] or [12dB].  
Initial setting: 0dB
- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

### Setting: Reg G3 RX Eqr

- 1 Select [0dB], [4dB], [8dB] or [12dB].  
Initial setting: 0dB
- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

### Setting: RX Mdm Level

- 1 Select [-33dBm], [-38dBm], [-43dBm] or [-48dBm].  
Initial setting: -43dBm
- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U651 Modem 2

(Message: Modem 2)

### Contents

Set the modem output level.

### Purpose

Adjust to make the equalizer compatible with the line characteristics when installing the main unit.

### Setting

- 1 Press [Start] key.
- 2 Select the item to set.
- 3 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range
Sgl LVL Modem	Set the modem output level	-15 to 0
DTMF LEV(Cent)	Set the DTMF output level (center value)	-15.0 to 0.0
DTMF LEV(Diff)	Set the DTMF output level (level difference)	0 to 5.5

- 4 Press [Start] key to set the setting value.  
[Completed] is displayed.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U660 Call Setting

(Message: Set Calls)

### Contents

Set the NCU (network control unit).

### Purpose

Execute as required.

### Method

1 Press [Start] key.

2 Select the item to set.

The screen for setting is displayed.

Items	Contents
Exchange	Setting the PBX/PSTN connection
Dial tone	Setting the PSTN dial tone detection
Busy tone	Setting the busy tone detection
PBX Setting	Setting the PBX connection
DC Loop	Setting the loop current detection before dialing

### Setting: Exchange

Select if the FAX is connected to either a PBX or public switched telephone network.

1 Select the item to set.

Items	Contents
PSTN	Connecting to the public switched telephone network
PBX	Connecting to the PBX

2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: Dial Tone

Selects whether or not to check for a dial tone to check if the telephone is off the hook when a fax is connected to a public switched telephone network.

1 Select the item to set.

Items	Contents
On	The dial tone is detected
Off	The dial tone is not detected

2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: Busy Tone

Set whether the line is disconnected immediately after a busy tone is detected, or the busy tone is not detected and the line remains connected until T0 time-out time, when a FAX signal is sent

FAX transmission may fail due to incorrect busy tone detection. When setting it to OFF, this problem may be improved. However, the line is not disconnected within the T0 time-out time even if the destination line is busy.

- 1 Select the item to set.

Items	Contents
On	The busy tone is detected
Off	The busy tone is not detected

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: PBX Setting

Selects the mode to connect an outside call when connected to a PBX.



### IMPORTANT

According to the type of the PBX connected, select the mode to connect an outside call.

- 1 Select the item to set.

Items	Contents
Flash	Flashing mode
Loop	Code number mode

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Setting: DC Loop

Set if the loop current is detected before dialing.

- 1 Select the item to set.

Items	Contents
On	Loop current before dialing is detected
Off	Loop current before dialing is not detected

- 2 Press [Start] key to set the setting value.

[Completed] is displayed.

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U670 List output

(Message: Output List)

### Contents

Output the list of fax communication data.

Printing a list is disabled either when a job is remaining in the buffer or when [Pause All Print Jobs] is pressed to halt printing.

### Purpose

Check conditions of use, settings and transmission procedures of the FAX.

### Method

- 1 Press [Start] key.
- 2 Select the item to execute.
- 3 Press [Start] key.
- 4 Output selected list.

Items	Contents
Sys Conf Report	Print the list of software switches, local telephone number, confidential boxes, firmware versions and other information.
Action List	Print the list of the error logs and communication lines
Self Sts Report	Print the list of FAX communication settings only in the maintenance mode (self-status report)
Protocol List	Output a list of communication procedures
Error List	Output the error list
Address List (No.)	Output address book in the IDs order
Address List (Idx)	Output address book in the order of names
One-touch List	Output a list of one-touch
Group List	Output the group list

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U671 FAX backup data clear

(Message: Clear FAX Back Up Data)

### Contents

Clear the FAX/i-FAX communication history and scheduled FAX transmission backup data in the FAX PWB.

### Purpose

Execute to prevent information disclosure of the backup data.

### Setting

- 1 Press [Start] key.
- 2 Select the item to display.

Items	Contents
RECOVERY FAX Storage	Enable to use the DIMM used in another machine Use for releasing C0650
FAX Data CLEAR	Clear all the data in the DIMM
Change FAX Storage	Change folder for the backup data

### Method: FAX Data CLEAR

- 1 Select [FAX Data CLEAR].
- 2 Press [Start] key.  
Clear the backup data.
- 3 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Method: Change fax Storage

- 1 Select: [Change FAX Storage].
- 2 Select the item to execute.

Items	Contents
SSD	Set SDD as destination
HDD	Set HDD as destination

- 3 Press [Start] key to set the setting value.
  - [Change FAX Storage] is available only if the security kit is on.
  - In case that the security kit is off, SSD is set as destination device.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting the maintenance item number.



## U695 FAX function customization

(Message: Customize FAX Function)

### Contents

Set ON/OFF of the FAX batch transmission. Changes print size priority when receiving small size.

### Purpose

Execute as required.

### Method

- 1 Select the item to set.

Items	Contents
FAX Bulk TX	Set ON/OFF of the FAX batch transmission
A5 Print Priority Chg	Change of print size priority at the time of small size reception
Detection Time	Setting detection time of FAX print job suspend error (C0950)

#### Setting: FAX Bulk TX

- 1 By using [+] [-] keys, select [On] or [Off].

Items	Contents
On	FAX batch transmission is enabled
Off	FAX batch transmission is disabled

Initial setting: On

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: A5 Pt Pri Chg

- 1 By using [+] [-] keys, select [On] or [Off].

Items	Contents
On	At the time of A5 size reception: A5 >B5 >A4 >B4 >A3
Off	At the time of A5 size reception: A5 >A4 >B5 >A3 >B4

- 2 Default setting: Off
- 3 Press [Start] key to set the setting value.  
[Completed] is displayed.

#### Setting: DetectionTime

- 1 Change the setting value by using [+] [-] keys.

Items	Contents	Setting range	Default setting value
DetectionTime	Setting detection time of FAX print job suspend error (Time)	1/2/3	3 hours

- 2 Press [Start] key to set the setting value.  
[Completed] is displayed.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U698 Setting the maintenance port

(Message: Set Port for Maintenance)

### Contents

Set the port applicable to the maintenance mode.

### Purpose

Set the maintenance mode target port when installing multiple ports.

Setting is unnecessary if the same contents are set for both ports. Set only when different items are set for each port.



### NOTE

This maintenance mode only appears when the multiple ports are installed.

### Setting

- 1 Press [Start] key.
- 2 Press [Port Select].  
Current setting display is inverted.
- 1 Select the item to set.

Items	Contents
ALL	All ports
PORT 1	Port 1 (FAX PWB port)
PORT 2	Port 2 (Optional multiple port)

- 2 Press [Start] key to set the setting value.



### IMPORTANT

These contents to set are cleared when exiting the maintenance mode or turning the power off and the settings are necessary when entering the maintenance mode.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting the maintenance item number.

## U699 Software switch: Set

(Message: Set: Soft SW)

### Contents

Set the software switches on the FAX PWB individually

### Purpose

Change the setting when a problem such as split output of received originals occurs.



### NOTE

Since the communication performance is largely affected, normally this setting need not be changed.

### Method

- 1 Press [Start] key.
- 2 Select [SW No.].
- 3 Enter the desired software switch number (3 digits) using the numeric keys and press [Start] key.

Items	Contents	Setting range
SW No.	Specify the software switch number (2 to 3 digits)	0 to 729

- 4 Press the keys of bit 0 to 7 to switch each bit between 0 and 1.

Items	Contents
Bit	Set the software switch bit (8bit)

- 5 Press [Start] key to set the setting value.  
[Completed] is displayed.

### Completion

## 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

**List of software switches which can be configured**

## &lt;Communication control procedures&gt;

No.	Bit	Contents
36	7654	Coding format in transmission
	3210	Coding format in reception
37	5	33600bps/V34
	4	31200bps/V34
	3	28800bps/V34
	2	26400bps/V34
	1	24000bps/V34
	0	21600bps/V34
38	7	19200bps/V34
	6	16800bps/V34
	5	14400bps/V34
	4	12000bps/V34
	3	9600bps/V34
	2	7200bps/V34
	1	4800bps/V34
	0	2400bps/V34
41	3	FSK detection in V.8
42	4	4800 bps transmission when low-speed setting is active
	2	FIF length when transmitting DIS/DTC signal 4 times or more

## &lt;Communication time setting&gt;

No.	Bit	Contents
53	76543210	T3 timeout setting
54	76543210	T4 timeout setting (auto transmission)
55	76543210	T5 timeout setting
60	76543210	Time before transmission of CNG (1100 Hz) signal
63	76543210	T0 timeout setting (manual transmission)
64	7	Phase C timeout in ECM reception
66	76543210	Timeout 1 in countermeasures against echo
68	76543210	Timeout for FSK detection start in V.8

## &lt;Modem setting&gt;

No.	Bit	Contents
89	76543	RX gain adjust

## &lt;NCU setting&gt;

No.	Bit	Contents
121	7654	Dial tone/busy tone detection chart
122	7654	Busy tone detection chart
	1	Busy tone detection in FAX/TEL automatic switching
125	76543210	Registering the access code for connection to PSTN
126	7654	Ring-back tone ON/OFF cycle for the automatic FAX/telephone switching
68	76543210	Timeout for FSK detection start in V.8

## &lt;Calling time setting&gt;

No.	Bit	Contents
133	76543210	DTMF signal transmission time
134	76543210	DTMF signal pause time
141	76543210	Ringer detection cycle (minimum)
142	76543210	Ringer detection cycle (maximum)
143	76543210	Ringer ON time detection
144	76543210	Ringer OFF time detection
145	76543210	Ringer OFF time undetected
147	76543210	Dial tone detection time (continuous tone)
148	76543210	Allowable dial tone interruption time
149	76543210	Time for transmitting selection signal after closing the DC circuit
151	76543210	Ringer frequency detection invalid time

## U901 Clearing the counters by paper source

(Message: Clear Paper Feeder Counter)

### Contents

Display and clear the counts by paper source.

### Purpose

Check the maintenance parts replacement timing. Executes to clear counters when replacing the maintenance parts.

### Method

- 1 Press [Start] key.

Display the counts by paper source.

Items	Contents
MPT	Display/clear the MP tray feed counter
Cassette1	Display/clear Cassette 1 count
Cassette2	Display/clear Cassette 2 count
Cassette3 *1	Display Cassette 3 counts
Cassette4 *1	Display Cassette 4 counts
Cassette5 *2	Display Cassette 5 counts
Cassette6 *3	Display Cassette 6 counts
Cassette7 *4	Display Cassette 7 counts
Duplex	Display/clear the duplex unit count

\*1: 500 sheets x 2/1500 sheets x 2, \*2: 3000 sheets side feeder, \*3: 3000 sheets large capacity deck only, \*4: 500 x 1 multi side tray only

- 2 Select the counter to clear.

Unable to clear [Cassette 3], [Cassette 4] and [Cassette 5]

- 3 Press [Start] key to clear the counter value.

- Select screen come up with both main unit and PF cassette counter in case of discrepancy between them.

Items	Contents
Cassette3 *	Display counter of [Engine] and [Enhancement]
Cassette4 *	Display counter of [Engine] and [Enhancement]
Cassette5 *	Display counter of [Engine] and [Enhancement]
Cassette6 *	Display counter of [Engine] and [Enhancement]
Cassette7 *	Display counter of [Engine] and [Enhancement]

Display only if cassette 3 to cassette 7 is available.

- 1 Select the item to set.

- 2 Switch [Engine] and [Enhancement] by pressing key.
- 3 Select [Execute].
- 4 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.



## U903 Clearing the jam counter

(Message: Clear Paper Misfeed Counter)

### Contents

Display/Clear the jam counter by paper jam type.

### Purpose

Execute to check the paper jam status. Executes to clear counters when replacing the maintenance parts.

### Method

- 1 Press [Start] key.
- 2 Select the item to execute.

Items	Contents
Cnt	Displaying/Clearing the jam counts
total Cnt	Displaying the accumulated jam counts

### Method: Cnt

- 1 Select [Cnt].  
Number of occurrence is displayed by jam code.  
Code of no occurrence is not indicated.
- 2 Select [Clear] to clear the jam counts.  
Individual counters cannot be cleared.
- 3 Press [Start] key to clear the counter value.

### Method: Total Cnt

- 1 Select [Total Cnt].  
Accumulate number of occurrence is displayed by jam code.
- 2 Change the screen using [▲] [▼] key.  
Unable to clear the accumulated jam counter values.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U904 Clearing the service call error counter

(Message: Clear Service Call Counter)

### Contents

Display/clear the number of times of service call errors by service call error type.

### Purpose

Executes to check the service call error. Executes to clear counters when replacing the maintenance parts.

### Method

- 1 Press [Start] key.
- 2 Select the item to execute.

Items	Contents
Cnt	Display/clear the service call counter
total Cnt	Display accumulate service call error counts.

### Method: Cnt

- 1 Select [Cnt].
  - Display the service call counts by error code.
  - Leave off the error code that does not come up.
- 2 Select [Clear] to clear the service call error counter.
  - Individual counters cannot be cleared.
- 3 Press [Start] key to clear the counter value.

### Method: Total Cnt

- 1 Select [Total Cnt].
  - Accumulate number of occurrence is displayed by service call error.
  - Unable to clear the accumulated service call error counter values.

### Completion

- 1 Press [Stop] key.
  - Return to the screen for selecting maintenance number.

## U905 Optional counter

(Message: Option Counter)

### Contents

Display the counter values of the document processor, 1000-sheet finisher, 4000-sheet finisher, 100 staple finisher and inner finisher.

### Purpose

Execute to check the usage status of the document processor, 1000-sheet finisher, 4000-sheet finisher, 100 staple finisher and inner finisher.

### Method

- 1 Press [Start] key.
- 2 Select the optional device to set.  
Switched to the counter screen.

Items	Contents
DP	Display the document processor count
DF	Display the document finisher count

\*1: When the DP is installed, \*2: When the DF is installed

### Method: DP

Each counter is displayed.

Items	Contents
ADP	Simplex original count is displayed
CIS	Display the count of simultaneous duplex scanning

### Method: DF

Each counter is displayed.

Items	Contents
Carry in	Display the sorter counter
Staple	Display the staple counter
Punch	Display the punch counter
Tray A	Display the main tray eject counter
Saddle	Display the saddle eject counter
Fold	Display the center folding counter
Three Fold	Display the three folding counter

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U906 Resetting the partial operation

(Message: Reset Disable Function Mode)

### Contents

Release the service call error with partial operation.

### Purpose

If the partial operation is executed with a broken cassette, etc., make sure to execute it after repairing the parts.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Reset the partial operation.

- 3 Press [Start] key to release the partial operation.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power off and on.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U908 Total counter

(Message: Total Counter)

### Contents

Display the total counter.

### Purpose

Display the total counter for confirmation.

### Method

- 1 Press [Start] key.  
Display the counter value

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U910 Black rate data

(Message: Clear Coverage Data)

### Contents

Clear the accumulated data for the print coverage per A4/Letter size paper and its period of time (as shown on the service status page).

### Purpose

Clear data as required at the time such as maintenance.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Clear the print coverage data.

- 3 Press [Start] key to clear the print coverage data.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U911 Counter by media type

(Message: Paper Size Counter)

### Contents

Display the paper feed counts by paper size.

### Purpose

Display the counts to confirm when replacing the maintenance parts.

### Method

- 1 Press [Start] key.

Display the paper feed counts by paper size.

Items	Contents
A3 *1	Display A3 feed counts
B4 *1	Display B4 feed counts
A4 *1	Display A4 feed counts
B5 *1	Display B5 feed counts
A5 *1	Display A5 feed counts
Folio *1	Display Folio feed counts
Ledger *2	Display Statement feed counts
Legal *2	Display Legal feed counts
Letter *2	Display Letter feed counts
Statement *2	Display Statement feed counts
ETC	Display Other paper feed counts

\*1: metric specification, \*2: inch specification

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U917 Read/Write Backup Data

(Message: Read/Write Backup HDD Data(USB))

### Contents

Retrieve the backup data to a USB drive from the main unit, or writes the data from the USB drive to the main unit.

### Purpose

Makes a back up of the main unit information, and import or export to restore the main unit information.

### Method

- 1 Turn the power switch off.
- 2 Insert USB drive into the USB drive slot in the main unit.
- 3 Turn the power switch on.  
Wait for about 10 seconds until the main unit recognizes USB drive.
- 4 Press [Start] key.
- 5 Select the target item.

Items	Contents	Dependent data*
Address Book	Address book information	-
Job Account	Job accounting information	-
One touch	One-touch key information	Address book information
User	User management information	Job accounting information
Document Box	Document box information *1	Job accounting, User management information
Shortcut	Short-cut information	Job accounting, User management and Document box information
Fax Forward*2	FAX forward information	Job accounting, User management and Document box information
System	System setting information	-
Network	Network setting information	-
Job Setting	Job setting information	-
Printer	Printer setting information	-
Fax Setting*2	FAX setting information	-
Program	Program information	Information of Address book, Job accounting, User management, Document box, FAX transfer and FAX setting
Panel Setting	Panel setting information	Information of Address book, Job accounting, User management, Document box, FAX transfer, FAX setting and Program

\* 1: Storing data in box are not saved as backup.

\* 2: Only if fax is installed

Since data are dependent with each other, data other than selected are also retrieved or written.



- 6 Select [Export] or [Import].

Items	Contents
Import	Import data from the USB drive to the main unit.
Export	Export data from the main unit to the USB drive.

- 7 Press [Start] key. Starts reading or writing.

The progress of selected item is displayed in %.

When an error occurs, the operation is canceled and an error code appears.

- 8 [Finish] appears after normal completion.

- 9 When selecting [Import], turn the power switch off then on, after completing writing. Wait more than 5 seconds between the power off and on.

#### Error code list

Codes	Contents
e0001	Internal process error
e0002	File access error (Access failure to USB drive etc.)
e0003	The XML file to import does not exist
e0004	Specified incompatible file with Import
e0005	File is broken (Extract failure of ZIP)
e0100 to eFFFF	Processing error during import/export

#### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U920 Billing counter

(Message: Charge Counter)

### Contents

Display the charge counts.

### Purpose

Execute to check the current charge counts

### Method

- 1 Press [Start] key.
- 2 Select the item to display.  
Switch to each display screen.

Items	Contents
Main Function	Counts for the main function
Sub Function	Counts for the sub function

### Method: Main Function

The charge counts for the main functions are displayed.

Items	Contents
Color Copy(H)	Display color copy counts (Coverage: High)
Color Copy(M)	Display color copy counts (Coverage: Middle)
Color Copy(L)	Display color copy counts (Coverage: Low)
Mono Color Copy	Display mono color copy counts.
B/W Copy	Display B/W copy counts.
Color Prn(H)	Display color print counts (Coverage: High)
Color Prn(M)	Display color print counts (Coverage: Middle)
Color Prn(L)	Display color print counts (Coverage: Low)
B/W Prn	Display B/W print counts
B/W Fax	Display FAX counts.

### Method: Sub Function

The charge counts for the sub functions are displayed.

Items	Contents
Simplex	Display simplex print counts
Duplex	Display duplex print counts
Combine(Off)	Display combine print counts (Off)
Combine(2in1)	Display combine print counts (2in1)
Combine(4in1)	Display combine print counts (4in1)

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U927 Clearing all the billing/life counters

(Message: Clear All Charge/Life Counter (one time only))

### Contents

Clear all charge counts and machine life counts.

### Supplement

The total charge counts and the machine life counts can be cleared only once if all count values are 1000 or less.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Initialize the billing count and machine life count.

- 3 Press [Start] key.  
Clear all charge counts and machine life counts.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U928 Machine life counter

(Message: Machine Life Counter)

### Contents

Display the current machine life counts.

### Purpose

Executed to check the machine life count.

### Method

- 1 Press [Start] key.

The current machine life counts is displayed.

Items	Contents
Cnt	Display the machine life counter value
Color Cnt	Display the machine color life counter value

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U930 Clear the main charger roller counts

(Message: Clear Charger Roller Counter)

### Contents

Display and clear the current main charger roller counts.

### Purpose

To verify the main charger roller counts after replacing. Also, clear the counts after replacement.

### Method

- 1 Press [Start] key.

The main charge roller counter value is displayed.

Items	Contents
C	Display Cyan MC roller counter value
M	Display Magenta MC roller counter value
Y	Display Yellow MC roller counter value
K	Display Black MC roller counter value

### Method: Clear

- 1 Select the item to set.
- 2 Select [Clear].
- 3 Press [Start] key to clear the counter value.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U933 Setting the maintenance mode log

(Message: Set Maintenance Mode Execute Log)

### Contents

Set the function to record the in/out date of the maintenance mode or date executing each maintenance item individually and output the log file.

### Purpose

Record the maintenance mode history to analyze the cause when a problem occurs.

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
Export	Export Maintenance Log
Setting	Setting Maintenance Log Output

### Method: Export

- 1 Select [Execute].

Items	Contents
Execute	Export the maintenance log to USB drive.

- 2 Press [Start] key.  
Export the maintenance log to USB drive.  
If a USB drive is not inserted, [Execute] is grayed out.  
Display OK/NG after execution.

### Setting: Setting

1 Select the item to set.

Select the key including the number to set indicated by each block.

The screen for setting is displayed.

Items	Contents
U000 - U019	Set the maintenance log output for U000 to U019.
U020 - U029	Set the maintenance log output for U020 to U029.
U030 - U059	Set the maintenance log output for U030 to U059.
U060 - U099	Set the maintenance log output for U060 to U099.
U100 - U129	Set the maintenance log output for U100 to U129.
U130 - U159	Set the maintenance log output for U130 to U159.
U160 - U199	Set the maintenance log output for U160 to U199.
U200 - U249	Set the maintenance log output for U200 to U249.
U250 - U349	Set the maintenance log output for U250 to U349.
U400 - U499	Set the maintenance log output for U400 to U499.
U500 - U599	Set the maintenance log output for U500 to U599.
U600 - U699	Set the maintenance log output for U600 to U699.
U900 - U999	Set the maintenance log output for U900 to U999.

Set On/Off for the number desired to set.

Default setting: Off

### Completion

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U942 DP loop amount setting

(Message: Adjust DP Original Loop Amount)

### Contents

Adjust the paper loop amount when using the document processor.

### Purpose

Execute when original no-feed jam, skew or creases on the original appears.

### Method

- 1 Press [Start] key.
- 2 Press [System Menu/Counter] key.



### NOTE

Pressing [System Menu/Counter] allows you to adjust setting on the screen showed below.  
(Feed cassette/Conveying speed/Duplex printing/Rotation/Print Set/Output tray)

- 3 Place an original on the DP and press the [Start] key to make a test copy.
- 4 Press [System Menu/Counter] key.
- 5 Select the item to set.
- 6 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Initial setting	Data variation
Front	Single-side original loop amount	-32 to 32	0	0.1758mm
Mix	Mixed original loop amount	-31 to 31	0	0.1758mm

When the setting value is increased, the paper loop amount increase, and it decreases when the setting value is decreased.

Increase the set value if no feed jam or skew feed occurs and reduce the set value if creases appear on the original.

- 7 Press [Start] key to set the setting value.

### Completion

- 1 Press [Stop] key  
Return to the screen for selecting the maintenance item number.



## U952 Maintenance mode workflow

(Message: Maintenance Mode Work Flow)

### Contents

Execute the maintenance items in the order of registration in the main unit or the USB drive.

### Purpose

Execute to register regular maintenance items.

### Method

- 1 Press [Start] key.
- 2 Select the item to execute.  
Switch to selection screen.

Items	Contents
Continue	Resume interrupted workflow
Execute(USB)	Execute the workflow in a USB drive.
Execute	Execute the workflow saved in the main unit
Entry(USB)	Execute the workflow in a USB drive
Entry	Register the workflow in the main unit manually
Log	Display the latest workflow execution history.

### Method: Continue

- 1 Select the item to execute.
- 2 Press [Start] key.  
Selected maintenance mode is executed.

### Method: Execute (USB)

- 1 Check the LED display is off and turn the power switch off.
- 2 Insert USB drive into the USB drive slot.
- 3 Turn the power switch on.
- 4 Enter to Maintenance mode U952.
- 5 Select [Execute(USB)].
- 6 Select [Workflow].

Items	Contents
WorkFlowData 01 to 08	Workflow data in a USB drive

- 7 Press [Start] key.  
Execute the maintenance items in the order of registration in the workflow.

### Method: Execute

- 1 Select the place to save the data to execute.

Items	Contents
Data 1 - 8, USB	Workflow save area in the main unit

- 2 Select the item to execute.
- 3 Press [Start] key to start the processing.

Following workflow is preset in main unit from factory.

Items	Contents
SET UP	464,410,000,927,278
HIGH ALTITUDE	140,101,464
WARRANTY	089,000
MK	119,140,469,127,464,412,464,410,251
EH SETUP	411,034,246,211

#### Method: Entry(USB)

- 1 Check the LED display is off and turn the power switch off.
- 2 Insert USB drive into the USB drive slot in main unit.
- 3 Turn the power switch on.
- 4 Enter to Maintenance mode U952.
- 5 Select [Entry(USB)].
- 6 Select [Workflow].

Items	Contents
WorkFlowData 1 to 8	Workflow data in a USB drive

- 7 Select the workflow save area.

Items	Contents
Data 1 - 8	Workflow save area in the main unit

- 8 Select [Execute].
- Registers the workflow in a USB drive to the main unit.

#### Method: Entry

- 1 Select [Entry].
- 2 Select the workflow save area.

Items	Contents
Data 1 - 8, USB	Workflow save area in the main unit

- 3 By using [+] [-] keys or the numeric keys, enter the maintenance number to register in the workflow.

Items	Contents
Flow 1 - 14	Registered maintenance numbers

4 Press [Start] key to set the setting value.

5 Press [Start] key.

Execute the maintenance items in the order of registration in the workflow.

**EX:**

When inserting a USB drive the following items can be registered: commands, texts and maintenance numbers (variable).

File format: xxx.mwf

1. SET UP,464,469,410,000,927,278

2. HIGH ALTITUDE,140,101,464

3. WARRANTY,089,000

4. MK,119,140,469,127,464,412,464,410,251

5. EH SETUP,411,034,246,211

**Completion**

1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U964 Retrieve Log Flow

(Message: Hide)

### Contents

Transfer the log files saved in the HDD to a USB drive.

The data contains log and screen shot at retrieving log.

### Purpose

In order to investigate a failure, retrieve the log file saved in the HDD to a USB drive.

### Method

- 1 Check the LED display is off and turn the power switch off.
- 2 Insert USB drive into the USB drive slot in main unit.
- 3 Turn the power switch on.
- 4 Enter to Maintenance mode U964.
- 5 Select [Execute].

Items	Contents
Execute	Execute to transfer the log file

- 6 Press [Start] key.  
Start transferring the log files saved in the HDD to a USB drive.  
[Processing] is displayed. (About 3 to 5 minutes)
- 7 [Completed] appears after normal completion.
- 8 Turn the power switch OFF/ON. Wait more than 5 seconds between the power Off and On.  
An error code appears when there is an error.

### Error code list

Display	Contents
No USB Storage	The USB drive is not installed
No File	No log file
Mount Error	USB drive mount error
File Delete Error	Fail to delete existing files in the USB drive
Copy Error	HDD to USB drive copy failure
Unmount Error	USB drive unmount error
Other Error	Other error

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U977 Setting the data capture mode

(Message: Set Data Capture Mode)

### Contents

Store the data sent to the main unit into a USB drive.

### Purpose

Store the data sent to the main unit into a USB drive to check it.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	Store data in USB drive.
Stop	Stop save operation

- 3 Press [Start] key.  
The error code is displayed after detecting the abnormal operation.

### Error code list

Items	Contents
4	USB drive is full.
50	The other error occurrence

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U981 Setting/Checking of predictive maintenance alert data

(Message: Set/Check CBM Alert Data)

### Contents

Refer/Change the information about CBM (condition based maintenance) in KFS.

### Purpose

Refer/Change the counter, threshold and setting current value about CBM (condition based maintenance)

### Method

- 1 Press [Start] key.
- 2 Select the item to set.  
The screen for setting is displayed.

Items	Contents
CBM Alert	CBM Alert
Cassette Feed Timing	Paper feed timing
Image Quality	Background image/Light density
Scan Image	Set/Check the CBM alert data of the DP black streaks detection

#### Method: CBM Alert

- 1 Select the item to check.

Items	Contents
Engine	Engine

#### Setting: Engine

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value
Cassette Feed (CBM Log)	Setting CBM Log	0 to 1	0 (OFF)
Image Quality	Setting Background image/Light density	0 to 1	0 (OFF)

- 3 Press [Start] key to set the setting value.

#### Method: Cassette Feed Timing

- 1 Select the item to check.

Items	Contents
Condition setting	Setting condition

#### Setting: Condition setting

- 1 Select the item to set.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Threshold Feed Error	Feeing error threshold	0 to 500	0 (OFF)	1mm

- 3 Press [Start] key to set the setting value.

#### Method: Image quality

- 1 Select the item to check.

Items	Contents
Background Of Printing	Setting background
Thin Concentration	Setting light density
Retry Setting	Setting retry
calibration	Setting calibration mode

#### Setting: Background Of Printing

- 1 Select the item to check.  
2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
C	CTD value (C)	0 to 1000	1000	-
M	CTD value (M)	0 to 1000	1000	-
Y	CTD value (Y)	0 to 1000	1000	-
K	CTD value (K)	0 to 1000	800	-

- 3 Press [Start] key to set the setting value.

#### Setting: Thin Concentration

- 1 Select the item to check.  
2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
C	CTD value (C)	0 to 1000	500	-
M	CTD value (M)	0 to 1000	500	-
Y	CTD value (Y)	0 to 1000	500	-
K	CTD value (K)	0 to 255	228	-

- 3 Press [Start] key to set the setting value.

#### Setting: Retry Setting

- 1 Select the item to check.

- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Value	No. of retry	0 to 255	1	1 time
Developing Refresh	Developer refresh operation at retry	0 to 1	1	-

- 3 Press [Start] key to set the setting value.

#### Method: Calibration

- 1 Select the item to set.

Items	Contents
Dot Cnt	Dot count at the time of the previous calibration success
Developing Time	Developing drive time at the time of the previous calibration success

#### Setting: Dot Cnt

- 1 Select the item to check.  
2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
C	CTD value (C)	0 to 9999999	0	-
M	CTD value (M)	0 to 9999999	0	-
Y	CTD value (Y)	0 to 9999999	0	-
K	CTD value (K)	0 to 9999999	0	-

- 3 Press [Start] key to set the setting value.

#### Setting: Developing Time

- 1 Select the item to check.  
2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
C	CTD value (C)	0 to 9999999	0	-
M	CTD value (M)	0 to 9999999	0	-
Y	CTD value (Y)	0 to 9999999	0	-
K	CTD value (K)	0 to 9999999	0	-

- 3 Press [Start] key to set the setting value.

#### Method: Scan Image



- 1 Select the item to check.

Items	Contents
Cnt	Scan image counter
Setting	Set the black streaks reduction process and the black streaks detection CBM alert notification

**Setting: Cnt**

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Detect Black Line (CCD)	DP (CCD side) Black streak detection cumulative count	0 to 9999999	0	-
Table Scan	No. of the table scan	0 to 9999999	0	-
DP Job (CCD)	DP surface read JOB count	0 to 9999999	0	-
Detect Bkline Threshold CCD	Cumulative black stripe detection count (CCD) 3 pixels or more	0 to 9999999	0	-
Detect Z Line (CCD)	Cumulative Z line detection count (CCD) 1 pixel or more	0 to 9999999	0	-

- 3 Press [Start] key to set the setting value.

**Setting: Setting**

- 1 Select the item to set.
- 2 Change the setting value by using [+] [-] keys or the numeric keys.

Items	Contents	Setting range	Default setting value	Data variation
Removal Of Black Line (F)	DP (CCD side) setting of reduction level when black streak reduction processing setting is "strong" [pixel]	5 to 15	15	1

- 3 Press [Start] key to set the setting value.

**Completion**

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U984 Developer unit number

(Message: Developing Unit Number)

### Contents

Display the developer unit number.

### Purpose

Execute to check the developer unit number.

### Method

- 1 Press [Start] key.

Display the developer unit number.

Items	Contents
C	Display the Cyan developer unit number
M	Display the Magenta developer unit number
Y	Display the Yellow developer unit number
K	Display the Black developer unit number

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U985 Developer unit history

(Message: Developing Unit History)

### Contents

Display the machine serial number and developer counter history.

### Purpose

Display the machine serial number and developer count to check.

### Method

- 1 Press [Start] key.

Display the developer unit history.

Items	Contents
C	Display the Cyan developer unit history
M	Display the Magenta developer unit history
Y	Display the Yellow developer unit history
K	Display the Black developer unit history

Display the machine serial number and 3 items of the developer counter history.

Items	Contents
Machine History 1 to 3	Machine serial number history
Cnt History1 to 3	Developer counter history

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U989 HDD scan disk

(Message: HDD Scan disk)

### Contents

Apply Scan disk to the HDD for data recovery.

### Purpose

Execute recovery of HDD management data error by turning the power off while accessing to the HDD.

### Method

- 1 Press [Start] key.
- 2 Select [Execute].

Items	Contents
Execute	HDD scan disk request

- 3 Press [Start] key to execute Scan disk.
- 4 Turn the power switch OFF/ON. Wait more than 5 seconds between the power Off and On.

### Completion

- 1 Press [Stop] key.  
Return to the screen for selecting maintenance number.

## U990 Clearing the scanner lighting time

(Message: Clear Scanner Lamp ON Time)

### Contents

Display the accumulated DP CIS lamp lighting time

### Purpose

Execute to check the DP CIS usage.

### Method

- 1 Press [Start] key.

DP CIS accumulated lighting time is displayed in minutes.

Items	Contents
CIS	Display the accumulated DP IS lamp lighting time

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## U991 Scanner counter

(Message: Scanner Counter)

### Contents

Display the scanner operation counts.

### Purpose

Display the number of scanner operation to check the usage status.

### Method

- 1 Press [Start] key.

Current number of operation is displayed.

Items	Contents
Copy Scan	Display no. of the times of copy and scan operations
Fax Scan	Display no. of the times of FAX scan operations
Other Scan	Display no of the times of other scan operations

### Completion

- 1 Press [Stop] key.

Return to the screen for selecting maintenance number.

## 7 Troubleshooting

### 7 - 1 Image formation problems

#### (1) Isolate the place of image failure

##### <How to isolate the cause>

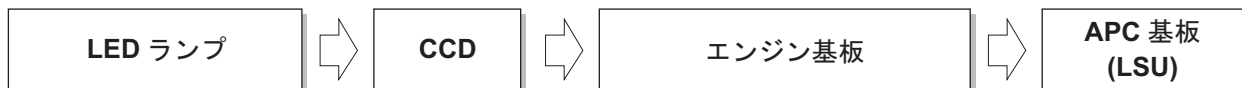
- 1 Print Test Page to check an image failure.  
 [System Menu] > [Adjustment/Maintenance] > [Service Setting]  
 Yes: engine factor  
 No: Scanner factor
- 2 Check if image failure is enlarged or reduced in the zoom mode.  
 Yes: Scanner factor
- 3 Scanner factor: Refer to [Image failure at Copy or Send] (See page P.7-2).  
 (LED lamp for originals on the contact glass --> CCD failure at scanning factor)

##### Isolate with the original scanning position.

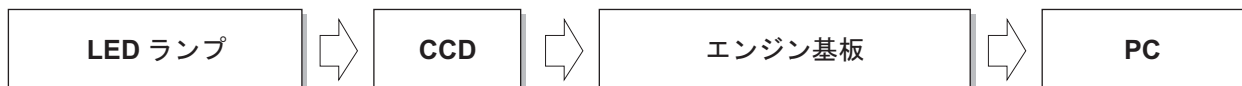
- a. DP simplex (Main unit CCD scan)
  - b. On the contact glass (scan by the main unit CCD)
- 1 Refer to image failure with engine factor (See page 7-41).  
 (Main charge --> Drum --> LSU --> Developer --> Primary transfer image formation process failure)

##### <Image data flow>

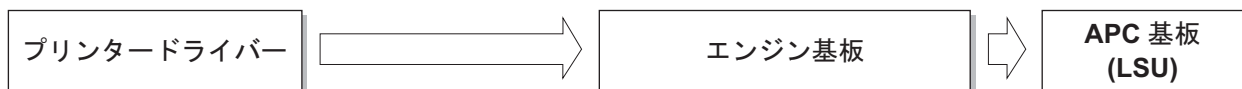
コピー時 :





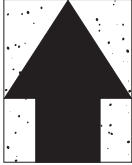
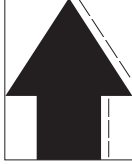

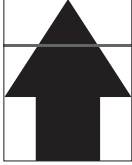


送信時 :




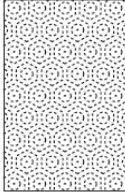




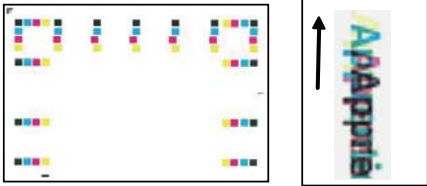
PC からのデータ印字 :





**(2)Scanner Factors (when scanning from DP)**

No.	Contents	Image sample
(2-1)	Abnormal image	
(2-2)	Colored background	
(2-3)	Black or color spots appear on the image	
(2-4)	Blurred characters	
(2-5)	Original center and copy image center are mismatched	
(2-6)	Horizontal black streaks	
(2-7)	Vertical black / color streaks or band	
(2-8)	There is a regular difference between the image leading edges of the original and copy	



No.	Contents	Image sample
(2-9)	Vertical white streaks or band	
(2-10)	Moire	
(2-11)	Blank image or entirely black image	
(2-12)	Partly dark or light image	
(2-13)	Blurred image	
(2-14)	Part of the image is not copied	
(2-15)	Color shift	

No.	Contents	Image sample
(2-16)	Skewed image	
(2-17)	The entire image is too light	

**Content of Scanner Factors (when scanning from DP)**

**(2-1) Abnormal image**

When scanning the second (back) side through the DP

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
2	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
3	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
4	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
5	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
6	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
7	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
8	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
2	Checking the cable	The connector is not properly connected or the cable is faulty.	Reconnect the HDD cable, or replace it.	
3	Replacing the HDD	The HDD is faulty.	Replace the HDD.	Detaching and Reattaching the HDD
4	Checking the ISU	The ISU is attached improperly.	Reattach the ISU.	Detaching and Reattaching the ISU
5	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
7	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(2-2)Colored background**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Setting Background Density Adjustment	The original background density is dark. The background density adjustment is set to Off.	Set [Background Density Adj.] to [Auto] in [Color/Image Quality].	
2	Setting Background Density Adjustment	The original background density is dark. The background density adjustment is dark.	Set [Background Density Adj.] to [Manual] in [Color/Image Quality], and adjust the background density.	
3	Executing U411	The CIS image adjustment (U411 [DP FD(ChartA)]) is not executed.	Execute U411 [DP FD(ChartA)].	Executing U411
4	Checking the DPCIS roller	The DPCIS roller is dirty	Clean the DPCIS roller	
5	Checking the DPCIS roller	The DPCIS roller does not rotate properly.	Reattach the DPCIS roller driving section.	

Step	Check description	Assumed cause	Measures	Reference
6	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
7	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
8	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
9	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
10	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
11	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
12	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
13	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The Background Density Adjustment is not set.	Set [Original Image] in [System Menu/Counter] key > [Common Settings] > [Function Defaults].	
2	Checking the settings	The background density is dark.	Set [Original Image] in [System Menu/Counter] key > [Common Settings] > [Function Defaults].	
3	Setting Background Density Adjustment	The Background Density Adjustment is not set.	Set [Background Density Adj.] to [Auto] in [Color/Image Quality].	
4	Setting Background Density Adjustment	The original background density is dark. The background density adjustment is dark.	Set [Background Density Adj.] to [Manual] in [Color/Image Quality], and adjust the background density.	
5	Checking the original	The original is raised at scanning.	Set the original during pressing.	
6	Checking the contact glass	The shading plate is dirty.	Clean the shading plate at the backside of the contact glass.	

Step	Check description	Assumed cause	Measures	Reference
7	Executing U411	The image is not adjusted.	When the same phenomenon occurs at the table scanning too, execute U411 [Table(chartA)].	Executing U411
8	Checking the home position sensor	The home position sensor is not properly attached.	Reattach the home position sensor.	
9	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
10	Checking the lamp unit assy (mirror frame A, B).	The lamp unit assy (mirror frame A, B) is not properly attached.	Reattach the lamp unit assy (mirror frame A, B).	
11	Checking the slit glass	The slit glass is dirty or not properly attached.	Clean the slit glass or reattach it.	
12	Checking the DP	The original is raised at scanning.	Adjust the left DP hinge height.	
13	DP replacement	The DP frame is deformed or the DP hinges are faulty.	Replace the document processor.	Detaching and Reattaching the document processor
14	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
15	Replacing the lamp unit	The LED PWB is faulty.	Replace the lamp unit.	Detaching and Reattaching the lamp unit
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
17	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(2-3)Black or color spots appear on the image**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
4	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
5	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
6	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
7	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
8	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
9	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the slit glass	The slit glass is dirty.	Clean the slit glass.	
3	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
4	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU

Step	Check description	Assumed cause	Measures	Reference
5	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB
6	Checking the main PWB	The connectors on the main PWB are not properly connected, or the wires or the main PWB are faulty.	Reconnect the connectors on the main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the main PWB.	Detaching and Reattaching the main PWB

**(2-4) Blurred characters**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Measures for the same image failure when scanning the first (front) side through the DP	Assumed cause of the same image failure when scanning the first (front) side through the DP	Perform the measures for the same image failure when scanning the first (front) side through the DP.	
2	Checking the DPCIS roller	The originals are conveyed without contacting the DPCIS roller.	Reattach the DPCIS roller.	
3	Checking the DPCIS	The originals are away from the CIS glass.	Reattach the DPCIS.	Detaching and Reattaching the DPCIS

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The originals out of specification are used. (They are thick, thin, or smooth.)	Ask a user to use the specified paper.	
2	Checking the original	The leading edge of the original is bent.	Stretch the bending or the paper creases of the original.	
3	Checking the DP conveying roller 1-3 and the bushings.	DP conveying roller 1-3 or the bushings are dirty.	Clean the DP conveying roller 1-3 and the bushings.	
4	Checking the DP conveying pulley	The original conveying pulley does not rotate smoothly.	Reattach the DP conveying pulley and the pressure spring.	
5	Checking the DP drive components	The DP drive components are not properly attached.	Reattach the DP drive components.	
6	Checking the original pick-up guide	The original pick-up guide does not operate properly.	Reattach the original pick-up guide.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the scanning guide	The scanning guide is deformed.	Replace the scanning guide.	
8	Adjusting the left DP hinge height	The front and rear heights of the DP do not match.	Adjust the left DP hinge height.	
9	Checking the DP	The document processor is not properly installed in the main unit.	Check the positioning of the document processor and tighten the screws again.	
10	Checking the DP hinges holding pressure	The DP hinges holding pressure is adjusted improperly. (The hinges vertical motion is unsmooth and the opened DP cannot be held. So, the DP is skewed horizontally.)	Adjust the DP hinges holding pressure.	
11	Checking the DP hinges	The DP hinges are faulty. (The hinges vertical motion is unsmooth, the opened DP cannot be held, and the DP is skewed horizontally.)	Replace the DP hinges.	

**(2-5)Original center and copy image center are mismatched**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Reloading the original	The originals are not properly set on the original tray.	Reload the original properly.	
2	Executing U072	The DP scanning position is not adjusted.	Adjust the DP CIS center line by executing U072 [CIS].	Executing U072
3	Executing U411	The DP scanning position is not adjusted.	Execute U411 [DP Auto Adj].	Executing U411
4	Executing U411	The DP scanning position is not adjusted.	Execute U411 [DP FD(ChartA)].	Executing U411

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The originals are not properly set on the original tray.	Reset the originals.	
2	Executing U072	The center line when scanning the front page of the originals at the document processor is not adjusted.	Adjust U072 [Front].	Executing U072
3	Executing U411	The auto scanner adjustment when DP scanning is not executed.	Execute U411 [DP Auto Adj].	Executing U411
4	Executing U411	The auto scanner adjustment when DP scanning is not executed.	Execute U411 [DP FU(Chart B)].	Executing U411



## (2-6)Horizontal black streaks

### When scanning the second (back) side through the DP

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the CIS glass	The CIS glass is dirty.	Clean the CIS glass and the DP conveying guide.	
3	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
4	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
5	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
6	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
7	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
8	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
9	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
10	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

### When scanning the first (front) side through DP

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the slit glass	The slit glass is dirty.	Clean the slit glass.	
3	Executing U072	The backside image of the size direction plate is scanned. (Adjustment value of U072 [Front] is not proper.)	Adjust U072 [Front].	Executing U072
4	Executing U411	The backside image of the size direction plate is scanned. (Adjustment value of U411 [Table(ChartA)] is not proper.)	Execute U411 [Table(Chart A)].	Executing U411

Step	Check description	Assumed cause	Measures	Reference
5	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
6	Checking the CCD PWB	The CCD PWB is faulty.	Reconnect the CCD PWB wire. Then, replace the ISU if the issue is not resolved.	Detaching and Reattaching the ISU
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**(2-7)Vertical black / color streaks or band**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Executing U072	The leading edge timing is improperly adjusted. (Streaks or bands appear on the image outside the original.)	Adjust U072 [CIS].	Executing U072
2	Executing U411	The leading edge timing is improperly adjusted. (Streaks or bands appear on the image outside the original.)	Execute U411 [DP Auto Adj].	Executing U411
3	Executing U411	The leading edge timing is improperly adjusted. (Streaks or bands appear on the image outside the original.)	Execute U411 [DP FD(ChartA)].	Executing U411
4	Cleaning the CIS glass	The CIS glass is dirty.	Clean the CIS glass and the DP conveying guide.	
5	Cleaning the DP conveying guide	The DP conveying guide is dirty.	Clean the DP conveying guide.	
6	Checking the DP registration pulley	The DP registration pulley is dirty.	Clean the DP registration pulley.	
7	Checking the DPCIS roller	The DPCIS roller is dirty	Clean the DPCIS roller	
8	Executing U091	U091 (Set white line correction) is not executed.	Execute U091.	Executing U091
9	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
10	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
11	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
12	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
13	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
14	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
15	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
16	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the slit glass	The slit glass is dirty.	Clean the slit glass and the DP conveying guide.	
2	Checking the contact glass	The contact glass or the shading plate at the backside of the contact glass is dirty.	Clean the contact glass and the shading plate at the backside of the contact glass.	
3	Checking the mirror	The mirror is dirty.	Clean the mirrors of the lamp unit assy (mirror frame A, B).	
4	Checking the lamp unit assy (mirror frame A, B).	The dust is adhered on the lamp unit assy (mirror frame A, B).	Remove dust on the laser path of the lamp unit assy (mirror frame A, B).	
5	Cleaning the CCD PWB	Dust is on the CCD PWB.	Clean the CCD PWB using an air-blower.	
6	Executing U063	The image scanning position is incorrect.	Execute U063 to change the scanner shading position.	Executing U063
7	Checking the original	The original is dirty.	Replace the original.	
8	Checking the settings	Actual original size and detected original size are mismatched.	Set the original paper size.	
9	Checking the original cover	The original cover is dirty.	Clean the original cover.	
10	Executing U067	The center line settings are incorrect. (The streaks or bands appear out of the original image.)	Adjust U067 [Front].	Executing U067
11	Executing U411	The leading edge timing is incorrect. (Streaks or bands appear out of the original.)	Execute U411 [Table(Chart A)].	Executing U411
12	Executing U068	The starting position for scanning an original on the DP is incorrect.	Adjust U068 [DP Read].	Executing U068
13	Executing U072	The center line settings are incorrect. (The streaks or bands appear out of the original image.)	Adjust U072 [Front].	Executing U072
14	Executing U411	The leading edge timing is incorrect. (Streaks or bands appear out of the original.)	Execute U411 [DP Auto Adj].	Executing U411
15	Executing U411	The leading edge timing is incorrect. (Streaks or bands appear out of the original.)	Execute U411 [DP FU(Chart B)].	Executing U411

Step	Check description	Assumed cause	Measures	Reference
16	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
17	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB

**(2-8) There is a regular difference between the image leading edges of the original and copy**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Executing U072	The DP scanning position is not adjusted.	Adjust the DPCIS center line by executing U072 [CIS].	Executing U072
2	Executing U411	The DP scanning position is not adjusted.	Execute U411 [DP Auto Adj].	Executing U411
3	Executing U411	The DP scanning position is not adjusted.	Execute U411 [DP FD(ChartA)].	Executing U411

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Executing U071	The timing of scanning the original leading edge at the document processor is not properly set.	Adjust U071 [Front Head].	Executing U071
2	Executing U411	The starting position for scanning an original on the DP is incorrect.	Execute U411 [DP Auto Adj].	Executing U411
3	Executing U411	The starting position for scanning an original on the DP is incorrect.	Execute U411 [DP FU(Chart B)].	Executing U411
4	Checking the DP conveying roller 1-3	DP conveying roller 1-3 or the bushings are dirty.	Clean the DP conveying roller 1-3 and the bushings.	
5	Checking the DP conveying roller 1-3	The DP conveying roller 1-3 is worn down.	Replace the DP conveying roller 1-3.	
6	Applying the grease	The DP conveying motor rotates irregularly and the excessive load is applied to the DP drive gear.	Apply the grease to the DP drive gears.	
7	Checking the DP conveying motor	The DP conveying motor rotates irregularly due to the fault.	Reattach the DP conveying motor and reconnect the connector. Replace it if it is not fixed.	

## (2-9)Vertical white streaks or band

### When scanning the second (back) side through the DP

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DPCIS roller	The DPCIS roller is dirty	Clean the DPCIS roller	
2	Checking the CIS glass	The CIS glass is dirty.	Clean the CIS glass and the DP conveying guide.	
3	Executing U091	U091 (Set white line correction) is not executed.	Execute U091.	Executing U091
4	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
5	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
6	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
7	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
8	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
9	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
10	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
11	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

### When scanning the first (front) side through DP

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the mirror	The mirror is dirty.	Clean the mirrors of the lamp unit assy (mirror frame A, B).	
3	Checking the lamp unit assy (mirror frame A, B).	The dust is adhered on the lamp unit assy (mirror frame A, B).	Remove dust on the laser path of the lamp unit assy (mirror frame A, B).	
4	Checking the lens cover	The lens cover is off.	Reattach the lens cover.	Detaching and Reattaching the lens unit
5	Executing U063	The shading plate at the backside of the contact glass is dirty.	Execute U063 to change the scanner shading position.	Executing U063

Step	Check description	Assumed cause	Measures	Reference
6	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
7	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB
8	Checking the slit glass	The slit glass is dirty.	Clean the slit glass and the DP conveying guide.	

**(2-10) Moire**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Changing the image quality mode	The image quality mode is set improperly.	Change the image quality mode.	
2	Reloading the original	The original is not properly set. (Moire appears in the original scanning direction.)	Rotate the originals in 90 degrees and reset them.	
3	Executing U411	The automatic scanner adjustment is not executed.	Execute U411 [DP FD(CharTA)].	Executing U411

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The original imaging quality is not properly set. (Moire changes depending on the print quality.)	Set [Original Image] in [System Menu/Counter] key > [Common Settings] > [Function Defaults].	
2	Reloading the original	The original is not properly set. (Moire appears in the original scanning direction.)	Rotate the originals in 90 degrees and reset them.	

**(2-11) Blank image or entirely black image**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
2	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
3	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
4	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
5	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
6	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
7	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
8	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The originals were set upside down.	Reset the original to correct the front and back direction.	
2	Checking the slit glass	The slit glass is not properly attached.	Reattach the slit glass.	
3	Executing U068	The starting position for scanning an original on the DP is incorrect.	Adjust U068 [DP Read].	Executing U068
4	Checking the home position sensor	The home position sensor is not properly attached.	Reattach the home position sensor.	
5	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
6	Checking the scanner drive belt	The scanner drive belt comes off.	Reattach the scanner drive belt.	
7	Checking the scanner drive gear	The scanner drive gear is not properly attached.	Reattach the scanner drive gear.	
8	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU



Step	Check description	Assumed cause	Measures	Reference
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
10	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(2-12)Partly dark or light image**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the image quality mode	Image quality is not properly adjusted. (Original type and image quality are mismatched.)	Set the image quality according to the originals.	
2	Replacing the original	The original is dirty.	Replace the original.	
3	Correcting the original	The originals are bent or creased.	Stretch the bending or the paper creases of the original.	
4	Checking the DPCIS roller	The DPCIS roller does not rotate properly.	Reattach the DPCIS roller driving section.	
5	Cleaning the CIS glass	The CIS glass is dirty.	Clean the CIS glass and the DP conveying guide.	
6	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
7	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
8	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
9	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
10	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
11	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS

Step	Check description	Assumed cause	Measures	Reference
12	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
13	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the situation	The table scanning of originals is faulty.	Perform the measures for the same abnormal image when scanning on the contact glass.	
2	Cleaning the slit glass	The slit glass is dirty.	Clean the slit glass.	
3	Checking the slit glass	The slit glass is bent.	Reattach the slit glass.	
4	Checking the scanning guide	The scanning guide is not properly attached.	Reattach the scanning guide.	

**(2-13) Blurred image**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the CIS glass	The CIS glass has condensation.	Remove condensation on the CIS glass.	
2	Cleaning the CIS glass	The CIS glass is dirty.	Clean the CIS glass and the DP conveying guide.	
3	Checking the CIS glass	The CIS glass is warped.	Reattach the CIS glass.	
4	Replacing the CIS glass	The CIS glass has some scratches.	Replace the CIS glass.	
5	Checking the DPCIS roller	The DPCIS roller does not rotate properly.	Reattach the DPCIS roller driving section.	
6	Executing U411	The automatic scanner adjustment is not executed.	Execute U411 [DP FD(ChartA)].	Executing U411
7	Checking the DPCIS	The DPCIS is not properly attached.	Reattach the DPCIS.	Detaching and Reattaching the DPCIS
8	Checking the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is wavy.	Make the originals flat, or replace it if possible.	
2	Checking the slit glass	The slit glass has condensation.	Remove the condensation on the slit glass.	
3	Checking the lamp unit assy (mirror frame A, B).	The mirror has condensation.	Remove the condensation on the mirrors of the lamp unit assy (mirror frame A, B).	Detaching and Reattaching the lamp unit
4	Checking the ISU	The lens has condensation.	Remove the condensation on the ISU lens.	Detaching and Reattaching the lens unit
5	Checking the ISU	The glass of the CCD PWB has condensation.	Remove the condensation on the CCD PWB glass using a blower brush	Detaching and Reattaching the lens unit
6	Executing U411	Each auto adjustment of the scanner is incorrect.	Execute U411 [Table(Chart A)].	Executing U411
7	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
8	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB
9	Checking the main PWB	The connectors on the main PWB are not properly connected, or the wires or the main PWB are faulty.	Reconnect the connectors on the main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the main PWB.	Detaching and Reattaching the main PWB

**(2-14)Part of the image is not copied**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Reloading the original	The originals are not properly set on the original tray.	Reload the original properly.	
2	Setting the original size	Actual original size and detected original size are mismatched.	Set the original size manually.	
3	Changing the Border Erase function	The Border Erase function is not properly set. (Setting is too large.)	Lower the setting of the Border Erase.	

Step	Check description	Assumed cause	Measures	Reference
4	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
5	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
6	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
7	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
8	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
9	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
10	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
11	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is not set properly.	Reset the originals.	
2	Checking the settings	The original size and the paper side do not match on the operation panel. (The setting is incorrect.)	Set the original size manually.	
3	Checking the settings	The copy position is rotated automatically.	Set [Auto Image Rotation] to [Off] from the System Menu.	
4	Checking the slit glass	The slit glass is dirty.	Clean the slit glass.	
5	Checking the slit glass	The slit glass is not properly attached.	Reattach the slit glass.	
6	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
7	Checking the ISU	The ISU is attached improperly.	Reattach the ISU.	Detaching and Reattaching the ISU

Step	Check description	Assumed cause	Measures	Reference
8	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
10	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(2-15)Color shift**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Measures for the same image failure when scanning the first (front) side through the DP	Assumed cause of the same image failure when scanning the first (front) side through the DP	Perform the measures for the same image failure when scanning the first (front) side through the DP.	
2	Checking the DPCIS roller	The originals are conveyed without contacting the DPCIS roller.	Reattach the DPCIS roller.	
3	Checking the DP conveying roller 2/3 (before and after scanning)	The DP conveying roller 2/3 is dirty.	Clean the DP conveying roller 2/3 and the bushings.	
4	Checking the DPCIS	The originals are away from the CIS glass.	Reattach the DPCIS.	Detaching and Reattaching the DPCIS

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The originals out of specification are used. (They are thick, thin, or smooth.)	Ask a user to use the specified paper.	
2	Checking the original	The leading edge of the original is bent.	Stretch the bending or the paper creases of the original.	
3	Checking the DP conveying roller 1-3	DP conveying roller 1-3 or the bushings are dirty.	Clean the DP conveying roller 1-3 and the bushings.	
4	Checking the DP conveying pulley	The original conveying pulley does not rotate smoothly.	Reattach the DP conveying pulley and the pressure spring.	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the DP drive components	The DP drive components are not properly attached.	Reattach the DP drive components.	
6	Checking the scanning guide	The scanning guide is deformed.	Replace the scanning guide.	
7	Checking the original pick-up guide	The original pick-up guide does not operate properly.	Reattach the original pick-up guide.	
8	Adjusting the left DP hinge height	The front and rear heights of the DP do not match.	Adjust the left DP hinge height.	
9	Checking the DP	The document processor is not properly installed in the main unit.	Check the positioning of the document processor and tighten the screws again.	
10	Checking the DP hinges holding pressure	The DP hinges holding pressure is adjusted improperly. (The hinges vertical motion is smooth and the opened DP cannot be held. So, the DP is skewed horizontally.)	Adjust the DP hinges holding pressure.	
11	Checking the DP hinges	The DP hinges are faulty. (The hinges vertical motion is smooth, the opened DP cannot be held, and the DP is skewed horizontally.)	Replace the DP hinges.	

**(2-16) Skewed image**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Measures for the same image failure when scanning the first (front) side through the DP	Assumed cause of the same image failure when scanning the first (front) side through the DP	Perform the measures for the same image failure when scanning the first (front) side through the DP.	
2	Checking the DPCIS	The DPCIS is not properly attached.	Reattach the DPCIS.	Detaching and Reattaching the DPCIS

**When scanning the first (front) side through DP**

Step	Check description	Assumed cause	Measures	Reference
1	Correcting the original	The originals are bent or creased.	Stretch the bending or the paper creases of the original.	
2	Checking the original width guides	The original skews.	Relocate the original width guides.	

Step	Check description	Assumed cause	Measures	Reference
3	Adjusting the right DP hinge position	The right DP hinge position is not adjusted back and forth.	Adjust the right DP hinge position back and forth.	Adjusting the right DP hinge
4	Checking the DP feed belt	The DP feed belt is dirty. (It can be removed by cleaning.)	Clean the DP feed belt.	
5	Checking the DP feed belt	The DP feed belt is dirty. (It cannot be removed by cleaning.)	Replace the DP feed belt.	
6	Checking the DP registration roller	The DP registration roller is dirty.	Clean the DP registration roller.	
7	Checking the DP registration pulley	The operation of the DP registration pulley is faulty.	Reattach the DP registration pulley.	
8	Executing U942	The original loop amount before registration is improper.	Adjust the original loop amount at U942.	Executing U942

**(2-17)The entire image is too light**

**When scanning the second (back) side through the DP**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the table scanning	The table scanning of originals is faulty.	Perform the measures for the same abnormal image when scanning on the contact glass.	
2	Executing U411	U411 [DP FD(ChartA)] is not executed.	Execute U411 [DP FD(ChartA)].	Executing U411
3	Cleaning the DPCIS roller	The DPCIS roller is dirty	Clean the DPCIS roller	
4	Checking the DPCIS roller	The DPCIS roller does not rotate properly.	Reattach the DPCIS roller driving section.	
5	Checking the DPCIS	The DPCIS is not properly attached.	Reattach the DPCIS.	Detaching and Reattaching the DPCIS
6	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
7	Checking the SATA cable	The connector is not properly connected.	Reinsert the connectors of the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
8	Replacing the SATA cable	The SATA cable is deformed or broken.	Replace the SATA cable between the DPSHD PWB and the DP relay PWB.	Wiring diagram
9	Checking the DPSHD PWB	The DPCIS is not properly connected to the DPSHD PWB.	Reconnect the DPCIS to the DPSHD PWB.	
10	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	

Step	Check description	Assumed cause	Measures	Reference
11	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and Reattaching the DPCIS
12	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
13	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB






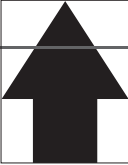


**When scanning the first (front) side through DP**


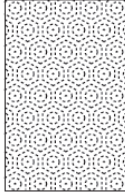




Step	Check description	Assumed cause	Measures	Reference
1	Executing U068	The starting position for scanning an original on the DP is incorrect.	Adjust U068 [DP Read].	Executing U068
2	Checking the slit glass	The slit glass is dirty.	Clean the slit glass and the DP conveying guide.	
3	Checking the slit glass	The slit glass is not properly attached.	Reattach the slit glass.	
4	Checking the settings	The density is not properly adjusted. (The original type and image quality differs.)	Set the image quality according to the originals.	
5	Checking the settings	The density is not properly adjusted. ([EcoPrint] is set to "On".)	Change to [Off] at [System Menu/Counter] > [Common Setting] > [Function Defaults] > [EcoPrint].	
6	Checking the settings	The density is not properly adjusted. (The density setting is too light.)	Set the density setting to be dark.	
7	Checking the settings	The density is not properly adjusted. ([Background density] is set to "Off".)	Set [Manual] in the Background Density Adjustment to make dark.	
8	Checking the settings	[Prevent Bleed-thru] setting is [On]	Change to [Off] at [System Menu/Counter] > [Common Setting] > [Function Defaults] > [Prevent Bleed-thru].	
9	Checking the shading plate	The shading plate is dirty.	Clean the shading plate at the backside of the contact glass.	
10	Executing U411	The scanner image is not adjusted.	Execute U411 [DP FD(CharA)] and [DP FU(CharA)].	Executing U411
11	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram

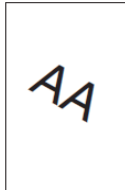



Step	Check description	Assumed cause	Measures	Reference
12	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
13	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB
14	Checking the main PWB	The connectors on the main PWB are not properly connected, or the wires or the main PWB are faulty.	Reconnect the connectors on the main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the main PWB.	Detaching and Reattaching the main PWB

**(3)Scanner Factors (when scanning on the contact glass)**

No.	Contents	Image sample
(3-1)	Abnormal image	
(3-2)	Colored background	
(3-3)	Black or color spots appear on the image	
(3-4)	Blurred characters / Color Shift	
(3-5)	Original center and copy image center are mismatched	
(3-6)	Horizontal black streaks	
(3-7)	Vertical black / color streaks or band	
(3-8)	There is a regular difference between the image leading edges of the original and copy	

No.	Contents	Image sample
(3-9)	Vertical white streaks or band	
(3-10)	Moire	
(3-11)	Blank image or entirely black image	
(3-12)	Partly dark or light image	
(3-13)	Blurred image	
(3-14)	Part of the image is not copied	

No.	Contents	Image sample
(3-15)	Skewed image	
(3-16)	The entire image is too light	

**Content of Scanner Factors (when scanning on the contact glass)**

**(3-1) Abnormal image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
2	Checking the cable	The connector is not properly connected or the cable is faulty.	Reconnect the HDD cable, or replace it.	
3	Replacing the HDD	The HDD is faulty.	Replace the HDD.	Detaching and Reattaching the HDD
4	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
6	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-2) Colored background**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The Background Density Adjustment is not set.	Set [Original Image] in [System Menu/Counter] key > [Common Settings] > [Function Defaults].	
2	Checking the settings	The background density is dark.	Set [Original Image] in [System Menu/Counter] key > [Common Settings] > [Function Defaults].	

Step	Check description	Assumed cause	Measures	Reference
3	Setting Background Density Adjustment	The Background Density Adjustment is not set.	Set [Background Density Adj.] to [Auto] in [Color/Image Quality].	
4	Setting Background Density Adjustment	The original background density is dark. The background density adjustment is dark.	Set [Background Density Adj.] to [Manual] in [Color/Image Quality], and adjust the background density.	
5	Checking the original	The original is raised at scanning.	Set the original during pressing.	
6	Checking the contact glass	The shading plate is dirty.	Clean the shading plate at the backside of the contact glass.	
7	Executing U411	The image is not adjusted.	Execute U411 [Table(Chart A)].	Executing U411
8	Checking the home position sensor	The home position sensor is not properly attached.	Reattach the home position sensor.	
9	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
10	Checking the lamp unit assy (mirror frame A, B).	The lamp unit assy (mirror frame A, B) is not properly attached.	Reattach the lamp unit assy (mirror frame A, B).	
11	Checking the ISU	The ISU is attached improperly.	Reattach the ISU.	Detaching and Reattaching the ISU
12	Replacing the lamp unit	The LED PWB is faulty.	Replace the lamp unit.	Detaching and Reattaching the lamp unit
13	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
14	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
15	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-3)Black or color spots appear on the image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the contact glass	The contact glass is dirty.	Clean the contact glass.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
4	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
6	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-4) Blurred characters / Color Shift**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the scanner rails	There is a load on the movement of the lamp unit assy since the foreign objects adhere on the scanner rails.	Remove the foreign objects on the scanner rails.	
2	Checking the lamp unit assy (mirror frame A, B).	The lamp unit assy (mirror frame A, B) is not properly attached.	Reattach the lamp unit assy (mirror frame A, B).	
3	Checking the scanner motor belt tension	A load is applied to the scanner movement since the belt tension is improper.	Adjust the scanner motor belt tension properly.	
4	Checking the wire drums	The foreign objects adhere on the wire drums.	Remove the foreign objects on the wire drums.	Detaching and Reattaching the scanner wires
5	Checking the pulleys in the lamp unit (mirror frame B)	The foreign objects adhere on the pulley groove.	Remove the foreign objects adhering on the pulleys in the lamp unit (mirror frame B).	
6	Checking the scanner wires	The scanner wires are dirty or off.	Clean and reattach the scanner wires.	Detaching and Reattaching the scanner wires
7	Checking the scanner wires	The scanner wires have some scratches.	Replace the scanner wires.	Detaching and Reattaching the scanner wires

**(3-5)Original center and copy image center are mismatched**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is not properly set on the contact glass.	Reset the originals.	
2	Checking the contact glass	The contact glass is not properly attached.	Reattach the contact glass.	
3	Executing U067	The scanner center line is not adjusted.	Adjust U067 [Front].	Executing U067
4	Executing U411	The automatic table scanning adjustment is not executed.	Execute U411 [Table(Chart A)].	Executing U411

**(3-6)Horizontal black streaks**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the contact glass	The contact glass is dirty.	Clean the contact glass.	
3	Executing U066	The backside image of the size direction plate is scanned. (Adjustment value of U066 [Front] is not proper.)	Adjust U066 [Front].	Executing U066
4	Executing U411	The backside image of the size direction plate is scanned. (Adjustment value of U411 [Table(ChartA)] is not proper.)	Execute U411 [Table(Chart A)].	Executing U411
5	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
6	Checking the CCD PWB	The CCD PWB is faulty.	Reconnect the CCD PWB wire. Then, replace the ISU if the issue is not resolved.	Detaching and Reattaching the ISU
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
8	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-7)Vertical black / color streaks or band**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the settings	Actual original size and detected original size are mismatched.	Set the original paper size.	
3	Checking the original cover	The original cover is dirty.	Clean the original cover.	
4	Executing U067	The center line settings are incorrect. (The streaks or bands appear out of the original image.)	Adjust U067 [Front].	Executing U067
5	Executing U411	The leading edge timing is incorrect. (Streaks or bands appear out of the original.)	Execute U411 [Table(Chart A)].	Executing U411
6	Checking the contact glass	The contact glass or the shading plate at the backside of the contact glass is dirty.	Clean the contact glass and the shading plate at the backside of the contact glass.	
7	Checking the mirror	The mirror is dirty.	Clean the mirrors of the lamp unit assy (mirror frame A, B).	
8	Checking the lamp unit assy (mirror frame A, B).	The dust is adhered on the lamp unit assy (mirror frame A, B).	Remove dust on the laser path of the lamp unit assy (mirror frame A, B).	
9	Cleaning the CCD PWB	Dust is on the CCD PWB.	Clean the CCD PWB using an air-blower.	
10	Executing U063	The image scanning position is incorrect.	Execute U063 to change the scanner shading position.	Executing U063
11	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
13	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB



**(3-8)There is a regular difference between the image leading edges of the original and copy**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is not properly placed. (The original leading edge is not aligned to the contact glass properly.)	Reset the originals.	
2	Executing U066	The scanner leading edge timing is incorrect	Adjust U066 [Front].	Executing U066
3	Executing U411	The scanner leading edge timing is incorrect	Execute U411 [Table(Chart A)].	Executing U411
4	Checking the home position sensor	The home position sensor is not properly attached.	Reattach the home position sensor.	
5	Checking the scanner drive belt	The scanner drive belt is loose.	Reattach the scanner drive belt.	
6	Checking the wire drums	The attachment of the wire drums is loose.	Re-tighten the screws for the wire drums.	Detaching and Reattaching the scanner wires
7	Checking the scanner drive gear	The attachment of the scanner drive gear is loose.	Retighten the screw of the scanner drive gear.	

**(3-9)Vertical white streaks or band**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is dirty.	Replace the original.	
2	Checking the mirror	The mirror is dirty.	Clean the mirrors of the lamp unit assy (mirror frame A, B).	
3	Checking the lamp unit assy (mirror frame A, B).	The dust is adhered on the lamp unit assy (mirror frame A, B).	Remove dust on the laser path of the lamp unit assy (mirror frame A, B).	
4	Checking the lens cover	The lens cover is off.	Reattach the lens cover.	Detaching and Reattaching the lens unit
5	Checking the shading plate	The shading plate at the backside of the contact glass is dirty.	Execute U063 to change the scanner shading position.	Executing U063
6	Replacing the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU

Step	Check description	Assumed cause	Measures	Reference
7	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB
8	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-10)Moire**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The original imaging quality is not properly set. (Moire changes depending on the print quality.)	Set [Original Image] in [System Menu/Counter] key > [Common Settings] > [Function Defaults].	
2	Checking the original	The original is not properly set. (Moire appears in the original scanning direction.)	Rotate the originals in 90 degrees and reset them.	
3	Executing U065	The ratio in the main scanning direction is large. (This problem occurs when the print ratio is set as 100%.)	Change the value at U065 [Main Scan] to reduce the scanner magnification in the main scanning direction.	Executing U065
4	Executing U411	Each adjustment of the scanner section is incorrect	Execute U411 [Table(Chart A)].	Executing U411

**(3-11)Blank image or entirely black image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The originals were set upside down.	Reset the original to correct the front and back direction.	
2	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
3	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU

Step	Check description	Assumed cause	Measures	Reference
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-12)Partly dark or light image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	Image quality is not properly adjusted. (Original type and image quality are mismatched.)	Set [Original Image] in [System Menu/Counter] key > [Common Settings] > [Function Defaults].	
2	Checking the original	The original is dirty.	Replace the original.	
3	Checking the original	The originals are bent or creased.	Stretch the bending or the paper creases of the original.	
4	Checking the original mat	The original mat shifts.	Reattach the original mat.	
5	Checking the contact glass	The contact glass is dirty.	Clean the contact glass.	
6	Checking the contact glass	The contact glass is not properly attached.	Reattach the contact glass.	
7	Checking the contact glass	Original is scanned on the bent contact glass.	Set the booklet original while not bending the contact glass.	
8	Checking the lens cover	The lens cover is off.	Reattach the lens cover.	Detaching and Reattaching the lens unit
9	Checking the lamp unit assy (mirror frame A, B).	The mirror is dirty.	Clean the mirrors of the lamp unit assy (mirror frame A, B).	
10	Replacing the lamp unit	A part of LED does not switch on.	Check if the LED lamp lights by executing U061 [CCD]. If it does not light, replace the lamp unit and execute U411 [Table(ChartA)].	Detaching and Reattaching the lamp unit
11	Checking the scanner rails	The lamp unit assy (mirror frame A, B) does not operate properly since the foreign objects adhere on the scanner rails or the grease on there is not enough.	Remove the foreign objects on the scanner rails, and apply the grease (Part name: PG-671 / Part number: 60170000) to there if necessary.	
12	Checking the LED reflector	The LED reflector is not attached properly or deformed.	Replace the lamp unit.	Detaching and Reattaching the lamp unit

Step	Check description	Assumed cause	Measures	Reference
13	Checking the lamp unit assy (mirror frame A, B).	The mirror is attached at the incorrect position.	Reattach the lamp unit assy (mirror frame A, B).	
14	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
15	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB
16	Checking the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-13) Blurred image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is wavy.	Make the originals flat, or replace it if possible.	
2	Checking the contact glass	The contact glass has condensation.	Remove the condensation on the contact glass.	
3	Checking the lamp unit assy (mirror frame A, B).	The mirror has condensation.	Remove the condensation on the mirrors of the lamp unit assy (mirror frame A, B).	Detaching and Reattaching the lamp unit
4	Checking the ISU	The lens has condensation.	Remove the condensation on the ISU lens.	Detaching and Reattaching the lens unit
5	Checking the CCD PWB	The glass of the CCD PWB has condensation.	Remove the condensation on the CCD PWB glass using a blower brush	Detaching and Reattaching the lens unit
6	Executing U411	Each auto adjustment of the scanner is incorrect.	Execute U411 [Table(Chart A)].	Executing U411
7	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU

Step	Check description	Assumed cause	Measures	Reference
8	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB
9	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-14)Part of the image is not copied**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	Marked part by highlighter pen on the original cannot be scanned.	Set [Highlight] to [On] at [System Menu/Counter] > [Common Settings] > [Function Defaults] > [Original Image]	
2	Checking the original	The original is not set properly.	Reset the originals.	
3	Checking the settings	The original size and the paper side do not match on the operation panel. (The setting is incorrect.)	Set the original size manually.	
4	Checking the settings	The copy position is rotated automatically.	Set [Auto Image Rotation] to [Off] from the System Menu.	
5	Checking the settings	The Border Erase function is not properly set. (Setting is too large.)	Lower the setting of the Border Erase.	
6	Checking the contact glass	The original scanning side of the contact glass is dirty.	Clean the original scanning side of the contact glass.	
7	Checking the shading plate	The shading plate is dirty.	Clean the shading plate at the backside of the contact glass.	
8	Checking the contact glass	The contact glass is not properly attached.	Reattach the contact glass.	
9	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
10	Checking the ISU	The ISU is attached improperly.	Reattach the ISU.	Detaching and Reattaching the ISU
11	Checking the original size sensor	The original size and the paper side do not match on the operation panel. (The original size sensor misdetects.)	Replace the original size sensor.	

Step	Check description	Assumed cause	Measures	Reference
12	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
14	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

**(3-15)Skewed image**

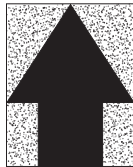



Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original is not properly set. (The original is skewed.)	Reset the originals.	
2	Checking the scanner unit	The scanner unit height is improper.	Adjust the whole scanner unit height.	
3	Checking the lamp unit assy (mirror frame A, B).	The lamp unit assy (mirror frame A, B) is not properly attached.	Reattach the lamp unit assy (mirror frame A, B).	



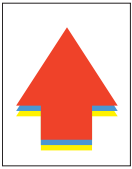
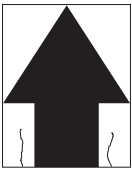

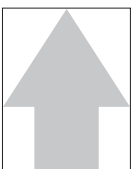


**(3-16)The entire image is too light**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The density is not properly adjusted. (The original type and image quality differs.)	Set the image quality according to the originals.	
2	Checking the settings	The density is not properly adjusted. ([EcoPrint] is set to "On".)	Change to [Off] at [System Menu/Counter] > [Common Setting] > [Function Defaults] > [EcoPrint].	
3	Checking the settings	The density is not properly adjusted. (The density setting is too light.)	Set the density setting to be dark.	
4	Checking the settings	The density is not properly adjusted. ([Background density] is set to "Off".)	Set [Manual] in the Background Density Adjustment to make dark.	
5	Checking the settings	[Prevent Bleed-thru] setting is [On]	Change to [Off] at [System Menu/Counter] > [Common Setting] > [Function Defaults] > [Prevent Bleed-thru].	
6	Checking the shading plate	The shading plate is dirty.	Clean the shading plate at the backside of the contact glass.	
7	Executing U411	The image is not adjusted.	Execute U411 [Table(Chart A)].	Executing U411

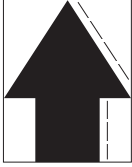
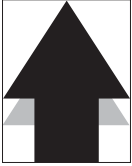

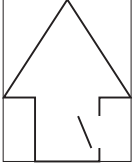

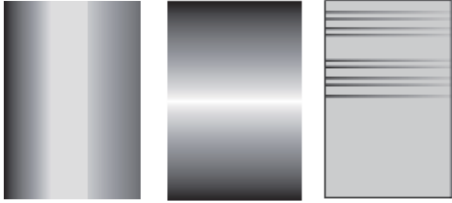

Step	Check description	Assumed cause	Measures	Reference
8	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. When the FFC terminals are peeled off or deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
9	Checking the ISU	The ISU is attached improperly.	Reattach the ISU.	Detaching and Reattaching the ISU
10	Checking the ISU	The CCD PWB is faulty.	Replace the ISU.	Detaching and Reattaching the ISU
11	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
12	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB



**(4)Engine Factors (Paper conveying cause: Transfer, Fuser and Separation)**

No.	Contents	Image sample
(4-1)	Colored background	
(4-2)	Black or color spots appear on the image	
(4-3)	Phenomenon1	
(4-4)	Blank image	

No.	Contents	Image sample
(4-5)	Phenomenon1	
(4-6)	Color shift in the main scanning direction	
(4-7)	Color shift in the sub scanning direction	
(4-8)	Paper creases	
(4-9)	Dirty reverse side	
(4-10)	The entire image is too light	
(4-11)	Horizontal streaks or band (white/black/ color)	
(4-12)	The irregular misalignment occurs between the leading edges of the original and copy image (Variation of paper leading edge timing)	



No.	Contents	Image sample
(4-13)	Blurred characters	
(4-14)	Offset	
(4-15)	Poor color reproduction	
(4-16)	Fusing failure	
(4-17)	Paper skew at the trailing edge	
(4-18)	Uneven transfer	
(4-19)	Blurred image	

No.	Contents	Image sample
(4-20)	Vertical white streaks or band	
(4-21)	Vertical black / color streaks or band	

**Content of Engine Factors (Paper conveying cause: Transfer, Fuser and Separation)**

**(4-1)Colored background**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the primary transfer belt unit	The primary transfer belt surface is dirty.	When the image failure appears with the primary transfer belt circumference interval (long period that spans between the sheets), clean the primary transfer belt. Then, replace the primary transfer belt unit if the image failure is not cleared.	Detaching and Reattaching the primary transfer belt unit
2	Checking the primary transfer bias contact of each color	The primary transfer bias contact of each color is deformed.	Correct the primary transfer bias contact so that it grounds securely.	
3	Checking the secondary transfer bias contact	The secondary transfer bias contact is deformed.	Correct the secondary transfer bias contact so that it grounds the shaft of the secondary transfer roller securely.	
4	Checking the secondary transfer roller unit	The secondary transfer roller is dirty.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller. If the issue is not resolved, replace the secondary transfer roller unit.	Detaching and reattaching the secondary transfer roller unit

**(4-2)Black or color spots appear on the image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cleaning prebrush	The primary transfer belt cannot be cleaned since the cleaning prebrush is dirty.	Clean the cleaning prebrush.	
2	Checking the primary transfer belt unit	There are smudges or scratches on the primary transfer belt surface, and they will cause the image failure in the belt circumference interval (long period that spans between the sheets).	When the image failure appears with the primary transfer belt circumference interval (long period that spans between the sheets), clean the primary transfer belt. Then, replace the primary transfer belt unit if the image failure is not cleared.	Detaching and Reattaching the primary transfer belt unit
3	Checking the secondary transfer roller unit	The secondary transfer roller is dirty or has some scratches.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller. If the issue is not resolved, replace the secondary transfer roller unit.	Detaching and reattaching the secondary transfer roller unit
4	Checking the fuser unit	The fuser belt surface is dirty or has some scratches.	When the image failure appears in the fuser belt circumference interval, clean the fuser belt. If not repaired, replace the fuser unit.	Detaching and Reattaching the fuser unit
5	Checking the primary transfer belt unit	The primary transfer belt cannot be cleaned with the faulty cleaning prebrush.	Replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit

**(4-3)Phenomenon1**

Step	Check description	Assumed cause	Measures	Reference
No	Step	Cause	Measures	Reference for the measures
1	Checking the paper	The paper is damp.	Replace with the dry paper.	
2	Checking the paper storage place	Paper is stored in the high humidity environment.	[Cassette heater standard model]Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.[Cassette heater optional model]Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.	Installing the cassette heater

Step	Check description	Assumed cause	Measures	Reference
3	Checking the primary transfer belt unit	The primary transfer belt surface is dirty or has some scratches.	When the image failure appears with the primary transfer belt circumference interval (long period that spans between the sheets), clean the primary transfer belt. Then, replace the primary transfer belt unit if the image failure is not cleared.	Detaching and Reattaching the primary transfer belt unit
4	Checking the secondary transfer roller unit	The secondary transfer roller is dirty or has some scratches.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller. If the issue is not resolved, replace the secondary transfer roller unit.	Detaching and reattaching the secondary transfer roller unit
5	Setting the media type	The media type is not properly set.	Set the proper media type via the System Menu.	
6	Checking the settings	The fuser temperature is shifted largely.	Execute U161 [Print] and reset the fuser temperature to the default value.	Executing U061

**(4-4)Blank image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the right cover	The right cover is not closed.	Check the lock of the right cover assy, and open and close the right cover (conveying unit).	
2	Checking the wire	The connectors are not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Transfer high-voltage PWB - Engine PWB	Wiring diagram
3	Checking the transfer high-voltage PWB	The secondary transfer bias output from the transfer high-voltage PWB is faulty.	Replace the transfer high-voltage PWB.	Detaching and reattaching the transfer high-voltage PWB
4	Checking the engine PWB	The ON signal of the secondary transfer high-voltage (3.3V to 0V) is not output from the engine PWB.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**(4-5)Phenomenon1**

Step	Check description	Assumed cause	Measures	Reference
No	Step	Cause	Measures	Reference for the measures
1	Checking the paper width guides, paper size guides or the MP paper width guides	The locations of the paper width guides, paper size guide A/B or the MP paper width guides do not fit with the paper size.	Relocate the paper width guides, paper size guide A/B or the MP paper width guides to fit them with the paper size.	
2	Executing U034	The center line when image writing the data is incorrect.	Adjust the center line at U034 [LSU Out Left].	Executing U034

**(4-6)Color shift in the main scanning direction**

Step	Check description	Assumed cause	Measures	Reference
1	Re-executing Color Registration	Color Registration is executed without executing Calibration.	Execute U467 and reset [Color Regist] by changing [On] > [Off] > [On]. Then, execute [Calibration] at U464 and execute [Color Registration] in order at U469.	Executing U467/U464/ U469
2	Checking the ID sensor and the ID sensor shutter	The ID sensor is dirty or the ID sensor shutter is not opened.	Check the opening / closing operation of the ID sensor shutter and fix it if necessary. And, clean the ID sensor.	
3	Detaching and Reattaching the LSU	The LSU is faulty.	Replace the LSU.	Detaching and Reattaching the LSU

**(4-7)Color shift in the sub scanning direction**

Step	Check description	Assumed cause	Measures	Reference
1	Re-executing Color Registration	Color Registration is executed without executing Calibration.	Execute U467 and reset [Color Regist] by changing [On] > [Off] > [On]. Then, execute [Calibration] at U464 and execute [Color Registration] in order at U469.	Executing U467/U464/ U469
2	Checking the ID sensor and the ID sensor shutter	The ID sensor is dirty or the ID sensor shutter is not opened.	Check the opening / closing operation of the ID sensor shutter and fix it if necessary. And, clean the ID sensor.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the primary transfer belt unit	The primary transfer belt is deteriorated.	Check if the color registration patch appears twice on the both ends of the primary transfer belt. If it does not appear twice, replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit
4	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB

**(4-8)Paper creases**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper width guides, paper size guides or the MP paper width guides	The locations of the paper width guides, paper size guide A/B or the MP paper width guides do not fit with the paper size.	Relocate the paper width guides, paper size guide A/B or the MP paper width guides to fit them with the paper size.	
2	Checking the paper	The paper curls or is wavy.	Replace the paper.	
3	Checking the paper storage place	Paper is stored in the high humidity environment.	[Cassette heater standard model]Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.[Cassette heater optional model]Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.	Installing the cassette heater
4	Checking the pressure spring	The pressure springs are not attached properly at both ends of the registration roller, so the pressure balance is uneven.	Reattach the springs at both ends of the left and right registration rollers.	
5	Checking the fuser unit	The pressure springs at the machine front and rear ends of the fuser unit are not properly attached.	Check the pressure balance of both ends of the fuser unit by checking the nipped pressure on the solid image. If the balance is uneven, replace the fuser unit.	Detaching and Reattaching the fuser unit

**(4-9) Dirty reverse side**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the secondary transfer roller unit	The secondary transfer roller is dirty or has some scratches.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller. If the issue is not resolved, replace the secondary transfer roller unit.	Detaching and reattaching the secondary transfer roller unit
2	Checking the settings	The secondary transfer bias is improperly set.	Reset the secondary transfer bias to the default value at U106.	Executing U106
3	Checking the press roller	The pressure roller is dirty due to the media type setting.	Clean the press roller and set up the proper media type in the System Menu.	
4	Checking the conveying guide and the developer unit	The conveying guide or the developer unit is dirty.	Clean the conveying guide and developer unit.	

**(4-10) The entire image is too light**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The paper is damp.	Replace the paper.	
2	Checking the paper storage place	Paper is stored in the high humidity environment.	[Cassette heater standard model]Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.[Cassette heater optional model]Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.	Installing the cassette heater
3	Checking the right cover	The right DP hinge position is not adjusted back and forth.	Open the right cover (conveying unit) once, and close it firmly.	
4	Executing U101	The input current value for the primary transfer roller is not proper.	Execute U101 [Force Execute].	Executing U101
5	Checking the secondary transfer roller unit	The secondary transfer roller does not contact the primary transfer belt or the contact is not enough.	When the secondary transfer roller shifts, correct the pressure position.	
6	Checking the settings	The secondary transfer voltage is improperly set.	Reset the secondary transfer bias to the default value at U106.	Executing U106

Step	Check description	Assumed cause	Measures	Reference
7	Checking the secondary transfer bias contact	The secondary transfer bias contact is dirty or deformed, so, the impression is unavailable.	Clean the secondary transfer bias contact. Or, correct its shape so that it is grounded securely.	
8	Detaching and reattaching the transfer high-voltage PWB	The secondary transfer bias output from the transfer high-voltage PWB is faulty.	Replace the transfer high-voltage PWB.	Detaching and reattaching the transfer high-voltage PWB

**(4-11)Horizontal streaks or band (white/black/color)**

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning the primary transfer belt	The primary transfer belt surface is dirty.	When the image failures appear with the primary transfer belt circumference interval (long cycle spreading over the sheets), clean the primary transfer belt.	Detaching and Reattaching the primary transfer belt unit
2	Cleaning the fuser belt	The fuser belt is dirty.	When the image failure appears in the fuser belt circumference interval, clean the fuser belt.	Detaching and Reattaching the fuser unit
3	Checking the right cover	Only one side of the right cover (conveying unit) is closed, or the pressure spring is deformed.	Close the right cover (conveying unit).	
4	Checking the secondary transfer roller unit	The pressure spring is not properly attached or deformed.	Reattach the pressure spring. Replace the secondary transfer roller unit if the issue is not resolved.	Detaching and reattaching the secondary transfer roller unit
5	Checking the primary transfer belt unit	The primary transfer belt surface is faulty.	Replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit
6	Checking the fuser unit	The fuser belt surface has some scratches.	Replace the fuser unit.	Detaching and Reattaching the fuser unit



**(4-12)The irregular misalignment occurs between the leading edges of the original and copy image (Variation of paper leading edge timing)**

Step	Check description	Assumed cause	Measures	Reference
1	Executing U034	The leading edge timing is not properly adjusted.	Adjust the leading edge timing at U034 [LSU Out Top].	Executing U034
2	Executing U051	The paper loop amount before registration is improper.	Execute U051 to adjust the paper loop amount before registration.	Executing U051
3	Checking the wire	The paper conveying clutches and the motors cannot operate smoothly since their connectors are not properly connected.	Reconnect the connectors of the paper conveying clutches and the motors.	
4	Checking the clutches and motors	The paper conveying clutches and the motors cannot operate smoothly since they are not properly attached.	Reattach the paper conveying clutches and the motors.	
5	Detaching and Reattaching the feed drive unit	The paper conveying drive is faulty and it cannot operate smoothly.	Replace the feed drive unit.	Detaching and Reattaching the feed drive unit

**(4-13)Blurred characters**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	Unspecified papers are used.	Replace with the paper within the specification.	
2	Checking the settings	The media type is not properly set.	Set the proper media type via the System Menu.	
3	Applying the grease	The drives from the conveying motors are not smoothly transmitted.	Apply the grease to the gear.	
4	Checking the conveying guide	The conveying guide is deformed.	Replace the conveying guide.	
5	Checking the fuser unit	The fuser front guide is deformed or the fuser pressure is uneven.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

**(4-14)Offset**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	Unspecified papers are used.	Replace with the paper within the specification, or change to the media type setting closest to the specified paper.	
2	Checking the settings	The media type is not properly set.	Change the settings according to the media type (paper weight).	

Step	Check description	Assumed cause	Measures	Reference
3	Executing U107	The setting value of the primary transfer cleaning voltage at U107 is incorrect.	Reset the transfer bias to the default value at U106.	Executing U107
4	Checking the primary transfer belt unit	The primary transfer belt surface is dirty.	When the image failures appear with the primary transfer belt circumference interval (long cycle spreading over the sheets), clean the primary transfer belt.	Detaching and Reattaching the primary transfer belt unit
5	Checking the primary transfer cleaning bias contact	The primary transfer cleaning bias contact smudges or is deformed.	Clean the primary transfer cleaning bias contact. Or, correct its shape so that it is securely grounded.	
6	Executing U106	The secondary transfer voltage is improperly set.	Reset the secondary transfer bias to the default value at U106.	Executing U106
7	Checking the secondary transfer roller unit	The secondary transfer roller is dirty.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller.	
8	Executing U161	The higher fuser temperature is set.	Execute U161 [Print] and reset the fuser temperature to the default value.	Executing U061
9	Checking the fuser unit	The fuser belt is dirty.	When the image failure appears in the fuser belt circumference interval, clean the fuser belt.	Detaching and Reattaching the fuser unit
10	Checking the fuser high-voltage PWB	The bias from the fuser high-voltage PWB cannot be applied to the fuser discharging needles in the fuser unit.	Check if the bias contact contacts the fuser unit or the connectors on the fuser high-voltage PWB are properly connected. If the bias is not output from the fuser high-voltage PWB, replace the fuser high-voltage PWB.	
11	Detaching and Reattaching the primary transfer belt unit	Transfer cleaning voltage is not applied due to the broken wire in the primary transfer belt unit.	Replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit
12	Detaching and reattaching the transfer high-voltage PWB	The transfer high-voltage PWB is faulty.	Replace the transfer high-voltage PWB.	Detaching and reattaching the transfer high-voltage PWB
13	Checking the fuser unit	The fuser belt surface has some scratches.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

**(4-15)Poor color reproduction**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The paper is damp.	Replace the paper.	
2	Checking the paper storage place	Paper is stored in the high humidity environment.	[Cassette heater standard model]Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.[Cassette heater optional model]Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.	Installing the cassette heater
3	Checking the paper	Rough paper for monochrome print is used.	Use the color paper with smooth surface that fits for color print.	
4	Executing U140	The main unit is installed in high altitude.	Set the proper altitude at U140 [Altitude Adjustment].	Executing U140
5	Adjusting the image	The half tone image cannot be reproduced.	Execute [Calibration] and [Tone Curve Adjustment] from [Adjustment/Maintenance] in the System Menu.	
6	Checking the developer unit	The developer powder in the developer unit is deteriorated.	Isolate the abnormal color and execute Developer Refresh for that color.	
7	Checking the drum unit and the developer unit	The drum unit or the main charger roller unit is not properly installed.	Reattach the main charger roller unit or the drum unit that has poor reproduction.	Detaching and reattaching the drum unit / main charger roller unit
8	Checking the settings	The proper color reproduction mode is not selected in the [Imaging] tab in the print settings at the PC.	Change [Color reproduction] in the [Imaging] tab in the print settings at the PC.	
9	Executing U485	The printer color table is not selected.	Select the proper color table at U485.	Executing U485

Step	Check description	Assumed cause	Measures	Reference
10	Checking the settings	Printer data is CYMK, but not RGB.	Change [Color conversion processing] of Print quality in KPDL to Image Quality prior mode.	
11	Checking the CCD PWB	The full color cannot be reproduced since the CCD PWB is faulty. (Red images are output.)	Reconnect the wire on the CCD PWB. Then, fix or replace it if it is pinched by the other part or has any damage. If the issue is not resolved, replace the ISU and execute U411.	Wiring diagram

**(4-16)Fusing failure**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	Unspecified papers are used.	Replace with the proper paper.	
2	Checking the paper	The media type is not properly set.	Set the proper media type via the System Menu.	
3	Executing U161	The lower fuser temperature is set.	Change the fuser temperature to the default value.	Executing U161
4	Checking the fuser unit	The nipped pressure (width) to the solid image is low and fuser pressure setting (spring) is too weak.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

**(4-17)Paper skew at the trailing edge**

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning the secondary transfer unit	The neighboring parts of the secondary transfer roller are dirty with paper dust.	Clean the secondary transfer roller, separation needles, discharger sheet and the paper path.	
2	Removing foreign material	Paper is caught by foreign material such as a piece of paper.	Replace the toner sucking fan motor if it does not operate properly when executing U037 [Toner].	
3	Relocating the paper width guides / paper size guides / MP paper width guides	The paper width guides, paper size guide A/B or MP paper width guides are not aligned to the paper size, and the paper is skewed.	Relocate the paper width guides, paper size guide A/B or the MP paper width guides to fit them with the paper size.	
4	Checking the conveying section	The left and right registration rollers or the middle pulleys are not properly attached, or they are dirty.	Check if the left and right registration rollers and the middle pulleys are properly attached. If necessary, reattach them. Also, if they are dirty with toner or paper dust, clean them.	

Step	Check description	Assumed cause	Measures	Reference
5	Opening and reclosing the right cover	The right cover is not firmly closed.	Open the right cover (conveying unit) once, and close it firmly.	
6	Reinstalling the fuser unit	The fuser unit is not properly installed.	Insert the fuser unit straight into the main unit, and lock both sides of the fuser unit firmly.	Detaching and Reattaching the fuser unit

**(4-18)Uneven transfer**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the conveying section	The conveying section is not closed completely.	Open the right cover (conveying unit) once, and close it firmly.	
2	Checking the cleaning prebrush	Paper dust is accumulated around the cleaning prebrush.	Remove the cleaning cover and clean the cleaning prebrush.	
3	Checking the primary transfer cleaning bias contact	The primary transfer cleaning bias contact smudges or is deformed.	Clean the primary transfer cleaning bias contact. Or, correct its shape so that it is securely grounded.	
4	Checking the primary transfer belt unit	The primary transfer belt surface is dirty.	When the image failures appear with the primary transfer belt circumference interval (long cycle spreading over the sheets), clean the primary transfer belt.	Detaching and Reattaching the primary transfer belt unit
5	Checking the secondary transfer roller unit	The secondary transfer roller is dirty.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller.	
6	Checking the secondary transfer roller unit	The secondary transfer roller is faulty. Or, the pressure spring is deformed.	Correct the shape of the pressure spring. Replace the secondary transfer roller unit if nit is not fixed.	Detaching and reattaching the secondary transfer roller unit
7	Checking the primary transfer belt unit	The primary transfer belt surface has some scratches.	Replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit

Step	Check description	Assumed cause	Measures	Reference
8	Checking the primary transfer cleaning bias contact	The primary transfer cleaning bias contact is faulty.	Replace the primary transfer belt unit, or the transfer high-voltage PWB.	Detaching and reattaching the primary transfer belt unit / transfer high-voltage PWB
9	Checking the fuser unit	The roller, or the parts in the drive section or the fuser press-release section are deformed or worn down.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

**(4-19) Blurred image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The paper is damp.	Replace with the new dry paper.	
2	Checking the paper storage place	Paper is stored in the high humidity environment.	[Cassette heater standard model]Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.[Cassette heater optional model]Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.	Installing the cassette heater

**(4-20) Vertical white streaks or band**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the primary transfer belt unit	The primary transfer belt surface is dirty or has some scratches.	When the image failure appears with the primary transfer belt circumference interval (long period that spans between the sheets), clean the primary transfer belt. Then, replace the primary transfer belt unit if the image failure is not cleared.	Detaching and Reattaching the primary transfer belt unit

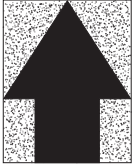
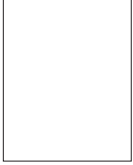
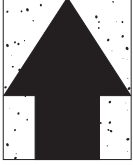



Step	Check description	Assumed cause	Measures	Reference
2	Checking the secondary transfer roller unit	The secondary transfer roller is dirty or has some scratches.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller. If the issue is not resolved, replace the secondary transfer roller unit.	Detaching and reattaching the secondary transfer roller unit
3	Checking the upper/lower change guide	Paper strongly bumps to the upper and lower change guides.	Check the paper loop amount when ejecting or shifting paper, and reattach the upper and lower change guides.	

**(4-21)Vertical black / color streaks or band**




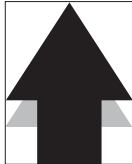
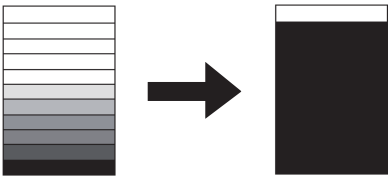


Step	Check description	Assumed cause	Measures	Reference
1	Checking the fuser unit	The separation claws are dirty with toner.	Clean the separation claws.	
2	Checking the settings	The media type is not properly set.	Set the proper media type via the System Menu.	
3	Checking the upper/lower change guide	The upper and lower change guides are dirty with toner, or toner is adhered on the guides.	Clean the upper and lower change guides.	
4	Checking the separation needles	The separation needles are dirty with paper dust or toner.	Clean the separation needles with the cleaning brush, etc.	
5	Checking the primary transfer belt unit	The primary transfer belt surface is dirty or has some scratches.	When the image failure appears with the primary transfer belt circumference interval (long period that spans between the sheets), clean the primary transfer belt. Then, replace the primary transfer belt unit if the image failure is not cleared.	Detaching and Reattaching the primary transfer belt unit
6	Checking the secondary transfer roller unit	The secondary transfer roller is dirty, is deformed or is worn down.	When the image failure appears in the secondary transfer roller circumference interval, clean the secondary transfer roller. If the issue is not resolved, replace the secondary transfer roller unit.	Detaching and reattaching the secondary transfer roller unit
7	Checking the cleaning prebrush	The primary transfer belt cannot be cleaned since the cleaning prebrush is dirty.	Clean the cleaning prebrush.	

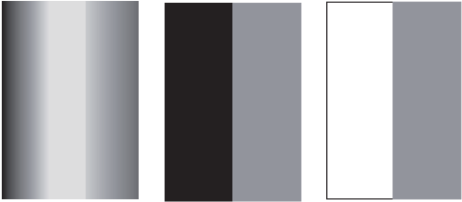

Step	Check description	Assumed cause	Measures	Reference
8	Checking the primary transfer cleaning bias contact	The primary transfer cleaning bias contact smudges or is deformed.	Clean the primary transfer cleaning bias contact. Or, correct its shape so that it is securely grounded.	
9	Detaching and reattaching the transfer high-voltage PWB	The cleaning bias is not generated from the transfer high-voltage PWB.	Replace the transfer high-voltage PWB.	Detaching and reattaching the transfer high-voltage PWB

**(5)Engine Factors (Image forming cause)**

No.	Contents	Image sample
(5-1)	Colored background	
(5-2)	Blank image	
(5-3)	Black spots appear on the image	
(5-4)	Entire black image	
(5-5)	Horizontal streaks or band (white/black)	
(5-6)	Irregular horizontal white spreads or spots appear on the image	



No.	Contents	Image sample
(5-7)	Horizontal uneven density	
(5-8)	The entire image is too light	
(5-9)	Part of the image is not copied	
(5-10)	Offset	
(5-11)	Poor grayscale reproduction	
(5-12)	Blurred image	
(5-13)	Vertical black streaks or band	

No.	Contents	Image sample
(5-14)	Vertical uneven density	
(5-15)	Vertical white streaks or band	

**Content of Engine Factors (Image forming cause)**

**(5-1)Colored background**

Step	Check description	Assumed cause	Measures	Reference
1	Measures for improving the image quality	Uncharged toner increases due to the continuous high coverage printing in the high temperature environment. Or the developer bias is controlled at the higher level since the calibration was executed when the density was too light.	Execute "Developer Refresh", "Calibration" and "Tone Curve Adjustment" in order.	
2	Checking the developer bias contact	The developer bias contact is dirty or deformed.	Clean the developer bias contact, or correct its shape so that it grounds securely.	
3	Checking the developer unit	The toner sensor is faulty.	Reinstall the developer unit. Replace it if it is not fixed.	Detaching and Reattaching the developer unit
4	Checking the temperature inside the main unit	Temperature is low in the installation environment.	When the internal temperature indicated in U139 is 16°C / 60.8°F or less, request the user to change the installation environment where the room temperature is warmer than 16°C / 60.8°F.	Executing U139
5	Checking the drum unit and the developer unit	The drum unit does not ground.	Reattach the main charger roller unit to the drum unit and reinstall the drum unit into the main unit to ensure secure contact.	Detaching and reattaching the drum unit / main charger roller unit

Step	Check description	Assumed cause	Measures	Reference
6	Checking the settings	The setting value of the main high-voltage is incorrect.	If the setting values at U100 are not the default values, reset them to the default values.	Executing U100
7	Checking the main charger unit	The main charger roller surface is dirty.	Clean the main charger roller surface. Replace the main charger roller unit if the issue is not resolved.	Detaching and reattaching the main charger roller unit
8	Checking the wire	The connectors are not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Main high-voltage PWB - Engine PWB	Wiring diagram
9	Replacing the main high-voltage PWB	The high-voltage contact of the main high-voltage PWB is deformed or damaged.	Replace the main high-voltage PWB.	Detaching and Reattaching the main high-voltage PWB
10	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**(5-2)Blank image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the developer bias contact	The developer bias contact is dirty or deformed.	Clean the developer bias contact, or correct its shape so that it grounds securely.	
2	Checking the developer unit	The developer drive gear is faulty.	Replace the developer unit.	Detaching and Reattaching the developer unit
3	Checking the wire	The connector is not properly connected.	Reconnect the wires on the main high-voltage PWB.	Wiring diagram
4	Executing U140	The setting value of the developer bias is improper.	Execute U140 and reset the developer bias to the default value.	Executing U140
5	Checking the developer motor	The developer motor does not properly rotate, or the drive components such as the drive gears and the couplings are faulty.	Reattach the developer motor and reconnect the wire. Then, replace the developer motor if it is not fixed.	
6	Checking the primary transfer bias contact of each color	The primary transfer bias contact is dirty or deformed.	Clean the primary transfer bias contact of each color or correct the shape so that it grounds securely.	

Step	Check description	Assumed cause	Measures	Reference
7	Replacing the main high-voltage PWB	The main high-voltage PWB is faulty.	Replace the main high-voltage PWB.	Detaching and Reattaching the main high-voltage PWB
8	Checking the contact	The contact is dirty or deformed.	Clean the contacts between the transfer high-voltage PWB and the primary transfer section, or correct them so that they ground securely.	
9	Replacing the transfer high-voltage PWB	The transfer high-voltage PWB is faulty.	Replace the transfer high-voltage PWB.	Detaching and reattaching the transfer high-voltage PWB
10	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the FFC to the LSU. If the FFC is broken, replace it.	
11	Checking the LSU	The APC PWB in the LSU is faulty.	Replace the LSU.	Detaching and Reattaching the LSU
12	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB

**(5-3)Black spots appear on the image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the drum	The drum surface is dirty or has some scratches.	Execute the drum refresh. If not repaired, replace the drum unit.	Detaching and Reattaching the drum unit
2	Checking the main charger unit	The main charger roller surface is dirty.	Replace the main charger roller unit.	Detaching and reattaching the main charger roller unit
3	Checking the settings	The developer bias is easy to leak since the main unit is installed in the low altitude environment.	Set the proper altitude at U140 [Altitude Adjustment].	Executing U140

Step	Check description	Assumed cause	Measures	Reference
4	Executing U140	Developer bias leaks.	Execute [AC Calib] at U140.	Executing U140
5	Checking the developer unit	The developer roller or the magnet roller is dirty, or is faulty.	Clean the developer roller. Or, replace the developer unit if not repaired after cleaning.	Detaching and Reattaching the developer unit

**(5-4)Entire black image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the drum unit and the developer unit	The drum unit or the main charger roller unit is not properly installed.	Reattach the main charger roller unit to the drum unit and reinstall the drum unit into the main unit to ensure secure contact.	Detaching and reattaching the drum unit / main charger roller unit
2	Checking the main charger roller contact	The main charger roller contact is dirty or deformed.	Clean the main charger roller contact and correct its shape so it is grounded securely.	Detaching and reattaching the main charger roller unit
3	Checking the developer bias contact	The developer bias contact is dirty or deformed.	Clean the developer bias contact, or correct its shape so that it grounds securely.	
4	Checking the high-voltage contact	The high-voltage contact of the main high-voltage PWB is dirty or deformed.	Clean the high-voltage contact and correct it so that it grounds securely. Or reattach the main high-voltage PWB.	Detaching and Reattaching the main high-voltage PWB
5	Checking the wire	The wires on the main high-voltage PWB are not properly connected, or the wires or the main high-voltage PWB are faulty.	Check the wire connection of the main high-voltage PWB. Clean the terminals and insert the connectors all the way. When the wires are broken, short-circuited or have a ground fault, or the wire terminals are peeled off, replace the wires.	Wiring diagram
6	Replacing the main high-voltage PWB	The main high-voltage PWB is faulty.	Replace the main high-voltage PWB.	Detaching and Reattaching the main high-voltage PWB

Step	Check description	Assumed cause	Measures	Reference
7	LSU replacement	The APC PWB in the LSU is faulty.	Replace the LSU.	Detaching and Reattaching the LSU
8	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB

**(5-5)Horizontal streaks or band (white/black)**

Step	Check description	Assumed cause	Measures	Reference
1	Specifying the faulty color	(Judgment of the abnormal color)	Isolate the faulty color by printing the test page from the System Menu or output [Color Belt] at U089.	
2	Executing U140	U140 [AC Calib] is not executed.	Enter U140 [AC Calib] and [Calibration], and change the setting of the all colors from [Off] to [On]. Then, select [Execute] to execute it.(The Sleeve AC values at U140 becomes lower than the ones before executing the Calibration.)	Executing U140
3	Checking the developer unit	Both ends of the developer roller are dirty and it causes the developer bias leakage.	Clean both ends of the developer roller and the developer bias contact.	
4	Executing Developer refresh	The last image remains on the developer roller surface.	Execute the developer refresh.	
5	Developer unit replacement	Both ends of the developer roller and the developer bias contact are deteriorated and it causes the developer bias leakage.	Replace the developer unit.	Detaching and Reattaching the developer unit
6	Executing Drum refresh	The drum surface is dirty.	Execute Drum refresh.	
7	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
8	Drum unit replacement	There are some scratches on the drum surface.	Replace the drum unit.	Detaching and Reattaching the drum unit
9	Main charger roller unit replacement	The main charger roller surface is dirty or has some scratches.	When the image failures appear in the main charger roller circumference interval, replace the main charger roller unit.	Detaching and reattaching the main charger roller unit

Step	Check description	Assumed cause	Measures	Reference
10	Checking the primary transfer bias contact of each color	The primary transfer bias contact is dirty or deformed.	Clean the primary transfer bias contact. Or, correct its shape so that it grounds certainly. If it is not fixed, replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit
11	Checking the wire	The bias voltage is irregularly generated from the high-voltage PWB due to the contact failure.	Reconnect the wires on the main high-voltage PWB.	Wiring diagram
12	Replacing the main high-voltage PWB	The main high-voltage PWB is faulty and the bias current is not evenly output.	Replace the main high-voltage PWB.	Detaching and Reattaching the main high-voltage PWB

**(5-6)Irregular horizontal white spreads or spots appear on the image**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the installation environment	The settings do not match the installation environment (High altitude exceeding 1,500m above sea-level).	Change the setting of U140 [Altitude Adjustment] to [1001-2000m]. (If the issue is not resolved, further change the setting to [2001-3000m]). Then, enter U140 [AC Calib] and [Calibration], and change the setting of the faulty color from [Off] to [On]. Set the setting value of the faulty color at [Magnification] to "0" or less. (The lower limit value: -10)	Executing U140
2	Checking the main charger roller contact	The main charger roller contact does not ground.	Correct the main charger roller contact so that it grounds securely.	
3	Checking the drum unit and the developer unit	The drum unit is not properly installed, so it does not ground the drum drive shaft.	Reinstall the drum unit.	Detaching and Reattaching the drum unit
4	Checking the paper	Paper with the high surface resistance is used.	Replace with the recommended paper.	

**(5-7)Horizontal uneven density**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the main charger unit	The main charge roller rotates irregularly.	Reattach the main charger roller unit.	Detaching and reattaching the main charger roller unit
2	Main charger roller unit replacement	The charger cleaning roller is deformed.	Replace the main charger roller unit.	Detaching and reattaching the main charger roller unit
3	Checking the developer unit	The DS pulleys are dirty.	Clean the DS pulleys at both ends of the developer unit.	
4	Developer unit replacement	The DS pulleys are faulty.	Replace the developer unit.	Detaching and Reattaching the developer unit
5	Checking the developer bias contact	The conduction is not stabilized due to the dirty developer bias contact.	Clean the developer bias contact.	
6	Checking the developer unit	The developer powder in the developer unit is deteriorated.	Execute the developer refresh. If not repaired, replace the developer unit.	
7	Executing Drum refresh	Toner smudges in the shape of a streak are on both ends of the drum surface.	Execute Drum refresh.	
8	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
9	Drum unit replacement	The drum surface is worn down.	Replace the drum unit.	Detaching and Reattaching the drum unit
10	LSU replacement	The laser emission is uneven.	Replace the LSU.	Detaching and Reattaching the LSU



**(5-8)The entire image is too light**

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the toner container	Toner is collected on one side.	Sufficiently shake the toner container and reinstall it to the main unit.	Detaching and reattaching the toner container
2	Checking the toner supply opening	The toner supply opening does not open.	Replace the toner container.	Detaching and reattaching the toner container
3	Measures for improving the image quality	Toner is deteriorated due to frequent low coverage printing.	Execute "Developer Refresh", "Calibration" and "Tone Curve Adjustment" in order.	
4	Checking the drum unit and the developer unit	The drum unit or the developer unit is not properly attached, and so the developer roller does not contact the drum.	Reinstall the drum unit and the developer unit.	Detaching and reattaching the drum units / developer unit
5	Checking the developer bias contact	The developer bias contact is deformed.	Correct the developer bias contact so that it grounds securely.	
6	Executing U140	The developer bias values that are fixed (except "Sleeve AC" and "Mag DC") and are not changed according to the Calibration are changed from the default value.	Execute U140 and reset the developer bias to the default value.	Executing U140
7	Checking the developer unit	The DS pulleys are dirty.	Clean the DS pulleys at both ends of the developer unit.	
8	Developer unit replacement	The DS pulleys are faulty.	Replace the developer unit.	Detaching and Reattaching the developer unit
9	Checking the developer unit	The toner sensor has a fault and so toner is not supplied.	Execute Developer Refresh when the four-color PG image output as test page is too light.	Detaching and Reattaching the developer unit
10	Checking the developer bias	The developer bias is set to low.	When the Mag DC value at U140 is less than the upper limit value, change U464 [Target Value] > [Thickness] from the default value to the value between 0 and +30. Then, execute Calibration at U464.	Executing U464

Step	Check description	Assumed cause	Measures	Reference
11	Checking the drum unit and the developer unit	The drum surface has condensation or is worn down.	Execute the drum refresh. If not repaired, replace the drum unit.	Detaching and Reattaching the drum unit
12	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
13	Checking the main charger roller contact	The voltage applied to the main charger roller contact is too high.	Correct the main charger roller contact so that it grounds securely.	
14	Cleaning the eraser	The eraser is dirty.	Clean the eraser.	
15	Checking the eraser	The eraser is faulty.	Insert the unit all the way to reconnect the connector. If the issue is not resolved, replace the drum unit.	Detaching and Reattaching the drum unit
16	Checking the wire	The connector is not properly connected.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity.	Wiring diagram
17	Replacing the main high-voltage PWB	The main high-voltage PWB is faulty.	Replace the main high-voltage PWB.	Detaching and Reattaching the main high-voltage PWB
18	Checking the LSU	The LSU is dirty, or faulty.	Check the wire / FFC connection and replace the LSU.	Detaching and Reattaching the LSU
19	Checking the primary transfer belt unit	The primary transfer roller is not properly attached.	When the primary transfer roller comes off, replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit
20	Checking the primary transfer bias contact of each color	The primary transfer bias contact of each color is deformed.	Correct the primary transfer bias contact so that it grounds securely.	
21	Primary transfer belt unit replacement	The primary transfer belt is deteriorated.	Replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit
22	Checking the settings	The setting value of the transfer high-voltage PWB is changed.	If the setting values at U106 are not the default values, reset them to the default values.	Executing U106

Step	Check description	Assumed cause	Measures	Reference
23	Checking the transfer high-voltage PWB	The transfer high-voltage PWB is faulty.	Check the connection to the engine PWB, and then replace the transfer high-voltage PWB if necessary.	Detaching and reattaching the transfer high-voltage PWB
24	Checking the wire	The connectors are not properly connected or the wire is faulty.	Check the toner hopper motor wire connection, and then clean the terminals and insert the connector all the way. When the wire is broken, short-circuited or has a ground fault, or the wire terminals are peeled off, replace the wire.	Wiring diagram
25	Checking the engine PWB	The connectors or the FFCs on the engine PWB are not properly connected. Or the wires, FFCs or the engine PWB are faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB

**(5-9)Part of the image is not copied**

Step	Check description	Assumed cause	Measures	Reference
1	Executing Drum refresh	The drum surface is dirty.	Execute Drum refresh.	
2	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
3	Primary transfer belt unit replacement	The primary transfer roller is dirty or deformed.	Replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit

**(5-10)Offset**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the drum unit and the developer unit	The drum surface is dirty.	Execute Drum refresh.	
2	Drum unit replacement	The drum surface is worn down or has some scratches.	Replace the drum unit.	Detaching and Reattaching the drum unit
3	Checking the developer unit	The developer roller is dirty	Clean the developer roller.	
4	Developer unit replacement	The developer roller surface is worn down or has scratches.	Replace the developer unit.	Detaching and Reattaching the developer unit

**(5-11)Poor gray scale reproduction**

Step	Check description	Assumed cause	Measures	Reference
1	Adjusting the image	Calibration or Gray-scale Adjustment is not executed.	Execute [Calibration] and [Tone Curve Adjustment] from [Adjustment/Maintenance] in the System Menu.	

**(5-12)Blurred image**

Step	Check description	Assumed cause	Measures	Reference
1	Executing Drum refresh	The drum surface has condensation.	Execute Drum refresh.	
2	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
3	Executing the Laser Scanner Cleaning	The LSU glass is dirty.	Execute Laser Scanner Cleaning.	
4	LSU replacement	The LSU glass is deteriorated.	Replace the LSU.	Detaching and Reattaching the LSU

**(5-13)Vertical black streaks or band**

Step	Check description	Assumed cause	Measures	Reference
1	Executing Drum refresh	The drum surface is dirty.	Execute Drum refresh.	
2	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
3	Drum unit replacement	The drum surface is worn down.	Replace the drum unit.	Detaching and Reattaching the drum unit
4	Checking the main charger unit	The main charge roller surface is dirty in the shape of a streak.	Clean the main charge roller surface.	Detaching and reattaching the main charger roller unit
5	Main charger roller unit replacement	The main charge roller surface is deteriorated in the streak shape.	Replace the main charger roller unit.	Detaching and reattaching the main charger roller unit
6	Checking the developer unit	Foreign objects are on the developer roller surface.	Clean the developer roller. Or, replace the developer unit if not repaired after cleaning.	Detaching and Reattaching the developer unit

**(5-14)Vertical uneven density**

Step	Check description	Assumed cause	Measures	Reference
1	LSU replacement	LSU emits the laser unevenly. (Inner mirror comes off.)	Replace the LSU.	Detaching and Reattaching the LSU
2	Checking the primary transfer belt unit	The primary transfer belt does not contact the drum. (The primary transfer roller does not evenly press the primary transfer belt to the drum.)	Reattach the primary transfer belt unit.	
3	Primary transfer belt unit replacement	The primary transfer belt contacts the drum unevenly.	Replace the primary transfer belt unit.	Detaching and Reattaching the primary transfer belt unit
4	Executing Drum refresh	The drum surface has condensation.	Execute Drum refresh.	
5	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
6	Checking the main charger unit	The main charge roller surface is dirty in the shape of a streak.	Clean the main charger roller surface. Replace the main charger roller unit if the issue is not resolved.	Detaching and reattaching the main charger roller unit
7	Drum unit replacement	The drum surface is worn down.	Replace the drum unit.	Detaching and Reattaching the drum unit
8	Checking the developer unit	The toner layer on the developer roller is uneven.	Execute the developer refresh. If not repaired, replace the developer unit.	

**(5-15)Vertical white streaks or band**

Step	Check description	Assumed cause	Measures	Reference
1	Executing the Laser Scanner Cleaning	The LSU glass is dirty.	Execute Laser Scanner Cleaning.	
2	Checking the developer unit	Foreign objects are in the developer unit.	Replace the developer unit with faulty color.	Detaching and Reattaching the developer unit
3	Checking the laser path	There are foreign objects on the laser path of the LSU.	Remove foreign objects on the frame or sealing material between the developer unit and the drum unit.	

Step	Check description	Assumed cause	Measures	Reference
4	Checking the drum unit and the developer unit	The drum surface is dirty or has some scratches.	Execute the drum refresh. If not repaired, replace the drum unit.	Detaching and Reattaching the drum unit
5	Setting the cassette heater	The image forming section is affected by humidity.	[Cassette heater standard model]	Installing the cassette heater
6	Checking the main charger unit	The main charger roller surface is dirty or has some scratches.	Clean the main charger roller surface. Replace the main charger roller unit if the issue is not resolved.	Detaching and reattaching the main charger roller unit
7	Cleaning the eraser	The eraser is dirty.	Clean the eraser.	

## 7 - 2 Feeding/Conveying Failures

### (1) Prior standard check items

No.	Contents
(1-1)	Paper jam due to the cover-open detection
(1-2)	Paper jam due to the wave or curl in the fuser section of the damp paper
(1-3)	Paper jam due to the dog-ear, paper skew, paper creases, fusing failure or the paper curl
(1-4)	Paper jam caused by the conveying guide, paper entry guide or the feed-shift guide
(1-5)	Paper jam caused by improperly loaded paper in the cassette or the paper deck
(1-6)	Paper jam due to the inferior paper
(1-7)	Paper jam caused by the conveying rollers or the paper feed pulleys
(1-8)	Paper jam due to the sensor
(1-9)	Paper jam due to the setting / detection failure
(1-10)	Paper jam due to the static electricity
(1-11)	Paper jam caused by the installation environment (Papers inside the cassette are always damp.)

### Content of Feeding/Conveying Failures

#### (1-1) Paper jam due to the cover-open detection

Step	Check description	Assumed cause	Measures	Reference
1	Opening and reclosing the paper conveying unit	The paper conveying unit is not aligned to the other exterior covers.	Check if the vertical paper conveying section and the horizontal paper conveying section at the paper deck cannot be opened by slightly pulling back and force or right and left. Then, open the right cover (conveying unit) and securely close it.	
2	Opening and reclosing the right cover	The right cover is not aligned to the other exterior covers.	Open the right cover (conveying unit) once, and close it firmly.	
3	Checking the paper	The paper fanning is not enough or the cutting edge of loaded paper is damaged.	Fan the paper well and load it by reversing the paper direction. Correct or replace paper if a dog-ear is found.	
4	Checking the paper	The paper is wavy.	Correct or replace paper. If you cannot get user agreement about the paper replacement, relocate the leading end of paper and the trailing end or reload paper upside down.	
5	Checking the paper	Unspecified paper is used or foreign objects are on the paper.	Ask a user to use the specified paper type. Or, remove the paper with foreign objects.	

**(1-2)Paper jam due to the wave or curl in the fuser section of the damp paper**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The paper curls.	Reload paper upside down.	
2	Checking the paper	The paper fanning is not enough.	Fan the paper well and load it by reversing the paper direction	
3	Checking the paper	The paper is damp.	Replace the paper.	

**(1-3)Paper jam due to the dog-ear, paper skew, paper creases, fusing failure or the paper curl**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path and the paper	The paper is caught with a piece of paper, etc. Or the leading edge of the sheet is bent.	When the dog-ear occurs, check if a piece of torn paper, foreign objects or the burrs on the part do not exist on the paper path, and remove them.	
2	Fuser temperature setting	The paper curls since the fuser temperature is improper.	Reset the fuser temperature to the default value at U161 when the paper curls.	U161 Execution

**(1-4)Paper jam caused by the conveying guide, paper entry guide or the feedshift guide**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	Remove any paper or foreign objects on the paper path and remove the burrs on the parts such as the guide or the actuator.	
2	Checking the guide	The guide is dirty.	If the guide or the transfer discharging sheet are dirty with toner or paper dust, etc., clean them with a dry cloth.	
3	Checking the guide	The guide does not properly operate due to the incorrect attachment or a fault.	Check the guide, and remove any burrs. Also, if the guide does not operate smoothly manually, reattach the guide. Then, replace the guide if it is not fixed or if there is deformation or frictional wear.	
4	Checking the solenoid	The solenoid does not operate properly.	Execute U033 and check if the guide can move smoothly by the operation sounds. If the guide does not operate thoroughly or smoothly, reattach the guide. And, replace the solenoid if the issue is not resolved.	U033 Execution



**(1-5)Paper jam caused by improperly loaded paper in the cassette or the paper deck**

Step	Check description	Assumed cause	Measures	Reference
1	Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides or the MP paper width guides along the paper size when the paper skew or the paper creases occur.	
2	Checking the paper	The paper fanning is not enough.	Fan paper and reload it in the paper source. If a part of the paper is bent, remove it.	
3	(When feeding the paper from the large capacity feeder) Checking the paper	The paper is not properly loaded.	When the paper is loaded over the guide in the deck of the large capacity paper feeder, reload the paper so the paper edge is not on the corner of the deck.	

**(1-6)Paper jam due to the inferior paper**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	

**(1-7)Paper jam caused by the conveying rollers or the paper feed pulleys**

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning the roller	The roller is dirty.	Check if the conveying rollers or the pulleys have no paper dust, toner, foreign objects, diameter change or frictional wear and clean their surface. If they have a diameter change or frictional wear, replace the parts.	
2	Checking the clutch	The clutch does not operate properly.	After checking if the relative motors operate properly by executing U030 and U240, check the clutch operation at U032. If the clutch does not operate properly, go to the next step. (If the motor operation is faulty, perform the proper measures depending on the jam code.)	U030/U240/ U032 Execution
3	Checking the clutch	The clutch is not properly attached, is not properly connected, or the foreign objects adhere on the clutch.	Check if the connector is securely connected to the clutch, the clutch is properly attached, and there are no foreign objects on the clutch. Then, perform the proper measures if necessary.	
4	Replacing the clutch	The clutch is faulty.	If the clutch does not operate properly after reattaching and reconnecting, or if the clutch is rusted, replace it. (Use the individual clutch or the unit containing the clutch.)	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the bushing	The bushing is dirty.	Clean the rollers shaft for the bushing when the load is applied to the rotation of the conveying rollers due to dirt on the m.'	
6	Checking the spring	The spring comes off.	Check if the spring came off, or if it adequately presses the roller or the pulley, and reattach it if necessary.	

**(1-8) Paper jam due to the sensor**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the sensor	The sensor is faulty.	The actuator for the PF paper feed sensor is caught. Also, if it comes off, reattach the actuator and its release spring.	
2	Checking the sensor	The sensor is dirty.	When the sensor surface or photoreceptor black felt is dirty by paper dust, etc., clean them.	
3	Checking the sensor	The sensor is faulty.	Check the sensor operation by executing U031 and U241, and clean or replace the sensor if it does not operate properly.	U031/U241 Execution

**(1-9) Paper jam due to the setting / detection failure**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper leading edge margin	The leading edge margin is not enough.	When there is no margin from the paper leading edge to 4.0mm(+1.5/-0.0mm), and, when there is no check line (fuser jam) on 20mm(+/-1mm) from the paper leading edge of the test pattern that is output in U034, adjust the leading margin at U402.	U402 Execution
2	Relocating the paper width guides	The paper size is misdetected.	Relocate the paper width guides or the MP paper width guides along the paper size to properly detect the paper size.	
3	Checking the settings	The media type is not properly set.	If the media type is not matched to the actual paper weight (the paper jam occurs due to the paper separation failure), set the media type at [System Menu/ Counter] key > [Common Settings] > "Org./Paper Set."	

**(1-10)Paper jam due to the static electricity**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the ground	The static electricity accumulates.	When the main unit is installed in the low humidity environment where the static electricity easily accumulates on the conveying guide during the continuous printing, check if the discharge sheet in the eject section and the metal guide in the transfer section are grounded securely. If necessary, reattach the parts.	

**(1-11)Paper jam caused by the installation environment (Papers inside the cassette are always damp.)**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper storage place	Papers have been stored in the improper place.	Ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal the bag to prevent moisture from getting in.	
2	Setting / Installing the cassette heater	The paper is damp.	[Models with the standard cassette heater]Connect the cassette heater and select the mode at U327 if necessary.[Models with the optional cassette heater]Install the cassette heater and select the mode at U327 if necessary.	Cassette Heater Installation

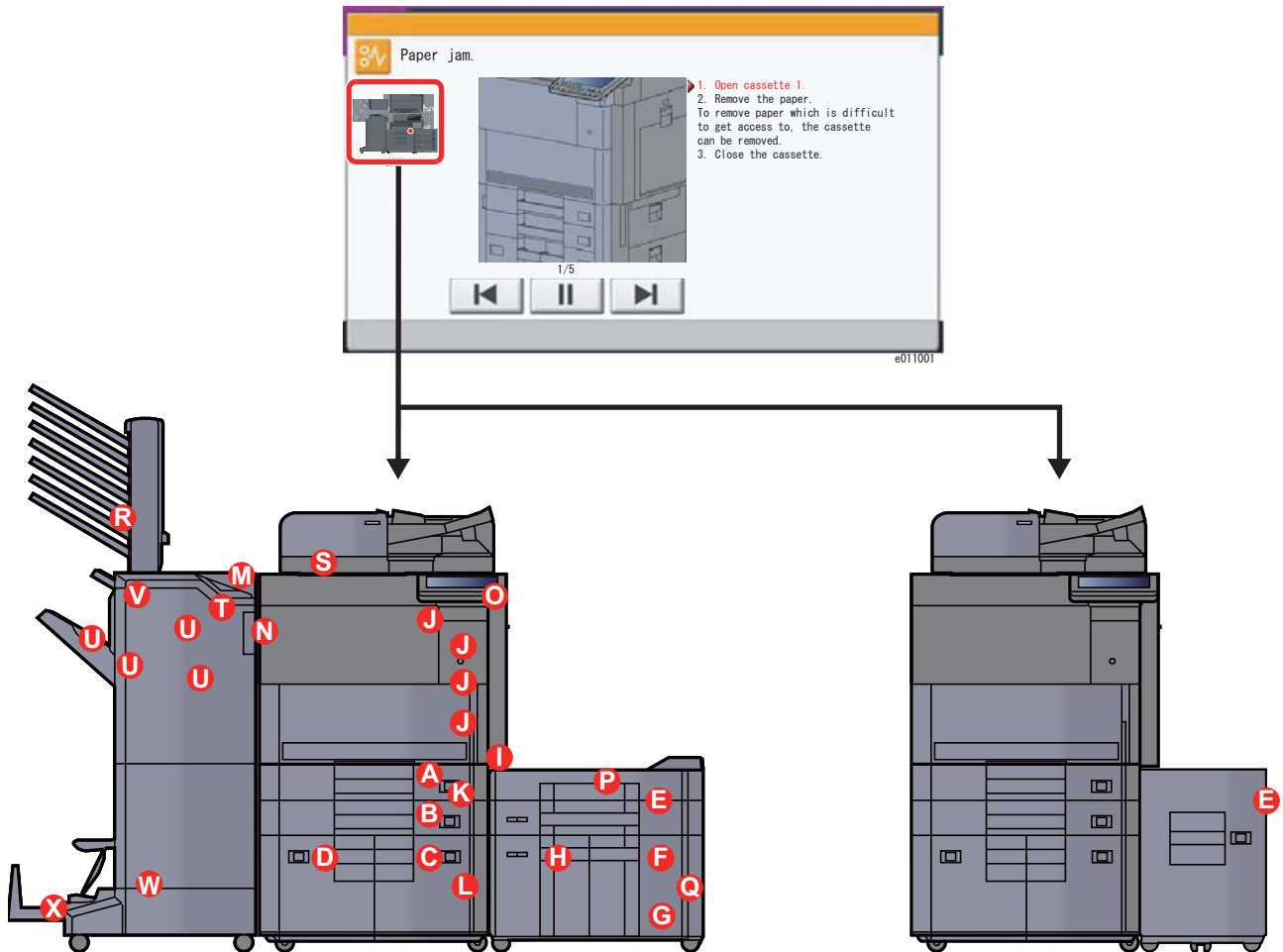
## (2) Paper misfeed detection

### (2-1) Paper misfeed indication

When a paper misfeed occurs, the machine immediately stops printing and displays the paper misfeed message on the operation panel. To remove paper misfed in the machine, pull out the cassette, open the front cover or paper conveying cover.

The locations are displayed on the operation panel when a paper jam has occurred.

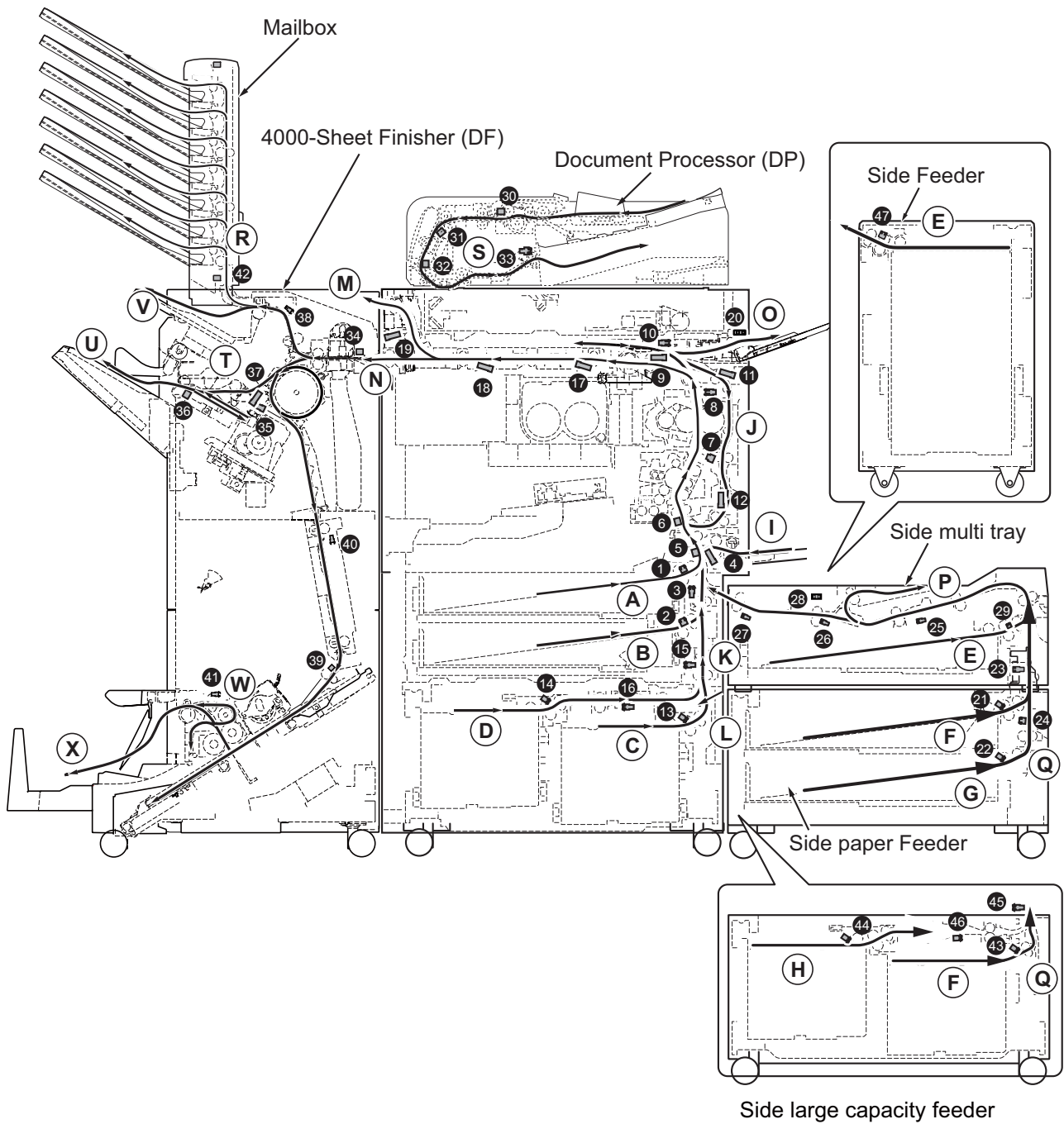
#### Jam location indication



- 1 Shows the location of a paper jam.
  - 2 Shows the previous step.
  - 3 Shows the next step.
- A: Misfeed in the cassette 1  
B: Misfeed in the cassette 2  
C: Misfeed in the cassette 3  
D: Misfeed in the cassette 4  
E: Misfeed in the cassette 5 (Side Feeder (3,000-sheet))  
F: Misfeed in the cassette 5 (Side Feeder (500-sheet×3) / Large Capacity Side Feeder (500, 1,500-sheet×2))  
G: Misfeed in the cassette 6 (Side Feeder (500-sheet×3))  
H: Cassette 6 (Large Capacity Side Feeder (500, 1,500-sheet×2))  
I: Misfeed in the cassette 7 (Side Feeder (500-sheet×3))  
J: Misfeed in the cassette 7 (Large Capacity Side Feeder (500, 1,500-sheet×2))  
K: Misfeed in Multipurpose Tray  
L: Misfeed inside the right cover 1  
M: Misfeed inside the right cover 3  
N: Misfeed inside the right cover 4  
O: Misfeed in the Upper Left Tray / 4,000-Sheet Finisher (Tray C)  
P: Misfeed in the Lower Left Tray  
Q: Misfeed in the Right Tray  
R: Misfeed in the Top Cover, Right Cover 1 (Side Feeder (500-sheet×3) / Large Capacity Side  
S: Misfeed in the Right Cover 2 (Side Feeder (500-sheet×3) / Large Capacity Side Feeder (500,  
T: Misfeed inside the mail box  
U: Misfeed inside the Document Processor  
V: Misfeed inside the 4000-sheet finisher (inner)  
W: Misfeed inside the 4000-sheet finisher (Tray A)  
X: Misfeed inside the 4000-sheet finisher (Tray B)  
Y: Misfeed inside the Folding unit  
Z: Misfeed inside the Folding tray

## (2-2) Paper misfeed detection condition

### Main unit + Optional unit1



- |                       |                                   |                              |
|-----------------------|-----------------------------------|------------------------------|
| 1 Paper feed sensor 1 | 13 PF paper feed sensor 1         | 25 PF conveying sensor 1     |
| 2 Paper feed sensor 2 | 14 PF paper feed sensor 2         | 26 PF conveying sensor 2     |
| 3 Conveying sensor    | 15 PF conveying sensor 1          | 27 PF conveying sensor 3     |
| 4 MP conveying sensor | 16 PF conveying sensor 2          | 28 PF eject sensor           |
| 5 DF middle sensor    | 17 BR conveying sensor 1          | 29 PF paper feed sensor      |
| 6 Registration sensor | 18 BR conveying sensor 2          | 30 DP original feed sensor   |
| 7 Loop sensor         | 19 BR eject sensor                | 31 DP backside timing sensor |
| 8 Fuser eject sensor  | 20 JS open/close detection sensor | 32 DP timing sensor          |
| 9 Eject sensor        | 21 PF paper feed sensor 1         | 33 DP eject sensor           |
| 10 Reversing sensor   | 22 PF paper feed sensor 2         | 34 DF entry sensor           |
| 11 Duplex sensor 1    | 23 PF conveying sensor 1          | 35 DF middle sensor          |
| 12 Duplex sensor 2    | 24 PF conveying sensor 2          | 36 DF eject sensor           |
|                       |                                   | 37 DF drum sensor            |

Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position
J0000	-	J0523	C	J2117	J3707	J3707	P	J4207	J	J4409	J
J0100	-	J0524	D	J2307	J3715	J3715	P	J4208	J	J4411	J
J0101	-	J0525	E	J2317	J3716	J3716	P	J4209	J	J4412	J
J0102	-	J0526	F	J2603	J3717	J3717	P	J4211	J	J4413	J
J0103	-	J0527	H	J2604	J4001	J4001	J	J4212	J	J4414	J
J0104	-	J0533	C	J2606	J4002	J4002	J	J4213	J	J4415	J
J0106	-	J0534	D	J2607	J4003	J4003	J	J4214	J	J4416	J
J0107	-	J0535	E	J2613	J4004	J4004	J	J4215	J	J4417	J
J0108	-	J0536	F	J2614	J4005	J4005	J	J4216	J	J4418	J
J0110	J	J0537	H	J2616	J4006	J4006	J	J4217	J	J4419	J
J0112	J	J0545	E	J2617	J4007	J4007	J	J4218	J	J4601	J
J0113	J	J0555	E	J2704	J4009	J4009	I	J4219	J	J4602	J
J0114	N	J1301	A	J2707	J4011	J4011	J	J4301	J	J4603	J
J0115	N	J1302	B	J2714	J4012	J4012	J	J4302	J	J4604	J
J0131	I	J1303	C	J2717	J4013	J4013	J	J4303	J	J4605	J
J0132	J	J1304	D	J3405	J4014	J4014	J	J4304	J	J4606	J
J0210	K	J1305	E	J3406	J4015	J4015	J	J4305	J	J4607	J
J0211	P	J1306	F	J3407	J4016	J4016	J	J4306	J	J4608	J
J0212	P	J1307	G	J3415	J4017	J4017	J	J4307	J	J4609	J
J0213	E	J1311	J	J3416	J4019	J4019	J	J4309	J	J4611	J
J0214	Q	J1312	J	J3417	J4111	J4111	J	J4311	J	J4612	J
J0215	F	J1313	J	J3505	J4112	J4112	J	J4312	J	J4613	J
J0300	-	J1314	J	J3506	J4113	J4113	J	J4313	J	J4614	J

Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position
J0501	A	J1315	J	J3507	J4114	J4114	J	J4314	J	J4615	J
J0502	B	J1316	J	J3515	J4115	J4115	J	J4315	J	J4616	J
J0506	F	J1317	J	J3516	J4116	J4116	J	J4316	J	J4617	J
J0507	G	J1502	J	J3517	J4117	J4117	J	J4317	J	J4618	J
J0508	J	J1503	L	J3605	J4118	J4118	J	J4319	J	J4619	J
J0509	I	J1504	L	J3606	J4119	J4119	J	J4401	J	J4701	J
J0511	A	J1512	B	J3607	J4201	J4201	J	J4402	J	J4702	J
J0512	B	J1513	L	J3615	J4202	J4202	J	J4403	J	J4703	J
J0516	F	J1514	L	J3616	J4203	J4203	J	J4304	J	J4704	J
J0517	G	J2106	Q	J3617	J4204	J4204	J	J4405	J	J4705	J
J0518	J	J2107	Q	J3705	J4205	J4205	J	J4406	J	J4706	J
J0519	I	J2116	Q	J3706	J4206	J4206	J	J4407	J	J4707	J
J4708	J	J5008	N	J6200	T	J9020	S				
J4709	J	J5009	N	J6210	V	J9030	S				
J4711	J	J5011	N	J6300	T	J9110	S				
J4712	J	J5012	N	J6310	T	J9300	S				
J4713	J	J5013	N	J6400	T	J9310	S				
J4714	J	J5014	N	J6410	U	J9400	S				
J4715	J	J5015	N	J6500	T	J9410	S				
J4716	J	J5016	N	J6510	U	J9600	S				
J4717	J	J5017	N	J6600	T	J9610	S				
J4718	J	J5018	N	J6610	T						
J4719	J	J5019	N	J6710	T						
J4901	N	J5101	N	J6810	T						
J4902	N	J5102	N	J6900	T						
J4903	N	J5103	N	J7000	T						
J4904	N	J5104	N	J7100	W						
J4905	N	J5105	N	J7110	W						
J4906	N	J5106	N	J7200	W						
J4907	N	J5107	N	J7210	X						
J4908	N	J5108	N	J7300	W						
J4909	N	J5109	N	J7310	X						
J4911	N	J5111	N	J7400	W						
J4912	N	J5112	N	J7500	W						
J4913	N	J5113	N	J7600	W						
J4914	N	J5114	N	J7770	W						



Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position	Error Code	JAM Position
J4915	N	J5115	N	J7710	W						
J4916	N	J5116	N	J7800	R						
J4917	N	J5117	N	J7810	R						
J4918	N	J5118	N	J7900	T						
J4919	N	J5119	N	J9000	S						
J5001	N	J6000	N	J9001	S						
J5002	N	J6020	T	J9002	S						
J5003	N	J6050	W	J9005	S						
J5004	N	J6060	W	J9008	S						
J5005	N	J6070	W	J9009	S						
J5006	N	J6080	W	J9010	S						
J5007	N	J6110	T	J9011	S						

### (3)Jam Codes

Error code	Contents	note
J0000	Power ON jam	
J0100/J0101/J0102/ J0103/J0104/J0106/ J0108/0200	Paper jam caused by the process time time-out	J0100: Secondary feed, J0101: Imaging process, J0102: Toner supply, J0103: Image consistency, J0104: Paper conveying, J0106: Duplex feed, J0108: Option, J0200: Main unit sequence
J0107	Paper jam detection caused by fuser temperature stabilization time-out	
J0110/J0112/J0113/ J0114/J0115/J0210	Cover open detection	J0110: Paper conveying unit open detection (Conveying unit switch), J0112: Duplex cover open detection (Duplex cover switch), J0113: Paper conveying cover open detection (Paper conveying cover open / close switch), J0114: BR conveying unit open detection (BR conveying unit switch), J0115: BR eject cover open detection (BR eject cover switch), J0210: PF paper conveying cover open detection (PF conveying cover open / close switch)
J0131	MP lift sensor upper limit detection	
J0132	Rotary decurler guide error	
J0211/J0212/J0214	PF conveying cover / PF top cover open detection (Side multi feeder), PF conveying cover open detection (Paper feeder / Large capacity feeder)	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J0213	Side feeder release detection	Object: Side feeder
J0215	Side multi feeder release detection	Object: Side multi feeder
J0300	Paper eject completion non-detection jam	Object: 4000-sheet finisher
J0501/J0502/J0506/ J0507/J0523/J0524/ J0525/J0526/J0527	No paper feed	Prior checking item when no paper feed occurs.
J0501/J0502	No paper feed from the cassette	Condition: the paper does not reach the feed pulley.
J0501/J0502	No paper feed from the cassette	Condition: The paper stops at the feed pulley.
J0501/J0502	No paper feed from the cassette	Condition: The paper leading edge passes the feed pulley.
J0523/J0524	No paper feed from the large capacity paper feeder	
J0508	No paper feed from the duplex section	
J0509	No paper feed from the MP tray	
J0506/J0507	No paper feed from the paper feeder	Condition: The paper does not reach the feed pulley.Object: Paper feeder
J0506/J0507	No paper feed from the paper feeder	Condition: The paper stops at the PF feed pulley.Object: Paper feeder
J0506/J0507	No paper feed from the paper feeder	Condition: The paper leading edge passes the feed pulley.Object: Paper feeder

Error code	Contents	note
J0526/J0527	No paper feed from the large capacity feeder	Object: Large capacity feeder
J0525	No paper feed from the side multi feeder	Object: Side multi feeder
J0545	No paper feed from the side feeder	Object: Side feeder
J0511/J0512	Multi-feeding from the cassette	
J0533/J0534	Multi-feeding from the large capacity paper feeder	
J0518	Multi-feeding from the duplex section	
J0519	Multi-feeding from the MP tray	
J0516/J0517	Multi-feeding from the paper feeder	Object: Paper feeder
J0536/J0537	Multi-feeding from the large capacity feeder	Object: Large capacity feeder
J0535	Multi-feeding from the side multi feeder	Object: Side multi feeder
J0555	Multi-feeding from the side feeder	Object: Side feeder
J1301/1302	Middle sensor non-arrival jam	
J1303/1304	Middle sensor non-arrival jam	
J1305/J1306/1307	Middle sensor non-arrival jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J1305	Middle sensor non-arrival jam	Object: Side feeder
J1311/J1312	Middle sensor stay jam	
J1313/J1314	Middle sensor stay jam	
J1315/J1316/J1317	Middle sensor stay jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J1315	Middle sensor stay jam	Object: Side feeder
J1502	Conveying sensor non-arrival jam	
J1503/J1504	Conveying sensor non-arrival jam	
J1512	Conveying sensor stay jam	
J1513/J1514	Conveying sensor stay jam	
J2106/J2107	PF conveying sensor 1 non-arrival jam	Object: Side multi feeder + Paper feeder
J2116/J2117	PF conveying sensor 1 stay jam	Object: Side multi feeder + Paper feeder
J2307	PF conveying sensor 2 non-arrival jam	Object: Side multi feeder + Paper feeder
J2307	PF conveying sensor 2 non-arrival jam	Object: Side multi feeder + Large capacity feeder
J2317	PF conveying sensor 2 stay jam	Object: Side multi feeder + Paper feeder

Error code	Contents	note
J2317	PF conveying sensor 2 stay jam	Object: Side multi feeder + Large capacity feeder
J2603	PF conveying sensor 1 non-arrival jam	
J2604	PF conveying sensor 1 non-arrival jam	
J2606/J2607	PF conveying sensor 1 non-arrival jam	Object: Side multi feeder + Large capacity feeder
J2613	PF conveying sensor 1 stay jam	
J2614	PF conveying sensor 1 stay jam	
J2616/J2617	PF conveying sensor 1 stay jam	Object: Side multi feeder + Large capacity feeder
J2704	PF conveying sensor 2 non-arrival jam	
J2707	PF conveying sensor 2 non-arrival jam	Object: Side multi feeder + Large capacity feeder
J2714	PF conveying sensor 2 stay jam	
J2717	PF conveying sensor 2 stay jam	Object: Side multi feeder + Large capacity feeder
J3405	PF conveying sensor 1 non-arrival jam	Object: Side multi feeder
J3406/J3407	PF conveying sensor 1 non-arrival jam	Object: Side multi feeder + Paper feeder
J3406/J3407	PF conveying sensor 1 non-arrival jam	Object: Side multi feeder + Large capacity feeder
J3415	PF conveying sensor 1 stay jam	Object: Side multi feeder
J3416/J3417	PF conveying sensor 1 stay jam	Object: Side multi feeder + Paper feeder
J3416/J3417	PF conveying sensor 1 stay jam	Object: Side multi feeder + Large capacity feeder
J3505/J3506/J3507	PF conveying sensor 2 non-arrival jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J3515/J3516/J3517	PF conveying sensor 2 stay jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J3605/J3606/J3607	PF conveying sensor 3 non-arrival jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J3615/J3616/J3617	PF conveying sensor 3 stay jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J3705/J3706/J3707	PF exit sensor non-arrival jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J3715/J3716/J3717	PF exit sensor stay jam	Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder
J4001/J4002/J4003/ J4004/J4005/J4006/ J4007	Registration sensor non arrival jam	
J4009	Registration sensor non arrival jam	
J4011/J4012/J4013/ J4014/J4015/J4016/ J4017	Registration sensor stay jam	

Error code	Contents	note
J4019	Registration sensor stay jam	
J4101/J4102/J4103/ J4104/J4105/J4106/ J4107/J4108/J4109	Loop sensor non arrival jam	
J4111/J4112/J4113/ J4114/J4115/J4116/ J4117/J4118/J4119	Loop sensor stay jam	
J4201/J4202/J4203/ J4204/J4205/J4206/ J4207/J4208/J4209	Fuser exit sensor non arrival jam	Condition: Paper jam in the fuser unit (The paper leading margin is less than 4.0mm.)
J4201/J4202/J4203/ J4204/J4205/J4206/ J4207/J4208/J4209	Fuser exit sensor non arrival jam	Condition: Paper jam in the fuser unit (The paper leading margin is 4.0mm or more.)
J4211/J4212/J4213/ J4214/J4215/J4216/ J4217/J4218/J4219	Fuser exit sensor stay jam	
J4301/J4302/J4303/ J4304/J4305/J4306/ J4307/J4309	Duplex sensor 1 non arrival jam	
J4311/J4312/J4313/ J4314/J4315/J4316/ J4317/J4319	Duplex sensor 1 stay jam	
J4401/J4402/J4403/ J4404/J4405/J4406/ J4407/J4409	Duplex sensor 2 non arrival jam	
J4411/J4412/J4413/ J4414/J4415/J4416/ J4417/J4419	Duplex sensor 2 stay jam	
J4418	Duplex sensor 2 stay jam	
J4601/J4602/J4603/ J4604/J4605/J4606/ J4607/J4608/J4409	Exit sensor non arrival jam	
J4611/J4612/J4613/ J4614/J4615/J4616/ J4617/J4618/J4619	Exit sensor stay jam	
J4701/J4702/J4703/ J4704/J4705/J4706/ J4707/J4708/J4709	Switchback sensor non arrival jam	
J4711/J4712/J4713/ J4714/J4715/J4716/ J4717/J4718/J4719	Switchback sensor stay jam	
J4901/J4902/J4903/ J4904/J4905/J4906/ J4907/J4908/J4909	BR conveying sensor 1 non arrival jam	
J4911/J4912/J4913/ J4914/J4915/J4916/ J4917/J4918/J4919	BR conveying sensor 1 stay jam	
J5001/J5002/J5003/ J5004/J5005/J5006/ J5007/J5008/J5009	BR conveying sensor 2 non arrival jam	

Error code	Contents	note
J5011/J5012/J5013/ J5014/J5015/J5016/ J5017/J5018/J5019	BR conveying sensor 2 stay jam	
J5101/J5102/J5103/ J5104/J5105/J5106/ J5107/J5108/J5109	BR exit sensor non arrival jam	
J5111/J5112/J5113/ J5114/J5115/J5116/ J5117/J5118/J5119	BR exit sensor stay jam	
J6000	DF paper entry failure jam	Object: 4000-sheet finisher
J6020	DF front cover open jam	Object: 4000-sheet finisher
J6050	BF tray open jam	Object: 4000-sheet finisher with the folding unit
J6060	MB cover open jam	Object: 4000-sheet finisher with the mail box
J6070	BF unit open jam	Object: 4000-sheet finisher with the folding unit
J6080	BF left cover open jam	Object: 4000-sheet finisher with the folding unit
J6100	DF paper entry sensor non arrival jam	Object: 4000-sheet finisher
J6110	DF paper entry sensor stay jam	Object: 4000-sheet finisher
J6200	DF sub eject sensor non-arrival jam	Object: 4000-sheet finisher
J6210	DF sub eject sensor stay jam	Object: 4000-sheet finisher
J6300	DF middle sensor non arrival jam	Object: 4000-sheet finisher
J6310	DF middle sensor stay jam	Object: 4000-sheet finisher
J6400	DF exit sensor non arrival jam	Object: 4000-sheet finisher
J6410	DF exit sensor stay jam	Object: 4000-sheet finisher
J6500	DF exit sensor non arrival jam when ejecting the paper bundle	Object: 4000-sheet finisher
J6510	DF exit sensor stay jam when ejecting the paper bundle	Object: 4000-sheet finisher
J6600	DF drum sensor non-arrival jam	Object: 4000-sheet finisher
J6610	DF drum sensor stay jam	Object: 4000-sheet finisher
J6710	DF drum sensor stay jam during paper conveying into the BF unit	Object: 4000-sheet finisher with the folding unit
J6810	Front DF side registration jam	Object: 4000-sheet finisher
J6910	Rear DF side registration jam	Object: 4000-sheet finisher
J7000	DF staple jam	Object: 4000-sheet finisher
J7100	BF paper entry sensor non-arrival jam	Object: 4000-sheet finisher with the folding unit
J7110	BF paper entry sensor stay jam	Object: 4000-sheet finisher with the folding unit
J7200	BF eject sensor non-arrival jam	Object: 4000-sheet finisher with the folding unit
J7210	BF eject sensor stay jam	Object: 4000-sheet finisher with the folding unit

Error code	Contents	note
J7300	BF eject sensor non-arrival jam at tri-folding	Object: 4000-sheet finisher with the folding unit
J7310	BF eject sensor stay jam at tri-folding	Object: 4000-sheet finisher with the folding unit
J7400	Upper BF side registration jam	Object: 4000-sheet finisher with the folding unit
J7500	Lower BF side registration jam	Object: 4000-sheet finisher with the folding unit
J7600	BF staple jam	Object: 4000-sheet finisher with the folding unit
J7700	BF vertical conveying sensor non-arrival jam	Object: 4000-sheet finisher with the folding unit
J7710	BF vertical conveying sensor stay jam	Object: 4000-sheet finisher with the folding unit
J7800	Mail Box ejection non-arrival jam	Object: 4000-sheet finisher with the mail box
J7810	Mail Box eject stay jam	Object: 4000-sheet finisher with the mail box
J7900	DF paddle jam	Object: 4000-sheet finisher
J7910	Adjusting pulley pressure release motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7911	Pull-in guide release motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7912	Pull-in pulley pressure release motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7913	Eject pressure release motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7914	Shift motor 1 jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7915	Shift motor 2 jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7916	Shift release motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7917	Side registration motor 1 jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7918	Side registration motor 2 jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7919	Staple shift motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7920	DF staple motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7921	Bundle eject motor 1 jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7922	Bundle eject motor 2 jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7923	Eject paddle motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7924	Eject paper holding motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7925	Eject support guide motor jam	Object: 100-sheet staple finisher, 4000-sheet finisher
J7930	Required paper interval time data jam	Object: 100-sheet staple finisher
J7931	Main unit eject data jam 1	Object: 100-sheet staple finisher
J7932	Main unit eject data jam 2	Object: 100-sheet staple finisher
J7933	Main unit eject data jam 3	Object: 100-sheet staple finisher
J7934	Required paper interval time cancel data 1 jam	Object: 100-sheet staple finisher
J7935	Required paper interval time cancel data 2 jam	Object: 100-sheet staple finisher

Error code	Contents	note
J9000	No original feed from the DP	Object: Document processor
J9001	DP small size original jam	Object: Document processor
J9002	Paper jam detected when starting the paper conveying	Object: Document processor
J9005	No original feed from the DP	Object: Document processor
J9008	No original feed from the DP (Original is B6 size or smaller)	Object: Document processor
J9009	DP original jam caused by the image scanning	Object: Document processor
J9010	Document processor open detection	Object: Document processor
J9011	DP top cover open detection	Object: Document processor
J9020	Original skew jam	Object: Document processor
J9030	Original multi-feeding jam	Object: Document processor
J9110	DP feed sensor multi-feeding jam	Object: Document processor
J9300	DP backside timing sensor non arrival jam	Object: Document processor
J9310	DP backside timing sensor stay jam	Object: Document processor
J9400	DP timing sensor non-arrival jam	Object: Document processor
J9410	DP timing sensor stay jam	Object: Document processor
J9600	DP eject sensor non-arrival jam	Object: Document processor
J9610	DP eject sensor stay jam	Object: Document processor
	Paper creases	

Content of Jam Code

J0000: Power ON jam

The power was turned on while the unspecified conveying sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Specifying the sensor	(Specify the sensor turning on)	Specify the faulty sensor which is indicated as turning on at U031. (Go to the next step.)	Executing U031
2	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	Checking the sensor	The sensor does not properly operate.	Clean and reattach the sensor specified at U031 and reinsert the connector. If not repaired, replace the sensor.	



J0100/J0101/J0102/J0103/J0104/J0106/J0108/0200: Paper jam caused by the process time time-out

J0100: Secondary feed, J0101: Imaging process, J0102: Toner supply, J0103: Image consistency, J0104: Paper conveying, J0106: Duplex feed, J0108: Option, J0200: Main unit sequence

It does not change to the status capable to feed or print within the specified time.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The controller does not activate properly.	Remove a piece of paper, etc. at each conveying section and check the sensor. Next, turn the power switch and main switch off. Turn the main switch and power switch on when passing 5 seconds.	
2	Firmware upgrade	The firmware does not properly activate.	Upgrade the firmware to the latest version.	Firmware Update

J0107: Paper jam detection caused by fuser temperature stabilization time-out

The fuser temperature does not achieve to the paper feed-able temperature within the specified time.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The controller does not activate properly.	Remove a piece of paper, etc. at each conveying section and check the sensor. Next, turn the power switch and main switch off. Turn the main switch and power switch on when passing 5 seconds.	
2	Checking the installation environment	Supply power fluctuates or voltage drops.	Plug the power cord into another wall outlet.	
3	Checking the settings	The actual paper and the paper settings (media type, paper size) do not match.	Set the proper media type via the System Menu.	
4	Firmware upgrade	The firmware does not properly activate.	Upgrade the firmware to the latest version.	Firmware Update
5	Checking the fuser unit	The fuser heater is faulty.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

J0110/J0112/J0113/J0114/J0115/J0210: Cover open detection

J0110: Paper conveying unit open detection (Conveying unit switch), J0112: Duplex cover open detection (Duplex cover switch), J0113: Paper conveying cover open detection (Paper conveying cover open / close switch), J0114: BR conveying unit open detection (BR conveying unit switch), J0115: BR eject cover open detection (BR eject cover switch), J0210: PF paper conveying cover open detection (PF conveying cover open / close switch)

The cover-open is detected during print.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cover	The covers are not fitted.	Check if the cover is securely closed and reinstall it if necessary. If deformed, repair or replace it.	
2	Checking the cover switch	The cover switch does not operate properly.	Reattach the cover switch and reconnect the connector. If faulty, replace it.	

J0131: MP lift sensor upper limit detection

The upper MP lift sensor does not turn on when passing the certain time after the lift base lifts up.

Step	Check description	Assumed cause	Measures	Reference
2	Checking the operation	The lift base does not move up and down.	Reattach the lift base.	
3	Reinstalling the MP tray	The lift lever does not contact the lift motor cum.	Reattach the MP tray.	
4	Checking the upper and lower MP lift sensor	The upper or lower MP lift sensor does not properly operate.	Reattach the upper or lower MP lift sensor and reinsert the connector. If not repaired, replace the sensor.	
5	Checking the MP lift motor	The MP lift motor does not operate properly.	Reattach the MP lift motor and reinsert the connector. If not repaired, replace the motor.	
6	Checking the drive parts	The drive from the MP lift motor is not properly transmitted.	Check if the MP lift motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
7	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Feed PWB - Engine PWB	Wiring diagram
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

### J0132: Rotary decurler guide error

The BR conveying decurler sensor that detects the rotary decurler guide does not turn on during print.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the rotary decurler guide	The rotary decurler guide is not properly installed or it is faulty.	Check if the rotary decurler guide rotates and reattach it if necessary. If the rotary decurler guide is deformed, repair or replace it.	
2	Checking the BR conveying decurler sensor	The BR conveying decurler sensor does not properly operate.	Reattach the BR conveying decurler sensor and reinsert the connector. If not repaired, replace it.	

### J0211/J0212/J0214: PF conveying cover / PF top cover open detection (Side multi feeder), PF conveying cover open detection (Paper feeder / Large capacity feeder)

Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder

The PF conveying cover open / PF top cover open is detected during paper feed from the side multi feeder. Or, the PF conveying cover open is detected during paper feed from the paper feeder / large capacity feeder.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cover	The covers are not fitted.	Check if the cover is securely closed and reinstall it if necessary. If the cover is deformed, repair or replace it.(J0211: PF conveying cover (Side multi feeder), J0212: PF top cover (Side multi feeder), J0214: PF conveying cover (Paper feeder / Large capacity feeder))	
2	Checking the switch	The switch does not properly operate.	Reattach the switch and reconnect the connector. If not repaired, replace it. (J0211: PF conveying cover switch (Side multi feeder), J0212: PF top cover switch (Side multi feeder), J0214: PF conveying cover switch (Paper feeder / Large capacity feeder))	

### J0213: Side feeder release detection

Object: Side feeder

Detected the side feeder release during printing.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the side feeder	The Side Feeder is not engaged with the main unit.	Check if the side feeder is securely installed and reinstall it if necessary. And if the exterior cover of the side feeder is deformed, repair or replace it.	
2	Checking the PF connection switch	The PF connection switch does not properly operate.	Reattach the PF connection switch and reinsert the connector. If not repaired, replace it.	

### J0215: Side multi feeder release detection

#### Object: Side multi feeder

Detected the side multi feeder release during printing.

Step	Check description	Assumed cause	Measures	Reference
1	Checking Side Multi Feeder	The Side Multi Feeder is not engaged with the main unit.	Check if the side multi feeder is securely installed and reinstall it if necessary. And if the exterior cover of the side multi feeder is deformed, repair or replace it.	
2	Checking the PF set switch	The PF set switch does not properly operate.	Reattach the PF set switch and reinsert the connector. If not repaired, replace it.	

### J0300: Paper eject completion non-detection jam

#### Object: 4000-sheet finisher

The paper eject completion is not communicated from the finisher.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The controller does not activate properly.	Remove a piece of paper, etc. at each conveying section and check the sensor. Next, turn the power switch and main switch off. Turn the main switch and power switch on when passing 5 seconds.	
2	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • DF main PWB - Engine PWB	Wiring diagram
3	Firmware upgrade	The firmware does not properly activate.	Upgrade the firmware to the latest version.	Firmware Update
4	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

### J0501/J0502/J0506/J0507/J0523/J0524/J0525/J0526/J0527: No paper feed

#### Prior checking item when no paper feed occurs.

After the paper feeding clutch turns on during paper feed from each paper source, the next sensor does not turn on when passing the certain time.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	

Step	Check description	Assumed cause	Measures	Reference
4	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
5	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	

**J0501/J0502: No paper feed from the cassette**

**Condition: the paper does not reach the feed pulley.**

After the feed clutch turns on during paper feed from cassette 1, 2, the paper leading edge does not come out from the cassette, or the feed sensor does not turn on.

Step	Check description	Assumed cause	Measures	Reference
1	Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
2	Checking the pressure spring	Conveying capability of the pickup pulley is not enough.	If the pressure spring of the pickup pulley comes off, reattach it. If deformed, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	Checking the pickup pulley	Conveying capability of the pickup pulley is not enough.	Clean the surface of the pickup pulley. If the surface is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
4	Checking the retard guide	The retard guide is hooked with the other part, so the load increases.	Remove the retard guide. Then, reattach it while the cassette is inserted into the main unit. Or, replace the retard guide.	
5	Checking the paper feed shaft and the pin	Feed pulley does not rotate as the feed shaft and feed pin is not properly attached.	Reattach the feed shaft of the feed pulley and feed pin. If deformed, replace them.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	Checking the paper feed clutch	Feed pulley does not rotate as the feed clutch is not linked.	Execute U032 [Feed1] or [Feed2]. If feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U032
7	Removing foreign objects and checking the actuator	The lift sensor detects ON before the cassette base reaches the upper limit position.	Remove a piece of paper or the foreign objects. And reattach the actuator of the lift sensor 1/2.	
8	Checking the cassette base	The cassette base does not lift up to the upper limit position due to the deformation.	Replace the cassette base.	

J0501/J0502: No paper feed from the cassette

Condition: The paper stops at the feed pulley.

After the feed clutch turns on during paper feed from cassette 1, 2, the feed sensor does not turn on since the paper stops at the feed pulley.

Step	Check description	Assumed cause	Measures	Reference
1	(In case of the paper bundle jam) Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	(In case of the paper bundle jam) Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	(In case of the paper bundle jam) Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	(In case of the paper bundle jam) Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	(In case of the paper bundle jam) Checking the retard spring	The retard spring comes off.	Reattach the retard spring.	
6	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
7	Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
8	Checking the pressure release lever and the retard holder	The press-release lever and the retard holder are attached oppositely.	Reattach the pressure release lever and the retard holder.	
9	Checking the paper feed clutch	Feed pulley does not rotate as the feed clutch is not linked.	Execute U032 [Feed1] or [Feed2]. If feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U032
10	Checking the paper feed motor	The feed motor does not properly operate.	Execute U030 [Feed]. If the feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
11	Checking the drive parts	The drive from the feed motor is not properly transmitted.	Reattach the drive parts of the feeding motor. If not repaired, replace the parts faulty in operation. Or replace the feed drive unit.	Detaching and Reattaching the feed drive unit

J0501/J0502: No paper feed from the cassette

Condition: The paper leading edge passes the feed pulley.

After the feed clutch turns on during paper feed from cassette 1, 2, the paper leading edge comes out from the cassette but the feed sensor does not turn on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
2	Checking the pressure release lever and the retard holder	The press-release lever and the retard holder are attached oppositely.	Reattach the pressure release lever and the retard holder.	
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
5	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
6	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
7	Checking the feed sensor	The feed sensor does not properly operate.	Turn feed sensor 1 and 2 on and off manually and check the indication at U031 [Cassette1 Feed] or [Cassette2 Feed]. If feed sensor 1 or 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace the sensor.	Executing U031
8	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Feed sensor 1, 2 - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
9	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
10	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J0523/J0524: No paper feed from the large capacity paper feeder

The PF feed sensor does not turn on when passing the certain time after the PF feed clutch turns on during paper feed from the large capacity feeder (cassette 3, 4).

Step	Check description	Assumed cause	Measures	Reference
1	(In case of the paper bundle jam) Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	(In case of the paper bundle jam) Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	(In case of the paper bundle jam) Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	(In case of the paper bundle jam) Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	(In case of the paper bundle jam) Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
6	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach PF feed sensor 1 and 2 and reinsert the connector. If not repaired, replace the sensor.	
7	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [LCF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If PF feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
8	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor 1, 2 - PF main PWB • PF feed clutch 1, 2 - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
9	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
10	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB



J0508: No paper feed from the duplex section

The registration sensor does not turn on after duplex motor 2 turns on during paper feed from the duplex section.

Step	Check description	Assumed cause	Measures	Reference
1	Performing the prior standard check items	There is a mechanical cause such as the dirty guide, etc.	Perform the prior standard check items.	
2	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	Checking the paper	Paper curled or waved by moisture absorption.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
4	Checking the registration sensor	The registration sensor does not operate properly.	Turn the registration sensor on and off manually and check the indication at U031 [Regist]. If the registration sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
5	Checking duplex motor 2	Duplex motor 2 does not properly operate.	Execute U030 [DU2]. If duplex motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
6	Checking the drive parts	The drive from duplex motor 2 is not properly transmitted.	Reattach the drive parts of the duplex motor 2. If not repaired, replace the parts faulty in operation.	
7	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Registration sensor - Feed PWB • Duplex motor 2 - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
8	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
9	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
10	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J0509: No paper feed from the MP tray

The MP feed sensor does not turn on during paper feed from the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the lift base	The lift base is not properly attached.	If the lift base does not lift up, reattach it.	
2	Checking the MP lift motor	The MP lift motor does not operate properly.	If the lift base does not lift up, reattach the MP lift motor and reinsert the connector. If not repaired, replace it.	
3	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
4	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
5	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
6	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
7	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
8	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
9	Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
10	Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
11	Checking the MP feed sensor	The MP feed sensor does not properly operate.	Turn the MP feed sensor on and off manually and check the indication at U031 [MPT Jam]. If the MP feed sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the MP feed clutch	The MP feed clutch does not properly operate.	Execute U032 [MPT Feed]. If the MP feed clutch does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U032

Step	Check description	Assumed cause	Measures	Reference
13	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • MP feed sensor - Relay PWB • MP feed clutch - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
14	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0506/J0507: No paper feed from the paper feeder**

**Condition: The paper does not reach the feed pulley. Object: Paper feeder**

After the PF feed clutch turns on during paper feed from the paper feeder (cassette 6, 7), the paper leading edge does not come out from the cassette, or the PF feed sensor does not turn on.

Step	Check description	Assumed cause	Measures	Reference
1	Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
2	Checking the pressure spring	Conveying capability of the pickup pulley is not enough.	If the pressure spring of the pickup pulley comes off, reattach it. If deformed, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	Checking the pickup pulley	Conveying capability of the pickup pulley is not enough.	Clean the surface of the pickup pulley. If the surface is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
4	Checking the retard guide	The retard guide is hooked with the other part, so the load increases.	Remove the retard guide. Then, reattach it while the cassette is inserted into the main unit. Or, replace the retard guide.	
5	Checking the paper feed shaft and the pin	Feed pulley does not rotate as the feed shaft and feed pin is not properly attached.	Reattach the feed shaft of the feed pulley and feed pin. If deformed, replace them.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley

Step	Check description	Assumed cause	Measures	Reference
6	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side PF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If PF feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
7	Removing foreign objects and checking the actuator	The PF lift sensor turns on before the cassette base reaches the upper limit position.	Remove a piece of paper or the foreign objects. And reattach the actuator of the PF lift sensor 1/2.	
8	Checking the cassette base	The cassette base does not lift up to the upper limit position due to the deformation.	Replace the cassette base.	

J0506/J0507: No paper feed from the paper feeder

Condition: The paper stops at the PF feed pulley.Object: Paper feeder

After the PF feed clutch turns on during paper feed from the paper feeder (cassette 6, 7), the paper stops at the PF feed pulley and the PF feed sensor does not turn on.

Step	Check description	Assumed cause	Measures	Reference
1	(In case of the paper bundle jam) Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	(In case of the paper bundle jam) Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	(In case of the paper bundle jam) Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	(In case of the paper bundle jam) Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	(In case of the paper bundle jam) Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
6	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
7	Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
8	Checking the pressure release lever and the retard holder	The press-release lever and the retard holder are attached oppositely.	Reattach the pressure release lever and the retard holder.	
9	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side PF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If PF feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247

Step	Check description	Assumed cause	Measures	Reference
10	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side PF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
11	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Reattach the drive parts of the PF feeding motor. If not repaired, replace the parts faulty in operation. Or replace the PF drive unit.	Detaching and reattaching the PF drive unit (Paper feeder)

**J0506/J0507: No paper feed from the paper feeder**

**Condition: The paper leading edge passes the feed pulley.Object: Paper feeder**

After the PF feed clutch turns on during paper feed from the paper feeder (cassette 6, 7), the paper leading edge comes out from the cassette but the PF feed sensor does not turn on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
2	Checking the pressure release lever and the retard holder	The press-release lever and the retard holder are attached oppositely.	Reattach the pressure release lever and the retard holder.	
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
5	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
6	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
7	Checking the installation	No grounding between the main unit and the side multi feeder.	Attach the rails of the side multi feeder to the main unit.	Side Multi Feeder Installation Guide
8	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	

Step	Check description	Assumed cause	Measures	Reference
9	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach PF feed sensor 1 and 2 and reinsert the connector. If not repaired, replace the sensor.	
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor 1, 2 - PF main PWB (Paper Feeder) • PF main PWB (Paper Feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
11	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
12	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0526/J0527: No paper feed from the large capacity feeder**

**Object: Large capacity feeder**

The PF feed sensor does not turn on when passing the certain time after the PF feed clutch turns on during paper feed from the large capacity feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	(In case of the paper bundle jam) Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	(In case of the paper bundle jam) Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	(In case of the paper bundle jam) Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	(In case of the paper bundle jam) Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	(In case of the paper bundle jam) Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	

Step	Check description	Assumed cause	Measures	Reference
6	Checking the installation	No grounding between the main unit and the side multi feeder.	Attach the rails of the side multi feeder to the main unit.	Side Multi Feeder Installation Guide
7	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	
8	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach PF feed sensor 1 and 2 and reinsert the connector. If not repaired, replace the sensor.	
9	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side LCF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If PF feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor 1, 2 - PF main PWB (Large capacity feeder) • PF feed clutch 1, 2 - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
11	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
12	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB



J0525: No paper feed from the side multi feeder

Object: Side multi feeder

The PF feed sensor does not turn on when passing the certain time after the PF feed clutch turns on during paper feed from the Side Multi Feeder.

Step	Check description	Assumed cause	Measures	Reference
1	(In case of the paper bundle jam) Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	(In case of the paper bundle jam) Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	(In case of the paper bundle jam) Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	(In case of the paper bundle jam) Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	(In case of the paper bundle jam) Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
6	Checking the installation	No grounding between the main unit and the side multi feeder.	Attach the rails of the side multi feeder to the main unit.	Side Multi Feeder Installation Guide
7	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	
8	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach the PF feed sensor and reinsert the connector. If not repaired, replace the sensor.	
9	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [SMT] > [Clutch] > [C1 Clutch]. If the PF feed clutch does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor - PF main PWB • PF feed clutch - PF main PWB • PF main PWB - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
11	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0545: No paper feed from the side feeder**

**Object: Side feeder**

The PF paper feed sensor does not turn on after passing the certain time since the paper feed clutch turned on during paper feed from the side feeder.

Step	Check description	Assumed cause	Measures	Reference
1	(In case of the paper bundle jam) Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	(In case of the paper bundle jam) Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	(In case of the paper bundle jam) Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	(In case of the paper bundle jam) Checking the PF retard film	Paper separation force is not enough as the PF separation film gets deformed.	If PF separation film is deformed, repair or replace it.	
5	(In case of the paper bundle jam) Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(In case of the paper bundle jam) Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
7	Checking the installation	The ground between the main unit and the side feeder is not secured.	Attach the rails of the side feeder to the main unit.	Side Feeder Installation Guide
8	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side feeder to the main unit.	
9	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach the PF feed sensor and reinsert the connector. If not repaired, replace the sensor.	
10	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side Deck] > [Clutch] > [C1 Clutch]. If the PF feed clutch does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247

Step	Check description	Assumed cause	Measures	Reference
11	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor - PF main PWB • PF feed clutch - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
12	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side feeder)
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0511/J0512: Multi-feeding from the cassette**

The feed sensor does not run off when passing the certain time after it turns on during paper feed from cassette 1, 2.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Setting the cassette heater	The paper is damp.	[Cassette heater standard model] Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal it to prevent moisture.[Cassette heater optional model] Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal it to prevent moisture.	Installing the cassette heater
5	Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	Checking the retard spring	The retard spring comes off.	Reattach the retard spring.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the paper feed clutch	The feed clutch always turns on.	Execute U032 [Feed1] or [Feed2]. If feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U032
8	Checking the feed sensor	The feed sensor does not properly operate.	Reattach feed sensor 1, 2 and reinsert the connector. If not repaired, replace the sensor.	
9	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Feed clutch 1, 2 - Feed PWB • Feed sensor 1, 2 - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
10	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
11	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0533/J0534: Multi-feeding from the large capacity paper feeder**

The PF feed sensor does not turn off when passing the certain time after the PF feed sensor turns on during paper feed from the large capacity feeder (cassette 3, 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Setting the cassette heater	The paper is damp.	[Cassette heater standard model] Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal it to prevent moisture.[Cassette heater optional model] Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal it to prevent moisture.	Installing the cassette heater
5	Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley

Step	Check description	Assumed cause	Measures	Reference
6	Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
7	Checking the PF paper feed clutch	The PF feed clutch always turns on.	Execute U247 [LCF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If PF feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
8	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach PF feed sensor 1 and 2 and reinsert the connector. If not repaired, replace the sensor.	
9	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed clutch 1, 2 - PF main PWB • PF feed sensor 1, 2 - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
10	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
11	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0518: Multi-feeding from the duplex section**

The registration sensor does not turn off during paper feed from the duplex section.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Checking the paper	Paper curled or waved by moisture absorption.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
5	Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	

Step	Check description	Assumed cause	Measures	Reference
6	Checking the registration sensor	The registration sensor does not operate properly.	Turn the registration sensor on and off manually and check the indication at U031 [Regist]. If the registration sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
7	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Registration sensor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0519: Multi-feeding from the MP tray**

The MP feed sensor does not turn off during paper feed from the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Checking the paper	Paper gets curled or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
5	Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
7	Checking the MP feed clutch	The MP feed clutch always turns on.	Execute U032 [MPT Feed]. If the MP feed clutch does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U032

Step	Check description	Assumed cause	Measures	Reference
8	Checking the MP feed sensor	The MP feed sensor does not properly operate.	Turn the MP feed sensor on and off manually and check the indication at U031 [MPT Jam]. If the MP feed sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
9	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • MP feed sensor - Relay PWB • MP feed clutch - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
10	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
11	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0516/J0517: Multi-feeding from the paper feeder**

**Object: Paper feeder**

The PF feed sensor does not turn off when passing the certain time after the PF feed sensor turns on during paper feed from the Paper Feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Setting the PF cassette heater	The paper is damp.	Replace the paper. Install the PF cassette heater and set it at U327 if necessary. And please instruct user to store the paper that has less moisture. Store the dry paper in the plastic bag and seal it to prevent moisture.	Installing the PF cassette heater (Paper feeder)
5	Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the installation	No grounding between the main unit and the side multi feeder.	Attach the rails of the side multi feeder to the main unit.	Side Multi Feeder Installation Guide
8	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	
9	Checking the PF conveying clutch	The PF conveying clutch always turns on.	Execute U247 [Side 2PF] > [Clutch] > [V Feed(H) Clutch] or [V Feed(L) Clutch]. If PF conveying clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
10	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach PF feed sensor 1 and 2 and reinsert the connector. If not repaired, replace the sensor.	
11	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor 1, 2 - PF main PWB (Paper feeder) • PF conveying clutch 1, 2 - PF main PWB (Paper feeder) • PF main PWB (Paper feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
12	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
13	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
14	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB



J0536/J0537: Multi-feeding from the large capacity feeder

Object: Large capacity feeder

The PF feed sensor does not turn off when passing the certain time after the PF feed clutch turns on during paper feed from the large capacity feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Setting the PF cassette heater	The paper is damp.	Replace the paper. Install the PF cassette heater and set it at U327 if necessary. And please instruct user to store the paper that has less moisture. Store the dry paper in the plastic bag and seal it to prevent moisture.	Installing the PF cassette heater (Large capacity feeder)
5	Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
7	Checking the installation	No grounding between the main unit and the side multi feeder.	Attach the rails of the side multi feeder to the main unit.	Side Multi Feeder Installation Guide
8	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	
9	Checking the PF conveying clutch	The PF conveying clutch always turns on.	Execute U247 [Side LCF] > [Clutch] > [V Feed Clutch] or [H Feed1 Clutch]. If PF conveying clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
10	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach PF feed sensor 1 and 2 and reinsert the connector. If not repaired, replace the sensor.	

Step	Check description	Assumed cause	Measures	Reference
11	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor 1, 2 - PF main PWB (Large capacity feeder) • PF conveying clutch 1, 2 - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
12	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
13	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
14	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J0535: Multi-feeding from the side multi feeder**

**Object: Side multi feeder**

The PF feed sensor does not turn off when passing the certain time after the PF feed sensor turns on during paper feed from the Side Feeder.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Setting the PF cassette heater	The paper is damp.	Replace the paper. Install the PF cassette heater and set it at U327 if necessary. And please instruct user to store the paper that has less moisture. Store the dry paper in the plastic bag and seal it to prevent moisture.	Installing the PF cassette heater (Side multi feeder)

Step	Check description	Assumed cause	Measures	Reference
5	Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
7	Checking the installation	No grounding between the main unit and the side multi feeder.	Attach the rails of the side multi feeder to the main unit.	Side Multi Feeder Installation Guide
8	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	
9	Checking the PF conveying clutch	The PF conveying clutch always turns on.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
10	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach the PF feed sensor and reinsert the connector. If not repaired, replace the sensor.	
11	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed sensor - PF main PWB • PF conveying clutch 1 - PF main PWB • PF main PWB - Engine PWB	
12	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J0555: Multi-feeding from the side feeder

Object: Side feeder

The PF feed sensor does not turn off when passing the certain time after the PF feed sensor turns on during paper feed from the Side Feeder.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
2	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
4	Setting the PF cassette heater	The paper is damp.	Replace the paper. Install the PF cassette heater and set it at U327 if necessary. And please instruct user to store the paper that has less moisture. Store the dry paper in the plastic bag and seal it to prevent moisture.	Installing the PF cassette heater (Side multi feeder)
5	Checking the retard pulley	The paper separation force of the retard pulley is not enough.	Clean the retard pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	Checking the PF retard spring	The PF retard spring comes off.	Reattach the PF retard spring.	
7	Checking the installation	The ground between the main unit and the side feeder is not secured.	Attach the rails of the side feeder to the main unit.	Side Feeder Installation Guide
8	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side feeder to the main unit.	
11	Checking the PF paper feed clutch	The PF feed clutch always turns on.	Execute U247 [Side Deck] > [Clutch] > [C1 Clutch]. If the PF feed clutch does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
10	Checking the PF paper feed sensor	The PF paper feed sensor does not operate properly.	Reattach the PF feed sensor and reinsert the connector. If not repaired, replace the sensor.	
9	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feed clutch - PF main PWB • PF feed sensor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
12	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side feeder)
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J1301/1302: Middle sensor non-arrival jam

The middle sensor does not turn on after the feed sensor (cassette 1) / the conveying sensor (cassette 2) turns on during paper feed from cassette 1, 2.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	

Step	Check description	Assumed cause	Measures	Reference
12	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
13	Checking the paper feed clutch	The paper feed clutch does not operate properly.	Execute U032 [Feed1] or [Feed2]. If feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U032
14	Checking the paper feed motor	The feed motor does not properly operate.	Execute U030 [Feed]. If the feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
15	Checking the drive parts	The drive from the feed motor is not properly transmitted.	Check if the feed motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Middle sensor - Feed PWB • Feed clutch 1, 2 - Feed PWB • Feed motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
17	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J1303/1304: Middle sensor non-arrival jam**

The middle sensor does not turn on after PF conveying sensor 1 turns on during paper feed from the large capacity feeder (cassette 3, 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley

Step	Check description	Assumed cause	Measures	Reference
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
13	Checking the vertical conveying motor	The vertical conveying motor does not properly operate.	Reattach the vertical conveying motor and reinsert the connector. If not repaired, replace the sensor.	
14	Checking the drive parts	The drive from the vertical conveying motor is not properly transmitted.	Check if the vertical conveying motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
15	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [LCF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
16	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
17	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
18	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Middle sensor - Feed PWB • Vertical conveying motor - Feed PWB • PF feed clutch 1, 2 - PF main PWB • PF feed motor - PF main PWB • Feed PWB - Engine PWB • PF main PWB - Engine PWB	Wiring diagram
19	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
20	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J1305/J1306/1307: Middle sensor non-arrival jam

Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder

The middle sensor does not turn on after PF conveying sensor 3 turns on or off during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley



Step	Check description	Assumed cause	Measures	Reference
3	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed3 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247

Step	Check description	Assumed cause	Measures	Reference
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Middle sensor - Feed PWB • PF conveying clutch 3 - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB • Feed PWB - Engine PWB	Wiring diagram
15	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J1305: Middle sensor non-arrival jam**

**Object: Side feeder**

The middle sensor does not turn on after the PF feed sensor turns on or off during paper feed from the side feeder (cassette 5).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley

Step	Check description	Assumed cause	Measures	Reference
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
13	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side Deck] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
14	Checking the PF conveying motor	The PF conveying motor does not properly operate.	Execute U247 [Side Deck] > [Motor] > [On] or [Off]. If the PF conveying clutch does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF conveying motor is not properly transmitted.	Check if the PF conveying motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• Middle sensor - Feed PWB</li> <li>• Vertical conveying motor - Feed PWB</li> <li>• PF feed clutch - PF main PWB (Side feeder)</li> <li>• PF conveying motor - PF main PWB (Side feeder)</li> <li>• PF main PWB (Side Feeder) - Engine PWB</li> <li>• Feed PWB - Engine PWB</li> </ul>	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side feeder)
18	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
19	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J1311/J1312: Middle sensor stay jam**

The middle sensor does not turn off after the feed sensor (cassette 1) / the conveying sensor (cassette 2) turns off or on during paper feed from cassette 1, 2.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	

Step	Check description	Assumed cause	Measures	Reference
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the middle conveying motor	The middle conveying motor does not properly operate.	Execute U030 [Mid Roller]. If the middle conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
13	Checking the drive parts	The drive from the middle conveying motor is not properly transmitted.	Check if the middle conveying motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Middle sensor - Feed PWB • Middle conveying motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J1313/J1314: Middle sensor stay jam**

The middle sensor does not turn off after the conveying sensor turns off or on during paper feed from the large capacity feeder (cassette 3, 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the middle conveying motor	The middle conveying motor does not properly operate.	Execute U030 [Mid Roller]. If the middle conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
13	Checking the drive parts	The drive from the middle conveying motor is not properly transmitted.	Check if the middle conveying motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Middle sensor - Feed PWB • Middle conveying motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J1315/J1316/J1317: Middle sensor stay jam

Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder

The middle sensor does not turn off after PF conveying sensor 3 turns on or off during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	

Step	Check description	Assumed cause	Measures	Reference
11	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the middle conveying motor	The middle conveying motor does not properly operate.	Execute U030 [Mid Roller]. If the middle conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
13	Checking the drive parts	The drive from the middle conveying motor is not properly transmitted.	Check if the middle conveying motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Middle sensor - Feed PWB • Middle conveying motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J1315: Middle sensor stay jam

Object: Side feeder

The middle sensor does not turn off after the PF feed sensor turns on or off during paper feed from the side feeder.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	



Step	Check description	Assumed cause	Measures	Reference
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the middle sensor	The middle sensor does not properly operate.	Turn the middle sensor on and off by a hand and check the indication at U031 [Feed1(Mid)]. If the middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the middle conveying motor	The middle conveying motor does not properly operate.	Execute U030 [Mid Roller]. If the middle conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
13	Checking the drive parts	The drive from the middle conveying motor is not properly transmitted.	Check if the middle conveying motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Middle sensor - Feed PWB • Middle conveying motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

### J1502: Conveying sensor non-arrival jam

The conveying sensor does not turn on after feed sensor 2 turns on or off during paper feed from cassette 2.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	

Step	Check description	Assumed cause	Measures	Reference
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the conveying sensor	The conveying sensor does not properly operate.	Turn the conveying sensor on and off by a hand and check the indication at U031 [Feed2(Feed B)]. If the conveying sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
13	Checking the vertical conveying motor	The vertical conveying motor does not properly operate.	Reattach the vertical conveying motor and reinsert the connector. If not repaired, replace the sensor.	
14	Checking the drive parts	The drive from the vertical conveying motor is not properly transmitted.	Check if the vertical conveying motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Conveying sensor - Feed PWB • Vertical conveying motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
16	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
17	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J1503/J1504: Conveying sensor non-arrival jam**

The conveying sensor does not turn on after PF conveying sensor 1 turns on or off during paper feed from the large capacity feeder (cassette 3, 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	

Step	Check description	Assumed cause	Measures	Reference
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the conveying sensor	The conveying sensor does not properly operate.	Turn the conveying sensor on and off by a hand and check the indication at U031 [Feed2(Feed B)]. If the conveying sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the vertical conveying motor	The vertical conveying motor does not properly operate.	Reattach the vertical conveying motor and reinsert the connector. If not repaired, replace the sensor.	
15	Checking the drive parts	The drive from the vertical conveying motor is not properly transmitted.	Check if the vertical conveying motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Conveying sensor - Feed PWB • PF conveying clutch 1 - PF main PWB • Vertical conveying motor - Feed PWB • PF main PWB - Engine PWB • Feed PWB - Engine PWB	Wiring diagram
17	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

### J1512: Conveying sensor stay jam

The conveying sensor does not turn off after feed sensor 2 turns off or on during paper feed from cassette 2.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	

Step	Check description	Assumed cause	Measures	Reference
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the conveying sensor	The conveying sensor does not properly operate.	Turn the conveying sensor on and off by a hand and check the indication at U031 [Feed2(Feed B)]. If the conveying sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the vertical conveying motor	The vertical conveying motor does not properly operate.	Reattach the vertical conveying motor and reinsert the connector. If not repaired, replace the sensor.	
13	Checking the drive parts	The drive from the vertical conveying motor is not properly transmitted.	Check if the vertical conveying motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Conveying sensor - Feed PWB • Vertical conveying motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J1513/J1514: Conveying sensor stay jam**

The conveying sensor does not turn off after PF conveying sensor 1 turns on or off during paper feed from the large capacity feeder (cassette 3, 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	

Step	Check description	Assumed cause	Measures	Reference
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the conveying sensor	The conveying sensor does not properly operate.	Turn the conveying sensor on and off by a hand and check the indication at U031 [Feed2(Feed B)]. If the conveying sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the vertical conveying motor	The vertical conveying motor does not properly operate.	Reattach the vertical conveying motor and reinsert the connector. If not repaired, replace the sensor.	
14	Checking the drive parts	The drive from the vertical conveying motor is not properly transmitted.	Check if the vertical conveying motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Conveying sensor - Feed PWB • PF conveying clutch 1 - PF main PWB • Vertical conveying motor - Feed PWB • PF main PWB - Engine PWB • Feed PWB - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
17	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2106/J2107: PF conveying sensor 1 non-arrival jam

Object: Side multi feeder + Paper feeder

PF conveying sensor 1 does not turn on after PF feed sensor 1 (cassette 6) / PF conveying sensor 2 (cassette 7) turns on or off during paper feed from the paper feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley



Step	Check description	Assumed cause	Measures	Reference
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side 2PF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If PF feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side 2PF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side 2PF] > [Clutch] > [V Feed(L) Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247

Step	Check description	Assumed cause	Measures	Reference
17	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB (Paper Feeder) • PF feed clutch 1, 2 - PF main PWB (Paper Feeder) • PF feed motor - PF main PWB (Paper Feeder) • PF conveying clutch 2 - PF main PWB (Paper Feeder) (When feeding from cassette 7) • PF main PWB (Paper Feeder) - PF main PWB (Side Multi Feeder) • PF main PWB (Side Multi Feeder) - Engine PWB	Wiring diagram
18	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
19	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
20	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2116/J2117: PF conveying sensor 1 stay jam

Object: Side multi feeder + Paper feeder

PF conveying sensor 1 does not turn off after PF feed sensor 1 (cassette 6) / PF conveying sensor 2 (cassette 7) turns on or off during paper feed from the paper feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
12	(When feeding from cassette 6) Checking the PF feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side 2PF] > [Clutch] > [C1 Clutch]. If PF feed clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	(When feeding from cassette 7) Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side 2PF] > [Clutch] > [V Feed(L) Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side 2PF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB (Paper feeder) • PF feed clutch 1 - PF main PWB (Paper feeder) (When feeding from cassette 6) • PF conveying clutch 2 - PF main PWB (Paper feeder) (When feeding from cassette 7) • PF feed motor - PF main PWB (Paper feeder) • PF main PWB (Paper feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
18	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
19	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2307: PF conveying sensor 2 non-arrival jam

Object: Side multi feeder + Paper feeder

PF conveying sensor 2 does not turn on after PF feed sensor 2 turns on or off during paper feed from cassette 7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	

Step	Check description	Assumed cause	Measures	Reference
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side 2PF] > [Clutch] > [V Feed(L) Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side 2PF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB (Paper feeder) • PF conveying clutch 2 - PF main PWB (Paper feeder) • PF feed motor - PF main PWB (Paper feeder) • PF main PWB (Paper feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
18	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
19	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J2307: PF conveying sensor 2 non-arrival jam**

**Object: Side multi feeder + Large capacity feeder**

PF conveying sensor 2 does not turn on after PF feed sensor 2 turns on or off during paper feed from cassette 7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	

Step	Check description	Assumed cause	Measures	Reference
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [H Feed3 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB (Large capacity feeder) • PF conveying clutch 3 - PF main PWB (Large capacity feeder) • PF feed motor - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
18	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
19	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2317: PF conveying sensor 2 stay jam

Object: Side multi feeder + Paper feeder

PF conveying sensor 2 does not turn off after PF feed sensor 2 turns off or on during paper feed from cassette 7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	



Step	Check description	Assumed cause	Measures	Reference
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side 2PF] > [Clutch] > [V Feed(L) Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side 2PF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB (Paper feeder) • PF conveying clutch 2 - PF main PWB (Paper feeder) • PF feed motor - PF main PWB (Paper feeder) • PF main PWB (Paper feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J2317: PF conveying sensor 2 stay jam**

**Object: Side multi feeder + Large capacity feeder**

PF conveying sensor 2 does not turn off after PF feed sensor 2 turns off or on during paper feed from cassette 7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [H Feed3 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB (Large capacity feeder) • PF conveying clutch 3 - PF main PWB (Large capacity feeder) • PF feed motor - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J2603: PF conveying sensor 1 non-arrival jam**

PF conveying sensor 1 does not turn on after PF feed sensor 1 turns on during paper feed from the large capacity feeder (cassette 3).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	

Step	Check description	Assumed cause	Measures	Reference
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB • PF conveying clutch 2 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

### J2604: PF conveying sensor 1 non-arrival jam

PF conveying sensor 1 does not turn on after PF conveying sensor 2 turns on during paper feed from the large capacity feeder (cassette 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed2 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB • PF conveying clutch 3 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2606/J2607: PF conveying sensor 1 non-arrival jam

Object: Side multi feeder + Large capacity feeder

PF conveying sensor 1 does not turn on after PF feed sensor 1 (cassette 6) / PF conveying sensor 2 (cassette 7) turns on or off during paper feed from the large capacity feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	



Step	Check description	Assumed cause	Measures	Reference
13	Checking the PF paper feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side LCF] > [Clutch] > [C1 Clutch] or [C2 Clutch]. If PF feed clutch 1 or 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [H Feed1 Clutch] or [H Feed2 Clutch]. If PF conveying clutch 2 or 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace the clutch.	Executing U247
17	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• PF conveying sensor 1 - PF main PWB (Large capacity feeder)</li> <li>• PF feed clutch 1, 2 - PF main PWB (Large capacity feeder)</li> <li>• PF feed motor - PF main PWB (Large capacity feeder)</li> <li>• PF conveying clutch 2, 3 - PF main PWB (Large capacity feeder)</li> <li>• PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder)</li> <li>• PF main PWB (Side multi feeder) - Engine PWB</li> </ul>	Wiring diagram
18	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)

Step	Check description	Assumed cause	Measures	Reference
19	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
20	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J2613: PF conveying sensor 1 stay jam**

PF conveying sensor 1 does not turn off after PF feed sensor 1 turns on or off during paper feed from the large capacity feeder (cassette 3).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	

Step	Check description	Assumed cause	Measures	Reference
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB • PF conveying clutch 2 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
17	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J2614: PF conveying sensor 1 stay jam**

PF conveying sensor 1 does not turn off after PF conveying sensor 2 turns on or off during paper feed from the large capacity feeder (cassette 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	

Step	Check description	Assumed cause	Measures	Reference
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed2 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB • PF conveying clutch 3 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
17	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2616/J2617: PF conveying sensor 1 stay jam

Object: Side multi feeder + Large capacity feeder

PF conveying sensor 1 does not turn off after PF feed sensor 1 (cassette 6) / PF conveying sensor 2 (cassette 7) turns on or off during paper feed from the large capacity feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	

Step	Check description	Assumed cause	Measures	Reference
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
12	(When feeding from cassette 6) Checking the PF feed clutch	The PF paper feed clutch does not operate properly.	Execute U247 [Side LCF] > [Clutch] > [C1 Cutch]. If PF feed clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	(When feeding from cassette 7) Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [H Feed1 Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB (Large capacity feeder) • PF feed clutch 1 - PF main PWB (Large capacity feeder) (When feeding from cassette 6) • PF conveying clutch 2 - PF main PWB (Large capacity feeder) (When feeding from cassette 7) • PF feed motor - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
18	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
19	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J2704: PF conveying sensor 2 non-arrival jam**

PF conveying sensor 2 does not turn on after PF feed sensor 2 turns on or off during paper feed from the large capacity feeder (cassette 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed2 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB • PF conveying clutch 3 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB



J2707: PF conveying sensor 2 non-arrival jam

Object: Side multi feeder + Large capacity feeder

PF conveying sensor 2 does not turn on after PF feed sensor 2 turns on or off during paper feed from the large capacity feeder (cassette 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [H Feed2 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB (Large capacity feeder) • PF conveying clutch 3 - PF main PWB (Large capacity feeder) • PF feed motor - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
18	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
19	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2714: PF conveying sensor 2 stay jam

PF conveying sensor 2 does not turn off after PF feed sensor 2 turns off during paper feed from the large capacity feeder (cassette 4).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [LCF] > [Clutch] > [Feed2 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247

Step	Check description	Assumed cause	Measures	Reference
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB • PF conveying clutch 3 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
17	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J2717: PF conveying sensor 2 stay jam

Object: Side multi feeder + Large capacity feeder

PF conveying sensor 2 does not turn off after PF feed sensor 2 turns off during paper feed from the large capacity feeder (cassette 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [H Feed2 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB (Large capacity feeder) • PF conveying clutch 3 - PF main PWB (Large capacity feeder) • PF feed motor - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3405: PF conveying sensor 1 non-arrival jam

Object: Side multi feeder

PF conveying sensor 1 does not turn on after the PF feed sensor turns on during paper feed from the Side Multi Feeder (cassette 5).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB • PF conveying clutch 1 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3406/J3407: PF conveying sensor 1 non-arrival jam

Object: Side multi feeder + Paper feeder

PF conveying sensor 1 in the Side Multi Feeder does not turn on after PF conveying sensor 1 turns on during paper feed from the paper feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley



Step	Check description	Assumed cause	Measures	Reference
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace the sensor. (Side multi feeder)	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Side multi feeder)	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side 2PF] > [Clutch] > [V Feed(H) Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
17	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side 2PF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
18	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Paper Feeder)	
19	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• PF conveying sensor 1 - PF main PWB (Side multi feeder)</li> <li>• PF conveying clutch 1 - PF main PWB (Side multi feeder)</li> <li>• PF feed motor - PF main PWB (Side multi feeder)</li> <li>• PF conveying clutch 1 - PF main PWB (Large capacity feeder)</li> <li>• PF feed motor - PF main PWB (Large capacity feeder)</li> <li>• PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder)</li> <li>• PF main PWB (Side multi feeder) - Engine PWB</li> </ul>	Wiring diagram
20	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
21	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
22	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3406/J3407: PF conveying sensor 1 non-arrival jam

Object: Side multi feeder + Large capacity feeder

PF conveying sensor 1 in the Side Multi Feeder does not turn on after PF conveying sensor 1 turns on during paper feed from the large capacity feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace the sensor. (Side multi feeder)	

Step	Check description	Assumed cause	Measures	Reference
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Side multi feeder)	
16	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [V Feed Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
17	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
18	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Large capacity feeder)	
19	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• PF conveying sensor 1 - PF main PWB (Side multi feeder)</li> <li>• PF conveying clutch 1 - PF main PWB (Side multi feeder)</li> <li>• PF feed motor - PF main PWB (Side multi feeder)</li> <li>• PF conveying clutch 1 - PF main PWB (Large capacity feeder)</li> <li>• PF feed motor - PF main PWB (Large capacity feeder)</li> <li>• PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder)</li> <li>• PF main PWB (Side multi feeder) - Engine PWB</li> </ul>	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
20	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
21	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
22	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3415: PF conveying sensor 1 stay jam

Object: Side multi feeder

The PF conveying sensor 1 does not turn off after the PF feed sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	

Step	Check description	Assumed cause	Measures	Reference
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB • PF conveying clutch 1 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
17	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3416/J3417: PF conveying sensor 1 stay jam

Object: Side multi feeder + Paper feeder

PF conveying sensor 1 in the Side Multi Feeder does not turn off after PF conveying sensor 1 turns on during paper feed from the paper feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace the sensor. (Side multi feeder)	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247

Step	Check description	Assumed cause	Measures	Reference
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Side multi feeder)	
15	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side 2PF] > [Clutch] > [V Feed(H) Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
16	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side 2PF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
17	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Paper Feeder)	
18	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• PF conveying sensor 1 - PF main PWB (Side multi feeder)</li> <li>• PF conveying clutch 1 - PF main PWB (Side multi feeder)</li> <li>• PF feed motor - PF main PWB (Side multi feeder)</li> <li>• PF conveying clutch 1 - PF main PWB (Large capacity feeder)</li> <li>• PF feed motor - PF main PWB (Large capacity feeder)</li> <li>• PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder)</li> <li>• PF main PWB (Side multi feeder) - Engine PWB</li> </ul>	Wiring diagram
19	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)



Step	Check description	Assumed cause	Measures	Reference
20	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
21	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3416/J3417: PF conveying sensor 1 stay jam

Object: Side multi feeder + Large capacity feeder

PF conveying sensor 1 in the Side Multi Feeder does not turn on after PF conveying sensor 1 turns off during paper feed from the large capacity feeder (cassette 6, 7).

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper size guides	Setting position of the paper size guides does not match the paper size.	Reset the paper size guides matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	

Step	Check description	Assumed cause	Measures	Reference
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace the sensor. (Side multi feeder)	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Side multi feeder)	
15	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [Side LCF] > [Clutch] > [V Feed Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
16	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [Side LCF] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
17	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them. (Large capacity feeder)	

Step	Check description	Assumed cause	Measures	Reference
18	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB (Side multi feeder) • PF conveying clutch 1 - PF main PWB (Side multi feeder) • PF feed motor - PF main PWB (Side multi feeder) • PF conveying clutch 1 - PF main PWB (Large capacity feeder) • PF feed motor - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
19	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
20	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
21	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J3505/J3506/J3507: PF conveying sensor 2 non-arrival jam**

**Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder**

PF conveying sensor 2 does not turn on after PF conveying sensor 1 turns on during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley

Step	Check description	Assumed cause	Measures	Reference
3	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 1 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 1 - PF main PWB • PF conveying clutch 1 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J3515/J3516/J3517: PF conveying sensor 2 stay jam**

**Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder**

PF conveying sensor 2 does not turn off after PF conveying sensor 1 turns on during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	

Step	Check description	Assumed cause	Measures	Reference
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 2 and reinsert the connector. If not repaired, replace it.	
12	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed2 Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 2 - PF main PWB • PF conveying clutch 2 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
16	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
17	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3605/J3606/J3607: PF conveying sensor 3 non-arrival jam

Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder

PF conveying sensor 3 does not turn on after PF conveying sensor 2 turns on during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 3 and reinsert the connector. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed2 Clutch]. If PF conveying clutch 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 3 - PF main PWB • PF conveying clutch 2 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J3615/J3616/J3617: PF conveying sensor 3 stay jam

Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder

The PF conveying sensor 3 does not turn off after PF conveying sensor 2 turns on during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	



Step	Check description	Assumed cause	Measures	Reference
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF conveying sensor	The PF conveying sensor does not properly operate.	Reattach PF conveying sensor 3 and reinsert the connector. If not repaired, replace it.	
13	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed3 Clutch]. If PF conveying clutch 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
15	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF conveying sensor 3 - PF main PWB • PF conveying clutch 3 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
17	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J3705/J3706/J3707: PF exit sensor non-arrival jam**

**Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder**

The PF exit sensor does not turn on after PF conveying sensor 1 turns on when the multi-feeding is detected during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley

Step	Check description	Assumed cause	Measures	Reference
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Checking the PF feedshift guide	The PF feedshift guide does not properly operate.	Check if the PF feedshift guide operates and if not properly operate manually, re-install it. If the error or deformed, replace it.	
13	Checking the PF feedshift solenoid	The PF feedshift solenoid does not properly operate.	Execute U247 > [SMT] > [Clutch] > [Separator Solenoid] to check the PF feedshift guide operation. If the guide does not properly operate, reattach the PF feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U247
14	Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
15	Checking the PF exit sensor	The PF exit sensor does not properly operate.	Reattach the PF exit sensor and reinsert the connector. If not repaired, replace it.	
16	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
17	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
18	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
19	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feedshift solenoid - PF main PWB • PF exit sensor - PF main PWB • PF conveying clutch 1 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
20	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
21	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J3715/J3716/J3717: PF exit sensor stay jam**

**Object: Side multi feeder + Paper feeder, or Side multi feeder + Large capacity feeder**

The PF exit sensor does not turn off after PF conveying sensor 1 turns on when the multi-feeding is detected during paper feed from cassette 5-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the PF feedshift guide	The PF feedshift guide does not properly operate.	Check if the PF feedshift guide operates and if not properly operate manually, re-install it. If the error or deformed, replace it.	
12	Checking the PF feedshift solenoid	The PF feedshift solenoid does not properly operate.	Execute U247 > [SMT] > [Clutch] > [Separator Solenoid] to check the PF feedshift guide operation. If the guide does not properly operate, reattach the PF feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U247
13	Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
14	Checking the PF exit sensor	The PF exit sensor does not properly operate.	Reattach the PF exit sensor and reinsert the connector. If not repaired, replace it.	
15	Checking the PF conveying clutch	The PF conveying clutch does not properly operate.	Execute U247 [SMT] > [Clutch] > [Feed1 Clutch]. If PF conveying clutch 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
16	Checking the PF feed motor	The PF feed motor does not properly operate.	Execute U247 [SMT] > [Motor] > [On] or [Off]. If the PF feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U247
17	Checking the drive parts	The drive from the PF feed motor is not properly transmitted.	Check if the PF feed motor is smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
18	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF feedshift solenoid - PF main PWB • PF exit sensor - PF main PWB • PF conveying clutch 1 - PF main PWB • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
19	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB (Side multi feeder)
20	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4001/J4002/J4003/J4004/J4005/J4006/J4007: Registration sensor non arrival jam**

The registration sensor does not turn on after the middle sensor turns on during paper feed from cassette 1-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley

Step	Check description	Assumed cause	Measures	Reference
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Setting the paper loop amount	The paper is not sufficiently pinched between the registration rollers.	Set the paper loop amount at U051.	Executing U051
13	Checking the registration sensor	The registration sensor does not operate properly.	Turn the registration sensor on and off manually and check the indication at U031 [Regist]. If the registration sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
14	Checking the registration motor	The registration motor does not properly operate.	Execute U030 [Regist]. If the registration motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
15	Checking the drive parts	The drive from the registration motor is not properly transmitted.	Check if the registration motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Registration sensor - Feed PWB • Registration motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
17	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J4009: Registration sensor non arrival jam

The registration sensor does not turn on after the MP feed sensor turns on during paper feed from the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
3	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	(When the paper conveying delays) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
6	(When the paper conveying delays) Checking the conveying cover	The conveying cover is deformed.	Check if conveying cover is securely closed. If not closed by deformation, etc., replace it.	
7	Checking the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
8	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
9	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
10	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
11	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
12	Setting the paper loop amount	The paper is not sufficiently pinched between the registration rollers.	Set the paper loop amount at U051.	Executing U051



Step	Check description	Assumed cause	Measures	Reference
13	Checking the registration sensor	The registration sensor does not operate properly.	Turn the registration sensor on and off manually and check the indication at U031 [Regist]. If the registration sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
14	Checking the registration motor	The registration motor does not properly operate.	Execute U030 [Regist]. If the registration motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
15	Checking the drive parts	The drive from the registration motor is not properly transmitted.	Check if the registration motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Registration sensor - Feed PWB • Registration motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
17	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4011/J4012/J4013/J4014/J4015/J4016/J4017: Registration sensor stay jam**

The registration sensor does not turn off after the middle sensor turns on or off during paper feed from cassette 1-7.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
11	Checking the registration sensor	The registration sensor does not operate properly.	Turn the registration sensor on and off manually and check the indication at U031 [Regist]. If the registration sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the registration motor	The registration motor does not properly operate.	Execute U030 [Regist]. If the registration motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
13	Checking the drive parts	The drive from the registration motor is not properly transmitted.	Check if the registration motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Registration sensor - Feed PWB • Registration motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4019: Registration sensor stay jam**

The registration sensor does not turn off after the MP feed sensor turns on or off during paper feed from the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(In case of multi-feeding) Checking the feed pulley and the retard pulley	The paper fanning is not enough.	Clean or replace the feed pulley and the retard pulley.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean or replace the paper conveying rollers.	
6	(When multifeed occurs) Reloading the paper	The cut-end of the paper is crushed.	Fan the paper well and load it by reversing the paper direction	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	Paper gets curled downward or waving.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	

Step	Check description	Assumed cause	Measures	Reference
11	Checking the registration sensor	The registration sensor does not operate properly.	Turn the registration sensor on and off manually and check the indication at U031 [Regist]. If the registration sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
12	Checking the registration motor	The registration motor does not properly operate.	Execute U030 [Regist]. If the registration motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
13	Checking the drive parts	The drive from the registration motor is not properly transmitted.	Check if the registration motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
14	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Registration sensor - Feed PWB • Registration motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
15	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
16	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4101/J4102/J4103/J4104/J4105/J4106/J4107/J4108/J4109: Loop sensor non arrival jam**

The loop sensor does not turn on after the registration roller turns on during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Performing the prior standard check items	There is a mechanical cause such as the dirty guide, etc.	Perform the prior standard check items.	
2	Setting the paper loop amount	The paper is not sufficiently pinched between the registration rollers.	Set the paper loop amount at U051.	Executing U051
3	Opening and closing the conveying unit	The drawer connector connected to the conveying unit is not properly connected.	Open the conveying unit and close it completely. If the pin of the drawer connector between the conveying unit and the main unit is dirty or deformed, clean or repair it.	

Step	Check description	Assumed cause	Measures	Reference
4	Checking the loop sensor	The loop sensor does not properly operate.	Turn the loop sensor on and off by a hand and check the indication at U031 [Regist Loop Sensor]. If the loop sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
5	Checking the registration motor	The registration motor does not properly operate.	Execute U030 [Regist]. If the registration motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
6	Checking the drive parts	The drive from the registration motor is not properly transmitted.	Check if the registration motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
7	Checking the transfer belt and the drive section	Transfer belt is not properly driving.	If the transfer belt is deformed, the drive gear is broken, the bushing is scraped, replace the transfer belt unit.	Detaching and reattaching the transfer belt unit
8	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Loop sensor - Relay PWB • Registration motor - Feed PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
9	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
10	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
11	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4111/J4112/J4113/J4114/J4115/J4116/J4117/J4118/J4119: Loop sensor stay jam**

The loop sensor does not turn off when passing the certain time after the registration sensor turns on during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Performing the prior standard check items	There is a mechanical cause such as the dirty guide, etc.	Perform the prior standard check items.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	

Step	Check description	Assumed cause	Measures	Reference
3	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
4	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
5	Cleaning the transfer separation needles	Paper rolled up to the transfer belt by dirt of the transfer separation needle.	Clean the transfer separation needles.	
6	Opening and closing the conveying unit	The drawer connector connected to the conveying unit is not properly connected.	Open the conveying unit and close it completely. If the pin of the drawer connector between the conveying unit and the main unit is dirty or deformed, clean or repair it.	
7	Checking the loop sensor	The loop sensor does not properly operate.	Turn the loop sensor on and off by a hand and check the indication at U031 [Regist Loop Sensor]. If the loop sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking the registration motor	The registration motor does not properly operate.	Execute U030 [Regist]. If the registration motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
9	Checking the drive parts	The drive from the registration motor is not properly transmitted.	Check if the registration motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
10	Checking the transfer belt and the drive section	Transfer belt is not properly driving.	If the transfer belt is deformed, the drive gear is broken, the bushing is scraped, replace the transfer belt unit.	Detaching and reattaching the transfer belt unit
11	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Loop sensor - Relay PWB • Registration motor - Feed PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
12	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	

Step	Check description	Assumed cause	Measures	Reference
13	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
14	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J4201/J4202/J4203/J4204/J4205/J4206/J4207/J4208/J4209: Fuser exit sensor non arrival jam

Condition: Paper jam in the fuser unit (The paper leading margin is less than 4.0mm.)

The fuser exit sensor does not turn on after the loop sensor turns on during paper feed from cassette 1-7, the duplex section or the MP tray. This is caused by paper rolled up around the fuser roller.

Step	Check description	Assumed cause	Measures	Reference
1	Adjusting the paper leading edge timing	The margin at the paper leading edge is incorrect.	If each margin is not uneven, adjust the leading margin in U034.	Executing U034
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When paper skews) Resetting the paper width guides or the paper size guide	Setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
4	(When paper skews) Checking the feed pulley	Conveying capability of the feed pulley is not enough.	Clean the feed pulley surface. If it is worn down, replace it.	Detaching and reattaching the pickup pulley, feed pulley and retard pulley
5	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
6	(When the paper skew occurs) Checking the conveying rollers	The paper conveying force of the conveying rollers is insufficient.	Clean the conveying related roller. If the surface is worn out, replace it.	
7	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
8	Checking the paper	The paper is wavy.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
10	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	

Step	Check description	Assumed cause	Measures	Reference
11	Checking the press roller and the fuser belt	The foreign objects are adhered to the pressure roller or the fuser belt.	Clean the pressure roller and the fuser belt. Or, replace the fuser unit.	Detaching and Reattaching the fuser unit
12	Checking the fuser separation plate	Foreign objects such as toner are on the fuser separation plate. Or, the fuser separation plate is deformed or improperly attached.	Replace the fuser unit.	Detaching and Reattaching the fuser unit
13	Cleaning the machine inside	The machine inside is contaminated with toner.	Clean the machine inside.	
14	Executing U161	The paper curls.	Lower the fuser temperature during the print at U161.	Executing U161
15	Checking the paper	The paper curls.	Replace the paper if it is damp. (Replace with long grain paper.)	
16	Checking the settings	The actual paper and the paper settings (media type, paper size) do not match.	Set the proper media type via the System Menu.	
17	Reinstalling the fuser unit	The fuser unit is not properly installed nor connected.	Reinstall the fuser unit and reconnect the connector.	Detaching and Reattaching the fuser unit
18	Checking the fuser exit sensor	The fuser exit sensor does not properly operate.	Turn the fuser exit sensor on and off manually and check the indication at U031 [Fuser Feed]. If the fuser exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace the fuser unit.	Detaching and Reattaching the fuser unit
19	Checking the feedshift solenoid	The feedshift solenoid does not operate properly.	Execute U033 [Branch Exit] to check the feedshift guide operation. If the guide does not properly operate, reattach the feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U033
20	Checking the fuser motor	The fuser motor does not operate properly.	Execute U030 [Fuser]. If the fuser motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
21	Checking the drive parts	The drive from the fuser motor is not properly transmitted.	Check if the fuser motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	



Step	Check description	Assumed cause	Measures	Reference
22	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Fuser exit sensor - Engine PWB • Feedshift solenoid - Front PWB • Fuser motor - Feed PWB • Front PWB - Engine PWB • Feed PWB - Engine PWB	Wiring diagram
23	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
24	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
25	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4201/J4202/J4203/J4204/J4205/J4206/J4207/J4208/J4209: Fuser exit sensor non arrival jam**

**Condition: Paper jam in the fuser unit (The paper leading margin is 4.0mm or more.)**

The fuser exit sensor does not turn on after the loop sensor turns on during paper feed from cassette 1-7, the duplex section or the MP tray. This is caused by paper rolled up around the fuser roller.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the press roller and the fuser belt	The foreign objects are adhered to the pressure roller or the fuser belt.	Clean the pressure roller and the fuser belt. Or, replace the fuser unit.	Detaching and Reattaching the fuser unit
2	Checking the fuser separation plate	The toner is adhered to the fuser separation plate or it is deformed or floated.	Replace the fuser unit.	Detaching and Reattaching the fuser unit
3	Cleaning the machine inside	The machine inside is contaminated with toner.	Clean the machine inside.	
4	Checking the paper	The paper curls.	Replace with long grain paper.	
5	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
6	(When using the thin paper) Checking the image	Thin paper of 55g or less is used and the solid image of 30mm and more appears at the leading edge.	In the System Menu, change the media type of the cassette to use to [Custom7] and change the paper weight of "Custom7" to [Light]. Custom7 setting for the thin paper use: This is the mode to prevent the fuser separation failure by reducing the paper conveying speed and lowering the fuser temperature. (After changing this setting, "Adjusting..." is displayed till the fuser temperature is lowered.)	
7	Reinstalling the fuser unit	The fuser unit is not properly installed.	Reinstall the fuser unit and reconnect the connector.	Detaching and Reattaching the fuser unit

Step	Check description	Assumed cause	Measures	Reference
8	Checking the fuser exit sensor	The fuser exit sensor does not properly operate.	Turn the fuser exit sensor on and off manually and check the indication at U031 [Fuser Feed]. If the fuser exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace the fuser unit.	Detaching and Reattaching the fuser unit
9	Checking the feedshift solenoid	The feedshift solenoid does not operate properly.	Execute U033 [Branch Exit] to check the feedshift guide operation. If the guide does not properly operate, reattach the feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U033
10	Checking the fuser motor	The fuser motor does not operate properly.	Execute U030 [Fuser]. If the fuser motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
11	Checking the drive parts	The drive from the fuser motor is not properly transmitted.	Check if the fuser motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
12	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• Fuser exit sensor - Engine PWB</li> <li>• Feedshift solenoid - Front PWB</li> <li>• Fuser motor - Feed PWB</li> <li>• Front PWB - Engine PWB</li> <li>• Feed PWB - Engine PWB</li> </ul>	Wiring diagram
13	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
14	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
15	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4211/J4212/J4213/J4214/J4215/J4216/J4217/J4218/J4219: Fuser exit sensor stay jam**

The fuser exit sensor does not turn off after the registration sensor turns off during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper tray	There is an obstacle on the tray.	Remove an obstacle.	
2	Checking the paper tray	The paper stopper is not stored on the tray.	Store the paper stopper.	

Step	Check description	Assumed cause	Measures	Reference
3	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
4	(When the paper skew occurs) Relocating the paper width guides	The locations of the paper width guides do not fit with the paper size.	Relocate the paper width guides to fit them with the paper size.	
5	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
6	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
7	Checking the eject guide	Foreign objects such as toner are on the eject guide.	Clean or replace the exit guide.	
8	Reinstalling the exit unit	The exit unit is not properly installed.	Reinstall the exit unit and reconnect the connector.	Detaching and reattaching the exit unit
9	Reinstalling the fuser unit	The fuser unit is not properly installed.	Reinstall the fuser unit and reconnect the connector.	Detaching and Reattaching the fuser unit
10	Checking the eject roller	The eject roller does not rotate.	If the drive gear is deformed, bushing is scrapped, replace exit roller drive parts.	Detaching and reattaching the exit unit
11	Checking the exit motor	The exit motor does not properly operate.	Execute U030 [Exit(CW)]. If the exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
12	Checking the drive parts	The drive from the exit motor is not properly transmitted.	Check if the exit motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
13	Checking the fuser exit sensor	The fuser exit sensor does not properly operate.	Turn the fuser exit sensor on and off manually and check the indication at U031 [Fuser Feed]. If the fuser exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace the fuser unit.	Detaching and Reattaching the fuser unit

Step	Check description	Assumed cause	Measures	Reference
14	Checking the feedshift solenoid	The feedshift solenoid does not operate properly.	Execute U033 [Branch Exit] to check the feedshift guide operation. If the guide does not properly operate, reattach the feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U033
15	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Exit motor - Front PWB • Fuser exit sensor - Engine PWB • Feedshift solenoid - Front PWB • Front PWB - Engine PWB	Wiring diagram
16	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
17	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4301/J4302/J4303/J4304/J4305/J4306/J4307/J4309: Duplex sensor 1 non arrival jam**

Duplex sensor 1 does not turn on after the switchback motor turns on during paper feed from cassette 1-7 or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Opening and closing the conveying unit	The drawer connector connected to the conveying unit is not properly connected.	Open the conveying unit and close it completely. If the pin of the drawer connector between the conveying unit and the main unit is dirty or deformed, clean or repair it.	
3	Checking duplex sensor 1	Duplex sensor 1 does not operate properly.	Turn duplex sensor 1 on and off by a hand and check the indication at U031 [DU1]. If duplex sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
4	Checking duplex motor 1	Duplex motor 1 does not properly operate.	Execute U030 [DU1]. If duplex motor 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
5	Checking the drive parts	The drive from duplex motor 1 is not properly transmitted.	Check if duplex motor 1 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
6	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Duplex sensor 1 - Relay PWB • Duplex motor 1 - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
7	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4311/J4312/J4313/J4314/J4315/J4316/J4317/J4319: Duplex sensor 1 stay jam**

The duplex sensor 1 does not turn off after the switchback motor turns on during paper feed from cassette 1-7 or the MP tray. Or, duplex sensor 1 does not turn off after the switchback sensor turns off during paper feed from cassette 1-7 or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Opening and closing the conveying unit	The drawer connector connected to the conveying unit is not properly connected.	Open the conveying unit and close it completely. If the pin of the drawer connector between the conveying unit and the main unit is dirty or deformed, clean or repair it.	
3	Checking duplex sensor 1	Duplex sensor 1 does not operate properly.	Turn duplex sensor 1 on and off by a hand and check the indication at U031 [DU1]. If duplex sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
4	Checking duplex motor 1	Duplex motor 1 does not properly operate.	Execute U030 [DU1]. If duplex motor 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
5	Checking the drive parts	The drive from duplex motor 1 is not properly transmitted.	Check if duplex motor 1 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
6	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Duplex sensor 1 - Relay PWB • Duplex motor 1 - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
7	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4401/J4402/J4403/J4404/J4405/J4406/J4407/J4409: Duplex sensor 2 non arrival jam**

Duplex sensor 2 does not turn on after turning duplex sensor 1 on during paper feed from cassette 1-7 or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Opening and closing the conveying unit	The drawer connector connected to the conveying unit is not properly connected.	Open the conveying unit and close it completely. If the pin of the drawer connector between the conveying unit and the main unit is dirty or deformed, clean or repair it.	
3	Checking duplex sensor 2	Duplex sensor 2 does not operate properly.	Turn duplex sensor 2 on and off manually and check the indication at U031 [DU2]. If duplex sensor 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
4	Checking duplex motor 2	Duplex motor 2 does not properly operate.	Execute U030 [DU2]. If duplex motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
5	Checking the drive parts	The drive from duplex motor 2 is not properly transmitted.	Check if duplex motor 2 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Duplex sensor 2 - Relay PWB • Duplex motor 2 - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
7	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4411/J4412/J4413/J4414/J4415/J4416/J4417/J4419: Duplex sensor 2 stay jam**

Duplex sensor 2 does not turn off after turning duplex sensor 1 on or off during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Opening and closing the conveying unit	The drawer connector connected to the conveying unit is not properly connected.	Open the conveying unit and close it completely. If the pin of the drawer connector between the conveying unit and the main unit is dirty or deformed, clean or repair it.	
3	Checking duplex sensor 2	Duplex sensor 2 does not operate properly.	Turn duplex sensor 2 on and off manually and check the indication at U031 [DU2]. If duplex sensor 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
4	Checking duplex motor 2	Duplex motor 2 does not properly operate.	Execute U030 [DU2]. If duplex motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
5	Checking the drive parts	The drive from duplex motor 2 is not properly transmitted.	Check if duplex motor 2 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Duplex sensor 2 - Relay PWB • Duplex motor 2 - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
7	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	

Step	Check description	Assumed cause	Measures	Reference
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

### J4418: Duplex sensor 2 stay jam

Duplex sensor 2 does not turn off after turning duplex sensor 1 off during paper feed from the duplex section.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Opening and closing the conveying unit	The drawer connector connected to the conveying unit is not properly connected.	Open the conveying unit and close it completely. If the pin of the drawer connector between the conveying unit and the main unit is dirty or deformed, clean or repair it.	
3	Checking duplex sensor 2	Duplex sensor 2 does not operate properly.	Turn duplex sensor 2 on and off manually and check the indication at U031 [DU2]. If duplex sensor 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
4	Checking duplex motor 2	Duplex motor 2 does not properly operate.	Execute U030 [DU2]. If duplex motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
5	Checking the drive parts	The drive from duplex motor 2 is not properly transmitted.	Check if duplex motor 2 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Duplex sensor 2 - Relay PWB • Duplex motor 2 - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
7	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB



J4601/J4602/J4603/J4604/J4605/J4606/J4607/J4608/J4409: Exit sensor non arrival jam

The exit sensor does not turn on after the fuser sensor turns on during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	
5	Checking the paper	The paper is wavy.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
6	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
7	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
8	Executing U161	The paper curls.	Lower the fuser temperature during the print at U161.	Executing U161
9	Checking the paper	The paper curls.	Replace the paper if it is damp. (Replace with long grain paper.)	
10	Checking the settings	The actual paper and the paper settings (media type, paper size) do not match.	Set the proper media type via the System Menu.	
11	Checking the connection	The connector of the exit unit is not properly connected.	Reconnect the connector of the exit unit.	Detaching and reattaching the exit unit
12	Checking the exit sensor	The Exit sensor does not properly operate.	Turn the exit sensor on and off by a hand and check the indication at U031 [Exit Feed]. If the exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031

Step	Check description	Assumed cause	Measures	Reference
13	Checking the feedshift solenoid	The feedshift solenoid does not operate properly.	Execute U033 [Branch Exit] to check the feedshift guide operation. If the guide does not properly operate, reattach the feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U033
14	Checking the exit motor	The exit motor does not properly operate.	Execute U030 [Exit(CW)]. If the exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
15	Checking the drive parts	The drive from the exit motor is not properly transmitted.	Check if the exit motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Exit sensor - Front PWB • Feedshift solenoid - Front PWB • Exit motor - Front PWB • Front PWB - Engine PWB	Wiring diagram
17	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

[J4611/J4612/J4613/J4614/J4615/J4616/J4617/J4618/J4619: Exit sensor stay jam](#)

The exit sensor does not turn off after the fuser sensor turns off during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	Checking the paper	The paper leading edge is bent.	Remove the bent paper.	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the paper	The paper is wavy.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
6	Checking the paper	Unspecified papers are used.	Explain to the user to use the paper within the specifications.	
7	Checking the paper	foreign objects are on the paper.	Remove the paper with foreign objects.	
8	Executing U161	The paper curls.	Lower the fuser temperature during the print at U161.	Executing U161
9	Checking the paper	The paper curls.	Replace the paper if it is damp. (Replace with long grain paper.)	
10	Checking the settings	The actual paper and the paper settings (media type, paper size) do not match.	Set the proper media type via the System Menu.	
11	Checking the connection	The connector of the exit unit is not properly connected.	Reconnect the connector of the exit unit.	Detaching and reattaching the exit unit
12	Checking the exit sensor	The Exit sensor does not properly operate.	Turn the exit sensor on and off by a hand and check the indication at U031 [Exit Feed]. If the exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
13	Checking the feedshift solenoid	The feedshift solenoid does not operate properly.	Execute U033 [Branch Exit] to check the feedshift guide operation. If the guide does not properly operate, reattach the feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U033
14	Checking the exit motor	The exit motor does not properly operate.	Execute U030 [Exit(CW)]. If the exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
15	Checking the drive parts	The drive from the exit motor is not properly transmitted.	Check if the exit motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
16	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• Exit sensor - Front PWB</li> <li>• Feedshift solenoid - Front PWB</li> <li>• Exit motor - Front PWB</li> <li>• Front PWB - Engine PWB</li> </ul>	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
17	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
18	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4701/J4702/J4703/J4704/J4705/J4706/J4707/J4708/J4709: Switchback sensor non arrival jam**

The switchback sensor does not turn on during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the feedshift guide	Foreign objects such as toner adhere on the feedshift guide	Clean the feedshift guide. Or replace it.	Detaching and reattaching the exit unit
6	Checking exit roller B	Exit roller B does not rotate.	If the drive gear is deformed, bushing is scraped, replace the exit roller B drive parts.	Detaching and reattaching the exit unit
7	Checking the switchback sensor	The switchback sensor does not properly operate.	Turn the switchback sensor on and off by a hand and check the indication at U031 [Exit Paper]. If the switchback sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking the feedshift solenoid	The feedshift solenoid does not operate properly.	Execute U033 [Branch Exit] to check the feedshift guide operation. If the guide does not properly operate, reattach the feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U033

Step	Check description	Assumed cause	Measures	Reference
9	Checking the switchback motor	The switchback motor does not properly operate.	Execute U030 [SB(CW)] or [SB(CCW)]. If the switchback motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
10	Checking the drive parts	The drive from the switchback motor is not properly transmitted.	Check if the switchback motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
11	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Switchback sensor - Front PWB • Feedshift solenoid - Front PWB • Switchback motor - Front PWB • Front PWB - Engine PWB	Wiring diagram
12	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4711/J4712/J4713/J4714/J4715/J4716/J4717/J4718/J4719: Switchback sensor stay jam**

The switchback sensor does not turn off after the fuser sensor turns off during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the feedshift guide	Foreign objects such as toner adhere on the feedshift guide	Clean the feedshift guide. Or replace it.	Detaching and reattaching the exit unit

Step	Check description	Assumed cause	Measures	Reference
6	Checking exit roller B	Exit roller B does not rotate.	If the drive gear is deformed, bushing is scraped, replace the exit roller B drive parts.	Detaching and reattaching the exit unit
7	Checking the switchback sensor	The switchback sensor does not properly operate.	Turn the switchback sensor on and off by a hand and check the indication at U031 [Exit Paper]. If the switchback sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking the feedshift solenoid	The feedshift solenoid does not operate properly.	Execute U033 [Branch Exit] to check the feedshift guide operation. If the guide does not properly operate, reattach the feedshift solenoid and reinsert the connector. If not repaired, replace it.	Executing U033
9	Checking the switchback motor	The switchback motor does not properly operate.	Execute U030 [SB(CW)] or [SB(CCW)]. If the switchback motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
10	Checking the drive parts	The drive from the switchback motor is not properly transmitted.	Check if the switchback motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
11	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Switchback sensor - Front PWB • Feedshift solenoid - Front PWB • Switchback motor - Front PWB • Front PWB - Engine PWB	
12	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
13	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J4901/J4902/J4903/J4904/J4905/J4906/J4907/J4908/J4909: BR conveying sensor 1 non arrival jam

BR conveying sensor 1 does not turn on after the exit sensor turns off during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the conveying guide	The foreign objects such as toner are on the conveying guide.	Clean the conveying guide. Or replace it.	
6	Checking the paper conveying roller	The paper conveying roller does not rotate.	If the drive gear is deformed, bushing is scraped, replace the conveying roller drive parts.	
7	Checking BR conveying sensor 1	BR conveying sensor 1 does not properly operate.	Turn BR conveying sensor 1 on and off by a hand and check the indication at U031 [Bridge1 Feed]. If BR conveying sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking the exit motor	The exit motor does not properly operate.	Execute U030 [Exit(CW)]. If the exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
9	Checking the drive parts	The drive from the exit motor is not properly transmitted.	Check if the exit motor smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • BR conveying sensor 1 - BR main PWB • BR main PWB - Engine PWB • Exit motor - Front PWB • Front PWB - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
11	Replacing the BR main PWB	The BR main PWB is faulty.	Replace the BR main PWB.	
12	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J4911/J4912/J4913/J4914/J4915/J4916/J4917/J4918/J4919: BR conveying sensor 1 stay jam**

BR conveying sensor 1 does not turn off after the exit sensor turns off during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the conveying guide	The foreign objects such as toner are on the conveying guide.	Clean the conveying guide. Or replace it.	
6	Checking the paper conveying roller	The paper conveying roller does not rotate.	If the drive gear is deformed, bushing is scraped, replace the conveying roller drive parts.	
7	Checking BR conveying sensor 1	BR conveying sensor 1 does not properly operate.	Turn BR conveying sensor 1 on and off by a hand and check the indication at U031 [Bridge1 Feed]. If BR conveying sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking BR conveying motor 1	BR conveying motor 1 does not properly operate.	Execute U030 [Bridge1]. If BR conveying motor 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
9	Checking the drive parts	The drive from BR conveying motor 1 is not properly transmitted.	Check if BR conveying motor 1 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	



Step	Check description	Assumed cause	Measures	Reference
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • BR conveying sensor 1 - BR main PWB • BR conveying motor 1 - BR main PWB • BR main PWB - Engine PWB	Wiring diagram
11	Replacing the BR main PWB	The BR main PWB is faulty.	Replace the BR main PWB.	
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J5001/J5002/J5003/J5004/J5005/J5006/J5007/J5008/J5009: BR conveying sensor 2 non arrival jam**

BR conveying sensor 2 does not turn on after BR conveying sensor 1 turns on during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the conveying guide	The foreign objects such as toner are on the conveying guide.	Clean the conveying guide. Or replace it.	
6	Checking the paper conveying roller	The paper conveying roller does not rotate.	If the drive gear is deformed, bushing is scraped, replace the conveying roller drive parts.	
7	Checking BR conveying sensor 2	BR conveying sensor 2 does not properly operate.	Turn BR conveying sensor 2 on and off by a hand and check the indication at U031 [Bridge2 Feed]. If BR conveying sensor 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031

Step	Check description	Assumed cause	Measures	Reference
8	Checking BR conveying motor 1	BR conveying motor 1 does not properly operate.	Execute U030 [Bridge1]. If BR conveying motor 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
9	Checking the drive parts	The drive from BR conveying motor 1 is not properly transmitted.	Check if BR conveying motor 1 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • BR conveying sensor 2 - BR main PWB • BR conveying motor 1 - BR main PWB • BR main PWB - Engine PWB	Wiring diagram
11	Replacing the BR main PWB	The BR main PWB is faulty.	Replace the BR main PWB.	
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J5011/J5012/J5013/J5014/J5015/J5016/J5017/J5018/J5019: BR conveying sensor 2 stay jam**

BR conveying sensor 2 does not turn off after BR conveying sensor 1 turns on during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the conveying guide	The foreign objects such as toner are on the conveying guide.	Clean the conveying guide. Or replace it.	
6	Checking the paper conveying roller	The paper conveying roller does not rotate.	If the drive gear is deformed, bushing is scraped, replace the conveying roller drive parts.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking BR conveying sensor 2	BR conveying sensor 2 does not properly operate.	Turn BR conveying sensor 2 on and off by a hand and check the indication at U031 [Bridge2 Feed]. If BR conveying sensor 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking BR conveying motor 1	BR conveying motor 1 does not properly operate.	Execute U030 [Bridge1]. If BR conveying motor 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
9	Checking the drive parts	The drive from BR conveying motor 1 is not properly transmitted.	Check if BR conveying motor 1 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • BR conveying sensor 2 - BR main PWB • BR conveying motor 1 - BR main PWB • BR main PWB - Engine PWB	Wiring diagram
11	Replacing the BR main PWB	The BR main PWB is faulty.	Replace the BR main PWB.	
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J5101/J5102/J5103/J5104/J5105/J5106/J5107/J5108/J5109: BR exit sensor non arrival jam**

The BR exit sensor does not turn on after BR conveying sensor 2 turns on during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	

Step	Check description	Assumed cause	Measures	Reference
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the conveying guide	The foreign objects such as toner are on the conveying guide.	Clean the conveying guide. Or replace it.	
6	Checking the paper conveying roller	The paper conveying roller does not rotate.	If the drive gear is deformed, bushing is scraped, replace the conveying roller drive parts.	
7	Checking the BR exit sensor	The BR exit sensor does not properly operate.	Turn the BR exit sensor on and off by a hand and check the indication at U031 [Bridge Exit]. If the BR exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking the BR conveying motor 2	BR conveying motor 2 does not properly operate.	Execute U030 [Bridge2]. If BR conveying motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
9	Checking the drive parts	The drive from BR conveying motor 2 is not properly transmitted.	Check if BR conveying motor 2 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • BR exit sensor - BR main PWB • BR conveying motor 2 - BR main PWB • BR main PWB - Engine PWB	Wiring diagram
11	Replacing the BR main PWB	The BR main PWB is faulty.	Replace the BR main PWB.	
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

J5111/J5112/J5113/J5114/J5115/J5116/J5117/J5118/J5119: BR exit sensor stay jam

The BR exit sensor does not turn off after BR conveying sensor 2 turns off during paper feed from cassette 1-7, the duplex section or the MP tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the parts in the exit unit	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	(When the paper skew occurs) Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
3	(When the paper skew occurs) Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
4	(When the paper skew occurs) Checking the conveying guide	The paper is caught with the conveying guide.	Reinstall the conveying guide. If there are burrs on the conveying surface of the conveying guide, remove them. If not repaired, replace it.	
5	Checking the eject guide	Foreign objects such as toner are on the eject guide.	Clean or replace the exit guide.	
6	Checking the eject roller	The eject roller does not rotate.	If the drive gear is deformed, bushing is scraped, replace exit roller drive parts.	Detaching and reattaching the exit unit
7	Checking the BR exit sensor	The BR exit sensor does not properly operate.	Turn the BR exit sensor on and off by a hand and check the indication at U031 [Bridge Exit]. If the BR exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U031
8	Checking the BR conveying motor 2	BR conveying motor 2 does not properly operate.	Execute U030 [Bridge2]. If BR conveying motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	U030 Execution
9	Checking the drive parts	The drive from BR conveying motor 2 is not properly transmitted.	Check if BR conveying motor 2 smoothly rotates by a hand. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
10	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. <ul style="list-style-type: none"> <li>• BR exit sensor - BR main PWB</li> <li>• BR conveying motor 2 - BR main PWB</li> <li>• BR main PWB - Engine PWB</li> </ul>	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
11	Replacing the BR main PWB	The BR main PWB is faulty.	Replace the BR main PWB.	
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J6000: DF paper entry failure jam**

**Object: 4000-sheet finisher**

Turning on of the DF paper entry sensor is detected before the paper eject from the main unit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The paper is caught with a piece of paper, etc.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	Checking the DF paper entry sensor	The DF paper entry sensor does not properly operate.	Turn the DF paper entry sensor on and off by a hand and check the indication at U241 [Finisher] > [HP]. If the DF paper entry sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

**J6020: DF front cover open jam**

**Object: 4000-sheet finisher**

The DF front cover open is detected during the DF operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DF front cover	The DF front cover is not aligned to the other exterior covers.	Check if the DF front cover is securely closed and reinstall if necessary. If the DF front cover is deformed, repair or replace it.	
2	Checking the DF front cover switch	The DF front cover switch does not operate properly.	Turn the DF front cover switch on and off manually and check the indication at U241 [Finisher] > [Front Cover]. If the DF front cover switch does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

J6050: BF tray open jam

Object: 4000-sheet finisher with the folding unit

The BF tray open is detected during the folding operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF tray	The BF tray does not operate properly.	Check if the BF tray is securely closed and reinstall if necessary. If the BF tray is deformed, repair or replace it.	
2	Checking the BF tray switch	The BF tray switch does not operate properly.	Turn the BF tray switch on and off manually and check the indication at U241 [Booklet] > [Tray]. If the BF tray switch does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

J6060: MB cover open jam

Object: 4000-sheet finisher with the mail box

The MB cover open is detected during the paper conveying to the Mail Box.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the MB cover	The MB cover is not aligned with the other exterior covers.	Check if the MB cover is securely closed and reinstall if necessary. If the MB cover is deformed, repair or replace it.	
2	Checking the MB cover switch	The MB cover switch does not operate properly.	Turn the MB cover switch on and off manually and check the indication at U241 [Mail Box] > [Cover]. If the MB cover switch does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

J6070: BF unit open jam

Object: 4000-sheet finisher with the folding unit

Detected BF unit open during holding job.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF set switch	The BF set switch does not operate properly.	Turn the BF set switch on and off manually and check the indication at U241 [Booklet] > [Set]. If the BF set switch does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

### J6080: BF left cover open jam

#### Object: 4000-sheet finisher with the folding unit

The BF left cover open is detected during the folding operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF left cover	The BF left cover is not aligned with the other exterior covers.	Check if the BF left cover securely turns the BF cover switch on and if the BF left cover is deformed, repair or replace it.	
2	Checking the BF left cover switch	The BF left cover switch does not operate properly.	Turn the BF left cover switch on and off manually and check the indication at U241 [Booklet] > [Left Guide]. If the BF left cover switch does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

### J6100: DF paper entry sensor non arrival jam

#### Object: 4000-sheet finisher

The DF paper entry sensor does not turn on when passing the certain time after BR conveying sensor 2 turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF paper entry sensor	The DF paper entry sensor does not properly operate.	Turn the DF paper entry sensor on and off by a hand and check the indication at U241 [Finisher] > [HP]. If the DF paper entry sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the DF paper entry motor	The DF paper entry motor does not properly operate.	Execute U240 [Motor] > [Feed In(H)] or [Feed In(L)]. If the DF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the DF paper entry motor is not properly transmitted.	Check if the DF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB



J6110: DF paper entry sensor stay jam

Object: 4000-sheet finisher

The DF paper entry sensor does not turn off after passing the certain time since it turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF paper entry sensor	The DF paper entry sensor does not properly operate.	Turn the DF paper entry sensor on and off by a hand and check the indication at U241 [Finisher] > [HP]. If the DF paper entry sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the DF paper entry motor	The DF paper entry motor does not properly operate.	Execute U240 [Motor] > [Feed In(H)] or [Feed In(L)]. If the DF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the DF paper entry motor is not properly transmitted.	Check if the DF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6200: DF sub eject sensor non-arrival jam

Object: 4000-sheet finisher

The DF sub eject sensor does not turn on after passing the certain time since the DF paper entry sensor turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF sub eject sensor	The DF sub exit sensor does not properly operate.	Turn the DF sub exit sensor on and off manually and check the indication at U241 [Finisher] > [Sub Tray Eject]. If the DF sub exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
3	Checking DF feedshift solenoid 3	DF feedshift solenoid 3 does not properly operate.	Execute U240 [Solenoid] > [Booklet]. If DF feedshift solenoid 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the DF paper entry motor	The DF paper entry motor does not properly operate.	Execute U240 [Motor] > [Feed In(H)] or [Feed In(L)]. If the DF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the DF paper entry motor is not properly transmitted.	Check if the DF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF eject motor	The DF exit motor does not properly operate.	Execute U240 [Motor] > [Eject(H)] or [Eject(L)]. If the DF exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
7	Checking the drive parts	The drive from the DF exit motor is not properly transmitted.	Check if the DF exit motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
8	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6210: DF sub eject sensor stay jam

Object: 4000-sheet finisher

The DF sub eject sensor does not turn off after passing the certain time since the DF sub eject sensor turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF sub eject sensor	The DF sub exit sensor does not properly operate.	Turn the DF sub exit sensor on and off manually and check the indication at U241 [Finisher] > [Sub Tray Eject]. If the DF sub exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
3	Checking DF feedshift solenoid 3	DF feedshift solenoid 3 does not properly operate.	Execute U240 [Solenoid] > [Booklet]. If DF feedshift solenoid 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the DF paper entry motor	The DF paper entry motor does not properly operate.	Execute U240 [Motor] > [Feed In(H)] or [Feed In(L)]. If the DF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the DF paper entry motor is not properly transmitted.	Check if the DF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF eject motor	The DF exit motor does not properly operate.	Execute U240 [Motor] > [Eject(H)] or [Eject(L)]. If the DF exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
7	Checking the drive parts	The drive from the DF exit motor is not properly transmitted.	Check if the DF exit motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
8	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6300: DF middle sensor non arrival jam

Object: 4000-sheet finisher

The DF middle sensor does not turn on after passing the certain time since the DF paper entry sensor turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the mechanical factor	The parts such as the roller or the guide are not properly attached, or they are dirty, deformed or worn down.	Perform the prior standard check items.	
2	Checking the DF middle sensor	The DF middle sensor does not properly operate.	Turn the DF middle sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray Eject]. If the DF middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
3	Checking DF feedshift solenoid 3	DF feedshift solenoid 3 does not properly operate.	Execute U240 [Solenoid] > [Booklet]. If DF feedshift solenoid 3 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the DF paper entry motor	The DF paper entry motor does not properly operate.	Execute U240 [Motor] > [Feed In(H)] or [Feed In(L)]. If the DF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the DF paper entry motor is not properly transmitted.	Check if the DF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF middle motor	The DF middle motor does not properly operate.	Execute U240 [Motor] > [Middle(H)] or [Middle(L)]. If the DF middle motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
7	Checking the drive parts	The drive from the DF middle motor is not properly transmitted.	Check if the DF middle motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
8	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6310: DF middle sensor stay jam

Object: 4000-sheet finisher

The DF middle sensor does not turn off after passing the certain time since it turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF middle sensor	The DF middle sensor does not properly operate.	Turn the DF middle sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray Eject]. If the DF middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
3	Checking the DF eject clutch	The DF exit clutch does not properly operate.	Reattach the DF exit clutch and reinsert the connector. If not repaired, replace it.	
4	Checking the DF eject motor	The DF exit motor does not properly operate.	Execute U240 [Motor] > [Eject(H)] or [Eject(L)]. If the DF exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the DF exit motor is not properly transmitted.	Check if the DF exit motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF middle motor	The DF middle motor does not properly operate.	Execute U240 [Motor] > [Middle(H)] or [Middle(L)]. If the DF middle motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
7	Checking the drive parts	The drive from the DF middle motor is not properly transmitted.	Check if the DF middle motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
8	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6400: DF exit sensor non arrival jam

Object: 4000-sheet finisher

The DF exit sensor does not turn on when passing the certain time after the DF middle sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF middle sensor	The DF middle sensor does not properly operate.	Turn the DF middle sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray Eject]. If the DF middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
3	Checking the DF exit sensor	The DF exit sensor does not properly operate.	Turn the DF exit sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray]. If the DF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
4	Checking the DF eject motor	The DF exit motor does not properly operate.	Execute U240 [Motor] > [Eject(H)] or [Eject(L)]. If the DF exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the DF exit motor is not properly transmitted.	Check if the DF exit motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF tray motor	The DF tray motor does not properly operate.	Execute U240 [Motor] > [Tray]. If the DF tray motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
7	Checking the drive parts	The drive from the DF tray motor is not properly transmitted.	Check if the DF tray motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
8	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6410: DF exit sensor stay jam

Object: 4000-sheet finisher

The DF exit sensor does not turn off when passing the certain time after the DF exit sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF exit sensor	The DF exit sensor does not properly operate.	Turn the DF exit sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray]. If the DF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
3	Checking the DF eject motor	The DF exit motor does not properly operate.	Execute U240 [Motor] > [Eject(H)] or [Eject(L)]. If the DF exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the DF exit motor is not properly transmitted.	Check if the DF exit motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the DF tray motor	The DF tray motor does not properly operate.	Execute U240 [Motor] > [Tray]. If the DF tray motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
6	Checking the drive parts	The drive from the DF tray motor is not properly transmitted.	Check if the DF tray motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
7	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6500: DF exit sensor non arrival jam when ejecting the paper bundle

Object: 4000-sheet finisher

The DF exit sensor does not turn on after passing the certain time since the DF middle sensor turns on when ejecting the paper bundle.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF middle sensor	The DF middle sensor does not properly operate.	Turn the DF middle sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray Eject]. If the DF middle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the DF exit sensor	The DF exit sensor does not properly operate.	Turn the DF exit sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray]. If the DF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
4	Checking the DF eject motor	The DF exit motor does not properly operate.	Execute U240 [Motor] > [Eject(H)] or [Eject(L)]. If the DF exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the DF exit motor is not properly transmitted.	Check if the DF exit motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF tray motor	The DF tray motor does not properly operate.	Execute U240 [Motor] > [Tray]. If the DF tray motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
7	Checking the drive parts	The drive from the DF tray motor is not properly transmitted.	Check if the DF tray motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
8	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6510: DF exit sensor stay jam when ejecting the paper bundle

Object: 4000-sheet finisher

The DF exit sensor does not turn off after the paper bundle ejection starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF exit sensor	The DF exit sensor does not properly operate.	Turn the DF exit sensor on and off manually and check the indication at U241 [Finisher] > [Middle Tray]. If the DF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the DF eject motor	The DF exit motor does not properly operate.	Execute U240 [Motor] > [Eject(H)] or [Eject(L)]. If the DF exit motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240



Step	Check description	Assumed cause	Measures	Reference
4	Checking the drive parts	The drive from the DF exit motor is not properly transmitted.	Check if the DF exit motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the DF tray motor	The DF tray motor does not properly operate.	Execute U240 [Motor] > [Tray]. If the DF tray motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
6	Checking the drive parts	The drive from the DF tray motor is not properly transmitted.	Check if the DF tray motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
7	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6600: DF drum sensor non-arrival jam

Object: 4000-sheet finisher

The DF drum sensor does not turn on after passing the certain time since the DF paper entry sensor turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF drum sensor	The DF drum sensor does not properly operate.	Turn the DF drum sensor on and off manually and check the indication at U241 [Finisher] > [Drum]. If the DF drum sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking DF feedshift solenoid 1	DF feedshift solenoid 1 does not properly operate.	Execute U240 [Solenoid] > [Sub Tray]. If DF feedshift solenoid 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the DF drum motor	The DF drum motor does not properly operate.	Execute U240 [Motor] > [Eject Conv(H)] or [Eject Conv(L)]. If the DF drum motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240

Step	Check description	Assumed cause	Measures	Reference
5	Checking the drive parts	The drive from the DF drum motor is not properly transmitted.	Check if the DF drum motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6610: DF drum sensor stay jam

Object: 4000-sheet finisher

The DF drum sensor does not turn off after passing the certain time since it turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF drum sensor	The DF drum sensor does not properly operate.	Turn the DF drum sensor on and off manually and check the indication at U241 [Finisher] > [Drum]. If the DF drum sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking DF feedshift solenoid 1	DF feedshift solenoid 1 does not properly operate.	Execute U240 [Solenoid] > [Sub Tray]. If DF feedshift solenoid 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the DF drum motor	The DF drum motor does not properly operate.	Execute U240 [Motor] > [Eject Conv(H)] or [Eject Conv(L)]. If the DF drum motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the DF drum motor is not properly transmitted.	Check if the DF drum motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6710: DF drum sensor stay jam during paper conveying into the BF unit

Object: 4000-sheet finisher with the folding unit

The DF drum sensor does not turn off after passing the certain time since it turned on when conveying the paper to the folding unit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the DF drum sensor	The DF drum sensor does not properly operate.	Turn the DF drum sensor on and off manually and check the indication at U241 [Finisher] > [Drum]. If the DF drum sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the DF retraction drum motor	The DF relief drum motor does not properly operate.	Execute U240 [Motor] > [Save(H)] or [Save(L)]. If the DF relief drum motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the DF relief drum motor is not properly transmitted.	Check if the DF relief drum motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the BF paper entry motor	The BF paper entry motor does not properly operate.	Execute U240 [Booklet] > [Feed In]. If the BF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
6	Checking the drive parts	The drive from the BF paper entry motor is not properly transmitted.	Check if the BF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
7	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
8	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J6810: Front DF side registration jam

Object: 4000-sheet finisher

DF side registration sensor 1 does not turn off after passing the certain time since DF side registration motor 1 turned on during the standby operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the front DF adjusting plate	The front DF adjusting plate is not properly attached, or it is dirty, deformed, or worn down.	Check if the DF front adjusting plate moves manually. Clean and reattach it if it does not move smoothly. If not repaired, replace the DF front adjusting plate.	
2	Checking DF side registration sensor 1	DF side registration sensor 1 does not properly operate.	Turn DF side registration sensor 1 on and off manually and check the indication at U241 [Finisher] > [Width Front HP]. If DF side registration sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking DF side registration motor 1	DF side registration motor 1 does not properly operate.	Execute U240 [Motor] > [Width Test(A3)] or [Width Test(LD)]. If DF side registration motor 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from DF side registration motor 1 is not properly transmitted.	Check manually if the DF side registration motor 1 smoothly rotates. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

### J6910: Rear DF side registration jam

#### Object: 4000-sheet finisher

DF side registration sensor 2 does not turn off after passing the certain time since DF side registration motor 2 turned on during the standby operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the rear DF adjusting plate	The rear DF adjusting plate is not properly attached, or it is dirty, deformed, or worn down.	Check if the DF rear adjusting plate moves manually. Clean and reattach it if it does not move smoothly. If not repaired, replace the DF rear adjusting plate.	
2	Checking DF side registration sensor 2	DF side registration sensor 2 does not properly operate.	Turn DF side registration sensor 2 on and off manually and check the indication at U241 [Finisher] > [Width Tail HP]. If DF side registration sensor 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking DF side registration motor 2	DF side registration motor 2 does not properly operate.	Execute U240 [Motor] > [Width Test(A3)] or [Width Test(LD)]. If DF side registration motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from DF side registration motor 2 is not properly transmitted.	Check if the DF side registration motor 2 smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

### J7000: DF staple jam

#### Object: 4000-sheet finisher

The DF staple home position cannot be detected after activating the DF staple motor. Or the motor lock-up was detected during the DF staple motor operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the staple	Check if the upper BF registration guide shifts manually, and reattach it if it does not smoothly shift.	Check if the lower BF registration guide shifts manually, and reattach it if it does not smoothly shift.	
2	Checking the DF staple motor	The DF staple motor does not properly operate.	Execute U240 [Motor] > [Staple]. If the DF staple motor does not properly rotate, reattach the DF staple unit and reinsert the connector. If not repaired, replace it.	Detaching and reattaching the staple unit

Step	Check description	Assumed cause	Measures	Reference
3	Checking the DF staple relay PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF staple relay PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	
4	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7100: BF paper entry sensor non-arrival jam

Object: 4000-sheet finisher with the folding unit

The BF paper entry sensor does not turn on after passing the certain time since the BF vertical conveying sensor turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the BF paper entry sensor	The BF paper entry sensor does not properly operate.	Turn the BF paper entry sensor on and off manually and check the indication at U241 [Booklet] > [HP]. If the BF paper entry sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the BF paper entry motor	The BF paper entry motor does not properly operate.	Execute U240 [Booklet] > [Feed In]. If the BF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the BF paper entry motor is not properly transmitted.	Check if the BF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7110: BF paper entry sensor stay jam

Object: 4000-sheet finisher with the folding unit

The BF paper entry sensor does not turn off after passing the certain time since the BF vertical conveying sensor turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the BF paper entry sensor	The BF paper entry sensor does not properly operate.	Turn the BF paper entry sensor on and off manually and check the indication at U241 [Booklet] > [HP]. If the BF paper entry sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the BF paper entry motor	The BF paper entry motor does not properly operate.	Execute U240 [Booklet] > [Feed In]. If the BF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the BF paper entry motor is not properly transmitted.	Check if the BF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7200: BF eject sensor non-arrival jam

Object: 4000-sheet finisher with the folding unit

The BF eject sensor does not turn on after passing the certain time since the center fold operation started.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the BF eject sensor	The BF exit sensor does not properly operate.	Turn the BF exit sensor on and off manually and check the indication at U241 [Booklet] > [Eject]. If the BF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the BF blade motor	The BF blade motor does not properly operate.	Execute U240 [Booklet] > [Blade]. If the BF blade motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the BF blade motor is not properly transmitted.	Check if the BF blade motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB



### J7210: BF eject sensor stay jam

#### Object: 4000-sheet finisher with the folding unit

The BF eject sensor does not turn off after passing the certain time since it turned on during the center fold operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF tray	The BF tray is not properly attached.	Remove the paper and reattach the BF tray.	
2	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
3	Checking the BF eject sensor	The BF exit sensor does not properly operate.	Turn the BF exit sensor on and off manually and check the indication at U241 [Booklet] > [Eject]. If the BF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
4	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

### J7300: BF eject sensor non-arrival jam at tri-folding

#### Object: 4000-sheet finisher with the folding unit

The BF eject sensor does not turn on after passing the certain time since starting the tri-fold operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the BF eject sensor	The BF exit sensor does not properly operate.	Turn the BF exit sensor on and off manually and check the indication at U241 [Booklet] > [Eject]. If the BF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the BF feedshift solenoid	The BF feedshift solenoid does not properly operate.	Execute U240 [Solenoid] > [Three Fold]. If the BF feedshift solenoid does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240

Step	Check description	Assumed cause	Measures	Reference
4	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7310: BF eject sensor stay jam at tri-folding

Object: 4000-sheet finisher with the folding unit

The BF eject sensor does not turn off after passing the certain time since it turned on during the tri-fold operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF tray	The BF tray is not properly attached.	Remove the paper and reattach the BF tray.	
2	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
3	Checking the BF eject sensor	The BF exit sensor does not properly operate.	Turn the BF exit sensor on and off manually and check the indication at U241 [Booklet] > [Eject]. If the BF exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
4	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7400: Upper BF side registration jam

Object: 4000-sheet finisher with the folding unit

After the upper BF side registration guide shifts in the BF side registration sensor 2 ON direction, the BF side registration sensor 2 does not turn on when passing the certain time.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the upper BF side registration guide	The upper BF side registration guide is not properly attached, or it is dirty, deformed, or worn down.	Check if the BF width adjustment upper guide moves manually and if not move smoothly, reinstall it.	
2	Checking BF side registration sensor 2	BF side registration sensor 2 does not properly operate.	Turn BF side registration sensor 2 on and off manually and check the indication at U241 [Booklet] > [Width Down HP]. If BF side registration sensor 2 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking BF side registration motor 2	BF side registration motor 2 does not properly operate.	Execute U240 [Booklet] > [Width Test(A3)] or [Width Test(LD)]. If BF side registration motor 2 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from BF side registration motor 2 is not properly transmitted.	Check if the BF side registration motor 2 smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7500: Lower BF side registration jam

Object: 4000-sheet finisher with the folding unit

After the lower BF side registration guide shifts in the BF side registration sensor 1 ON direction, the BF side registration sensor 1 does not turn on when passing the certain time.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the lower BF side registration guide	The BF width adjustment lower guide is not properly installed or it is dirty, deformed or worn down.	Check if the BF width adjustment lower guide moves manually and if not moving smoothly, reinstall it.	
2	Checking BF side registration sensor 1	BF side registration sensor 1 does not properly operate.	Turn BF side registration sensor 1 on and off manually and check the indication at U241 [Booklet] > [Width Up HP]. If BF side registration sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking BF side registration motor 1	BF side registration motor 1 does not properly operate.	Execute U240 [Booklet] > [Width Test(A3)] or [Width Test(LD)]. If BF side registration motor 1 does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from BF side registration motor 1 is not properly transmitted.	Check if BF side registration motor 1 smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

## J7600: BF staple jam

### Object: 4000-sheet finisher with the folding unit

The BF staple home position cannot be detected after activating the BF staple motor. Or the motor lock-up was detected during the BF staple motor operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the staple	Check if the upper BF registration guide shifts manually, and reattach it if it does not smoothly shift.	Check if the lower BF registration guide shifts manually, and reattach it if it does not smoothly shift.	
2	Checking the BF staple motor	The BF staple motor does not properly operate.	Execute U240 [Booklet] > [Staple]. If the BF staple motor does not properly operate, reattach the BF staple unit and reinsert the connector. If not repaired, replace it.	Executing U240
3	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
4	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

## J7700: BF vertical conveying sensor non-arrival jam

### Object: 4000-sheet finisher with the folding unit

The BF vertical conveying sensor does not turn on after passing the certain time since the eject signal from the main unit was received.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The roller, guide, etc. are not properly attached or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the BF vertical conveying sensor	The BF vertical conveying sensor does not properly operate.	Turn the BF vertical conveying sensor on and off manually and check the indication at U241 [Booklet] > [Vertical Feed]. If the BF vertical conveying sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the BF paper entry motor	The BF paper entry motor does not properly operate.	Execute U240 [Booklet] > [Feed In]. If the BF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240

Step	Check description	Assumed cause	Measures	Reference
4	Checking the drive parts	The drive from the BF paper entry motor is not properly transmitted.	Check if the BF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7710: BF vertical conveying sensor stay jam

Object: 4000-sheet finisher with the folding unit

The BF vertical conveying sensor does not turn on after passing the certain time since it turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper conveying parts	The parts such as the roller or the guide are not properly attached, or they are dirty, deformed or worn down.	Clean and correct the conveying parts such as the roller or the guide, and reattach them. If not repaired, replace them.	
2	Checking the BF vertical conveying sensor	The BF vertical conveying sensor does not properly operate.	Turn the BF vertical conveying sensor on and off manually and check the indication at U241 [Booklet] > [Vertical Feed]. If the BF vertical conveying sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the BF paper entry motor	The BF paper entry motor does not properly operate.	Execute U240 [Booklet] > [Feed In]. If the BF paper entry motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The drive from the BF paper entry motor is not properly transmitted.	Check if the BF paper entry motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the BF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the BF main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the BF main PWB.	
6	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7800: Mail Box ejection non-arrival jam

Object: 4000-sheet finisher with the mail box

MB tray eject sensor 1 does not turn on after passing the certain time since the paper is ejected from the main unit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the belt	The belt and related parts are not properly installed or they are dirty, deformed or worn down.	Execute U240 [Mail Box] > [Conv] to check the belt operation. If the belt does not properly operate, correct the belt and the neighboring parts such as the feedshift claw lever or the guide, etc. If not repaired, replace them.	Executing U240
2	Checking MB tray eject sensor 1	MB tray exit sensor 1 does not properly operate.	Turn MB tray exit sensor 1 on and off manually and check the indication at U241 [Mail Box] > [Eject]. If MB tray exit sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the MB home position sensor	The belt holding plate does not properly operate as the MB home position sensor does not properly operate.	Turn the MB home position sensor on and off manually and check the indication at U241 [Mail Box] > [Motor HP]. If the MB home position sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
4	Checking the MB conveying motor	The MB conveying motor does not properly operate.	Execute U240 [Mail Box] > [Conv]. If the MB conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the MB conveying motor is not properly transmitted.	Check if the MB conveying motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
6	Checking the MB main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the MB main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DF staple relay PWB.	
7	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7810: Mail Box eject stay jam

Object: 4000-sheet finisher with the mail box

MB tray exit sensor 1 does not turn off when passing the certain time after MB tray exit sensor 1 turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the belt	The belt and related parts are not properly installed or they are dirty, deformed or worn down.	Execute U240 [Mail Box] > [Conv] to check the belt operation. If the belt does not properly operate, correct the belt and the neighboring parts such as the feedshift claw lever or the guide, etc. If not repaired, replace them.	Executing U240
2	Checking the MB tray	The MB tray is not properly attached.	Reattach the MB tray.	
3	Checking MB tray eject sensor 1	MB tray exit sensor 1 does not properly operate.	Turn MB tray exit sensor 1 on and off manually and check the indication at U241 [Mail Box] > [Eject]. If MB tray exit sensor 1 does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
4	Checking the MB conveying motor	The MB conveying motor does not properly operate.	Execute U240 [Mail Box] > [Conv]. If the MB conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
5	Checking the drive parts	The drive from the MB conveying motor is not properly transmitted.	Check if the MB conveying motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	



Step	Check description	Assumed cause	Measures	Reference
6	Checking the MB main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the MB main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DF staple relay PWB.	
7	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

J7900: DF paddle jam

Object: 4000-sheet finisher

The DF paddle sensor does not turn on when passing 1s after the DF paddle motor starts up.

Step	Check description	Assumed cause	Measures	Reference
1	Removing the paper	The paper is jammed in the DF paddle.	Remove the jammed paper from the DF paddle.	
2	Checking the DF paddle sensor	The DF paddle sensor does not properly operate.	Turn the DF paddle sensor on and off manually and check the indication at U241 [Finisher] > [Lead Paddle]. If the DF paddle sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U241
3	Checking the DF paddle motor	The DF paddle motor does not properly operate.	Execute U240 [Motor] > [Beat]. If the DF paddle motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U240
4	Checking the drive parts	The DF paddle does not rotate due to the excessive load.	Check if the DF paddle motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
5	Checking the DF main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DF main PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved, replace the DF main PWB.	Detaching and reattaching the DF main PWB

### J7910: Adjusting pulley pressure release motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the adjusting pulley pressure release HP sensor is not detected when driving the adjusting pulley pressure release motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF adjusting pulley pressure release HP sensor - DF PWB</li> <li>DF adjusting pulley pressure release motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF adjusting pulley pressure release HP sensor	The DF adjusting pulley pressure release HP sensor does not operate properly.	Execute U241[Finisher] > [Match Coro HP] If the DF adjusting pulley pressure HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF adjusting release motor	The DF adjusting pulley pressure release motor does not operate properly.	Execute U240[Motor] > [Match Pressure] If the DF adjusting pulley pressure motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7911: Pull-in guide release motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the pull-in guide release HP sensor is not detected when driving the pull-in guide release motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF pull-in guide release HP sensor - DF PWB</li> <li>DF pull-in guide release motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the connection Checking the DF pull-in guide release HP sensor	The DF pull-in guide release HP sensor is not operated correctly.	Execute U241[Finisher] > [Rear Beat HP] If the DF pull-in guide release HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF pull-in guide release motor	The DF pull-in guide release motor is not operated correctly.	Execute U240[Motor] > [Beat] If the DF pull-in guide release motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

J7912: Pull-in pulley pressure release motor jam

Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the pull-in pulley pressure release motor is not detected when driving the pull-in pulley pressure release motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the power cord. <ul style="list-style-type: none"> <li>• DF pull-in release HP sensor - DF PWB</li> <li>• Pull-in pulley pressure release motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF pull-in release HP sensor	The DF adjusting pulley pressure release HP sensor does not operate properly.	Execute U241[Finisher] > [Pull Coro] If the DF adjusting pulley pressure HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	pull-in pulley pressure release motor	The DF adjusting pulley pressure release motor does not operate properly.	Execute U240[Motor] > [Pull Pressure] If the DF adjusting pulley pressure motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

J7913: Eject pressure release motor jam

Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the eject pressure release HP sensor is not detected when driving the eject pressure release motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>• DF eject pressure release HP sensor - DF PWB</li> <li>• DF eject pressure release motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF eject pressure release HP sensor	The DF eject pressure release HP sensor does not operate properly.	Execute U241[Finisher] > [Eject Press HP] If the DF adjusting pulley pressure HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF eject pressure release motor	The DF eject pressure release motor does not operate properly.	Execute U240[Motor] > [Eject Unlock (Full)] If the DF adjusting pulley pressure motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7914: Shift motor 1 jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the shift HP sensor 1 is not detected when driving the shift motor 1 for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF shift HP sensor 1 - DF PWB</li> <li>DF shift motor 1 - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF shift HP sensor 1	The DF shift HP sensor 1 does not operate properly.	Execute U241[Finisher] > [Shift Front HP] If the DF adjusting pulley pressure HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF shift motor 1	The DF shift motor 1 does not operate properly.	Execute U240[Motor] > [Sort Test] If the DF adjusting pulley pressure motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7915: Shift motor 2 jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the shift HP sensor 2 is not detected when driving the shift motor 1 for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF shift HP sensor 2 - DF PWB</li> <li>DF shift motor 2 - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF shift HP sensor 2	The DF shift HP sensor 2 does not operate properly.	Execute U241[Finisher] > [Shift Tail HP] If the DF adjusting pulley pressure HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF shift motor 2	The DF shift motor 2 does not operate properly.	Execute U240[Motor] > [Sort Test] If the DF adjusting pulley pressure motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7916: Shift release motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the DF shift release HP sensor is not detected when driving the DF shift release motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF shift release HP sensor - DF PWB</li> <li>DF shift release motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF shift release HP sensor	The DF shift release HP sensor does not operate properly.	Execute U241[Finisher] > [Shift Unlock HP] If the DF adjusting pulley pressure HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF shift release motor	The DF shift release motor does not operate properly.	Execute U240[Motor] > [Sort Test] If the DF adjusting pulley pressure motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7917: Side registration motor 1 jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the side registration HP sensor 1 is not detected when driving the side registration motor 1 for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF side registration HP sensor 1 - DF PWB</li> <li>DF side registration motor 1 - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF side registration HP sensor 1	DF side registration HP sensor 1 does not operate properly.	Execute U241[Finisher] > [Width Front HP] If DF side registration HP sensor 1 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF side registration motor 1	DF side registration motor 1 does not operate properly.	Execute U240[Motor] > [Width Test] If DF side registration motor 1 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7918: Side registration motor 2 jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the side registration HP sensor 2 is not detected when driving the side registration motor 2 for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF side registration HP sensor 2 - DF PWB</li> <li>DF side registration motor 2 - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF side registration HP sensor 2	DF side registration HP sensor 2 does not operate properly.	Execute U241[Finisher] > [Width Tail HP] If DF side registration HP sensor 2 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF side registration motor 2	DF side registration motor 2 does not operate properly.	Execute U240[Motor] > [Width Test] If DF side registration motor 2 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7919: Staple shift motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the staple shift HP sensor is not detected when driving the staple shift motor for 5s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>Staple shift HP sensor - DF PWB</li> <li>Staple shift motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF staple shift HP sensor	The DF staple shift HP sensor does not operate properly.	Execute U241[Finisher] > [Staple HP] If the DF staple shift HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF staple shift motor	The DF staple shift motor does not operate properly.	Execute U240[Motor] > [Staple Move] If the DF staple shift motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7920: DF staple motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- The home position cannot be detected when passing 600ms after the staple motor is started up.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the staple	Staples are jammed.	Remove jammed staples from the staple cartridge.	
2	Checking the drive components	The DF staple motor does not rotate due to heavy load.	Check if the DF staple motor rotates manually. Replace the DF staple unit if it does not rotate smoothly due to the damaged gear, etc.	
3	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF staple unit - DF staple relay PWB</li> <li>DF staple relay PWB - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
4	Replacing DF staple unit	DF staple unit is faulty.	Replace DF staple unit.	
5	Replacing DF staple relay PWB	DF staple relay PWB is faulty.	Replace DF staple relay PWB.	
6	Replacing DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7921: Bundle eject motor 1 jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the bundle eject HP sensor 1 is not detected when driving the bundle eject motor 1 for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>Bundle eject HP sensor 1 - DF PWB</li> <li>Bundle eject motor 1 - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF bundle eject HP sensor 1	The bundle eject HP sensor 1 does not operate properly.	Execute U241[Finisher] > [Bundle Eject HP1] If the DF bundle eject HP sensor 1 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF bundle eject motor 1	The bundle eject motor 1 does not operate properly.	Execute U240[Motor] > [Bundle Up] If the DF bundle eject motor 1 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB



### J7922: Bundle eject motor 2 jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the bundle eject HP sensor 2 is not detected when driving the bundle eject motor 2 for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>Bundle eject HP sensor 2 - DF PWB</li> <li>Bundle eject motor 2 - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF bundle eject HP sensor 2	The bundle eject HP sensor 2 does not operate properly.	Execute U241[Finisher] > [Bundle Eject HP1] If the DF bundle eject HP sensor 2 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF bundle eject motor 2	The DF exit motor 2 does not operate correctly.	Execute U240[Motor] > [Bundle Up] If the DF bundle eject motor 2 does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7923: Eject paddle motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the eject paddle HP sensor is not detected when driving the adjusting the eject paddle motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>Eject paddle HP sensor - DF PWB</li> <li>Eject paddle motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF eject paddle HP sensor	The DF eject paddle HP sensor does not operate properly.	Execute U241[Finisher] > [Eject Paddle HP] If the DF eject paddle HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF eject paddle motor 2	The DF eject paddle motor does not operate properly.	Execute U240[Motor] > [Tray Eject Paddle] If the DF eject paddle motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7924: Eject paper holding motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the eject paper holding HP sensor is not detected when driving the eject paper holding motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>Eject paper holding sensor - DF PWB</li> <li>Eject paper holding motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF eject paper holding sensor	The DF eject paper holding sensor does not operate properly.	Execute U241[Finisher] > [Eject Paddle HP] If the DF eject paper holding sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF eject paper holding motor	The DF eject paper holding motor does not operate properly.	Execute U240[Motor] > [Press Paper] If the DF eject paper holding motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

### J7925: Eject support guide motor jam

#### Object: 100-sheet staple finisher, 4000-sheet finisher

- Change of the eject support guide HP sensor is not detected when driving the eject support guide motor for 3s in the direction of the HP sensor change.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not connected properly, or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>Eject support guide HP sensor - DF PWB</li> <li>Eject support guide motor - DF PWB</li> </ul>	Service Manual - Section 8 'PWBs'
2	Checking the DF eject support guide HP sensor	The DF eject support guide HP sensor does not operate properly.	Execute U241[Finisher] > [Paper Guide HP] If the DF eject paddle HP sensor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
3	Checking the DF eject support guide motor	The DF eject support guide HP motor does not operate properly.	Execute U240[Motor] > [Eject Guide] If the DF eject support guide motor does not operate properly, reattach it and reconnect the connector. Replace it if not repaired.	Maintenance Mode List
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB

J7930: Required paper interval time data jam

Object: 100-sheet staple finisher

- Same paper ID is notified with required paper interval time command.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the power switch	The engine firmware does not operate properly	Remove a piece of paper from each conveying section and turn the power switch and the power switch off. After 5 seconds, turn on the power switch and the power switch.	Maintenance Mode List
2	Checking the connection	The finisher cable is not connected to the main unit properly.	Reconnect the finisher cable to the main unit.	
3	Firmware upgrade	The firmware does not operate properly	Upgrade the firmware to the latest version.	
4	DF PWB is faulty.	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB
5	Engine PWB is faulty.	Engine PWB is faulty.	Replace Engine PWB.	Detaching and reattaching the DF PWB

J7931: Main unit eject data jam 1

Object: 100-sheet staple finisher

- Main unit eject command is received before turning on print ready.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the power switch	The engine firmware does not operate properly	Remove a piece of paper from each conveying section and turn the power switch and the power switch off. After 5 seconds, turn on the power switch and the power switch.	Maintenance Mode List
2	Checking the connection	The finisher cable is not connected to the main unit properly.	Reconnect the finisher cable to the main unit.	
3	Firmware upgrade	The firmware does not operate properly	Upgrade the firmware to the latest version.	
4	Replacing DF PWB.	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB
5	Replacing Engine PWB.	Engine PWB is faulty.	Replace Engine PWB.	Detaching and reattaching the DF PWB

### J7932: Main unit eject data jam 2

#### Object: 100-sheet staple finisher

- Main unit eject command is received when other than during print operation, or during operation stop.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the power switch	The engine firmware does not operate properly	Remove a piece of paper from each conveying section and turn the power switch and the power switch off. After 5 seconds, turn on the power switch and the power switch.	Maintenance Mode List
2	Checking the connection	The finisher cable is not connected to the main unit properly.	Reconnect the finisher cable to the main unit.	
3	Firmware upgrade	The firmware does not operate properly	Upgrade the firmware to the latest version.	
4	Replacing DF PWB.	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB
5	Replacing Engine PWB.	Engine PWB is faulty.	Replace Engine PWB.	Detaching and reattaching the DF PWB

### J7933: Main unit eject data jam 3

#### Object: 100-sheet staple finisher

- No paper ID exists when receiving the main unit eject command.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the power switch	The engine firmware does not operate properly	Remove a piece of paper from each conveying section and turn the power switch and the power switch off. After 5 seconds, turn on the power switch and the power switch.	Maintenance Mode List
2	Checking the connection	The finisher cable is not connected to the main unit properly.	Reconnect the finisher cable to the main unit.	
3	Firmware upgrade	The firmware does not operate properly	Upgrade the firmware to the latest version.	
4	Replacing DF PWB.	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB
5	Replacing Engine PWB.	Engine PWB is faulty.	Replace Engine PWB.	Detaching and reattaching the DF PWB

J7934: Required paper interval time cancel data 1 jam

Object: 100-sheet staple finisher

- No paper ID exists when receiving required paper interval time cancel command.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the power switch	The engine firmware does not operate properly	Remove a piece of paper from each conveying section and turn the power switch and the power switch off. After 5 seconds, turn on the power switch and the power switch.	Maintenance Mode List
2	Checking the connection	The finisher cable is not connected to the main unit properly.	Reconnect the finisher cable to the main unit.	
3	Firmware upgrade	The firmware does not operate properly	Upgrade the firmware to the latest version.	
4	Replacing DF PWB.	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB
5	Replacing Engine PWB.	Engine PWB is faulty.	Replace Engine PWB.	Detaching and reattaching the DF PWB

J7935: Required paper interval time cancel data 2 jam

Object: 100-sheet staple finisher

- Paper ID is "during conveying" when receiving required paper interval time cancel command.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the power switch	The engine firmware does not operate properly	Remove a piece of paper from each conveying section and turn the power switch and the power switch off. After 5 seconds, turn on the power switch and the power switch.	Maintenance Mode List
2	Checking the connection	The finisher cable is not connected to the main unit properly.	Reconnect the finisher cable to the main unit.	
3	Firmware upgrade	The firmware does not operate properly	Upgrade the firmware to the latest version.	
4	Replacing DF PWB.	The DF PWB is faulty.	Replace the DF PWB.	Detaching and reattaching the DF PWB
5	Replacing Engine PWB.	Engine PWB is faulty.	Replace Engine PWB.	Detaching and reattaching the DF PWB

J9000: No original feed from the DP

Object: Document processor

The DP feed sensor does not turn on after the paper feed was retried.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
2	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
3	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
4	Checking the original	Foreign objects adhere on the original.	Remove the original with the foreign objects.	
5	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
6	Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If it is worn down, replace the DP feed belt.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
7	Checking the actuator and the spring	The actuator does not operate properly.	The actuator or the spring is deformed, or if not properly operate, replace it.	
8	Checking the DP feed sensor	The DP feed sensor does not properly operate.	Turn the DP feed sensor on and off manually and check the indication at U244 [Feed]. If the DP feed sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
9	Checking the DP feed motor	The DP feed motor does not properly operate.	Execute U243 [Feed Motor]. If the DP feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243

Step	Check description	Assumed cause	Measures	Reference
10	Checking the drive parts	The drive from the DP feed motor is not properly transmitted.	Check if the DP feed motor smoothly rotates manually. Then, clean and reattach the drive parts if necessary. If not repaired, replace them.	
11	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

**J9001: DP small size original jam**

**Object: Document processor**

Soon after the DP timing sensor turns on, the DP timing sensor turns off.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The original out of specification is fed.	Explain users to use the original within the specifications.	
2	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. Replace the wire when it has no continuity. • DP main PWB - Engine PWB	Wiring diagram
3	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and Reattaching the DP main PWB
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**J9002: Paper jam detected when starting the paper conveying**

**Object: Document processor**

When starting conveying, an unspecified DP conveying related sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Specifying the sensor	(Specify the sensor turning on)	Specify the sensor which is indicating ON at U244. (Go to the next step.)	Executing U244
2	Checking the paper path	The foreign objects such as a piece of paper are on the paper path.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the sensor	The sensor does not properly operate.	Clean and reattach the sensor specified as faulty at U244, and reconnect the connector. If not repaired, replace it.	
4	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9005: No original feed from the DP

Object: Document processor

The DP lift upper limit sensor does not turn on when passing the certain pulse when the DP original feed lift plate lifts up.

Step	Check description	Assumed cause	Measures	Reference
1	(When the original feed lift plate does not lift up) Checking the original feed lift plate	The original feed lift plate is not properly installed.	Reinstall the original feed lift plate.	
2	(When the original feed lift plate does not lift up) Checking the DP lift motor	The DF lift motor does not operate properly.	Execute U243 [Lift Motor]. If the DP lift motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
3	(When the original feed lift plate does not lift up) Checking the DP original detection sensor	The DP original detection sensor does not properly operate.	Turn the DP original detection sensor on and off manually and check the indication at U244 [Set]. If the DP original detection sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
4	Checking the original	The original is not set properly.	Insert the original all the way and align the original width guides to the original.	
5	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
6	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
7	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
8	Checking the actuator	The actuator does not operate properly.	If the actuator does not properly operate, reattach it. If not repaired, replace the actuator.	



Step	Check description	Assumed cause	Measures	Reference
9	Checking the DP lift upper limit sensor	The DP lift upper limit sensor does not properly operate.	Turn the DP lift upper limit sensor on and off manually and check the indication at U244 [Lift U-Limit]. If the DP lift upper limit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
10	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

**J9008: No original feed from the DP (Original is B6 size or smaller)**

**Object: Document processor**

The DP backside timing sensor does not turn on when passing the certain pulse after the original feeding starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the original is skewed) Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If worn down, replace it.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
3	Checking the original	The original is not set properly.	Insert the original all the way and align the original width guides to the original.	
4	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
5	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
6	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
8	Checking the actuator	The actuator does not operate properly.	If the actuator does not properly operate, reattach it. If not repaired, replace the actuator.	

Step	Check description	Assumed cause	Measures	Reference
9	Checking the DP backside timing sensor	The DP backside timing sensor does not properly operate.	Turn the DP backside timing sensor on and off manually and check the indication at U244 [CIS Head]. If the DP backside timing sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
8	Checking the DP feed motor	The DP feed motor does not properly operate.	Execute U243 [Feed Motor]. If the DP feed motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
9	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9009: DP original jam caused by the image scanning

Object: Document processor

The next original is in standby of the secondary paper feed during the image scanning.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The controller does not activate properly.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
2	Firmware upgrade	The firmware does not properly activate.	Upgrade the firmware to the latest version.	Firmware Update
3	Checking the DP relay cable	The image data transmission processing failed due to the DP relay cable connection failure.	Reconnect the DP relay cable.	
4	Executing [Memory Diagnostics]	The memory in the main PWB is faulty.	Execute [Memory diagnosis] in System menu --> Adjustment / Maintenance.	

### J9010: Document processor open detection

#### Object: Document processor

The document processor open is detected during the original conveying.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DP	Document processor is not properly installed or it is faulty.	Check if the document processor is securely closed and reinstall it if necessary. If the document processor cover is deformed, repair or replace it.	
2	Checking the DP opening/closing sensor	The DP opening/closing sensor does not operate properly.	Turn the DP open/close sensor on and off manually and check the display at U244 [Open]. If the DP open/close sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244

### J9011: DP top cover open detection

#### Object: Document processor

The DP top cover open is detected during the original conveying.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DP top cover	The DP top cover is faulty.	Check if the DP top cover is securely closed and reinstall if necessary. If the DP top cover is deformed, repair or replace it.	
2	Checking the DP top cover switch	The DP top cover switch does not properly operate.	Turn the DP top cover switch on and off manually and check the indication at U244 [Cover Open]. If the DP top cover switch does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244

### J9020: Original skew jam

#### Object: Document processor

The DP multi-feeding sensors do not turn on when passing the certain time after the DP feed sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
2	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
3	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
4	Checking the original	The originals are stapled or the foreign objects are adhered.	Remove the staple. Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	

Step	Check description	Assumed cause	Measures	Reference
5	(When the original is skewed) Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If it is worn down, replace the DP feed belt.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
6	(When the original is skewed) Relocating the original width guides	The location of the original width guides and the original size are mismatched.	Align the original width guides to the original size.	
7	(When the original is skewed) Checking the DP feed belt	The original is hooked with the DP feed guide.	Reattach the DP feed guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	
8	The DP backside timing sensor does not turn off after passing the certain pulse since the DP feed sensor turns off.	The DP multi-feeding sensors do not properly operate.	Reattach the DP multi-feeding sensor (emitter) or the DP multi-feeding sensor (receiver) and reinsert the connector. If not repaired, replace the sensor.	
9	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9030: Original multi-feeding jam

Object: Document processor

The DP timing sensor does not turn on after passing the certain pulse since the DP feed sensor or the DP registration sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	Originals sticking with each other are used	Firmly fan the originals before loading.	
2	Checking the original	The original out of specification is used as below.1. Pasted originals2. Originals of multi-layers paper such as Japanese paper3. Cut and pasted originals	Explain users to use the original within the specifications.	
3	The DP timing sensor does not turn off after passing the certain pulse since the DP feed sensor or the DP registration sensor turns off.	In case of installing in a high altitude location with low atmospheric pressure, wrong detection might occur depending on the type of the originals.	Execute U460 [DP] /> [Conveying Sensor] /> [Execute] (Calibration).	The DP timing sensor does not turn off after passing the certain pulse since the DP feed sensor or the DP registration sensor turns off.

Step	Check description	Assumed cause	Measures	Reference
4	The DP backside timing sensor does not turn off after passing the certain pulse since the DP feed sensor turns off.	The DP multi-feeding sensors do not properly operate.	Reattach the DP multi-feeding sensor (emitter) or the DP multi-feeding sensor (receiver) and reinsert the connector. If not repaired, replace the sensor.	
5	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9110: DP feed sensor multi-feeding jam

Object: Document processor

The DP exit sensor does not turn on when passing the certain pulse after the DP timing sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
2	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
3	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
4	Checking the original	Foreign objects adhere on the original.	Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	
5	(When the original is skewed) Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If it is worn down, replace the DP feed belt.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
6	(When the original is skewed) Relocating the original width guides	The location of the original width guides and the original size are mismatched.	Align the original width guides to the original size.	
7	(When the original is skewed) Checking the DP feed belt	The original is hooked with the DP feed guide.	Reattach the DP feed guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
8	Checking the DP feed sensor	The DP feed sensor does not properly operate.	Turn the DP feed sensor on and off manually and check the indication at U244 [Feed]. If the DP feed sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
9	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9300: DP backside timing sensor non arrival jam

Object: Document processor

The DP backside timing sensor does not turn on when passing the certain pulse after the DP feed sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the original is skewed) Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If worn down, replace it.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
3	(When the original is skewed) Relocating the original width guides	The location of the original width guides and the original size are mismatched.	Align the original width guides to the original size.	
4	(When the original is skewed) Checking the conveying guide	The original is hooked with the DP conveying guide.	Reattach the DP conveying guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	
5	(When the original conveying delays) Checking the DP conveying roller	The paper conveying performance of the DP conveying roller is insufficient.	Clean the DP conveying roller surface. If worn down, replace it.	
6	(When the original conveying delays) Checking the DP top cover	The DP top cover is deformed.	Check if the DP top cover is securely closed. If it cannot be closed due to deformation, replace it.	
7	Checking the original	The leading edge of the original is folded.	Remove the folded original.	

Step	Check description	Assumed cause	Measures	Reference
8	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
10	Checking the original	Foreign objects adhere on the original.	Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	
11	Checking the DP backside timing sensor	The DP backside timing sensor does not properly operate.	Turn the DP backside timing sensor on and off manually and check the indication at U244 [CIS Head]. If the DP backside timing sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
12	Checking the DP conveying motor	The DP conveying motor does not properly operate.	Execute U243 [Conv Motor]. If the DP conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
13	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9310: DP backside timing sensor stay jam

Object: Document processor

The DP backside timing sensor does not turn off when passing the certain pulse after the DP feed sensor turns off.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the original is skewed) Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If worn down, replace it.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
3	(When the original is skewed) Relocating the original width guides	The location of the original width guides and the original size are mismatched.	Align the original width guides to the original size.	

Step	Check description	Assumed cause	Measures	Reference
4	(When the original is skewed) Checking the conveying guide	The original is hooked with the DP conveying guide.	Reattach the DP conveying guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	
5	(When the original conveying delays) Checking the DP conveying roller	The paper conveying performance of the DP conveying roller is insufficient.	Clean the DP conveying roller surface. If worn down, replace it.	
6	(When the original conveying delays) Checking the DP top cover	The DP top cover is deformed.	Check if the DP top cover is securely closed. If it cannot be closed due to the deformation, replace it.	
7	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
8	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
10	Checking the original	Foreign objects adhere on the original.	Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	
11	Checking the DP backside timing sensor	The DP backside timing sensor does not properly operate.	Turn the DP backside timing sensor on and off manually and check the indication at U244 [CIS Head]. If the DP backside timing sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
12	Checking the DP conveying motor	The DP conveying motor does not properly operate.	Execute U243 [Conv Motor]. If the DP conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
13	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB



J9400: DP timing sensor non-arrival jam

Object: Document processor

The DP timing sensor does not turn on when passing the certain pulse after the DP feed sensor or the DP registration sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the original is skewed) Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If it is worn down, replace the DP feed belt.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
3	(When the original is skewed) Relocating the original width guides	The location of the original width guides and the original size are mismatched.	Align the original width guides to the original size.	
4	(When the original is skewed) Checking the conveying guide	The original is hooked with the DP conveying guide.	Reattach the DP conveying guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	
5	(When the original conveying delays) Checking the DP conveying roller	The paper conveying performance of the DP conveying roller is insufficient.	Clean the DP conveying roller surface. If worn down, replace it.	
6	(When the original conveying delays) Checking the DP top cover	The DP top cover is deformed.	Check if the DP top cover is securely closed. If it cannot be closed due to the deformation, replace it.	
7	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
8	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
10	Checking the original	Foreign objects adhere on the original.	Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	

Step	Check description	Assumed cause	Measures	Reference
11	Checking the DP timing sensor	The DP timing sensor does not properly operate.	Turn the DP timing sensor on and off manually and check the indication at U244 [Timing]. If the DP timing sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
12	Checking the DP conveying motor	The DP conveying motor does not properly operate.	Execute U243 [Conv Motor]. If the DP conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
13	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9410: DP timing sensor stay jam

Object: Document processor

The DP timing sensor does not turn off when passing the certain pulse after the DP feed sensor or the DP registration sensor turns off.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the original is skewed) Checking the DP feed belt	The paper conveying performance of the DP feed belt is not enough.	Clean the DP feed belt surface. If it is worn down, replace the DP feed belt.	Detaching and reattaching the DP forwarding pulley and the DP feed belt
3	(When the original is skewed) Relocating the original width guides	The location of the original width guides and the original size are mismatched.	Align the original width guides to the original size.	
4	(When the original is skewed) Checking the conveying guide	The original is hooked with the DP conveying guide.	Reattach the DP conveying guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	
5	(When the original conveying delays) Checking the DP conveying roller	The paper conveying performance of the DP conveying roller is insufficient.	Clean the DP conveying roller surface. If worn down, replace it.	

Step	Check description	Assumed cause	Measures	Reference
6	(When the original conveying delays) Checking the DP top cover	The DP top cover is deformed.	Check if the DP top cover is securely closed. If it cannot be closed due to the deformation, replace it.	
7	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
8	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
9	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
10	Checking the original	Foreign objects adhere on the original.	Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	
11	Checking the DP timing sensor	The DP timing sensor does not properly operate.	Turn the DP timing sensor on and off manually and check the indication at U244 [Timing]. If the DP timing sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
12	Checking the DP conveying motor	The DP conveying motor does not properly operate.	Execute U243 [Conv Motor]. If the DP conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
13	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9600: DP eject sensor non-arrival jam

Object: Document processor

The DP exit sensor does not turn on when passing the certain pulse after the DP timing sensor turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the original is skewed) Checking the conveying guide	The original is hooked with the DP conveying guide.	Reattach the DP conveying guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	

Step	Check description	Assumed cause	Measures	Reference
3	(When the original conveying delays) Checking the DP conveying roller	The paper conveying performance of the DP conveying roller is insufficient.	Clean the DP conveying roller surface. If worn down, replace it.	
4	(When the original conveying delays) Adjusting the DP hinge height	The height of the DP hinges is improper.	Adjust the height of the DP hinges.	
5	(When the original conveying delays) Checking the document processor	The document processor does not properly open or close.	Check if the document processor is securely closed. If it cannot be closed due to the DP frame deformation, replace the document processor.	
6	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
7	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
8	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
9	Checking the original	Foreign objects adhere on the original.	Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	
10	Checking the DP eject sensor	The DP exit sensor does not properly operate.	Turn the DP exit sensor on and off manually and check the indication at U244 [Eject]. If the DP exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244
11	Checking the DP conveying motor	The DP conveying motor does not properly operate.	Execute U243 [Conv Motor]. If the DP conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
12	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

J9610: DP eject sensor stay jam

Object: Document processor

The DP exit sensor does not turn off wen passing the certain pulse after the DP timing sensor turns off.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper path	The original is caught up by a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
2	(When the original is skewed) Checking the conveying guide	The original is hooked with the DP conveying guide.	Reattach the DP conveying guide. If there is a burr on the paper conveying face of the guide, remove it. If not repaired, replace it.	
3	(When the original conveying delays) Checking the DP eject roller	The paper conveying force of the DP eject roller is insufficient.	Clean the DP eject roller surface. If worn down, replace it.	
4	(When the original conveying delays) Adjusting the DP hinge height	The height of the DP hinges is improper.	Adjust the height of the DP hinges.	
5	(When the original conveying delays) Checking the document processor	The document processor does not properly open or close.	Check if the document processor is securely closed. If it cannot be closed due to the DP frame deformation, replace the document processor.	
6	Checking the original	The leading edge of the original is folded.	Remove the folded original.	
7	Checking the original	The original gets curled downward or waved.	Fix or replace paper. If it is difficult to replace, relocate the leading edge with the trailing edge of the paper to feed or turn over the paper, and reinstall it.	
8	Checking the original	The original out of specification is used.	Explain users to use the original within the specifications.	
9	Checking the original	Foreign objects adhere on the original.	Remove the foreign objects on the original. If it is not possible to remove the foreign objects completely, remove the original.	
10	Checking the DP eject sensor	The DP exit sensor does not properly operate.	Turn the DP exit sensor on and off manually and check the indication at U244 [Eject]. If the DP exit sensor does not properly operate, clean and reattach it and reinsert the connector. If not repaired, replace it.	Executing U244

Step	Check description	Assumed cause	Measures	Reference
11	Checking the DP conveying motor	The DP conveying motor does not properly operate.	Execute U243 [Conv Motor]. If the DP conveying motor does not properly operate, reattach it and reinsert the connector. If not repaired, replace it.	Executing U243
12	Checking the DP main PWB	The connector is not properly connected or the wire or PBW is faulty.	Reconnect all the connector to the DP main PWB. Then, fix or replace the wires if they are pinched by other part or if they have any damage. When the issue is not resolved, replace the DP main PWB.	Detaching and Reattaching the DP main PWB

Object: Paper creases

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The paper curls due to moisture.	Reload paper upside down. Or, replace paper.	
2	Cleaning the transfer separation section	The area of surrounding the transfer separation section are dirty with the paper dust, etc.	Clean the discharge sheet and paper conveying route.	
3	Cleaning / replacing the transfer rear guide.	The transfer trailing guide is dirty.	Clean the transfer rear guide with the discharge sheet. If the dirt cannot be removed, replace it.	
4	Removing foreign material	Paper is caught by foreign material such as a piece of paper.	A piece of paper or the foreign objects are adhered on the conveying path, or if the parts such as the guide or the actuator has burrs, remove them.	
5	Resetting the paper width guides or the paper size guide.	Paper skews as the setting position of the paper width guides or the paper size guide does not match the paper size.	Reset the paper width guides or the paper size guide matching the paper size.	
6	Checking the conveying section	The roller or pulley at the conveying section is not properly attached or they are dirty.	Check if the middle roller, middle pulley, registration left roller and registration right roller are properly attached and reattach if necessary. And if they are dirty by toner or paper dust, etc., clean them.	
7	Opening and closing the conveying unit	The conveying unit is not closed completely.	Pull the conveying unit out, and reclose it firmly.	

Step	Check description	Assumed cause	Measures	Reference
8	Checking the fuser unit	The fuser belt is dirty or the fuser unit is not properly installed.	Clean the fuser belt. Then, fix the fuser unit securely with the screw. If not repaired, replace it.	Detaching and Reattaching the fuser unit
9	Setting the cassette heater	The paper is damp.	[Cassette heater standard model] Connect the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal it to prevent moisture.[Cassette heater optional model] Install the cassette heater and set U327 if necessary. Also, ask users to store paper in a dry place. Put the dry paper into the plastic bag and seal it to prevent moisture.	Installing the cassette heater

## 7 - 3 Self Diagnostic

If the part causing the problem was not supplied, use the unit including the part for replacement.

\* Before attempting to check the fuser unit and the low voltage power supply PWB, be sure to turn the power switch off and unplug the machine from power. (Allow at least 5 s before starting to conduct service until the capacitors on the circuit boards have been completely discharged.)

### (1)Self diagnostic error codes

Error code	Contents
C0030	FAX PWB system error
C0070	FAX PWB incompatible detection error
C0100	Backup memory device error
C0120	MAC address data error
C0130	Backup memory read / write error
C0150	Engine EEPROM reading / writing error
C0160	Engine PWB EEPROM data error
C0170	Charger count error
C0180	Machine serial number mismatch
C0350	Panel PWB communication error (Electronic volume I2C communication error)
C0360	Engine CPU - Feed ASIC communication error
C0630	DMA error
C0640	Hard Disk error
C0650	FAX image storage pair-check error
C0660	Hard Disk encryption key error
C0670	Hard Disk overwriting error
C0680	SSD error
C0800	Image processing error
C0830	FAX PWB flash program area checksum error
C0840	RTC error ("Time for maintenance T" appears)
C0870	PC FAX Image data transmission error
C0920	FAX file system error
C0950	FAX job stay error
C0980	24V power interruption detection
C1000	MP lift motor error
C1010	Lift motor 1 error
C1020	Lift motor 2 error
C1050	PF lift motor error
C1060	PF lift motor 1 error
C1070	PF lift motor 2 error
C1100	PF lift motor 1 error
C1110	PF lift motor 2 error



Error code	Contents
C1140	PF lift motor error
C1250	PF multi-feeding sensor communication error
C1350	PF multi-feeding sensor error
C1410	Rotary decurler error
C1450	PF multi-feeding sensor backup error (Side Multi Feeder)
C1800	Main unit large capacity feeder communication error
C1800	Paper Feeder communication error
C1800	Large capacity feeder communication error
C1810	Side Multi Feeder communication error
C1820	Side Feeder communication error
C1900	Main unit large capacity feeder EEPROM error
C1900	Paper Feeder EEPROM error
C1900	Large capacity feeder EEPROM error
C1910	Side Multi Feeder EEPROM error
C1920	Side Feeder EEPROM error
C2101	Developer motor error
C2201	Drum motor steady-state error
C2211	Drum motor startup error
C2300	Fuser motor error
C2550	Transfer motor error
C2610	PF feed motor error (Large Capacity Feeder in the main unit)
C2640	PF feed motor error (Side Feeder)
C2650	PF feed motor error (Side Multi Feeder)
C2660	PF feed motor error (Large Capacity Feeder)
C2670	PF feed motor error (Paper Feeder)
C2810	Waste toner collection motor error
C3100	Carriage error
C3200	LED lamp startup error
C3210	CIS lamp error
C3300	CCD AGC error
C3310	CIS AGC error
C3500	Communication error between the scanner and the ASIC
C3600	Scanner sequence error
C3800	AFE error
C3900	Scanner backup memory read / write error (Engine EEPROM)
C4001	Polygon motor synchronization error
C4101	BD initialization error

Error code	Contents
C4201	BD steady-state error
C5101	Main high-voltage error
C6000	IH heating error 1
C6020	Fuser center thermistor high temperature error
C6030	Fuser center thermistor broken
C6040	Fuser heater error
C6050	Fuser center thermistor low temperature error
C6100	Fuser heater broken
C6120	Fuser press thermistor high temperature error
C6130	Fuser press thermistor broken
C6150	Fuser press thermistor low temperature error
C6200	Fuser IH ends heating error
C6220	Fuser edge thermistor high temperature error
C6230	Fuser edge thermistor broken
C6250	Fuser edge thermistor low temperature error
C6320	Fuser A3 thermistor high temperature error
C6330	Fuser A3 thermistor broken
C6410	Fuser unit type mismatch error
C6600	Fuser belt rotation error
C6610	Fuser release sensor error
C6620	IH core motor rotation error
C6740	IH PWB high temperature error
C6760	Fuser IH input excessive electric current error
C6770	IH low power error
C6910	Engine firmware unexpected error
C6920	IH core fan motor error
C6930	Rear fuser fan motor error
C6950	IH PWB communication error
C6980	Fuser unit EEPROM error
C7001	Toner motor error
C7101	Toner sensor error
C7221	LSU thermistor broken
C7231	LSU thermistor short-circuited
C7241	Developer thermistor broken
C7251	Developer thermistor short-circuited
C7301	Toner hopper motor error
C7401	Developer unit type mismatch error

Error code	Contents
C7411	Drum unit type mismatch error
C7460	Developer shutter error
C7470	Toner collection fan motor 1 error
C7480	Toner collection fan motor 2 error
C7602	ID sensor error
C7800	Outer thermistor broken
C7850	Power source fan motor error
C7901	Drum unit EEPROM error
C7911	Developer unit EEPROM error
C7941	LSU EEPROM error
C8010	Punch motor error 1
C8020	Punch motor error 2
C8030	Punch motor error 3
C8090	DF paddle motor error
C8100	DF eject release motor error
C8110	DF shift motor 1 error
C8120	DF shift motor 2 error
C8130	DF shift release motor error
C8140	Main tray error 1
C8150	Main tray error 2
C8160	DF tray motor error 3
C8170	DF side registration motor 1 error 1
C8180	DF side registration motor 1 error 2
C8190	DF side registration motor 2 error 1
C8200	DF side registration motor 2 error 2
C8210	DF staple motor front/rear error
C8230	DF staple motor error
C8260	DF middle motor HP detection error
C8300	Main program error / Folding unit communication error
C8310	BF side registration motor 2 error
C8320	BF adjustment motor error
C8330	BF blade motor error
C8340	BF staple motor error 1
C8350	BF side registration motor 1 error
C8360	BF main motor error
C8370	BF staple motor error 2
C8410	Punch slide motor error 1

Error code	Contents
C8420	Punch slide motor error 2
C8430	Main program error (Punch unit) / Punch unit communication error
C8500	Main program error (Mail Box) / Mail Box communication error
C8510	MB conveying motor error 1
C8520	MB conveying motor error 2
C8600	DF adjust pulley pressure release motor error
C8610	Pull in guide release motor error
C8620	Pull in pulley pressure release motor error
C8630	Exit pressure release motor error
C8640	Width adjust front motor error
C8650	Width adjust rear motor error
C8700	Bundle exit 1 motor error
C8710	Bundle exit 2 motor error
C8720	DF A exit paddle motor error
C8730	DF A exit paper trail edge press motor error
C8740	DF exit support guide motor error
C8800	Main program error (DF) / Engine - DF communication error
C8900	DF backup error
C8930	BF unit backup error
C9000	Main program error (DP) / Document Processor communication error
C9040	DP lift motor ascend error
C9050	DP lift motor descend error
C9060	DP EEPROM error
C9070	DP - SHD communication error
C9080	LED failure detection
C9200	DP multi-feeding sensor communication error
C9210	DP multi-feeding sensor communication error
C9220	DP multi-feeding sensor backup error
C9500	Image processing circuit error (Scanner)
C9510	Image processing circuit error (DP)
C9540	Backup data error

## (2)Content of Self Diagnostic

### C0030: FAX PWB system error

The FAX processing cannot be continued due to the FAX firmware error.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The FAX PWB does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
3	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

### C0070: FAX PWB incompatible detection error

Abnormal detection of FAX control PWB incompatibility in the initial communication with the FAX control PWB, any normal communication command is not transmitted.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FAX PWB	The incompatible FAX PWB is installed.	Install the FAX PWB for the applicable model.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
3	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

### C0100: Backup memory device error

An abnormal status is output from the flash memory.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The flash memory does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the main PWB	The main PWB is faulty.	Reinsert all the connectors on the main PWB. If the wire is pinched by other parts or it is damaged, repair or replace the wire. If not repaired, replace the main PWB.	Detaching and reattaching the main PWB

### C0120: MAC address data error

The MAC address data is incorrect.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The flash memory does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the MAC address	The MAC address is incorrect.	Replace the main PWB when the MAC address is not indicated on the network status page.	Detaching and reattaching the main PWB

### C0130: Backup memory read / write error

The reading or writing into the flash memory is unavailable.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The flash memory does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the main PWB	The main PWB is faulty.	Reconnect the connectors on the main PWB. At that time, fix or replace the wires if they are pinched by other parts or have any damage. When the issue is not resolved, replace the main PWB.	Detaching and reattaching the main PWB

### C0150: Engine EEPROM reading / writing error

1. No response from the device is detected for 5s or more 5 times continuously when reading / writing data. 2. The data read reading in 2 points mismatches 8 times continuously. 3. The read data and the write data mismatch 8 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The EEPROM on the engine PWB does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the EEPROM on the engine PWB	The EEPROM is not properly installed.	Reattach the EEPROM on the engine PWB.	Detaching and reattaching the EEPROM
3	Checking the EEPROM on the engine PWB	The EEPROM is faulty.	Replace the EEPROM on the engine PWB and execute U004.	Detaching and reattaching the EEPROM
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C0160: Engine PWB EEPROM data error

The data read from the EEPROM is judged as abnormal.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The EEPROM on the engine PWB does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Executing U021	The storage data in the EEPROM on the engine PWB is faulty.	Execute U021.	Executing U021
3	Replacing the EEPROM	The EEPROM is faulty.	Replace the EEPROM on the engine PWB and execute U004.	Detaching and reattaching the EEPROM

### C0170: Charger count error

The values in one of the billing counters, life counter or the scanner counter mismatch between the main side and the engine side.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the machine serial No. of the main PWB	The main PWB for the different main unit is installed.	Check the machine serial Nos of MAIN and ENGINE at U004, and install the correct main PWB if the MAIN No. differs.	Executing U004
2	Checking the machine serial No. in the EEPROM on the engine PWB	The EEPROM for the different main unit is installed.	Check the machine serial Nos of MAIN and ENGINE at U004, and install the correct EEPROM on the engine PWB if the ENGINE machine serial No. differs.	Executing U004
3	Replacing the main PWB	The main PWB is faulty.	If the serial number at the main is different at U004, execute U004 after replacing the main PWB.	Detaching and reattaching the main PWB
4	Checking the EEPROM on the engine PWB	The EEPROM is faulty.	If the serial number at the engine is different at U004, reinstall the EEPROM on the engine PWB. If not repaired, replace the EEPROM and execute U004. Note: Please do not execute U004 in condition the serial number is different. (by selecting [Execute] and pressing [Start] key). Different serial number will be overwritten.	Executing U004
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C0180: Machine serial number mismatch**

The machine serial Nos. in the main PWB and the EEPROM on the engine PWB mismatch when turning the power on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the machine serial No. of the main PWB	The main PWB for the different main unit is installed.	Check the machine serial Nos of MAIN and ENGINE at U004, and install the correct main PWB if the MAIN No. differs.	Executing U004
2	Checking the machine serial No. in the EEPROM on the engine PWB	The EEPROM for the different main unit is installed.	Check the machine serial Nos of MAIN and ENGINE at U004, and install the correct EEPROM on the engine PWB if the ENGINE machine serial No. differs.	Executing U004
3	Replacing the main PWB	The main PWB is faulty.	If the serial number at the main is different at U004, execute U004 after replacing the main PWB.	Detaching and reattaching the main PWB
4	Checking the EEPROM on the engine PWB	The EEPROM is faulty.	If the serial number at the engine is different at U004, reinstall the EEPROM on the engine PWB. If not repaired, replace the EEPROM and execute U004. Note: Please do not execute U004 in condition the serial number is different. (by selecting [Execute] and pressing [Start] key). Different serial number will be overwritten.	Executing U004
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C0350: Panel PWB communication error (Electronic volume I2C communication error)**

Since NACK was received during the I2C communication, the retry was repeated 5 times and the initial command was transmitted, and then the retry was repeated 5 times again. After that, NACK was also received.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The operation of the operation panel main PWB is faulty.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Operation panel main PWB - Main PWB • Operation panel main PWB - NFC PWB	Wiring diagram
3	Replacing the operation panel main PWB	The operation panel main PWB is faulty.	Replace the panel main PWB.	Detaching and reattaching the operation panel PWB



Step	Check description	Assumed cause	Measures	Reference
4	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB
5	Replacing the NFC PWB	The NFC PWB is faulty.	Replace the NFC PWB.	

**C0360: Engine CPU - Feed ASIC communication error**

The communication with the feed ASIC failed 10 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The engine PWB does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Feed PWB - Engine PWB	Wiring diagram
4	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C0630: DMA error**

DMA transmission of the image data does not finish within the certain time.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	0	0	
2	Checking the connection	0	0	
3	Replacing the wire	The connector is not properly connected. Or, the SATA cable or the wire is faulty.	Clean the terminal of the following SATA cable connector and the wire connectors and reconnect the connectors. If there is no continuity, replace the SATA cable or the wire. • DPCIS - DP relay PWB • DP relay PWB - Main PWB	Wiring diagram
4	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	Detaching and reattaching the DP relay PWB
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C0640: Hard Disk error**

The HDD cannot be accessed properly.

Step	Check description	Assumed cause	Measures	Reference
1	(When abnormal sounds occur) Replacing the HDD	The HDD is faulty.	Replace the HDD when the abnormal sounds are from the HDD.	Detaching and reattaching the HDD
2	Checking the connection	The connector is not properly connected. Or, the SATA cable or the wire is faulty.	Clean the following SATA cable or the terminal of the wire connectors and reconnect the connectors. If there is no continuity, replace the SATA cable or the wire. • HDD - Main PWB	Wiring diagram
3	Initializing the HDD	The HDD storage data is faulty.	Execute U024 [HDD Format] > [FULL].	Executing U024
4	Replacing the HDD	The HDD is faulty.	Replace the HDD.	Detaching and reattaching the HDD
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C0650: FAX image storage pair-check error**

The SSD (FAX image storage) used in other main unit is installed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SSD	The SSD (FAX image storage) already used in other unit is installed.	When installing the SSD used once, replace with the correct SSD.	Detaching and reattaching the SSD
2	Executing U671	The SSD (FAX image storage) already used in other unit is reused without executing U671.	If installing the used SSD, execute U671 [FAX Data CLEAR].	Executing U671
3	Reinstalling the SSD	The SSD (FAX image storage) is not properly installed.	Be sure to install the SSD to the connector on the main PWB.	Detaching and reattaching the SSD
4	Replacing the SSD	The SSD (FAX image storage) is faulty.	Replace with the new SSD.	Detaching and reattaching the SSD
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C0660: Hard Disk encryption key error**

1. The encrypted password input when replacing the main PWB is not correct. 2. The SSD which was used in other main unit is installed.

Step	Check description	Assumed cause	Measures	Reference
1	(When the issue occurs after replacing the main PWB) Executing U004	The encryption key after replacing the main PWB is faulty.	Execute U004 when this issue occurs after replacing the main PWB.	Executing U004
2	(When abnormal sounds occur) Replacing the HDD	The HDD is faulty.	Replace the HDD when the abnormal sounds are from the HDD.	Detaching and reattaching the HDD
3	Checking the connection	The connector is not properly connected. Or, the SATA cable or the wire is faulty.	Clean the following SATA cable or the terminal of the wire connectors and reconnect the connectors. If there is no continuity, replace the SATA cable or the wire. • HDD - Main PWB	Wiring diagram
4	Initializing the HDD	The HDD storage data is faulty.	Execute U024 [HDD Format] > [FULL].	Executing U024
5	Replacing the HDD	The HDD is faulty.	Replace the HDD.	Detaching and reattaching the HDD
6	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C0670: Hard Disk overwriting error**

The area that cannot be properly overwritten exists in a part of the HDD.

Step	Check description	Assumed cause	Measures	Reference
1	(When abnormal sounds occur) Replacing the HDD	The HDD is faulty.	Replace the HDD when the abnormal sounds are from the HDD.	Detaching and reattaching the HDD
2	Checking the connection	The connector is not properly connected. Or, the SATA cable or the wire is faulty.	Clean the following SATA cable or the terminal of the wire connectors and reconnect the connectors. If there is no continuity, replace the SATA cable or the wire. • HDD - Main PWB	Wiring diagram
3	Initializing the HDD	The HDD storage data is faulty.	Execute U024 [HDD Format] > [FULL].	Executing U024

Step	Check description	Assumed cause	Measures	Reference
4	Replacing the HDD	The HDD is faulty.	Replace the HDD.	Detaching and reattaching the HDD
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C0680: SSD error**

The SSD cannot be accessed, or the error occurs when accessing to the SSD.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SSD (if lit after replacing the SSD)	An SSD out of specification is installed.	Install the SSD matching the memory capacity specification.	
2	Resetting the main power	The SSD is faulty.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
3	Reinstalling the SSD	The SSD is not properly installed.	Reinstall the SSD on the main PWB.	Detaching and reattaching the SSD
4	Initializing the SSD	The data stored in the SSD is faulty.	Retrieve the SSD storage data at U026, and then initialize the SSD at U024.	Executing U026 / U024
5	Replacing the SSD	The SSD is faulty.	Retrieve the SSD storage data at U026, and replace the SSD.	Executing U026 / detaching and reattaching the SSD
6	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C0800: Image processing error**

The print sequence jam (J010x) was detected 2 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the image data	The image data is faulty.	When this issue occurs only when handling the certain image data, check if the image data is faulty.	
2	Checking the situation	The printing operation of the certain file is faulty.	Acquire the jobslogifthe phenomenon can be reproduced by specifying the job when the error was detected.'	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Reinsert all the connectors on the main PWB. If the wire is pinched by other parts or it is damaged, repair or replace the wire.	Detaching and reattaching the main PWB
4	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C0830: FAX PWB flash program area checksum error**

The program stored in the flash memory on the FAX PWB is broken so it cannot perform.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
2	Checking the FAX PWB	The FAX PWB is not properly connected.	Turn the power switch and the main power switch off. After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
3	Initializing the fax	The data in the FAX PWB is faulty.	Execute U600 to initialize the FAX.	Executing U600
4	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

**C0840: RTC error ("Time for maintenance T" appears)**

[Check at start-up] • RTC values are old. • Power has not been turned on for over 5 years. • RTC value is older than 2000/1/1 00:01. [Periodic check per 5 minutes after start-up] • RTC values are older than the ones at the last check. • Partial operation by power reset after C840 error and "Time for Maintenance T" is indicated.

Step	Check description	Assumed cause	Measures	Reference
1	Executing U906	The backup battery on the main PWB is faulty, and so, the RTC settings are erased after unplugging the power cord.	Execute U906 to reset the display [Maintenance T]. After that, set the date/time (RTC) in the System menu. (It is necessary to execute this process whenever to unplug/ plug the power cord.)	Executing U906
2	Replacing the main PWB	The main PWB is faulty, or the backup battery runs out.	If service call error C0840 frequently appears after performing the previous step, replace the main PWB.	Detaching and reattaching the main PWB

### C0870: PC FAX Image data transmission error

Data was not properly transmitted even if the specified times of retry were made when the large volume data is transmitted between the FAX PWB and the main PWB.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The FAX PWB does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
2	Initializing the fax	The data in the FAX PWB is faulty.	Execute U600 to initialize the FAX.	Executing U600
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
4	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB
6	Executing U024	The data stored in the SSD is faulty.	Execute U024 [SSD Format].	Executing U024

### C0920: FAX file system error

The backup data could not be stored since the file system of the flash memory is faulty.

Step	Check description	Assumed cause	Measures	Reference
1	Initializing the fax	FAX control values are incorrect	Execute U600 to initialize the FAX.	Executing U600
2	Checking the FAX PWB	The FAX PWB does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
3	Reinstalling the FAX PWB	The FAX PWB is not properly installed.	Reinstall the FAX PWB.	FAX Installation Guide
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
5	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

### C0950: FAX job stay error

Print processing of the received FAX could not be executed and the job continues staying.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The printing process is not properly executed.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the main firmware to the latest version.	Firmware upgrade

**C0980: 24V power interruption detection**

1. The 24V power interruption signal was detected for 1s continuously. 2. After passing 100ms since the 24V power interruption signal was detected, the other service call error appeared. Then, the 24V power supply recovered.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The printing process is not properly executed.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • LVU - Engine PWB	Wiring diagram
3	Replacing the LVU	The LVU is faulty.	Replace the LVU if +24V output from the LVU is not stable and reduced.	Detaching and reattaching the LVU
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C1000: MP lift motor error**

The upper MP lift sensor (for upper limit detection) or lower MP lift sensor (for lower limit detection) does not detect turning on for 3s when the MP lift motor ascends or descends.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the lift base	The lift base does not properly operate.	If the lift base of the MP tray does not move up and down, repair or replace the lift base.	
2	Checking the lift lever	The lift lever is not properly attached.	Check if the lift lever is located where it moves up and down by the lift motor cam or has no damage. Then, reattach the MP tray or replace the lift lever.	
3	Checking the drive gear	The drive gears for lifting up the lift base do not properly rotate.	Check if the drive gears for lifting up the lift base can rotate smoothly or have no excessive load. Then, apply grease and repair the parts.	
4	Checking the conveying unit	The drawer connector connection between the conveying unit and the main unit is faulty.	Firmly close the conveying unit. If there are foreign objects or the deformation on the drawer connector of the conveying unit for connecting to the main unit, repair them.	
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • MP lift motor - Relay PWB • Relay PWB - Feed PWB	Wiring diagram
6	Checking the MP lift motor	The MP lift motor is faulty.	Check the MP lift motor operation, and replace the motor if necessary.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Upper or lower MP lift sensor - Relay PWB • Relay PWB - Feed PWB	Wiring diagram
8	Checking the sensor	The upper or lower MP lift sensor is not properly attached or faulty.	Reattach the upper or lower MP lift sensor. If not repaired, replace the sensor.	
9	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
10	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
11	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
12	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C1010: Lift motor 1 error**

Either of the following was detected 5 times continuously. 1. Lift sensor 2 does not turn on when passing 12s after cassette 1 is installed. 2. The lock-up signal is not released for 1s after lift motor 1 turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cassette base	The cassette base does not operate properly.	Repair or replace the cassette base if it cannot move vertically.	
2	Checking the drive gear	The drive gear to lift up the cassette base does not rotate properly.	Check if the drive gears to lift up the cassette base rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	
3	Checking the wire	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Lift motor 1 - Feed PWB	Wiring diagram
4	Checking lift motor 1	Lift motor 1 is faulty.	Check the operation of lift motor 1, and replace it if necessary.	Detaching and reattaching the lift motor
5	Checking the wire	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Lift sensor 1 - Feed PWB	Wiring diagram
6	Checking the sensor	Lift sensor 1 is not properly attached or faulty.	Reattach lift sensor 1. If not repaired, replace the sensor.	
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	



Step	Check description	Assumed cause	Measures	Reference
8	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C1020: Lift motor 2 error**

Either of the following was detected 5 times continuously. 1. Lift sensor 2 does not turn on when passing 12s after cassette 2 is installed. 2. The lock-up signal is not released for 1s after lift motor 2 turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cassette base	The cassette base does not operate properly.	Repair or replace the cassette base if it cannot move vertically.	
2	Checking the drive gear	The drive gear to lift up the cassette base does not rotate properly.	Check if the drive gears to lift up the cassette base rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	
3	Checking the wire	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •Lift motor 2 - Feed PWB	Wiring diagram
4	Checking lift motor 2	Lift motor 2 is faulty.	Check the operation of lift motor 2, and replace it if necessary.	Detaching and reattaching the lift motor
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Lift sensor 2 - Feed PWB	Wiring diagram
6	Checking the sensor	Lift sensor 2 is not properly attached or faulty.	Reattach lift sensor 2. If not repaired, replace the sensor.	
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
8	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

C1050: PF lift motor error

Object: Side multi feeder

[Side multi feeder] The lift error continued 5 times because of one of the phenomena below. 1. The PF lift sensor does not turn on when passing 12s while the PF lift motor turns on for the first time after installing the cassette. 2. The PF lift sensor does not turn on when passing 2s while the PF lift motor turns on for the second time or later after inserting the cassette. 3. The lift excess current protection monitor signal turning on is detected for 1s or more while the PF lift motor is operating.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cassette base	The cassette base does not operate properly.	Repair or replace the cassette base if it cannot move vertically.	
2	Checking the drive gear	The drive gear to lift up the cassette base does not rotate properly.	Check if the drive gears to lift up the cassette base rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift motor - PF main PWB	Wiring diagram
4	Checking the PF lift motor	The PF lift motor is faulty.	Replace the PF lift motor.	
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift sensor - PF main PWB	Wiring diagram
6	Checking the sensor	The PF lift sensor is not properly attached or faulty.	Reattach the PF lift sensor. If not repaired, replace the sensor.	
7	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)

C1060: PF lift motor 1 error

Object: Side multi feeder + Large capacity feeder, or Side multi feeder + Paper feeder

[Paper feeder or large capacity feeder] The lift error occurred 5 times because one if the below phenomenon. 1. The PF lift sensor1 does not turn ON even passing 12s (paper feeder), 23s (large capacity feeder) at the first time the PF lift motor1 ON after inserting the cassette. 2. The PF lift sensor1 does not turn ON even passing 2s at the second time the PF lift motor1 ON or later after inserting the cassette. 3. Detect the lift excess current protection monitor signal ON for more than 1s during the PF lift motor1 operates.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cassette base	The cassette base does not operate properly.	Repair or replace the cassette base if it cannot move vertically.	
2	Checking the drive gear	The drive gear to lift up the cassette base does not rotate properly.	Check if the lift motor drive gears to lift up the cassette base rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift motor 1 - PF main PWB	Wiring diagram
4	Replacing PF lift motor 1	PF lift motor 1 is faulty.	Replace PF lift motor 1.	Detaching and reattaching the PF lift motor
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift sensor 1 - PF main PWB	Wiring diagram
6	Checking the sensor	PF lift sensor 1 is not properly attached or faulty.	Reattach PF lift sensor 1. If not repaired, replace the sensor.	
7	(When installing the paper feeder) Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
8	(When installing the large capacity feeder) Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)

C1070: PF lift motor 2 error

Object: Side multi feeder + Large capacity feeder, or Side multi feeder + Paper feeder

[Paper feeder or large capacity feeder] The lift error continued 5 times because of one of the phenomena below. 1. The PF lift sensor 2 does not turn on when passing 12s (for paper feeder 23s (for large capacity feeder) while the PF lift motor 2 turns on for the first time after inserting the cassette. 2. The PF lift sensor 2 does not turn on when passing 2s while the PF lift motor2 turns on for the second time or later after inserting the cassette. 3. Detect the lift excess current protection monitor signal ON for more than 1s during the PF lift motor2 operates.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cassette base	The cassette base does not operate properly.	Repair or replace the cassette base if it cannot move vertically.	
2	Checking the drive gear	The drive gear to lift up the cassette base does not rotate properly.	Check if the lift motor drive gears to lift up the cassette base rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift motor 2 - PF main PWB	Wiring diagram
4	Replacing PF lift motor 2	PF lift motor 2 is faulty.	Replace PF lift motor 2.	Detaching and reattaching the PF lift motor
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •PF lift sensor 2 - PF main PWB	Wiring diagram
6	Checking the sensor	PF lift sensor 2 is not properly attached or faulty.	Reattach PF lift sensor 2. If not repaired, replace the sensor.	
7	(When installing the paper feeder) Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
8	(When installing the large capacity feeder) Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)

**C1100: PF lift motor 1 error**

[The right cassette section of the large capacity feeder for the main unit] The lift error continued 5 times because one of the phenomena below. 1. PF lift sensor 1 does not turn on when passing 23s while PF lift motor 1 turns on for the first time after inserting the cassette. 2. PF lift sensor 1 does not turn on when passing 2s while PF lift motor 1 turns on for the second time or later after inserting the cassette. 3. The excess lift current protection monitor signal turning on for 1s or more is detected while the PF lift motor 1 is operating.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cassette base	The cassette base does not operate properly.	Repair or replace the cassette base if it cannot move vertically.	
2	Checking the drive gear	The drive gear to lift up the cassette base does not rotate properly.	Check if the drive gears to lift up the cassette base rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift motor 1 - PF main PWB	Wiring diagram
4	Checking PF lift motor 1	PF lift motor 1 is faulty.	Replace PF lift motor 1.	
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift sensor 1 - PF main PWB	Wiring diagram
6	Checking the sensor	PF lift sensor 1 is not properly attached or faulty.	Reattach PF lift sensor 1. If not repaired, replace the sensor.	
7	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB

**C1110: PF lift motor 2 error**

[The left cassette section of the large capacity feeder for the main unit] The lift error continued 5 times because of one of the phenomena below. 1. PF lift sensor 2 does not turn on when passing 23s while PF lift motor 2 turns on for the first time after inserting the cassette. 2. PF lift sensor 2 does not turn on when passing 2s while PF lift motor 2 turns on for the second time or later after inserting the cassette. 3. The excess lift current protection monitor signal turning on for 1s or more is detected while the PF lift motor 2 is operating.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cassette base	The cassette base does not operate properly.	Repair or replace the cassette base if it cannot move vertically.	
2	Checking the drive gear	The drive gear to lift up the cassette base does not rotate properly.	Check if the drive gears to lift up the cassette base rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift motor 2 - PF main PWB	Wiring diagram
4	Replacing PF lift motor 2	PF lift motor 2 is faulty.	Replace PF lift motor 2.	
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •PF lift sensor 2 - PF main PWB	Wiring diagram
6	Checking the sensor	PF lift sensor 2 is not properly attached or faulty.	Reattach PF lift sensor 2. If not repaired, replace the sensor.	
7	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB

C1140: PF lift motor error

Object: Side feeder

1. The PF lift upper limit sensor does not turn on when passing 30s after cassette 5 is inserted. 2. The lock-up signal is detected for 200ms continuously during the PF lift motor operation. 3. The PF lift upper limit sensor does not turn on when passing 2s after the upper limit control when printing starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the bottom plate	The bottom plate does not operate properly.	Repair or replace the bottom plate when it does not move vertically.	
2	Checking the drive gear	The drive gear to lift up the bottom plate does not rotate properly.	Check if the drive gears to lift up the bottom plate rotate smoothly or have no excessive load. And apply the grease to the frictional parts and fix the related parts so that they can rotate smoothly.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift motor - PF main PWB	Wiring diagram
4	Checking the PF lift motor	The PF lift motor is faulty.	Replace the PF lift motor.	
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF lift upper limit sensor - PF main PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
6	Checking the PF lift upper limit sensor	The PF lift upper limit sensor is not properly attached or faulty.	Reattach the PF lift upper limit sensor. Then, replace it if it is not fixed.	
7	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB

C1250: PF multi-feeding sensor communication error

Object: Side multi feeder

(For the internal count)

The PF multi-feeding sensor receives the incorrect communication command 3 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF multi-feeding sensor (emitter) - PF main PWB • PF multi-feeding sensor (receiver) - PF main PWB	Wiring diagram
2	Replacing the PF multi-feeding sensors	The PF multi-feeding sensor is faulty.	Replace the PF multi-feeding sensor (emitter) or the PF multi-feeding sensor (receiver).	
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)

C1350: PF multi-feeding sensor error

Object: Side multi feeder

(For the internal count)

The multi-feeding is detected 5 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF multi-feeding sensor (emitter) - PF main PWB • PF multi-feeding sensor (receiver) - PF main PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
2	Replacing the PF multi-feeding sensors	The PF multi-feeding sensor is faulty.	Replace the PF multi-feeding sensor (emitter) or the PF multi-feeding sensor (receiver).	
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)

**C1410: Rotary decurler error**

The BR conveying decurler sensor does not turn on after cumulative 3 times of operating 400-steps at standby. Or, the BR conveying decurler sensor does not turn off after operating 400-steps at standby.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the rotary decurler	The rotary decurler is not properly attached.	Check if the rotary decurler or the drive gears rotate smoothly and have no excessive load. Then, apply grease or repair the parts.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BR decurler sensor - BR main PWB • BR conveying guide motor - BR main PWB • BR main PWB - Engine PWB	Wiring diagram
3	Checking the sensor	The BR decurler sensor is faulty.	Replace the BR decurler sensor.	
4	Replacing the BR conveying guide motor	The BR conveying guide motor is faulty.	Replace the BR conveying guide motor.	
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the BR main PWB	The BR main PWB is faulty.	Replace the BR main PWB.	
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB



**C1450: PF multi-feeding sensor backup error (Side Multi Feeder)**

1. Write data and read data does not match 3 times continuously when writing. 2. Block erase failed 3 times continuously. 3. Writing does not complete when passing 200ms after starting writing.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF multi-feeding sensor (emitter) - PF main PWB • PF multi-feeding sensor (receiver) - PF main PWB	Wiring diagram
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the side multi feeder firmware to the latest version.	Firmware Update
3	Replacing the PF multi-feeding sensors	The PF multi-feeding sensor is faulty.	Replace the PF multi-feeding sensor (emitter) or the PF multi-feeding sensor (receiver).	
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)

**C1800: Main unit large capacity feeder communication error**

Condition: The main unit does not install the paper feeder or the large capacity feeder. Or, when turning the main power off and on while disconnecting the connector of the cable from the side multi feeder, this service call error reappears. (It might be caused by the large capacity feeder for the main unit.)

The communication error was detected 10 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB - Engine PWB	Wiring diagram
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB

Step	Check description	Assumed cause	Measures	Reference
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
5	(When the paper feeder or the large capacity feeder is installed) Field measures for the service call error caused by the enhancement unit	It is caused by the enhancement unit.	If this service call error reappears after finishing the previous steps, perform the field measures for [C1800: Paper feeder communication error] or [C1800: Large capacity feeder communication error].	

**C1800: Paper Feeder communication error**

Condition: When turning the main power off and on while disconnecting the connector of the cable from the side multi feeder, this service call error does not reappear. (It is caused by the paper feeder.)

The communication error was detected 10 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the paper feeder firmware to the latest version.	Firmware Update
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB (Paper feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C1800: Large capacity feeder communication error**

Condition: When turning the main power off and on while disconnecting the connector of the cable from the side multi feeder, this service call error does not reappear. (It is caused by the large capacity feeder.)

The communication error was detected 10 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the large capacity feeder firmware to the latest version.	Firmware Update
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C1810: Side Multi Feeder communication error**

The communication error was detected 10 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB - Engine PWB	Wiring diagram
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the side multi feeder firmware to the latest version.	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C1820: Side Feeder communication error**

The communication error was detected 10 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side feeder to the main unit.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB - Engine PWB	Wiring diagram
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the side feeder firmware to the latest version.	Firmware Update
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side feeder)	Detaching and reattaching the PF main PWB (Side feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C1900: Main unit large capacity feeder EEPROM error

Condition: The main unit does not install the paper feeder or the large capacity feeder. Or, when outputting Event Log after turning the main power off and on while disconnecting the connector of the cable from the side multi feeder, this service call error is recorded again. (It might be caused by the large capacity feeder for the main unit.)

(For the internal count)

The writing data and the reading data mismatch 3 times continuously when writing.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB - Engine PWB	Wiring diagram
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
5	(When the paper feeder or the large capacity feeder is installed) Field measures for the service call error caused by the enhancement unit	It is caused by the enhancement unit.	If this service call error is recorded on Event Log after finishing the previous steps, perform the field measures for [C1900: Paper feeder EEPROM error] or [C1800: Large capacity feeder EEPROM error].	

### C1900: Paper Feeder EEPROM error

Condition: When outputting Event Log after turning the main power off and on while disconnecting the connector of the cable from the side multi feeder, this service call error is not recorded. (It is caused by the paper feeder.)

(For the internal count)

The writing data and the reading data mismatch 3 times continuously when writing.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the paper feeder firmware to the latest version.	Firmware Update
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB (Paper feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C1900: Large capacity feeder EEPROM error**

Condition: When outputting Event Log after turning the main power off and on while disconnecting the connector of the cable from the side multi feeder, this service call error is not recorded. (It is caused by the large capacity feeder.)

(For the internal count)

The writing data and the reading data mismatch 3 times continuously when writing.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the large capacity feeder firmware to the latest version.	Firmware Update
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB	Wiring diagram
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C1910: Side Multi Feeder EEPROM error

The writing data and the reading data mismatch 3 times continuously when writing.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side multi feeder to the main unit.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB - Engine PWB (Cable from the Side Multi Feeder)	Wiring diagram
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the side multi feeder firmware to the latest version.	Firmware Update
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C1920: Side Feeder EEPROM error

The writing data and the reading data mismatch 3 times continuously when writing.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	It is not properly connected to the main unit.	Reconnect the cable of the side feeder to the main unit.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF main PWB - Engine PWB	Wiring diagram
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the side feeder firmware to the latest version.	Firmware Update
4	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side feeder)	Detaching and reattaching the PF main PWB (Side feeder)
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2101: Developer motor error**

1. The ready signal is not at the L level when passing 2s after the developer motor drive starts. 2. The ready signal is at the H level for 1s continuously after developer motor is stable.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the developer drive section	The developer drive section is faulty.	Replace the developer unit drive gear if it is faulty.	
2	Checking the developer roller	The developer roller is faulty.	Check if the developer roller rotates, and replace the developer unit if not rotating.	Detaching and reattaching the developer unit
3	Checking the developer motor	The developer motor drive is faulty.	Execute U030 [DLP(K)] and check the developer motor K operation. Check if the drive gears rotate smoothly and have no excessive load. Then, apply grease to the frictional parts and repair the parts.	Executing U030
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Developer motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
5	Checking the developer motor	The developer motor is not properly attached or faulty.	Reattach the developer motor. If not repaired, replace the motor.	Detaching and reattaching the developer motor
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
7	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
8	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB



**C2201: Drum motor steady-state error**

The ready signal is at the H level for 1s continuously after the drum motor became stable.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the drum motor	The drum motor drive is faulty.	Execute U030 [Process] and check the drum motor operation. Check if the drive gears rotate smoothly and have no excessive load. Then, apply grease to the frictional parts and repair the parts.	Executing U030
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Drum motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
3	Checking the drum unit and the developer unit	The drum unit is faulty.	Check if the drum or the drum screw rotates manually, and if not, replace drum unit.	Detaching and reattaching the drum unit
4	Checking the drum motor	The drum motor is faulty.	Replace the drum motor.	Detaching and reattaching the drum drive unit
5	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2211: Drum motor startup error**

The ready signal does not turn on when passing 2s after the drum motor starts up.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the drum motor	The drum motor operation is faulty.	Execute U030 [Process] and check the drum motor operation. Check if the drive gears rotate smoothly and have no excessive load. Then, apply grease to the frictional parts and repair the parts.	Executing U030
2	Checking the drum unit and the developer unit	The drum does not properly rotate.	Check if the drum or the drum screw rotates manually, and if not, replace drum unit.	Detaching and reattaching the drum unit

Step	Check description	Assumed cause	Measures	Reference
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Drum motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
4	Replacing the drum motor	The drum motor is faulty.	Replace the drum motor.	Detaching and reattaching the drum drive unit
5	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	

**C2300: Fuser motor error**

1. The ready signal is at the H level for 1s continuously during the fuser motor drive. 2. The ready signal is not at the L level (stable rotation) when passing 2s after the fuser motor drive starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the fuser motor	The fuser motor operation is faulty.	Execute U030 [Fuser] and check the fuser motor operation. Check if the drive gears rotate smoothly and have no excessive load. Then, apply grease to the frictional parts and repair the parts.	Executing U030
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Fuser motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
3	Replacing the fuser unit	The fuser unit is faulty.	Replace the fuser unit.	Detaching and reattaching the fuser unit
4	Replacing the fuser motor	The fuser motor is faulty.	Replace the fuser motor.	Detaching and reattaching the fuser drive unit
5	Replacing the fuser drive unit	The fuser drive unit is faulty.	Replace the fuser drive unit.	Detaching and reattaching the fuser drive unit
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	

Step	Check description	Assumed cause	Measures	Reference
7	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
8	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2550: Transfer motor error**

1. The ready signal is not at the L level (stable rotation) when passing 2s after the transfer motor drive starts. 2. The ready signal is at the H level for 1s continuously during the transfer motor drive.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the transfer motor	The transfer motor operation is faulty.	Check if the transfer belt and the drive gears rotate smoothly or have no excessive load. Apply grease to the frictional parts and repair the parts.	
2	Checking the conveying unit	The drawer connector connection between the conveying unit and the main unit is faulty.	Firmly close the conveying unit. If there are foreign objects or the deformation on the drawer connector of the conveying unit for connecting to the main unit, repair them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •Transfer motor - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
4	Replacing the transfer motor	The transfer motor is faulty.	Replace the transfer motor.	
5	Replacing the transfer belt unit	The transfer belt unit is faulty.	Replace the transfer belt unit.	Detaching and reattaching the transfer belt unit
6	Replacing the relay PWB	The relay PWB is faulty.	Replace the relay PWB.	
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
8	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

C2610: PF feed motor error (Large Capacity Feeder in the main unit)

The ready signal is not at the L level (stable rotation) for passing 2s since the PF feed motor drive is started.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the PF feed motor	The PF feed motor is not properly connected. The drive parts are faulty.	Execute U247 [LCF] > [Motor On] to check the paper feeding operation. If the PF feed motor does not properly operate, reconnect the connector. Check if the PF feed roller and the drive gears rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	Executing U247
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF feed motor - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
3	Replacing the PF feed motor	The PF feed motor is faulty.	Replace the PF feed motor.	Detaching and reattaching the PF drive unit
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB.	Detaching and reattaching the PF main PWB
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

C2640: PF feed motor error (Side Feeder)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the PF conveying motor	The PF conveying motor is not properly connected. The drive parts are faulty.	Execute U247 [Side Deck] > [Motor On] to check the paper feeding operation. If the PF conveying motor does not properly operate, reconnect the connector. Check if the PF feed roller and the drive gears rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	Executing U247
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF conveying motor - PF main PWB • PF main PWB - Engine PWB (Cable from the side feeder)	Wiring diagram
4	Replacing the PF conveying motor	The PF conveying motor is faulty.	Replace the PF conveying motor.	Detaching and reattaching the PF drive unit (Side feeder)
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the side feeder firmware to the latest version.	Firmware Update
6	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side feeder)	Detaching and reattaching the PF main PWB (Side feeder)
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

C2650: PF feed motor error (Side Multi Feeder)

The ready signal is not at the L level (stable rotation) for passing 2s since the PF feed motor drive is started.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the PF feed motor	The PF feed motor is not properly connected. The drive parts are faulty.	Execute U247 [SMT] > [Motor On] to check the paper feeding operation. If the PF feed motor does not properly operate, reconnect the connector. Check if the PF feed roller and the drive gears rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	Executing U247
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF feed motor - PF main PWB • PF main PWB - Engine PWB (Cable from the side multi feeder)	Wiring diagram
3	Replacing the PF feed motor	The PF feed motor is faulty.	Replace the PF feed motor.	Detaching and reattaching the PF drive unit (Side multi feeder)
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the side multi feeder firmware to the latest version.	Firmware Update
5	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2660: PF feed motor error (Large Capacity Feeder)**

The ready signal is not at the L level (stable rotation) for passing 2s since the PF feed motor drive is started.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the PF feed motor	The PF feed motor is not properly connected. The drive parts are faulty.	Execute U247 [Side LCF] > [Motor On] to check the paper feeding operation. If the PF feed motor does not properly operate, reconnect the connector. Check if the PF feed roller and the drive gears rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	Executing U247
2	Checking the wire	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF feed motor - PF main PWB (Large capacity feeder) • PF main PWB (Large capacity feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB (Cable of the side multi feeder)	Wiring diagram
3	Replacing the PF feed motor	The PF feed motor is faulty.	Replace the PF feed motor.	Detaching and reattaching the PF drive unit (Large capacity feeder)
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the large capacity feeder firmware to the latest version.	Firmware Update
5	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Large capacity feeder)	Detaching and reattaching the PF main PWB (Large capacity feeder)
6	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

C2670: PF feed motor error (Paper Feeder)

The ready signal is not at the L level (stable rotation) for passing 2s since the PF feed motor drive is started.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the PF feed motor	The PF feed motor is not properly connected. The drive parts are faulty.	Execute U247 [Side 2PF] > [Motor On] to check the paper feeding operation. If the PF feed motor does not properly operate, reconnect the connector. Check if the PF feed roller and the drive gears rotate smoothly or have no excessive load. And apply the grease to the frictional parts and repair the related parts so that they can rotate smoothly.	Executing U247
2	Checking the wire	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PF feed motor - PF main PWB (Paper feeder) • PF main PWB (Paper feeder) - PF main PWB (Side multi feeder) • PF main PWB (Side multi feeder) - Engine PWB (Cable from the side multi feeder)	Wiring diagram
3	Replacing the PF feed motor	The PF feed motor is faulty.	Replace the PF feed motor.	Detaching and reattaching the PF drive unit (Paper feeder)
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the paper feeder firmware to the latest version.	Firmware Update
5	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Paper feeder)	Detaching and reattaching the PF main PWB (Paper feeder)
6	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB. (Side multi feeder)	Detaching and reattaching the PF main PWB (Side multi feeder)
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB



**C2810: Waste toner 1 motor error**

The steady-state speed error, FG pulse abnormal stop, or the abnormal motor drive is detected when reading the error signal from the motor at every 1s.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the waste toner collection motor	The waste toner collection motor does not properly operate.	Check if the waste toner collection motor has no excessive load, and repair it.	
2	Checking the drive gear	The drive gear does not rotate properly.	Check if the excessive load is not applied to the drive gears by rotating the gears, and clean the drive gears and the bushing, etc.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Waste toner collection motor - Front PWB?• Front PWB - Engine PWB	Wiring diagram
4	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2820: Transfer belt motor steady-state error**

The steady-state speed error or the abnormal motor drive is detected when reading the FG signal from the transfer motor at every 1s.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the transfer motor	The drive transmission from the transfer motor is faulty.	Execute U030 [Belt Meand] and check if the drive gears, roller and the belt have no excessive load by rotating them. Then, clean the drive section of the primary transfer belt unit.	Executing U030
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Transfer motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
3	Checking the primary transfer belt unit	The primary transfer belt unit is faulty.	Reinstall the primary transfer belt unit. If not repaired, replace it.	Detaching and reattaching the primary transfer belt unit
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
6	Checking the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2840: Transfer belt cleaning motor error**

1. The ready signal does not turn on when passing 2s after the transfer cleaning motor starts.
2. The ready signal turns off for 1s continuously after the transfer cleaning motor is stable.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the primary transfer belt unit	The primary transfer belt unit is not properly installed.	Reattach the primary transfer belt unit.	Detaching and reattaching the primary transfer belt unit
2	Cleaning the primary transfer cleaning section	The roller in the primary transfer cleaning section does not rotate properly.	Remove the waste toner remaining in the primary transfer cleaning section.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Transfer cleaning motor - Relay connector of the primary transfer belt unit • Relay connector of the primary transfer belt unit - Engine PWB	Wiring diagram
4	Checking the transfer cleaning motor	The transfer cleaning motor is not properly attached or faulty.	Reattach or replace the transfer cleaning motor.	
5	Primary transfer belt unit replacement	The primary transfer cleaning section is faulty.	Replace the primary transfer belt unit.	Detaching and reattaching the primary transfer belt unit
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2850: Transfer belt motor main sensor error**

The FG signal from the transfer motor is read at every 1s and the abnormal FG pulse stop is detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the drive components	The drive transmission from the transfer motor is faulty.	Execute U030 [Belt Meand] and check if the drive gears, roller and the belt have no excessive load by rotating them. Then, clean the drive section of the primary transfer belt unit.	Executing U030
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Transfer motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
3	Checking the primary transfer belt unit	The primary transfer belt unit is faulty.	Reinstall the primary transfer belt unit. If not repaired, replace it.	Detaching and reattaching the primary transfer belt unit
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2860: Transfer belt motor sub sensor error**

The pulse signal from the belt speed sensor does not output for 2s continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the drive components	The drive transmission from the transfer motor is faulty.	Execute U030 [Belt Meand] and check if the drive gears, roller and the belt have no excessive load by rotating them. Then, clean the drive section of the primary transfer belt unit.	Executing U030
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Belt speed sensor - Relay connector of the primary transfer belt unit • Relay connector of the primary transfer belt unit - Engine PWB	Wiring diagram
3	Checking the primary transfer belt unit	The primary transfer belt unit is not properly installed, or the belt speed sensor is faulty.	Reinstall the primary transfer belt unit. If not repaired, replace it.	Detaching and reattaching the primary transfer belt unit
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C2870: Waste toner 2 motor error**

The steady-state speed error, FG pulse abnormal stop, or the abnormal motor drive is detected when reading the error signal from the motor at every 1s.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the waste toner collection motor	The waste toner collection motor does not properly operate.	Check if the waste toner collection motor has no excessive load, and repair it.	
2	Checking the drive gear	The drive gear does not rotate properly.	Check if the excessive load is not applied to the drive gears by rotating the gears, and clean the drive gears and the bushing, etc.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Waste toner collection motor - Front PWB? • Front PWB - Engine PWB	Wiring diagram
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C3100: Carriage error**

When turning the power on or finishing originals scan through the scanner, the alignment of the home position sensor (turning on / off the sensor) fails and the error is detected. Then, the error is detected twice continuously even the initial operation is executed.

Step	Check description	Assumed cause	Measures	Reference
1	Unlocking the scanner mirror frame	The scanner mirror frame is not unlocked.	Unlock the scanner mirror frame (lamp unit assy).	Unlocking the scanner mirror frame
2	Checking the scanner movement	A load is applied to the scanner movement.	Check the operation of the lamp by U073 or manually moving it. If there is an excess load, check if there are any foreign objects on the optical wire or optical wire drum and clean it. After that, apply grease on the scanner rail.	Detaching and reattaching the scanner wires
3	Checking the scanner wires	The scanner wires are dirty or come off.	Clean and reattach the scanner wires.	Detaching and reattaching the scanner wires
4	Checking the scanner motor	The scanner motor is faulty.	Reattach the scanner motor and reconnect the connector. If not repaired, replace it.	
5	Checking the belt tension of the scanner motor	A load is applied to the scanner movement since the belt tension is improper.	Adjust the scanner motor belt tension properly.	
6	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Scanner motor - Engine PWB	Wiring diagram
7	Checking the home position sensor	The home position sensor is not properly attached.	Reattach the home position sensor.	
8	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Home position sensor - Engine PWB	Wiring diagram
9	Replacing the home position sensor	The home position sensor is faulty.	Replace the home position sensor.	
10	Firmware upgrade	The firmware is not the latest version.	Upgrade the scanner firmware to the latest version.	Firmware Update
11	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C3200: LED lamp startup error

The white reference data acquired by lighting the LED lamp at the initial operation does not reach the specified value. Or, the light amount detected by the CCD PWB is not enough. (2 or more LED lamps do not light. The light does not reach the CCD PWB due to condensation.)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the LED lamp	The LED lamp does not light.	Execute U061 [CCD] and check if the LED lamp is lit. If not, replace the lamp unit. After that, execute U411 [Table(ChartA)].	Detaching and reattaching the lamp unit
2	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB • LED PWB - CCD PWB	Wiring diagram
3	Checking the mirror	The mirror or lens is frosted due to condensation.	Clean the mirrors. If the condensation at the scanner section is resolved naturally by opening the document processor or the platen cover, turn the power switch off and on.	
4	Replacing the lens unit	The CCD PWB is faulty.	Replace the lens unit and execute U411.	Detaching and reattaching the lens unit
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the scanner firmware to the latest version.	Firmware Update
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C3210: CIS lamp error

Input data did not exceed the threshold for 5s when the CIS lamp was ON.

Step	Check description	Assumed cause	Measures	Reference
1	Releasing the partial operation	The partial operation is executed.	Execute resetting the partial operation at U906.	Executing U906
2	Checking the DPCIS	The CIS lamp does not light.	Execute U061 [CIS] and check if the CIS lamp is lit. If not, replace the DPCIS and execute U411.	Detaching and reattaching the CIS
3	Cleaning the CIS glass and the CIS roller	The CIS glass or the CIS roller is dirty.	Clean the CIS glass and the CIS roller.	
4	Checking the DPSHD PWB	The DPSHD PWB is not properly connected.	Reconnect the DPSHD PWB to the DPCIS.	



Step	Check description	Assumed cause	Measures	Reference
5	Checking the connection	The connector is not properly connected. Or, the SATA cable or the wire is faulty.	Clean the following SATA cable or the terminal of the wire connectors and reconnect the connectors. If there is no continuity, replace the SATA cable or the wire. • DPSHD PWB - DP relay PWB • DP relay PWB - Main PWB • DP relay PWB - DP main PWB • DP main PWB - Engine PWB	Wiring diagram
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the DP firmware to the latest version.	Firmware Update
7	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
8	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
9	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB
10	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB
11	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C3300: CCD AGC error**

Brightness of the LED lamp is darker while one of the LED lamp does not turn on or brighter than expected when processing the AGC for the CCD lamp.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the LED lamp	The LED lamp is faulty.	Check if the LED lamp lights by executing U061 [CCD]. If it does not light, replace the lamp unit and execute U411 [Table (ChartA) ].	Detaching and reattaching the lamp unit
2	Cleaning the backside of the contact glass	The white reference sheet is dirty.	Clean the white reference sheet at the backside of the contact glass.	Detaching and reattaching the contact glass
3	Checking the connection	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is peeled off, deformed or the FFC is broken, replace the FFC. • LED PWB - CCD PWB • CCD PWB - Engine PWB	Wiring diagram
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the scanner firmware to the latest version.	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
5	Replacing the lens unit	The CCD PWB is faulty.	Replace the lens unit and execute U411.	Detaching and reattaching the lens unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C3310: CIS AGC error

The CIS could not get the normal white reference value after the AGC retry.

Step	Check description	Assumed cause	Measures	Reference
1	Releasing the partial operation	The partial operation is executed.	Execute resetting the partial operation at U906.	Executing U906
2	Cleaning the CIS glass and the CIS roller	The CIS glass or the CIS roller is dirty.	Clean the CIS glass and the CIS roller.	
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the DP firmware to the latest version.	Firmware Update
4	Checking the DPSHD PWB	The DPSHD PWB is not properly connected.	Reconnect the DPSHD PWB to the DPCIS.	
5	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
6	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and reattaching the DPCIS
7	Checking the connection	The connector is not properly connected. Or, the SATA cable is faulty.	Clean the terminal of the following SATA cable connector and reconnect the connectors. If there is no continuity, replace the SATA cable. • DPSHD PWB - DP relay PWB • DP relay PWB - Main PWB	Wiring diagram
8	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
9	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

### C3500: Communication error between the scanner and the ASIC

The communication error is detected during the communication between the scanner ASIC and the scanner CPU.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	ASIC does not properly operate.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	

Step	Check description	Assumed cause	Measures	Reference
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the scanner firmware to the latest version.	Firmware Update
3	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C3600: Scanner sequence error

The program internal processing error of the scanner sequence occurs.

Step	Check description	Assumed cause	Measures	Reference
1	Executing U021	The memory operation is faulty.	Execute U021.	Executing U021
2	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C3800: AFE error

The writing data and the reading data mismatch 3 times continuously when writing. No response is not returned from AFE for 100ms.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is peeled off, deformed or the FFC is broken, replace the FFC. • CCD PWB - Engine PWB	Wiring diagram
2	Replacing the lens unit	The CCD PWB is faulty.	Replace the lens unit and execute U411.	Detaching and reattaching the lens unit
3	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C3900: Scanner backup memory read / write error (Engine EEPROM)

The read-back value of the engine EEPROM differs.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The EEPROM on the engine PWB does not operate properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the EEPROM on the engine PWB	The EEPROM is not properly installed.	Reattach the EEPROM on the engine PWB.	Detaching and reattaching the EEPROM

Step	Check description	Assumed cause	Measures	Reference
3	Checking the EEPROM on the engine PWB	The EEPROM is faulty.	Replace the EEPROM on the engine PWB and execute U004.	Detaching and reattaching the EEPROM
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C4001: Polygon motor synchronization error**

The ready signal is not at the L level when passing 30s after the polygon motor drive starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Polygon motor - Engine PWB	Wiring diagram
2	Checking the polygon motor	The polygon motor does not rotate properly.	Check the rotation sound of the polygon motor, and reattach or replace the LSU if it does not rotate properly.	Detaching and reattaching the LSU
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C4101: BD initialization error**

The BD signal was not detected for 1s after driving the polygon motor.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector or the FFC terminal is not properly connected, or the wire or the FFC is faulty.	Reconnect the following wire connectors and reconnect the FFC. If there is no continuity, replace the wire. If the FFC terminal section is deformed or FFC is broken, replace the FFC. • APC PWB - LSU relay PWB • LSU relay PWB - Engine PWB	Wiring diagram
2	Checking the LSU	The BD sensor or the laser diode is faulty.	Reinstall or replace the LSU while paying attention to the static electricity.	Detaching and reattaching the LSU
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
4	Replacing the LSU relay PWB	The LSU relay PWB is faulty.	Replace the LSU relay PWB.	
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C4201: BD steady-state error**

The BD signal is not detected during the laser lighting.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector or the FFC terminal is not properly connected, or the wire or the FFC is faulty.	Reconnect the following wire connectors and reconnect the FFC. If there is no continuity, replace the wire. If the FFC terminal section is deformed or FFC is broken, replace the FFC. • APC PWB - LSU relay PWB • LSU relay PWB - Engine PWB	Wiring diagram
2	Checking the LSU	The BD sensor or the laser diode is faulty.	Reinstall or replace the LSU while paying attention to the static electricity.	Detaching and reattaching the LSU
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the LSU relay PWB	The LSU relay PWB is faulty.	Replace the LSU relay PWB.	
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C5101: Main high-voltage error**

When the flow-in current with the Vpp variable in 3 steps is measured during the Vpp adjustment, difference between the zero current value and 2nd step current value is less than the reference value. (The Vpp is adjusted at warm-up, before calibration or before print when the in-machine temperature varies largely from the one at the last time Vpp adjustment.)

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the high-voltage PWB	Proper electric current does not flow as the main charger roller contact is not properly grounded.	Repair the main charger roller contact (wire spring) inside the high-voltage PWB so that it firmly contacts.	Detaching and reattaching the high-voltage PWB
2	Checking the drum unit and the developer unit	The drum or the drum screw does not properly rotate due to the excessive load.	Check if the drum or the drum screw rotates manually, and if not, replace drum unit.	Detaching and reattaching the drum unit
3	Replacing the drum motor	The drum motor is faulty.	Replace the drum motor.	Detaching and reattaching the drum drive unit

Step	Check description	Assumed cause	Measures	Reference
4	Checking the main charger unit	Proper electric current does not flow as the foreign objects are adhered on the high-voltage contact of the main charger roller unit.	Clean the high-voltage contact of the main charger roller unit and apply conductive grease to the roller shaft.	Detaching and reattaching the main charger roller unit
5	Replacing the main charger roller unit	Proper electric current does not flow due to deformation or damage of the high-voltage contact of the main charger roller unit.	Replace the main charger roller unit and execute U930.	Detaching and reattaching the main charger roller unit
6	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • High-voltage PWB - Engine PWB	Wiring diagram
7	Replacing the high-voltage PWB	The high-voltage PWB is faulty.	Replace the high-voltage PWB.	Detaching and reattaching the high-voltage PWB
8	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C6000: IH heating error 1**

The fuser center thermistor temperature does not reach 100°C / 212°F when passing 60s since warm-up starts. Or, the ready display temperature is not detected when passing 420s since the fuser center thermistor temperature reaches 100°C / 212°F during warm-up.

Step	Check description	Assumed cause	Measures	Reference
1	Executing U169	The IH setting mismatches the power source specification.	Set the fuser destination same as the IH PWB voltage at U169.	Executing U169
2	Removing foreign material	There is foreign material between the fuser unit and the IH unit. Or, foreign material adheres on the heat roller.	Remove foreign objects if they are in between the fuser unit and the IH unit or on the heat roller. After that, reinstall the fuser unit.	Detaching and reattaching the fuser unit
3	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
6	Replacing the fuser unit	The temperature cannot be detected properly due to the broken thermostat or the thermistor error.	Replace the fuser unit.	Detaching and reattaching the fuser unit
7	Replacing the current PWB	The current PWB is faulty.	Replace the current PWB.	
8	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
9	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
10	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

**C6020: Fuser center thermistor high temperature error**

The fuser center thermistor detects 240°C / 464°F or more for 1s.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
4	Replacing the fuser unit	The temperature cannot be detected properly due to the thermistor error, etc.	Replace the fuser unit.	Detaching and reattaching the fuser unit

Step	Check description	Assumed cause	Measures	Reference
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
7	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

**C6030: Fuser center thermistor broken**

The output from the fuser center thermistor is under 20°C / 68°F level during warm-up. Or, the temperature detected at the fuser center thermistor does not change for 10s after turning the fuser heater on.

Step	Check description	Assumed cause	Measures	Reference
1	Removing foreign material	There is foreign material between the fuser unit and the IH unit. Or, foreign material adheres on the heat roller.	Remove foreign objects if they are in between the fuser unit and the IH unit or on the heat roller. After that, reinstall the fuser unit.	Detaching and reattaching the fuser unit
2	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
5	Replacing the fuser unit	The temperature is not properly detected due to the broken wire or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
8	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB



C6040: Fuser heater error

Step	Check description	Assumed cause	Measures	Reference
1	Changing the wall outlet	The power voltage descends by 10% or more of the rated voltage when printing.	Connect the power cord to a different wall outlet if the power supply voltage descends by 10% or more of the rated voltage.	
2	Removing foreign material	There is foreign material between the fuser unit and the IH unit. Or, foreign material adheres on the heat roller.	Remove foreign objects if they are in between the fuser unit and the IH unit or on the heat roller. After that, reinstall the fuser unit.	Detaching and reattaching the fuser unit
3	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
6	Replacing the fuser unit	The temperature is not properly detected due to the broken wire or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

**C6050: Fuser center thermistor low temperature error**

The fuser center thermistor detects less than 100°C / 212°F for 1s after warm-up, or during print or standby.

Step	Check description	Assumed cause	Measures	Reference
1	Changing the wall outlet	The power voltage descends by 10% or more of the rated voltage when printing.	Connect the power cord to a different wall outlet if the power supply voltage descends by 10% or more of the rated voltage.	
2	Removing foreign material	There is foreign material between the fuser unit and the IH unit. Or, foreign material adheres on the heat roller.	Remove foreign objects if they are in between the fuser unit and the IH unit or on the heat roller. After that, reinstall the fuser unit.	Detaching and reattaching the fuser unit
3	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
6	Replacing the fuser unit	The temperature is not properly detected due to the broken wire or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
9	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB
10	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH unit - IH PWB	Wiring diagram
11	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit

**C6100: Fuser heater broken**

The fuser press thermistor temperature detected does not reach the control temperature within 480s after shifting to the low power mode.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
4	Replacing the fuser unit	The temperature cannot be detected properly due to the thermistor error, etc.	Replace the fuser unit.	Detaching and reattaching the fuser unit
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
7	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

**C6120: Fuser press thermistor high temperature error**

The fuser press thermistor detects 210°C / 410°F or more for 1s.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
4	Replacing the fuser unit	The temperature cannot be detected properly due to the thermistor error, etc.	Replace the fuser unit.	Detaching and reattaching the fuser unit
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
7	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

**C6130: Fuser press thermistor broken**

The detection temperature of the fuser press thermistor does not reach 30°C / 86°F within 60s since warm-up starts.

Step	Check description	Assumed cause	Measures	Reference
1	Removing foreign material	There are foreign objects between the fuser press thermistor and the press roller. Or, the foreign objects are adhered on the press roller.	Remove foreign objects if any on the press roller. Then, reinstall the fuser unit.	Detaching and reattaching the fuser unit
2	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
5	Replacing the fuser unit	The temperature is not properly detected due to the broken wire or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
8	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

**C6150: Fuser press thermistor low temperature error**

The fuser press thermistor detects less than 30°C / 86°F for 1s after warm-up.

Step	Check description	Assumed cause	Measures	Reference
1	Removing foreign material	There are foreign objects between the fuser press thermistor and the press roller. Or, the foreign objects are adhered on the press roller.	Remove foreign objects if any on the press roller. Then, reinstall the fuser unit.	Detaching and reattaching the fuser unit
2	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the fuser unit	The temperature is not properly detected due to the broken wire or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	

Step	Check description	Assumed cause	Measures	Reference
8	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB
9	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH unit - IH PWB	Wiring diagram
10	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit

**C6200: Fuser IH ends heating error**

The temperature detected at the fuser edge thermistor does not reach 100°C / 212°F within 60s since warm-up starts. The temperature detected at the fuser edge thermistor does not reach the ready display temperature within 60s since it reaches 100°C / 212°F during warm-up.

Step	Check description	Assumed cause	Measures	Reference
1	Removing foreign material	There is foreign material between the fuser unit and the IH unit. Or, foreign material adheres on the heat roller.	Remove foreign objects if they are in between the fuser unit and the IH unit or on the heat roller. After that, reinstall the fuser unit.	Detaching and reattaching the fuser unit
2	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
5	Replacing the fuser unit	The temperature is not properly detected due to the broken wire or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
6	Checking the IH core motor	The small size shield plate of the IH core motor does not shift to the proper position.	Execute U030 [IH Core] and check the IH core motor rotation. If the motor does not properly operate, repair it.	Executing U030
7	Replacing the current PWB	The current PWB is faulty.	Replace the current PWB.	

Step	Check description	Assumed cause	Measures	Reference
8	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
9	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
10	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB
11	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH unit - IH PWB	Wiring diagram
12	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit

**C6220: Fuser edge thermistor high temperature error**

The fuser edge thermistor detects 240°C / 464°F or more for 1s.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
4	Replacing the fuser unit	The temperature is not properly detected due to the broken wire or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the IH core motor	The small size shield plate of the IH core motor does not shift to the proper position.	Execute U030 [IH Core] and check the IH core motor rotation. If the motor does not properly operate, repair it.	
8	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit
9	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB
10	Checking the fuser edge fan motor	Dust accumulates on the fuser edge fan motor, or the motor is not properly attached.	Clean the front / rear fuser edge fan motors and reattach them.	Fan Motors Attachable Direction

### C6230: Fuser edge thermistor broken

The fuser edge thermistor detects 37°C / 98° or less for 1s when the fuser center thermistor detects 100°C / 212°F or more for 1s during warm-up.

Step	Check description	Assumed cause	Measures	Reference
1	Removing foreign material	There is foreign material between the fuser unit and the IH unit. Or, foreign material adheres on the heat roller.	Remove foreign objects if they are in between the fuser unit and the IH unit or on the heat roller. After that, reinstall the fuser unit.	Detaching and reattaching the fuser unit
2	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
5	Replacing the fuser unit	The temperature cannot be detected properly due to the heater broken or the thermistor error.	Replace the fuser unit.	Detaching and reattaching the fuser unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB



Step	Check description	Assumed cause	Measures	Reference
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
8	Checking the IH core motor	The small size shield plate of the IH core motor does not shift to the proper position.	Execute U030 [IH Core] and check the IH core motor rotation. If the motor does not properly operate, repair it.	
9	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH unit - IH PWB	Wiring diagram
10	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit
11	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

### C6250: Fuser edge thermistor low temperature error

The fuser edge thermistor detects less than 100°C / 212°F for 1s during print or standby.

Step	Check description	Assumed cause	Measures	Reference
1	Removing foreign material	There is foreign material between the fuser unit and the IH unit. Or, foreign material adheres on the heat roller.	Remove foreign objects if they are in between the fuser unit and the IH unit or on the heat roller. After that, reinstall the fuser unit.	Detaching and reattaching the fuser unit
2	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
5	Replacing the fuser unit	The temperature cannot be detected properly due to the heater broken or the thermistor error.	Replace the fuser unit.	Detaching and reattaching the fuser unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

Step	Check description	Assumed cause	Measures	Reference
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
8	Checking the IH core motor	The small size shield plate of the IH core motor does not shift to the proper position.	Execute U030 [IH Core] and check the IH core motor rotation. If the motor does not properly operate, repair it.	Detaching and reattaching the fuser IH PWB
9	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH unit - IH PWB	Wiring diagram
10	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit
11	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

**C6320: Fuser A3 thermistor high temperature error**

The fuser A3 thermistor detects 215°C / 419°F or more for 1s.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
4	Replacing the fuser unit	The temperature is not properly detected due to the wire short-circuit or the thermistor error in the fuser unit.	Replace the fuser unit.	Detaching and reattaching the fuser unit
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	

Step	Check description	Assumed cause	Measures	Reference
7	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit
8	Checking the fuser edge fan motor	Dust accumulates on the fuser edge fan motor, or the motor is not properly attached.	Clean the front / rear fuser edge fan motors and reattach them.	Fan Motors Attachable Direction

**C6330: Fuser A3 thermistor broken**

The fuser A3 thermistor detects 20°C / 68°F or less when the fuser center thermistor detects 100°C / 212°F or more during warm-up.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB • Connector of the fuser unit - IH PWB • IH PWB - Engine PWB • IH PWB - Feed PWB • IH PWB - IH unit	Wiring diagram
4	Replacing the fuser unit	The temperature cannot be detected properly due to the heater broken or the thermistor error.	Replace the fuser unit.	Detaching and reattaching the fuser unit
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
7	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit
8	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

### C6410: Fuser unit type mismatch error

"Unit Identification" code in the EEPROM of the fuser unit does not match the main unit. The fuser unit for other model is installed.

Step	Check description	Assumed cause	Measures	Reference
1	Replacing the fuser unit	The fuser unit for other models is installed.	Install the fuser unit for the applicable models.	Detaching and reattaching the fuser unit
2	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB	Wiring diagram
5	Replacing the fuser unit	The fuser unit is faulty.	Replace the fuser unit.	Detaching and reattaching the fuser unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C6600: Fuser belt rotation error

The belt rotation pulse is not input for 1.8s continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The fuser unit is not properly installed.	Check if the fuser rollers rotate manually. After checking it, reinstall the fuser unit while paying attention to the drive gears engagements.	Detaching and reattaching the fuser unit
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB	Wiring diagram
3	Replacing the fuser unit	The fuser unit components such as the fuser belt, belt rotation detection mechanism or fuser belt sensor are faulty.	Replace the fuser unit.	Detaching and reattaching the fuser unit

Step	Check description	Assumed cause	Measures	Reference
4	Applying the grease	The load increases due to the lack of grease on the bushing or the gears for the fuser motor.	Execute U030 [Fuser] and check the fuser motor operation. If the motor does not smoothly rotate, apply grease to the bushing and the gears.	Executing U030
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Fuser motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
6	Replacing the fuser drive gear	The fuser drive gear is faulty.	Replace the fuser drive gear.	
7	Replacing the fuser motor	The fuser motor is faulty.	Replace the fuser motor.	Detaching and reattaching the fuser drive unit
8	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
9	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
10	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	

**C6610: Fuser release sensor error**

1. The fuser release sensor does not turn off when passing 5s from the instruction to the fuser release motor to reduce the fuser pressure.
2. The fuser release sensor does not turn on when passing 5s from the instruction to the fuser release motor to increase the fuser pressure.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, reinstall the fuser unit so that the connector is firmly connected.	Detaching and reattaching the fuser unit
2	Checking the motor operation / connection	The connector is not properly connected. Or, the wire is faulty.	Execute U030 [Fuser Release] and check the fuser release motor operation. If the motor does not properly operate, clean the terminal of the following wire connectors and reconnect them. If there is no continuity, replace the wire. • Connector of the fuser unit - Engine PWB	Wiring diagram
3	Replacing the fuser unit	The fuser release motor or the fuser release sensor, etc. is faulty.	Replace the fuser unit.	Detaching and reattaching the fuser unit

Step	Check description	Assumed cause	Measures	Reference
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C6620: IH core motor rotation error**

1. The IH core sensor does not turn on within 5s after the IH core motor drives while the IH core sensor is off at the operation of the home position detection.
2. The IH core sensor turning off and on is not detected within 5s after the IH core motor drives while the IH core sensor is on at the operation of the home position detection.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the IH unit	The connector of the IH unit is not properly connected.	Check if the connector pins of the IH unit are bent, and correct them if bent. When there is no problem, reinstall the IH unit so that the connector is firmly connected.	Detaching and reattaching the IH unit
2	Checking the IH core sensor	The IH core sensor is not properly attached.	Reattach the IH core sensor if it comes off.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH core motor and IH core sensor (IH unit) - Front PWB?• Front PWB - Engine PWB	Wiring diagram
4	Replacing the IH unit	The IH core sensor or the IH core motor is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C6740: IH PWB high temperature error

The IGBT temperature detected by the IH PWB is 115°C / 239°F or more for 1s continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the IH fan motor	Dust accumulates on the IH fan motor.	Clean the IH fan motor.	The procedure of installing the fan motor.
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH fan motor - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
3	Replacing the IH fan motor	The IH fan motor is faulty.	Execute U037 [IH PWB] and check the IH fan motor operation. If the fan motor does not properly operate, replace it.	Executing U037
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH PWB - Engine PWB • IH PWB - Feed PWB	Wiring diagram
5	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
8	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	

### C6760: Fuser IH input excessive electric current error

The input current of the IH PWB is 20A or more (120V) / 10A or more (220-240V) for 100ms continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the fuser unit	The fuser belt is faulty.	Detach the fuser unit and check if the fuser belt is not faulty. If there is any damage, replace the fuser unit.	Detaching and reattaching the fuser unit
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH unit - IH PWB? • IH PWB - Engine PWB	Wiring diagram
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
4	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB
5	Replacing the IH unit	The IH unit is faulty.	Replace the IH unit.	Detaching and reattaching the IH unit
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C6770: IH low power error**

The IH PWB detects 60% or less of the set power value for 120ms after the fuser heating starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH unit - IH PWB?• IH PWB - Engine PWB?• IH PWB - Feed PWB?• IH PWB - LVU	Wiring diagram
2	Changing the input power	The input power is improper.	Change the input power.	
3	Replacing the LVU	The LVU is faulty.	Replace the LVU.	Detaching and reattaching the LVU
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB
6	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
7	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB
8	Replacing the IH unit	The IH unit is faulty. (The coil is broken.)	Replace the IH unit.	Detaching and reattaching the IH unit



### C6910: Engine firmware unexpected error

1. The engine stable control continued for one hour. 2. The feed motor does not drive when passing 3s or more while the drum motor or developer motor is driving. 3. The only high voltage remote signal turned on while the drum is stopped. 4. The main charge bias turned off while the developer bias turned on.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The power startup delays.	Turn the power switch and the main power switch off . After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
3	Checking the engine PWB	The engine PWB is not properly attached. Or, the connector is not properly connected.	Fix the engine PWB with the screw to make sure the grounding and reinsert the connector on the engine PWB all the way.	Detaching and reattaching the engine PWB
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C6920: IH core fan motor error

The lock-up is detected for 5s continuously while the fan motor is driving.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Execute U037 [IH Coil]. If the fan motor does not properly operate, clean the terminal of the following wire connectors and reconnect the connectors. Replace the wire when it has no continuity. • IH core fan motor - Front PWB? • Front PWB - Engine PWB	Wiring diagram
2	Checking the IH core fan motor	The IH core fan motor does not properly operate.	Clean the IH core fan motor and remove foreign objects if adhered. If not repaired, replace the IH core fan motor.	
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C6930: Rear fuser fan motor error

The lock-up is detected for 5s continuously while the fan motor is driving.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Execute U037 [Fuser Cooling]. If the fan motor does not properly operate, clean the terminal of the following wire connectors and reconnect the connectors. Replace the wire when it has no continuity. • Rear fuser fan motor - Engine PWB	Wiring diagram
2	Checking the rear fuser fan motor	The rear fuser fan motor does not properly operate.	Clean the rear fuser fan motor, and remove the foreign objects if they adhere there. If not repaired, replace the fan motor.	
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C6950: IH PWB communication error

The initial communication between the IH PWB and the engine PWB is not established. (10 times of retries are executed in 30ms interval.)

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The power startup delays.	Turn the power switch and the main power switch off . After 5s passes, turn the main power switch and the power switch on.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • IH PWB - Engine PWB	Wiring diagram
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • LVU - IH PWB	Wiring diagram
4	Checking the power supply voltage	The abnormal electric noise is mixed in the power supply voltage.	Plug the power cord into another wall outlet.	
5	Checking the LVU	The fuse on the LVU is broken.	Check the continuity of the fuse (F002) on the LVU. Then, replace the LVU if there is no continuity.	Detaching and reattaching the LVU
6	Replacing the IH PWB	The IH PWB is faulty.	Replace the IH PWB.	Detaching and reattaching the fuser IH PWB

Step	Check description	Assumed cause	Measures	Reference
7	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
8	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C6980: Fuser unit EEPROM error**

The EEPROM in the fuser unit cannot be accessed.

1. No response from the device is detected for 5s or more 5 times continuously when reading / writing the data.
2. Data written in 2 points do not match 8 times continuously.
3. Write data and read data do not match 8 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Reinstalling the fuser unit	The connector of the fuser unit is not properly connected.	Check if the pins of the connector of the fuser unit are not bent, and correct the pins if bent. If there is no problem at the pins, firmly connect the connector.	Detaching and reattaching the fuser unit
2	Replacing the fuser unit	The fuser unit is faulty.	Replace the fuser unit.	Detaching and reattaching the fuser unit
3	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7001: Toner motor error**

The lock-up is detected 5 times continuously at every 200ms and this continued 30 sets totally (5 times x 30).

Step	Check description	Assumed cause	Measures	Reference
1	Replacing the toner container	The spiral in the toner container cannot rotate.	Check the spiral in the toner container rotates manually. Then check each gear. If it is damaged, replace the toner container.	Detaching and reattaching the toner container
2	Checking the toner container drive components	The toner container drive parts does not properly operate, or have excessive load.	Pull out the toner container and execute U135. Check if the drive gears can rotate smoothly and have no excessive load. If they are faulty, replace them.	Executing U135
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •Toner motor - Engine PWB	Wiring diagram
4	Checking the toner motor	The toner motor is faulty.	Reattach the toner motor. If not repaired, replace the motor.	

Step	Check description	Assumed cause	Measures	Reference
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7101: Toner sensor error**

The sensor output value is less than 60 or 944 or more for 3s continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the toner sensor	The toner sensor is faulty.	Check the output value of the toner sensor at U155.	Executing U155
2	Reinstalling the developer unit	The developer unit is not properly installed.	Reinstall the developer unit so that the connector is firmly connected.	Detaching and reattaching the developer unit
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Front PWB - Engine PWB	Wiring diagram
4	Replacing the drive gear	The drive gears for the developer unit are damaged. (The spiral cannot rotate.)	Replace the drive gears for the developer unit.	
5	Replacing the developer unit	The developer unit (Toner sensor ) is faulty.	Replace the developer unit.	Detaching and reattaching the developer unit
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
7	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
8	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7221: LSU thermistor broken**

The input sampling value of the PD PWB (LSU thermistor) exceeds the reference value. (After the error is detected, the detected temperature is regarded as 23°C / 73°F.)

Step	Check description	Assumed cause	Measures	Reference
1	Executing U139	The PD PWB is faulty.	Execute U139 [LSU] to check the in-machine temperature around the LSU. (Go to the next step.)	Executing U139
2	Checking the connection	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is deformed or the FFC is broken, replace the FFC. • PD PWB (Connects to the APC PWB in the LSU) - LSU relay PWB • LSU relay PWB - Engine PWB	Wiring diagram
3	Replacing the LSU	The LSU (LSU thermistor) is faulty.	Replace the LSU.	Detaching and reattaching the LSU
4	Replacing the LSU relay PWB	The LSU relay PWB is faulty.	Replace the LSU relay PWB.	
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7231: LSU thermistor short-circuited**

The input sampling value of the PD PWB (LSU thermistor) is lower than the reference value. (After the error is detected, the detected temperature is regarded as 23 degrees.)

Step	Check description	Assumed cause	Measures	Reference
1	Executing U139	The PD PWB is faulty.	Execute U139 [LSU] to check the in-machine temperature around the LSU. (Go to the next step.)	Executing U139
2	Checking the connection	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is deformed or the FFC is broken, replace the FFC. • PD PWB (Connects to the APC PWB in the LSU) - LSU relay PWB • LSU relay PWB - Engine PWB	Wiring diagram
3	Replacing the LSU	The LSU (LSU thermistor) is faulty.	Replace the LSU.	Detaching and reattaching the LSU
4	Replacing the LSU relay PWB	The LSU relay PWB is faulty.	Replace the LSU relay PWB.	

Step	Check description	Assumed cause	Measures	Reference
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7241: Developer thermistor broken**

The input sampling value of the toner sensor (developer thermistor) exceeds the reference value. (After the abnormal state is detected, the detection temperature is regarded as 23°C / 73°F.)

Step	Check description	Assumed cause	Measures	Reference
1	Executing U139	The toner sensor is faulty.	Execute U139 [Developing] to check the in-machine temperature around the developer unit. (Go to the next step.)	
2	Reinstalling the developer unit	The developer unit is not properly installed.	Reinstall the developer unit so that the connector is firmly connected.	Detaching and reattaching the developer unit
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Front PWB - Engine PWB	Wiring diagram
4	Replacing the developer unit	The developer unit (Toner sensor ) is faulty.	Replace the developer unit.	Detaching and reattaching the developer unit
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7251: Developer thermistor short-circuited**

The input sampling value of the toner sensor (developer thermistor) is less than the reference value. (After the abnormal state is detected, the detection temperature is regarded as 23°C / 73°F.)

Step	Check description	Assumed cause	Measures	Reference
1	Executing U139	The toner sensor is faulty.	Execute U139 [Developing] to check the in-machine temperature around the developer unit. (Go to the next step.)	
2	Reinstalling the developer unit	The developer unit is not properly installed.	Reinstall the developer unit so that the connector is firmly connected.	Detaching and reattaching the developer unit
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Front PWB - Engine PWB	Wiring diagram
4	Replacing the developer unit	The developer unit (Toner sensor ) is faulty.	Replace the developer unit.	Detaching and reattaching the developer unit
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7301: Toner hopper motor error**

It occurs 15 times continuously that the screw sensor does not detect the pulse for 200ms when driving the toner hopper motor.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the toner hopper motor	The toner hopper motor is faulty.	Execute U135 [Hopper] and check the toner hopper motor operation. (Go to the next step.)	Executing U135
2	Checking the toner hopper drive section	The toner hopper screw does not properly rotate due to excessive load. (The pulse plate does not rotate.)	Rotate the toner hopper screw manually. Then, check if toner is not clogged in the toner hopper, and clean inside the toner hopper if necessary.	Detaching and reattaching the inner unit

Step	Check description	Assumed cause	Measures	Reference
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Toner hopper motor - Front PWB? • Screw sensor - Front PWB? • Front PWB - Engine PWB	Wiring diagram
4	Checking the screw sensor	The screw sensor is faulty.	Reattach the screw sensor. If not repaired, replace the sensor.	
5	Replacing the drive parts	The drive transmission from the toner hopper motor is faulty.	Reattach the drive gears or the toner hopper motor. If not repaired, replace the parts faulty in operation. Or, replace the inner unit.	Detaching and reattaching the inner unit
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7401: Developer unit type mismatch error**

"Unit Identification" of the EEPROM in the developer unit does not match the main unit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Developer unit - Front PWB? • Front PWB - Engine PWB	Wiring diagram
2	Replacing the developer unit	The developer unit (EEPROM) is faulty.	Replace the developer unit.	Detaching and reattaching the developer unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB



### C7411: Drum unit type mismatch error

"Unit Identification" of the EEPROM in drum unit does not match the main unit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Drum unit - Front PWB? • Front PWB - Engine PWB	Wiring diagram
2	Replacing the drum unit	The drum unit (EEPROM) is faulty.	Replace the drum unit.	Detaching and reattaching the drum unit
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C7460: Developer shutter error

The power is turned on when the developer shutter is locked.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the developer shutter	The developer shutter is locked.	Unlock the developer shutter.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Developer shutter sensor - Front PWB? • Front PWB - Engine PWB	Wiring diagram
3	Checking the developer shutter sensor	The developer shutter sensor is not properly attached or faulty.	Reattach the developer shutter sensor. If not repaired, replace the sensor.	
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C7470: Toner collection fan motor 1 error

The lock-up is detected for 5s continuously while the toner collection fan motor 1 is driving.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Toner collection fan motor 1 - Engine PWB	Wiring diagram
2	Replacing the toner collection box	The toner collection fan motor is faulty.	Execute U037 [Toner]. If the operation is faulty, replace the toner collection box.	
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	

### C7480: Toner collection fan motor 2 error

The lock-up is detected for 5s continuously while the toner collection fan motor 2 is driving.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Toner collection fan motor 2 - Engine PWB	Wiring diagram
2	Replacing the toner collection box	The toner collection fan motor is faulty.	Execute U037 [Toner]. If the operation is faulty, replace the toner collection box.	
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	

### C7602: ID sensor error

- Dark potential error: The sensor output value (FrontDarkP and FrontDardS) is less than 0.15V, or more than 0.80V. • Light potential error: FrontBrightS is less than FrontDarkS, or FrontBrightP is less than FrontDarkP+0.5V.

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning the ID sensor	The ID sensor is dirty.	Clean the ID sensor surface.	
2	Checking the ID sensor shutter	The ID sensor shutter does not operate properly.	If the ID sensor shutter does not operate properly when executing U033 [ID Sensor], reattach the cleaning solenoid.	Executing U033
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Cleaning solenoid - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
4	Replacing the cleaning solenoid	The cleaning solenoid is faulty.	Replace the cleaning solenoid.	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the ID sensor	The ID sensor is not properly attached.	Reattach the ID sensor.	
6	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • ID sensor - Feed PWB	Wiring diagram
7	Replacing the ID sensor	The ID sensor is faulty.	Check if the value of "T7 CTD" at U465 fluctuates before and after executing Calibration. If not (no adjustment), replace the ID sensor.	Executing U465
8	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
9	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
10	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7800: Outer thermistor broken**

The external temperature sensor (external thermistor) cannot be accessed. No response is received from the external thermistor 5 times continuously for 5ms or more when accessing the external thermistor.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Room temperature sensor - Front PWB? • Front PWB - Engine PWB	Wiring diagram
2	Replacing the external temperature sensor	The external temperature sensor is faulty.	Replace the external temperature sensor.	
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
4	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

### C7850: Power source fan motor error

The lock-up is detected for 5s continuously when the power source fan motor drives.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Power source fan motor - Engine PWB	Wiring diagram
2	Checking the power source fan motor	The power source fan motor does not properly rotate due to dirt.	Clean power source fan motor and check if the fan can rotate manually. Then, reattach it.	Fan Motors Attachable Direction
3	Replacing the power source fan motor	The power source fan motor is faulty.	Execute U037 [Low Volt] and check the power source fan motor operation. If the fan motor does not properly operate, replace it.	Fan Motors Attachable Direction
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	

### C7901: Drum unit EEPROM error

The EEPROM in the drum unit cannot be accessed. 1. No response from the device is detected for 5s or more 5 times continuously when reading / writing the data. 2. Data written in 2 points do not match 8 times continuously. 3. Write data and read data does not match 8 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The data stored in the EEPROM in the drum unit is faulty.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Reinstalling the drum unit	The drum unit is not properly installed.	Reinstall drum unit BK so that the connector firmly connects.	Detaching and reattaching the drum unit
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Drum unit - Front PWB? • Front PWB - Engine PWB	Wiring diagram
4	Replacing the drum unit	The EEPROM in the drum unit is faulty.	Replace the drum unit.	Detaching and reattaching the drum unit
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7911: Developer unit EEPROM error**

The toner sensor (EEPROM) in the developing unit cannot be accessed. 1. No response from the device is detected for 5s or more 5 times continuously at read/write. 2. Data written in 2 points do not match 8 times continuously. 3. Write data and read data does not match 8 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The data in the toner sensor (EEPROM) of the developer unit is faulty.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Reinstalling the developer unit	The developer unit is not properly installed.	Reinstall the developer unit so that the connector is firmly connected.	Detaching and reattaching the drum unit
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Developer unit - Front PWB • Front PWB - Engine PWB	Wiring diagram
4	Replacing the developer unit	The toner sensor (EEPROM) of the developer unit is faulty.	Replace the developer unit.	Detaching and reattaching the developer unit
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	
7	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C7941: LSU EEPROM error**

The APC PWB (EEPROM) in the LSU cannot be accessed. 1. Data written at 2 points do not match 8 times continuously. 2. Write data and read data do not match 8 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The data of the APC PWB (EEPROM) in the LSU is faulty.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is deformed or the FFC is broken, replace the FFC. • APC PWB (LSU) - LSU relay PWB • LSU relay PWB - Engine PWB	Wiring diagram
3	Replacing the LSU	The APC PWB (EEPROM) in the LSU is faulty.	Replace the LSU.	Detaching and reattaching the LSU

Step	Check description	Assumed cause	Measures	Reference
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
5	Replacing the LSU relay PWB	The LSU relay PWB is faulty.	Replace the LSU relay PWB.	
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C8010: Punch motor error 1**

**Object: 4000-sheet finisher + Punch unit**

1. The punch home position sensor does not turn on when passing 200ms after driving the punch motor. 2. The pulse plate does not count the specified pulse when passing 300ms after the punch operation starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the punch unit	The punch unit is not assembled properly.	If the punch unit is not shifted manually, repair the part that restricts the operation.	
2	Checking the punch cam drive components	The punch cam drive parts are not properly attached or faulty.	Reattach the punch cam drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Punch motor - PH main PWB • Punch home position sensor - PH main PWB • PH main PWB - DF main PWB	Wiring diagram
4	Replacing the punch motor	The punch motor is faulty.	Execute U240 [Motor] > [Punch]. If the punch motor does not properly operate, replace it.	Executing U240
5	Checking the punch home position sensor	The punch home position sensor is not properly attached or faulty.	Execute U241 [Punch] > [Punch HP]. If the PH home position sensor does not properly operate, reattach it. If not repaired, replace the sensor.	Executing U241
6	Firmware upgrade	The firmware is not the latest version.	Upgrade the PH firmware to the latest version.	Firmware Update
7	Replacing the PH main PWB	The PH main PWB is faulty.	Replace the PH main PWB.	
8	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8020: Punch motor error 2**

**Object: 4000-sheet finisher + Punch unit**

The home position is not aligned within 3s when initializing the home position or standby.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the punch unit	The punch unit is not assembled properly.	If the punch unit is not shifted manually, repair the part that restricts the operation.	
2	Checking the punch cam drive components	The punch cam drive parts are not properly attached or faulty.	Reattach the punch cam drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Punch motor - PH main PWB • PH main PWB - DF main PWB	Wiring diagram
4	Replacing the punch motor	The punch motor is faulty.	Execute U240 [Motor] > [Punch]. If the punch motor does not properly operate, replace it.	Executing U240
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the PH firmware to the latest version.	Firmware Update
6	Replacing the PH main PWB	The PH main PWB is faulty.	Replace the PH main PWB.	
7	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8030: Punch motor error 3**

**Object: 4000-sheet finisher + Punch unit**

The home position detection does not turn off within 50ms when initializing the home position.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the punch unit	The punch unit is not assembled properly.	If the punch unit is not shifted manually, repair the part that restricts the operation.	
2	Checking the punch cam drive components	The punch cam drive parts are not properly attached or faulty.	Reattach the punch cam drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Punch motor - PH main PWB • PH main PWB - DF main PWB	Wiring diagram
4	Replacing the punch motor	The punch motor is faulty.	Execute U240 [Motor] > [Punch]. If the punch motor does not properly operate, replace it.	Executing U240
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the PH firmware to the latest version.	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
6	Replacing the PH main PWB	The PH main PWB is faulty.	Replace the PH main PWB.	
7	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8090: DF paddle motor error

Object: 4000-sheet finisher

1. The DF paddle sensor does not turn on when passing 1s during the DF paddle motor drive. 2. The DF paddle sensor does not turn off after driving for 1s while the sensor is on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DF paddle drive components	The DF paddle drive parts are not properly attached or faulty.	Reattach the DF paddle drive parts. If not repaired, replace them.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •DF paddle motor - DF main PWB • DF paddle sensor - DF main PWB	Wiring diagram
3	Replacing the DF paddle motor	The DF paddle motor is faulty.	Execute U240 [Motor] > [Beat]. If the DF paddle motor does not properly operate, replace it.	Executing U240
4	Replacing the DF paddle sensor	The DF paddle sensor is faulty.	Execute U241 [Finisher] > [Lead Paddle]. If the DF paddle sensor does not properly operate, replace it.	Executing U241
5	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8100: DF eject release motor error

Object: 4000-sheet finisher

1. The DF paper bundle ejection switch does not turn on when passing 1s while driving the DF ejection release motor. 2. The DF paper bundle ejection switch does not turn off when driving it for 1s after it turns on.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DF paper stack eject unit	The eject guide in the DF paper stack eject unit is deformed.	Correct the DF paper stack eject unit.	
2	Checking the DF paper stack eject unit drive components	The DF paper bundle ejection unit drive parts are not properly attached or faulty.	Reattach the DF paper bundle eject unit drive parts. If not repaired, replace them.	



Step	Check description	Assumed cause	Measures	Reference
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF ejection release motor - DF main PWB • DF paper bundle ejection switch - DF main PWB	Wiring diagram
4	Replacing the DF eject release motor	The DF eject release motor is faulty.	Execute U240 [Motor] > [Eject Unlock (HP)]. If the DF exit release motor does not properly operate, replace it.	Executing U240
5	Checking the DF paper stack eject switch	The DF paper bundle ejection switch is not properly attached or faulty.	Reattach the DF paper bundle ejection switch. If not repaired, replace the switch.	
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8110: DF shift motor 1 error

Object: 4000-sheet finisher

The DF shift sensor 1 does not turn ON or OFF when driving DF shift motor 1 for 3s.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the front shift guide	The front shift guide is not assembled properly.	If the front shift guide is not shifted manually, repair the part that restricts the operation.	
2	Checking the front shift guide drive components	The front shift guide drive parts are not properly attached or faulty.	Reattach the front shift guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •DF shift motor 1 - DF main PWB • DF shift sensor 1 - DF main PWB	Wiring diagram
4	Replacing DF shift motor 1	DF shift motor 1 is faulty.	Replace DF shift motor 1.	
5	Checking DF shift sensor 1	DF shift sensor 1 is not properly attached or faulty.	Reattach DF shift sensor 1 and execute U241 [Finisher] > [Shift Front HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8120: DF shift motor 2 error

Object: 4000-sheet finisher

The DF shift sensor 2 does not turn ON or OFF when driving DF shift motor 2 for 3s.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the rear shift guide	The rear shift guide is not assembled properly.	If the rear shift guide is not shifted manually, repair the part that restricts the operation.	
2	Checking the rear shift guide drive components	The rear shift guide drive parts are not properly attached or faulty.	Reattach the rear shift guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF shift motor 2 - DF main PWB • DF shift sensor 2 - DF main PWB	Wiring diagram
4	Checking DF shift motor 2	DF shift motor 2 is faulty.	Replace DF shift motor 2.	
5	Checking DF shift sensor 2	DF shift sensor 2 is not properly attached or faulty.	Reattach DF shift sensor 2 and execute U241 [Finisher] > [Shift Tail HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8130: DF shift release motor error

Object: 4000-sheet finisher

1. The DF shift release sensor does not turn on when driving the DF shift release motor in the direction of the home position detection for 3s. 2. The DF shift release sensor does not turn off when the DF shift release motor in the direction of the home position detection off for 3s.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the rear shift guide	The rear shift guide is not assembled properly.	If the rear shift guide is not shifted manually, repair the part that restricts the operation.	
2	Checking the rear shift guide drive components	The rear shift guide drive parts are not properly attached or faulty.	Reattach the rear shift guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF shift release motor - DF main PWB • DF shift release sensor - DF main PWB	Wiring diagram
4	Checking the DF shift release motor	The DF shift release motor is faulty.	Replace the DF shift release motor.	

Step	Check description	Assumed cause	Measures	Reference
5	Checking the DF shift release sensor	The DF shift release sensor is not properly attached or faulty.	Reattach the DF shift release sensor and execute U241 [Finisher] > [Shift Unlock HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8140: Main tray error 1**

**Object: 4000-sheet finisher**

DF tray sensor 1 or 2, or, DF tray upper surface sensor 1 or 2 does not turn on when passing 30s while lifting up the main tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the main tray	The main tray is not properly assembled.	If the main tray does not move up and down manually, repair the part that restricts the operation.	
2	Checking the drive parts	The main tray drive parts are not properly attached or faulty.	Reattach the main tray drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF tray motor - DF main PWB	Wiring diagram
4	Replacing the DF tray motor	The DF tray motor is faulty.	Execute U240 [Motor] > [Tray]. If the DF tray motor does not properly operate, replace it.	Executing U240
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF tray sensor 1 - DF main PWB • DF tray sensor 2 - DF main PWB • DF tray upper surface sensor 1 - DF main PWB • DF tray upper surface sensor 2 - DF main PWB	Wiring diagram
6	Checking DF tray sensor 1, 2	DF tray sensor 1 or 2 is not properly attached or faulty.	Reattach DF tray sensor 1 or 2 and execute U241 [Finisher] > [Tray U-Limit] or [Tray HP2]. If the sensor does not properly operate, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
7	Checking DF tray upper side sensor 1, 2	DF tray upper surface sensor 1 or 2 is not properly attached or faulty.	Reattach DF tray upper surface sensor 1 or 2 and execute U241 [Finisher] > [Tray Top]. If the sensor does not properly operate, replace it.	Executing U241
8	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8150: Main tray error 2**

**Object: 4000-sheet finisher**

DF tray sensor 1 or 2, or, DF tray upper surface sensor 1 or 2 do not turn on and off when passing 5s when the main tray descends.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the main tray	The main tray is not properly assembled.	If the main tray does not move up and down manually, repair the part that restricts the operation.	
2	Checking the drive parts	The main tray drive parts are not properly attached or faulty.	Reattach the main tray drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF tray motor - DF main PWB	Wiring diagram
4	Replacing the DF tray motor	The DF tray motor is faulty.	Execute U240 [Motor] > [Tray]. If the DF tray motor does not properly operate, replace it.	Executing U240
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF tray sensor 1 - DF main PWB • DF tray sensor 2 - DF main PWB • DF tray upper surface sensor 1 - DF main PWB • DF tray upper surface sensor 2 - DF main PWB	Wiring diagram
6	Checking DF tray sensor 1, 2	DF tray sensor 1 or 2 is not properly attached or faulty.	Reattach DF tray sensor 1 or 2 and execute U241 [Finisher] > [Tray U-Limit] or [Tray HP2]. If the sensor does not properly operate, replace it.	Executing U241

Step	Check description	Assumed cause	Measures	Reference
7	Checking DF tray upper side sensor 1, 2	DF tray upper surface sensor 1 or 2 is not properly attached or faulty.	Reattach DF tray upper surface sensor 1 or 2 and execute U241 [Finisher] > [Tray Top]. If the sensor does not properly operate, replace it.	Executing U241
8	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8160: DF tray motor error 3

Object: 4000-sheet finisher

DF tray sensor 4 or 5 does not turn on when passing 60s while descending the main tray.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the main tray	The main tray is not properly assembled.	If the main tray does not move up and down manually, repair the part that restricts the operation.	
2	Checking the drive parts	The main tray drive parts are not properly attached or faulty.	Reattach the main tray drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF tray motor - DF main PWB	Wiring diagram
4	Replacing the DF tray motor	The DF tray motor is faulty.	Execute U240 [Motor] > [Tray]. If the DF tray motor does not properly operate, replace it.	Executing U240
5	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF tray sensor 4 - DF main PWB • DF tray sensor 5 (When installing the Folding Unit) - DF main PWB	Wiring diagram
6	Checking DF tray sensor 4, 5	DF tray sensor 4 or 5 is not properly attached or faulty.	Reattach DF tray sensor 4 or 5 and execute U241 [Finisher] > [Tray L-Limit] or [Tray L-Limit (BL)]. If the sensor does not properly operate, replace it.	Executing U241
7	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8170: DF side registration motor 1 error 1

Object: 4000-sheet finisher

The home position cannot be detected after passing 3s when relocating to the home position.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the front DF side registration guide	The front DF side registration guide is not assembled properly.	If the front DF side registration guide is not shifted manually, repair the part that restricts the operation.	
2	Checking the front DF side registration guide drive components	The front DF side registration guide drive parts are not properly attached or faulty.	Reattach the front DF side registration guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF side registration motor 1 - DF main PWB • DF side registration sensor 1 - DF main PWB	Wiring diagram
4	Replacing DF side registration motor 1	DF side registration motor 1 is faulty.	Execute U240 [Motor] > [Width Test (A3)] or [Width Test (LD)]. If DF side registration motor 1 does not properly operate, replace it.	Executing U240
5	Checking DF side registration sensor 1	DF side registration sensor 1 is not properly attached or faulty.	Reattach DF side registration sensor 1 and execute U241 [Finisher] > [Width Front HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8180: DF side registration motor 1 error 2

Object: 4000-sheet finisher

J6810/J6811/J6812 (Front DF side registration jam) was detected 2 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the front DF side registration guide	The front side registration guide is not assembled properly.	If the front DF side registration guide is not shifted manually, repair the part that restricts the operation.	
2	Checking the front DF side registration guide drive components	The front DF side registration guide drive parts are not properly attached or faulty.	Reattach the front DF side registration guide drive components.	
3	Replacing the front DF side registration guide drive components	The front DF side registration guide drive components are faulty.	Replace the front DF side registration guide drive components.	

Step	Check description	Assumed cause	Measures	Reference
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF side registration motor 1 - DF main PWB • DF side registration sensor 1 - DF main PWB	Wiring diagram
5	Checking DF side registration motor 1	DF side registration motor 1 is faulty.	Execute U240 [Motor] > [Width Test (A3)] or [Width Test (LD)]. If DF side registration motor 1 does not properly operate, replace it.	Executing U240
6	Checking DF side registration sensor 1	DF side registration sensor 1 is not properly attached or faulty.	Reattach DF side registration sensor 1 and execute U241 [Finisher] > [Width Front HP]. If the sensor does not properly operate, replace it.	Executing U241
7	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8190: DF side registration motor 2 error 1

Object: 4000-sheet finisher

The home position is not detected when passing 3s while executing the operation of returning to the home position.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the rear DF side registration guide	The rear DF side registration guide is not assembled properly.	If the rear DF side registration guide is not shifted manually, repair the part that restricts the operation.	
2	Checking the rear DF side registration guide drive components	The rear DF side registration guide drive parts are not properly attached or faulty.	Reattach the rear DF side registration guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF side registration motor 2 - DF main PWB • DF side registration sensor 2 - DF main PWB	Wiring diagram
4	Replacing DF side registration motor 2	DF side registration motor 2 is faulty.	Execute U240 [Motor] > [Width Test (A3)] or [Width Test (LD)]. If DF side registration motor 2 does not properly operate, replace it.	Executing U240

Step	Check description	Assumed cause	Measures	Reference
5	Checking DF side registration sensor 2	DF side registration sensor 2 is not properly attached or faulty.	Reattach DF side registration sensor 2 and execute U241 [Finisher] > [Width Tail HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8200: DF side registration motor 2 error 2**

**Object: 4000-sheet finisher**

J6910 (Rear DF side registration jam) is detected twice continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the rear DF side registration guide	The rear DF side registration guide is not assembled properly.	If the rear DF side registration guide is not shifted manually, repair the part that restricts the operation.	
2	Checking the rear DF side registration guide drive components	The rear side registration guide drive parts are not properly attached or faulty.	Reattach the rear DF side registration guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF side registration motor 2 - DF main PWB • DF side registration sensor 2 - DF main PWB	Wiring diagram
4	Replacing DF side registration motor 2	DF side registration motor 2 is faulty.	Execute U240 [Motor] > [Width Test (A3)] or [Width Test (LD)]. If DF side registration motor 2 does not properly operate, replace it.	Executing U240
5	Checking DF side registration sensor 2	DF side registration sensor 2 is not properly attached or faulty.	Reattach DF side registration sensor 2 and execute U241 [Finisher] > [Width Tail HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB



C8210: DF staple motor front/rear error

Object: 4000-sheet finisher

The home position is not detected when passing 3s while returning to the home position at the initial operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DF staple unit	The DF staple unit is not assembled properly.	If the DF staple unit is not shifted manually back and forth, repair the part that restricts the operation.	
2	Checking the DF staple unit drive components	The DF staple unit drive parts are not properly attached or faulty.	Reattach the DF staple unit drive parts. If not repaired, replace the parts.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF staple motor - DF main PWB • DF staple sensor - DF main PWB	Wiring diagram
4	Replacing the DF staple motor	The DF staple motor is faulty.	Execute U240 [Motor] > [Staple]. If the DF staple motor does not properly operate, replace the DF staple unit.	Detaching and reattaching the DF staple unit
5	Checking the DF staple sensor	The DF staple sensor is not properly attached or faulty.	Reattach the DF staple sensor. Then, replace the DF staple unit if the sensor is not fixed.	Detaching and reattaching the DF staple unit
6	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

C8230: DF staple motor error

Object: 4000-sheet finisher

J7000 (DF staple jam) is detected twice continuously. (Condition of detecting 2nd paper jam: The home position is not detected when passing 600ms since the motor starts up.)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DF staple unit	The DF staple unit is not assembled properly.	If the DF staple cannot operate manually without paper jam, repair the part that restricts the DF staple.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF staple unit - DF main PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
3	Replacing the DF staple unit	The DF staple unit is faulty.	Replace the DF staple unit.	Detaching and reattaching the DF staple unit
4	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8260: DF middle motor HP detection error**

**Object: 4000-sheet finisher**

J7900 (DF paddle jam) is detected twice continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DF paddle drive components	The DF paddle drive parts are not properly attached or faulty.	Reattach or replace the DF paddle drive components.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DF middle motor - DF main PWB • DF paddle sensor - DF main PWB	Wiring diagram
3	Replacing the DF middle motor	The DF middle motor is faulty.	Execute U240 [Motor] > [Middle (H)] or [Middle (L)]. If the DF middle motor does not properly operate, replace it.	Executing U240
4	Checking the DF paddle sensor	The DF paddle sensor is not properly attached or faulty.	Reattach the DF paddle sensor and execute U241 [Finisher] > [Lead Paddle]. If the sensor does not properly operate, replace it.	Executing U241
5	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8300: Main program error / Folding unit communication error**

**Object: 4000-sheet finisher + Folding unit**

The main program of the folding unit is faulty when turning the power on. The communication error appears 10 times continuously after finishing the folding unit firmware version reading.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The operation program does not properly operate.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the BF firmware and the DF firmware to the latest version.	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
3	Checking the BF set switch	The BF set switch is not properly attached.	Reattach the BF set switch.	
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF main PWB - DF main PWB	Wiring diagram
5	Replacing the BF set switch	The BF set switch is faulty.	Execute U241 [Booklet] > [Set]. If the BF set switch does not properly operate, replace it.	Executing U241
6	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	
7	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8310: BF side registration motor 2 error**

**Object: 4000-sheet finisher + Folding unit**

BF side registration sensor 2 does not turn on after passing 1s during the initial operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the upper BF side registration guide	The upper BF side registration guide is not assembled properly.	If the upper BF side registration guide is not shifted manually back and forth, repair the part that restricts the operation.	
2	Checking the upper BF side registration guide drive components	The upper BF side registration guide drive parts are not properly attached or faulty.	Reattach the upper BF side registration guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF side registration motor 2 - BF main PWB • BF side registration sensor 2 - BF main PWB	Wiring diagram
4	Replacing BF side registration motor 2	BF side registration motor 2 is faulty.	Execute U240 [Booklet] > [Width Test(A3)] or [Width Test(LD)]. If BF side registration motor 2 does not properly operate, replace it.	Executing U240
5	Checking BF side registration sensor 2	BF side registration sensor 2 is not properly attached or faulty.	Reattach BF side registration sensor 2 and execute U241 [Booklet] > [Width Down HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

### C8320: BF adjustment motor error

#### Object: 4000-sheet finisher + Folding unit

At the initialization, turning on of the BF adjustment sensor is not detected after 2.5s passes.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF shift belt	The BF shift belt is not assembled properly.	If the BF shift belt is not operated manually, repair the part that restricts the operation.	
2	Checking the BF shift belt drive components	The BF shift belt drive parts are not properly attached or faulty.	Reattach the BF shift belt drive parts. Reattach it if the belt comes off. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF adjustment motor 1, 2 - BF main PWB • BF adjustment sensor 1, 2 - BF main PWB	Wiring diagram
4	Replacing BF adjustment motor 1, 2	BF adjustment motor 1 or 2 is faulty.	Execute U240 [Booklet] > [Bundle Down] or [Bundle Up]. If BF adjustment motor 1 or 2 does not properly operate, replace them.	Executing U240
5	Checking BF adjustment sensor 1, 2	BF adjustment sensor 1 or 2 is not properly attached or faulty.	Reattach BF adjustment sensor 1 or 2 and execute U241 [Booklet] > [Width Down HP] or [Bundle Up HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

### C8330: BF blade motor error

#### Object: 4000-sheet finisher + Folding unit

The BF blade sensor does not turn on after passing 3s during the initial operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF blade	The BF blade is not assembled properly.	If the BF blade is not operated manually, repair the part that restricts the operation.	
2	Checking the BF blade drive components	The BF blade drive parts are not properly attached or faulty.	Reattach the BF blade drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF blade motor - BF main PWB • BF blade sensor - BF main PWB	Wiring diagram
4	Replacing the BF blade motor	The BF blade motor is faulty.	Execute U240 [Booklet] > [Blade]. If the BF blade motor does not properly operate, replace it.	Executing U240

Step	Check description	Assumed cause	Measures	Reference
5	Checking the BF blade sensor	The BF blade sensor is faulty.	Reattach the BF blade sensor and reinsert the connector. Next, execute U241 [Booklet] > [Blade HP]. If it does not properly operate, replace the sensor.	Executing U241
6	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

**C8340: BF staple motor error 1**

**Object: 4000-sheet finisher + Folding unit**

J7600 (BF staple jam) is detected twice continuously. (Condition of detecting 2nd paper jam: The home position is not detected when passing 600ms since the motor starts up.)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF staple unit	The BF staple unit is not assembled properly.	If the BF staple unit is not operated manually, repair the part that restricts the operation.	
2	Checking the BF staple unit drive components	The BF staple unit drive parts are not properly attached or faulty.	Reattach the BF staple unit drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF staple unit - BF main PWB	Wiring diagram
4	Replacing the BF staple motor	The BF staple motor is faulty.	Execute U240 [Booklet] > [Staple]. If the BF staple motor does not properly operate, replace it.	Executing U240
5	Replacing the BF staple unit	The BF staple unit is faulty.	Replace the BF staple unit.	
6	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

**C8350: BF side registration motor 1 error**

**Object: 4000-sheet finisher + Folding unit**

BF side registration sensor 1 does not turn on after passing 1s during the initial operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the lower BF side registration guide	The lower BF side registration guide is not assembled properly.	If the lower BF side registration guide is not operated manually, repair the part that restricts the operation.	
2	Checking the lower BF side registration guide drive components	The lower BF side registration guide drive parts are not properly attached or faulty.	Reattach the lower BF side registration guide drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF side registration motor 1 - BF main PWB • BF side registration sensor 1 - BF main PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
4	Replacing BF side registration motor 1	BF side registration motor 1 is faulty.	Execute U240 [Booklet] > [Width Test(A3)] or [Width Test(LD)]. If BF side registration motor 1 does not properly operate, replace it.	Executing U240
5	Checking BF side registration sensor 1	BF side registration sensor 1 is not properly attached or faulty.	Reattach BF side registration sensor 1 and execute U241 [Booklet] > [Width Up HP]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

**C8360: BF main motor error**

**Object: 4000-sheet finisher + Folding unit**

The lock-up signal was detected for 1s continuously during the motor operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF conveying roller	The BF conveying roller is not assembled properly.	If the BF conveying roller is not rotated manually, repair the part that restricts the operation.	
2	Checking the BF conveying roller drive parts	The BF conveying roller drive parts are not properly attached or faulty.	Reattach the BF conveying roller drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF main motor - BF main PWB	Wiring diagram
4	Replacing the BF main motor	The BF main motor is faulty.	Execute U240 [Booklet] > [Folding]. If the BF main motor does not properly operate, replace it.	Executing U240
5	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

**C8370: BF staple motor error 2**

**Object: 4000-sheet finisher + Folding unit**

J7600 (BF staple jam) is detected twice continuously. (Condition of detecting 2nd paper jam: The lock-up detection signal is outputs for 500ms continuously during the motor operation.)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the BF staple unit	The BF staple unit is not assembled properly.	If the BF staple unit is not operated manually, repair the part that restricts the operation.	
2	Checking the BF staple unit drive components	The BF staple unit drive parts are not properly attached or faulty.	Reattach the BF staple unit drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF staple unit - BF main PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
4	Replacing the BF staple motor	The BF staple motor is faulty.	Execute U240 [Booklet] > [Staple]. If the BF staple motor does not properly operate, replace it.	Executing U240
5	Replacing the BF staple unit	The BF staple unit is faulty.	Replace the BF staple unit.	
6	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

**C8410: Punch slide motor error 1**

**Object: 4000-sheet finisher + Punch unit**

The punch slide sensor does not turn on after the home position shifts 30mm.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the punch unit	The punch unit is not assembled properly.	If the punch slide section is not shifted manually forward-backward, repair the part that restricts the operation.	
2	Checking the punch drive components	The punch cam drive parts are not properly attached or faulty.	Reattach the punch drive parts. If not repaired, replace them.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Punch slide motor - PH main PWB • Punch slide sensor - PH main PWB • PH main PWB - DF main PWB	Wiring diagram
4	Replacing the PH slide motor	The punch slide motor is faulty.	Execute U240 [Motor] > [Punch Move]. If the punch slide motor does not properly operate, replace it.	Executing U240
5	Checking the punch slide sensor	The punch slide sensor is not properly attached or faulty.	Reattach the punch slide sensor. If not repaired, replace it.	
6	Replacing the PH main PWB	The PH main PWB is faulty.	Replace the PH main PWB.	
7	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8420: Punch slide motor error 2**

**Object: 4000-sheet finisher + Punch unit**

The paper edge cannot be detected even if shifting 30mm when detecting the paper edge.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the punch unit	The punch unit is not assembled properly.	If the punch slide section is not shifted manually forward-backward, repair the part that restricts the operation.	
2	Checking the punch drive components	The punch cam drive parts are not properly attached or faulty.	Reattach the punch drive parts. If not repaired, replace them.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Punch slide motor - PH main PWB • PH paper edge sensor 1, 2 - PH main PWB • PH main PWB - DF main PWB	Wiring diagram
4	Replacing the PH slide motor	The punch slide motor is faulty.	Execute U240 [Motor] > [Punch Move]. If the punch slide motor does not properly operate, replace it.	Executing U240
5	Checking the PH paper edge sensor 1, 2	PH paper edge sensor 1 or 2 is not properly attached or faulty.	Reattach PH paper edge sensor 1 or 2 and execute U241 [Punch] > [Edge Face1] or [Edge Face2]. If the sensor does not properly operate, replace it.	Executing U241
6	Replacing the PH main PWB	The PH main PWB is faulty.	Replace the PH main PWB.	
7	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8430: Main program error (Punch unit) / Punch unit communication error**

**Object: 4000-sheet finisher + Punch unit**

The main program of the punch unit is faulty when turning the power on. The communication error appears 10 times continuously after finishing the punch unit firmware version reading.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The operation program does not properly operate.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the PH firmware and the DF firmware to the latest version.	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • PH main PWB - DF main PWB	Wiring diagram
4	Replacing the PH main PWB	The PH main PWB is faulty.	Replace the PH main PWB.	
5	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB



**C8500: Main program error (Mail Box) / Mail Box communication error**

**Object: 4000-sheet finisher + Mail box**

The main program of the mail box is faulty when turning the power on. The communication error appears 10 times continuously after finishing the mail box firmware version reading.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The operation program does not properly operate.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the MB firmware and the DF firmware to the latest version.	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • MB main PWB - DF main PWB	Wiring diagram
4	Replacing the MB main PWB	The MB main PWB is faulty.	Replace the MB main PWB.	
5	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8510: MB conveying motor error 1**

**Object: 4000-sheet finisher + Mail box**

The MB home position sensor does not turn on after passing 5s during the initial operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the MB conveying roller	The MB conveying roller is not assembled properly.	If the MB conveying roller is not rotated manually, repair the part that restricts the operation.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • MB conveying motor - MB main PWB • MB home position sensor - MB main PWB	Wiring diagram
3	Replacing the MB conveying motor	The MB conveying motor is faulty.	Execute U240 [Mail Box] > [Conv]. If the MB conveying motor does not properly operate, replace it.	Executing U240
4	Checking the MB home position sensor	The MB home position sensor is not properly attached or faulty.	Reattach the MB home position sensor and execute U241 [Mail Box] > [Motor HP]. If the sensor does not properly operate, replace it.	Executing U241
5	Replacing the MB main PWB	The MB main PWB is faulty.	Replace the MB main PWB.	

C8520: MB conveying motor error 2

Object: 4000-sheet finisher + Mail box

The MB home position sensor does not turn off after passing 1s during the standby operation.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the MB conveying roller	The MB conveying roller is not assembled properly.	If the MB conveying roller is not rotated manually, repair the part that restricts the operation.	
2	Checking the MB conveying roller drive components	The MB conveying roller drive parts are not properly attached or faulty.	Reattach the MB conveying roller drive components.	
3	Replacing the MB conveying roller drive components	The MB conveying roller drive components are faulty.	Replace the MB conveying roller drive components.	
4	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • MB conveying motor - MB main PWB • MB home position sensor - MB main PWB	Wiring diagram
5	Replacing the MB conveying motor	The MB conveying motor is faulty.	Execute U240 [Mail Box] > [Conv]. If the MB conveying motor does not properly operate, replace it.	Executing U240
6	Checking the MB home position sensor	The MB home position sensor is not properly attached or faulty.	Reattach the MB home position sensor and execute U241 [Mail Box] > [Motor HP]. If the sensor does not properly operate, replace it.	Executing U241
7	Replacing the MB main PWB	The MB main PWB is faulty.	Replace the MB main PWB.	

### C8600: DF adjust pulley pressure release motor error

#### Object: 100-sheet staple finisher

Even if the DF adjust release motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the adjust release HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF adjust release motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF adjust release motor	The DF adjust release motor is faulty.	Execute U240 [Motor] > [Match Pressure]. If the motor does not properly operate, replace it.	
3	Replacing the DF adjust release HP sensor	The DF adjust release HP sensor is not properly attached or faulty.	Reattach the DF adjust release HP sensor and execute U241 [Finisher] > [Match Coro HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

### C8610: Pull in guide release motor error

#### Object: 100-sheet staple finisher

Even if the DF pull in guide release motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF pull in guide release HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF pull in guide release motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF pull in guide release motor	The DF pull in guide release motor is faulty.	Execute U240 [Motor] > [Beat]. If the motor does not properly operate, replace it.	
3	Replacing the DF pull in guide release HP sensor	The DF pull in guide release HP sensor is not properly attached or faulty.	Reattach the DF guide release HP sensor and execute U241 [Finisher] > [Rear Beat HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

### C8620: Pull in pulley pressure release motor error

#### Object: 100-sheet staple finisher

Even if the DF pull in pulley pressure release motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF pull in pulley pressure release HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF pull in pulley pressure release motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF pull in pulley pressure release motor	The DF pull in pulley pressure release motor is faulty.	Execute U240 [Motor] > [Pull Pressure]. If the motor does not properly operate, replace it.	
3	Replacing the DF pull in pulley pressure release HP sensor	The DF pull in pulley pressure release HP sensor is not properly attached or faulty.	Reattach the DF pull in pulley pressure release HP sensor and execute U241 [Finisher] > [Pull Coro HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

### C8630: Exit pressure release motor error

#### Object: 100-sheet staple finisher

Even if the Exit pressure release motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the Exit pressure release HP SW is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF exit pressure release motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF exit pressure release motor	The DF exit pressure release motor is faulty.	Execute U240 [Motor] > [Eject Unlock]. If the motor does not properly operate, replace it.	
3	Replacing the DF exit pressure release HP sensor	The DF exit pressure release HP sensor is not properly attached or faulty.	Reattach the DF exit pressure release HP sensor and execute U241 [Finisher] > [Eject Press HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

### C8640: DF width adjust front motor error

#### Object: 100-sheet staple finisher

Even if the DF width adjust front motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF width adjust front HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF width adjust front motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF width adjust front motor	The DF width adjust front motor is faulty.	Execute U240 [Motor] > [Width Test]. If the motor does not properly operate, replace it.	
3	Replacing the DF width adjust front HP sensor	The DF width adjust front HP sensor is not properly attached or faulty.	Reattach the DF width adjust front HP sensor and execute U241 [Finisher] > [Width Front HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

### C8650: DF width adjust rear motor error

#### Object: 100-sheet staple finisher

Even if the DF width adjust rear motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF width adjust rear HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF width adjust rear motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF width adjust rear motor	The DF width adjust rear motor is faulty.	Execute U240 [Motor] > [Width Test]. If the motor does not properly operate, replace it.	
3	Replacing the DF width adjust rear HP sensor	The DF width adjust rear HP sensor is not properly attached or faulty.	Reattach the DF width adjust rear HP sensor and execute U241 [Finisher] > [Width Tail HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

**C8700: DF bundle exit 1 motor error**

**Object: 100-sheet staple finisher**

Even if the DF bundle exit 1 motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF DF bundle exit 1 HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF bundle exit 1 motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF bundle exit 1 motor	The DF bundle exit 1 motor is faulty.	Execute U240 [Motor] > [Bundle Up]. If the motor does not properly operate, replace it.	
3	Replacing the DF bundle exit 1 HP sensor	The DF bundle exit 1 HP sensor is not properly attached or faulty.	Reattach the DF bundle exit 1 HP sensor and execute U241 [Finisher] > [Bundle Eject HP1]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

**C8710: DF bundle exit 2 motor error**

**Object: 100-sheet staple finisher**

Even if the DF bundle exit 2 motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF DF bundle exit 2 HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF bundle exit 2 motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF bundle exit 2 motor	The DF bundle exit 2 motor is faulty.	Execute U240 [Motor] > [Bundle Up]. If the motor does not properly operate, replace it.	
3	Replacing the DF bundle exit 2 HP sensor	The DF bundle exit 2 HP sensor is not properly attached or faulty.	Reattach the DF bundle exit 2 HP sensor and execute U241 [Finisher] > [Bundle Eject HP2]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

### C8720: DF A exit puddle motor error

#### Object: 100-sheet staple finisher

Even if the DF A exit paddle motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF DF A exit paddle HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF A exit paddle motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF A exit paddle motor	The DF A exit paddle motor is faulty.	Execute U240 [Motor] > [Tray Eject paddle]. If the motor does not properly operate, replace it.	
3	Replacing the DF A exit paddle HP sensor	The DF A exit paddle HP sensor is not properly attached or faulty.	Reattach the DF A exit paddle HP sensor and execute U241 [Finisher] > [Exit Paddle HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

### C8730: DF A exit paper trail edge press motor error

#### Object: 100-sheet staple finisher

Even if the DF A exit paper trail edge press motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF A exit paper trail edge press HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF exit paper trail edge press motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF exit paper trail edge press motor	The DF exit paper trail edge press motor is faulty.	Execute U240 [Motor] > [Press Paper]. If the motor does not properly operate, replace it.	
3	Replacing the DF exit paper trail edge press HP sensor	The DF exit paper trail edge press HP sensor is not properly attached or faulty.	Reattach the DF exit 1 HP sensor and execute U241 [Finisher] > [Press Paper HP]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	

C8740: DF exit support guide motor error

Object: 100-sheet staple finisher

Even if the DF exit support guide motor is driven for 3 seconds in the direction that the HP sensor fluctuates, change of the DF exit support guide HP sensor is not detected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. <ul style="list-style-type: none"> <li>DF exit support guide motor - DF PWB</li> </ul>	Wiring diagram
2	Replacing the DF exit support guide motor	The DF exit support guide motor is faulty.	Execute U240 [Motor] > [Eject Guide]. If the motor does not properly operate, replace it.	
3	Replacing the DF exit support guide HP sensor	The DF exit support guide HP sensor is not properly attached or faulty.	Reattach the DF exit support guide HP sensor and execute U241 [Finisher] > [Eject Guide]. If the sensor does not properly operate, replace it.	
4	Replacing the DF PWB	The DF PWB is faulty.	Replace the DF PWB. After replacing the PWB, upgrade the firmware using the Upgrade pack.	



**C8800: Main program error (DF) / Engine - DF communication error**

**Object: 4000-sheet finisher**

The main program is faulty when turning on the power. The Engine -DF communication error is detected 10 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The program does not start up properly.	Turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the DP firmware to the latest version.	Firmware Update
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • DF main PWB - Engine PWB	Wiring diagram
4	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB
5	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C8900: DF backup error**

**Object: 4000-sheet finisher**

(For the internal count)

The writing data and the reading data mismatch 3 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • DF main PWB - Engine PWB	Wiring diagram
2	Replacing the DF main PWB	The DF main PWB is faulty.	Replace the DF main PWB.	Detaching and reattaching the DF main PWB

**C8930: BF unit backup error**

**Object: 4000-sheet finisher + Folding unit**

(For the internal count)

The writing data and the reading data mismatch 3 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • BF main PWB - DF main PWB	Wiring diagram
2	Replacing the BF main PWB	The BF main PWB is faulty.	Replace the BF main PWB.	

**C9000: Main program error (DP) / Document Processor communication error**

The document processor cannot be communicated.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the scanner firmware and the DP firmware to the latest version.	Firmware Update
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DP main PWB - Engine PWB	Wiring diagram
3	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

**C9040: DP lift motor ascend error**

The DF lift upper limit sensor does not detect ON when passing 1500 pulses 5 times or more while the DP lift motor drives to ascend.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DP original feed lift plate	The DP original feed lift plate is not properly attached.	If the DP original feed lift plate does not move up and down manually, repair the part that restricts the operation.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DP lift motor - DP main PWB • DP lift upper limit sensor - DP main PWB	Wiring diagram

Step	Check description	Assumed cause	Measures	Reference
3	Replacing the DP lift motor	The DP lift motor is faulty.	Execute U243 [Lift Motor]. If the DP lift motor does not properly operate, replace the motor.	Executing U243
4	Checking the DP lift upper limit sensor	The DP lift upper limit sensor is not properly attached or faulty.	Reattach the DP lift upper limit sensor and execute U244 [Lift U-Limit]. If the sensor does not properly operate, replace it.	Executing U244
5	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB

**C9050: DP lift motor descend error**

The DP lift lower limit sensor does not detect ON when passing 1500 pulses while the DP lift motor drives to descend. (3 times of retries)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DP original feed lift plate	The DP original feed lift plate is not properly attached.	If the DP original feed lift plate does not move up and down manually, repair the part that restricts the operation.	
2	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DP lift motor - DP main PWB • DP lift lower limit sensor - DP main PWB	Wiring diagram
3	Replacing the DP lift motor	The DP lift motor is faulty.	Execute U243 [Lift Motor]. If the DP lift motor does not properly operate, replace the motor.	Executing U243
4	Checking the DP lift lower limit sensor	The DP lift lower limit sensor is not properly attached or faulty.	Reattach the DP lift lower limit sensor and execute U244 [Lift L-Limit]. If the sensor does not properly operate, replace it.	Executing U244
5	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB

**C9060: DP EEPROM error**

Read data and write data to the EEPROM do not match 3 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the EEPROM	The EEPROM is not properly installed.	Reattach the EEPROM on the DP main PWB.	

Step	Check description	Assumed cause	Measures	Reference
2	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB
3	Replacing the EEPROM	The EEPROM is faulty.	Replace the EEPROM on the DP main PWB and execute U411.	Executing U411

**C9070: DP - SHD communication error**

The communication error between the DP main PWB and the DPSHD PWB was detected during communication.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DPSHD PWB - DP main PWB	Wiring diagram
2	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
3	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB

**C9080: LED failure detection**

After 4 blocks of the LED lamps of the DPCIS are lit when turning the power on, the acquired peak value of some blocks is at the reference value or less. (The light level detected by the CIS is not enough.)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the LED lamp	The LED lamp of the DPCIS does not light.	0	Executing U203
2	Checking the DPSHD PWB	The DPSHD PWB is not properly connected.	Reconnect the DPSHD PWB to the DPCIS.	
3	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • DPSHD PWB - DP main PWB	Wiring diagram
4	Executing U411	DP scanning is not properly adjusted.	Execute U411 [DP FD (ChartB)] and [DP FD (ChartA)].	Executing U411
5	Replacing the DPCIS	The DPCIS is faulty.	Replace the DPCIS, and then execute U091 and U411.	Detaching and reattaching the DPCIS
6	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	

### C9200: DP multi-feeding sensor communication error

1. The DP multi-feeding sensor connection signal is not connected twice continuously with one retry when turning the power on. 2. The DP multi-feeding sensors receive the incorrect communication command 3 times continuously.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •DP multi-feeding sensor (emitter) - DP main PWB • DP multi-feeding sensor (receiver) - DP main PWB	Wiring diagram
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the DP firmware to the latest version.	Firmware Update
3	Replacing the DP multi-feeding sensors	The DP multi-feeding sensors are faulty.	Replace the DP multi-feeding sensor (emitter) or the DP multi-feeding sensor (receiver).	
4	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB

### C9210: DP multi-feeding sensor communication error

The DP multi-feeding sensors detect paper for 3 jobs continuously before the paper conveying starts.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •DP multi-feeding sensor (emitter) - DP main PWB • DP multi-feeding sensor (receiver) - DP main PWB	Wiring diagram
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the DP firmware to the latest version.	Firmware Update
3	Replacing the DP multi-feeding sensors	The DP multi-feeding sensors are faulty.	Replace the DP multi-feeding sensor (emitter) or the DP multi-feeding sensor (receiver).	
4	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB

### C9220: DP multi-feeding sensor backup error

1. Write data and read data does not match 3 times continuously when writing.
2. Block erase failed 3 times continuously.

3. Writing does not complete when passing 200ms after starting writing.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection	The connector is not properly connected. Or, the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. •DP multi-feeding sensor (emitter) - DP main PWB • DP multi-feeding sensor (receiver) - DP main PWB	Wiring diagram
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware and the DP firmware to the latest version.	Firmware Update
3	Replacing the DP multi-feeding sensors	The DP multi-feeding sensors are faulty.	Replace the DP multi-feeding sensor (emitter) or the DP multi-feeding sensor (receiver).	
4	Replacing the DP main PWB	The DP main PWB is faulty.	Replace the DP main PWB.	Detaching and reattaching the DP main PWB

C9500: Image processing circuit error (Scanner)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is deformed or the FFC is broken, replace the FFC. • Engine PWB - Main PWB	Wiring diagram
2	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB
3	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and reattaching the engine PWB

C9510: Image processing circuit error (DP)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the DP relay PWB	The DP relay PWB is not properly attached.	Reattach the DP relay PWB.	
2	Checking the connection	The connector is not properly connected. Or, the SATA cable is faulty.	0	Wiring diagram
3	Replacing the DPSHD PWB	The DPSHD PWB is faulty.	Replace the DPSHD PWB.	
4	Replacing the DP relay PWB	The DP relay PWB is faulty.	Replace the DP relay PWB.	
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**C9540: Backup data error**

When multiple parts are replaced at the same time, the internal data is changed and it interferes with the machine operation. Consequently, the main unit cannot recover.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the PWB	Multiple PWBs were replaced at the same time.	Recover to the original, if 2 or more of the following related parts were replaced at the same time. • Related parts: Memory, each PWB	
2	Checking the unit	Multiple units were replaced at the same time.	Be sure not to perform the following works at the same time when the memory or each PWB is replaced. • Replacing the drum unit or the developer unit • Relocating the drum units to other colors position in side a main unit'	

### (3)System Error (Fxxx) Outline (1)

Error code	Contents
F000	Communication error between the main unit and CPU
F010	Program read error (SSD)
F020	System memory error (RAM reading/writing error or CPU memory error)
F021	System memory error (RAM reading/writing error or ASIC memory error)
F022	System memory error (RAM reading/writing error or ASIC memory error)
F040	Communication error between the main unit and CPU (Communication error between the controller and the print engine)
F041	Communication error between the main PWB and the scanner engine
F050	Engine main program error
F051	Scanner engine program error
F052	Panel engine program error
F186	Error detected in the video control section
F278	Secondary power source error

#### Content of System Error (Fxxxx) Outline

#### F000: Communication error between the main unit and CPU

The panel cannot be detected since the CPU communication between the main PWB and the operation panel main PWB is unavailable.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The communication between the main PWB and the operation panel main PWB is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
2	Checking the connection	The connector is not properly connected. The wire or the SATA cable is faulty.	Clean the terminal of the following SATA cable connector and the wire connectors and reconnect the connectors. If there is no continuity, replace the SATA cable or the wire. • Main PWB - Operation panel main PWB	Wiring diagram
3	Executing U021	The backup RAM data is faulty.	Execute U021 to initialize the backup RAM data.	Executing U021
4	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB
5	Replacing the operation panel main PWB	The operation panel main PWB is faulty.	Replace the panel main PWB.	Detaching and Reattaching the operation panel PWB



### F010: Program read error (SSD)

The garbled 2bit data was detected during the program read from the flash memory.

Step	Check description	Assumed cause	Measures	Reference
1	(When the service call error appears after replacing the SSD) Replacing the SSD along the correct procedures	The firmware is not stored in the SSD.	Insert the USB memory device containing all released firmware into the main unit, and turn the main power on.	Firmware Update
2	Checking the SSD (if lit after replacing the SSD)	An SSD out of specification is installed.	Install the SSD matching the memory capacity specification.	
3	Resetting the main power	The communication between the main PWB and the operation panel main PWB is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
4	Checking the SSD	The SSD is not properly attached.	Check if the SSD terminal is not faulty and clean it. Then, reinstall the SSD.	Detaching and Reattaching the SSD
5	Checking the connection	The connector is not properly connected. The wire or the SATA cable is faulty.	Clean the terminal of the following SATA cable connector and the wire connectors and reconnect the connectors. If there is no continuity, replace the SATA cable or the wire. • Main PWB - Operation panel main PWB	Wiring diagram
6	Executing U021	The backup RAM data is faulty.	Execute U021 to initialize the backup RAM data.	Executing U021
7	Replacing the SSD	The SSD is faulty.	Backup the data in the SSD at U026. Then, replace the SSD and turn the main power on while installing the USB memory storing the firmware for the affected model n the main unit.	Detaching and Reattaching the SSD
8	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

### F020: System memory error (RAM reading/writing error or CPU memory error)

The error appears during the reading/writing check of the RAM for the CPU when the main unit starts up.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The communication between the main PWB and the operation panel main PWB is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	

Step	Check description	Assumed cause	Measures	Reference
2	Executing U021	The backup RAM data is faulty.	Execute U021 to initialize the backup RAM data.	Executing U021
3	Checking the main PWB	The connector or the FFC is not properly connected. The wire, the FFC or the PWB is faulty.	Clean the connectors on the main PWB and the FFC terminal. Then, reconnect the wire connector and the FFC. At that time, if the wire is pinched by other parts or it is damaged, repair or replace the wire. If the FFC terminal section is deformed or FFC is broken, replace the FFC. If the issue is not resolved, replace the main PWB.	Detaching and Reattaching the main PWB

**F021: System memory error (RAM reading/writing error or ASIC memory error)**

The error appears during the reading/writing check of the RAM for the main PWB ASIC when the main unit starts up.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The main PWB does not properly start up.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
2	Executing U021	The backup RAM data is faulty.	Execute U021 to initialize the backup RAM data.	Executing U021
3	Checking the main PWB	The connector or the FFC is not properly connected. The wire, the FFC or the PWB is faulty.	Clean the connectors on the main PWB and the FFC terminal. Then, reconnect the wire connector and the FFC. At that time, if the wire is pinched by other parts or it is damaged, repair or replace the wire. If the FFC terminal section is deformed or FFC is broken, replace the FFC. If the issue is not resolved, replace the main PWB.	Detaching and Reattaching the main PWB

**F022: System memory error (RAM reading/writing error or ASIC memory error)**

The error appears during the reading/writing check of the RAM for the DP relay PWB ASIC when the main unit starts up.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The main PWB does not properly start up.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	

Step	Check description	Assumed cause	Measures	Reference
2	Executing U021	The backup RAM data is faulty.	Execute U021 to initialize the backup RAM data.	Executing U021
3	Checking the DP relay PWB	The DP relay PWB is not properly connected or attached.	Reattach the DP relay PWB and secure it with the screws. If not repaired, replace the DP relay PWB.	Detaching and Reattaching the DP relay PWB (including in the procedures of detaching and reattaching the main PWB)

**F040: Communication error between the main unit and CPU (Communication error between the controller and the print engine)**

The communication between the main PWB and the engine PWB is faulty.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The communication between the controller and the print engine is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
2	Checking the connection	The connectors are not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reconnect the connectors. If there is no continuity, replace the wire. • Engine PWB (YC5) - Main PWB (YC63) • Engine PWB (YC41) - LVU (YC6, 8)	Wiring diagram
3	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB
5	Replacing the LVU	The power from the LVU is not supplied to the engine PWB.	If 5V or 24V is not generated from the LVU, replace the LVU.	Detaching and Reattaching the LVU

### F041: Communication error between the main PWB and the scanner engine

The communication between the main PWB and the engine PWB (Scanner) is faulty.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The communication between the controller and the scanner is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
2	Checking the connection	The connector or the FFC is not properly connected. The wire or the FFC is faulty.	Reconnect the following wire connectors, and clean and reconnect the FFC. If there is no continuity, replace the wire. If the FFC terminal section is deformed or FFC is broken, replace the FFC. • Main PWB - Engine PWB	Wiring diagram
3	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

### F050: Engine main program error

The engine program cannot start up.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
2	Resetting the main power	The print engine ROM checksum is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
3	Checking the EEPROM	The EEPROM is not properly attached.	Reattach the EEPROM.	
4	Checking the engine PWB	The connector or the FFC is not properly connected. The wire, the FFC or the PWB is faulty.	Clean the connectors on the engine PWB and the FFC terminal. Then, reconnect the wire connector and the FFC. At that time, if the wire is pinched by other parts or it is damaged, repair or replace the wire. If the FFC terminal section is deformed or FFC is broken, replace the FFC. If the issue is not resolved, replace the engine PWB.	Detaching and Reattaching the engine PWB

### F051: Scanner engine program error

The scanner program cannot start up

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the engine firmware to the latest version	Firmware Update
2	Resetting the main power	The scanner engine RAM checksum is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
3	Checking the SSD	The SSD is not properly attached.	Reattach the SSD.	Detaching and Reattaching the SSD
4	Checking the engine PWB	The connector or the FFC is not properly connected. The wire, the FFC or the PWB is faulty.	Clean the connectors on the engine PWB and the FFC terminal. Then, reconnect the wire connector and the FFC. At that time, if the wire is pinched by other parts or it is damaged, repair or replace the wire. If the FFC terminal section is deformed or FFC is broken, replace the FFC. If the issue is not resolved, replace the engine PWB.	Detaching and Reattaching the engine PWB

### F052: Panel engine program error

The panel program cannot start up.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the panel firmware to the latest version.	Firmware Update
2	Resetting the main power	The panel RAM checksum is faulty.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
3	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the connectors on the operation panel main PWB and reinsert the wire connectors. If there is no continuity, replace the wire.	Wiring diagram
4	Replacing the operation panel main PWB	The operation panel main PWB is faulty.	Replace the panel main PWB.	Detaching and Reattaching the operation panel PWB

### F186: Error detected in the video control section

The communication between the main PWB and the engine PWB is faulty.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The communication error between the controller and the engine occurs since the power reset was immediately done.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
2	Checking the FFC	The FFC is not properly connected, or it is faulty.	Reconnect the following FFC. If the FFC terminal section is deformed or the FFC is broken, replace the FFC. • Engine PWB (YC9) - Main PWB (YC43)	Wiring diagram
3	Firmware upgrade	The firmware is not the latest version.	• Primary transfer belt unit - Engine PWB	Firmware upgrade
4	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Replacing the main PWB
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Replacing the engine PWB

### F278: Secondary power source error

The operation became unstable since the primary supply power dropped out temporarily and recovered.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The power reset was performed immediately.	Remove the original and check the sensor. Next, turn off the power switch and main switch. Then, turn on the main switch and power switch when passing 5 seconds.	
2	Checking the connection	The connector is not properly connected or the wire is faulty.	Clean the connectors on the LVU and reinsert the wire connectors. If there is no continuity, replace the wire.	
3	Replacing the LVU	The LVU is faulty.	Replace the LVU.	Detaching and Reattaching the LVU

### (4)System Error (Fxxx) Outline (2)

#### No code: Panel lock up

It locks on a Welcome screen. It locks on a starting logo screen. (Even if time passes for a definite period of time, the screen does not change)

- 1 Check the harness between Main board and HDD, and the connection state of a connector between Panel and Main boards, and perform an operation check.**
- 2 Check contact of a DDR memory (extracting) and perform an operation check.**  
If exchangeable, it will exchange and will perform an operation check.
- 3 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models

- 4 **U021 Controller backup initialization is carried out and an operation check is performed.**
- 5 **Exchange a Panel Main board and perform an operation check.**
- 6 **Exchange a Main board and perform an operation check.**
- 7 **It will get, if USBLOG is obtainable, and contact service headquarters.**



**NOTE**

Execution of U024 will vanish user data and the software installed. Reinstallation is required.

**F000: CF000 will be displayed if progress is carried out for a definite period of time with a Welcome screen.**

The communication fault between Panel-Main boards Communication fault between Panel Core-Main Core Notes 2

- 1 **Check the harness between Main board and HDD, and the connection state of a connector between Panel and Main boards, and perform an operation check.**
- 2 **Check contact of a DDR memory (extracting) and perform an operation check.**  
If exchangeable, it will exchange and will perform an operation check.
- 3 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 4 **U021 Controller backup initialization is carried out and an operation check is performed.**
- 5 **Exchange a Main board and perform an operation check.**
- 6 **Exchange a Panel Main board and perform an operation check.**
- 7 **It will get, if USBLOG is obtainable, and contact service headquarters.**

**F12X: Abnormality detecting in a Scan control section**

- 1 **Check the harness between Scan/DP and Main boards, and the connection state of a connector, and perform an operation check.**
- 2 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 3 **U021 Controller backup initialization is carried out and an operation check is performed.**
- 4 **Exchange a Scan/DP board and perform an operation check.**
- 5 **Exchange a Main board and perform an operation check.**
- 6 **Get USBLOG and contact service headquarters.**

**F14X: Abnormality detecting in a FAX control part**

- 1 **Check the harness between FAX and Main boards, and the connection state of a connector, and perform an operation check.**
- 2 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models

- 3 **U021 Controller backup initialization is carried out and an operation check is performed.**
- 4 **Perform a deed operation check for DIMM Clear by U671.**  
Only model which has Flash for FAX data in a Main board  
(Since it disappears when received data remain, cautions are required.)
- 5 **Exchange FAX\_DIMM and perform an operation check.**  
Only model which has Flash for FAX data in a Main board
- 6 **Exchange a FAX board and perform an operation check.**
- 7 **Exchange a Main board and perform an operation check.**
- 8 **Get USBLOG and contact service headquarters.**

#### **F18X: Abnormality detecting in a Video control section**

- 1 **Check the harness between Engine and Main boards, and the connection state of a connector, and perform an operation check.**
- 2 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 3 **U021 Controller backup initialization is carried out and an operation check is performed.**
- 4 **Exchange an Engine board and perform an operation check.**
- 5 **Exchange a Main board and perform an operation check.**
- 6 **Get USBLOG and contact service headquarters.**

#### **F1DX: Abnormality detecting of the image memory Management Department**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**



#### **NOTE**

F1D4:Random Access Memory failure

- 1 Confirmation of U340
- 2 Setting reset (U021)



**F21X, F22X: Abnormality detecting in an image-processing part**

- 1 Check contact of a DDR memory and perform an operation check.**
- 2 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 3 Carry out U021 Main backup initialization and perform an operation check.**
- 4 Exchange a Main board and perform an operation check.**
- 5 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 6 Get USBLOG and contact service headquarters.**

**F24X: Abnormality detecting in the system Management Department**

- 1 Check contact of a DDR memory and perform an operation check.**
- 2 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 3 Carry out U021 Main backup initialization and perform an operation check.**
- 4 Exchange a Main board and perform an operation check.**
- 5 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 6 Get USBLOG and contact service headquarters.**


 **NOTE**

F248: Abnormalities of a printer process.

In recurring by specific printer data, get acquisition of capture data and USBLOG.

**F26X, F27X, F28X, F29X, F2AX: Abnormality detecting in the system Management Department**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**

 **NOTE**

This error could occur in specific network environment. Check ethernet connectors and so on.

## **F2BX, F2CX, F2DX, F2EX, F2FX, F30X, F31X, F32X: Abnormality detecting in a network control part**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Get USBLOG and contact service headquarters.**  
(Depending on an analysis result, it is packet capture acquisition)

## **F33X: Abnormality detecting in the Scan Management Department**

- 1 Check the harness between Scan/DP and Main boards, and the connection state of a connector, and perform an operation check.**
- 2 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 3 U021 Controller backup initialization is carried out and an operation check is performed.**
- 4 Exchange a Scan/DP board and perform an operation check.**
- 5 Exchange a Main board and perform an operation check.**
- 6 Get USBLOG and contact service headquarters.**

## **F34X: Abnormality detecting in the Panel Management Department**

- 1 Check the harness between Panel<=>Main boards, and the connection state of a connector, and perform an operation check.**  
A Dual Core CPU model and HyPAS model
- 2 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 3 U021 Controller backup initialization is carried out and an operation check is performed.**
- 4 Exchange a Panel board and perform an operation check.**  
A Dual Core CPU model and HyPAS model
- 5 Exchange a Main board and perform an operation check.**
- 6 Get USBLOG and contact service headquarters.**

## **F35X: Abnormality detecting in the printing controlling Management Department**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models

- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

#### **F37X: Abnormality detecting in the FAX Management Department**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Perform a deed operation check for DIMM Clear by U671.**  
Only model which has Flash for FAX data in a Main board  
(Since it disappears when received data remain, cautions are required.)
- 4 **Exchange FAX\_DIMM and perform an operation check.**  
Only model which has Flash for FAX data in a Main board
- 5 **Exchange a Main board and perform an operation check.**
- 6 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 7 **Get USBLOG and contact service headquarters.**

#### **F38X: Abnormality detecting in the authentication authorized Management Department**


- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

#### **F3AX, F3BX, F3CX, F3DX, F3EX, F3FX, F40X, F41X, F42X, F43X, F44X, F45X: Abnormality detecting in the Entity Management Department**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models

**5 Get USBLOG and contact service headquarters.****F46X: Abnormality detecting of a printer rendering part****1 Exchange boards and perform an operation check.****2 the acquisition wish of USBLOG -- carry out**

(Depending on the (2) case, it is print capture data acquisition)

 **NOTE**

F46F: Abnormalities of a printer process.

In recurring by specific printer data, please give me cooperation at acquisition of capture data and USBLOG.

**F47X, F48X, F49X: Abnormality detecting of an image editing processing part****1 Initialize HDD and perform an operation check. (FULL of U024)**

Only for HDD standard models

**2 Carry out U021 Main backup initialization and perform an operation check.****3 Exchange a Main board and perform an operation check.****4 Exchange HDD and perform an operation check.**

Only for HDD standard models

**5 Get USBLOG and contact service headquarters.****F4AX, F4CX: Abnormality detecting of a printer rendering part****1 Initialize HDD and perform an operation check. (FULL of U024)**

Only for HDD standard models

**2 Carry out U021 Main backup initialization and perform an operation check.****3 Exchange a Main board and perform an operation check.****4 Exchange HDD and perform an operation check.**

Only for HDD standard models

**5 Get USBLOG and contact service headquarters.****F4DX, F4EX: Abnormality detecting in the Entity Management Department****1 Initialize HDD and perform an operation check. (FULL of U024)**

Only for HDD standard models

**2 Carry out U021 Main backup initialization and perform an operation check.****3 Exchange a Main board and perform an operation check.****4 Exchange HDD and perform an operation check.**

Only for HDD standard models

## 5 Get USBLOG and contact service headquarters.

### F4FX: Abnormality detecting in the JOB Management Department

#### 1 Initialize HDD and perform an operation check. (FULL of U024)

Only for HDD standard models

#### 2 Carry out U021 Main backup initialization and perform an operation check.

#### 3 Exchange a Main board and perform an operation check.

#### 4 Exchange HDD and perform an operation check.

Only for HDD standard models

## 5 Get USBLOG and contact service headquarters.



#### NOTE

The USB log immediately after occurrence is needed for analysis

### F50X: Abnormality detecting in the FAX Management Department

#### 1 Initialize HDD and perform an operation check. (FULL of U024)

Only for HDD standard models

#### 2 Carry out U021 Main backup initialization and perform an operation check.

#### 3 Exchange a Main board and perform an operation check.

#### 4 Exchange HDD and perform an operation check.

Only for HDD standard models

## 5 Get USBLOG and contact service headquarters.



#### NOTE

The USB log immediately after occurrence is needed for analysis

### F51X, F52X, F53X, F55X, F56X, F57X: Abnormality detecting in a JOB execution part

#### 1 Initialize HDD and perform an operation check. (FULL of U024)

Only for HDD standard models

#### 2 Carry out U021 Main backup initialization and perform an operation check.

#### 3 Exchange a Main board and perform an operation check.

#### 4 Exchange HDD and perform an operation check.

Only for HDD standard models

## 5 Get USBLOG and contact service headquarters.



#### NOTE

The USB log immediately after occurrence is needed for analysis

**F5FX: Abnormality detecting in a service execution part**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**

**NOTE**

The USB log immediately after occurrence is needed for analysis

**F60X: Abnormality detecting in the maintenance mode. Remote Service Management Department**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**

**NOTE**

F60A: Occurrence when device registered Remote Service detects offline status with external system. Check device Network Settings and Network environment which device is used (include Disconnection rule/status in night time and on weekends.)”

**F61X: Abnormality detecting in a report creation part**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**

**NOTE**

The USB log immediately after occurrence is needed for analysis

**F63X: Abnormality detecting in a device control section**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**

**F64X, F65X, F66X, F67X: Abnormality detecting of a printer rendering part**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**

**F68X: Abnormality detecting in a storage device control section**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**

**NOTE**

F684: Overwrite error at the time of an HDD security kit.

## **F6DX, F6EX, F6FX, F70X, F71X, F72X, F73X, F74X, F75X: Abnormality detecting in the external server Management Department (Fiery Option relation)**

- 1 Check an external server and perform an operation check.**
- 2 Check connection with an external server and perform an operation check.**
- 3 Network setup is checked and an operation check is performed.**
- 4 Exchange a Bridge board and perform an operation check.**
- 5 Exchange a Main board and perform an operation check.**
- 6 Get USBLOG and contact service headquarters.**

## **F90X: Abnormality detecting in the extension application service part**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**



### **NOTE**

The USB log at the time of occurrence is needed for analysis

## **F93X: Abnormality detecting in the extension application management part**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 Carry out U021 Main backup initialization and perform an operation check.**
- 3 Exchange a Main board and perform an operation check.**
- 4 Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 Get USBLOG and contact service headquarters.**



### **NOTE**

The USB log at the time of occurrence is needed for analysis

## **FC0X; Abnormality detecting in system application**

- 1 Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models



- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FC5X: Abnormality detecting in Copy application**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FCAX: Abnormality detecting in Print application**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FCFX: Abnormality detecting in Send application**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models

- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FD4X: Abnormality detecting in Box application**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FD9X: Abnormality detecting in FAX application**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FDEX: Abnormality detecting in maintenance application**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models

- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FF7X: Abnormality detecting in a report creation part**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log immediately after occurrence is needed for analysis

**FE5X: Abnormality detecting in FAX application**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

**FE9X: Abnormality detecting in the Application System Management Department**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models

- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log immediately after occurrence is needed for analysis

**FF9X: Abnormality detecting in Service Cooperation**

- 1 **Initialize HDD and perform an operation check. (FULL of U024)**  
Only for HDD standard models
- 2 **Carry out U021 Main backup initialization and perform an operation check.**
- 3 **Exchange a Main board and perform an operation check.**
- 4 **Exchange HDD and perform an operation check.**  
Only for HDD standard models
- 5 **Get USBLOG and contact service headquarters.**

**NOTE**

The USB log at the time of occurrence is needed for analysis

## 7 - 4 FAX Related Errors

### (1)FAX Related Errors

No.	Contents
(1)	The login fails with other than the ID card.
(2)	C0030: FAX PWB system error
(3)	C0070: FAX PWB incompatible detection error
(4)	C0650: FAX image storage pair-check error
(5)	C0830: FAX PWB flash program area checksum error
(6)	C0870: PC FAX Image data transmission error
(7)	C0920: FAX file system error
(8)	C0950: FAX job stay error
(9)	F14D: FAX control error
(10)	FAX cannot be sent.
(11)	The beep sounds when the copying or printing is finished.
(12)	When the data of the A3 or B4 size originals is transmitted, all of it is transmitted as the A4 size data.

#### Content of FAX Related Errors

##### (1-1)The login fails with other than the ID card.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	[User/Job Account] is valid while the card authentication kit is not installed.	Set [Permit] at [User/Job Account] > [ID Card Settings] > [Key Login] via the System Menu.	

##### (1-2)C0030: FAX PWB system error

The FAX processing cannot be continued due to the FAX firmware error.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The FAX PWB does not operate properly.	Turn the power switch and the main power switch off . After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
3	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

##### (1-3)C0070: FAX PWB incompatible detection error

Abnormal detection of FAX control PWB incompatibility in the initial communication with the FAX control PWB, any normal communication command is not transmitted.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FAX PWB	The incompatible FAX PWB is installed.	Install the FAX PWB for the applicable model.	

Step	Check description	Assumed cause	Measures	Reference
2	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
3	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**(1-4)C0650: FAX image storage pair-check error**

The SSD (FAX image storage) used in other main unit is installed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SSD	The SSD (FAX image storage) already used in other unit is installed.	When installing the SSD used once, replace with the correct SSD.	Detaching and reattaching the SSD
2	Executing U671	The SSD (FAX image storage) already used in other unit is reused without executing U671.	If installing the used SSD, execute U671 [FAX Data CLEAR].	Executing U671
3	Reinstalling the SSD	The SSD (FAX image storage) is not properly installed.	Be sure to install the SSD to the connector on the main PWB.	Detaching and reattaching the SSD
4	Replacing the SSD	The SSD (FAX image storage) is faulty.	Replace with the new SSD.	Detaching and reattaching the SSD
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB

**(1-5)C0830: FAX PWB flash program area checksum error**

The program stored in the flash memory on the FAX PWB is broken so it cannot perform.

Step	Check description	Assumed cause	Measures	Reference
1	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
2	Checking the FAX PWB	The FAX PWB is not properly connected.	Turn the power switch and the main power switch off . After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
3	Initializing the fax	The data in the FAX PWB is faulty.	Execute U600 to initialize the FAX.	Executing U600
4	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

**(1-6)C0870: PC FAX Image data transmission error**

Data was not properly transmitted even if the specified times of retry were made when the large volume data is transmitted between the FAX PWB and the main PWB.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The FAX PWB does not operate properly.	Turn the power switch and the main power switch off . After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
2	Initializing the fax	The data in the FAX PWB is faulty.	Execute U600 to initialize the FAX.	Executing U600
3	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
4	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide
5	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and reattaching the main PWB
6	Executing U024	The data stored in the SSD is faulty.	Execute U024 [SSD Format].	Executing U024

**(1-7)C0920: FAX file system error**

The backup data could not be stored since the file system of the flash memory is faulty.

Step	Check description	Assumed cause	Measures	Reference
1	Initializing the fax	FAX control values are incorrect	Execute U600 to initialize the FAX.	Executing U600
2	Checking the FAX PWB	The FAX PWB does not operate properly.	Turn the power switch and the main power switch off . After 5s passes, reattach the FAX PWB and turn the main power switch and the power switch on.	FAX Installation Guide
3	Reinstalling the FAX PWB	The FAX PWB is not properly installed.	Reinstall the FAX PWB.	FAX Installation Guide
4	Firmware upgrade	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
5	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

**(1-8)C0950: FAX job stay error**

Print processing of the received FAX could not be executed and the job continues staying.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	The printing process is not properly executed.	Turn the power switch and the main power switch off . After 5s passes, turn the main power switch and the power switch on.	
2	Firmware upgrade	The firmware is faulty.	Upgrade the main firmware to the latest version.	Firmware upgrade

**(1-9)F14D: FAX control error**

Step	Check description	Assumed cause	Measures	Reference
1	Firmware Update	The firmware is not the latest version.	Upgrade the main firmware and the FAX firmware to the latest version.	Firmware Update
2	Checking the connection	The FAX PWB is not connected properly.	Reinstall the FAX PWB.	FAX Installation Guide
3	Replacing the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

**(1-10)FAX cannot be sent.**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the connection of the modular cable	The modular cable disconnects.	Reconnect the modular cable.	
2	Changing the connection	If the adapter and the switching device or the like is connected to the telephone line, it is affected.	Directly connect the main unit to the telephone line.	
3	Checking the settings	The line settings are incorrect.	Correct the line settings. (Reduce the transmission speed, etc.)	
4	Checking the destination unit	The destination unit is busy.	Wait a while and then redial the number if busy tones are heard.	
5	Checking the destination unit	The modular cable is disconnected in the destination unit if the destination unit does not receive the calling.	Request the destination unit to reconnect the modular cable.	
6	Checking the setting in the destination unit	The manual reception is set in the destination unit if the destination unit does not receive the calling.	Ask the destination unit to change the reception settings.	
7	Checking the sending content	When transmitting the data to the other country, the communication line is automatically cut.	Input a pause at the last of the destination FAX number.	



**(1-11)The beep sounds when the copying or printing is finished.**

Step	Check description	Assumed cause	Measures	Reference
1	Firmware Update	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update

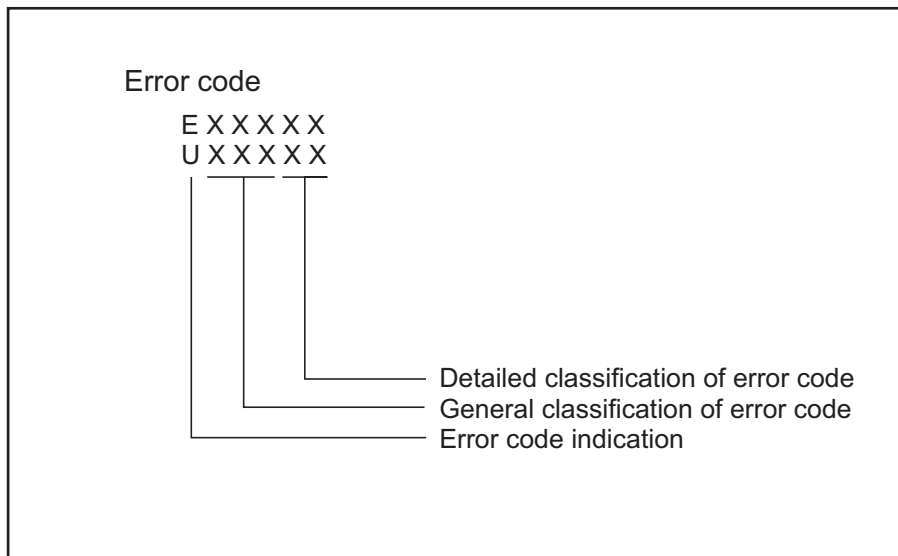
**(1-12)When the data of the A3 or B4 size originals is transmitted, all of it is transmitted as the A4 size data.**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The receivable size in the destination unit is A4 / Letter.	Select [B4] or [A3/Ledger] according to the receivable size at the Address book registration display > [i-FAX] > [Paper size].	
2	Checking the settings	The receivable size in the destination unit is A4 / Letter.	Select the condition of the destination unit when transmitting the data, choose [B4] or [A3/Ledger] according to the receivable sizes.	

**(2)Communication Errors**

Error codes are listed on the communication reports, activity report, etc. The codes consist of an error code indication U followed by a 5-digit number. (The V.34 error is indicated with E of the error code and 5-digit number)

Regarding the 5-digit number, upper 3 digits indicate error and large classification of cause, lower 2 digits small classification of cause. The lower 2 digits are 00 for the item not requiring the category.



**(3)Communication Error codes**

Error code	Contents
U00000/E00000	No response or busy after the set number of redials.
U00100/E00100	Transmission was interrupted by a press of the stop/clear key.
U00200/E00200	Reception was interrupted by a press of the [Stop] key.
U00300/E00300	Recording paper on the destination unit has run out during transmission.
U00430/E00430	Polling request was received but interrupted because of a mismatch in permitted number.Or, subaddress-based bulletin board transmission request was received but interrupted because of a mismatch in permitted ID in the transmitting unit.

Error code	Contents
U00431/E00431	An sub address bulletin board transmission was interrupted because the specified sub address password was not registered.
U00432/E00432	A sub address bulletin board transmission was interrupted because the sub address password did not match.
U00433/E00433	A sub address bulletin board transmission request was received but data was not present in the sub address box.
U00440/E00440	Sub address confidential reception was interrupted because the specified sub address password was not registered.
U00450/E00450	The reception was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission) in the destination unit.
U00460/E00460	The encryption reception was interrupted because the specified encryption box number was not registered.
U00462/E00462	Encrypted reception was interrupted because the encryption key for the specified encryption box was not registered.
U00601/E00601	Document jam or the document length exceeds the maximum.
U00613/E00613	Image writing section problem
U00656/E00656	The data was not transmitted due to an error in the modem.
U00690/E00690	System error
U00800/E00800	A page transmission error occurred because of the reception of an RTN or PIN signal.
U00811/E00811	A page reception error remained after retry of transmission in the ECM mode.
U00900/E00900	An RTN or PIN signal was transmitted because of a page reception error.
U01000/E01000	An FTT signal was received for a set number of times after TCF signal transmission at 2400 bps.Or, an RTN signal was received in response to a Q signal (excluding EOP) after transmission at 2400 bps.
U01001/E01001	Function as indicated by DIS signal is not consistent with the one of own machine.
U01016/E01016	T1 timeout occurs since MBF signal is received but DIS signal is not after sending EOM signal.
U01019/E01019	Command send retrial times exceeds since significant signal is not received after sending CNC signal. (between own machines)
U01020/E01020	Command send retrial times exceeds since significant signal is not received after sending CTC signal. (ECM)
U01021/E01021	Command send retrial times exceeds since significant signal is not received after sending EOR•Q signal. (ECM)
U01022/E01022	Command send retrial times exceeds since significant signal is not received after sending RR signal. (ECM)
U01028/E01028	T5 time-out was detected during ECM transmission (ECM).
U01052/E01052	DCN signal is received after sending RR signal (ECM)
U01080/E01080	PIP signal is received after sending PPS and NULL signals.
U01092/E01092	Communication is stopped since there are impossible combination of symbol speed and communication speed at V.34 sending.
U01093/E01093	A DCN or other inappropriate signal was received during phase B of transmission.
U01094/E01094	DCS/NSS signal send retrial time is exceeded at phase B during transmission.
U01096/E01096	DCN signal or invalid command is received at phase D during transmission.

Error code	Contents
U01097/E01097	The preset number of command retransfers was exceeded after transmission of an RRsignal or no response.
U01100/E01100	Function indicated by DCS signal is not consistent with the one of own machine.
U01101/E01101	Function indicated by NSS signal except communication type is not consistent with the one of own machine.
U01102/E01102	DTC (NSC) signal is received while own machine has no transmission data.
U01110/E01110	No response is received after sending DIS signal.
U01111/E01111	No response is received after sending DTC (NSC) signal.
U01113/E01113	No response after transmitting an FTT signal.
U01125/E01125	No response after transmitting a CNS signal. (Between the units of our make)
U01129/E01129	No response after transmitting an SPA signal. (Short protocol)
U01141/E01141	DCN signal is received after sending DTC signal.
U01143/E01143	DCN signal is received after sending FTT signal.
U01155/E01155	DCN signal is received after sending SPA signal. (simplified protocol)
U01160/E01160	Maximum transmission time per line is exceeded while receiving message.
U01162/E01162	Reception was aborted due to a modem malfunction during message reception.
U01191/E01191	Communication is stopped with error during image data receipt sequence at V.34.
U01193/E01193	No response, DCN signal or invalid command is received at phase C/D during reception.
U01194/E01194	DCN signal is received at phase B during reception.
U01195/E01195	No message is received at phase C during reception.
U01196/E01196	Error line control overflow and decoding error occurred in messages during reception.
U01400/E01400	An invalid one-touch key was specified during communication.
U01500/E01500	A communication error occurred when calling in V.8 mode.
U01600/E01600	A communication error occurred when called in V.8 mode.
U01700/E01700	A communication error occurred in phase 2 (line probing).
U01720/E01720	The communication error appears at phase 4 (replacing the modem parameter).
U01721/E01721	The communication was interrupted because there is no communication speed commonly used with the destination unit.
U01800/E01800	A communication error occurred in phase 2 (line probing).
U01810/E01810	A communication error occurred in phase 3 (primary channel equivalent device training).
U01820/E01820	The communication error appears at phase 4 (replacing the modem parameter).
U01821/E01821	The communication was interrupted because there is no communication speed commonly used with the destination unit.
U03000/E03000	No document was present in the destination unit when polling reception started.
U03200/E03200	In interoffice sub address bulletin board reception, the data was not stored in the box specified by the destination unit.
U03300/E03300	In polling reception from a unit of our own model, operation was interrupted due to a mismatch in permitted ID or telephone number. Or, in interoffice subaddress-based bulletin board reception, operation was interrupted due to a mismatch in permitted ID or telephone number.

Error code	Contents
U03400/E03400	Polling reception was interrupted because of a mismatch in individual numbers (destination unit is either of our make or by another manufacturer).
U03500/E03500	In interoffice sub address bulletin board reception, the specified sub address password was not registered in the destination unit.
U03600/E03600	An interoffice sub address bulletin board reception was interrupted because of a mismatch in the specified sub address password.
U03700/E03700	Interoffice sub address bulletin board reception failed because the destination unit had no sub address bulletin board transmission capability, or data was not stored in any sub address box in the destination unit.
U04000/E04000	In interoffice sub address transmission mode, the specified sub address password was not registered in the destination unit.
U04100/E04100	The destination unit had no sub address reception capability while the sub address transmission was executed.
U04200/E04200	In encrypted transmission, the specified encryption box was not registered in the destination unit.
U04300/E04300	The encryption transmission was carried out, but there is no encryption function at the other machine.
U04400/E04400	Encrypted transmission was interrupted because encryption keys did not agree.
U04500/E04500	Encrypted reception was interrupted because of a mismatch in encryption keys.
U05100/E05100	The transmission was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission).
U05200/E05200	Restricted reception (Password check reception) was interrupted because the permitted FAX number / ID did not match, the rejected FAX number matched, or the destination unit did not return its phone number.
U05300/E05300	The destination unit set the restricted reception (Password check reception). Consequently, the transmission was interrupted because the permitted FAX number / ID did not match, the rejected FAX number matched, or the own unit did not return its phone number.
U14000/E14000	Memory overflowed during the sub address confidential reception.
U14100/E14100	In interoffice sub address transmission, memory overflowed in the destination unit.
U19000/E19000	Memory overflowed during memory reception.
U19100/E19100	Memory overflowed in the destination unit while transmitting the data.
U19300/E19300	Transmission failed because an error appeared during JBIG encoding.

Content of Communication Errors

U00000/E00000

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The status is Busy.	Check if the destination unit can receive the data and resend the data if there is no particular problem.	

U00100/E00100

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Transmission was interrupted by a press of the stop/clear key.	Resend.	

U00200/E00200

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Reception was interrupted by a press of the [Stop] key.	Suspend resending from the destination unit or request the destination unit to resend the data.	

U00300/E00300

Step	Check description	Assumed cause	Measures	Reference
1	Request to the destination unit	Recording paper on the destination unit has run out during transmission.	Request the destination unit to set the recording papers.	

U00430/E00430

Step	Check description	Assumed cause	Measures	Reference
1	Checking the permitted number	Polling or sub address bulletin board transmission were requested, but the communication was interrupted because the permitted ID did not match. (It occurs in the transmitting unit.)	Register a valid permitted number	

U00431/E00431

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	An sub address bulletin board transmission was interrupted because the specified sub address password was not registered.	Register the sub address password in the destination unit.	

U00432/E00432

Step	Check description	Assumed cause	Measures	Reference
1	Checking the sub address password	A sub address bulletin board transmission was interrupted because the sub address password did not match.	Send by using correct the sub address password.	

U00433/E00433

Step	Check description	Assumed cause	Measures	Reference
1	Checking the sub address box	A sub address bulletin board transmission request was received but data was not present in the sub address box.	Set data in the sub address box.	

U00440/E00440

Step	Check description	Assumed cause	Measures	Reference
1	Checking the sub address password	Sub address confidential reception was interrupted because the specified sub address password was not registered.	Register the sub address password.	

U00450/E00450

Step	Check description	Assumed cause	Measures	Reference
1	Checking the permitted number	The reception was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission) in the destination unit.	Register the permitted number to be consistent at own machine side.	

U00460/E00460

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	The encryption reception was interrupted because the specified encryption box number was not registered.	Register an encrypted box number.	

U00462/E00462

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	Encrypted reception was interrupted because the encryption key for the specified encryption box was not registered.	Register an encryption key.	

U00601/E00601

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	Original jam	Clear original feed jam and resend.	
2	Checking the original	The original length exceeds the maximum allowed.	Check if the original length does not exceed 1.6 meter and resend.	

U00613/E00613

Step	Check description	Assumed cause	Measures	Reference
1	Checking the service call error record	Image writing section error	Check the service call error record and perform the corrective actions.	Event Log Report Output

U00656/E00656

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Transmission was interrupted because there was an error in the modem.	Resend.	
2	Resetting the main power and reinstalling the FAX PWB	Transmission was interrupted because there was an error in the modem.	Turn off the power switch and pull out the power plug. After passing 5s, reattach the FAX PWB and reinsert the power plug. Then, turn on the power switch.	
3	Checking the firmware	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
4	Initializing the fax	The FAX initial value was changed.	Execute U600 to initialize the FAX.	U600 Execution
5	Checking the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

U00690/E00690

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	System error	Turn off the power switch and pull out the power plug. After passing 5s, reinsert the power plug and turn on the power switch.	
2	Measures for the system error	System error in the main unit	Perform the corrective actions for the system error in the main unit.	System Error List

U00800/E00800

Step	Check description	Assumed cause	Measures	Reference
1	Checking the transmit start speed	A page transmission error occurred because of reception of a RTN or PIN signal.	In case pages are not properly sent and resending does not solve it, reduce transmit start speed and resend the data.	U630 Execution

U00811/E00811

Step	Check description	Assumed cause	Measures	Reference
1	Resending	A page reception error remained after retry of transmission in the ECM mode.	In case pages are not properly sent and resending does not solve it, reduce transmit start speed and resend the data.	U630 Execution

U00900/E00900

Step	Check description	Assumed cause	Measures	Reference
1	Resending	An RTN or PIN signal was transmitted because of a page reception error.	Resend the page if there is a page not transmitted properly.	

U01000/E01000

Step	Check description	Assumed cause	Measures	Reference
1	Resending	An FTT signal was received for a set number of times after TCF signal transmission at 2400 bps. Or, an RTN signal was received in response to a Q signal (excluding EOP) after transmission at 2400 bps.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01001/E01001

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Function as indicated by DIS signal is not consistent with the one of own machine.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01016/E01016

Step	Check description	Assumed cause	Measures	Reference
1	Resending	T1 timeout occurs since MBF signal is received but DIS signal is not after sending EOM signal.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01019/E01019

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending CNC signal. (between own machines)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01020/E01020

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending CTC signal. (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution



U01021/E01021

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending EOR•Q signal. (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01022/E01022

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending RR signal. (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01028/E01028

Step	Check description	Assumed cause	Measures	Reference
1	Resending	T5 timeout is detected when sending in ECM (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01052/E01052

Step	Check description	Assumed cause	Measures	Reference
1	Resending	DCN signal is received after sending RR signal (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01080/E01080

Step	Check description	Assumed cause	Measures	Reference
1	Resending	PIP signal is received after sending PPS and NULL signals.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01092/E01092

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Communication is stopped since there are impossible combination of symbol speed and communication speed at V.34 sending.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01093/E01093

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the modem detection level at U650 [RX Mdm Level]. (Initial setting: -43dBm)	U650 Execution
2	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the G3 reception cable equalizer in U650 [Reg G3 RX Eq]. (Initial setting: 0dBm)	U650 Execution

U01094/E01094

Step	Check description	Assumed cause	Measures	Reference
1	Resending	DCS/NSS signal send retrial time is exceeded at phase B during transmission.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01096/E01096

Step	Check description	Assumed cause	Measures	Reference
1	Resending	DCN signal or invalid command is received at phase D during transmission.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01097/E01097

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The preset number of command retransfers was exceeded after transmission of an RRsignal or no response.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01100/E01100

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Function indicated by DCS signal is not consistent with the one of own machine.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01101/E01101

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Function indicated by NSS signal except communication type is not consistent with the one of own machine.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01102/E01102

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DTC (NSC) signal is received while own machine has no transmission data.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01110/E01110

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response is received after sending DIS signal.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01111/E01111

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response is received after sending DTC (NSC) signal.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01113/E01113

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the modem detection level at U650 [RX Mdm Level]. (Initial setting: -43dBm)	U650 Execution
2	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the G3 reception cable equalizer in U650 [Reg G3 RX Eqr]. (Initial setting: 0dBm)	U650 Execution

U01125/E01125

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response is received after sending CNS signal. (between own machine)	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01129/E01129

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response after transmitting an SPA signal. (Short protocol)	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01141/E01141

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DCN signal is received after sending DTC signal.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01143/E01143

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	DCN signal is received after sending FTT signal.	Set the G3 reception cable equalizer in U650 [Reg G3 RX Eqr]. (Initial setting: 0dBm)	U650 Execution

U01155/E01155

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DCN signal is received after sending SPA signal. (simplified protocol)	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01160/E01160

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Maximum transmission time per line is exceeded while receiving message.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01162/E01162

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Maximum transmission time per line is exceeded while receiving message.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01191/E01191

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Communication is stopped with error during image data receipt sequence at V.34.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01193/E01193

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	No response, DCN signal or invalid command is received at phase C/D during reception.	Extend T2 time-out time in U641 [T2 TIME OUT]. (Change from the initial setting 69 to 150.)	U641 Execution
2	Checking the settings	Line condition is poor.	Set the corrective measures for echoes at the reception in U630 [RX Echo]. (Initial setting: 75)	U630 Execution
3	Changing the transmit start timing	Line condition is poor.	Change the reception starting speed to "9600bps" or less.	U630 Execution

U01194/E01194

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DCN signal is received at phase B during reception.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01195/E01195

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	No message is received at phase C during reception.	Extend T2 time-out time in U641 [T2 TIME OUT]. (Change from the initial setting 69 to 150.)	U641 Execution
2	Checking the settings	Line condition is poor.	Set the corrective measures for echoes at the reception in U630 [RX Echo]. (Initial setting: 75)	U630 Execution
3	Changing the transmit start timing	Line condition is poor.	Change the reception starting speed to "9600bps" or less.	U630 Execution

U01196/E01196

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Error line control overflow and decoding error occurred in messages during reception.	Resend.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01400/E01400

Step	Check description	Assumed cause	Measures	Reference
1	Checking the telephone number	"#" exists in advance of "x" on the phone numbers of the destination unit, so it is processed as the invalid dial line.	Delete "#" from the registered numbers if "#" exists in advance of "x" on the phone numbers of the destination unit.	

U01500/E01500

Step	Check description	Assumed cause	Measures	Reference
1	Checking the transmit start speed	The communication line is the poor condition.	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
2	Checking the transmit start speed	The communication line condition is poor and an error frequently occurs.	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01600/E01600

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	The communication line is the poor condition.	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the transmit start timing	The communication line condition is poor and an error frequently occurs.	Request the destination unit to resend the data after lowering the reception start speed.	U630 Execution

U01700/E01700

Step	Check description	Assumed cause	Measures	Reference
1	Resending	A communication error occurred in phase 2 (line probing).	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01720/E01720

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The communication error appears at phase 4 (replacing the modem parameter).	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01721/E01721

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The communication was interrupted because there is no communication speed commonly used with the destination unit.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01800/E01800

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	A communication error occurred in phase 2 (line probing).	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01810/E01810

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	A communication error occurred in phase 3 (primary channel equivalent device training).	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01820/E01820

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	A communication error occurred in phase 3 (primary channel equivalent device training).	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01821/E01821

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	The communication was interrupted because there is no communication speed commonly used with the destination unit.	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U03000/E03000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	No document was present in the destination unit when polling reception started.	Request the destination unit to set the originals.	

U03200/E03200

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	There is no data in the sub address box in the main unit that are specified from the destination unit.	Request the destination unit to store the original data in the sub address box.	

U03300/E03300

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	The permitted ID and FAX number registered in the destination unit are incorrect.	Request the destination unit to register the own ID and the own FAX number as the permitted ID and the permitted FAX number.	



U03400/E03400

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	In polling reception, the operation was interrupted because the password input in the destination unit and the own FAX number in the receiver did not match.	Revise it so that the password input at the destination machine is consistent with the receiversownFAXIDto receive again.'	

U03500/E03500

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	In polling reception, the operation was interrupted because the password input in the destination unit and the own FAX number in the receiver did not match.	Revise it so that the password input at the destination machine is consistent with the receiversownFAXIDto receive again.'	

U03600/E03600

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	Sub address bulletin board reception was interrupted because the specified sub address password did not match.	Resend the data after inputting the sub address password registered in the destination unit.	

U03700/E03700

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	Destination machine has no sub address bulletin board communication function or no originals are stored in any original delivery box (sub address box).	Check if the destination unit has a sub address bulletin board communication function. If available, request the destination unit to save the original data in the sub address box.	

U04000/E04000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The original was transmitted to the sub address box, but the specified box was not registered in the destination unit that is our own model.	Register the sub address password in the destination unit.	
2	Checking the sub address of the FAX transmission condition	The original was transmitted to the sub address box in the destination unit that is our own model, but the sub address of the transmission condition did not match.	Match the sub address in the FAX forward condition	

U04100/E04100

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The destination unit had no sub address reception capability while the sub address transmission was executed.	Transmit the data according to the reception function in the destination unit.	

U04200/E04200

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	In encrypted transmission, the specified encryption box was not registered in the destination unit.	Request the destination unit to register the encrypted box.	

U04300/E04300

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The encryption transmission was carried out, but there is no encryption function at the other machine.	Transmit the data according to the reception function in the destination unit.	

U04400/E04400

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	Encrypted transmission was interrupted because encryption keys did not agree.	Request resending after checking the encryption key registered in the receiving and sending machines.	

U04500/E04500

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	Encrypted transmission was interrupted because encryption keys did not agree.	Request resending after checking the encryption key registered in the receiving and sending machines.	

U05100/E05100

Step	Check description	Assumed cause	Measures	Reference
1	Checking the permitted number	The transmission was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission).	Resend after confirming the authorization number that has been registered.	

U05200/E05200

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The number does not match a permitted FAX number / ID, or it matches a rejected FAX number.	Change the restricted reception settings.	
2	Checking the setting in the destination unit	The own telephone number is not informed from the destination unit.	Request the destination unit to register the own telephone number.	

U05300/E05300

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The number does not match a permitted FAX number / ID, or it matches a rejected FAX number.	Ask the destination unit to change the restricted reception settings.	
2	Checking the settings	The main unit did not acknowledge its phone number in question .	Request the destination unit to register the own telephone number.	

U14000/E14000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the memory	The reception to the FAX box was interrupted due to memory overflow in its unit.	Release memory by printing originals stored in memory or cancel FAX box reception.	

U14100/E14100

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	Transmission was interrupted due to the memory overflow in the destination unit when transmitting into the sub address box.	Request the destination unit to release memory.	

U19000/E19000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the memory	The reception was interrupted due to the memory overflow in the main unit during memory reception.	Release memory by printing originals stored in memory.	

U19100/E19100

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The transmission was interrupted because there is an error in the data during transmission.	Resend.	
2	Resetting the main power and reinstalling the FAX PWB	The transmission was interrupted because there is an error in the data during transmission.	Turn off the power switch and pull out the power plug. After passing 5s, reattach the FAX PWB and reinsert the power plug. Then, turn on the power switch.	

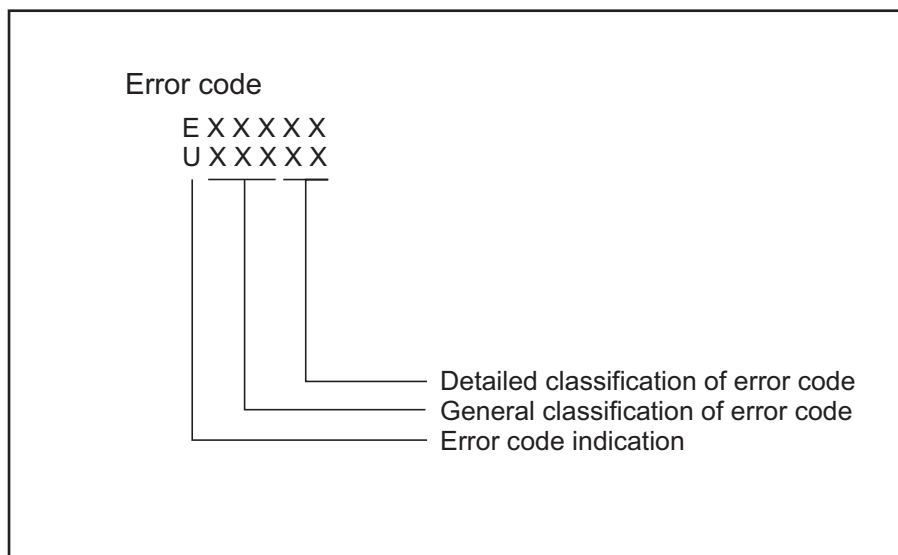
U19300/E19300

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The transmission was interrupted because there is an error in the data during transmission.	Resend.	
2	Resetting the main power and reinstalling the FAX PWB	The transmission was interrupted because there is an error in the data during transmission.	Turn off the power switch and pull out the power plug. After passing 5s, reattach the FAX PWB and reinsert the power plug. Then, turn on the power switch.	
3	Checking the firmware	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
4	Initializing the fax	The FAX initial value was changed.	Execute U600 to initialize the FAX.	U600 Execution
5	Checking the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

**(4)Communication Errors**

Error codes are listed on the communication reports, activity report, etc. The codes consist of an error code indication U followed by a 5-digit number. (The V.34 error is indicated with E of the error code and 5-digit number)

Regarding the 5-digit number, upper 3 digits indicate error and large classification of cause, lower 2 digits small classification of cause. The lower 2 digits are 00 for the item not requiring the category.



**(5)Communication Error codes**

Error code	Contents
U00000/E00000	No response or busy after the set number of redials.
U00100/E00100	Transmission was interrupted by a press of the stop/clear key.
U00200/E00200	Reception was interrupted by a press of the [Stop] key.
U00300/E00300	Recording paper on the destination unit has run out during transmission.
U00430/E00430	Polling request was received but interrupted because of a mismatch in permitted number.Or, subaddress-based bulletin board transmission request was received but interrupted because of a mismatch in permitted ID in the transmitting unit.

Error code	Contents
U00431/E00431	An sub address bulletin board transmission was interrupted because the specified sub address password was not registered.
U00432/E00432	A sub address bulletin board transmission was interrupted because the sub address password did not match.
U00433/E00433	A sub address bulletin board transmission request was received but data was not present in the sub address box.
U00440/E00440	Sub address confidential reception was interrupted because the specified sub address password was not registered.
U00450/E00450	The reception was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission) in the destination unit.
U00460/E00460	The encryption reception was interrupted because the specified encryption box number was not registered.
U00462/E00462	Encrypted reception was interrupted because the encryption key for the specified encryption box was not registered.
U00601/E00601	Document jam or the document length exceeds the maximum.
U00613/E00613	Image writing section problem
U00656/E00656	The data was not transmitted due to an error in the modem.
U00690/E00690	System error
U00800/E00800	A page transmission error occurred because of the reception of an RTN or PIN signal.
U00811/E00811	A page reception error remained after retry of transmission in the ECM mode.
U00900/E00900	An RTN or PIN signal was transmitted because of a page reception error.
U01000/E01000	An FTT signal was received for a set number of times after TCF signal transmission at 2400 bps. Or, an RTN signal was received in response to a Q signal (excluding EOP) after transmission at 2400 bps.
U01001/E01001	Function as indicated by DIS signal is not consistent with the one of own machine.
U01016/E01016	T1 timeout occurs since MBF signal is received but DIS signal is not after sending EOM signal.
U01019/E01019	Command send retrial times exceeds since significant signal is not received after sending CNC signal. (between own machines)
U01020/E01020	Command send retrial times exceeds since significant signal is not received after sending CTC signal. (ECM)
U01021/E01021	Command send retrial times exceeds since significant signal is not received after sending EOR•Q signal. (ECM)
U01022/E01022	Command send retrial times exceeds since significant signal is not received after sending RR signal. (ECM)
U01028/E01028	T5 time-out was detected during ECM transmission (ECM).
U01052/E01052	DCN signal is received after sending RR signal (ECM)
U01080/E01080	PIP signal is received after sending PPS and NULL signals.
U01092/E01092	Communication is stopped since there are impossible combination of symbol speed and communication speed at V.34 sending.
U01093/E01093	A DCN or other inappropriate signal was received during phase B of transmission.
U01094/E01094	DCS/NSS signal send retrial time is exceeded at phase B during transmission.
U01096/E01096	DCN signal or invalid command is received at phase D during transmission.

Error code	Contents
U01097/E01097	The preset number of command retransfers was exceeded after transmission of an RRsignal or no response.
U01100/E01100	Function indicated by DCS signal is not consistent with the one of own machine.
U01101/E01101	Function indicated by NSS signal except communication type is not consistent with the one of own machine.
U01102/E01102	DTC (NSC) signal is received while own machine has no transmission data.
U01110/E01110	No response is received after sending DIS signal.
U01111/E01111	No response is received after sending DTC (NSC) signal.
U01113/E01113	No response after transmitting an FTT signal.
U01125/E01125	No response after transmitting a CNS signal. (Between the units of our make)
U01129/E01129	No response after transmitting an SPA signal. (Short protocol)
U01141/E01141	DCN signal is received after sending DTC signal.
U01143/E01143	DCN signal is received after sending FTT signal.
U01155/E01155	DCN signal is received after sending SPA signal. (simplified protocol)
U01160/E01160	Maximum transmission time per line is exceeded while receiving message.
U01162/E01162	Reception was aborted due to a modem malfunction during message reception.
U01191/E01191	Communication is stopped with error during image data receipt sequence at V.34.
U01193/E01193	No response, DCN signal or invalid command is received at phase C/D during reception.
U01194/E01194	DCN signal is received at phase B during reception.
U01195/E01195	No message is received at phase C during reception.
U01196/E01196	Error line control overflow and decoding error occurred in messages during reception.
U01400/E01400	An invalid one-touch key was specified during communication.
U01500/E01500	A communication error occurred when calling in V.8 mode.
U01600/E01600	A communication error occurred when called in V.8 mode.
U01700/E01700	A communication error occurred in phase 2 (line probing).
U01720/E01720	The communication error appears at phase 4 (replacing the modem parameter).
U01721/E01721	The communication was interrupted because there is no communication speed commonly used with the destination unit.
U01800/E01800	A communication error occurred in phase 2 (line probing).
U01810/E01810	A communication error occurred in phase 3 (primary channel equivalent device training).
U01820/E01820	The communication error appears at phase 4 (replacing the modem parameter).
U01821/E01821	The communication was interrupted because there is no communication speed commonly used with the destination unit.
U03000/E03000	No document was present in the destination unit when polling reception started.
U03200/E03200	In interoffice sub address bulletin board reception, the data was not stored in the box specified by the destination unit.
U03300/E03300	In polling reception from a unit of our own model, operation was interrupted due to a mismatch in permitted ID or telephone number. Or, in interoffice subaddress-based bulletin board reception, operation was interrupted due to a mismatch in permitted ID or telephone number.

Error code	Contents
U03400/E03400	Polling reception was interrupted because of a mismatch in individual numbers (destination unit is either of our make or by another manufacturer).
U03500/E03500	In interoffice sub address bulletin board reception, the specified sub address password was not registered in the destination unit.
U03600/E03600	An interoffice sub address bulletin board reception was interrupted because of a mismatch in the specified sub address password.
U03700/E03700	Interoffice sub address bulletin board reception failed because the destination unit had no sub address bulletin board transmission capability, or data was not stored in any sub address box in the destination unit.
U04000/E04000	In interoffice sub address transmission mode, the specified sub address password was not registered in the destination unit.
U04100/E04100	The destination unit had no sub address reception capability while the sub address transmission was executed.
U04200/E04200	In encrypted transmission, the specified encryption box was not registered in the destination unit.
U04300/E04300	The encryption transmission was carried out, but there is no encryption function at the other machine.
U04400/E04400	Encrypted transmission was interrupted because encryption keys did not agree.
U04500/E04500	Encrypted reception was interrupted because of a mismatch in encryption keys.
U05100/E05100	The transmission was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission).
U05200/E05200	Restricted reception (Password check reception) was interrupted because the permitted FAX number / ID did not match, the rejected FAX number matched, or the destination unit did not return its phone number.
U05300/E05300	The destination unit set the restricted reception (Password check reception). Consequently, the transmission was interrupted because the permitted FAX number / ID did not match, the rejected FAX number matched, or the own unit did not return its phone number.
U14000/E14000	Memory overflowed during the sub address confidential reception.
U14100/E14100	In interoffice sub address transmission, memory overflowed in the destination unit.
U19000/E19000	Memory overflowed during memory reception.
U19100/E19100	Memory overflowed in the destination unit while transmitting the data.
U19300/E19300	Transmission failed because an error appeared during JBIG encoding.

Content of Communication Errors

U00000/E00000

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The status is Busy.	Check if the destination unit can receive the data and resend the data if there is no particular problem.	

U00100/E00100

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Transmission was interrupted by a press of the stop/clear key.	Resend.	

U00200/E00200

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Reception was interrupted by a press of the [Stop] key.	Suspend resending from the destination unit or request the destination unit to resend the data.	

U00300/E00300

Step	Check description	Assumed cause	Measures	Reference
1	Request to the destination unit	Recording paper on the destination unit has run out during transmission.	Request the destination unit to set the recording papers.	

U00430/E00430

Step	Check description	Assumed cause	Measures	Reference
1	Checking the permitted number	Polling or sub address bulletin board transmission were requested, but the communication was interrupted because the permitted ID did not match. (It occurs in the transmitting unit.)	Register a valid permitted number	

U00431/E00431

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	An sub address bulletin board transmission was interrupted because the specified sub address password was not registered.	Register the sub address password in the destination unit.	

U00432/E00432

Step	Check description	Assumed cause	Measures	Reference
1	Checking the sub address password	A sub address bulletin board transmission was interrupted because the sub address password did not match.	Send by using correct the sub address password.	

U00433/E00433

Step	Check description	Assumed cause	Measures	Reference
1	Checking the sub address box	A sub address bulletin board transmission request was received but data was not present in the sub address box.	Set data in the sub address box.	

U00440/E00440

Step	Check description	Assumed cause	Measures	Reference
1	Checking the sub address password	Sub address confidential reception was interrupted because the specified sub address password was not registered.	Register the sub address password.	



U00450/E00450

Step	Check description	Assumed cause	Measures	Reference
1	Checking the permitted number	The reception was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission) in the destination unit.	Register the permitted number to be consistent at own machine side.	

U00460/E00460

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	The encryption reception was interrupted because the specified encryption box number was not registered.	Register an encrypted box number.	

U00462/E00462

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	Encrypted reception was interrupted because the encryption key for the specified encryption box was not registered.	Register an encryption key.	

U00601/E00601

Step	Check description	Assumed cause	Measures	Reference
1	Checking the original	Original jam	Clear original feed jam and resend.	
2	Checking the original	The original length exceeds the maximum allowed.	Check if the original length does not exceed 1.6 meter and resend.	

U00613/E00613

Step	Check description	Assumed cause	Measures	Reference
1	Checking the service call error record	Image writing section error	Check the service call error record and perform the corrective actions.	Event Log Report Output

U00656/E00656

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Transmission was interrupted because there was an error in the modem.	Resend.	
2	Resetting the main power and reinstalling the FAX PWB	Transmission was interrupted because there was an error in the modem.	Turn off the power switch and pull out the power plug. After passing 5s, reattach the FAX PWB and reinsert the power plug. Then, turn on the power switch.	
3	Checking the firmware	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update

Step	Check description	Assumed cause	Measures	Reference
4	Initializing the fax	The FAX initial value was changed.	Execute U600 to initialize the FAX.	U600 Execution
5	Checking the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

U00690/E00690

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	System error	Turn off the power switch and pull out the power plug. After passing 5s, reinsert the power plug and turn on the power switch.	
2	Measures for the system error	System error in the main unit	Perform the corrective actions for the system error in the main unit.	System Error List

U00800/E00800

Step	Check description	Assumed cause	Measures	Reference
1	Checking the transmit start speed	A page transmission error occurred because of reception of a RTN or PIN signal.	In case pages are not properly sent and resending does not solve it, reduce transmit start speed and resend the data.	U630 Execution

U00811/E00811

Step	Check description	Assumed cause	Measures	Reference
1	Resending	A page reception error remained after retry of transmission in the ECM mode.	In case pages are not properly sent and resending does not solve it, reduce transmit start speed and resend the data.	U630 Execution

U00900/E00900

Step	Check description	Assumed cause	Measures	Reference
1	Resending	An RTN or PIN signal was transmitted because of a page reception error.	Resend the page if there is a page not transmitted properly.	

U01000/E01000

Step	Check description	Assumed cause	Measures	Reference
1	Resending	An FTT signal was received for a set number of times after TCF signal transmission at 2400 bps. Or, an RTN signal was received in response to a Q signal (excluding EOP) after transmission at 2400 bps.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01001/E01001

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Function as indicated by DIS signal is not consistent with the one of own machine.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01016/E01016

Step	Check description	Assumed cause	Measures	Reference
1	Resending	T1 timeout occurs since MBF signal is received but DIS signal is not after sending EOM signal.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01019/E01019

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending CNC signal. (between own machines)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01020/E01020

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending CTC signal. (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01021/E01021

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending EOR•Q signal. (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01022/E01022

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Command send retrial times exceeds since significant signal is not received after sending RR signal. (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01028/E01028

Step	Check description	Assumed cause	Measures	Reference
1	Resending	T5 timeout is detected when sending in ECM (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01052/E01052

Step	Check description	Assumed cause	Measures	Reference
1	Resending	DCN signal is received after sending RR signal (ECM)	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01080/E01080

Step	Check description	Assumed cause	Measures	Reference
1	Resending	PIP signal is received after sending PPS and NULL signals.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01092/E01092

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Communication is stopped since there are impossible combination of symbol speed and communication speed at V.34 sending.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01093/E01093

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the modem detection level at U650 [RX Mdm Level]. (Initial setting: -43dBm)	U650 Execution
2	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the G3 reception cable equalizer in U650 [Reg G3 RX Eq]. (Initial setting: 0dBm)	U650 Execution

U01094/E01094

Step	Check description	Assumed cause	Measures	Reference
1	Resending	DCS/NSS signal send retrial time is exceeded at phase B during transmission.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01096/E01096

Step	Check description	Assumed cause	Measures	Reference
1	Resending	DCN signal or invalid command is received at phase D during transmission.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01097/E01097

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The preset number of command retransfers was exceeded after transmission of an RRsignal or no response.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01100/E01100

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Function indicated by DCS signal is not consistent with the one of own machine.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01101/E01101

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Function indicated by NSS signal except communication type is not consistent with the one of own machine.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01102/E01102

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DTC (NSC) signal is received while own machine has no transmission data.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01110/E01110

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response is received after sending DIS signal.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01111/E01111

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response is received after sending DTC (NSC) signal.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01113/E01113

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the modem detection level at U650 [RX Mdm Level]. (Initial setting: -43dBm)	U650 Execution
2	Checking the settings	The modem is not detected since the received signal is attenuated with its frequency response.	Set the G3 reception cable equalizer in U650 [Reg G3 RX Eqr]. (Initial setting: 0dBm)	U650 Execution

U01125/E01125

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response is received after sending CNS signal. (between own machine)	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01129/E01129

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	No response after transmitting an SPA signal. (Short protocol)	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01141/E01141

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DCN signal is received after sending DTC signal.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01143/E01143

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	DCN signal is received after sending FTT signal.	Set the G3 reception cable equalizer in U650 [Reg G3 RX Eqr]. (Initial setting: 0dBm)	U650 Execution

U01155/E01155

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DCN signal is received after sending SPA signal. (simplified protocol)	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01160/E01160

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Maximum transmission time per line is exceeded while receiving message.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01162/E01162

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Maximum transmission time per line is exceeded while receiving message.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01191/E01191

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	Communication is stopped with error during image data receipt sequence at V.34.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01193/E01193

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	No response, DCN signal or invalid command is received at phase C/D during reception.	Extend T2 time-out time in U641 [T2 TIME OUT]. (Change from the initial setting 69 to 150.)	U641 Execution
2	Checking the settings	Line condition is poor.	Set the corrective measures for echoes at the reception in U630 [RX Echo]. (Initial setting: 75)	U630 Execution
3	Changing the transmit start timing	Line condition is poor.	Change the reception starting speed to "9600bps" or less.	U630 Execution



U01194/E01194

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	DCN signal is received at phase B during reception.	Request resending.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01195/E01195

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	No message is received at phase C during reception.	Extend T2 time-out time in U641 [T2 TIME OUT]. (Change from the initial setting 69 to 150.)	U641 Execution
2	Checking the settings	Line condition is poor.	Set the corrective measures for echoes at the reception in U630 [RX Echo]. (Initial setting: 75)	U630 Execution
3	Changing the transmit start timing	Line condition is poor.	Change the reception starting speed to "9600bps" or less.	U630 Execution

U01196/E01196

Step	Check description	Assumed cause	Measures	Reference
1	Resending	Error line control overflow and decoding error occurred in messages during reception.	Resend.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01400/E01400

Step	Check description	Assumed cause	Measures	Reference
1	Checking the telephone number	"#" exists in advance of "x" on the phone numbers of the destination unit, so it is processed as the invalid dial line.	Delete "#" from the registered numbers if "#" exists in advance of "x" on the phone numbers of the destination unit.	

U01500/E01500

Step	Check description	Assumed cause	Measures	Reference
1	Checking the transmit start speed	The communication line is the poor condition.	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
2	Checking the transmit start speed	The communication line condition is poor and an error frequently occurs.	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01600/E01600

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	The communication line is the poor condition.	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the transmit start timing	The communication line condition is poor and an error frequently occurs.	Request the destination unit to resend the data after lowering the reception start speed.	U630 Execution

U01700/E01700

Step	Check description	Assumed cause	Measures	Reference
1	Resending	A communication error occurred in phase 2 (line probing).	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01720/E01720

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The communication error appears at phase 4 (replacing the modem parameter).	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01721/E01721

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The communication was interrupted because there is no communication speed commonly used with the destination unit.	Resend.	
2	Checking the transmit start speed	Line condition is poor. (Destination unit)	Execute U630 [TX Speed] to reduce the transmit start speed. Then, resend the data.	U630 Execution
3	Changing the initial value	Line condition is poor. (Own machine)	Change the default value of the transmit start speed by executing U630 [TX Speed].	U630 Execution

U01800/E01800

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	A communication error occurred in phase 2 (line probing).	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01810/E01810

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	A communication error occurred in phase 3 (primary channel equivalent device training).	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01820/E01820

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	A communication error occurred in phase 3 (primary channel equivalent device training).	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U01821/E01821

Step	Check description	Assumed cause	Measures	Reference
1	Request for resending	The communication was interrupted because there is no communication speed commonly used with the destination unit.	Request the destination unit to resend the data after reducing the transmit start speed.	
2	Changing the initial value	Line condition is poor. (Own machine)	Change the reception speed by executing U630 [RX Speed].	U630 Execution

U03000/E03000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	No document was present in the destination unit when polling reception started.	Request the destination unit to set the originals.	

U03200/E03200

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	There is no data in the sub address box in the main unit that are specified from the destination unit.	Request the destination unit to store the original data in the sub address box.	

U03300/E03300

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	The permitted ID and FAX number registered in the destination unit are incorrect.	Request the destination unit to register the own ID and the own FAX number as the permitted ID and the permitted FAX number.	

U03400/E03400

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	In polling reception, the operation was interrupted because the password input in the destination unit and the own FAX number in the receiver did not match.	Revise it so that the password input at the destination machine is consistent with the receiversownFAXIDto receive again.'	

U03500/E03500

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	In polling reception, the operation was interrupted because the password input in the destination unit and the own FAX number in the receiver did not match.	Revise it so that the password input at the destination machine is consistent with the receiversownFAXIDto receive again.'	

U03600/E03600

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	Sub address bulletin board reception was interrupted because the specified sub address password did not match.	Resend the data after inputting the sub address password registered in the destination unit.	

U03700/E03700

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	Destination machine has no sub address bulletin board communication function or no originals are stored in any original delivery box (sub address box).	Check if the destination unit has a sub address bulletin board communication function. If available, request the destination unit to save the original data in the sub address box.	

U04000/E04000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The original was transmitted to the sub address box, but the specified box was not registered in the destination unit that is our own model.	Register the sub address password in the destination unit.	
2	Checking the sub address of the FAX transmission condition	The original was transmitted to the sub address box in the destination unit that is our own model, but the sub address of the transmission condition did not match.	Match the sub address in the FAX forward condition	

U04100/E04100

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The destination unit had no sub address reception capability while the sub address transmission was executed.	Transmit the data according to the reception function in the destination unit.	

U04200/E04200

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	In encrypted transmission, the specified encryption box was not registered in the destination unit.	Request the destination unit to register the encrypted box.	

U04300/E04300

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The encryption transmission was carried out, but there is no encryption function at the other machine.	Transmit the data according to the reception function in the destination unit.	

U04400/E04400

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	Encrypted transmission was interrupted because encryption keys did not agree.	Request resending after checking the encryption key registered in the receiving and sending machines.	

U04500/E04500

Step	Check description	Assumed cause	Measures	Reference
1	Checking the encryption key	Encrypted transmission was interrupted because encryption keys did not agree.	Request resending after checking the encryption key registered in the receiving and sending machines.	

U05100/E05100

Step	Check description	Assumed cause	Measures	Reference
1	Checking the permitted number	The transmission was interrupted because the permitted ID and FAX number did not match in the restricted transmission (password check transmission).	Resend after confirming the authorization number that has been registered.	

U05200/E05200

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The number does not match a permitted FAX number / ID, or it matches a rejected FAX number.	Change the restricted reception settings.	
2	Checking the setting in the destination unit	The own telephone number is not informed from the destination unit.	Request the destination unit to register the own telephone number.	

U05300/E05300

Step	Check description	Assumed cause	Measures	Reference
1	Checking the setting in the destination unit	The number does not match a permitted FAX number / ID, or it matches a rejected FAX number.	Ask the destination unit to change the restricted reception settings.	
2	Checking the settings	The main unit did not acknowledge its phone number in question .	Request the destination unit to register the own telephone number.	

U14000/E14000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the memory	The reception to the FAX box was interrupted due to memory overflow in its unit.	Release memory by printing originals stored in memory or cancel FAX box reception.	

U14100/E14100

Step	Check description	Assumed cause	Measures	Reference
1	Checking the destination unit	Transmission was interrupted due to the memory overflow in the destination unit when transmitting into the sub address box.	Request the destination unit to release memory.	

U19000/E19000

Step	Check description	Assumed cause	Measures	Reference
1	Checking the memory	The reception was interrupted due to the memory overflow in the main unit during memory reception.	Release memory by printing originals stored in memory.	

U19100/E19100

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The transmission was interrupted because there is an error in the data during transmission.	Resend.	
2	Resetting the main power and reinstalling the FAX PWB	The transmission was interrupted because there is an error in the data during transmission.	Turn off the power switch and pull out the power plug. After passing 5s, reattach the FAX PWB and reinsert the power plug. Then, turn on the power switch.	

U19300/E19300

Step	Check description	Assumed cause	Measures	Reference
1	Resending	The transmission was interrupted because there is an error in the data during transmission.	Resend.	
2	Resetting the main power and reinstalling the FAX PWB	The transmission was interrupted because there is an error in the data during transmission.	Turn off the power switch and pull out the power plug. After passing 5s, reattach the FAX PWB and reinsert the power plug. Then, turn on the power switch.	
3	Checking the firmware	The firmware is not the latest version.	Upgrade the fax firmware to the latest version.	Firmware Update
4	Initializing the fax	The FAX initial value was changed.	Execute U600 to initialize the FAX.	U600 Execution
5	Checking the FAX PWB	The FAX PWB is faulty.	Replace the FAX PWB.	FAX Installation Guide

## 7 - 5 Send Related Errors

### (1)Send Related Errors

No.	Contents
(1)	The sending error 2101 does not disappear even if changing the host name or the security software settings.
(2)	Sending error 2203 does not disappear.
(3)	The scanning data from the contact glass is automatically sent.

#### Content of Send Related Errors

#### (1-1)The sending error 2101 does not disappear even if changing the host name or the security software settings.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The incorrect port number has been set.	Change the SMB port number from "139" to "445".	

#### (1-2)Sending error 2203 does not disappear.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The Windows Fire Wall is not properly set. (Windows Vista / 7 / 8)	Select [Allow a program or feature through Windows Firewall] at [Control Panel] > [System and Security] > [Windows Firewall] and check [File and Printer Sharing] and also check the right side checkbox	

#### (1-3)The scanning data from the contact glass is automatically sent.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	[Continuous Scan] is not set to [On].	Press [Send] key or [FAX] key, and select [On] in [Advanced setup] > [Continuous scan].	
2	Checking the settings	[Continuous Scan] is not set to [On].	Select [On] at [Functions] > [Continuous scan]	

### (2)Sending Errors (Error Codes)

#### (2-1)Scan to E-mail Error Codes

Error code	Contents
1101	SMTP/POP3 server does not exist on the network.
1102	Login to the SMTP/POP3 server has failed.
1104	Destination address domain is restricted and transmission is denied.
1105	Invalid SMTP protocol
1106	The sender address is not set.
2101	Connection to the SMTP/POP3 server has failed.
2102	Connection to the SMTP/POP3 server has failed. (Connection timeout)
2103	The server cannot establish communication.
2201	Communication to the SMTP/POP3 server has failed.



Error code	Contents
2202	Communication to the SMTP/POP3 server has failed. (Connection timeout)
2204	The size of scanning exceeded its limit.
3101	SMTP/POP3 server responded with an error.
3201	No SMTP authentication is found.
4803	Failed to establish the SSL session.

Content of Scan to E-mail Error Codes

Scan to E-mail error code : 1101

SMTP/POP3 server does not exist on the network.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SMTP/POP3 server name	SMTP / POP3 server name is incorrect.	Correct the SMTP / POP3 server name at [Function Settings] > [E-mail] via the command center.	
2	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
3	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	

Scan to E-mail error code : 1102

Login to the SMTP/POP3 server has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SMTP/POP3 server name	The user name or the password is incorrect.	Correct the SMTP / POP3 user name or password at [Function Settings] > [E-mail] via the command center.	
2	Checking the SMTP/POP3 server	The SMTP/POP3 server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to E-mail error code : 1104

Destination address domain is restricted and transmission is denied.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	Destination address domain is restricted and transmission is denied.	Correct the settings in the Network Settings via the Command Center.	

Scan to E-mail error code : 1105

Invalid SMTP protocol

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	Invalid SMTP protocol	Correct the protocol in the Network Settings via the Command Center.	

Scan to E-mail error code : 1106

The sender address is not set.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The sender address is not set.	Correct the protocol in the Network Settings via the Command Center.	

Scan to E-mail error code : 2101

Connection to the SMTP/POP3 server has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SMTP/POP3 server name	SMTP / POP3 server name is incorrect.	Correct the SMTP / POP3 server name at [Function Settings] > [E-mail] via the command center.	
2	Checking the LAN cable	The LAN cable is not connected to the main unit.	Connect the LAN cable to the main unit.	
3	Checking the SMTP/POP3 port No.	The port number is incorrect.	Correct the SMTP/POP3 port number.	
4	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
5	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
6	Checking the settings	The SMTP/POP3 server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to E-mail error code : 2102

Connection to the SMTP/POP3 server has failed. (Connection timeout)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SMTP/POP3 server name	SMTP / POP3 server name is incorrect.	Correct the SMTP / POP3 server name at [Function Settings] > [E-mail] via the command center.	
2	Checking the SMTP/POP3 port No.	The port number is incorrect.	Correct the SMTP/POP3 port number.	
3	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
4	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
5	Checking the settings	The SMTP/POP3 server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to E-mail error code : 2103

The server cannot establish communication.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the SMTP/POP3 server name	SMTP / POP3 server name is incorrect.	Correct the SMTP / POP3 server name at [Function Settings] > [E-mail] via the command center.	
2	Checking the SMTP/POP3 port No.	The port number is incorrect.	Correct the SMTP/POP3 port number.	
3	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
4	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
5	Checking the settings	The SMTP/POP3 server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to E-mail error code : 2201

Communication to the SMTP/POP3 server has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	

Scan to E-mail error code : 2202

Communication to the SMTP/POP3 server has failed. (Connection timeout)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	

Scan to E-mail error code : 2204

The size of scanning exceeded its limit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	

Scan to E-mail error code : 3101

SMTP/POP3 server responded with an error.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
3	Checking the settings	The SMTP/POP3 server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to E-mail error code : 3201

No SMTP authentication is found.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The SMTP server settings are incorrect.	Set the correct SMTP Authentication Protocol at [Function Settings] > [E-mail] via the command center.	

Scan to E-mail error code : 4803

Failed to establish the SSL session.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the self-signed certificate	The self-signed certificate of the device is incorrect.	Correct the certificates in the Security Settings via the Command Center.	
2	Checking the settings	The service certificate settings are incorrect.	Correct the certificates in the Security Settings via the Command Center.	
3	Checking the settings	The SMTP/POP3 settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

(2-2)Scan to FTP Error Codes

Error code	Contents
1101	FTP server does not exist on the network.
1102	Login to the FTP server has failed.
1105	FTP protocol is not enabled.
1131	Initializing TLS has failed.
1132	TLS negotiation has failed.
2101	Connection to the FTP server has failed.
2102	Connection to the FTP server has failed. (Timeout)
2103	The server cannot establish communication.
2201	Communication with the FTP server has failed.
2202	Communication with the FTP server has failed. (Timeout)
2203	No response from the server during a certain period of time.

Error code	Contents
2231	Communication with the FTP server has failed. (FTPS communication)
3101	FTP server responded with an error.

Content of Scan to FTP Error Codes

Scan to FTP error code : 1101

FTP server does not exist on the network.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FTP host name	The FTP host name is incorrect.	Correct the FTP host name via the Command Center.	
2	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
3	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	

Scan to FTP error code : 1102

Login to the FTP server has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FTP host name	The user name or the password is incorrect.	Correct the user name and the password.	
2	Checking the FTP server	FTP server is improper.	Correct the protocol in the Network Settings via the Command Center.	

Scan to FTP error code : 1105

FTP protocol is not enabled.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	FTP protocol is not enabled.	Correct the protocol in the Network Settings via the Command Center.	

Scan to FTP error code : 1131

Initializing TLS has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The security settings of the device are incorrect.	Correct the settings in the Security Settings via the Command Center.	

Scan to FTP error code : 1132

TLS negotiation has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The security settings of the device are incorrect.	Correct the settings in the Security Settings via the Command Center.	
2	Checking the settings	The FTP server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to FTP error code : 2101

Connection to the FTP server has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FTP host name	The FTP host name is incorrect.	Correct the FTP host name via the Command Center.	
2	Checking the LAN cable	The LAN cable is not connected to the main unit.	Connect the LAN cable to the main unit.	
3	Checking the FTP port number	The port number is incorrect.	Correct the FTP port number.	
4	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
5	Checking the settings	The FTP server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to FTP error code : 2102

Connection to the FTP server has failed. (Timeout)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FTP host name	The FTP host name is incorrect.	Correct the FTP host name via the Command Center.	
2	Checking the FTP port number	The port number is incorrect.	Correct the FTP port number.	
3	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
4	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
5	Checking the settings	The FTP server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to FTP error code : 2103

The server cannot establish communication.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the FTP host name	The FTP host name is incorrect.	Correct the FTP host name via the Command Center.	
2	Checking the FTP port number	The port number is incorrect.	Correct the FTP port number.	
3	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
4	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
5	Checking the settings	The FTP server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to FTP error code : 2201

Communication with the FTP server has failed.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
3	Checking the destination folder name	The destination folder name is incorrect.	Set the correct destination folder.	
4	Checking the settings	The FTP server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	

Scan to FTP error code : 2202

Communication with the FTP server has failed. (Timeout)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	

Scan to FTP error code : 2203

No response from the server during a certain period of time.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	

Scan to FTP error code : 2231

Communication with the FTP server has failed. (FTPS communication)

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	

Scan to FTP error code : 3101

FTP server responded with an error.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The network settings are incorrect.	Correct the settings in the Network Settings via the Command Center.	
2	Checking the settings	The network settings that the main unit is connected to are incorrect.	Correct the network settings that the main unit is connected to.	
3	Checking the settings	The FTP server settings are incorrect.	Correct the protocol in the Network Settings via the Command Center.	



## 7 - 6 Print Errors

No.	Contents	Condition
(1)	The paper loading message appears	
(2)	The paper direction is incorrect	
(3)	Paper is fed from the MP tray.	The main unit MP tray setting is wrong
(4)	Garbled characters	The printer driver was not properly installed.
(5)	Paper is not fed from the MP tray.	The media types of each paper source defined in the printer driver and the main unit are mismatched.
(6)	The same data is repeatedly printed out	A PC (spooler) does not properly operate.
(7)	PC window shows [Print job error] or [Standby], or [Printer unavailable] is indicated on the printer properties.	The main unit is not ready to print
(8)	Processing and Memory lamps are lit while the printer standby message is indicated	The main unit locks up.
(9)	Data is not printed out in Sleep mode due to the main unit startup error. Processing/Memory lamp is turned on.	The main unit locks up.
(10)	Print stops after printing several pages and locks up. Processing and Memory lamps on operation panel are lit.	The image processing fails due to the insufficient memory, so the main unit locks up.
(11)	Print output is unavailable due to the network factor	The network has some troubles or the network setting is incorrect.
(12)	Print output is unavailable due to the network factor	The cable between the main unit and the PC is not properly connected.
(13)	Print output is unavailable due to the network factor	The access point (router or HUB) in the network does not operate properly.
(14)	Print output is unavailable due to the network factor	The router is faulty, or the router settings are incorrect.
(15)	Print output is unavailable due to the network factor	"Offline" appears and the print function is unavailable.
(16)	Print output is unavailable due to the network factor	Only one PC can not print among those installed. No error is indicated but print jobs are suspended. [Condition] • PC OS: Windows7 • File: Test Page • Connection: Wireless LAN
(17)	Print output is unavailable due to the network factor	The main unit IP address is changed.
(18)	Data is not printed out due to the printer driver setting	[Disconnection error] appears on the PC screen and the print job cannot be output due to this error. (Print is unavailable.) [Condition] • PC OS: Windows7 • File: Test Page • Connection: Wireless LAN
(19)	Data is not printed out due to the printer driver setting	[Please wait] is indicated at the main unit. The Job is retained without outputting printed material. [Condition] PC OS: Windows 7, Print file: Test Page, Connection: wireless LAN
(20)	Data is not printed out due to the printer driver setting	A PC does not recognize the main unit.
(21)	Data is not printed out due to the printer driver setting	PC operation does not stabilize.

No.	Contents	Condition
(22)	Data is not printed out due to the printer driver setting	Check if the issue occurs when printing the data from all PCs in the network or from a certain PC. Then, print out the data from another PC if it occurs at a certain PC.
(23)	Data is not printed out due to the printer driver setting	The incorrect printer driver was selected.
(24)	Data is not printed out due to the printer driver setting	Installed printer driver shows "Deleting" and it remains when reinstalling it
(25)	The printed image is partly missing	The image data processing with a certain application (Excel, PDF) is faulty.
(26)	"Paper Mismatch Error" appears	The paper size is not detected properly.

Content of Print Errors

(1)The paper loading message appears

Step	Check description	Assumed cause	Measures	Reference
1	Checking the paper	The size of the loaded paper did not match the paper size set in the printer properties.	Load the paper of the paper size defined at "Paper size" in the [Basic] tab in the print settings at the PC to the cassette.	?
2	Checking the paper size	The paper size on the operation panel and the one set for the paper source do not match.	Check if the paper size on the operation panel and the one set for the paper source do not match	
3	Relocating the paper width guides / paper size guides / MP paper width guides	The locations of the paper width guides, paper size guide A/B or the MP paper width guides do not fit with the paper size.	Relocate the paper width guides, paper size guide A/B or the MP paper width guides to fit them with the paper size.	
4	Checking the paper sensor / PF paper sensor / MP paper sensor	The actuator or the spring for the paper sensors 1/2, PF paper sensors 1/2 or the MP paper sensor is not properly attached. Or, the sensor does not properly operate due to their deformation.	If the actuator or the spring for paper sensors 1/2, PF paper sensors 1/2 or the MP paper sensor is deformed or the actuator does not properly operate, replace them.	
5	Checking the situation	The print data generated by a certain application (Word) is faulty.	Check if the print data not generated by a certain application (Word) is output properly. And then, change the application setting if necessary.	
6	Checking the settings	Paper orientation is not properly set in the print page setting on a certain application (Word).	Check the page orientation with preview before printing and reset the page orientation at the print setting on a certain application (Word).	

Step	Check description	Assumed cause	Measures	Reference
7	Checking the settings	The paper size and the media type detected at the main unit did not match with the paper size and the media type set in the printer driver.	Check if the paper size detected on the MP tray and the media type of the MP tray set via the System Menu (for the main unit) matched to the paper size and the media type at [Imaging] > [Basic] in the printer properties at the PC.	?
8	Checking the settings	The MP tray setting does not match between the main unit and printer driver	Select "MP tray" at [Source] in the [Basic] tab in the print settings at the PC. Then, change the setting of the MP tray at the main unit to fit it to the setting at the printer driver.	?

**(2)The paper direction is incorrect**

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	There is a communication error.	Confirm there are no jobs in process in the PC and the main unit. Then, turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the font list	Font for special data is not resident.	After checking output from Excel and Word is normal, print the font list to check if a font for special data is resident.	?
3	Selecting the bitmap font	The bitmap font (default setting) is unselected.	Select the bitmap font (default setting) and print the data.	
4	Checking the printer driver	The printer driver is faulty.	Uninstall and reinstall the printer driver.	?

**(3)Paper is fed from the MP tray.**

The main unit MP tray setting is wrong

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The Auto Cassette Change is [On].	Set [Off] at [Auto Cassette Change] not to feed the paper if there is no paper in the selected paper source. ([System Menu/Counter] key > [Printer] > [Auto Cassette Change] > [Off])	?
2	Checking the settings	"Media type" in the [Basic] tab in the print settings at the PC differs from the media type of the cassette that is set in the main unit.	Check the media type set on the main unit cassette and MP tray and set the media type for the main unit in the [Basic] tab in the print settings at the PC.	?
3	Checking the settings	The same media type is set between the main unit cassette and MP tray	Set different media types between the main unit cassette and MP tray	?

#### (4)Garbled characters

The printer driver was not properly installed.

Step	Check description	Assumed cause	Measures	Reference
1	Resetting the main power	There is a communication error.	Confirm there are no jobs in process in the PC and the main unit. Then, turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	
2	Checking the font list	Font for special data is not resident.	After checking output from Excel and Word is normal, print the font list to check if a font for special data is resident.	?
3	Selecting the bitmap font	The bitmap font (default setting) is unselected.	Select the bitmap font (default setting) and print the data.	
4	Checking the printer driver	The printer driver is faulty.	Uninstall and reinstall the printer driver.	?

#### (5)Paper is not fed from the MP tray.

The media types of each paper source defined in the printer driver and the main unit are mismatched.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The paper size and the media type detected at the main unit did not match with the paper size and the media type set in the printer driver.	Check if the paper size detected on the MP tray and the media type of the MP tray set via the System Menu (for the main unit) matched to the paper size and the media type at [Imaging] > [Basic] in the printer properties at the PC.	?
2	Checking the settings	The MP tray setting does not match between the main unit and printer driver	Select "MP tray" at [Source] in the [Basic] tab in the print settings at the PC. Then, change the setting of the MP tray at the main unit to fit it to the setting at the printer driver.	?

#### (6)The same data is repeatedly printed out

A PC (spooler) does not properly operate.

Step	Check description	Assumed cause	Measures	Reference
1	Deleting the job	The generated data is faulty.	Delete the print job spooled in the PC and print it out again.	

#### (7)PC window shows [Print job error] or [Standby], or [Printer unavailable] is indicated on the printer properties.

The main unit is not ready to print

Step	Check description	Assumed cause	Measures	Reference
1	Clearing the error	The main unit is not ready to print	Check if the error appears on the operation panel or the error lamp blinks. Then if there is, cancel it.	
2	Checking the main unit	The main unit is not ready to print	Resolve the problem at the main unit if any	

**(8) Processing and Memory lamps are lit while the printer standby message is indicated**

The main unit locks up.

Step	Check description	Assumed cause	Measures	Reference
1	Clearing the error	The main unit is not ready to print	After confirming no error is indicated on the main unit's operation panel, cancel all PC print jobs. Then, turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	

**(9) Data is not printed out in Sleep mode due to the main unit startup error. Processing/ Memory lamp is turned on.**

The main unit locks up.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the firmware	The firmware is not the latest version.	Upgrade the firmware to the latest version.	Firmware Update
2	Checking the settings	The sleep level is not set to Quick Recovery mode.	Turn the power switch and the main power switch off. After 5s passes, turn on the main power switch and the power switch. Then, set the sleep level to "Quick Recovery".	?

**(10) Print stops after printing several pages and locks up. Processing and Memory lamps on operation panel are lit.**

The image processing fails due to the insufficient memory, so the main unit locks up.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the situation	The data processing in a certain PC is faulty.	Check if the issue occurs when printing the data from all PCs in the network or from a certain PC. Then, print out the data from another PC if it occurs at a certain PC.	
2	Checking the settings	The application is not properly set.	Check if a problem occurring from a certain application and file (big data like CAD data) and change application setting and refer to applications help.	
3	Checking the firmware	The firmware is not the latest version.	Upgrade the main firmware to the latest version.	Firmware Update
4	Deleting the job	Processing fails.	Cancel the job in process and reprint in the main unit job status	?
5	Memory allocation	Memory allocation is insufficient.	If the processing memory in the main unit is insufficient, set the Memory allocation by executing U340 [Adj Memory].	U340 Execution
6	Resetting the main power	The main unit locks up.	If the operation panel or the buttons are not active, turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	

### (11)Print output is unavailable due to the network factor

The network has some troubles or the network setting is incorrect.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the network	There is trouble in the network.	Check if the memory LED on the operation panel of the main unit is blinking after printing out from the PC. If not blinking, cancel the processing job and reprint out.	?
2	Checking the network	There is trouble in the network.	When the printing error appears on the operation panel or the PC screen, clear the error caused by the toner or paper jam, etc.	
3	Checking the network	There is trouble in the network.	Check the main unit IP Address in the status page, etc. and then check if Command Center can be opened using that IP Address. If not, reconfigure the network again.	?
4	Checking the network	There is trouble in the network.	Check the internet connection and restore the network connection if necessary	
5	Checking the network	There is trouble in the network.	Check the cable and reset the router or HUB.	
6	Restarting up	The PC or the main unit locks up.	Restart the PC or the main unit, and print out again.	

### (12)Print output is unavailable due to the network factor

The cable between the main unit and the PC is not properly connected.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the cable	The cable between the main unit and the PC is not properly connected.	Check the cable connection between the main unit and the PC.	
2	Restarting up	The main unit or the PC does not properly start up.	Restart the main unit and then restart the PC.	
3	Checking the Ethernet cable	The Ethernet cable is faulty.	Replace the Ethernet cable.	
4	Changing the connection	Another network is faulty.	Directly connect the main unit to the PC with the cross cable and then check if the same data can be printed out.	

### (13)Print output is unavailable due to the network factor

The access point (router or HUB) in the network does not operate properly.

Step	Check description	Assumed cause	Measures	Reference
1	Restarting up	The router or the HUB does not properly activate.	Check if the link lamp of the router or hub is lit and restart it.	
2	Checking the Ethernet cable	The Ethernet cable is not properly connected.	In case the link lamp is off, once disconnect the Ethernet cable from the router and reconnect it to check the link lamp is lit.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the Ethernet cable	The Ethernet cable is faulty.	Replace the Ethernet cable.	
4	Restarting up	The router, HUB, PC or the main unit do not start up properly.	In case of no connection while the link lamp is lit, restart the router or hub and then restart up the PC and the main unit.	

**(14)Print output is unavailable due to the network factor**

The router is faulty, or the router settings are incorrect.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The IP address is not properly set.	Check if the main unit IP Address indicated in the status page is the same as the IP Address in the [Port] tab of [Printer Properties] at the PC. If not, correct the IP address at the PC	?
2	Checking the settings	The printer host name is not properly set.	Check the printer host name by printing out the status report when there is a server environment. Then, check the printer host name at the [Port] tab in the printer properties at a PC. If they differ, correct the printer host name.	

**(15)Print output is unavailable due to the network factor**

"Offline" appears and the print function is unavailable.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the network	There is trouble in the network.	Check the internet connection and restore the network connection if necessary	
2	Restarting up	The PC malfunctions.	When "Offline" appears on the printer driver, check if it is used in the pause or offline. Then, restart up the PC.	
3	Checking the settings	The application is not properly set.	Check if the other Excel / Word data can be output and change the setting of the application.	
4	Checking the IP address	The IP address is not properly set.	Check if the main unit IP Address indicated in the status page is the same as the IP Address in the [Port] tab of [Printer Properties] at the PC. If not, correct the IP address at the PC	?
5	Checking the IP address	The IP address is not properly set.	Check if communication via command center or PING is available with IP address set up. Set up IP address again and restart the main unit if necessary.	?

Step	Check description	Assumed cause	Measures	Reference
6	Checking the settings	The port settings in the printer properties at the PC are incorrect.	Remove the checks at the dual-directional support and the SNMP status in the [Port] tab of the printer properties in a PC. Then, restart up the main unit and the PC.	
7	Restarting up	The main unit does not start up properly.	Check if the test print is output after the printer is ready, and restart up the main unit.	

**(16)Print output is unavailable due to the network factor**

Only one PC can not print among those installed. No error is indicated but print jobs are suspended. [Condition] • PC OS: Windows7 • File: Test Page • Connection: Wireless LAN

Step	Check description	Assumed cause	Measures	Reference
1	Restarting up	The main unit or the PC does not properly start up.	Restart up the main unit or the PC.	
2	Checking the cable	The connector is not properly connected.	Check the cable connection (Check if the network connection is available.)	
3	Checking the IP address	The IP address is not properly set.	Check if the ID address is properly set, and correct it if incorrect.	?
4	Checking the network	There is trouble in the network.	Check if access via command center or PING is available and then check the hub or router.	?
5	Checking the settings	The printer port IP address, the SNMP of the printer driver, or the bi-directional support is not properly set.	The port settings in the printer properties at the PC are incorrect.	?
6	Uninstalling the security software or setting the exception	The restriction of the security software causes the phenomenon.	Check if the printer is available by uninstalling the security software. Or, set the exception setting.	

**(17)Print output is unavailable due to the network factor**

The main unit IP address is changed.

Step	Check description	Assumed cause	Measures	Reference
1	Restarting up	There is trouble in the network.	Check if a problem occurs with output from all PCs on the network and restart up hub or router.	
2	Checking the cable	The connector is not properly connected.	Check if there is problem with the cable connection on the network.	
3	Restarting up	The main unit does not start up properly.	If the operation panel or the buttons are not active, turn the power switch and the main power switch off. After 5s passes, turn the main power switch and the power switch on.	



Step	Check description	Assumed cause	Measures	Reference
4	Checking the settings	IP address was changed.	Check if the main unit IP Address indicated in the status page is the same as the IP Address in the [Port] tab of [Printer Properties] at the PC. If not, correct the IP address at the PC	?
5	Checking the settings	The static IP Address is not set in the System Menu	Set the static IP Address in the System Menu	?

**(18)Data is not printed out due to the printer driver setting**

[Disconnection error] appears on the PC screen and the print job cannot be output due to this error. (Print is unavailable.) [Condition] • PC OS: Windows7 • File: Test Page • Connection: Wireless LAN

Step	Check description	Assumed cause	Measures	Reference
1	Deleting the job	The faulty print job is remaining.	Check if the print job remains in the printer driver and delete the remaining.	?

**(19)Data is not printed out due to the printer driver setting**

[Please wait] is indicated at the main unit. The Job is retained without outputting printed material. [Condition] PC OS: Windows 7, Print file: Test Page, Connection: wireless LAN

Step	Check description	Assumed cause	Measures	Reference
1	Deleting the job	The faulty print job is remaining.	Check if the print job remains in the printer driver and delete the remaining.	?

**(20)Data is not printed out due to the printer driver setting**

A PC does not recognize the main unit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The printer driver is not properly set.	Check if the printer icon on the PC is ready. (Right click the printer icon and perform the troubleshooting.)	
2	Installing the printer driver	The printer driver is faulty.	Uninstall and reinstall the printer driver.	?
3	Restarting up	The PC does not start up properly.	Restart up the PC.	
4	Checking the printer driver	The printer driver is not the latest version.	Update the printer driver.	?

**(21)Data is not printed out due to the printer driver setting**

PC operation does not stabilize.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The printer driver is not properly set.	Restart up the PC when many applications start up or the availability of the PC memory or the HDD storage is decreased.	

**(22)Data is not printed out due to the printer driver setting**

Check if the issue occurs when printing the data from all PCs in the network or from a certain PC. Then, print out the data from another PC if it occurs at a certain PC.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the IP address	The IP address is not properly set.	Check if the IP Address indicated in the main unit status report and system menu is same as the IP address in the port setting of [Printer Properties] at the PC. If not, correct the IP address at the port setting	

**(23)Data is not printed out due to the printer driver setting**

The incorrect printer driver was selected.

Step	Check description	Assumed cause	Measures	Reference
1	Installing the printer driver	The incorrect printer driver is selected.	Select the correct printer driver. If it is not in the PC, install the printer driver for the destination unit in the PC.	

**(24)Data is not printed out due to the printer driver setting**

Installed printer driver shows "Deleting" and it remains when reinstalling it

Step	Check description	Assumed cause	Measures	Reference
1	Deleting the job	The print jobs remain in the spool inside the printer driver.	Delete all print jobs spooling inside the printer driver.	?
2	Checking the printer driver	There is the unused printer driver.	Delete the unused printer driver.	
3	Restarting the print	The system is pausing.	Right click the pausing printer icon and select [Print resuming]. Then, check the ready port.	
4	Checking the settings	The host name or the IP address is not properly set.	When the main unit connects to a local network, check the host name and the IP address on the status report of the main unit.	
5	Adding the Standard TCP/IP port	There is no main unit IP Address in the Standard TCP/IP Port	Add the main unit IP address in Standard TCP/IP port and print Test Page	

**(25)The printed image is partly missing**

The image data processing with a certain application (Excel, PDF) is faulty.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the application	The image data processing with a certain application (Excel, PDF) is faulty.	When the phenomenon occurs with a certain file only, check if there is an abnormality in the image data.	
2	Checking the application	The data processing with a certain application (Excel, PDF) is faulty.	Check if the image does not drop out on the print preview, and refer to the Help in the application if necessary.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the settings	The PDL settings is incorrect.	Select "GDI compatible mode" at [PDL settings] in the print settings at the PC.	?
4	Checking the firmware	The firmware is not the latest version.	Upgrade the main firmware to the latest version.	Firmware Update

**(26)"Paper Mismatch Error" appears**

The paper size is not detected properly.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The paper size for the MP tray is not properly set.	Adjust the MP tray paper size	
2	Resetting the MP paper width guides	The locations of the MP paper width guides do not match the paper size.	Reset the MP paper width guides to match the paper size.	
3	Checking the MP tray	The MP tray is not pulled out.	Pull out the MP tray to extend it if the A3 size paper is not detected.	
4	Checking the settings	The paper size is not set properly in the System Menu.	Enter the custom size in [Cassette/MP Tray Settings] in the System Menu > [MP Tray Setting] > [Paper Size]	

## 7 - 7 Abnormal Noise

No.	Contents	Condition
(1)	Abnormal sound occurs (Basic Measures)	
(2)	Abnormal sounds from the paper conveying section	Frictional wear, smudges / foreign objects adhesion on the conveying rollers, pulleys and the gears
(3)	Abnormal sound from the developer section	Caused by the developer unit.
(4)	Phenomenon 1	
(5)	Abnormal sound from the eject section	Smudges / foreign objects adhesion in the eject section
(6)	Fan rotating sounds are noisy	
(7)	Abnormal sound from the primary paper feed section	Frictional wear, smudges / foreign objects adhesion, attachment failure of the primary paper feed section
(8)	Abnormal sound from the machine front side	Wear, dirtiness, foreign objects adhesion or attachment failure at the MP feed section
(9)	Abnormal sound from the lower side than the fuser eject section	Rubbing sound between the bushing and the stop ring of the fuser eject roller due to the smudges / foreign objects adhesion
(10)	Abnormal sound from the upper side of the fuser eject section	Rubbing sound between the fuser eject pulley and the shaft due to the smudges / foreign objects adhesion
(11)	Abnormal sound from the fuser section	Smudges / foreign objects adhesion or the interference between the parts in the fuser section
(12)	Abnormal sound from inside the machine	Open and close operation failure of the toner supply opening of the toner container, the lack of toner amount, or the toner condensation
(13)	Abnormal sound from inside the machine	Smudges / foreign objects adhesion or the toner condensation in the developer section
(14)	Abnormal sound from inside the machine	Frictional wear, smudges / foreign objects adhesion, or the waste toner clogging in the drum section
(15)	The drive sounds are noisy during printing	The operation sounds in the drive section

### Content of Abnormal Noise

#### (1) Abnormal sound occurs (Basic Measures)

Step	Check description	Assumed cause	Measures	Reference
1	Applying the grease	The grease on each gear or bushing is not enough.	Check the rotation of the roller, pulley and the gears, and apply the grease to the gears and the bushings if not rotating smoothly.	
2	Checking the gear and the bushing	The parts such as each gear or bushing are not properly attached.	Reattach the gear or the bushing.	

**(2)Abnormal sounds from the paper conveying section**

Frictional wear, smudges / foreign objects adhesion on the conveying rollers, pulleys and the gears

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning and applying the grease	The bushing or the gear is dirty or foreign objects are on them.	Clean the bushings and the gears for the left/right registration rollers, middle roller, transfer roller and the upper/middle/lower duplex rollers, and apply grease to them.	
2	Cleaning and applying the grease	The inside of the pulley is worn down.	Clean the drive shaft of the middle pulley and apply the grease to it.	
3	Cleaning and applying the grease	The gear tooth are dirty or foreign objects are on them.	Clean the transfer drive gear and the registration drive gear and apply the grease to them.	
4	Checking the feed drive unit	The feed drive unit is faulty.	Replace the feed drive unit.	Detaching and Reattaching the feed drive unit

**(3)Abnormal sound from the developer section**

Caused by the developer unit.

Step	Check description	Assumed cause	Measures	Reference
1	Checking the developer unit	The developer unit drive is faulty.	Check if the developer powder does not leak from the developer unit, there is no damage, or the roller rotates manually. Fix the parts if necessary.	
2	Checking the developer unit	The developer unit is faulty.	Replace the developer unit.	Detaching and Reattaching the developer unit

**(4)Phenomenon 1**

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning and applying the grease	The bushing or the gear is dirty or foreign objects are on them.	Clean the bushings or the shafts of DP conveying rollers 1-3 and apply grease to them.	
2	Checking the bushing	The bushing is worn down.	Replace the bushing.	
3	Cleaning and applying the grease	The drive gear is dirty or foreign objects are on it.	Clean the drive gears of the DP conveying motor and the DP reverse motor and apply the grease to them.	
4	Checking the motor	The DP conveying motor does not engage with the drive gear.	Reattach the DP conveying motor or the DP reverse motor.	

**(5)Abnormal sound from the eject section**

Smudges / foreign objects adhesion in the eject section

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning and applying the grease	The bushing or the gear is dirty or foreign objects are on them.	Clean the bushing and the gear of the eject roller and apply grease to them.	
2	Cleaning and applying the grease	The shaft is dirty or foreign objects are on it.	Clean the shaft of the eject pulley and apply grease to it.	
3	Checking the upper/lower change guides	The shaft is dirty or foreign objects are on it.	Clean the shafts of the upper/lower change guides and apply grease to them.	

**(6)Fan rotating sounds are noisy**

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning the fan motor	The fan of the fan motor is dirty.	Isolate the noisy fan motor by executing U037, and clean the fan.	U037 Execution
2	Replacing the fan motor	The fan motor is faulty.	Reattach the fan motor and reconnect the wire. Replace it if it is not fixed.	Fan Motors Attachable Direction

**(7)Abnormal sound from the primary paper feed section**

Frictional wear, smudges / foreign objects adhesion, attachment failure of the primary paper feed section

Step	Check description	Assumed cause	Measures	Reference
1	Checking the gear and the clutch	The parts such as the gear or the clutch are not properly attached.	Reattach the primary paper feed drive components such as the gear or the clutch if they are not properly attached.	
2	Cleaning and applying the grease	The gear or the bushing is dirty or foreign objects are on them.	Clean the primary paper feed drive components such as the gear or the bushing and apply the grease to them.	
3	Cleaning and applying the grease	The shaft or the bushing is dirty or foreign objects are on them.	Clean the shaft and the bushing of the paper feed pulley or the PF paper feed pulley, and apply grease to them.	Maintenance parts (Cassette paper feed section)
4	Checking the feed pulley	The paper feed pulley surface is dirty or worn down.	Clean the paper feed pulley or the PF paper feed pulley, and replace them if necessary.	Maintenance parts (Cassette paper feed section)

**(8)Abnormal sound from the machine front side**

Wear, dirtiness, foreign objects adhesion or attachment failure at the MP feed section

Step	Check description	Assumed cause	Measures	Reference
1	Checking the gear and the clutch	The parts such as the gear or the clutch are not properly attached.	When the gears or the clutch in the MP paper feed drive section are not properly attached, reattach them.	
2	Cleaning and applying the grease	The shaft or the bushing is dirty or foreign objects are on them.	Clean the shaft and the bushing of the MP paper feed pulley and apply the grease to them.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the MP retard pulley	The MP retard pulley surface is dirty or worn down.	Clean the MP retard pulley surface and replace it if necessary.	
4	Checking the lift plate	The lift plate is not properly attached.	Reattach the lift base.	

**(9)Abnormal sound from the lower side than the fuser eject section**

Rubbing sound between the bushing and the stop ring of the fuser eject roller due to the smudges / foreign objects adhesion

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning and applying the grease	The left fuser eject roller, bushing or the stop ring are dirty, or foreign objects are on them.	Clean the left fuser eject roller, bushing and the stop ring and apply the lubricant to them.	
2	Replacing the fuser unit	The fuser unit is faulty.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

**(10)Abnormal sound from the upper side of the fuser eject section**

Rubbing sound between the fuser eject pulley and the shaft due to the smudges / foreign objects adhesion

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning and applying the grease	The pulley or the shaft is dirty, or foreign objects are on them.	Clean the fuser eject roller and the shaft and apply lubricant to them.	
2	Replacing the fuser unit	The fuser unit is faulty.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

**(11)Abnormal sound from the fuser section**

Smudges / foreign objects adhesion or the interference between the parts in the fuser section

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning and applying the grease	The bushing or the gear is dirty or foreign objects are on them.	Clean the bushings and the gears for the fuser rollers, and apply grease to them.	
2	Cleaning and applying the grease	The shaft is dirty or foreign objects are on it.	Clean the fuser eject roller and the shaft and apply lubricant to them.	
3	Cleaning and applying the grease	The gear is dirty or foreign objects are on it.	Clean the fuser drive gear and apply the grease to it.	
4	Applying the grease	The grease is not enough.	Apply the grease to the pressure release cam and the frame.	
5	Replacing the fuser unit	The fuser front guide is bent and it contacts the press roller.	Replace the fuser unit.	Detaching and Reattaching the fuser unit

**(12)Abnormal sound from inside the machine**

Open and close operation failure of the toner supply opening of the toner container, the lack of toner amount, or the toner condensation

Step	Check description	Assumed cause	Measures	Reference
1	Checking the toner container	The torque increases due to the toner condensation.	Shake the toner container enough and reinstall it. Or, replace it.	?

**(13)Abnormal sound from inside the machine**

Smudges / foreign objects adhesion or the toner condensation in the developer section

Step	Check description	Assumed cause	Measures	Reference
1	Checking the developer unit	The shaft or the bushing of the developer roller is dirty or foreign objects are on them.	Check if the developer roller rotates. If not rotating smoothly, clean the shaft or the bushing of the developer roller.	
2	Checking the developer unit	The torque inside the developer unit increased due to the toner condensation, etc.	Clean the developer unit. Then, replace it if the issue is not resolved.	Detaching and Reattaching the developer unit

**(14)Abnormal sound from inside the machine**

Frictional wear, smudges / foreign objects adhesion, or the waste toner clogging in the drum section

Step	Check description	Assumed cause	Measures	Reference
1	Executing Drum refresh	Toner is not enough on the drum.	Execute the drum refresh to supply the toner to the cleaning unit.	?
2	Checking the drum screw	The drum screw does not properly rotate.	Check if the drum screw can rotate, and clean it if it does not rotate smoothly. Replace the drum unit if the drum screw locks.	Detaching and Reattaching the drum unit
3	Cleaning and applying the grease	Foreign objects are on the tooth of the drum drive gear, or the grease is not enough.	Clean the tooth of the drum drive gear and apply the grease to them.	
4	Checking the drum unit and the developer unit	The torque inside the drum unit increased due to the waste toner clogging, etc.	Execute the drum refresh. If not repaired, replace the drum unit.	Detaching and Reattaching the drum unit

**(15)The drive sounds are noisy during printing**

The operation sounds in the drive section

Step	Check description	Assumed cause	Measures	Reference
1	Checking the settings	The Quiet Mode is off.	Set [On] at [Adjustment/Maintenance] > [Quiet Mode] via the System Menu.	?



## 7 - 8 Malfunction

No.	Contents	Condition
(1)	The cassette paper size is misdetected	
(2)	The paper size loaded in the paper deck of the large capacity feeder is misdetected.	
(3)	The MP tray paper size is misdetected.	
(4)	The controller fan motor does not rotate	(Final phenomenon: Malfunction such as the abnormal image output due to heated CPU)
(5)	The developer fan motor does not rotate	(Final phenomenon: The printing operation of the main unit is frequently interrupted to cool the machine inside according to the inner temperature increase during the continuous printing.)
(6)	The main unit malfunctions even if turning on the power switch	
(7)	Toner falls over the paper conveying section	(Final phenomenon: Toner adheres on the paper leading edge)

### Content of Malfunction

#### (1)The cassette paper size is misdetected

Step	Check description	Assumed cause	Measures	Reference
1	Checking the actuator	The actuator does not operate properly.	Check if the actuator for the paper length detection sensor operates when inserting the cassette. If it does not properly operate, reattach the actuator.	
2	Checking the wire	The connectors are not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Paper length detection sensor - Engine PWB	Wiring diagram
3	Checking the paper width detection sensor	The paper width detection sensor operation is faulty.	Check if the paper width detection sensor turns on when inserting the cassette. If it does not turn on, reattach the paper width detection sensor.	
4	Checking the wire	The connectors are not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Paper width detection sensor - Engine PWB	Wiring diagram
5	Replacing the paper length detection sensor	The paper length detection sensor is faulty.	Replace the paper length detection sensor.	
6	Replacing the paper width detection sensor	The paper width detection sensor is faulty.	Replace the paper width detection sensor.	
7	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
8	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**(2)The paper size loaded in the paper deck of the large capacity feeder is misdetected.**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the wire	The connectors are not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • PF size detection switches 1/2 - PF main PWB • PF main PWB - Engine PWB	Wiring diagram
2	Replacing PF size detection switches 1/2	PF size detection switch 1/2 is faulty.	Replace PF size detection switch 1/2.	
3	Replacing the PF main PWB	The PF main PWB is faulty.	Replace the PF main PWB in the large capacity feeder.	
4	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

**(3)The MP tray paper size is misdetected.**

Step	Check description	Assumed cause	Measures	Reference
1	Checking the wire	The connector is not properly connected.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • MP paper length detection sensor - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
2	Checking the wire	The connector is not properly connected.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • MP paper width detection sensor - Relay PWB • Relay PWB - Feed PWB • Feed PWB - Engine PWB	Wiring diagram
3	Checking the MP paper width sensor	The MP paper width detection sensor is not properly attached, or it is faulty.	Check the home position of the MP paper width sensor, and reattach it if necessary. Then, replace the sensor if it is not fixed.	
4	Replacing the MP paper length switch	The MP paper length switch is faulty.	Replace the MP paper length switch.	
5	Replacing the feed PWB	The feed PWB is faulty.	Replace the feed PWB.	
6	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

#### (4)The controller fan motor does not rotate

(Final phenomenon: Malfunction such as the abnormal image output due to heated CPU)

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning the controller fan motor	The fan is dirty with dust.	Clean the controller fan motor.	
2	Checking the wire	The connector is not properly connected.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Controller fan motor - Main PWB	Wiring diagram
3	Replacing the controller fan motor	The motor is faulty.	Replace the controller fan motor.	Fan Motors Attachable Direction
4	Replacing the main PWB	The main PWB is faulty.	Replace the main PWB.	Detaching and Reattaching the main PWB

#### (5)The developer fan motor does not rotate

(Final phenomenon: The printing operation of the main unit is frequently interrupted to cool the machine inside according to the inner temperature increase during the continuous printing.)

Step	Check description	Assumed cause	Measures	Reference
1	Cleaning the developer fan motor	Foreign materials such as dust adhere on the developer fan motor.	Clean the developer fan motor.	
2	Checking the wire	The connectors are not properly connected or the wire is faulty.	Clean the terminal of the following wire connectors and reinsert the connectors. Replace the wire when it has no continuity. • Developer fan motor - Front PWB • Front PWB - Engine PWB	Wiring diagram
3	Replacing the developer fan motor	The developer fan motor is faulty.	Replace the developer fan motor.	Fan Motors Attachable Direction
4	Replacing the front PWB	The front PWB is faulty.	Replace the front PWB.	Detaching and Reattaching the front PWB
5	Replacing the engine PWB	The engine PWB is faulty.	Replace the engine PWB.	Detaching and Reattaching the engine PWB

#### (6)The main unit malfunctions even if turning on the power switch

Step	Check description	Assumed cause	Measures	Reference
1	Measuring the input voltage	The power cord has no continuity.	Plug the power cord into another wall outlet.	
2	Checking the power cord	The power plug of the power cord is faulty.	If the power plug is deformed or faulty, replace the power cord.	

Step	Check description	Assumed cause	Measures	Reference
3	Checking the power cord	The power cord is faulty.	Check the continuity in the power cord, and replace the power cord if there is no continuity.	
4	Checking the main power switch	The main power switch is faulty.	Check the continuity between the contacts of the main power switch, and replace the main power switch if there is no continuity.	
5	Checking the LVU	The LVU is faulty.	Reconnect the connectors on the LVU. If the wires are pinched or have any damage, fix or replace the wires. Then, replace the LVU if the issue is not resolved.	Detaching and Reattaching the LVU
6	Replacing the power switch	The power switch is faulty.	Check the power switch. Replace it if there is no continuity.	
7	Checking the engine PWB	The engine PWB is faulty.	Reconnect the connectors on the engine PWB. Then, fix or replace the wires if they are pinched by the other part or if they have any damage. When the issue is not resolved after that, replace the engine PWB.	Detaching and Reattaching the engine PWB

**(7)Toner falls over the paper conveying section**

(Final phenomenon: Toner adheres on the paper leading edge)

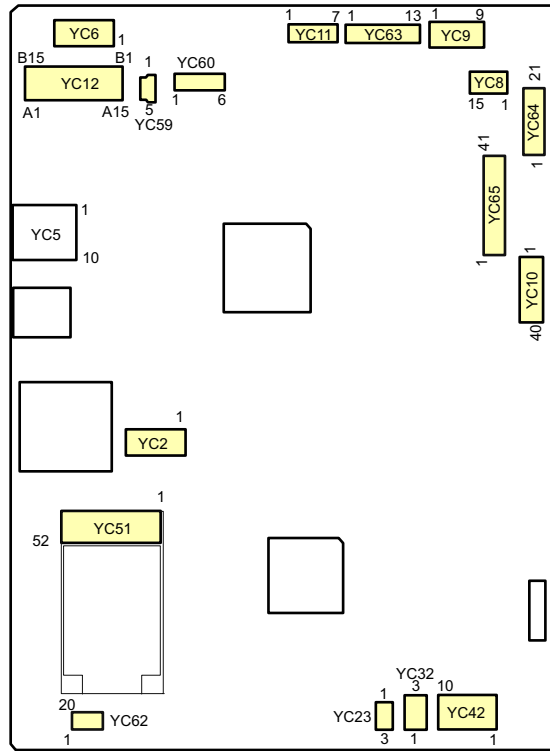
Step	Check description	Assumed cause	Measures	Reference
1	Checking the developer and drum units	The developer unit or the drum unit is dirty.	Clean the developer unit and the drum unit.	
2	Checking the toner collection box and the duct	The toner is clogged in the toner collection box or the duct.	Clean inside of the toner collection box and the duct.	
3	Checking the toner collection fan motor 1/2	The fan or filter of the toner collection fan motor 1/2 are dirty.	Clean the fan and the filter of the toner collection fan motor 1/2. And, replace the filter if necessary.	
4	Executing Developer refresh	The toner is deteriorated.	Execute the developer refresh twice.	?
5	Developer unit replacement	The toner is deteriorated.	Replace the developer unit.	Detaching and Reattaching the developer unit

## 8 PWBs

### 8 - 1 Description for PWB

#### (1)Main PWB

#### Connector position



Connector	Destination
YC2	HDD
YC6	Operation panel main PWB
YC8	KUIO relay PWB
YC9	KUIO relay PWB
YC10	DP relay PWB
YC11	Engine PWB
YC12	Power switch, Operation panel main PWB
YC23	Controller fan motor
YC32	HDD
YC33	FIERY relay PWB
YC42	Power supply PWB
YC51	SSD
YC59	USB hub PWB
YC60	USB hub PWB
YC62	WiFi PWB
YC63	Engine PWB

Connector	Destination
YC64	Engine PWB
YC65	Engine PWB

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC2	1	GND	-	-	Ground
	2	SATATXDP_C2H	0	-	HDD data signal
	3	SATATXDN_C2H	0	-	HDD data signal
	4	GND	-	-	Ground
	5	SATARXDN_H2C	1	-	HDD data signal
	6	SATARXDP_H2C	1	-	HDD data signal
	7	GND	-	-	Ground
YC6	1	GND	-	-	Ground
	2	LCD_OFF	O	DC0V/3.3V	Control signal
	3	LOCKN	O	DC0V/3.3V	Lock signal
	4	GND	-	-	Ground
	5	TX0N	O	DC0V/3.3V(pulse)	Transmission data signal
	6	TX0P	O	DC0V/3.3V(pulse)	Transmission data signal
	7	GND	-	-	Ground
YC8	1	VBUS1	O	DC5V	DC3.3V power output to KUIO relay PWB

Connector	Pin	Signal	I/O	Voltage	Description
	2	USB_DN1	I/O	-	USB data signal
	3	USB_DP1	I/O	-	USB data signal
	4	GND	-	-	Ground
	5	AUDIO1	I	Analog	AUDIO signal
	6	WAKEUP1	O	DC0V/3.3V	Control signal
	7	RESET1	I	DC0V/3.3V	Reset signal
	8	GND	-	-	Ground
	9	VBUS0	O	DC5V	DC5V power output to KUIO relay PWB
	10	USB_DN0	I/O	-	USB data signal
	11	USB_DP0	I/O	-	USB data signal
	12	GND	-	-	Ground
	13	AUDIO0	I	Analog	AUDIO signal
	14	WAKEUP0	O	DC0V/3.3V	Control signal
	15	RESET	I	DC0V/3.3V	Reset signal
	LP1	LockPin(1)			
	LP2	LockPin(2)			
YC9	1	GND	-	-	Ground
	2	+5V4_1	I	DC0V/5V	DC5V cut signal
	3	GND	-	-	Ground
	4	+5V1	O	DC5V	DC5V power output to KUIO relay PWB
	5	GND	-	-	Ground
	6	+5V4_2	I	DC5V	DC5V cut signal
YC10	1	GND	-	-	Ground
	2	DP_CONNECTN	O	DC0V/1.8V	DP relay PWB connection detection
	3	GND	-	-	Ground
	4	PCIEP_DP2M	O	LVDS	Image data signal
	5	+5V3	O	DC5V	DC5V power output
	6	PCIEN_DP2M	O	LVDS	Image data signal
	7	+5V3	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	+5V3	O	DC5V	DC5V power output
	10	GND	-	-	Ground
	11	+5V3	O	DC5V	DC5V power output
	12	PCIEP_M2DP	I	LVDS	Image data signal
	13	+5V3	O	DC5V	DC5V power output

Connector	Pin	Signal	I/O	Voltage	Description
	14	PCIEN_M2DP	I	LVDS	Image data signal
	15	+5V3	O	DC5V	DC5V power output
	16	GND	-	-	Ground
	17	+5V3	O	DC5V	DC5V power output
	18	GND	-	-	Ground
	19	+5V3	O	DC5V	DC5V power output
	20	PCIEP_REFCLK_D P2M	O	LVDS	Image clock signal
	21	GND	-	-	Ground
	22	PCIEN_REFCLK_D P2M	O	LVDS	Image clock signal
	23	GND	-	-	Ground
	24	GND	-	-	Ground
	25	GND	-	-	Ground
	26	GND	-	-	Ground
	27	GND	-	-	Ground
	28	PCIERC_SWRST_ N_M2DP	O	DC0V/3.3V	Reset output
	29	GND	-	-	Ground
	30	DP_RST_N	O	DC0V/3.3V	Reset output
	31	GND	-	-	Ground
	32	GND	-	-	Ground
	33	GND	-	-	Ground
	34	GND	-	-	Ground
	35	GND	-	-	Ground
	36	GND	-	-	Ground
	37	GND	-	-	Ground
	38	GND	-	-	Ground
	39	GND	-	-	Ground
	40	GND	-	-	Ground
YC11	1	GND	-	-	Ground
	2	SCN_E2C_IR	I	DC0V/3.2V	Communication interrupt signal
	3	SCN_E2C_SDIR	I	DC0V/3.1V	Communication direction signal
	4	SCN_E2C_SBSY	I	DC0V/3.0V	Communication busy signal
	5	SCN_C2E_SDAT	O	DC0V/3.1V	Communication data output signal
	6	SCN_E2C_SDAT	I	DC0V/3.2V	Communication data input signal
	7	SCN_C2E_SCK	O	DC0V/3.3V	Communication clock signal



Connector	Pin	Signal	I/O	Voltage	Description
YC12	A1	I2C_SCL_NFC	O	DC0V/3.3V(pulse)	I2C clock signal
	A2	INT_ENERGYSAV EKEY	I	DC0V/3.3V	Energy Saver key interrupt signal
	A3	FPRST	O	DC0V/3.3V	Operation panel reset signal
	A4	P2C_SDAT	O	DC0V/3.3V(pulse)	Serial communication data signal
	A5	C2P_SDAT	I	DC0V/3.3V(pulse)	Serial communication data signal
	A6	P2C_SDIR	O	DC0V/3.3V	Panel communication direction signal
	A7	P2C_SBSY	O	DC0V/3.3V	Panel busy signal
	A8	C2P_SCK	O	DC0V/3.3V(pulse)	Panel clock signal
	A9	DISPLAY_POWER ON	O	DC0V/3.3V	LCD backlight lighting-off signal
	A10	INT_ANYKEY	O	DC0V/3.3V	Main recovery signal
	A11	GND	-	-	Ground
	A12	+5.0V6_FUSE	O	DC5V	DC5V power output
	A13	+5.0V6_FUSE	O	DC5V	DC5V power output
	A14	+5.0V6_FUSE	O	DC5V	DC5V power output
	A15	+5.0V6_FUSE	O	DC5V	DC5V power output
	B1	POWER_SW	O	DC0V/3.3V	Power key: On/Off
	B2	GND	-	-	Ground
	B3	JS_LED	O	DC0V/3.3V	JS LED control signal
	B4	GND	-	-	Ground
	B5	GND	-	-	Ground
	B6	GND	-	-	Ground
	B7	BEEP_POWERON	O	DC0V/3.3V	Alert sound recovery signal
	B8	LED_MEMORY	O	DC0V/3.3V	Memory LED control signal
	B9	LED_ATTENTION	O	DC0V/3.3V	Attention LED control signal
	B10	LED_PROCESSIN G	O	DC0V/3.3V	Processing LED control signal
	B11	AUDIO	O	Analog	Audio output signal
	B12	PNL_WKUP_REQ	O	DC0V/3.3V	Panel recovery signal
	B13	INT_ENERGYSAV ERKEY	I	DC0V/3.3V	Energy Saver key interrupt signal
	B14	NIRQ	O	DC0V/3.3V	NFC interrupt signal
	B15	I2C_SDA_NFC	O	DC0V/3.3V(pulse)	I2C clock signal
	YC23	1	REMOTE_FAN[1]	O	DC0V/5V
2		GND	-	-	Ground
3		+5V2	O	DC5V	DC5V power output

Connector	Pin	Signal	I/O	Voltage	Description
YC32	1	GND	-	-	Ground
	2	+5V5	O	DC5V	DC5V power output to HDD
	3	GND	-	-	Ground
YC33	1	GND	-	-	Ground
	2	SDOCLK	O	DC0V/3.3V(pulse)	Clock signal
	3	SDO	O	DC0V/3.3V(pulse)	Serial communication data signal
	4	GND	-	-	Ground
	5	SDICLK	I	DC0V/3.3V(pulse)	Clock signal
	6	SDI	I	DC0V/3.3V(pulse)	Serial communication data signal
	7	GND	-	-	Ground
	8	GND	-	-	Ground
	9	+5V2	O	DC5V	DC5V power output
	10	+5V2	O	DC5V	DC5V power output
YC42	1	+5V0	I	DC5V	DC5V power input from Power supply PWB
	2	GND	-	-	Ground
	3	+5V0	I	DC5V	DC5V power input from Power supply PWB
	4	GND	-	-	Ground
	5	+5V0	I	DC5V	DC5V power input from Power supply PWB
	6	GND	-	-	Ground
	7	+5V0	I	DC5V	DC5V power input from Power supply PWB
	8	GND	-	-	Ground
	9	+5V0	I	DC5V	DC5V power input from Power supply PWB
	10	GND	-	-	Ground
YC59	1	VBUS	O	DC5V	DC5V power output
	2	DATA-	I/O	LVDS	USB data signal
	3	DATA+	I/O	LVDS	USB data signal
	4	NC	-	-	Not used
	5	GND	-	-	Ground
YC60	1	+5V7_FUSE	O	DC5V	DC5V power output
	2	+5V7_FUSE	O	DC5V	DC5V power output
	3	+5V7_FUSE	O	DC5V	DC5V power output
	4	GND	-	-	Ground
	5	GND	-	-	Ground

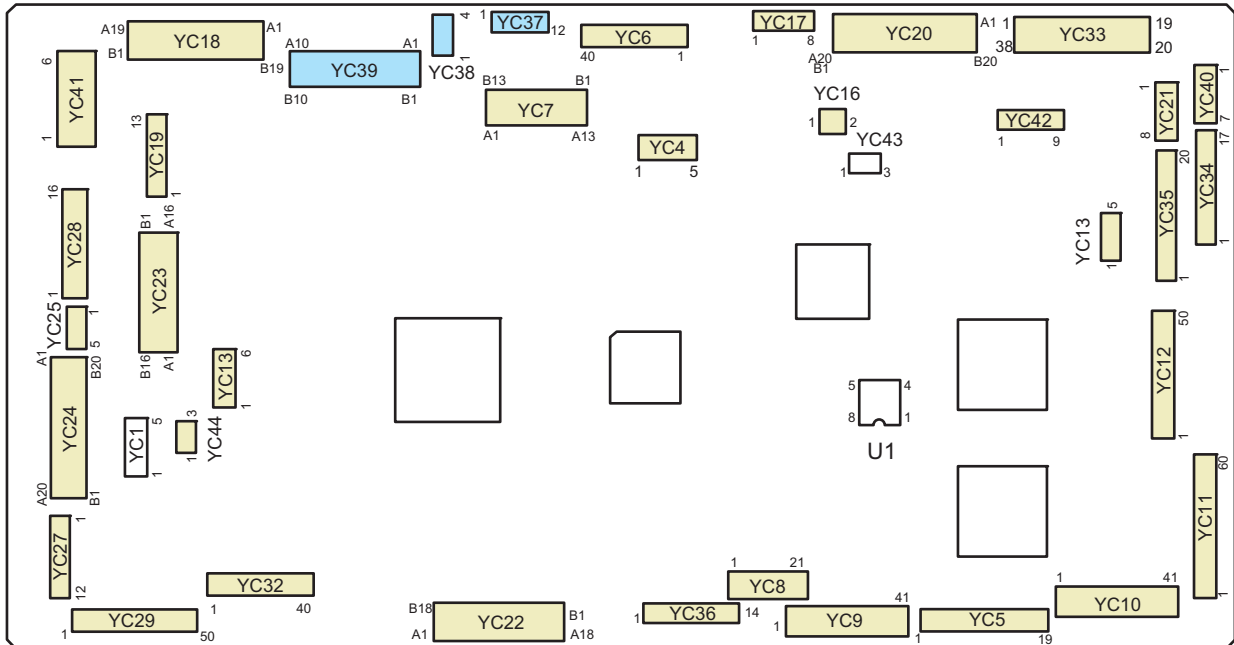
Connector	Pin	Signal	I/O	Voltage	Description
	6	GND	-	-	Ground
YC62	1	SD_D3	I/O	DC0V/3.3V(pulse)	Data signal
	2	SD_D2	I/O	DC0V/3.3V(pulse)	Data signal
	3	SD_CMD	I/O	DC0V/3.3V(pulse)	Data signal
	4	GND	-	-	Ground
	5	SD_CLK	I	DC0V/3.3V(pulse)	Clock signal
	6	GND	-	-	Ground
	7	SD_D1	I/O	DC0V/3.3V(pulse)	Data signal
	8	SD_D0	I/O	DC0V/3.3V(pulse)	Data signal
	9	GND	-	-	Ground
	10	VIO	PI	DC3.3V	DC3.3V power output
	11	VBAT	PI	DC3.3V	DC3.3V power output
	12	GND	-	-	Ground
	13	PAVDD	PI	DC3.3V	DC3.3V power output
	14	GND	-	-	Ground
	15	HOSTWAKE	I	DC0V/3.3V	Interrupt signal
	16	GND	-	-	Ground
	17	RESET	I	DC0V/3.3V	Reset signal
	18	DETECT	-	-	Ground
	19	USB_+	I/O		USB data signal
	20	USB_-	I/O		USB data signal
YC63	1	JS_LED_REM	O	DC0V/3.3V	JOB separator LED lighting signal
	2	ENG_WKUP_REQ	I	DC0V/3.3V	Engine sleep recovery signal
	3	HLD_ENG	I	DC0V/3.3V	Engine stop signal
	4	E2C_SDAT	O	DC0V/3.3V(pulse)	G6 communication data output signal
	5	C2E_SDAT	I	DC0V/3.3V(pulse)	G6 communication data input signal
	6	C2E_SCLK	I	DC0V/3.3V(pulse)	G6 communication clock signal
	7	E2C_SBSY	O	DC0V/3.3V(pulse)	G6 communication busy signal
	8	E2C_IR	O	DC0V/3.3V	G6 communication interrupt signal
	9	E2C_SDIR	O	DC0V/3.3V(pulse)	G6 communication direction signal
	10	ENG_POWOFF_N	I	DC0V/3.3V	Engine power off signal
	11	HLD_SCAN	I	DC0V/3.3V	Scanner stop signal
	12	DP_WAKEUP_REQ	I	DC0V/3.3V	DP sleep recovery signal
	13	GND	-	-	Ground
YC64	1	GND	-	-	Ground
	2	SRIF_SDR1N	O	DC0V/3.3V(pulse)	Serializer output data

Connector	Pin	Signal	I/O	Voltage	Description
	3	SRIF_SDR1P	O	DC0V/3.3V(pulse)	Serializer output data
	4	GND	-	-	Ground
	5	SRIF_SDR2N	O	DC0V/3.3V(pulse)	Serializer output data
	6	SRIF_SDR2P	O	DC0V/3.3V(pulse)	Serializer output data
	7	GND	-	-	Ground
	8	SRIF_SDR3N	O	DC0V/3.3V(pulse)	Serializer output data
	9	SRIF_SDR3P	O	DC0V/3.3V(pulse)	Serializer output data
	10	GND	-	-	Ground
	11	SRIF_SCLKRN	O	DC0V/3.3V(pulse)	Serializer transfer data
	12	SRIF_SCLKRP	O	DC0V/3.3V(pulse)	Serializer transfer data
	13	GND	-	-	Ground
	14	SRIF_SDR4N	O	DC0V/3.3V(pulse)	Serializer output data
	15	SRIF_SDR4P	O	DC0V/3.3V(pulse)	Serializer output data
	16	GND	-	-	Ground
	17	GND	-	-	Ground
	18	GND	-	-	Ground
	19	GND	-	-	Ground
	20	GND	-	-	Ground
	21	GND	-	-	Ground
YC65	1	GND	-	-	Ground
	2	V1_DATA0_N	I	DC0V/3.3V(pulse)	Image data signal
	3	V1_DATA0_P	I	DC0V/3.3V(pulse)	Image data signal
	4	GND	-	-	Ground
	5	V1_DATA1_N	I	DC0V/3.3V(pulse)	Image data signal?
	6	V1_DATA1_P	I	DC0V/3.3V(pulse)	Image data signal
	7	GND	-	-	Ground
	8	V1_DATA2_N	I	DC0V/3.3V(pulse)	Image data signal
	9	V1_DATA2_P	I	DC0V/3.3V(pulse)	Image data signal
	10	GND	-	-	Ground
	11	V1_CLK_N	I	DC0V/3.3V(pulse)	Image data signal
	12	V1_CLK_P	I	DC0V/3.3V(pulse)	Image data signal
	13	GND	-	-	Ground
	14	V0_DATA0_N	I	DC0V/3.3V(pulse)	Image data signal
	15	V0_DATA0_P	I	DC0V/3.3V(pulse)	Image data signal
	16	GND	-	-	Ground
	17	V0_DATA1_N	I	DC0V/3.3V(pulse)	Image data signal

Connector	Pin	Signal	I/O	Voltage	Description
	18	V0_DATA1_P	I	DC0V/3.3V(pulse)	Image data signal
	19	GND	-	-	Ground
	20	V0_DATA2_N	I	DC0V/3.3V(pulse)	Image data signal
	21	V0_DATA2_P	I	DC0V/3.3V(pulse)	Image data signal
	22	GND	-	-	Ground
	23	V0_CLK_N	I	DC0V/3.3V(pulse)	Image data signal
	24	V0_CLK_P	I	DC0V/3.3V(pulse)	Image data signal
	25	GND	-	-	Ground
	26	VSYNC_D_N	O	DC0V/3.3V(pulse)	Image data signal
	27	VSYNC_D_P	O	DC0V/3.3V(pulse)	Image data signal
	28	VSYNC_C_N	O	DC0V/3.3V(pulse)	Image data signal
	29	VSYNC_C_P	O	DC0V/3.3V(pulse)	Image data signal
	30	VSYNC_B_N	O	DC0V/3.3V(pulse)	Image data signal
	31	VSYNC_B_P	O	DC0V/3.3V(pulse)	Image data signal
	32	VSYNC_A_N	O	DC0V/3.3V(pulse)	Image data signal
	33	VSYNC_A_P	O	DC0V/3.3V(pulse)	Image data signal
	34	HSYNC_D_N	O	DC0V/3.3V(pulse)	Image data signal
	35	HSYNC_D_P	O	DC0V/3.3V(pulse)	Image data signal
	36	HSYNC_C_N	O	DC0V/3.3V(pulse)	Image data signal
	37	HSYNC_C_P	O	DC0V/3.3V(pulse)	Image data signal
	38	HSYNC_B_N	O	DC0V/3.3V(pulse)	Image data signal
	39	HSYNC_B_P	O	DC0V/3.3V(pulse)	Image data signal
	40	HSYNC_A_N	O	DC0V/3.3V(pulse)	Image data signal
	41	HSYNC_A_P	O	DC0V/3.3V(pulse)	Image data signal

## (2)Engine PWB

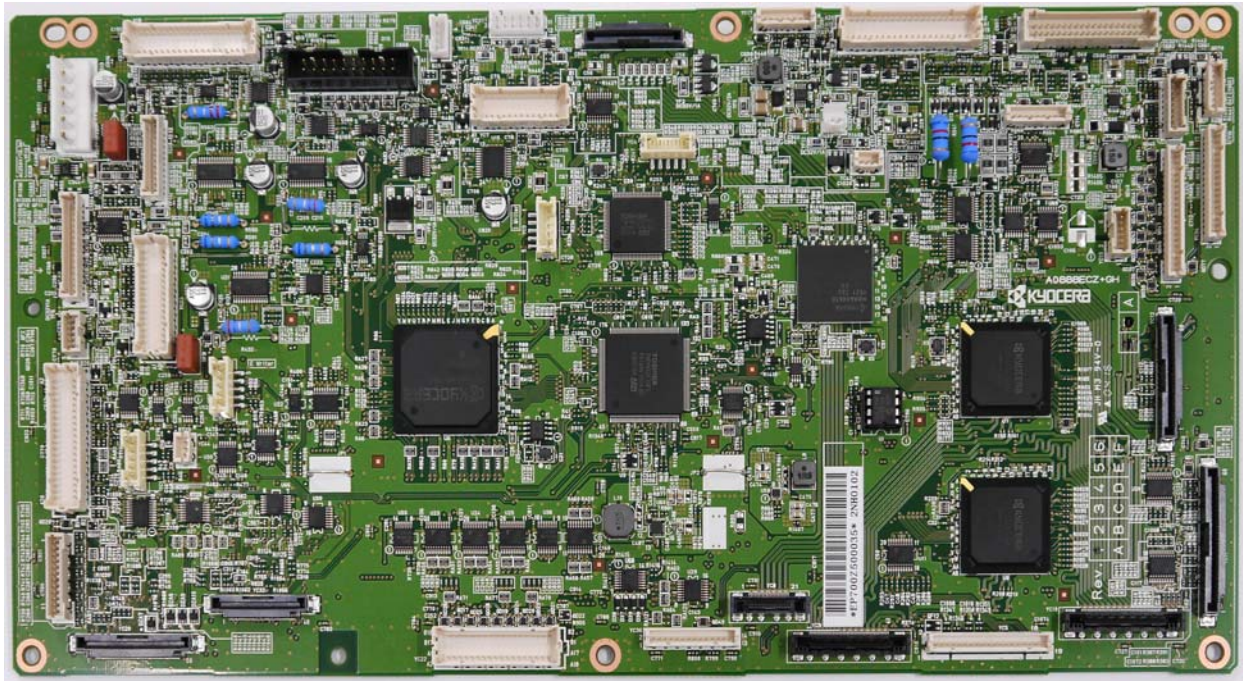
### Connector position



Connector	Destination
YC5	Main PWB
YC6	CCD PWB
YC7	Original size sensor, Original size timing sensor, Home position sensor, Scanner motor, BR fan motor, DP main PWB
YC8	Main PWB
YC9	Main PWB
YC10	FIERY relay PWB
YC11	LSU relay PWB
YC12	LSU relay PWB
YC13	LSU relay PWB
YC16	LSU cleaning motor
YC17	Waste toner box
YC18	Fuser belt sensor, Fuser release sensor, Fuser eject sensor, Fuser release motor, Front fuser edge fan motor, Rear fuser edge fan motor, Rear fuser fan motor, Fuser PWB, Fuser press thermistor, Fuser thermostat 1, IH PWB
YC19	Toner motor K, Toner motor M, Toner motor C, Toner motor Y, RFID PWB
YC20	Exhaust fan motor, Power source fan motor 1, Front belt fan motor, Rear belt fan motor, Exhaust fan motor right, Exhaust fan motor left, PF power supply PWB, PF main PWB, Side multi tray
YC21	DF main PWB
YC22	Motor relay PWB

Connector	Destination
YC23	Transfer cleaning motor, Color release motor, Color release sensor, Transfer skew sensor, Transfer skew motor, Transfer belt sensor, Transfer edge sensor, EEPROM PWB
YC24	Feed PWB
YC25	Feed PWB
YC27	Paper length sensor 1, Paper width sensor 1, Paper length sensor 2, Paper width sensor 2
YC28	Front PWB
YC29	Front PWB
YC32	Front PWB
YC33	BR main PWB, BR feedshift solenoid, BR eject cover switch, BR eject sensor
YC34	Main high voltage PWB
YC35	Main high voltage PWB
YC36	Transfer high voltage PWB
YC37	Coin vendor
YC38	Key counter(reference)
YC39	Key card(reference)
YC40	Power source fan motor 2
YC41	Power supply PWB
YC42	Main high voltage PWB
YC43	HVU cooling FAN (Not Used)
YC44	Feed PWB

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC5	1	GND	-	-	Ground
	2	DP_WAKEUP_REQ (MtoE)	O	DC0V/3.3V	DP sleep recovery signal
	3	HLD_SCN(MtoE)	I	DC0V/3.3V	Scanner stop signal
	4	ENG_POWOFF_N(M_E)	I	DC0V/3.3V	Engine power off signal
	5	ENG_G6_DIR(E_M)	O	DC0V/3.3V(pulse)	Communication direction signal
	6	ENG_G6_IR(E_M)	O	DC0V/3.3V	Communication interrupt signal
	7	ENG_G6_BSY(E_M)	O	DC0V/3.3V(pulse)	Communication busy signal
	8	ENG_G6_CLK(M_E)	I	DC0V/3.3V(pulse)	Communication clock signal
	9	ENG_G6_SDI(M_E)	I	DC0V/3.3V(pulse)	Communication data input signal
	10	ENG_G6_SDO(E_M)	O	DC0V/3.3V(pulse)	Communication data output signal
	11	ENG_HOLD	I	DC0V/3.3V	Engine stop signal
	12	ENG_WKUP_REQ	I	DC0V/3.3V	Engine sleep recovery signal
	13	SC_CLK	I	DC0V/3.3V(pulse)	Communication clock signal
	14	SC_SO	O	DC0V/3.3V(pulse)	Communication data output signal



Connector	Pin	Signal	I/O	Voltage	Description
	15	SC_SI	I	DC0V/3.3V(pulse)	Communication data input signal
	16	SC_BSY	O	DC0V/3.3V(pulse)	Communication busy signal
	17	SC_DIR	O	DC0V/3.3V(pulse)	Communication direction signal
	18	SC_IRN	O	DC0V/3.3V	Communication interrupt signal
	19	GND	-	-	Ground
YC6	1	+12V5_FUSE	O	DC12V	DC12V power output
	2	+12V5_FUSE	O	DC12V	DC12V power output
	3	+12V5_FUSE	O	DC12V	DC12V power output
	4	+12V5_FUSE	O	DC12V	DC12V power output
	5	NC	-	-	Not used
	6	LED_PWM	O	DC0V/3.3V(pulse)	LED driver PWM signal
	7	GND	-	-	Ground
	8	DSI_CIS_5P	I	LVDS	Serial input data
	9	DSI_CIS_5N	I	LVDS	Serial input data
	10	GND	-	-	Ground
	11	DSI_CIS_4P	I	LVDS	Serial input data
	12	DSI_CIS_4N	I	LVDS	Serial input data
	13	GND	-	-	Ground
	14	DSI_CIS_3P	I	LVDS	Serial input data
	15	DSI_CIS_3N	I	LVDS	Serial input data
	16	GND	-	-	Ground
	17	DSI_CIS_CKP	I	LVDS	Transfer clock
	18	DSI_CIS_CKN	I	LVDS	Transfer clock
	19	GND	-	-	Ground
	20	DSI_CIS_2P	I	LVDS	Serial input data
	21	DSI_CIS_2N	I	LVDS	Serial input data
	22	GND	-	-	Ground
	23	DSI_CIS_1P	I	LVDS	Serial input data
	24	DSI_CIS_1N	I	LVDS	Serial input data
	25	GND	-	-	Ground
	26	AFE_RD	I	DC0V/3.3V	AFE serial communication read signal
	27	GND	-	-	Ground
	28	AFE_WD	O	DC0V/3.3V	AFE serial communication write signal
	29	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	30	AFE_CLK	O	DC0V/3.3V(pulse)	AFE serial communication clock signal
	31	GND	-	-	Ground
	32	AFE_CS	O	DC0V/3.3V	AFE serial communication select signal
	33	GND	-	-	Ground
	34	AFE_MCLK_P	O	LVDS	AFE clock signal
	35	AFE_MCLK_N	O	LVDS	AFE clock signal
	36	GND	-	-	Ground
	37	NC	-	-	Not used
	38	+5V2	O	DC5V	DC5V power output
	39	+5V2	O	DC5V	DC5V power output
	40	+5V2	O	DC5V	DC5V power output
YC7	A1	SMOT B/	O	DC0V/24V(pulse)	Scanner motor control signal
	A2	SMOT B	O	DC0V/24V(pulse)	Scanner motor control signal
	A3	SMOT A	O	DC0V/24V(pulse)	Scanner motor control signal
	A4	SMOT A/	O	DC0V/24V(pulse)	Scanner motor control signal
	A5	HP_SW	I	DC0V/3.3V	Home position sensor: On/Off
	A6	GND	-	-	Ground
	A7	+3.3V2	O	DC3.3V	DC3.3V power output
	A8	PLT_SW	I	DC0V/3.3V	Original size timing sensor: On/Off
	A9	GND	-	-	Ground
	A10	+3.3V2	O	DC3.3V	DC3.3V power output
	A11	+5V2	O	DC5V	DC5V power output
	A12	ORG_SW	I	DC0V/3.3V	Original size sensor: On/Off
	A13	GND	-	-	Ground
	B1	GND	-	-	Ground
	B2	DP_TMGM	I	DC0V/3.3V	DP scanning start signal
	B3	DP_RDY	I	DC0V/3.3V	Serial communication ready signal
	B4	DP_SEL	O	DC0V/3.3V	Serial communication select signal
	B5	DP_CLK	O	DC0V/3.3V	Serial communication clock signal
	B6	DP_SO	O	DC0V/3.3V	Serial communication data output signal
	B7	DP_SI	I	DC0V/3.3V	Serial communication data input signal
	B8	DP_OPEN	I	DC0V/3.3V	DP cover open/close detection signal
	B9	DP_PAGE_END	I	DC0V/3.3V	DP skew correction signal
	B10	DP_ORG_SET	I	DC0V/3.3V	Original sensor: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	B11	+3.3V4_FUSE	O	DC3.3V	DC3.3V power output
	B12	BRIDGE_FAN	O	DC0V/24V	BR fan motor: On/Off
	B13	+24V2_FUSE	O	DC24V	DC24V power output
YC8	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	GND	-	-	Ground
	5	GND	-	-	Ground
	6	GND	-	-	Ground
	7	OS_SAD4P	O	LVDS	Serializer output data
	8	OS_SAD4N	O	LVDS	Serializer output data
	9	GND	-	-	Ground
	10	OS_SACKP	O	LVDS	Serializer transfer CLK
	11	OS_SACKN	O	LVDS	Serializer transfer CLK
	12	GND	-	-	Ground
	13	OS_SAD3P	O	LVDS	Serializer output data
	14	OS_SAD3N	O	LVDS	Serializer output data
	15	GND	-	-	Ground
	16	OS_SAD2P	O	LVDS	Serializer output data
	17	OS_SAD2N	O	LVDS	Serializer output data
	18	GND	-	-	Ground
	19	OS_SAD1P	O	LVDS	Serializer output data
	20	OS_SAD1N	O	LVDS	Serializer output data
	21	GND	-	-	Ground
YC9	1	SAT_2_HSYNC_A_P	O	LVDS	Image data signal
	2	SAT_2_HSYNC_A_N	O	LVDS	Image data signal
	3	SAT_2_HSYNC_B_P	O	LVDS	Image data signal
	4	SAT_2_HSYNC_B_N	O	LVDS	Image data signal
	5	SAT_2_HSYNC_C_P	O	LVDS	Image data signal
	6	SAT_2_HSYNC_C_N	O	LVDS	Image data signal
	7	SAT_2_HSYNC_D_P	O	LVDS	Image data signal

Connector	Pin	Signal	I/O	Voltage	Description
	8	SAT_2_HSYNC_D_N	O	LVDS	Image data signal
	9	SAT_2_VSYNC_A_P	O	LVDS	Image data signal
	10	SAT_2_VSYNC_A_N	O	LVDS	Image data signal
	11	SAT_2_VSYNC_B_P	O	LVDS	Image data signal
	12	SAT_2_VSYNC_B_N	O	LVDS	Image data signal
	13	SAT_2_VSYNC_C_P	O	LVDS	Image data signal
	14	SAT_2_VSYNC_C_N	O	LVDS	Image data signal
	15	SAT_2_VSYNC_D_P	O	LVDS	Image data signal
	16	SAT_2_VSYNC_D_N	O	LVDS	Image data signal
	17	GND	-	-	Ground
	18	SAR_2_VCLK1_P	I	LVDS	Image data signal
	19	SAR_2_VCLK1_N	I	LVDS	Image data signal
	20	GND	-	-	Ground
	21	SAR_2_CH13_P	I	LVDS	Image data signal
	22	SAR_2_CH13_N	I	LVDS	Image data signal
	23	GND	-	-	Ground
	24	SAR_2_CH12_P	I	LVDS	Image data signal
	25	SAR_2_CH12_N	I	LVDS	Image data signal
	26	GND	-	-	Ground
	27	SAR_2_CH11_P	I	LVDS	Image data signal
	28	SAR_2_CH11_N	I	LVDS	Image data signal
	29	GND	-	-	Ground
	30	SAR_2_VCLK2_P	I	LVDS	Image data signal
	31	SAR_2_VCLK2_N	I	LVDS	Image data signal
	32	GND	-	-	Ground
	33	SAR_2_CH23_P	I	LVDS	Image data signal
	34	SAR_2_CH23_N	I	LVDS	Image data signal
	35	GND	-	-	Ground
	36	SAR_2_CH22_P	I	LVDS	Image data signal
	37	SAR_2_CH22_N	I	LVDS	Image data signal
	38	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	39	SAR_2_CH21_P	I	LVDS	Image data signal
	40	SAR_2_CH21_N	I	LVDS	Image data signal
	41	GND	-	-	Ground
YC10	1	GND	-	-	Ground
	2	SAR_1_CH21_N	I	LVDS	Image data signal
	3	SAR_1_CH21_P	I	LVDS	Image data signal
	4	GND	-	-	Ground
	5	SAR_1_CH22_N	I	LVDS	Image data signal
	6	SAR_1_CH22_P	I	LVDS	Image data signal
	7	GND	-	-	Ground
	8	SAR_1_CH23_N	I	LVDS	Image data signal
	9	SAR_1_CH23_P	I	LVDS	Image data signal
	10	GND	-	-	Ground
	11	SAR_1_VCLK2_N	I	LVDS	Image data signal
	12	SAR_1_VCLK2_P	I	LVDS	Image data signal
	13	GND	-	-	Ground
	14	SAR_1_CH11_N	I	LVDS	Image data signal
	15	SAR_1_CH11_P	I	LVDS	Image data signal
	16	GND	-	-	Ground
	17	SAR_1_CH12_N	I	LVDS	Image data signal
	18	SAR_1_CH12_P	I	LVDS	Image data signal
	19	GND	-	-	Ground
	20	SAR_1_CH13_N	I	LVDS	Image data signal
	21	SAR_1_CH13_P	I	LVDS	Image data signal
	22	GND	-	-	Ground
	23	SAR_1_VCLK1_N	I	LVDS	Image data signal
	24	SAR_1_VCLK1_P	I	LVDS	Image data signal
	25	GND	-	-	Ground
	26	SAT_1_VSYNC_D_P	O	LVDS	Image data signal
	27	SAT_1_VSYNC_D_N	O	LVDS	Image data signal
	28	SAT_1_VSYNC_C_P	O	LVDS	Image data signal
	29	SAT_1_VSYNC_C_N	O	LVDS	Image data signal
	30	SAT_1_VSYNC_B_P	O	LVDS	Image data signal

Connector	Pin	Signal	I/O	Voltage	Description
	31	SAT_1_VSYNC_B_N	O	LVDS	Image data signal
	32	SAT_1_VSYNC_A_P	O	LVDS	Image data signal
	33	SAT_1_VSYNC_A_N	O	LVDS	Image data signal
	34	SAT_1_HSYNC_D_P	O	LVDS	Image data signal
	35	SAT_1_HSYNC_D_N	O	LVDS	Image data signal
	36	SAT_1_HSYNC_C_P	O	LVDS	Image data signal
	37	SAT_1_HSYNC_C_N	O	LVDS	Image data signal
	38	SAT_1_HSYNC_B_P	O	LVDS	Image data signal
	39	SAT_1_HSYNC_B_N	O	LVDS	Image data signal
	40	SAT_1_HSYNC_A_P	O	LVDS	Image data signal
	41	SAT_1_HSYNC_A_N	O	LVDS	Image data signal
YC11	1	GND	-	-	Ground
	2	DATA4_P_K	O	LVDS	Image data K
	3	DATA4_N_K	O	LVDS	Image data K
	4	GND	-	-	Ground
	5	DATA3_P_K	O	LVDS	Image data K
	6	DATA3_N_K	O	LVDS	Image data K
	7	GND	-	-	Ground
	8	DATA2_P_K	O	LVDS	Image data K
	9	DATA2_N_K	O	LVDS	Image data K
	10	GND	-	-	Ground
	11	DATA1_P_K	O	LVDS	Image data K
	12	DATA1_N_K	O	LVDS	Image data K
	13	GND	-	-	Ground
	14	BG_FIX_K	O	DC0V/3.3V	Laser shading clock signal K
	15	P4_K	O	DC0V/3.3V	Laser control signal
	16	P2_K	O	DC0V/3.3V	Laser control signal
	17	P0_K	O	DC0V/3.3V	Laser control signal
	18	INT_ST_MK	I	DC0V/5V	Laser driver initialization monitor signal

Connector	Pin	Signal	I/O	Voltage	Description
	19	SET	O	DC0V/3.3V	Laser control signal
	20	CSI_K	O	DC0V/3.3V	LDD chip select signal K
	21	DIO_MK	I	DC0V/3.3V	Communication data input signal
	22	GND	-	-	Ground
	23	DOI_MK	O	DC0V/3.3V	Communication data output signal
	24	GND	-	-	Ground
	25	SKOI_MK	O	DC0V/3.3V	Communication clock signal MK
	26	CSO_K	O	DC0V/3.3V	EEPROM chip select signal K
	27	BD_K	I	DC0V/5V	BD signal
	28	TH_K	I	Analog	LSU thermistor detection voltage
	29	GND	-	-	Ground
	30	POL_CLK_K	O	DC0V/5V(pulse)	PM clock signal
	31	POL_RDY_K	I	DC0V/3.3V	PM ready signal
	32	POL_REM_K	O	DC0V/5V	PM remote signal
	33	GND	-	-	Ground
	34	DATA4_P_M	O	LVDS	Image data M
	35	DATA4_N_M	O	LVDS	Image data M
	36	GND	-	-	Ground
	37	DATA3_P_M	O	LVDS	Image data M
	38	DATA3_N_M	O	LVDS	Image data M
	39	GND	-	-	Ground
	40	DATA2_P_M	O	LVDS	Image data M
	41	DATA2_N_M	O	LVDS	Image data M
	42	GND	-	-	Ground
	43	DATA1_P_M	O	LVDS	Image data M
	44	DATA1_N_M	O	LVDS	Image data M
	45	GND	-	-	Ground
	46	BG_FIX_M	O	DC0V/3.3V	Laser shading clock signal M
	47	P4_M	O	DC0V/3.3V	Laser control signal
	48	P2_M	O	DC0V/3.3V	Laser control signal
	49	P0_M	O	DC0V/3.3V	Laser control signal
	50	CSI_M	O	DC0V/3.3V	LDD chip select signal M
	51	CSO_M	O	DC0V/3.3V	EEPROM chip select signal M
	52	BD_M	I	DC0V/5V	BD signal
	53	GND	-	-	Ground
	54	POL_CLK_M	O	DC0V/5V(pulse)	PM clock signal

Connector	Pin	Signal	I/O	Voltage	Description
	55	POL_RDY_M	I	DC0V/3.3V	PM ready signal
	56	POL_REM_M	O	DC0V/5V	PM remote signal
	57	GND	-	-	Ground
	58	POL_CLK_C	O	DC0V/5V(pulse)	PM clock signal
	59	POL_RDY_C	I	DC0V/3.3V	PM ready signal
	60	POL_REM_C	O	DC0V/5V	PM remote signal
YC12	1	GND	-	-	Ground
	2	DATA4_P_C	O	LVDS	Image data C
	3	DATA4_N_C	O	LVDS	Image data C
	4	GND	-	-	Ground
	5	DATA3_P_C	O	LVDS	Image data C
	6	DATA3_N_C	O	LVDS	Image data C
	7	GND	-	-	Ground
	8	DATA2_P_C	O	LVDS	Image data C
	9	DATA2_N_C	O	LVDS	Image data C
	10	GND	-	-	Ground
	11	DATA1_P_C	O	LVDS	Image data C
	12	DATA1_N_C	O	LVDS	Image data C
	13	GND	-	-	Ground
	14	BG_FIX_C	O	DC0V/3.3V	Laser shading clock signal C
	15	P2_C	O	DC0V/3.3V	Laser control signal
	16	P0_C	O	DC0V/3.3V	Laser control signal
	17	INT_ST_YC	I	DC0V/5V	Laser driver initialization monitor signal
	18	SET	O	DC0V/3.3V	Laser control signal
	19	CSI_C	O	DC0V/3.3V	LDD chip select signal C
	20	DIO_YC	I	DC0V/3.3V	Communication data input signal
	21	GND	-	-	Ground
	22	DOI_YC	O	DC0V/3.3V	Communication data output signal
	23	GND	-	-	Ground
	24	SKOI_YC	O	DC0V/3.3V	Communication clock signal YC
	25	CSO_C	O	DC0V/3.3V	EEPROM chip select signal C
	26	BD_C	I	DC0V/5V	BD signal
	27	GND	-	-	Ground
	28	DATA4_P_Y	O	LVDS	Image data Y
	29	DATA4_N_Y	O	LVDS	Image data Y



Connector	Pin	Signal	I/O	Voltage	Description
	30	GND	-	-	Ground
	31	DATA3_P_Y	O	LVDS	Image data Y
	32	DATA3_N_Y	O	LVDS	Image data Y
	33	GND	-	-	Ground
	34	DATA2_P_Y	O	LVDS	Image data Y
	35	DATA2_N_Y	O	LVDS	Image data Y
	36	GND	-	-	Ground
	37	DATA1_P_Y	O	LVDS	Image data Y
	38	DATA1_N_Y	O	LVDS	Image data Y
	39	GND	-	-	Ground
	40	BG_FIX_Y	O	DC0V/3.3V	Laser shading clock signal Y
	41	P2_Y	O	DC0V/3.3V	Laser control signal
	42	P0_Y	O	DC0V/3.3V	Laser control signal
	43	CSI_Y	O	DC0V/3.3V	LDD chip select signal CY
	44	CSO_Y	O	DC0V/3.3V	EEPROM chip select signal Y
	45	BD_Y	I	DC0V/5V	BD signal
	46	GND	-	-	Ground
	47	P4_YC	O	DC0V/3.3V	Laser control signal
	48	POL_CLK_Y	O	DC0V/5V(pulse)	PM clock signal
	49	POL_RDY_Y	I	DC0V/3.3V	PM ready signal
	50	POL_REM_Y	O	DC0V/5V	PM remote signal
YC13	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	+5V4	O	DC5V	DC5V power output
	5	+5V4	O	DC5V	DC5V power output
	6	+5V4	O	DC5V	DC5V power output
YC16	1	CCW	O	DC0V/24V	LSU cleaning motor control signal
	2	CW	O	DC0V/24V	LSU cleaning motor control signal
YC17	1	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	2	TNB_VIB	O	DC0V/3.3V	Toner vibration motor remote signal
	3	TNB_FAN2_ALM	I	DC0V/3.3V	Toner collection fan motor 2 alarm signal
	4	GND	-	-	Ground
	5	TNB_FAN2	O	DC0V/24V	Dust collecting box fan 2: On/Off
	6	TNB_FAN1_ALM	I	DC0V/3.3V	Toner collection fan motor 1 alarm signal

Connector	Pin	Signal	I/O	Voltage	Description
	7	GND	-	-	Ground
	8	TNB_FAN1	O	DC0V/24V	Toner collection fan motor 1: On/Off
YC18	A1	FSR_FAN_ALM	I	DC0V/3.3V	Rear fuser fan motor alarm signal
	A2	GND	-	-	Ground
	A3	FSR_FAN	O	DC0V/24V	Rear fuser fan motor
	A4	EDGE_FAN	O	DC0V/12V	Front fuser edge fan motor: On/Off
	A5	+12V5_FUSE	O	DC12V	DC12V power output
	A6	EDGE_FAN	O	DC0V/12V	Rear fuser edge fan motor: On/Off
	A7	+12V5_FUSE	O	DC12V	DC12V power output
	A8	FSR_RLS_DR_CC W	O	DC0V/24V	Fuser release motor control signal
	A9	FSR_RLS_DR_CW	O	DC0V/24V	Fuser release motor control signal
	A10	GND	-	-	Ground
	A11	FSR_SIZE_SENS	I	DC0V/3.3V	Fuser eject sensor: On/Off
	A12	+5V2	O	DC5V	DC5V power output
	A13	GND	-	-	Ground
	A14	FSR_RLS_SENS	I	DC0V/3.3V	Fuser release sensor: On/Off
	A15	+5V2	O	DC5V	DC5V power output
	A16	GND	-	-	Ground
	A17	FSR_BLT_PLS	I	DC0V/3.3V(pulse)	Fuser belt sensor
	A18	+5V2	O	DC5V	DC5V power output
	A19	NC	-	-	-
	B1	IH_RXD	I	DC0V/3.3V(pulse)	Communication control signal
	B2	IH_TXD	O	DC0V/3.3V(pulse)	Communication control signal
	B3	IH_ERROR	I	DC0V/3.3V	IH PWB Error signal
	B4	IH_IGBT_CLK_N	O	DC0V/3.3V(pulse)	IH_IGBT control signal
	B5	IH_IGBT_CLK_P	O	DC0V/3.3V(pulse)	IH_IGBT control signal
	B6	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	B7	GND	-	-	Ground
	B8	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	B9	+3.3V2_THCUT	O	DC3.3V	DC3.3V power output
	B10	GND	-	-	Ground
	B11	PRESS_TH	I	Analog	Fuser press thermistor detection voltage
	B12	GUIDE_TH1	I	Analog	Excessive temperature rise monitor detection voltage
	B13	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	B14	MAIN_TH1	I	Analog	Fuser center thermistor temperature detection
	B15	MAIN_TH2	I	Analog	Fuser center thermistor compensation temperature detection
	B16	EDGE_TH	I	Analog	Fuser edge thermistor temperature detection
	B17	I2C_SCL	O	DC0V/3.3V(pulse)	Communication clock signal
	B18	I2C_SDA	I/O	DC0V/3.3V(pulse)	Communication data signal
	B19	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
YC19	1	GND	-	-	Ground
	2	SDA	I/O	DC0V/3.3V(pulse)	Communication data signal
	3	SCL	O	DC0V/3.3V(pulse)	Communication clock signal
	4	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	5	+24V2(Driver output)	O	DC0V/24V	Toner motor Y control signal
	6	TMOT_Y_DR	O	DC0V/24V	Toner motor Y control signal
	7	+24V2(Driver output)	O	DC0V/24V	Toner motor C control signal
	8	TMOT_C_DR	O	DC0V/24V	Toner motor C control signal
	9	+24V2(Driver output)	O	DC0V/24V	Toner motor M control signal
	10	TMOT_M_DR	O	DC0V/24V	Toner motor M control signal
	11	+24V2(Driver output)	O	DC0V/24V	Toner motor K control signal
	12	TMOT_BK_DR	O	DC0V/24V	Toner motor K control signal
YC20	A1	PF_CLK	O	DC0V/3.3V(pulse)	Clock signal
	A2	PF_SDO	O	DC0V/3.3V(pulse)	Serial communication data signal
	A3	PF_SEL	O	DC0V/3.3V	Select signal
	A4	PF_SDI	I	DC0V/3.3V(pulse)	Serial communication data signal
	A5	PF_RDY	I	DC0V/3.3V	Ready signal
	A6	PF_PAUSE	O	DC0V/3.3V	Pause signal
	A7	PF_CAS1_OPEN	I	DC0V/3.3V	PF cassette 1 open/close detection signal
	A8	PF_CAS2_OPEN	I	DC0V/3.3V	PF cassette 2 open/close detection signal
	A9	+3.3V4_FUSE	O	DC3.3V	DC3.3V power output
	A10	GND	-	-	Ground
	A11	PF_FINAL_SENS	I	DC0V/3.3V	PF conveying sensor 1: On/Off
	A12	EXH_UPPER_FAN	O	DC0V/24V	Exhaust fan motor: On/Off
	A13	+24V2_FUSE	O	DC24V	DC24V power output

Connector	Pin	Signal	I/O	Voltage	Description
	A14	24V_LVU_FAN_ALARM	I	DC0V/3.3V	Power source fan motor 1 alarm signal
	A15	GND	-	-	Ground
	A16	24V_LVU_FAN	O	DC0V/24V	Power source fan motor 1: On/Off
	A17	+3.3V2_FUSE	-	-	-
	A18	GND	-	-	-
	A19	SUB_SDA	-	-	-
	A20	SUB_SCL	-	-	-
	B1	SIDE_CLK	O	DC0V/3.3V(pulse)	Clock signal
	B2	SIDE_SDO	O	DC0V/3.3V(pulse)	Serial communication data signal
	B3	SIDE_SEL	O	DC0V/3.3V	Select signal
	B4	SIDE_SDI	I	DC0V/3.3V(pulse)	Serial communication data signal
	B5	SIDE_RDY	I	DC0V/3.3V	Ready signal
	B6	SIDE_PAUSE	O	DC0V/3.3V	Pause signal
	B7	CAS1_OPEN	I	DC0V/3.3V	Main body cassette 1 open/close detection signal
	B8	CAS2_OPEN	I	DC0V/3.3V	Main body cassette 2 open/close detection signal
	B9	MULTI_OPEN	I	DC0V/3.3V	Side deck/Side Multi Tray cassette open/close detection signal
	B10	+3.3V4_FUSE	O	DC3.3V	DC3.3V power output
	B11	GND	-	-	Ground
	B12	DLP_FAN1	O	DC0V/24V	Left eject fan motor: On/Off
	B13	+24V2_FUSE	O	DC24V	DC24V power output
	B14	DLP_FAN2	O	DC0V/24V	Right eject fan motor: On/Off
	B15	+24V2_FUSE	O	DC24V	DC24V power output
	B16	+24V2_FUSE	O	DC24V	DC24V power output
	B17	BLT_FAN1	O	DC0V/24V	Front belt fan motor: On/Off
	B18	+24V2_FUSE	O	DC24V	DC24V power output
	B19	BLT_FAN2	O	DC0V/24V	Rear belt fan motor: On/Off
	B20	SD_FINAL_SENS	I	DC0V/3.3V	PF(Side deck) paper feed sensor: On/Off
YC21	1	DF_CLK	O	DC0V/3.3V(pulse)	Communication clock signal
	2	DF_SDO	O	DC0V/3.3V(pulse)	Serial communication data signal
	3	DF_SEL	O	DC0V/3.3V	Select signal
	4	DF_SDI	I	DC0V/3.3V(pulse)	Serial communication data signal
	5	DF_RDY	I	DC0V/3.3V	Ready signal
	6	DF_DET	I	DC0V/3.3V	Connection detection signal

Connector	Pin	Signal	I/O	Voltage	Description
	7	GND	-	-	Ground
	8	DF_SYNC	O	DC0V/3.3V(pulse)	DF synchronizing signal
YC22	A1	GND	-	-	Ground
	A2	SIG2_C	I	DC0V/5.0V(pulse)	Drum motor encoder sub sensor C
	A3	SIG1_C	I	DC0V/5.0V(pulse)	Drum motor encoder main sensor C
	A4	DRM_C_BRAKE	O	DC0V/5V	Drum motor brake signal C
	A5	DRM_C_CLK	O	DC0V/5V(pulse)	Drum motor clock signal C
	A6	DRM_C_REM	O	DC0V/5V	Drum motor remote signal C
	A7	DLP_M_RDY	I	DC0V/3.3V	Developer motor sync signal M
	A8	DLP_COL_CLK	O	DC0V/5V(pulse)	Developer motor clock signal C
	A9	DLP_M_REM	O	DC0V/5V	Developer motor remote signal M
	A10	DLP_DIR	O	DC0V/5V	Developer motor rotation direction control signal
	A11	DLP_BK_RDY	I	DC0V/3.3V	Developer motor sync signal K
	A12	DLP_BK_CLK	O	DC0V/5V(pulse)	Developer motor clock signal K
	A13	DLP_BK_REM	O	DC0V/5V	Developer motor remote signal K
	A14	GND	-	-	Ground
	A15	DRM_BK_REM	O	DC0V/5V	Drum motor remote signal K
	A16	DRM_BK_CLK	O	DC0V/5V(pulse)	Drum motor clock signal K
	A17	DRM_DIR	O	DC0V/5V	Drum motor rotation direction control signal K
	A18	DRM_BK_BRAKE	O	DC0V/5V	Drum motor brake signal K
	B1	SIG1_BK	I	DC0V/5.0V(pulse)	Drum motor encoder main sensor K
	B2	SIG2_BK	I	DC0V/5.0V(pulse)	Drum motor encoder sub sensor K
	B3	DRM_M_REM	O	DC0V/5V	Drum motor remote signal M
	B4	DRM_M_CLK	O	DC0V/5V(pulse)	Drum motor clock signal M
	B5	DRM_M_BRAKE	O	DC0V/5V	Drum motor brake signal M
	B6	SIG1_M	I	DC0V/5.0V(pulse)	Drum motor encoder main sensor M
	B7	SIG2_M	I	DC0V/5.0V(pulse)	Drum motor encoder sub sensor M
	B8	+5V2	O	DC5V	DC5V power output
	B9	DLP_C_REM	O	DC0V/5V	Developer motor remote signal C
	B10	DLP_C_RDY	I	DC0V/3.3V	Developer motor sync signal C
	B11	DLP_Y_REM	O	DC0V/5V	Developer motor remote signal Y
	B12	DLP_Y_RDY	I	DC0V/3.3V	Developer motor sync signal Y
	B13	DRM_Y_REM	O	DC0V/5V	Drum motor remote signal Y
	B14	DRM_Y_CLK	O	DC0V/5V(pulse)	Drum motor clock signal Y
	B15	DRM_Y_BRAKE	O	DC0V/5V	Drum motor brake signal Y

Connector	Pin	Signal	I/O	Voltage	Description
	B16	SIG1_Y	I	DC0V/5.0V(pulse)	Drum motor encoder main sensor Y
	B17	SIG2_Y	I	DC0V/5.0V(pulse)	Drum motor encoder sub sensor Y
	B18	+5V2	O	DC5V	DC5V power output
	A1	+24V2_FUSE	O	DC24V	DC24V power output
	A2	GND	-	-	Ground
	A3	ICL_MOT_REM	O	DC0V/5V	Transfer cleaning motor remote signal
	A4	ICL_MOT_CLK	O	DC0V/5V(pulse)	Transfer cleaning motor clock signal
	A5	ICL_MOT_RDY	I	DC0V/3.3V	Transfer cleaning motor sync signal
	A6	ICL_MOT_DIR	O	DC0V/5V	Transfer cleaning motor rotation direction control signal
	A7	RLS_MOT_DR	O	DC0V/24V	Color release motor: On/Off
	A8	+24V2_FUSE	O	DC24V	DC24V power output
	A9	GND	-	-	Ground
	A10	RLS_SENS	I	DC0V/3.3V	Color release sensor: On/Off
	A11	+5V2	O	DC5V	DC5V power output
	A12	ZIG_MOT_DR_CC W	O	DC0V/24V	Transfer skew motor control signal
	A13	ZIG_MOT_DR_CW	O	DC0V/24V	Transfer skew motor control signal
	A14	GND	-	-	Ground
	A15	BLT_INDEX	-	-	Ground
	A16	+5V2	O	DC5V	DC5V power output
	B1	GND	-	-	Ground
	B2	ZIG_SENS	I	DC0V/3.3V	Transfer skew sensor: On/Off
	B3	+5V2	O	DC5V	DC5V power output
	B4	GND	-	-	Ground
	B5	BLT_SPEED	I	DC0V/3.3V	Transfer belt sensor signal
	B6	+5V2	O	DC5V	DC5V power output
	B7	ZIG_TEMP	I	Analog	Transfer belt thermistor detection voltage
	B8	ZIG_REV	I	Analog	Transfer edge sensor detection voltage
	B9	GND	-	-	Ground
	B10	+5V2	O	DC5V	DC5V power output
	B11	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	B12	EEP_SCL2	O	DC0V/3.3V(pulse)	Communication clock signal
	B13	EEP_SDA2	I/O	DC0V/3.3V(pulse)	Communication data signal
	B14	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	B15	NC	-	-	-
	B16	GND	-	-	Ground
YC24	A1	+5V2	O	DC5V	DC5V power output
	A2	MPF_PPR_SET	I	DC0V/3.3V	MP paper sensor voltage
	A3	POWER_OFF_24V 1	O	DC0V/3.3V	Power off control signal
	A4	DRM_HEAT_REM	O	DC0V/3.3V	Cassette heater control signal
	A5	LOOP_SENS	I	Analog	Loop sensor detection voltage
	A6	REG_SENS	I	DC0V/3.3V	Registration sensor: On/Off
	A7	GND	-	-	Ground
	A8	CURRENT_SIG	I	Analog	AC outlet current detection voltage
	A9	REG_MOT_REM	O	DC0V/3.3V	Registration motor remote signal
	A10	REG_MOT_CLK	O	DC0V/3.3V(pulse)	Registration motor clock signal
	A11	REG_MOT_RDY	I	DC0V/3.3V	Registration motor sync signal
	A12	MID_MOT_REM	O	DC0V/3.3V	Middle conveying motor remote signal
	A13	MID_MOT_CLK	O	DC0V/3.3V(pulse)	Middle conveying motor clock signal
	A14	MID_MOT_RDY	I	DC0V/3.3V	Middle conveying motor sync signal
	A15	GND	-	-	Ground
	A16	FSR_RELAY	O	DC0V/3.3V	Fuser relay drive control signal
	A17	PRESS_REM	O	DC0V/3.3V	Fuser heater drive control signal
	A18	TRANS_MOT_RDY	I	DC0V/3.3V	Transfer motor sync signal
	A19	TRANS_MOT_CLK	O	DC0V/5V(pulse)	Transfer motor clock signal
	A20	TRANS_MOT_REM	O	DC0V/5V	Transfer motor remote signal
	B1	TRANS_MOT_DIR	O	DC0V/5V	Transfer motor rotation direction control signal
	B2	TRANS_MOT_BRK	O	DC0V/5V	Transfer motor brake signal
	B3	ATLAS_INT	I	DC0V/3.3V	Serial communication error interrupt signal
	B4	ATLAS_KSS_SDO( FtoE)	O	DC0V/3.3V(pulse)	Serial communication data signal
	B5	ATLAS_KSS_EN	I	DC0V/3.3V	Serial communication enable signal
	B6	ATLAS_KSS_CS	I	DC0V/3.3V	Serial communication select signal
	B7	ATLAS_KSS_SDO( EtoF)	I	DC0V/3.3V(pulse)	Serial communication data signal
	B8	ATLAS_KSS_CLK	I	DC0V/3.3V(pulse)	Serial communication clock signal
	B9	GND	-	-	Ground
	B10	INTER_LOCK	I	DC0V/3.3V	Interlock detection signal

Connector	Pin	Signal	I/O	Voltage	Description
	B11	DU2_MOT_REM	O	DC0V/3.3V	Duplex motor 2 remote signal
	B12	DU2_MOT_CLK	O	DC0V/3.3V(pulse)	Duplex motor 2 clock signal
	B13	DU2_MOT_PD	O	DC0V/3.3V	Duplex motor 2 current control signal
	B14	REG_SENS_R_S(BK)	I	Analog	Registration sensor 2 S-wave
	B15	REG_SENS_R_P(BK)	I	Analog	Registration sensor 2 P-wave
	B16	REG_R_LED	O	Analog	ID sensor light intensity control signal
	B17	REG_SENS_F_S	I	Analog	Registration sensor 1 S-wave
	B18	REG_SENS_F_P	I	Analog	Registration sensor 1 P-wave
	B19	REG_F_LED	O	Analog	ID sensor light intensity control signal
	B20	GND	-	-	Ground
YC25	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	+3.3V3_FUSE	O	DC3.3V	DC3.3V power output
	4	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	5	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
YC27	1	CAS1_LNG1	I	DC0V/3.3V	Cassette 1 paper length sensor 1
	2	CAS1_LNG2	I	DC0V/3.3V	Cassette 1 paper length sensor 2
	3	GND	-	-	Ground
	4	CAS1_LNG3	I	DC0V/3.3V	Cassette 1 paper length sensor 3
	5	CAS1_WID	I	DC0V/3.3V	Cassette 2 paper width sensor
	6	GND	-	-	Ground
	7	CAS2_LNG1	I	DC0V/3.3V	Cassette 2 paper length sensor 1
	8	CAS2_LNG2	I	DC0V/3.3V	Cassette 2 paper length sensor 2
	9	GND	-	-	Ground
	10	CAS2_LNG3	I	DC0V/3.3V	Cassette 2 paper length sensor 3
	11	CAS2_WID	I	DC0V/3.3V	Cassette 2 paper width sensor
	12	GND	-	-	Ground
YC28	1	+3.3V3_FUSE	O	DC3.3V	DC3.3V power output
	2	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	3	+5V2	O	DC5V	DC5V power output
	4	+24V2_FUSE	O	DC24V	DC24V power output
	5	+24V2_FUSE	O	DC24V	DC24V power output
	6	GND	-	-	Ground
	7	GND	-	-	Ground
	8	GND	-	-	Ground



Connector	Pin	Signal	I/O	Voltage	Description
	9	GND	-	-	Ground
	10	GND	-	-	Ground
	11	CONTSOL_BK_RE M	O	DC0V/3.3V	Container lock signal K
	12	CONTSOL_M_RE M	O	DC0V/3.3V	Container lock signal M
	13	CONTSOL_C_RE M	O	DC0V/3.3V	Container lock signal C
	14	CONTSOL_Y_RE M	O	DC0V/3.3V	Container lock signal Y
	15	RLS_CHK_SOL_O N	O	DC0V/3.3V	Color release check mechanism: Release
	16	RLS_CHK_SOL_O FF	O	DC0V/3.3V	Color release check mechanism: Press
YC29	1	GND	-	-	Ground
	2	VIB_MOT_RE M	O	DC0V/3.3V	Toner vibration motor control signal
	3	WTNR_MOT_C LK	O	DC0V/3.3V(pulse)	Waste toner motor clock signal
	4	WTNR_MOT_L CK	I	DC0V/3.3V(pulse)	Waste toner motor lock detection signal
	5	SB_MOT_RE M	O	DC0V/3.3V	Reversing motor remote signal
	6	SB_MOT_P H	O	DC0V/3.3V	Reversing motor excitation switching signal
	7	SB_MOT_C LK	O	DC0V/3.3V(pulse)	Reversing motor clock signal
	8	GND	-	-	Ground
	9	SB_MOT_P D	O	DC0V/3.3V	Reversing motor current control signal
	10	GND	-	-	Ground
	11	SB_MOT_D IR	O	DC0V/3.3V	Reversing motor rotation direction control signal
	12	IH_CORE_M OT_R EM	O	DC0V/3.3V	IH core motor remote signal
	13	IH_CORE_C LK	O	DC0V/3.3V(pulse)	IH core motor clock signal
	14	IH_CORE_S ENS	I	DC0V/3.3V	IH core sensor: On/Off
	15	IH_COIL_F AN_A LM	I	DC0V/3.3V	IH core fan motor alarm signal
	16	IH_COIL_F AN_H	O	DC0V/3.3V	IH core fan motor (full speed): On/Off
	17	IH_COIL_F AN_L	O	DC0V/3.3V	IH core fan motor (half speed): On/ Off
	18	EXIT_FAN_F RONT	O	DC0V/3.3V	Eject motor cooling fan
	19	JUNC_SOL_R EM	O	DC0V/3.3V	Feedshift solenoid absorption signal
	20	JUNC_SOL_R ET	O	DC0V/3.3V	Feedshift solenoid retention signal
	21	EXIT_PAPER_S ENS	I	DC0V/3.3V	Eject sensor: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	22	EXIT_FEED_SENS	I	DC0V/3.3V	Reversing sensor: On/Off
	23	EX_MOT_REM	O	DC0V/3.3V	Eject motor remote signal
	24	EX_MOT_PH	O	DC0V/3.3V	Eject motor excitation switching signal
	25	EX_MOT_CLK	O	DC0V/3.3V(pulse)	Eject motor clock signal
	26	GND	-	-	Ground
	27	EX_MOT_PD	O	DC0V/3.3V	Eject motor current control signal
	28	GND	-	-	Ground
	29	DEVE_SHUTTER	I	DC3.3V	Developer shutter detection signal
	30	DLP_FAN_CLR_H	O	DC0V/3.3V	Developer fan motor (full speed): On/Off
	31	DLP_FAN_CLR_L	O	DC0V/3.3V	Developer fan motor (half speed): On/Off
	32	GND	-	-	Ground
	33	THOP_MOT_M_DIR	O	DC0V/3.3V	Toner hopper motor rotation direction control signal M
	34	THOP_MOT_Y_DIR	O	DC0V/3.3V	Toner hopper motor rotation direction control signal Y
	35	THOP_MOT_C_DIR	O	DC0V/3.3V	Toner hopper motor rotation direction control signal C
	36	THOP_MOT_BK_DIR	O	DC0V/3.3V	Toner hopper motor rotation direction control signal K
	37	THOP_MOT_Bk_REM	O	DC0V/3.3V	Toner hopper motor remote signal K
	38	THOP_MOT_M_REM	O	DC0V/3.3V	Toner hopper motor remote signal M
	39	THOP_MOT_C_REM	O	DC0V/3.3V	Toner hopper motor remote signal C
	40	THOP_MOT_Y_REM	O	DC0V/3.3V	Toner hopper motor remote signal Y
	41	GND	-	-	Ground
	42	ENCODE_BK	I	DC0V/3.3V(pulse)	Screw sensor K
	43	ENCODE_M	I	DC0V/3.3V(pulse)	Screw sensor M
	44	ENCODE_C	I	DC0V/3.3V(pulse)	Screw sensor C
	45	ENCODE_Y	I	DC0V/3.3V(pulse)	Screw sensor Y
	46	THOP_BK	I	DC0V/3.3V	Toner hopper sensor K
	47	THOP_M	I	DC0V/3.3V	Toner hopper sensor M
	48	THOP_C	I	DC0V/3.3V	Toner hopper sensor C
	49	THOP_Y	I	DC0V/3.3V	Toner hopper sensor Y
	50	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
YC32	1	WTNR_SET	I	DC0V/3.3V	Waste toner box set detection signal
	2	WTNR_VCONT_FULLL	O	Analog	Waste toner box full detection threshold voltage
	3	WTNR_FULLL	I	DC0V/3.3V	Waste toner box full detection signal
	4	WTNR_NEAR	I	DC0V/3.3V	Waste toner box near end detection signal
	5	WTNR_VCONT_NEAR	O	Analog	Waste toner box near end detection threshold voltage
	6	WTNR_LED	I	DC0V/3.3V	Waste toner sensor LED output signal
	7	CLEAN_MOT_LOCK	I	DC0V/3.3V(pulse)	Waste toner motor lock detection signal
	8	CLEAN_MOT_CLK	O	DC0V/3.3V(pulse)	Waste toner motor clock signal
	9	GND	-	-	Ground
	10	I2C_SDA	I/O	DC0V/3.3V(pulse)	Communication data signal
	11	GND	-	-	Ground
	12	I2C_SCL	O	DC0V/3.3V(pulse)	Communication clock signal
	13	GND	-	-	Ground
	14	FRONT_OPEN	I	DC0V/3.3V	Front cover OPEN detection signal
	15	LSU_FAN_REM	O	DC0V/3.3V	LSU fan motor: On/Off
	16	ERS_BK_REM	O	DC0V/3.3V	Cleaning lamp remote signal
	17	TPD_BK	I	Analog	Toner sensor detection voltage K
	18	DLP_VCONT_BK	O	Analog	Toner sensor threshold voltage K
	19	TPD_TEMP_BK	I	Analog	Developer thermistor detection voltage K
	20	GND	-	-	Ground
	21	ERS_M_REM	O	DC0V/3.3V	Cleaning lamp remote signal M
	22	TPD_M	I	Analog	Toner sensor detection voltage M
	23	DLP_VCONT_M	O	Analog	Toner sensor threshold voltage M
	24	TPD_TEMP_M	I	Analog	Developer thermistor detection voltage M
	25	GND	-	-	Ground
	26	ERS_C_REM	O	DC0V/3.3V	Cleaning lamp remote signal C
	27	TPD_C	I	Analog	Toner sensor detection voltage C
	28	DLP_VCONT_C	O	Analog	Toner sensor threshold voltage C
	29	TPD_TEMP_C	I	Analog	Developer thermistor detection voltage C
	30	GND	-	-	Ground
	31	TC_CLK	O	DC0V/3.3V(pulse)	Toner sensor clock signal

Connector	Pin	Signal	I/O	Voltage	Description
	32	GND	-	-	Ground
	33	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	34	GND	-	-	Ground
	35	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	36	GND	-	-	Ground
	37	TPD_Y	I	Analog	Toner sensor detection voltage Y
	38	DLP_VCONT_Y	O	Analog	Toner sensor threshold voltage Y
	39	TPD_TEMP_Y	I	Analog	Developer thermistor detection voltage Y
	40	ERS_Y_REM	O	DC0V/3.3V	Cleaning lamp remote signal Y
YC33	1	DECAL_HP	I	DC0V/3.3V	BR conveying decurler sensor signal
	2	GUIDE_REM	O	DC0V/3.3V	BR conveying guide motor remote signal
	3	GUIDE_CLK	O	DC0V/3.3V(pulse)	BR conveying guide motor clock signal
	4	GUIDE_PD	O	DC0V/3.3V	BR conveying guide motor current switching signal
	5	GUIDE_DIR	O	DC0V/3.3V	BR conveying guide motor rotation direction control signal
	6	DECAL_REM	O	DC0V/3.3V	BR conveying decurler motor remote signal
	7	DECAL_PH	O	DC0V/3.3V	BR conveying decurler motor excitation switching signal
	8	DECAL_CLK	O	DC0V/3.3V(pulse)	BR conveying decurler motor clock signal
	9	DECAL_PD	O	DC0V/3.3V	BR conveying decurler motor current switching signal
	10	DECAL_DIR	O	DC0V/3.3V	BR conveying decurler motor rotation direction control signal
	11	+24V2_FUSE	O	DC24V	DC24V power output
	12	EXIT_SOL_REM	O	DC0V/3.3V	BR feedshift solenoid absorption signal
	13	EXIT_SOL_RET	O	DC0V/3.3V	BR feedshift solenoid retention signal
	14	GND	-	-	Ground
	15	EXIT_COV_OPEN	I	DC0V/3.3V	BR eject cover open detection signal
	16	GND	-	-	Ground
	17	EXIT_SENS	I	DC0V/3.3V	BR eject sensor: On/Off
	18	+5V2	O	DC5V	DC5V power output
	19	+5V2	O	DC5V	DC5V power output
	20	BRIDGE2 REM	O	DC0V/3.3V	BR conveying motor 2 remote signal

Connector	Pin	Signal	I/O	Voltage	Description
	21	BRIDGE2 PH	O	DC0V/3.3V	BR conveying motor excitation switching signal
	22	BRIDGE2 CLK	O	DC0V/3.3V(pulse)	BR conveying motor 2 clock signal
	23	BRIDGE2 PD	O	DC0V/3.3V	BR conveying motor 2 current switching signal
	24	NC	-	-	-
	25	BRIDGE1 REM	O	DC0V/3.3V	BR conveying motor 1 remote signal
	26	BRIDGE1 PH	O	DC0V/3.3V	BR conveying motor 1 excitation switching signal
	27	BRIDGE1 CLK	O	DC0V/3.3V(pulse)	BR conveying motor 1 clock signal
	28	BRIDGE1 PD	O	DC0V/3.3V	BR conveying motor 1 current switching signal
	29	NC	-	-	-
	30	BRIDGE_SENS 2	I	DC0V/3.3V	BR conveying sensor 2: On/Off
	31	BRIDGE_OPEN	I	DC0V/3.3V	BR conveying unit open/close detection signal
	32	BRIDGE_SENS 1	I	DC0V/3.3V	BR conveying sensor 1: On/Off
	33	GND	-	-	Ground
	34	+5V2	O	DC5V	DC5V power output
	35	GND	-	-	Ground
	36	GND	-	-	Ground
	37	+24V2_FUSE	O	DC24V	DC24V power output
	38	+24V2_FUSE	O	DC24V	DC24V power output
YC34	1	B_BK_SLV_AC_CLK	O	DC0V/16V(pulse)	Developer(K)SLV AC clock signal
	2	B_BK_MAG_AC_CLK	O	DC0V/16V(pulse)	Developer(K)MAG AC clock signal
	3	M_Y_I_SENS	I	Analog	Charger current monitor
	4	M_C_I_SENS	I	Analog	Charger current monitor
	5	M_M_I_SENS	I	Analog	Charger current monitor
	6	DISCHARGE	I	Analog	Discharge detection voltage
	7	B_COL_SLV_AC_CLK	O	DC0V/16V(pulse)	Developer SLV(color) AC clock signal
	8	B_COL_MAG_AC_CLK	O	DC0V/16V(pulse)	Developer MAG(color) AC clock signal
	9	B_K_MAG_AC_CNT	O	DC0V/10V(pulse)	Developer(K)MAG AC control signal
	10	B_K_SLV_AC_CNT	O	DC0V/10V(pulse)	Developer(K)SLV AC control signal
	11	M_AC_CLK	O	DC0V/15V(pulse)	Charger AC clock signal
	12	M_K_AC_CNT	O	DC0V/10V(pulse)	Charger(K) AC control signal

Connector	Pin	Signal	I/O	Voltage	Description
	13	M_K_I_SENS	I	Analog	Charger current monitor signal
	14	M_K_DC_CNT	O	DC0V/13V(pulse)	Charger(K) DC control signal
	15	B_K_SLV_DC_CNT	O	DC0V/13V(pulse)	Developer(K)SLV DC control signal
	16	B_K_MAG_DC_CNT	O	DC0V/13V(pulse)	Developer(K)MAG AC control signal
	17	GND	-	-	Ground
YC35	1	HV_REM	O	DC0V/17V	Main high voltage remote signal
	2	M_M_AC_CNT	O	DC0V/10V(pulse)	Charger(M) AC control signal
	3	M_C_AC_CNT	O	DC0V/10V(pulse)	Charger(C) AC control signal
	4	M_Y_AC_CNT	O	DC0V/10V(pulse)	Charger(Y) AC control signal
	5	B_M_SLV_DC_CNT	O	DC0V/13V(pulse)	Developer(M)SLV DC control signal
	6	B_M_SLV_AC_CNT	O	DC0V/10V(pulse)	Developer(M)SLV AC control signal
	7	B_C_SLV_DC_CNT	O	DC0V/13V(pulse)	Developer(C)SLV DC control signal
	8	B_C_SLV_AC_CNT	O	DC0V/10V(pulse)	Developer(C)SLV AC control signal
	9	B_C_MAG_AC_CNT	O	DC0V/10V(pulse)	Developer(C)MAG AC control signal
	10	B_Y_SLV_DC_CNT	O	DC0V/13V(pulse)	Developer(Y)SLV DC control signal
	11	B_Y_SLV_AC_CNT	O	DC0V/10V(pulse)	Developer(Y)SLV AC control signal
	12	B_Y_MAG_AC_CNT	O	DC0V/10V(pulse)	Developer(Y)MAG AC control signal
	13	B_M_MAG_AC_CNT	O	DC0V/10V(pulse)	Developer(M)MAG AC control signal
	14	M_C_DC_CNT	O	DC0V/13V(pulse)	Charger(C) DC control signal
	15	M_Y_DC_CNT	O	DC0V/13V(pulse)	Charger(Y) DC control signal
	16	M_M_DC_CNT	O	DC0V/13V(pulse)	Charger(M) DC control signal
	17	B_C_MAG_DC_CNT	O	DC0V/13V(pulse)	Developer(C)MAG DC control signal
	18	B_M_MAG_DC_CNT	O	DC0V/13V(pulse)	Developer(M)MAG DC control signal
	19	B_Y_MAG_DC_CNT	O	DC0V/13V(pulse)	Developer(Y)MAG DC control signal
	20	GND	-	-	Ground
YC36	1	CL_CNT	O	Analog	Cleaning control voltage signal
	2	T1_Y_I_SENS	I	Analog	Primary transfer current monitor Y detection voltage
	3	T1_Y_CNT	O	Analog	Primary transfer(Y) control voltage signal
	4	T1_C_I_SENS	I	Analog	Primary transfer current monitor C detection voltage

Connector	Pin	Signal	I/O	Voltage	Description
	5	T1_C_CNT	O	Analog	Primary transfer(C) control voltage signal
	6	T1_M_I_SENS	I	Analog	Primary transfer current monitor M detection voltage
	7	T1_M_CNT	O	Analog	Primary transfer(M) control voltage signal
	8	T1_K_I_SENS	I	Analog	Primary transfer current monitor K detection voltage
	9	T1_K_CNT	O	Analog	Primary transfer(K) control voltage signal
	10	SP_CNT	O	Analog	Separation control voltage signal
	11	T2_OFF_REM	O	DC0V/14V	Secondary transfer OFF remote signal
	12	T2_CNT	O	Analog	Secondary transfer control voltage signal
	13	T_REM	O	DC0V/14V	Transfer high voltage remote signal
	14	GND	-	-	Ground
YC37	1	+24V2_FUSE	O	DC24V	DC24V power output
	2	SGND	-	-	Ground
	3	SGND	-	-	Ground
	4	MCV_ENBL	I	DC0V/3.3V	Coin vendor copy enabling signal
	5	FGND	-	-	Ground
	6	MCV_FED_COUNT	O	DC0V/3.3V	Coin vendor control signal
	7	MCV_EJ_COUNT	O	DC0V/3.3V	Coin vendor control signal
	8	MCV_COPY_SIG	O	DC0V/3.3V	Coin vendor control signal
	9	MCV_UART_TXD	O	DC0V/3.3V(pulse)	Communication data signal
	10	SGND	-	-	Ground
	11	MCV_UART_RXD	I	DC0V/3.3V(pulse)	Communication data signal
	12	SGND	-	-	Ground
YC38	1	GND	-	-	Ground
	2	DC1_SET	I	DC0V/3.3V	Key counter set signal
	3	DC1_COUNT	O	DC0V/3.3V	Key counter count signal
	4	+24V2_FUSE	O	DC24V	DC24V power output
YC39	A1	+5V2	O	DC5V	DC5V power output
	A2	+5V2	O	DC5V	DC5V power output
	A3	+5V2	O	DC5V	DC5V power output
	A4	+5V2	O	DC5V	DC5V power output
	A5	+5V2	O	DC5V	DC5V power output
	A6	+5V2	O	DC5V	DC5V power output

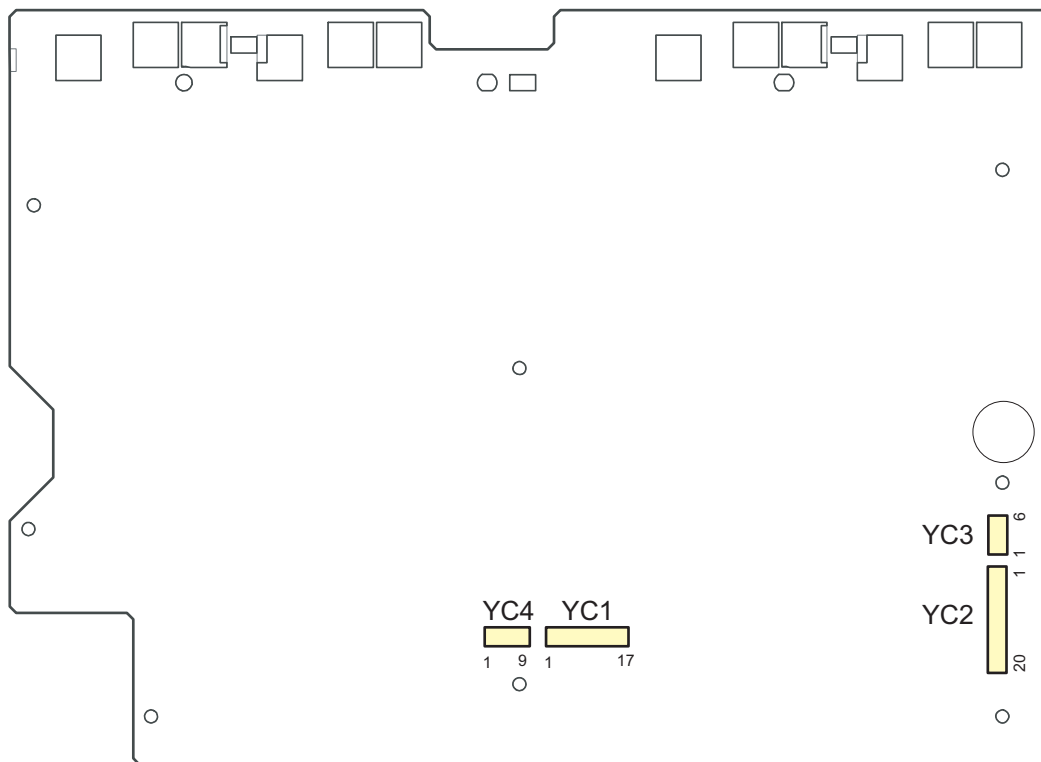
Connector	Pin	Signal	I/O	Voltage	Description
	A7	+5V2	O	DC5V	DC5V power output
	A8	+5V2	O	DC5V	DC5V power output
	A9	MK2_ENBL	I	DC0V/3.3V	Enable signal
	A10	+24V2_FUSE	O	DC24V	DC24V power output
	B1	MK2_RKEY7	O	DC0V/3.3V	Control signal
	B2	MK2_RKEY6	O	DC0V/3.3V	Control signal
	B3	MK2_RKEY5	O	DC0V/3.3V	Control signal
	B4	MK2_RKEY4	O	DC0V/3.3V	Control signal
	B5	MK2_RKEY3	O	DC0V/3.3V	Control signal
	B6	MK2_RKEY2	O	DC0V/3.3V	Control signal
	B7	MK2_RKEY1	O	DC0V/3.3V	Control signal
	B8	MK2_RKEY0	O	DC0V/3.3V	Control signal
	B9	GND	-	-	Ground
	B10	MK2_COUNT	O	DC0V/3.3V	Count signal
YC40	1	LVU_FAN2_REM	O	DC0V/24V	Power source fan motor 2: On/Off
	2	GND	-	-	Ground
	3	LVU_FAN2_ALM	I	DC0V/3.3V	Power source fan motor 2 alarm signal
	4	GND	-	-	Ground
	5	SUB_AC_SLEEP	O	DC0V/3.3V	Sub power supply power off signal
	6	GND	-	-	Ground
	7	+24V?_SUB	O	DC24V	DC24V power output
YC41	1	GND	-	-	Ground
	2	+5V0	O	DC5V	DC5V power output
	3	GND	-	-	Ground
	4	GND	-	-	Ground
	5	+24V2	O	DC24V	DC24V power output
	6	+24V2	O	DC24V	DC24V power output
YC42	1	B_Y_SLV_COR_CNT	O	Analog	Developer(Y)SLV correction circuit control voltage signal
	2	B_Y_SLV_COR_REM	O	DC0V/8V	Developer(Y)SLV correction circuit remote signal
	3	B_C_SLV_COR_CNT	O	Analog	Developer(C)SLV correction circuit control voltage signal
	4	B_C_SLV_COR_REM	O	DC0V/8V	Developer(C)SLV correction circuit remote signal
	5	B_M_SLV_COR_CNT	O	Analog	Developer(M)SLV correction circuit control voltage signal



Connector	Pin	Signal	I/O	Voltage	Description
	6	B_M_SLV_COR_REM	O	DC0V/8V	Developer(M)SLV correction circuit remote signal
	7	B_K_SLV_COR_CNT	O	Analog	Developer(K)SLV correction circuit control voltage signal
	8	B_K_SLV_COR_REM	O	DC0V/8V	Developer(K)SLV correction circuit remote signal
	9	GND	-	-	Ground
YC43	1	HVU_FAN_ALM	-	-	FAN alarm signal
	2	GND	-	-	Ground
	3	HVU_FAN_REM	-	-	FAN remote signal
YC44	1	NC	-	-	-
	2	GND	-	-	Ground
	3	FSR_OFFSET_CNT	O	Analog	Fuser offset control voltage signal

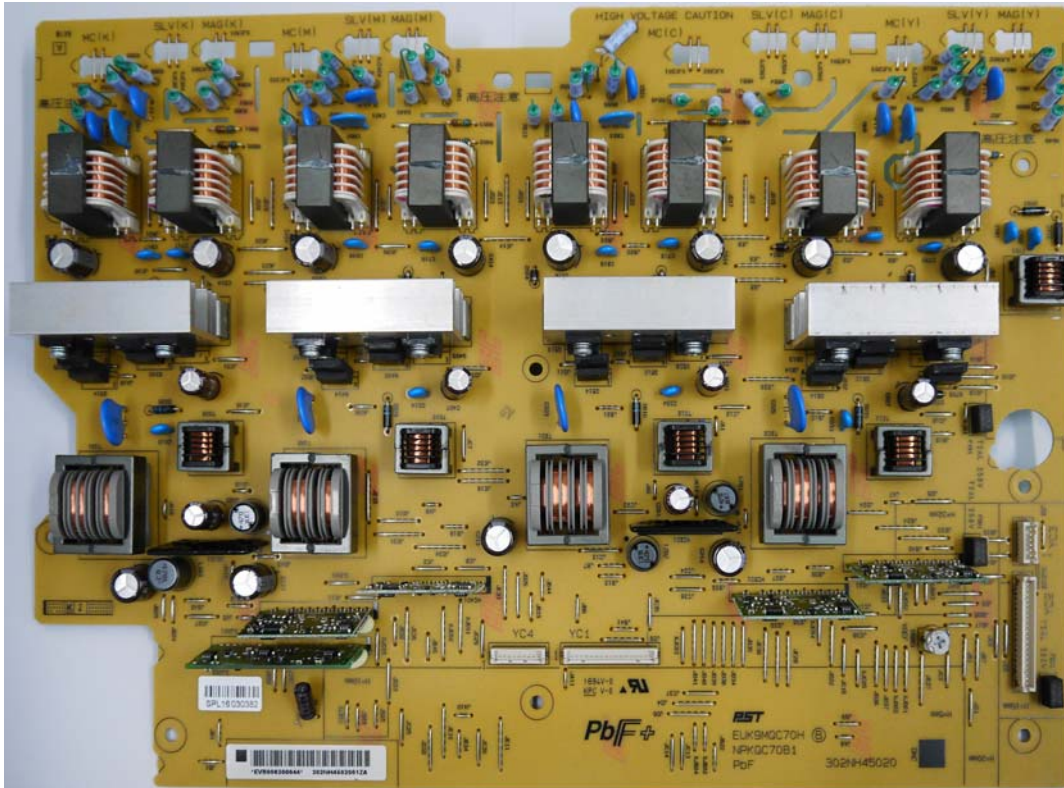
### (3)Main high-voltage PWB

#### Connector position



Connector	Destination
YC1	Engine PWB
YC2	Engine PWB
YC3	Motor relay PWB
YC4	Engine PWB

## PWB photograph



## Connector table

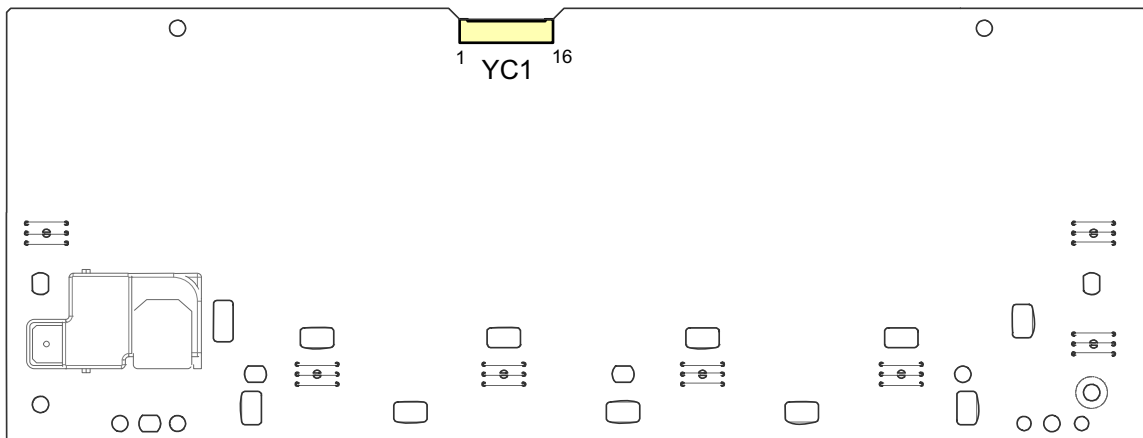
Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	GND	-	-	Ground
	2	B_K_MAG_DC_CN T	I	DC0V/13V(pulse)	DC magnet roller bias control voltage K
	3	B_K_SLV_DC_CNT	I	DC0V/13V(pulse)	DC sleeve bias control voltage K
	4	M_K_DC_CNT	I	DC0V/13V(pulse)	DC charger control voltage K
	5	M_K_I_SENS	O	Analog	Discharge detection voltage K
	6	M_K_AC_CNT	I	DC0V/10V(pulse)	AC charger control voltage K
	7	M_AC_CLK	I	DC0V/15V(pulse)	AC charger clock signal
	8	B_K_SLV_AC_CNT	I	DC0V/10V(pulse)	AC sleeve bias control voltage K
	9	B_K_MAG_AC_CN T	I	DC0V/10V(pulse)	AC Magnet roller bias control voltage K
	10	B_COL_MAG_AC_ CLK	I	DC0V/16V(pulse)	AC magnet roller bias clock signal(YCM)
	11	B_COL_SLV_AC_ CLK	I	DC0V/16V(pulse)	AC sleeve bias clock signal(YCM)
	12	DISCHARGE	O	Analog	Discharge detection voltage
	13	M_M_I_SENS	O	Analog	Charger current detection M
	14	M_C_I_SENS	O	Analog	Charger current detection C
	15	M_Y_I_SENS	O	Analog	Charger current detection Y

Connector	Pin	Signal	I/O	Voltage	Description
	16	B_BK_MAG_AC_CLK	I	DC0V/16V(pulse)	Magnet roller AC clock signal K
	17	B_BK_SLV_AC_CLK	I	DC0V/16V(pulse)	Sleeve AC clock signal K
YC2	1	GND	-	-	Ground
	2	B_Y_MAG_DC_CNT	I	DC0V/13V(pulse)	DC magnet roller bias control voltage Y
	3	B_M_MAG_DC_CNT	I	DC0V/13V(pulse)	DC magnet roller bias control voltage M
	4	B_C_MAG_DC_CNT	I	DC0V/13V(pulse)	DC magnet roller bias control voltage C
	5	M_M_DC_CNT	I	DC0V/13V(pulse)	DC charger control voltage M
	6	M_Y_DC_CNT	I	DC0V/13V(pulse)	DC charger control voltage Y
	7	M_C_DC_CNT	I	DC0V/13V(pulse)	DC charger control voltage C
	8	B_M_MAG_AC_CNT	I	DC0V/10V(pulse)	AC magnet roller bias control voltage M
	9	B_Y_MAG_AC_CNT	I	DC0V/10V(pulse)	AC magnet roller bias control voltage Y
	10	B_Y_SLV_AC_CNT	I	DC0V/10V(pulse)	AC sleeve bias control voltage Y
	11	B_Y_SLV_DC_CNT	I	DC0V/13V(pulse)	DC sleeve bias control voltage Y
	12	B_C_MAG_AC_CNT	I	DC0V/10V(pulse)	AC magnet roller bias control voltage C
	13	B_C_SLV_AC_CNT	I	DC0V/10V(pulse)	AC sleeve bias control voltage C
	14	B_C_SLV_DC_CNT	I	DC0V/13V(pulse)	DC sleeve bias control voltage C
	15	B_M_SLV_AC_CNT	I	DC0V/10V(pulse)	AC sleeve bias control voltage M
	16	B_M_SLV_DC_CNT	I	DC0V/13V(pulse)	DC sleeve bias control voltage M
	17	M_Y_AC_CNT	I	DC0V/10V(pulse)	AC charger control voltage Y
	18	M_C_AC_CNT	I	DC0V/10V(pulse)	AC charger control voltage C
	19	M_M_AC_CNT	I	DC0V/10V(pulse)	AC charger control voltage M
	20	HV_REM	I	DC0V/17V	High voltage remote signal
YC3	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	+24V3_FUSE	I	DC24V	DC24V power input
	5	+24V3_FUSE	I	DC24V	DC24V power input
	6	+24V3_FUSE	I	DC24V	DC24V power input
YC4	1	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	2	B_K_SLV_COR_REM	I	DC0V/8V	Developer(K)SLV correction circuit remote signal
	3	B_K_SLV_COR_CNT	I	Analog	Developer(K)SLV correction circuit control voltage signal
	4	B_M_SLV_COR_REM	I	DC0V/8V	Developer(M)SLV correction circuit remote signal
	5	B_M_SLV_COR_CNT	I	Analog	Developer(M)SLV correction circuit control voltage signal
	6	B_C_SLV_COR_REM	I	DC0V/8V	Developer(C)SLV correction circuit remote signal
	7	B_C_SLV_COR_CNT	I	Analog	Developer(C)SLV correction circuit control voltage signal
	8	B_Y_SLV_COR_REM	I	DC0V/8V	Developer(Y)SLV correction circuit remote signal
	9	B_Y_SLV_COR_CNT	I	Analog	Developer(Y)SLV correction circuit control voltage signal

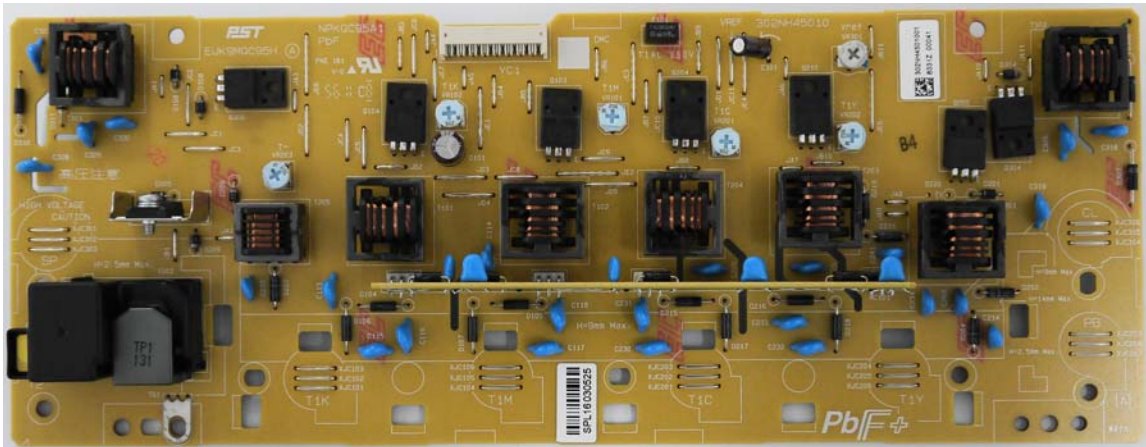
**(4)Transfer high-voltage PWB**

**Connector position**



Connector	Destination
YC1	Engine OWB, Feed PWB

## PWB photograph

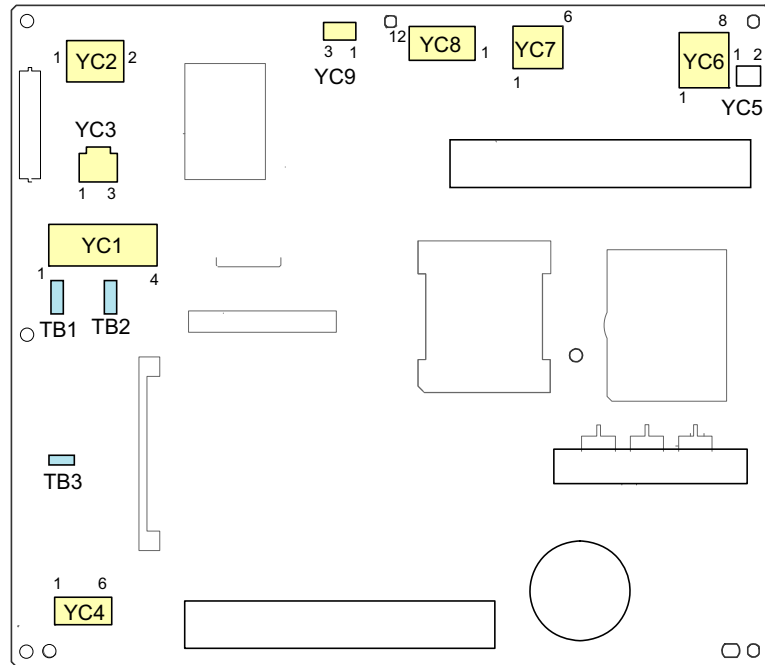


## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	GND	-	-	Ground
	2	T_REM	I	DC0V/14V	Transfer high voltage remote signal
	3	T2_CNT	I	Analog	Secondary transfer control voltage signal
	4	T2_OFF_REM	I	DC0V/14V	Secondary transfer OFF remote signal
	5	SP_CNT	I	Analog	Separation control voltage signal
	6	T1_K_CNT	I	Analog	Primary transfer K control voltage signal
	7	T1_K_I_SENS	O	Analog	Primary transfer current monitor K detection voltage
	8	T1_M_CNT	I	Analog	Primary transfer M control voltage signal
	9	T1_M_I_SENS	O	Analog	Primary transfer current monitor M detection voltage
	10	T1_C_CNT	I	Analog	Primary transfer C control voltage signal
	11	T1_C_I_SENS	O	Analog	Primary transfer current monitor C detection voltage
	12	T1_Y_CNT	I	Analog	Primary transfer Y control voltage signal
	13	T1_Y_I_SENS	O	Analog	Primary transfer current monitor Y detection voltage
	14	CL_CNT	I	Analog	Cleaning control voltage signal
	15	+24V2_IL	O	DC24V	DC24V power output
	16	GND	-	-	Ground

**(5)Power source PWB**

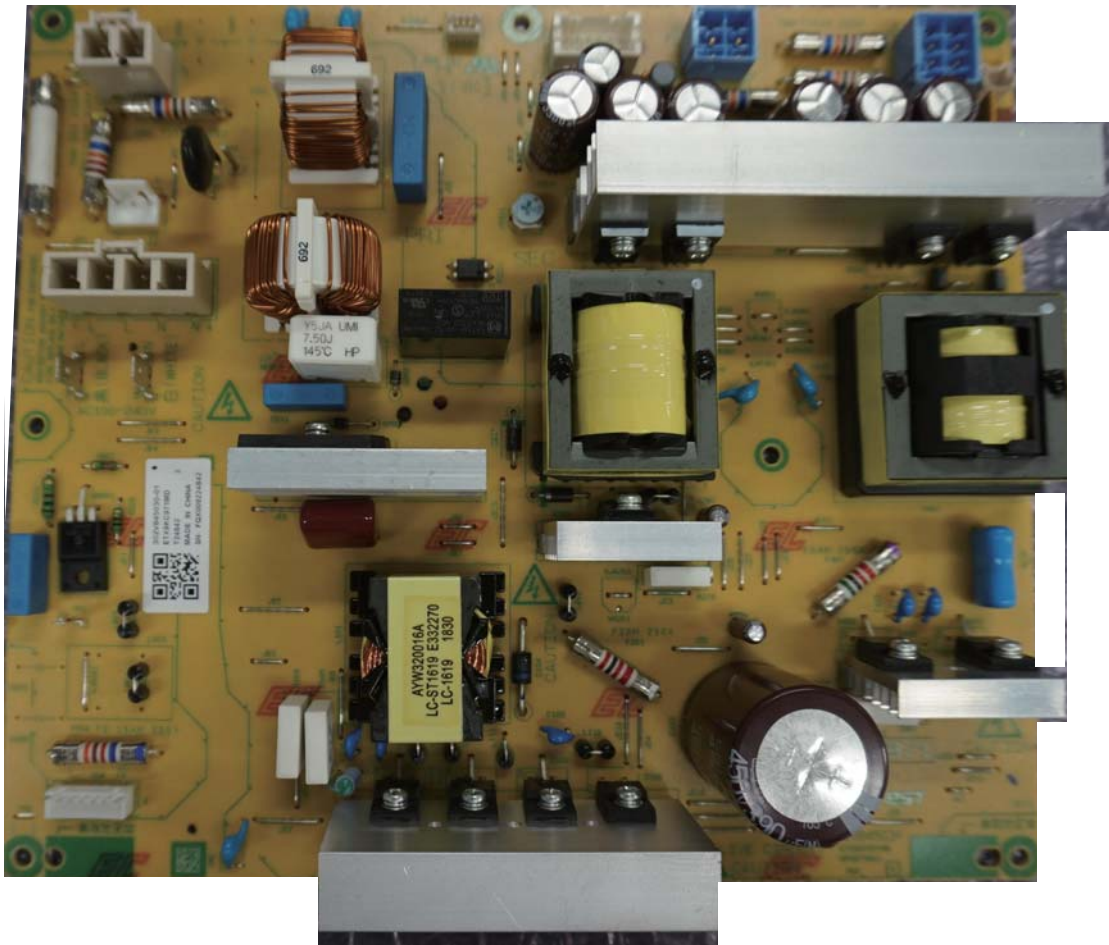
**Connector position**



Connector	Destination
TB1	Inlet
TB2	Inlet
TB3	Main power switch
YC1	Main power switch
YC2	IH PWB (except 100V model)
YC3	PF power source PWB
YC4	Cassette heater, PF cassette heater
YC6	Engine PWB
YC7	Feed PWB
YC8	Main PWB, Engine PWB
YC9	Feed PWB

## PWB photograph

(100V/120V/220-240V)



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
TB1	1	LIVE	I	AC100V 120V AC 220-240V AC	AC power input*
TB2	1	NEUTRAL	I	AC100V 120V AC 220-240V AC	AC power input*
TB3	1	DH_LIVE	I	AC100V 120V AC 220-240V AC	AC power input*
YC1	1	LIVE_IN	I	AC100V 120V AC 220-240V AC	AC power input*
	2	LIVE_OUT	O	AC100V 120V AC 220-240V AC	AC power output*
	3	NEUTRAL_IN	I	AC100V 120V AC 220-240V AC	AC power input*
	4	NEUTRAL_OUT	O	AC100V 120V AC 220-240V AC	AC power output*
YC2	1	LIVE	O	AC100V 120V AC 220-240V AC	AC power output*
	2	NEUTRAL	O	AC100V 120V AC 220-240V AC	AC power output*
YC3	1	LIVE	O	AC100V 120V AC 220-240V AC	AC power output**?
	2	NEUTRAL	O	AC100V 120V AC 220-240V AC	AC power output**?
YC4	1	DH_LIVE	O	AC100V 120V AC	AC power output*



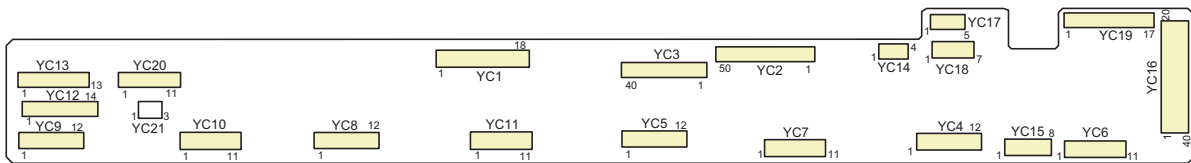
Connector	Pin	Signal	I/O	Voltage	Description
	2	DH_LIVE	O	220-240V AC AC100V 120V AC 220-240V AC	AC power output*
	3	NC	-	-	Not used
	4	NC	-	-	Not used
	5	NEUTRAL	O	AC100V 120V AC 220-240V AC	AC power output
	6	NEUTRAL	O	AC100V 120V AC 220-240V AC	AC power output*
YC6	1	+24V2	O	DC24V	DC24V power output
	2	+24V2	O	DC24V	DC24V power output
	3	+24V3	O	DC24V	DC24V power output
	4	+24V3	O	DC24V	DC24V power output
	5	GND	-	-	Ground
	6	GND	-	-	Ground
	7	GND	-	-	Ground
	8	GND	-	-	Ground
YC7	1	+24V4	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	+24V4	O	DC24V	DC24V power output
	5	+24V4	O	DC24V	DC24V power output
	6	GND	-	-	Ground
YC8	1	GND	-	-	Ground
	2	+5V0	O	DC5V	DC5V power output
	3	GND	-	-	Ground
	4	+5V0	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	+5V0	O	DC5V	DC5V power output
	7	GND	-	-	Ground
	8	+5V0	O	DC5V	DC5V power output
	9	GND	-	-	Ground
	10	+5V0	O	DC5V	DC5V power output

Connector	Pin	Signal	I/O	Voltage	Description
	11	GND	-	-	Ground
	12	+5V0	O	DC5V	DC5V power output
YC9	1	POWER_OFF	I	DC0V/3.3V	Sleep signal
	2	DRM HEATER REM	O	DC0V/3.3V	Drum heater: On/Off
	3	GND	-	-	Ground
	4	AC DETECTOR	-	-	Not used

\*The voltage value depends on the destination

## (6)Front PWB

### Connector position



Connector	Destination
YC1	Engine PWB
YC2	Engine PWB
YC3	Engine PWB
YC4	Toner sensor K, Vibration motor K
YC5	Toner sensor M, Vibration motor M
YC6	Drum PWB K, Cleaning lamp K
YC7	Drum PWB M, Cleaning lamp M
YC8	Toner sensor C, Vibration motor C
YC9	Toner sensor Y, Vibration motor Y
YC10	Drum PWB Y, Cleaning lamp Y
YC11	Drum PWB C, Cleaning lamp C
YC12	LSU fan motor K, LSU fan motor M, LSU fan motor C, LSU fan motor Y, Waste toner collection motor
YC13	Waste toner detection switch, Front cover switch, Waste toner sensor 1, Waste toner sensor 2
YC14	Outer temperature/humidity sensor
YC15	Waste toner motor, Developer shutter sensor
YC16	Retainer PWB, Screw sensor K, Screw sensor M, Screw sensor C, Screw sensor Y, Toner hopper sensor K, Toner hopper sensor M, Toner hopper sensor C, Toner hopper sensor Y

Connector	Destination
YC17	IH core fan motor, Front eject fan motor
YC18	IH core sensor, IH core motor
YC19	Reversing motor, Eject motor, Reversing sensor, Eject sensor, Feedshift solenoid
YC20	Container solenoid K, Container solenoid M, Container solenoid C, Container solenoid Y, Release solenoid

### PWB photograph



### Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	ICL_WTNR_FAN_A LM	-	-	Not used
	2	ICL_WTNR_FAN_R EM	-	-	Not used
	3	RLS_CHK_SOL_O FF	I	DC3.3V	Color release check mechanism: Press
	4	RLS_CHK_SOL_O N	I	DC3.3V	Color release check mechanism: Release
	5	CONTSOL_Y_REM	I	DC3.3V	Container lock signal Y
	6	CONTSOL_C_REM	I	DC3.3V	Container lock signal C
	7	CONTSOL_M_RE M	I	DC3.3V	Container lock signal M
	8	CONTSOL_BK_RE M	I	DC3.3V	Container lock signal K
	9	GND	-	-	Ground
	10	GND	-	-	Ground
	11	GND	-	-	Ground
	12	GND	-	-	Ground
	13	GND	-	-	Ground
	14	+24V2_FUSE	I	DC24V	DC24V power input
	15	+24V2_FUSE	I	DC24V	DC24V power input
	16	+5V2	I	DC5V	DC5V power input
	17	+3.3V2_FUSE	I	DC3.3V	DC3.3V power input
	18	+3.3V3_FUSE	I	DC3.3V	DC3.3V power input

Connector	Pin	Signal	I/O	Voltage	Description
YC2	1	GND	-	-	Ground
	2	VIB_MOT_REM	I	DC3.3V	Toner vibration motor control signal
	3	WTNR_MOT_CLK	I	DC0V/3.3V(pulse)	Waste toner motor clock signal
	4	WTNR_MOT_LOCK	O	DC0V/3.3V(pulse)	Waste toner motor lock detection signal
	5	SB_MOT_REM	I	DC0V/3.3V	Reversing motor remote signal
	6	SB_MOT_PH	I	DC0V/3.3V	Reversing motor excitation switching signal
	7	SB_MOT_CLK	I	DC0V/3.3V(pulse)	Reversing motor clock signal
	8	GND	-	-	Ground
	9	SB_MOT_PD	I	DC0V/3.3V	Reversing motor current control signal
	10	GND	-	-	Ground
	11	SB_MOT_DIR	I	DC0V/3.3V	Reversing motor rotation direction control signal
	12	IH_CORE_MOT_REM	I	DC0V/3.3V	IH core motor remote signal
	13	IH_CORE_CLK	I	DC0V/3.3V(pulse)	IH core motor clock signal
	14	IH_CORE_SENS	O	DC0V/3.3V	IH core sensor: On/Off
	15	IH_COIL_FAN_ALARM	O	DC0V/3.3V	IH core fan motor alarm signal
	16	IH_COIL_FAN_H	I	DC0V/3.3V	IH core fan motor (full speed): On/Off
	17	IH_COIL_FAN_L	I	DC0V/3.3V	IH core fan motor (half speed): On/Off
	18	EXIT_FAN	I	DC0V/3.3V	Front eject fan motor
	19	JUNC_SOL_REM	I	DC0V/3.3V	Feedshift solenoid absorption signal
	20	JUNC_SOL_RET	I	DC0V/3.3V	Feedshift solenoid retention signal
	21	EXIT_PAPER_SENS	O	DC0V/3.3V	Eject sensor: On/Off
	22	EXIT_FEED_SENS	O	DC0V/3.3V	Reversing sensor: On/Off
	23	EX_MOT_REM	I	DC0V/3.3V	Eject motor remote signal
	24	EX_MOT_PH	I	DC0V/3.3V	Eject motor excitation switching signal
	25	EX_MOT_CLK	I	DC0V/3.3V(pulse)	Eject motor clock signal
	26	GND	-	-	Ground
	27	EX_MOT_PD	I	DC0V/3.3V	Eject motor current control signal
	28	GND	-	-	Ground
	29	DEVE_SHUTTER	O	DC3.3V	Developer shutter detection signal
	30	DLP_FAN_CLR_H	I	DC0V/3.3V	Developer fan motor (full speed): On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	31	DLP_FAN_CLR_L	I	DC0V/3.3V	Developer fan motor (half speed): On/Off
	32	GND	-	-	Ground
	33	THOP_MOT_M_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal M
	34	THOP_MOT_Y_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal Y
	35	THOP_MOT_C_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal C
	36	THOP_MOT_BK_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal K
	37	THOP_MOT_Bk_REMOTE	I	DC0V/3.3V	Toner hopper motor remote signal K
	38	THOP_MOT_M_REMOTE	I	DC0V/3.3V	Toner hopper motor remote signal M
	39	THOP_MOT_C_REMOTE	I	DC0V/3.3V	Toner hopper motor remote signal C
	40	THOP_MOT_Y_REMOTE	I	DC0V/3.3V	Toner hopper motor remote signal Y
	41	GND	-	-	Ground
	42	ENCODE_BK	O	DC0V/3.3V(pulse)	Screw sensor K
	43	ENCODE_M	O	DC0V/3.3V(pulse)	Screw sensor M
	44	ENCODE_C	O	DC0V/3.3V(pulse)	Screw sensor C
	45	ENCODE_Y	O	DC0V/3.3V(pulse)	Screw sensor Y
	46	THOP_BK	O	DC0V/3.3V	Toner hopper sensor K
	47	THOP_M	O	DC0V/3.3V	Toner hopper sensor M
	48	THOP_C	O	DC0V/3.3V	Toner hopper sensor C
	49	THOP_Y	O	DC0V/3.3V	Toner hopper sensor Y
	50	GND	-	-	Ground
YC3	1	WTNR_SET	O	DC3.3V	Waste toner box set detection signal
	2	WTNR_VCONT_FULL	I	Analog	Waste toner box full detection threshold voltage
	3	WTNR_FULL	O	DC3.3V	Waste toner box full detection signal
	4	WTNR_NEAR	O	DC3.3V	Waste toner box near end detection signal
	5	WTNR_VCONT_NEAR	I	Analog	Waste toner box near end detection threshold voltage
	6	WTNR_LED	O	DC3.3V	Waste toner sensor LED output signal
	7	CLEAN_MOT_LOCK	O	DC0V/3.3V(pulse)	Waste toner collection motor lock detection signal

Connector	Pin	Signal	I/O	Voltage	Description
	8	CLEAN_MOT_CLK	I	DC0V/3.3V(pulse)	Waste toner collection motor clock signal
	9	GND	-	-	Ground
	10	I2C_SDA	I/O	DC0V/3.3V(pulse)	Communication data signal
	11	GND	-	-	Ground
	12	I2C_SCL	I	DC0V/3.3V(pulse)	Communication clock signal
	13	GND	-	-	Ground
	14	FRONT_OPEN	O	DC3.3V	Front cover OPEN detection signal
	15	LSU_FAN_REM	I	DC0V/3.3V	LSU fan motor: On/Off
	16	ERS_BK_REM	I	DC3.3V	Cleaning lamp remote signal K
	17	TPD_BK_1	O	Analog	Toner sensor detection voltage K
	18	DLP_VCONT_BK_1	I	Analog	Toner sensor threshold voltage K
	19	TPD_TEMP_BK	O	Analog	Developer thermistor detection voltage K
	20	GND	-	-	Ground
	21	ERS_M_REM	I	DC3.3V	Cleaning lamp remote signal M
	22	TPD_M_1	O	Analog	Toner sensor detection voltage M
	23	DLP_VCONT_M_1	I	Analog	Toner sensor threshold voltage M
	24	TPD_TEMP_M	O	Analog	Developer thermistor detection voltage M
	25	GND	-	-	Ground
	26	ERS_C_REM	I	DC3.3V	Cleaning lamp remote signal C
	27	TPD_C_1	O	Analog	Toner sensor detection voltage C
	28	DLP_VCONT_C_1	I	Analog	Toner sensor threshold voltage C
	29	TPD_TEMP_C	O	Analog	Developer thermistor detection voltage C
	30	GND	-	-	Ground
	31	TC_CLK	I	DC0V/3.3V(pulse)	Toner sensor clock signal
	32	GND	-	-	Ground
	33	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	34	GND	-	-	Ground
	35	EEP_SCL1	I	DC0V/3.3V(pulse)	Communication clock signal
	36	GND	-	-	Ground
	37	TPD_Y_1	O	Analog	Toner sensor detection voltage Y
	38	DLP_VCONT_Y_1	I	Analog	Toner sensor threshold voltage Y
	39	TPD_TEMP_Y	O	Analog	Developer thermistor detection voltage Y

Connector	Pin	Signal	I/O	Voltage	Description
	40	ERS_Y_REM	I	DC3.3V	Cleaning lamp remote signal Y
YC4	1	TPD_TEMP_BK	I	Analog	Developer thermistor detection voltage K
	2	DLP_VCONT_BK_1	O	Analog	Toner sensor threshold voltage K
	3	TPD_BK_1	I	Analog	Toner sensor detection voltage K
	4	TN_CLK_BK	O	DC0V/3.3V	Toner sensor clock signal K
	5	GND	-	-	Ground
	6	DLP_ADR1_BK	O	DC0V/3.3V	Toner sensor setting signal K
	7	DLP_ADR0_BK	O	DC0V/3.3V	Toner sensor setting signal K
	8	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	9	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	10	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	11	+3V (for vibration motor)	O	DC3.3V	DC3.3V power output
	12	VIB_MOT	O	DC0V/3V	Vibration motor drive signal K
YC5	1	TPD_TEMP_M	I	Analog	Developer thermistor detection voltage M
	2	DLP_VCONT_M_1	O	Analog	Toner sensor threshold voltage M
	3	TPD_M_1	I	Analog	Toner sensor detection voltage M
	4	TN_CLK_M	O	DC0V/3.3V	Toner sensor clock signal M
	5	GND	-	-	Ground
	6	DLP_ADR1_M	O	DC0V/3.3V	Toner sensor setting signal M
	7	DLP_ADR0_M	O	DC0V/3.3V	Toner sensor setting signal M
	8	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	9	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	10	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	11	+3V (for vibration motor)	O	DC3.3V	DC3.3V power output
	12	VIB_MOT	O	DC0V/3V	Vibration motor drive signal M
YC6	1	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	2	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	3	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	4	GND	-	-	Ground
	5	DRM_ADR0_Bk	O	DC0V/3.3V	Drum PWB K setting
	6	DRM_ADR1_Bk	O	DC0V/3.3V	Drum PWB K setting
	7	+24V2_FUSE	O	DC24V	DC24V power output
	8	ERS_BK_REM1	O	DC0V/24V	Cleaning lamp drive output K

Connector	Pin	Signal	I/O	Voltage	Description
	9	ERS_BK_REM2	O	DC0V/24V	Cleaning lamp drive output K
	10	ERS_BK_REM3	O	DC0V/24V	Cleaning lamp drive output K
	11	NC	-	-	Not used
YC7	1	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	2	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	3	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	4	GND	-	-	Ground
	5	DRM_ADR0_M	O	DC0V/3.3V	Drum PWB M setting
	6	DRM_ADR1_M	O	DC0V/3.3V	Drum PWB M setting
	7	+24V2_FUSE	O	DC24V	DC24V power output
	8	ERS_M_REM1	O	DC0V/24V	Cleaning lamp drive output M
	9	ERS_M_REM2	O	DC0V/24V	Cleaning lamp drive output M
	10	ERS_M_REM3	O	DC0V/24V	Cleaning lamp drive output M
	11	NC	-	-	Not used
YC8	1	TPD_TEMP_C	I	Analog	Developer thermistor detection voltage C
	2	DLP_VCONT_C_1	O	Analog	Toner sensor threshold voltage C
	3	TPD_C_1	I	Analog	Toner sensor detection voltage C
	4	TN_CLK_C	O	DC0V/3.3V	Toner sensor clock signal C
	5	GND	-	-	Ground
	6	DLP_ADR1_C	O	DC0V/3.3V	Toner sensor setting signal C
	7	DLP_ADR0_C	O	DC0V/3.3V	Toner sensor setting signal C
	8	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	9	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	10	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	11	+3V (for vibration motor)	O	DC3.3V	DC3.3V power output
	12	VIB_MOT	O	DC0V/3V	Vibration motor drive signal C
YC9	1	TPD_TEMP_Y	I	Analog	Developer thermistor detection voltage Y
	2	DLP_VCONT_Y_1	O	Analog	Toner sensor threshold voltage Y
	3	TPD_Y_1	I	Analog	Toner sensor detection voltage Y
	4	TN_CLK_Y	O	DC0V/3.3V	Toner sensor clock signal Y
	5	GND	-	-	Ground
	6	DLP_ADR1_Y	O	DC0V/3.3V	Toner sensor setting signal Y
	7	DLP_ADR0_Y	O	DC0V/3.3V	Toner sensor setting signal Y
	8	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal



Connector	Pin	Signal	I/O	Voltage	Description
	9	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	10	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	11	+3V (for vibration motor)	O	DC3.3V	DC3.3V power output
	12	VIB_MOT	O	DC0V/3V	Vibration motor drive signal Y
YC10	1	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	2	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	3	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	4	GND	-	-	Ground
	5	DRM_ADR0_Y	O	DC0V/3.3V	Drum PWB Y setting
	6	DRM_ADR1_Y	O	DC0V/3.3V	Drum PWB Y setting
	7	+24V2_FUSE	O	DC24V	DC24V power output
	8	ERS_Y_REM1	O	DC0V/24V	Cleaning lamp drive output Y
	9	ERS_Y_REM2	O	DC0V/24V	Cleaning lamp drive output Y
	10	ERS_Y_REM3	O	DC0V/24V	Cleaning lamp drive output Y
	11	NC	-	-	Not used
YC11	1	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	2	EEP_SCL1	O	DC0V/3.3V(pulse)	Communication clock signal
	3	EEP_SDA1	I/O	DC0V/3.3V(pulse)	Communication data signal
	4	GND	-	-	Ground
	5	DRM_ADR0_C	O	DC0V/3.3V	Drum PWB C setting
	6	DRM_ADR1_C	O	DC0V/3.3V	Drum PWB C setting
	7	+24V2_FUSE	O	DC24V	DC24V power output
	8	ERS_C_REM1	O	DC0V/24V	Cleaning lamp drive output C
	9	ERS_C_REM2	O	DC0V/24V	Cleaning lamp drive output C
YC11	10	ERS_C_REM3	O	DC0V/24V	Cleaning lamp drive output C
	11	NC	-	-	Not used
YC12	1	LSU_FAN_REM1	O	DC0V/24V	LSU fan motor drive signal K
	2	+24V2_FUSE	O	DC24V	DC24V power output
	3	LSU_FAN_REM1	O	DC0V/24V	LSU fan motor drive signal M
	4	+24V2_FUSE	O	DC24V	DC24V power output
	5	LSU_FAN_REM1	O	DC0V/24V	LSU fan motor drive signal C
	6	+24V2_FUSE	O	DC24V	DC24V power output
	7	LSU_FAN_REM1	O	DC0V/24V	LSU fan motor drive signal Y
	8	+24V2_FUSE	O	DC24V	DC24V power output
	9	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	10	+24V2_FUSE	O	DC24V	DC24V power output
	11	CLN_MOT_FG	I	DC0V/3.3V	Waste toner collection motor lock detection signal
	12	CLN_MOT_CLK	O	DC0V/3.3V	Waste toner collection motor clock signal
	13	CLN_MOT_DIR	O	DC0V/3.3V	Waste toner collection motor rotation direction control signal
	14	NC	-	-	Not used
YC13	1	NC	-	-	Not used
	2	FRONT_OPEN	I	DC0V/3.3V	Front cover OPEN detection signal
	3	GND	-	-	Ground
	4	GND	-	-	Ground
	5	WTNR_SET	I	DC0V/3.3V	Waste toner box set detection signal
	6	+5V2	O	DC5V	DC5V power output
	7	WTNR_FULL	I	DC0V/3.3V	Waste toner box full detection signal
	8	WTNR_LED	O	DC0V/3.3V	Waste toner sensor LED output signal
	9	5V_LED	O	DC5V	DC5V power output
	10	+5V2	O	DC5V	DC5V power output
	11	WTNR_NEAR	I	DC0V/3.3V	Waste toner box near end detection signal
	12	WTNR_LED	O	DC0V/3.3V	Waste toner sensor LED output signal
	13	5V_LED	O	DC5V	DC5V power output
YC14	1	+3.3V3_FUSE	O	DC3.3V	DC3.3V power output
	2	I2C_SDA	I/O	DC0V/3.3V(pulse)	Communication data signal
	3	GND	-	-	Ground
	4	I2C_SCL	O	DC0V/3.3V(pulse)	Communication clock signal
YC15	1	GND	-	-	Ground
	2	+24V2_FUSE	O	DC24V	DC24V power output
	3	WTNR_MOT_FG	I	DC0V/3.3V	Waste toner motor lock detection signal
	4	WTNR_MOT_CLK	O	DC0V/3.3V	Waste toner motor drive signal
	5	WTNR_MOT_DIR	O	DC0V/3.3V	Waste toner motor rotation direction control signal
	6	GND	-	-	Ground
	7	DEVE_SHUTTER	I	DC0V/3.3V	Developer shutter detection signal
	8	+5V2	O	DC5V	DC5V power output
YC16	1	+24V2_FUSE	O	DC24V	DC24V power output

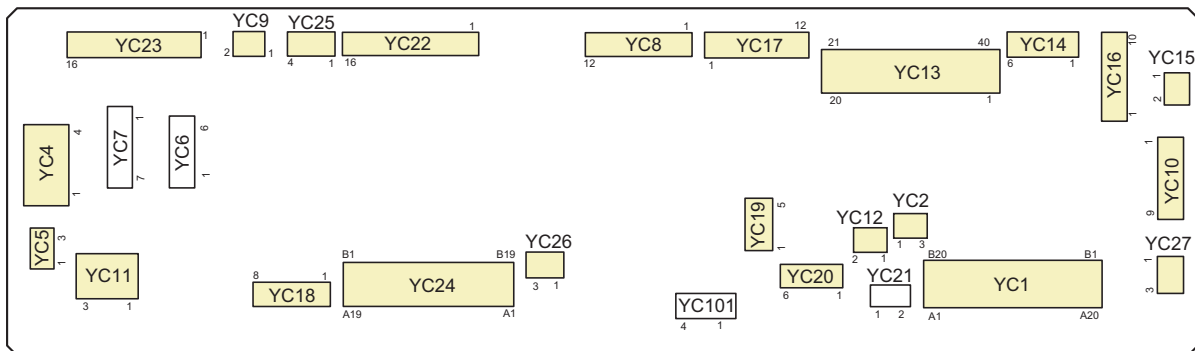
Connector	Pin	Signal	I/O	Voltage	Description
	2	DLP_FAN_BK	O	DC0V/24V	Developer fan motor: On/Off
	3	+24V2_FUSE	O	DC24V	DC24V power output
	4	DLP_FAN_M	O	DC0V/24V	Developer fan motor: On/Off
	5	THOP_MOT_BK_D IR	O	DC0V/3.3V	Toner hopper motor rotation direction control signal K
	6	GND	-	-	Ground
	7	GND	-	-	Ground
	8	GND	-	-	Ground
	9	GND	-	-	Ground
	10	ENCODE_BK	I	DC0V/3.3V	Screw sensor K
	11	+5V2	O	DC5V	DC5V power output
	12	GND	-	-	Ground
	13	ENCODE_M	I	DC0V/3.3V	Screw sensor M
	14	+5V2	O	DC5V	DC5V power output
	15	GND	-	-	Ground
	16	THOP_BK	I	DC0V/3.3V	Toner hopper sensor K
	17	+5V2	O	DC5V	DC5V power output
	18	GND	-	-	Ground
	19	THOP_M	I	DC0V/3.3V	Toner hopper sensor M
	20	+5V2	O	DC5V	DC5V power output
	21	GND	-	-	Ground
	22	THOP_Y	I	DC0V/3.3V	Toner hopper sensor Y
	23	+5V2	O	DC5V	DC5V power output
	24	GND	-	-	Ground
	25	THOP_C	I	DC0V/3.3V	Toner hopper sensor C
	26	+5V2	O	DC5V	DC5V power output
	27	GND	-	-	Ground
	28	ENCODE_Y	I	DC0V/3.3V	Screw sensor C
	29	+5V2	O	DC5V	DC5V power output
	30	GND	-	-	Ground
	31	ENCODE_C	I	DC0V/3.3V	Screw sensor Y
	32	+5V2	O	DC5V	DC5V power output
	33	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	34	THOP_MOT_Y_RE M	O	DC0V/3.3V	Toner hopper motor remote signal K
	35	THOP_MOT_C_RE M	O	DC0V/3.3V	Toner hopper motor remote signal M

Connector	Pin	Signal	I/O	Voltage	Description
	36	THOP_MOT_M_RE M	O	DC0V/3.3V	Toner hopper motor remote signal C
	37	THOP_MOT_BK_R EM	O	DC0V/3.3V	Toner hopper motor remote signal Y
	38	THOP_MOT_M_DI R	O	DC0V/3.3V	Toner hopper motor rotation direction control signal M
	39	THOP_MOT_Y_DI R	O	DC0V/3.3V	Toner hopper motor rotation direction control signal Y
	40	THOP_MOT_C_DI R	O	DC0V/3.3V	Toner hopper motor rotation direction control signal C
YC17	1	IH_COIL_FAN_AL M	I	DC0V/3.3V	IH core fan motor alarm signal
	2	GND	-	-	Ground
	3	IH_COIL_FAN	O	DC0V/24V	IH core fan motor drive signal
	4	+24V2_FUSE	O	DC24V	DC24V power output
	5	EXIT FAN	O	DC0V/24V	Eject fan motor drive signal
	1	GND	-	-	Ground
	2	IH_CORE_SENS	I	DC0V/3.3V	IH core sensor: On/Off
	3	+5V2	O	DC5V	DC5V power output
	4	IH_CORE B/ /	O	DC0V/24V	IH core motor drive signal
	5	IH_CORE B	O	DC0V/24V	IH core motor drive signal
	6	IH_CORE A	O	DC0V/24V	IH core motor drive signal
	7	IH_CORE A/ /	O	DC0V/24V	IH core motor drive signal
YC19	1	SB_MOT_B/ /	O	DC0V/24V	Reversing motor drive signal
	2	SB_MOT_A/ /	O	DC0V/24V	Reversing motor drive signal
	3	SB_MOT_B	O	DC0V/24V	Reversing motor drive signal
	4	SB_MOT_A	O	DC0V/24V	Reversing motor drive signal
	5	EX_MOT_B/ /	O	DC0V/24V	Eject motor drive signal
	6	EX_MOT_A/ /	O	DC0V/24V	Eject motor drive signal
	7	EX_MOT_B	O	DC0V/24V	Eject motor drive signal
	8	EX_MOT_A	O	DC0V/24V	Eject motor drive signal
	9	GND	-	-	Ground
	10	EXIT_FEED_SENS	I	DC0V/3.3V	Reversing sensor: On/Off
	11	+5V2	O	DC5V	DC5V power output
	12	GND	-	-	Ground
	13	EXIT_PAPER_SEN S	I	DC0V/3.3V	Eject sensor: On/Off
	14	+5V2	O	DC5V	DC5V power output
	15	+24V2_FUSE	O	DC24V	DC24V power output

Connector	Pin	Signal	I/O	Voltage	Description
	16	JUNC_SOL_REM0	O	DC0V/24V	Feedshift solenoid absorption drive signal
	17	JUNC_SOL_RET1	O	DC0V/24V	Feedshift solenoid retention drive signal
YC20	1	+24V2_FUSE	O	DC24V	DC24V power output
	2	CONTSOL_BK_REM	O	DC0V/24V	Container lock signal K
	3	+24V2_FUSE	O	DC24V	DC24V power output
	4	CONTSOL_M_REM	O	DC0V/24V	Container lock signal M
	5	+24V2_FUSE	O	DC24V	DC24V power output
	6	CONTSOL_C_REM	O	DC0V/24V	Container lock signal C
	7	+24V2_FUSE	O	DC24V	DC24V power output
	8	CONTSOL_Y_REM	O	DC0V/24V	Container lock signal Y
	9	RLS_CHK_SOL_ON	O	DC0V/24V	Color release check mechanism: Release drive
	10	RLS_CHK_SOL_OFF	O	DC0V/24V	Color release check mechanism: Press drive
	11	+24V2_FUSE	O	DC24V	DC24V power output

**(7)Feed PWB**

**Connector position**



Connector	Destination
YC1	Engine PWB
YC2	Engine PWB
YC4	Power supply PWB
YC5	Power supply PWB
YC8	ID sensor front, ID sensor rear, Cleaning solenoid
YC9	IH fan motor

Connector	Destination
YC10	Transfer motor
YC11	Conveying unit switch
YC12	Transfer high voltage PWB
YC13	Relay PWB
YC14	Fuser motor
YC15	Rear eject fan motor
YC16	JS main PWB
YC17	Relay PWB
YC18	Registration motor
YC19	Engine PWB
YC20	IH PWB
YC22	Paper feed motor, Vertical conveying motor
YC23	Lift motor 1, Lift motor 2, Upper paper gauge sensor 1, Lower paper gauge sensor 1, Upper paper gauge sensor 2, Lower paper gauge sensor 2
YC24	Conveying sensor, Conveying cover open/close switch, Middle sensor, Registration sensor, Middle conveying motor, Paper sensor 1, Paper sensor 2, Lift sensor 1, Lift sensor 2, Paper feed sensor 1, Paper feed sensor 2
YC25	Paper feed 1, Paper feed clutch 2
YC26	Current PWB (100V/120V)
YC27	Fuser high-voltage PWB

### PWB photograph



### Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	A1	TRANS_MOT_REM	I	DC0V/5V	Transfer motor remote signal
	A2	TRANS_MOT_CLK	I	DC0V/5V(pulse)	Transfer motor clock signal
	A3	TRANS_MOT_RDY	O	DC0V/3.3V	Transfer motor sync signal

Connector	Pin	Signal	I/O	Voltage	Description
	A4	PRESS_REM	I	DC3.3V	Press heater drive control signal
	A5	FSR_RELAY	I	DC3.3V	Fuser relay drive control signal
	A6	GND	-	-	Ground
	A7	MID_MOT_RDY	O	DC0V/3.3V	Middle conveying motor sync signal
	A8	MID_MOT_CLK	I	DC0V/3.3V(pulse)	Middle conveying motor clock signal
	A9	MID_MOT_REM	I	DC0V/3.3V	Middle conveying motor remote signal
	A10	REG_MOT_RDY	O	DC0V/3.3V	Registration motor sync signal
	A11	REG_MOT_CLK	I	DC0V/3.3V(pulse)	Registration motor clock signal
	A12	REG_MOT_REM	I	DC0V/3.3V	Registration motor remote signal
	A13	CURRENT_SIG	O	Analog	AC outlet current detection voltage
	A14	GND	-	-	Ground
	A15	REG_SENS	O	DC0V/3.3V	Registration sensor: On/Off
	A16	LOOP_SENS	O	Analog	Loop sensor detection voltage
	A17	DRM_HEAT_REM	I	DC3.3V	Cassette heater control signal
	A18	POWER_OFF_24V 1	I	DC3.3V	Power off control signal
	A19	MPF_PPR_SET	O	DC3.3V	MPF paper set detection voltage
	A20	+5V2	I	DC5V	DC5V power input
	B1	GND	-	-	Ground
	B2	REG_F_LED	I	Analog	ID sensor light intensity control signal
	B3	REG_SENS_F_P	O	Analog	Registration sensor 1 P-wave
	B4	REG_SENS_F_S	O	Analog	Registration sensor 1 S-wave
	B5	REG_R_LED	I	Analog	ID sensor light intensity control signal
	B6	REG_SENS_R_P(B K)	O	Analog	Registration sensor 2 P-wave
	B7	REG_SENS_R_S(B K)	O	Analog	Registration sensor 2 S-wave
	B8	DU2_MOT_PD	I	DC0V/3.3V	Duplex motor 2 current control signal
	B9	DU2_MOT_CLK	I	DC0V/3.3V(pulse)	Duplex motor 2 clock signal
	B10	DU2_MOT_REM	I	DC0V/3.3V	Duplex motor 2 remote signal
	B11	INTER_LOCK	O	DC3.3V	Interlock detection signal
	B12	GND	-	-	Ground
	B13	ATLAS_KSS_CLK	O	DC0V/3.3V(pulse)	Serial communication clock signal
	B14	ATLAS_KSS_SDI(E toF)	O	DC0V/3.3V(pulse)	Serial communication data signal
	B15	ATLAS_KSS_CS	O	DC0V/3.3V	Serial communication select signal
	B16	ATLAS_KSS_EN	O	DC0V/3.3V	Serial communication enable signal

Connector	Pin	Signal	I/O	Voltage	Description
	B17	ATLAS_KSS_SDO(FtoE)	I	DC0V/3.3V(pulse)	Serial communication data signal
	B18	ATLAS_INT	O	DC0V/3.3V	Serial communication error interrupt signal
	B19	TRANS_MOT_BRK	I	DC0V/5V	Transfer motor brake signal
	B20	TRANS_MOT_DIR	I	DC0V/5V	Transfer motor rotation direction control signal
YC2	1	FSR_OFFSET_CN T	I	Analog	Fuser offset control voltage signal
	2	GND	-	-	Ground
	3	NC	-	-	-
YC4	1	+24V4	I	DC24V	DC24V power input
	2	+24V4	I	DC24V	DC24V power input
	3	GND	-	-	Ground
	4	GND	-	-	Ground
YC5	1	GND	-	-	Ground
	2	DRUM_HEAT_REM	O	DC0V/3.3V	Cassette heater control signal
	3	POWER_OFF_24V 1	O	DC0V/3.3V	24V2 OFF signal
YC8	1	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	2	REG_F_LED	O	Analog	ID sensor front LED signal
	3	GND	-	-	Ground
	4	REG_SENS_F_P	I	Analog	ID sensor front P-wave signal
	5	REG_SENS_F_S	I	Analog	ID sensor front S-wave signal
	6	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	7	REG_R_LED	O	Analog	ID sensor rear LED signal
	8	GND	-	-	Ground
	9	REG_SENS_R_P	I	Analog	ID sensor rear P-wave signal
	10	REG_SENS_R_S	I	Analog	ID sensor rear S-wave signal
	11	+24V2_FUSE	O	DC24V	DC24V power output
	12	ID_CLN_SOL_REM	O	DC0V/24V	ID cleaning solenoid remote
YC9	1	IH_PWB_FAN	O	DC0V/24V	IH fan motor remote
	2	+24V2_FUSE	O	DC24V	DC24V power output
YC10	1	TRANS_MOT_BRK	O	DC0V/5V	Transfer motor brake signal
	2	TRANS_MOT_DIR	O	DC0V/5V	Transfer motor rotation direction control signal
	3	TRANS_MOT_RDY	I	DC0V/3.3V	Transfer motor sync signal
	4	TRANS_MOT_CLK	O	DC0V/5V	Transfer motor clock signal



Connector	Pin	Signal	I/O	Voltage	Description
	5	TRANS_MOT_REM	O	DC0V/5V	Transfer motor remote signal
	6	GND	-	-	Ground
	7	+24V2_IL	O	DC24V	DC24V power output
	8	GND	-	-	Ground
	9	+24V2_IL	O	DC24V	DC24V power output
YC11	1	+24V2_IL	O	DC24V	DC24V power output
	2	N.C	-	-	N.C.
	3	+24V2	O	DC24V	DC24V power output
YC12	1	GND	-	-	Ground
	2	+24V2_IL	O	DC24V	DC24V power output
YC13	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	ID_CLN_SOL_REM	O	DC0V/24V	Cleaning solenoid remote
	4	NC	-	DC24V	DC24V power
	5	MPF_LIFT_MOT_B	O	DC0V/24V	MP lift motor remote B
	6	MPF_LIFT_MOT_A	O	DC0V/24V	MP lift motor remote A
	7	+24V2_FUSE	O	DC24V	DC24V power output
	8	MPF_CL_REM	O	DC0V/24V	MP paper feed clutch remote
	9	MPF_JAM_SENS	I	DC0V/3.3V	MP paper feed sensor
	10	MPF_LIFT_DOWN_SENS	I	DC0V/3.3V	MP lower lift sensor
	11	MPF_LIFT_UP_SENS	I	DC0V/3.3V	MP upper lift sensor
	12	MPF_PPR_SET	I	DC0V/3.3V	MP paper sensor
	13	LED_3.3V3	-	DC0V/3.3V	3.3V3 power for PI
	14	MPF_LNG	I	DC0V/3.3V	MP paper length sensor
	15	MPF_WID3	I	DC0V/3.3V	MP paper width sensor
	16	MPF_WID2	I	DC0V/3.3V	MP paper width sensor
	17	MPF_WID1	I	DC0V/3.3V	MP paper width sensor
	18	MPF_TABLE	I	DC0V/3.3V	MP tray switch
	19	GND	-	-	Ground
	20	GND	-	-	Ground
	21	REG_BK_LED	O	Analog	ID sensor LED signal
	22	REG_BK_SENS_P	I	Analog	ID sensor P-wave signal
	23	REG_BK_SENS_S	I	Analog	ID sensor S-wave signal
	24	NC	-	-	N.C.
	25	DU_SENS	I	DC0V/3.3V	DU sensor

Connector	Pin	Signal	I/O	Voltage	Description
	26	PRESS_RLS_SEN S	I	DC0V/3.3V	Transfer roller release sensor
	27	+5V2	O	DC5V	DC5V power output
	28	PRESS_RLS_MOT 1	O	DC0V/24V	Transfer roller release motor remote 1
	29	PRESS_RLS_MOT 2	O	DC0V/24V	Transfer roller release motor remote 2
	30	+24V2_FUSE	O	DC24V	DC24V power output
	31	LOOP_ID_FAN	-	-	-
	32	NC	-	-	N.C.
	33	DU_OPEN_SW	I	DC0V/3.3V	DU cover open switch
	34	DU2_B/	O	DC0V/24V	Duplex motor 2 drive signal
	35	DU2_A/	O	DC0V/24V	Duplex motor 2 drive signal
	36	DU2_B	O	DC0V/24V	Duplex motor 2 drive signal
	37	DU2_A	O	DC0V/24V	Duplex motor 2 drive signal
	38	GND	-	-	Ground
	39	NC	-	-	N.C.
	40	NC	-	-	N.C.
YC14	1	FSR_MOT_DIR	O	DC0V/5V	Fuser motor rotation direction signal
	2	FSR_MOT_RDY	I	DC0V/3.3V	Fuser motor ready
	3	FSR_MOT_CLK	O	DC0V/5V	Fuser motor clock
	4	FSR_MOT_REM	O	DC0V/5V	Fuser motor remote
	5	GND	-	-	Ground
	6	+24V2_FUSE	O	DC24V	DC24V power output
YC15	1	EXIT_REAR_FAN	O	DC0V/24V	Rear eject fan motor remote
	2	+24V2_FUSE	O	DC24V	DC24V power output
YC16	1	JOB_SET	I	DC0V/3.3V	JS set signal
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	JOB_MOT_REM	O	DC0V/3.3V	JS eject motor remote
	5	+24V2_FUSE	O	DC24V	DC24V power output
	6	JOB_MOT_CLK	O	DC0V/3.3V	JS eject motor clock
	7	+5V2	O	DC5V	DC5V power output
	8	JOB_MOT_DIR	O	DC0V/3.3V	JS eject motor rotation direction signal
	9	JOB_OPEN_SENS	I	DC0V/3.3V	JS open/close detection sensor
	10	JOB_SOL_REM	O	DC0V/3.3V	JS feedshift solenoid remote
YC17	1	DU_ENTER_SENS	I	DC0V/3.3V	Duplex sensor 1

Connector	Pin	Signal	I/O	Voltage	Description
	2	EXIT_FAN	O	DC0V/24V	Eject fan motor 1 remote
	3	+24V2_FUSE	O	DC24V	DC3.3V power output
	4	NC	-	-	N.C.
	5	GND	-	-	Ground
	6	DU1_B/	O	DC0V/24V	DU motor 1 drive signal
	7	DU1_A/	O	DC0V/24V	DU motor 1 drive signal
	8	DU1_B	O	DC0V/24V	DU motor 1 drive signal
	9	DU1_A	O	DC0V/24V	DU motor 1 drive signal
	10	COV_EDGE_FAN	O	DC0V/3.3V	Eject fan motor 2 remote
	11	LOOP_SENS	I	DC0V/3.3V	Loop sensor detection voltage
	12	NC	-	DC3.3V	DC3.3V power
YC18	1	REG_CH_A	I	DC0V/3.3V	Encoder output
	2	REG_CH_B	I	DC0V/3.3V	Encoder output
	3	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	4	REG_DIR	O	DC0V/3.3V	Registration motor rotation direction signal
	5	REG_PWM	O	DC0V/3.3V	Registration motor PWM signal
	6	REG_BRAKE	O	DC0V/3.3V	Registration motor brake signal
	7	GND	-	-	Ground
	8	+24V2_IL	O	DC24V	DC24V power output
YC19	1	+3.3V2_FUSE	I	DC3.3V	DC3.3V power input
	2	+3.3V2_FUSE	I	DC3.3V	DC3.3V power input
	3	+3.3V3_FUSE	I	DC3.3V	DC3.3V power input
	4	GND	-	-	Ground
	5	GND	-	-	Ground
YC20	1	PRESS_REM	O	DC0V/3.3V	Press heater remote signal
	2	+24V2_IL	O	DC24V	DC24V power output
	3	GND	-	-	Ground
	4	FSR_RELAY	O	DC0V/3.3V	Fuser relay drive control signal
	5	+24V2_FUSE	O	DC24V	DC24V power output
	6	RELAY_24V	O	DC0V/3.3V	24V power for the electric strength test
YC22	1	FEED_CH_A	I	DC0V/3.3V	Encoder output
	2	FEED_CH_B	I	DC0V/3.3V	Encoder output
	3	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	4	FEED_DIR	O	DC0V/3.3V	Paper feed motor rotation direction signal

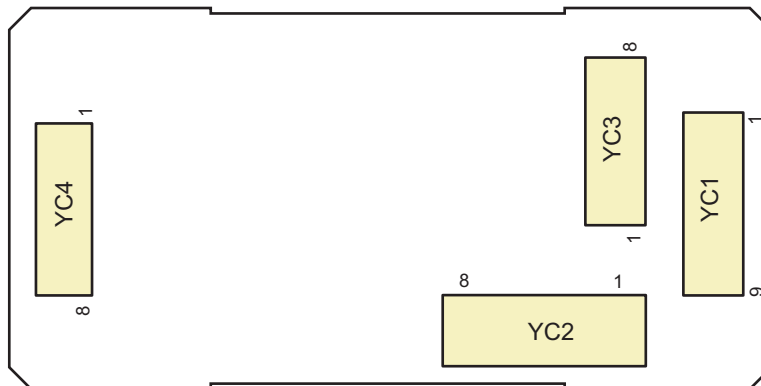
Connector	Pin	Signal	I/O	Voltage	Description
	5	FEED_PWM	O	DC0V/3.3V	Paper feed motor PWM signal
	6	FEED_BRAKE	O	DC0V/3.3V	Paper feed motor brake signal
	7	GND	-	-	Ground
	8	+24V2_FUSE	O	DC24V	DC24V power output
	9	V_FEED_CH_A	I	DC0V/3.3V	Encoder output
	10	V_FEED_CH_B	I	DC0V/3.3V	Encoder output
	11	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	12	V_FEED_DIR	O	DC0V/3.3V	Vertical conveying motor rotation direction signal
	13	V_FEED_PWM	O	DC0V/3.3V	Vertical conveying motor PWM signal
	14	V_FEED_BRAKE	O	DC0V/3.3V	Vertical conveying motor brake signal
	15	GND	-	-	Ground
	16	+24V2_FUSE	O	DC24V	DC24V power output
YC23	1	LIFT_MOT1_-	O	DC0V/24V	Lift motor 1 drive signal
	2	LIFT_MOT1_+	O	DC0V/24V	Lift motor 1 drive signal
	3	LIFT_MOT2_-	O	DC0V/24V	Lift motor 2 drive signal
	4	LIFT_MOT2_+	O	DC0V/24V	Lift motor 2 drive signal
	5	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	6	GND	-	-	Ground
	7	CAS1_QUANT1	I	DC0V/3.3V	Upper paper gauge sensor 1
	8	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	9	GND	-	-	Ground
	10	CAS1_QUANT2	I	DC0V/3.3V	Lower paper gauge sensor 1
	11	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	12	GND	-	-	Ground
	13	CAS2_QUANT1	I	DC0V/3.3V	Upper paper gauge sensor 2
	14	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	15	GND	-	-	Ground
	16	CAS2_QUANT2	I	DC0V/3.3V	Lower paper gauge sensor 2
YC24	A1	+5V2	O	DC5V	DC5V power output
	A2	FEED2_SENS	I	DC0V/3.3V	Conveying sensor
	A3	GND	-	-	Ground
	A4	FEED_COVER_OPEN	I	DC0V/3.3V	Conveying cover open/close switch
	A5	GND	-	-	Ground
	A6	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	A7	FEED1_SENS	I	DC0V/3.3V	Middle sensor
	A8	+5V2	O	DC5V	DC5V power output
	A9	GND	-	-	Ground
	A10	REG_SENS	I	DC0V/3.3V	Registration sensor signal
	A11	+5V2	O	DC5V	DC5V power output
	A12	MID_CH_A	I	DC0V/3.3V	Encoder output
	A13	MID_CH_B	I	DC0V/3.3V	Encoder output
	A14	+3.3V2_FUSE	O	DC3.3V	DC3.3V power output
	A15	MID_DIR	O	DC0V/3.3V	Middle conveying motor rotation direction signal
	A16	MID_PWM	O	DC0V/3.3V	Middle conveying motor PWM signal
	A17	MID_BRAKE	O	DC0V/3.3V	Middle conveying motor brake signal
	A18	GND	-	-	Ground
	A19	+24V2_IL	O	DC24V	DC24V power output
	B1	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	B2	GND	-	-	Ground
	B3	CAS1_EMPTY_SENS	I	DC0V/3.3V	Paper sensor 1
	B4	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	B5	GND	-	-	Ground
	B6	CAS1_LIFT_UP_SENS	I	DC0V/3.3V	Lift sensor 1
	B7	+5V2	O	DC5V	DC5V power output
	B8	CAS1_P0_SENS	I	DC0V/3.3V	Paper feed sensor 1
	B9	GND	-	-	Ground
	B10	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	B11	GND	-	-	Ground
	B12	CAS2_EMPTY_SENS	I	DC0V/3.3V	Paper sensor 2
	B13	LED_3.3V	-	DC0V/3.3V	3.3V2 power for PI
	B14	GND	-	-	Ground
	B15	CAS2_LIFT_UP_SENS	I	DC0V/3.3V	Lift sensor 2
	B16	+5V2	O	DC5V	DC5V power output
	B17	CAS2_P0_SENS	I	DC0V/3.3V	Paper feed sensor 2
	B18	GND	-	-	Ground
	B19	NC	-	-	N.C.
YC25	1	FEED_CL1_REM	O	DC0V/24V	Paper feed clutch 1 remote

Connector	Pin	Signal	I/O	Voltage	Description
	2	+24V2_FUSE	O	DC24V	DC24V power output
	3	FEED_CL2_REM	O	DC0V/24V	Paper feed clutch 2 remote
	4	+24V2_FUSE	O	DC24V	DC24V power output
YC26	1	CURRENT_SIG	O	DC0V/3.3V	AC outlet current detection voltage
	2	GND	-	-	Ground
	3	+5V2	O	DC5V	DC5V power output
YC27	1	GND	-	-	Ground
	2	+24V2_IL	O	DC24V	DC24V power output
	3	FSR_OFFSET_CN T	O	DC0V/3.3V	Fuser offset control voltage signal

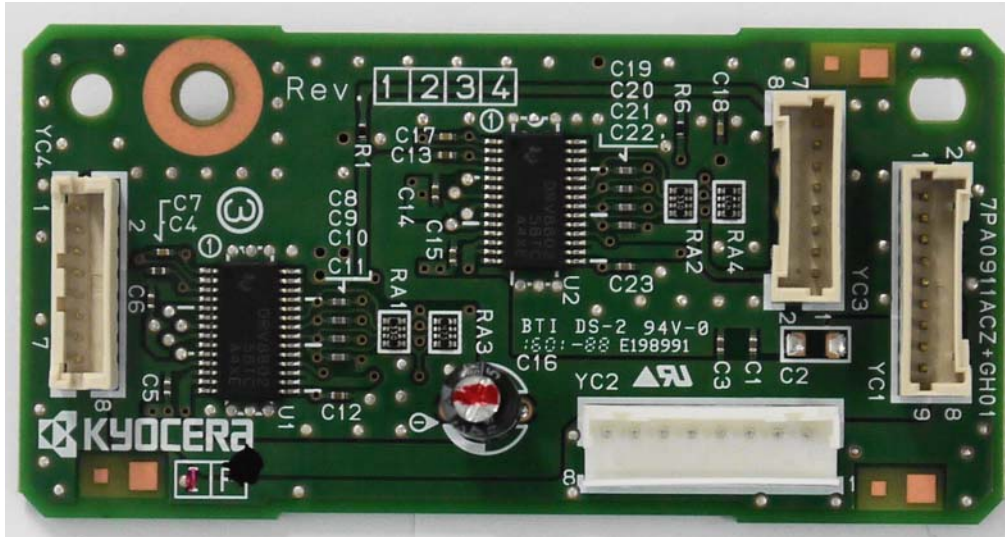
**(8) Retainer PWB**

**Connector position**



Connector	Destination
YC1	Front PWB
YC2	Developer fan motor K, Developer fan motor M, Developer fan motor C, Developer fan motor Y
YC3	Front PWB
YC4	Toner hopper motor K, Toner hopper motor M, Toner hopper motor C, Toner hopper motor Y

## PWB photograph



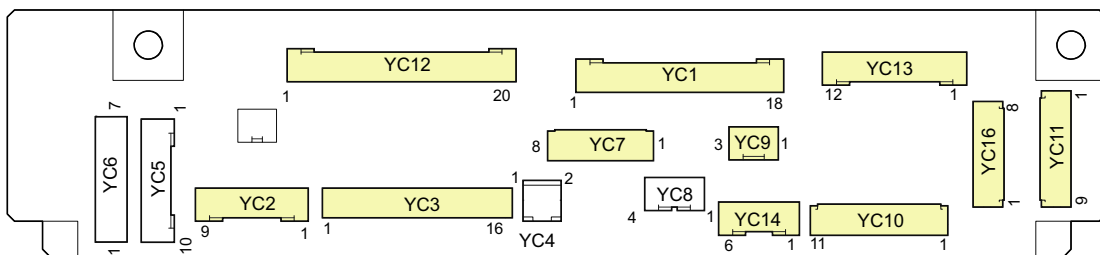
## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	GND	-	-	Ground
	5	THOP_Bk_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal K
	6	DLP_FAN_C/Y	I	DC0V/24V	Developer fan motor C/Y remote signal
	7	+24V2_FUSE	I	DC24V	DC24V power input
	8	DLP_FAN_B/M	I	DC0V/24V	Developer fan motor K/M remote signal
	9	+24V2_FUSE	I	DC24V	DC24V power input
YC2	1	+24V2_FUSE	O	DC24V	DC24V power output
	2	DLP_FAN_BK	I	DC0V/24V	Developer fan motor: On/Off
	3	+24V2_FUSE	O	DC24V	DC24V power output
	4	DLP_FAN_M	I	DC0V/24V	Developer fan motor: On/Off
	5	+24V2_FUSE	O	DC24V	DC24V power output
	6	DLP_FAN_C	I	DC0V/24V	Developer fan motor: On/Off
	7	+24V2_FUSE	O	DC24V	DC24V power output
	8	DLP_FAN_Y	I	DC0V/24V	Developer fan motor: On/Off
YC3	1	THOP_C_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal C
	2	THOP_Y_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal Y

Connector	Pin	Signal	I/O	Voltage	Description
	3	THOP_M_DIR	I	DC0V/3.3V	Toner hopper motor rotation direction control signal M
	4	THOP_M_BK	I	DC0V/3.3V	Toner hopper motor remote signal K
	5	THOP_M_M	I	DC0V/3.3V	Toner hopper motor remote signal M
	6	THOP_M_C	I	DC0V/3.3V	Toner hopper motor remote signal C
	7	THOP_M_Y	I	DC0V/3.3V	Toner hopper motor remote signal Y
	8	+3.3V2_FUSE	-	DC3.3V	3.3V power
YC4	1	THOP_MOT_Y_CC W	O	DC0V/24V	Toner hopper motor drive signal Y
	2	THOP_MOT_Y_C W	O	DC0V/24V	Toner hopper motor drive signal Y
	3	THOP_MOT_C_CC W	O	DC0V/24V	Toner hopper motor drive signal C
	4	THOP_MOT_C_C W	O	DC0V/24V	Toner hopper motor drive signal C
	5	THOP_MOT_M_CC W	O	DC0V/24V	Toner hopper motor drive signal M
	6	THOP_MOT_M_C W	O	DC0V/24V	Toner hopper motor drive signal M
	7	THOP_MOT_BK_C CW	O	DC0V/24V	Toner hopper motor drive signal K
	8	THOP_MOT_BK_C W	O	DC0V/24V	Toner hopper motor drive signal K

**(9)Relay PWB**

**Connector position**

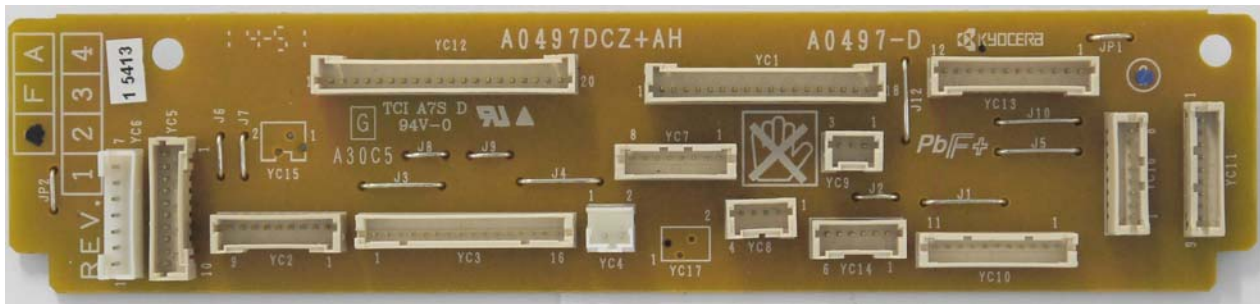


Connector	Destination
YC1	Feed PWB
YC2	MP tray switch, MP paper width sensor, MP paper length sensor
YC3	MP lift motor, MP paper sensor, MP lower lift sensor, MP upper lift sensor, MP conveying sensor, MP paper feed sensor, MP paper feed clutch
YC7	Duplex motor 2, Duplex cover switch
YC9	Duplex sensor 2
YC10	Loop sensor



Connector	Destination
YC11	DU sensor 1, Eject fan motor right front 1, Eject fan motor right rear 1
YC12	Feed PWB
YC13	Feed PWB
YC14	Transfer roller release sensor, Transfer roller release motor
YC16	DU motor 1, Eject fan motor right front 2, Eject fan motor right rear 2

### PWB photograph



### Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	GND	-	-	Ground
	2	DU2_A	I	DC0V/24V(pulse)	Duplex motor 2 drive control signal
	3	DU2_B	I	DC0V/24V(pulse)	Duplex motor 2 drive control signal
	4	DU2_A/	I	DC0V/24V(pulse)	Duplex motor 2 drive control signal
	5	DU2_B/	I	DC0V/24V(pulse)	Duplex motor 2 drive control signal
	6	DU_OPEN_SW	O	DC0V/3.3V	Duplex cover switch: On/Off
	7	DU_CL_LOWER_REM	-	-	Not used
	8	DU_FAN	-	-	Not used
	9	+24V2_FUSE	I	DC24V	DC24V power input from Feed PWB
	10	PRESS_RLS_REM2	I	DC0V/24V	Transfer roller release motor: On/Off 2
	11	PRESS_RLS_REM1	I	DC0V/24V	Transfer roller release motor: On/Off 1
	12	+5V2	I	DC5V	DC5V power input from Feed PWB
	13	PRESS_RLS_SENS	O	DC0V/3.3V	Transfer roller release sensor: On/Off
	14	DU_SENS	O	DC0V/3.3V	Duplex sensor 2: On/Off
	15	BELT_JAM_SENS	-	-	Not used
	16	REG_BK_SENS1_S	-	-	Not used

Connector	Pin	Signal	I/O	Voltage	Description
	17	REG_BK_SENS1_P	-	-	Not used
	18	REG_BK_LED	-	-	Not used
YC2	1	GND	-	-	Ground
	2	MPF_LNG	I	DC0V/3.3V	MP paper length sensor: On/Off
	3	+5V2	O	DC5V	DC5V power output to MP paper length sensor
	4	MPF_WID3	I	DC0V/3.3V	MP paper width sensor: On/Off
	5	MPF_WID2	I	DC0V/3.3V	MP paper width sensor: On/Off
	6	GND	-	-	Ground
	7	MPF_WID1	I	DC0V/3.3V	MP paper width sensor: On/Off
	8	GND	-	-	Ground
	9	MPF_TABLE	I	DC0V/3.3V	MP tray switch: On/Off
YC3	1	LED_+3.3V3	O	DC3.3V	DC3.3V power output to MP paper sensor
	2	GND	-	-	Ground
	3	MPF_PPR_SET	I	DC0V/3.3V	MP paper sensor: On/Off
	4	GND	-	-	Ground
	5	MPF_LIFT_UP_SENS	I	DC0V/3.3V	MP upper lift sensor: On/Off
	6	+5V2	O	DC5V	DC5V power output to MP upper lift sensor
	7	GND	-	-	Ground
	8	MPF_LIFT_DOWN_SENS	I	DC0V/3.3V	MP lower lift sensor: On/Off
	9	+5V2	O	DC5V	DC5V power output to MP lower lift sensor
	10	GND	-	-	Ground
	11	MPF_JAM_SENS	I	DC0V/3.3V	MP paper feed sensor: On/Off
	12	+5V2	O	DC5V	DC5V power output to MP paper feed sensor
	13	MPF_CL_REM	O	DC0V/24V	MP paper feed clutch: On/Off
	14	+24V2_FUSE	O	DC24V	DC24V power output to MP paper feed clutch
	15	MPF_LIFT_DR_A	O	DC0V/24V	MP lift motor: On/Off
	16	MPF_LIFT_DR_B	O	DC0V/24V	MP lift motor: On/Off
YC7	1	+24V2_FUSE	-	-	Not used
	2	DU_CL2_REM	-	-	Not used
	3	DU_OPEN	I	DC0V/3.3V	Duplex cover switch: On/Off
	4	GND	-	-	Ground

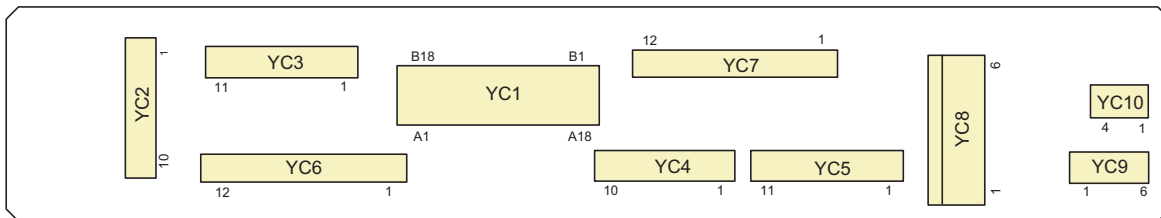
Connector	Pin	Signal	I/O	Voltage	Description
	5	DU2_B/	O	DC0V/24V(pulse)	Duplex motor 2 drive control signal
	6	DU2_A/	O	DC0V/24V(pulse)	Duplex motor 2 drive control signal
	7	DU2_B	O	DC0V/24V(pulse)	Duplex motor 2 drive control signal
	8	DU2_A	O	DC0V/24V(pulse)	Duplex motor 2 drive control signal
YC9	1	GND	-	-	Ground
	2	DU_SENS	I	DC0V/3.3V	Duplex sensor 2: On/Off
	3	+5V2	O	DC5V	DC5V power output to Duplex sensor 2
YC10	1	LOOP_SENS	I	DC0V/3.3V	Loop sensor: On/Off
	2	GND	-	-	Ground
	3	+5V2	O	DC5V	DC5V power output to Loop sensor
	4	NC	-	-	Not used
	5	REG_BK_LED	-	-	Not used
	6	GND	-	-	Not used
	7	REG_BK_SENS1_P	-	-	Not used
	8	REG_BK_SENS1_S	-	-	Not used
	9	GND	-	-	Not used
	10	BELT_JAM_SENS	-	-	Not used
	11	+5V2	-	-	Not used
YC11	1	GND	-	-	Ground
	2	DU_ENTER_SENS	I	DC0V/3.3V	Duplex sensor 1: On/Off
	3	+5V2	O	DC5V	DC5V power output to Duplex sensor 1
	4	EXIT_FAN_REM	O	DC0V/24V	Right front eject fan motor 1: On/Off
	5	+24V2_FUSE	O	DC24V	DC24V power output to Right front eject fan motor 1
	6	EXIT_FAN_REM	O	DC0V/24V	Right rear eject fan motor 1: On/Off
	7	+24V2_FUSE	O	DC24V	DC24V power output to Right rear eject fan motor 1
	8	+24V2_FUSE	-	-	Not used
	9	DU_CL_UPPER_REM	-	-	Not used
YC12	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	MPF_TABLE	O	DC0V/3.3V	MP tray switch: On/Off
	4	MPF_WID1	O	DC0V/3.3V	MP paper width sensor: On/Off
	5	MPF_WID2	O	DC0V/3.3V	MP paper width sensor: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	6	MPF_WID3	O	DC0V/3.3V	MP paper width sensor: On/Off
	7	MPF_LNG	O	DC0V/3.3V	MP paper length sensor: On/Off
	8	LED_+3.3V3	I	DC3.3V	DC3.3V power input from Feed PWB
	9	MPF_PPR_SET	O	DC0V/3.3V	MP paper sensor: On/Off
	10	MPF_LIFT_UP_SE NS	O	DC0V/3.3V	MP upper lift sensor: On/Off
	11	MPF_LIFT_DOWN _SENS	O	DC0V/3.3V	MP lower lift sensor: On/Off
	12	MPF_JAM_SENS	O	DC0V/3.3V	MP paper feed sensor: On/Off
	13	MPF_CL_REM	I	DC0V/24V	MP paper feed clutch: On/Off
	14	+24V2_FUSE	I	DC24V	DC24V power input from Feed PWB
	15	MPF_LIFT_MOT_A	I	DC0V/24V	MP lift motor: On/Off
	16	MPF_LIFT_MOT_B	I	DC0V/24V	MP lift motor: On/Off
	17	NC	-	-	Not used
	18	ID_SOL_ACT	-	-	Not used
	19	GND	-	-	Ground
	20	GND	-	-	Ground
YC13	1	NC	-	-	Not used
	2	LOOP_SENS	O	DC0V/3.3V	Loop sensor: On/Off
	3	EDGE_FAN_REM	-	-	Not used
	4	DU1_A	I	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	5	DU1_B	I	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	6	DU1_A/	I	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	7	DU1_B/	I	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	8	GND	-	-	Ground
	9	DU_CL_UPPER_R EM	-	-	Not used
	10	+24V2_FUSE	I	DC24V	DC24V power input from Feed PWB
	11	EXIT_FAN	I	DC0V/24V	Eject fan motor : On/Off
	12	DU_ENTER_SENS	O	DC0V/3.3V	Duplex sensor 1: On/Off
YC14	1	GND	-	-	Ground
	2	PRESS_RLS_SEN S	I	DC0V/3.3V	Transfer roller release sensor: On/Off
	3	+5V2	O	DC5V	DC5V power output to Transfer roller release sensor
	4	PRESS_RLS_REM 1	O	DC0V/24V	Transfer roller release motor: On/Off
	5	PRESS_RLS_REM 2	O	DC0V/24V	Transfer roller release motor: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	6	NC	-	-	Not used
YC16	1	DU1_B/	O	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	2	DU1_A/	O	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	3	DU1_B	O	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	4	DU1_A	O	DC0V/24V(pulse)	Duplex motor 1 drive control signal
	5	EDGE_FAN_REM	O	DC0V/24V	Right front eject fan motor 2: On/Off
	6	+24V2_FUSE	O	DC24V	DC24V power output to Right front eject fan motor 2
	7	EDGE_FAN_REM	O	DC0V/24V	Right rear eject fan motor 2: On/Off
	8	+24V2_FUSE	O	DC24V	DC24V power output to Right rear eject fan motor 2

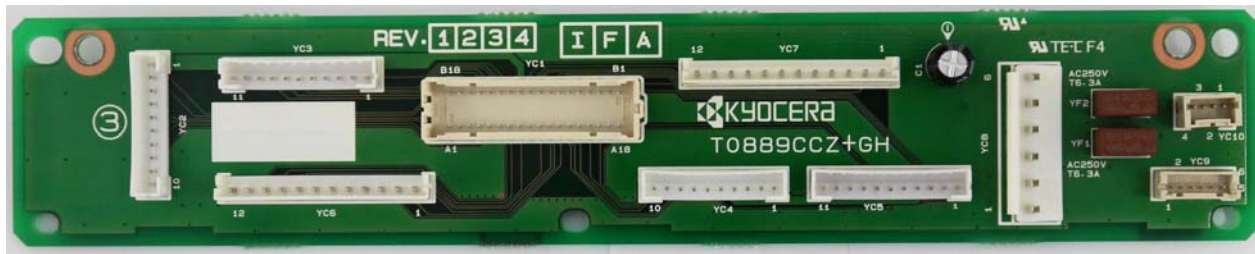
**(10)Motor relay PWB**

**Connector position**



Connector	Destination
YC1	Engine PWB
YC2	Drum motor K
YC3	Drum motor M
YC4	Drum motor C
YC5	Drum motor Y
YC6	Developer motor M, Developer motor K
YC7	Developer motor Y, Developer motor C
YC8	Power supply PWB
YC9	Main high voltage PWB
YC10	LSU relay PWB

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	A1	DRM_BK_BRAKE	I	DC0V/5V	Drum motor brake signal K
	A2	DRM_DIR	I	DC0V/5V	Drum motor rotation direction control signal K
	A3	DRM_BK_CLK	I	DC0V/5V(pulse)	Drum motor clock signal BK
	A4	DRM_BK_REM	I	DC0V/5V	Drum motor remote signal K
	A5	GND	-	-	Ground
	A6	DLP_BK_REM	I	DC0V/5V	Developer motor remote signal K
	A7	DLP_BK_CLK	I	DC0V/5V(pulse)	Developer motor clock signal K
	A8	DLP_BK_RDY	O	DC0V/3.3V	Developer motor sync signal K
	A9	DLP_DIR	I	DC0V/5V	Developer motor rotation direction control signal
	A10	DLP_M_REM	I	DC0V/5V	Developer motor remote signal M
	A11	DLP_COL_CLK	I	DC0V/5V(pulse)	Developer motor clock signal C
	A12	DLP_M_RDY	O	DC0V/3.3V	Developer motor sync signal M
	A13	DRM_C_REM	I	DC0V/5V	Drum motor remote signal C
	A14	DRM_C_CLK	I	DC0V/5V(pulse)	Drum motor clock signal C
	A15	DRM_C_BRAKE	I	DC0V/5V	Drum motor brake signal C
	A16	SIG1_C	O	DC0V/5.0V(pulse)	Drum motor encoder main sensor C
	A17	SIG2_C	O	DC0V/5.0V(pulse)	Drum motor encoder sub sensor C
	A18	GND	-	-	Ground
B1	+5V2	I	DC5V	DC5V power input	
B2	SIG2_Y	O	DC0V/5.0V(pulse)	Drum motor encoder sub sensor Y	
B3	SIG1_Y	O	DC0V/5.0V(pulse)	Drum motor encoder main sensor Y	
B4	DRM_Y_BRAKE	I	DC0V/5V	Drum motor brake signal Y	
B5	DRM_Y_CLK	I	DC0V/5V(pulse)	Drum motor clock signal Y	
B6	DRM_Y_REM	I	DC0V/5V	Drum motor remote signal Y	
B7	DLP_Y_RDY	O	DC0V/3.3V	Developer motor sync signal Y	

Connector	Pin	Signal	I/O	Voltage	Description
	B8	DLP_Y_REM	I	DC0V/5V	Developer motor remote signal Y
	B9	DLP_C_RDY	O	DC0V/3.3V	Developer motor sync signal C
	B10	DLP_C_REM	I	DC0V/5V	Developer motor remote signal C
	B11	+5V2	I	DC5V	DC5V power input
	B12	SIG2_M	O	DC0V/5.0V(pulse)	Drum motor encoder sub sensor M
	B13	SIG1_M	O	DC0V/5.0V(pulse)	Drum motor encoder main sensor M
	B14	DRM_M_BRAKE	I	DC0V/5V	Drum motor brake signal M
	B15	DRM_M_CLK	I	DC0V/5V(pulse)	Drum motor clock signal M
	B16	DRM_M_REM	I	DC0V/5V	Drum motor remote signal M
	B17	SIG2_BK	O	DC0V/5.0V(pulse)	Drum motor encoder sub sensor K
B18	SIG1_BK	O	DC0V/5.0V(pulse)	Drum motor encoder main sensor K	
YC2	1	SIG2_BK	I	DC0V/5V	Drum motor encoder sub sensor K
	2	SIG1_BK	I	DC0V/5V	Drum motor encoder main sensor K
	3	GND	-	-	Ground
	4	+5V2	-	DC5V	DC5V power
	5	DRM_BK_BRAKE	O	DC0V/5V	Drum motor brake signal K
	6	DRM_DIR	O	DC0V/5V	Drum motor rotation direction control signal K
	7	DRM_BK_CLK	O	DC0V/5V	Drum motor clock signal K
	8	DRM_BK_REM	O	DC0V/5V	Drum motor remote signal K
	9	GND	-	-	Ground
	10	+24V3	-	DC24V	DC24V power
YC3	1	SIG2_M	I	DC0V/5V	Drum motor encoder sub sensor M
	2	SIG1_M	I	DC0V/5V	Drum motor encoder main sensor M
	3	GND	-	-	Ground
	4	+5V2	-	DC5V	DC5V power
	5	DRM_M_BRAKE	O	DC0V/5V	Drum motor brake signal M
	6	DRM_DIR	O	DC0V/5V	Drum motor rotation direction control signal M
	7	DRM_M_CLK	O	DC0V/5V	Drum motor clock signal M
	8	DRM_M_REM	O	DC0V/5V	Drum motor remote signal M
	9	GND	-	-	Ground
	10	+24V3	-	DC24V	DC24V power
	11	NC	-	-	N.C.
YC4	1	SIG2_C	I	DC0V/5V	Drum motor encoder sub sensor C
	2	SIG1_C	I	DC0V/5V	Drum motor encoder main sensor C
	3	GND	-	-	Ground

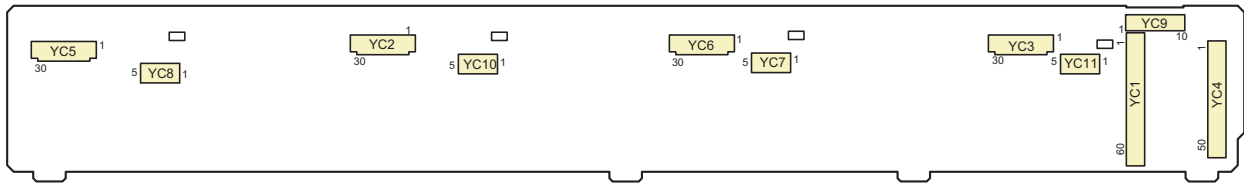
Connector	Pin	Signal	I/O	Voltage	Description
	4	+5V2	-	DC5V	DC5V power
	5	DRM_C_BRAKE	O	DC0V/5V	Drum motor brake signal C
	6	DRM_DIR	O	DC0V/5V	Drum motor rotation direction control signal C
	7	DRM_C_CLK	O	DC0V/5V	Drum motor clock signal C
	8	DRM_C_REM	O	DC0V/5V	Drum motor remote signal C
	9	GND	-	-	Ground
	10	+24V3	-	DC24V	DC24V power
YC5	1	SIG2_Y	I	DC0V/5V	Drum motor encoder sub sensor Y
	2	SIG1_Y	I	DC0V/5V	Drum motor encoder main sensor Y
	3	GND	-	-	Ground
	4	+5V2	-	DC5V	DC5V power
	5	DRM_Y_BRAKE	O	DC0V/5V	Drum motor brake signal Y
	6	DRM_DIR	O	DC0V/5V	Drum motor rotation direction control signal Y
	7	DRM_Y_CLK	O	DC0V/5V	Drum motor clock signal Y
	8	DRM_Y_REM	O	DC0V/5V	Drum motor remote signal Y
	9	GND	-	-	Ground
	10	+24V3	-	DC24V	DC24V power
	11	NC	-	-	N.C.
YC6	1	DLP_DIR	O	DC0V/5V	Developer motor rotation direction control signal
	2	DLP_M_RDY	I	DC0V/5V	Developer motor sync signal M
	3	DLP_COL_CLK	O	DC0V/5V	Developer motor clock signal M
	4	DLP_M_REM	O	DC0V/5V	Developer motor remote signal M
	5	GND	-	-	Ground
	6	+24V3	-	DC24V	DC24V power
	7	DLP_DIR	O	DC0V/5V	Developer motor rotation direction control signal
	8	DLP_BK_RDY	I	DC0V/5V	Developer motor sync signal K
	9	DLP_BK_CLK	O	DC0V/5V	Developer motor clock signal K
	10	DLP_BK_REM	O	DC0V/5V	Developer motor remote signal K
	11	GND	-	-	Ground
	12	+24V3	-	DC24V	DC24V power
YC7	1	DLP_DIR	O	DC0V/5V	Developer motor rotation direction control signal
	2	DLP_Y_RDY	I	DC0V/5V	Developer motor sync signal Y
	3	DLP_COL_CLK	O	DC0V/5V	Developer motor clock signal Y



Connector	Pin	Signal	I/O	Voltage	Description
	4	DLP_Y_REM	O	DC0V/5V	Developer motor remote signal Y
	5	GND	-	-	Ground
	6	+24V3	-	DC24V	DC24V power
	7	DLP_DIR	O	DC0V/5V	Developer motor rotation direction control signal
	8	DLP_C_RDY	I	DC0V/5V	Developer motor sync signal C
	9	DLP_COL_CLK	O	DC0V/5V	Developer motor clock signal C
	10	DLP_C_REM	O	DC0V/5V	Developer motor remote signal C
	11	GND	-	-	Ground
	12	+24V3	-	DC24V	DC24V power
YC8	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	+24V3	-	DC24V	DC24V power
	5	+24V3	-	DC24V	DC24V power
	6	+24V4	-	DC24V	DC24V power
YC9	1	+24V3_FUSE	-	DC24V	DC24V power
	2	+24V3_FUSE	-	DC24V	DC24V power
	3	+24V3_FUSE	-	DC24V	DC24V power
	4	GND	-	-	Ground
	5	GND	-	-	Ground
	6	GND	-	-	Ground
YC10	4	+24V4_FUSE	-	-	Ground
	3	+24V4_FUSE	-	-	Ground
	2	GND	-	DC24V	DC24V power
	1	GND	-	DC24V	DC24V power

## (11)LSU relay PWB

### Connector position



Connector	Destination
YC1	Engine PWB
YC2	APC PWB M
YC3	APC PWB Y
YC4	Engine PWB
YC5	APC PWB K
YC6	APC PWB C
YC7	Polygon motor C
YC8	Polygon motor K
YC9	Motor relay PWB, Engine PWB
YC10	Polygon motor M
YC11	Polygon motor Y

### PWB photograph



### Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	POL_REM_C	I	DC0V/5V	PM remote signal
	2	POL_RDY_C	O	DC0V/3.3V	PM ready signal
	3	POL_CLK_C	I	DC0V/5V(pulse)	PM clock signal
	4	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	5	POL_REM_M	I	DC0V/5V	PM remote signal
	6	POL_RDY_M	O	DC0V/3.3V	PM ready signal
	7	POL_CLK_M	I	DC0V/5V(pulse)	PM clock signal
	8	GND	-	-	Ground
	9	BD_M	O	DC0V/5V	BD signal
	10	CSO_M	I	DC0V/3.3V	EEPROM chip select signal M
	11	CSI_M	I	DC0V/3.3V	LDD chip select signal M
	12	P0_M	I	DC0V/3.3V	Laser control signal
	13	P2_M	I	DC0V/3.3V	Laser control signal
	14	P4_M	I	DC0V/3.3V	Laser control signal
	15	BG_FIX_M	I	DC0V/3.3V	Laser shading clock signal M
	16	GND	-	-	Ground
	17	DATAN1_M	I	LVDS	Image data M
	18	DATAP1_M	I	LVDS	Image data M
	19	GND	-	-	Ground
	20	DATAN2_M	I	LVDS	Image data M
	21	DATAP2_M	I	LVDS	Image data M
	22	GND	-	-	Ground
	23	DATAN3_M	I	LVDS	Image data M
	24	DATAP3_M	I	LVDS	Image data M
	25	GND	-	-	Ground
	26	DATAN4_M	I	LVDS	Image data M
	27	DATAP4_M	I	LVDS	Image data M
	28	GND	-	-	Ground
	29	POL_REM_K	I	DC0V/5V	PM remote signal
	30	POL_RDY_K	O	DC0V/3.3V	PM ready signal
	31	POL_CLK_K	I	DC0V/5V(pulse)	PM clock signal
	32	GND	-	-	Ground
	33	TH_K	O	Analog	LSU thermistor detection voltage
	34	BD_K	O	DC0V/5V	BD signal
	35	CSO_K	I	DC0V/3.3V	EEPROM chip select signal K
	36	SKOI_MK	I	DC0V/3.3V	Communication clock signal MK
	37	GND	-	-	Ground
	38	DOI_MK	I	DC0V/3.3V	Communication data input signal
	39	GND	-	-	Ground
	40	DIO_MK	O	DC0V/3.3V	Communication data output signal

Connector	Pin	Signal	I/O	Voltage	Description
	41	CSI_K	I	DC0V/3.3V	LDD chip select signal K
	42	SET	I	DC0V/3.3V	Laser control signal
	43	INT_ST_MK	O	DC0V/5V	Laser driver initialization monitor signal
	44	P0_K	I	DC0V/3.3V	Laser control signal
	45	P2_K	I	DC0V/3.3V	Laser control signal
	46	P4_K	I	DC0V/3.3V	Laser control signal
	47	BG_FIX_K	I	DC0V/3.3V	Laser shading clock signal K
	48	GND	-	-	Ground
	49	DATAN1_K	I	LVDS	Image data K
	50	DATAP1_K	I	LVDS	Image data K
	51	GND	-	-	Ground
	52	DATAN2_K	I	LVDS	Image data K
	53	DATAP2_K	I	LVDS	Image data K
	54	GND	-	-	Ground
	55	DATAN3_K	I	LVDS	Image data K
	56	DATAP3_K	I	LVDS	Image data K
	57	GND	-	-	Ground
	58	DATAN4_K	I	LVDS	Image data K
	59	DATAP4_K	I	LVDS	Image data K
	60	GND	-	-	Ground
YC2	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	BD_M	I	DC0V/5V	BD signal(M)
	4	+5V4	O	DC5V	DC5V power output
	5	+5V4	O	DC5V	DC5V power output
	6	NC	-	-	Not used
	7	CSO_M	O	DC0V/3.3V	EEPROM chip select signal M
	8	SKOI	O	DC0V/3.3V	Communication clock signal
	9	DOI	O	DC0V/3.3V	Communication data input signal
	10	DIO	I	DC0V/3.3V	Communication data output signal
	11	CSI_M	O	DC0V/3.3V	LDD chip select signal M
	12	SET	O	DC0V/3.3V	Laser control signal
	13	INT_ST	I	DC0V/5V	Laser driver initialization monitor signal
	14	P0_M	O	DC0V/3.3V	Laser control signal
	15	P2_M	O	DC0V/3.3V	Laser control signal

Connector	Pin	Signal	I/O	Voltage	Description
	16	P4_M	O	DC0V/3.3V	Laser control signal
	17	BG_FIX_M	O	DC0V/3.3V	Laser shading clock signal M
	18	GND	-	-	Ground
	19	DATAN1_M	O	Analog	Image data M
	20	DATAP1_M	O	Analog	Image data M
	21	GND	-	-	Ground
	22	DATAN2_M	O	Analog	Image data M
	23	DATAP2_M	O	Analog	Image data M
	24	GND	-	-	Ground
	25	DATAN3_M	O	Analog	Image data M
	26	DATAP3_M	O	Analog	Image data M
	27	GND	-	-	Ground
	28	DATAN4_M	O	Analog	Image data M
	29	DATAP4_M	O	Analog	Image data M
	30	GND	-	-	Ground
YC3	1	GND	-	-	Ground
	2	TH	-	-	Ground
	3	PD	I	DC0V/5V	BD signal(Y)
	4	+5V4	O	DC5V	DC5V power output
	5	+5V4	O	DC5V	DC5V power output
	6	NC	-	-	Not used
	7	CSO	O	DC0V/3.3V	EEPROM chip select signal Y
	8	SKOI	O	DC0V/3.3V	Communication clock signal
	9	DOI	O	DC0V/3.3V	Communication data input signal
	10	DIO	I	DC0V/3.3V	Communication data output signal
	11	CSI	O	DC0V/3.3V	LDD chip select signal Y
	12	SET	O	DC0V/3.3V	Laser control signal
	13	INT_ST	I	DC0V/5V	Laser control signal
	14	P0	O	DC0V/3.3V	Laser control signal
	15	P2	O	DC0V/3.3V	Laser control signal
	16	P4	O	DC0V/3.3V	Laser control signal
	17	BG_FIX	O	DC0V/3.3V	Laser shading clock signal Y
	18	GND	-	-	Ground
	19	DATAN1	O	Analog	Image data Y
	20	DATAP1	O	Analog	Image data Y
	21	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	22	DATAN2	O	Analog	Image data Y
	23	DATAP2	O	Analog	Image data Y
	24	GND	-	-	Ground
	25	DATAN3	O	Analog	Image data Y
	26	DATAP3	O	Analog	Image data Y
	27	GND	-	-	Ground
	28	DATAN4	O	Analog	Image data Y
	29	DATAP4	O	Analog	Image data Y
	30	GND	-	-	Ground
YC4	1	POL_REM_Y	I	DC0V/5V	PM remote signal
	2	POL_RDY_Y	O	DC0V/3.3V	PM ready signal
	3	POL_CLK_Y	I	DC0V/5V(pulse)	PM clock signal
	4	P4_YC	I	DC0V/3.3V	Laser control signal
	5	TH_Y	-	-	Ground
	6	BD_Y	O	DC0V/5V	BD signal
	7	CSO_Y	I	DC0V/3.3V	EEPROM chip select signal Y
	8	CSI_Y	I	DC0V/3.3V	LDD chip select signal Y
	9	P0_Y	I	DC0V/3.3V	Laser control signal
	10	P2_Y	I	DC0V/3.3V	Laser control signal
	11	BG_FIX_Y	I	DC0V/3.3V	Laser shading clock signal Y
	12	GND	-	-	Ground
	13	DATAN1_Y	I	LVDS	Image data Y
	14	DATAP1_Y	I	LVDS	Image data Y
	15	GND	-	-	Ground
	16	DATAN2_Y	I	LVDS	Image data Y
	17	DATAP2_Y	I	LVDS	Image data Y
	18	GND	-	-	Ground
	19	DATAN3_Y	I	LVDS	Image data Y
	20	DATAP3_Y	I	LVDS	Image data Y
	21	GND	-	-	Ground
	22	DATAN4_Y	I	LVDS	Image data Y
	23	DATAP4_Y	I	LVDS	Image data Y
	24	GND	-	-	Ground
	25	BD_C	O	DC0V/5V	BD signal
	26	CSO_C	I	DC0V/3.3V	EEPROM chip select signal C
	27	SKOI_YC	I	DC0V/3.3V	Communication clock signal MK

Connector	Pin	Signal	I/O	Voltage	Description
	28	GND	-	-	Ground
	29	DOI_YC	I	DC0V/3.3V	Communication data input signal
	30	GND	-	-	Ground
	31	DIO_YC	O	DC0V/3.3V	Communication data output signal
	32	CSI_C	I	DC0V/3.3V	LDD chip select signal C
	33	SET	I	DC0V/3.3V	Laser control signal
	34	INT_ST_YC	O	DC0V/5V	Laser driver initialization monitor signal
	35	P0_C	I	DC0V/3.3V	Laser control signal
	36	P2_C	I	DC0V/3.3V	Laser control signal
	37	BG_FIX_C	I	DC0V/3.3V	Laser shading clock signal C
	38	GND	-	-	Ground
	39	DATAN1_C	I	LVDS	Image data C
	40	DATAP1_C	I	LVDS	Image data C
	41	GND	-	-	Ground
	42	DATAN2_C	I	LVDS	Image data C
	43	DATAP2_C	I	LVDS	Image data C
	44	GND	-	-	Ground
	45	DATAN3_C	I	LVDS	Image data C
	46	DATAP3_C	I	LVDS	Image data C
	47	GND	-	-	Ground
	48	DATAN4_C	I	LVDS	Image data C
	49	DATAP4_C	I	LVDS	Image data C
	50	GND	-	-	Ground
YC5	1	GND	-	-	Ground
	2	TH_K	I	Analog	LSU thermistor detection voltage
	3	BD_K	I	DC0V/5V	BD signal(K)
	4	+5V4	O	DC5V	DC5V power output
	5	+5V4	O	DC5V	DC5V power output
	6	NC	-	-	Not used
	7	CSO_K	O	DC0V/3.3V	EEPROM chip select signal K
	8	SKOI	O	DC0V/3.3V	Communication clock signal
	9	DOI	O	DC0V/3.3V	Communication data input signal
	10	DIO	I	DC0V/3.3V	Communication data output signal
	11	CSI_K	O	DC0V/3.3V	LDD chip select signal K
	12	SET	O	DC0V/3.3V	Laser control signal

Connector	Pin	Signal	I/O	Voltage	Description
	13	INT_ST	I	DC0V/5V	Laser driver initialization monitor signal
	14	P0_K	O	DC0V/3.3V	Laser control signal
	15	P2_K	O	DC0V/3.3V	Laser control signal
	16	P4_K	O	DC0V/3.3V	Laser control signal
	17	BG_FIX_K	O	DC0V/3.3V	Laser shading clock signal K
	18	GND	-	-	Ground
	19	DATAN1_K	O	Analog	Image data K
	20	DATAP1_K	O	Analog	Image data K
	21	GND	-	-	Ground
	22	DATAN2_K	O	Analog	Image data K
	23	DATAP2_K	O	Analog	Image data K
	24	GND	-	-	Ground
	25	DATAN3_K	O	Analog	Image data K
	26	DATAP3_K	O	Analog	Image data K
	27	GND	-	-	Ground
	28	DATAN4_K	O	Analog	Image data K
	29	DATAP4_K	O	Analog	Image data K
	30	GND	-	-	Ground
YC6	1	GND	-	-	Ground
	2	TH	-	-	Ground
	3	PD	I	DC0V/5V	BD signal(C)
	4	+5V4	O	DC5V	DC5V power output
	5	+5V4	O	DC5V	DC5V power output
	6	NC	-	-	Not used
	7	CSO	O	DC0V/3.3V	EEPROM chip select signal C
	8	SKOI	O	DC0V/3.3V	Communication clock signal
	9	DOI	O	DC0V/3.3V	Communication data input signal
	10	DIO	I	DC0V/3.3V	Communication data output signal
	11	CSI	O	DC0V/3.3V	LDD chip select signal C
	12	SET	O	DC0V/3.3V	Laser control signal
	13	INT_ST	I	DC0V/5V	Laser driver initialization monitor signal
	14	P0	O	DC0V/3.3V	Laser control signal
	15	P2	O	DC0V/3.3V	Laser control signal
	16	P4	O	DC0V/3.3V	Laser control signal
	17	BG_FIX	O	DC0V/3.3V	Laser shading clock signal C

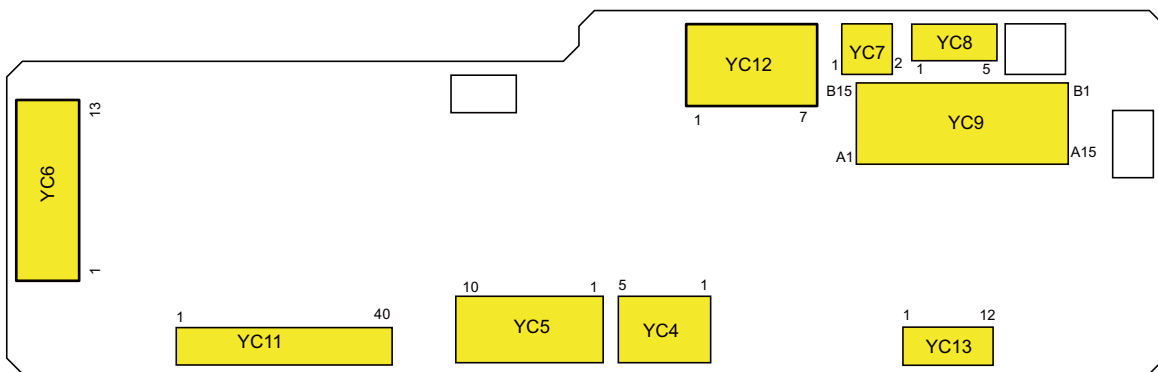


Connector	Pin	Signal	I/O	Voltage	Description
	18	GND	-	-	Ground
	19	DATAN1	O	Analog	Image data C
	20	DATAP1	O	Analog	Image data C
	21	GND	-	-	Ground
	22	DATAN2	O	Analog	Image data C
	23	DATAP2	O	Analog	Image data C
	24	GND	-	-	Ground
	25	DATAN3	O	Analog	Image data C
	26	DATAP3	O	Analog	Image data C
	27	GND	-	-	Ground
	28	DATAN4	O	Analog	Image data C
	29	DATAP4	O	Analog	Image data C
	30	GND	-	-	Ground
YC7	1	+24V4_FUSE	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	POL_REM_C	O	DC0V/5V	PM remote signal
	4	POL_RDY_C	I	DC0V/3.3V	PM ready signal
	5	POL_CLK_C	O	DC0V/5V	PM clock signal
YC8	1	+24V4_FUSE	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	POL_REM_K	O	DC0V/5V	PM remote signal
	4	POL_RDY_K	I	DC0V/3.3V	PM ready signal
	5	POL_CLK_K	O	DC0V/5V	PM clock signal
YC9	1	+24V4_FUSE	I	DC24V	DC24V power input
	2	+24V4_FUSE	I	DC24V	DC24V power input
	3	GND	-	-	Ground
	4	GND	-	-	Ground
	5	+5V4	I	DC5V	DC5V power input
	6	+5V4	I	DC5V	DC5V power input
	7	+5V4	I	DC5V	DC5V power input
	8	GND	-	-	Ground
	9	GND	-	-	Ground
	10	GND	-	-	Ground
YC10	1	+24V4_FUSE	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	POL_REM_M	O	DC0V/5V	PM remote signal

Connector	Pin	Signal	I/O	Voltage	Description
	4	POL_RDY_M	I	DC0V/3.3V	PM ready signal
	5	POL_CLK_M	O	DC0V/5V	PM clock signal
YC11	1	+24V4_FUSE	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	POL_REM_Y	O	DC0V/5V	PM remote signal
YC11	4	POL_RDY_Y	I	DC0V/3.3V	PM ready signal
	5	POL_CLK_Y	O	DC0V/5V	PM clock signal

**(12)Operation panel main PWB**

**Connector position**



Connector	Destination
YC4	NFC PWB
YC5	Operation panel sub PWB
YC6	Numeric key (option)
YC7	Speaker
YC8	Human detect sensor
YC9	Main PWB
YC11	LCD
YC12	Main PWB
YC13	Touch screen

PWB photograph



## Connector table

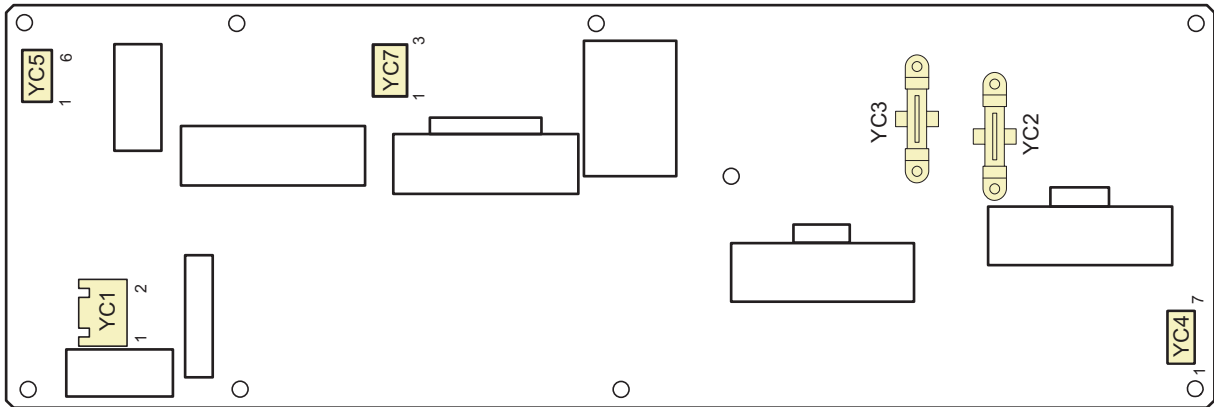
Connector	Pin	Signal	I/O	Voltage	Description
YC4	1	VCC	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	NFC_SWCLK	O	DC0V/3.3V(pulse)	I2C clock signal
	4	NFC_SWDA	I/O	DC0V/3.3V(pulse)	I2C data signal
	5	NIRQ	I	DC0V/1.8V	Interrupt signal
YC5	1	NC	-	-	Not used
	2	JOBSEPA_LED	O	DC0V/5.0V	Job separator LED control signal
	3	PROCESSING_LED	O	DC0V/5.0V	Processing LED control signal
	4	5V6	O	DC5V	DC5V power output
	5	ATTENTION_LED	O	DC0V/5.0V	Attention LED control signal
	6	INT_ENERGYSAVE RKEY	I	DC0V/3.3V	Energy Saver key interrupt signal
	7	ENERGYSAVER_LE D	O	DC0V/5.0V	Energy Saver LED control signal
	8	SCAN3	O	DC0V/3.3V(pulse)	Scan signal 3
	9	KEY2	I	DC0V/3.3V(pulse)	Operation panel key scan return signal 2
	10	GND	-	-	Ground
YC6	1	KEY3	I	DC0V/3.3V(pulse)	Operation panel key scan return signal 3
	2	KEY2	I	DC0V/3.3V(pulse)	Operation panel key scan return signal 2
	3	KEY1	I	DC0V/3.3V(pulse)	Operation panel key scan return signal 1
	4	KEY0	I	DC0V/3.3V(pulse)	Operation panel key scan return signal 0
	5	SCAN4	O	DC0V/3.3V(pulse)	Scan signal 4
	6	SCAN5	O	DC0V/3.3V(pulse)	Scan signal 5
	7	SCAN6	O	DC0V/3.3V(pulse)	Scan signal 6
	8	SCAN7	O	DC0V/3.3V(pulse)	Scan signal 7
	9	SCAN1	O	DC0V/3.3V(pulse)	Scan signal 1
	10	START_LED	O	DC0V/5.0V	Start LED control signal
	11	10KEY_DETECT	I	DC0V/3.3V	OPTION 10 KEY connection detection
	12	GND	-	-	Ground
	13	NC	-	-	Not used
YC7	1	SPEAKER_P	O	Analog	Speaker sound signal (+)
	2	SPEAKER_N	O	Analog	Speaker sound signal (-)
YC8	1	3.3V1_HD	O	DC3.3V	DC3.3V power output
	2	HD_SWCLK	O	DC0V/3.3V(pulse)	I2C clock signal
	3	HD_SWDA	I/O	DC0V/3.3V(pulse)	I2C data signal
	4	HUMAN_DETECT_I NT	I	DC0V/3.3V	Human detect signal interrupt
	5	GND	-	-	Ground
YC9	A1	+5V6	I	DC5V	DC5V power input
	A2	+5V6	I	DC5V	DC5V power input
	A3	+5V6	I	DC5V	DC5V power input
	A4	+5V6	I	DC5V	DC5V power input

Connector	Pin	Signal	I/O	Voltage	Description
	A5	GND	-	-	Ground
	A6	ANYKEY	O	DC0V/3.3V	ANYKEY recovery signal
	A7	DISPLAY_POWERON	I	DC0V/3.3V	LCD back light lighting signal
	A8	C2P_SCK	I	DC0V/3.3V(pulse)	Panel clock signal
	A9	P2C_SBSY	O	DC0V/3.3V	Panel busy signal
	A10	P2C_SDIR	O	DC0V/3.3V	Panel communication direction signal
	A11	C2P_SDAT	O	DC0V/3.3V(pulse)	Serial communication data signal
	A12	P2C_SDAT	I	DC0V/3.3V(pulse)	Serial communication data signal
	A13	FPRST	I	DC0V/3.3V	Operation panel reset signal
	A14	3.3V2_MAIN	-	DC3.3V	3.3V2_MAIN
	A15	I2C_SCL_NFC	I	DC0V/3.3V(pulse)	I2C clock signal
	B1	I2C_SDA_NFC	I/O	DC0V/3.3V(pulse)	I2C data signal
	B2	NIRQ	O	DC0V/3.3V	NFC interrupt signal
	B3	INT_ENERGYSAVERKEY_N	O	DC0V/3.3V	Energy Saver key interrupt signal
	B4	PNL_WKUP_REQ	I	DC0V/3.3V	Panel recovery signal
	B5	AUDIO	I	Analog	Audio output signal
	B6	LED_PROCESSING	I	DC0V/3.3V	Processing LED lighting signal
	B7	LED_ATTENTION	I	DC0V/3.3V	Attention LED lighting signal
	B8	INT_HUMAN_DETECT	O	DC0V/3.3V	Human detect sensor interrupt signal
	B9	BEEP_POWERON	I	DC0V/3.3V	Alert sound recovery signal
	B10	GND	-	-	Ground
	B11	GND	-	-	Ground
	B12	GND	-	-	Ground
	B13	JOB_LED	?	DC0V/3.3V	Job separator LED control signal
	B14	GND	-	-	Ground
	B15	3.3V1_HD	-	-	3.3V1_HD
YC11	1	LED+	O	DC0V/5V	LED control signal
	2	LED+	O	DC0V/5V	LED control signal
	3	VGH	-	DC23V	LCD High power output
	4	NC	-	-	Not used
	5	NC	-	-	Not used
	6	VGL	-	DC -8V	LCD Low power output
	7	U/D	O	DC0V/3.3V	Upper/Lower writing start point setting signal
	8	L/R	O	DC0V/3.3V	Left/Right writing start point setting signal
(YC11)	9	LED-	O	DC0V/5V	LED control signal
	10	LED-	O	DC0V/5V	LED control signal
	11	GND	-	-	Ground
	12	AVDD	-	DC10.64V	LCD Analog power output
	13	SEL	O	DC0V/3.3V	Mode select signal
	14	NC	-	-	Not used
	15	NC	-	-	Not used
	16	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	17	NC	-	-	Not used
	18	NC	-	-	Not used
	19	GND	-	-	Ground
	20	RxIN3+	O	LVDS	Display data signal
	21	RxIN3-	O	LVDS	Display data signal
	22	GND	-	-	Ground
	23	RxINCK+	O	LVDS	Display data signal
	24	RxINCK-	O	LVDS	Display data signal
	25	GND	-	-	Ground
	26	RxIN2+	O	LVDS	Display data signal
	27	RxIN2-	O	LVDS	Display data signal
	28	GND	-	-	Ground
	29	RxIN1+	O	LVDS	Display data signal
	30	RxIN1-	O	LVDS	Display data signal
	31	GND	-	-	Ground
	32	RxIN0+	O	LVDS	Display data signal
	33	RxIN0-	O	LVDS	Display data signal
	34	GND	-	-	Ground
	35	STBYB	O	DC0V/3.3V	Standby signal
	36	RESET	O	DC0V/3.3V	Reset signal
	37	NC	-	-	Not used
	38	VDD	-	DC3.3V	LCD Driver power output
	39	VDD	-	DC3.3V	LCD Driver power output
	40	VCOM	O	DC4.25V	LCD Common power output
YC12	1	GND	-	-	Ground
	2	LCD_OFF	I	DC0V/3.3V	LCD supply sequence control signal
	3	LOCKN	I	DC0V/3.3V	Lock signal
	4	GND	-	-	Ground
	5	RNP	I	DC0V/3.3V(pulse)	Image data signal
	6	RXP	I	DC0V/3.3V(pulse)	Image data signal
	7	GND	-	-	Ground
YC13	1	SWDCLK	O	DC0V/3.3V(pulse)	Clock signal for debug
	2	SWDIO	I/O	DC0V/3.3V(pulse)	Data signal for debug
	3	GND	-	-	Ground
	4	NC	-	-	Not used
	5	VDD	-	DC3.3V	DC3.3V power output
	6	VDD	-	DC3.3V	DC3.3V power output
(YC13)	7	SCL	O	DC0V/3.3V(pulse)	I2C clock signal
	8	SDA	I/O	DC0V/3.3V(pulse)	I2C data signal
	9	INT	I	DC0V/3.3V	Touch screen interrupt signal
	10	RST	O	DC0V/3.3V	Touch screen reset signal
	11	GND	-	-	Ground
	12	GND	-	-	Ground

### (13)IH PWB

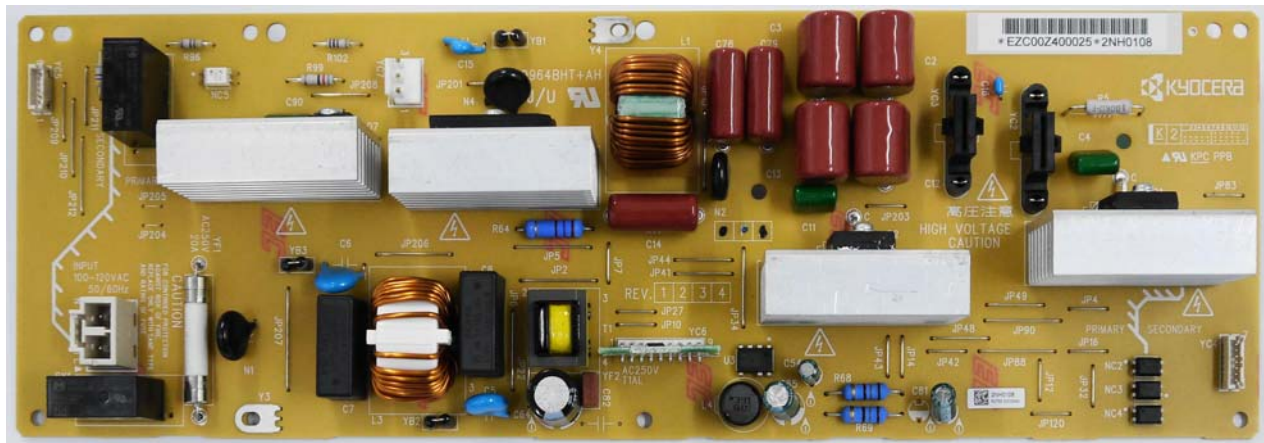
#### Connector position



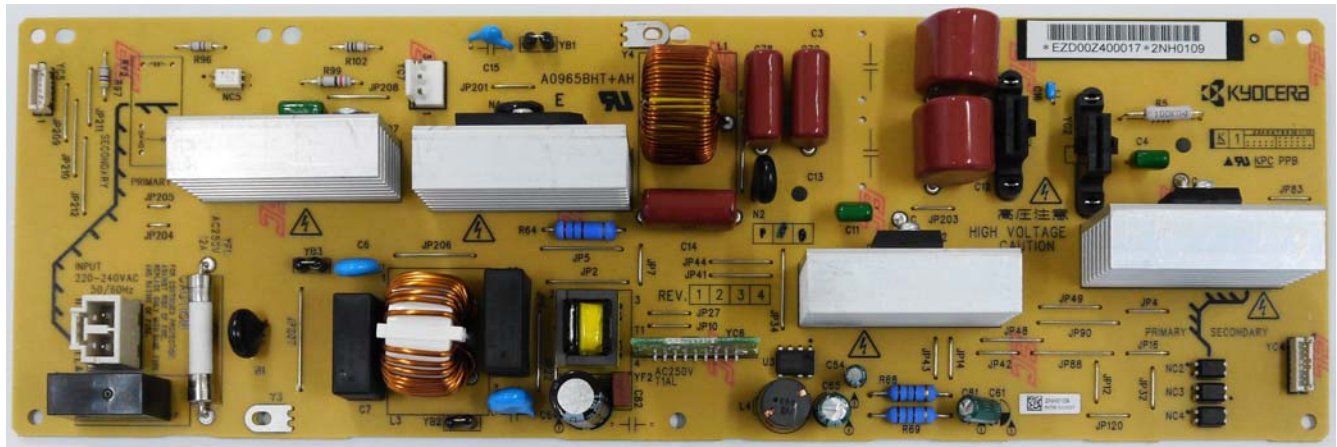
Connector	Destination
YC1	Inlet 2 (100V), Power source PWB(120V/220-240V)
YC2	IH unit
YC3	IH unit
YC4	Engine PWB
YC5	Feed PWB
YC7	Fuser thermostat 2, Fuser heater

#### PWB photograph

(100V/120V)



(220-240V)



### Connector table

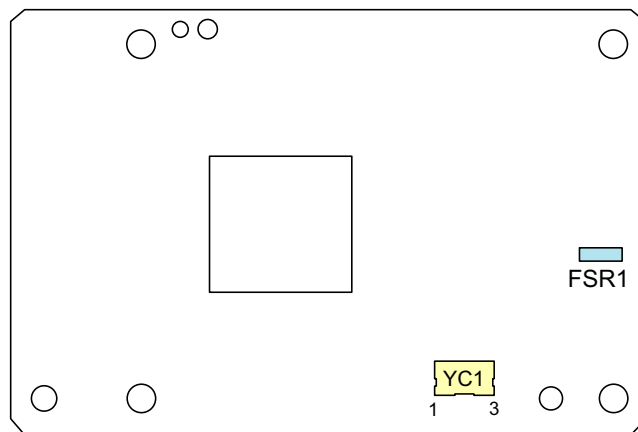
Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	LIVE	I	AC100V	AC power input
				120V AC	*The voltage value depends on the destination
	2	NEUTRAL	I	220-240V AC	AC power input
				120V AC	*The voltage value depends on the destination
				220-240V AC	
YC2	1	COIL_LIVE	O	AC65V to 160V	Resonant circuit output to the IH coil
YC3	1	COIL_COM	O	AC65V to 160V	Resonant circuit output to the IH coil
YC4	1	RXD(Engine)	O	DC0V/3.3V(pulse)	Serial communication data signal
	2	RXD(Engine)	I	DC0V/3.3V(pulse)	Serial communication data signal
	3	IH_ERROR	O	DC0V/3.3V	IH error signal
	4	IH_IGBT_CLK_LO W	I	DC0V/3.3V(pulse)	IH Clock signal (LOW)
	5	IH_IGBT_CLK_HI G	I	DC0V/3.3V(pulse)	IH Clock signal (High)
	6	+3.3V2_FUSE	I	DC3.3V	DC3.3V power input
	7	GND	-	-	Ground
YC5	1	RELAY_24V	I	DC0V/3.3V	24V power for the electric strength test
	2	+24V2_FUSE	I	DC24V	DC24V power output
	3	FSR_RELAY	O	DC0V/3.3V	Fuser relay drive control signal
	4	GND	-	-	Ground
	5	+24V2_IL	-	DC24V	DC24V power
	6	PRESS_REM	I	DC3.3V	Press heater drive control signal



Connector	Pin	Signal	I/O	Voltage	Description
YC7	1	LIVE_OUT	O	AC100V 120V AC 220-240V AC	AC power output  *The voltage value depends on the destination
	2	-	-	-	-
	3	NEUTRAL_OUT	O	AC100V 120V AC 220-240V AC	AC power output  *The voltage value depends on the destination

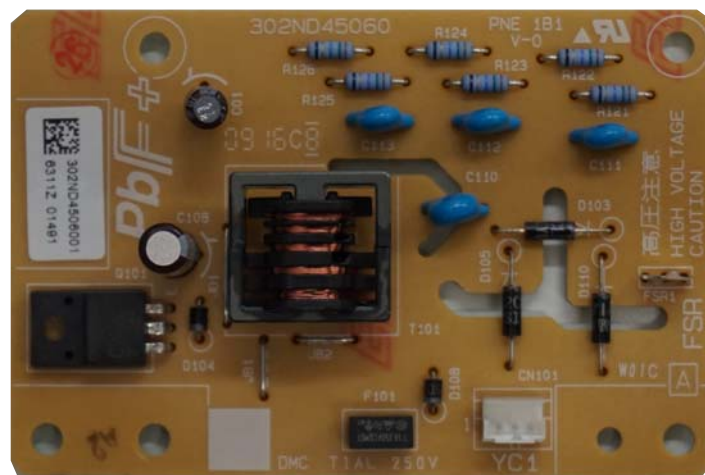
**(14)Fuser high-voltage PWB**

**Connector position**



Connector	Destination
YC1	Feed PWB
FSR1	Fuser discharger meedle

**PWB photograph**

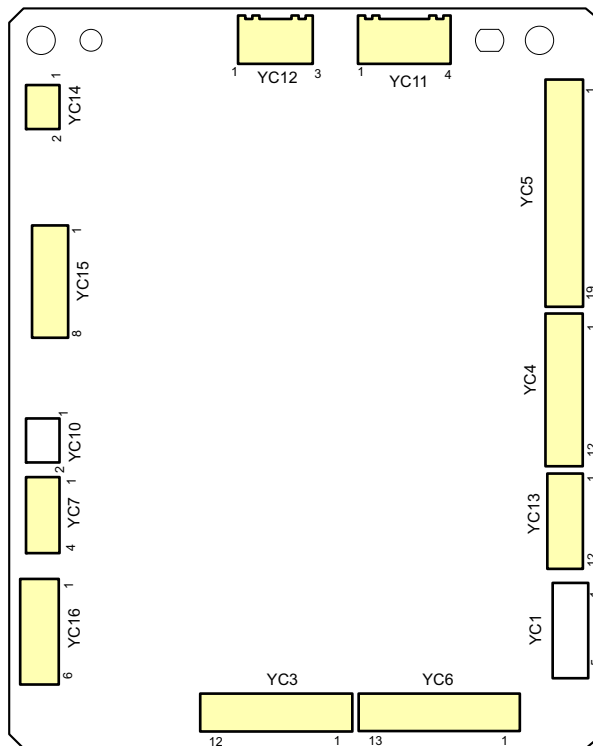


**Connector table**

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	FSR_OFFSET_CN T	I	Analog	Fuser high voltage control voltage
	2	+24V2_IL	I	DC24V	DC24V power input
	3	GND	-	-	Ground

**(15)PF main PWB**

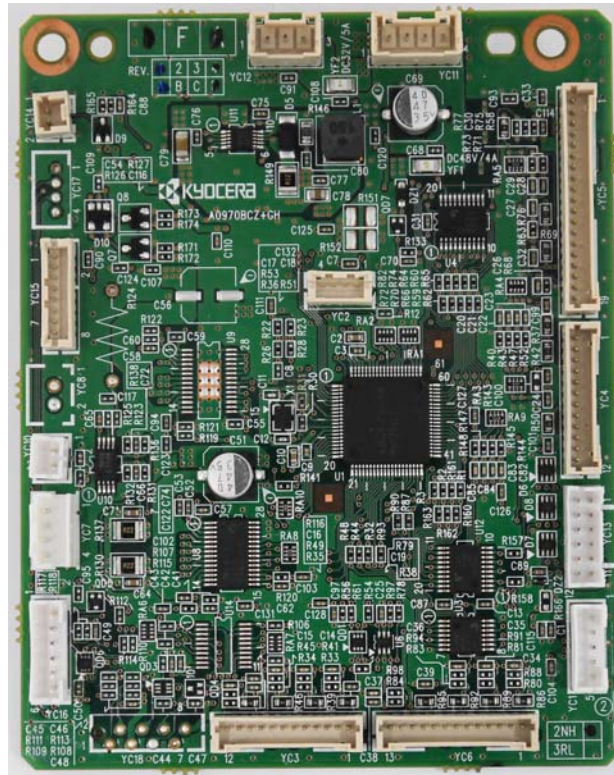
**Connector position**



Connector	Destination
YC3	PF paper size detection switch 1, PF upper/lower paper gauge sensor 1, PF cassette detection switch 1
YC4	PF paper sensor 2, PF lift sensor 2, PF paper feed sensor 2, PF conveying sensor 1
YC5	PF conveying cover switch, PF conveying sensor 1, PF conveying clutch 1, PF paper sensor 1, PF lift sensor 1, PF paper feed sensor 1
YC6	PF paper size detection switch 2, PF upper/lower paper gauge sensor 2, PF cassette detection switch 2
YC7	PF Lift motor 1, PF Lift motor 2
YC11	PF power source PWB
YC12	Side multi tray
YC13	Engine PWB (main body)
YC14	PF conveying unit switch

Connector	Destination
YC15	PF right paper feed clutch, PF left paper feed clutch, PF conveying clutch 2, PF conveying clutch 3
YC16	Paper feed motor

**PWB photograph**



**Connector table**

Connector	Pin	Signal	I/O	Voltage	Description
YC3	1	RDPSW1_3.3V1	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	RDPSW1	I	DC0V/3.3V	PF lower paper gauge sensor 1
	4	RDPSW2_3.3V1	O	DC3.3V	DC3.3V power output
	5	GND	-	-	Ground
	6	RDPSW2	I	DC0V/3.3V	PF upper paper gauge sensor 1
	7	SZSW1_3.3V1	O	DC3.3V	DC3.3V power output
	8	GND	-	-	Ground
	9	SZSW1	I	DC0V/3.3V	PF paper size detection switch 1
	10	DEK_OPN2_3.3V2	O	DC3.3V	DC3.3V power output
	11	GND	-	-	Ground
	12	DEK_OPN2	O	DC0V/3.3V	PF cassette detection switch 1
YC4	1	EPLSW_3.3V5	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground

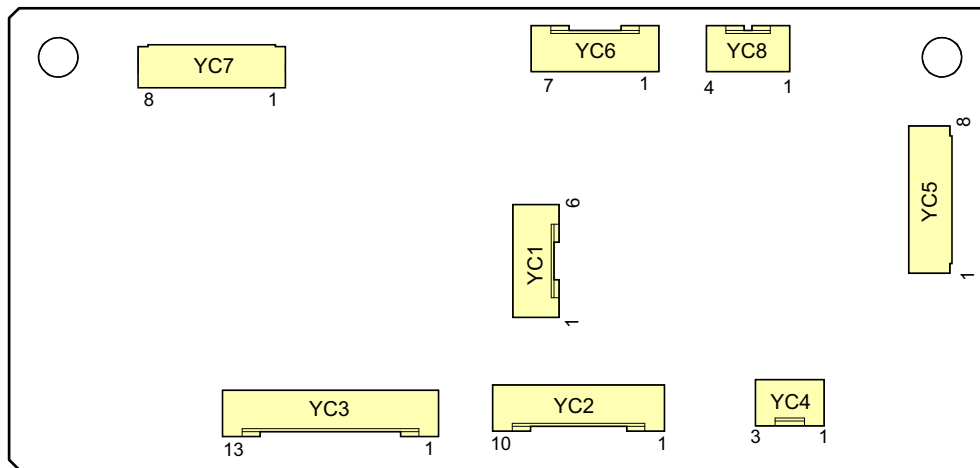
Connector	Pin	Signal	I/O	Voltage	Description
	3	EPLSW	I	DC0V/3.3V	PF paper sensor 2
	4	LULMSW_3.3V5	O	DC3.3V	DC3.3V power output
	5	GND	-	-	Ground
	6	LULMSW	I	DC0V/3.3V	PF lift sensor 2
	7	3.3V5	O	DC3.3V	DC3.3V power output
	8	P0LSW	I	DC0V/3.3V	PF paper feed sensor 2
	9	GND	-	-	Ground
	10	HCVSW1_3.3V5	O	DC3.3V	DC3.3V power output
	11	GND	-	-	Ground
	12	HCVSW1	I	DC0V/3.3V	PF conveying sensor 1
YC5	1	GND	-	-	Ground
	2	CVROP_SW	I	DC0V/3.3V	PF conveying cover switch
	3	VER_CL	O	DC0V/24V	PF conveying clutch 1: On/Off
	4	+24V1	O	DC24V	DC24V power output
	5	VCVSW_3.3V1	O	DC3.3V	DC3.3V power output
	6	GND	-	-	Ground
	7	VCVSW	I	DC0V/3.3V	PF conveying sensor 1
	8	+24V1	-	-	Not used
	9	FDR_SOLA	-	-	Not used
	10	FDR_SOLK	-	-	Not used
	11	EPRSW_3.3V1	O	DC3.3V	DC3.3V power output
	12	GND	-	-	Ground
	13	EPRSW	I	DC0V/3.3V	PF paper sensor 1
	14	RULMSW_3.3V1	O	DC3.3V	DC3.3V power output
	15	GND	-	-	Ground
	16	RULMSW	I	DC0V/3.3V	PF lift sensor 1
	17	3.3V1	O	DC3.3V	DC3.3V power output
	18	P0RSW	I	DC0V/3.3V	PF paper feed sensor 1
	19	GND	-	-	Ground
YC6	1	LDPSW1_3.3V1	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	LDPSW1	I	DC0V/3.3V	PF lower paper gauge sensor 2
	4	LDPSW2_3.3V1	O	DC3.3V	DC3.3V power output
	5	GND	-	-	Ground
	6	LDPSW2	I	DC0V/3.3V	PF upper paper gauge sensor 2
	7	SZSW2_3.3V1	O	DC3.3V	DC3.3V power output

Connector	Pin	Signal	I/O	Voltage	Description
	8	GND	-	-	Ground
	9	SZSW2	I	DC0V/3.3V	PF paper size detection switch 2
	10	DEK_OPN1_3.3V4	O	DC3.3V	DC3.3V power output
	11	GND	-	-	Ground
	12	DEK_OPN1	I	DC0V/3.3V	PF cassette detection switch 2
	13	NC	-	-	-
YC7	1	OUT1B(L_2)	O	DC0V/24V(pulse)	Lift motor 1 control signal
	2	OUT1A(L_1)	O	DC0V/24V(pulse)	Lift motor 1 control signal
	3	OUT2B(R_2)	O	DC0V/24V(pulse)	Lift motor 2 control signal
	4	OUT2A(R_1)	O	DC0V/24V(pulse)	Lift motor 2 control signal
YC10	1	LVU_FAN	-	-	Not used
	2	+24V2_F1	-	-	Not used
YC11	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	+V242	O	DC24V	DC24V power output
	4	+V242	O	DC24V	DC24V power output
YC12	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	+24V2_F2	O	DC24V	DC24V power output
YC13	1	EN_SDO	O	DC0V/3.3V(pulse)	Serial communication data signal
	2	EN_SDI	I	DC0V/3.3V(pulse)	Serial communication data signal
	3	EN_CLK	I	DC0V/3.3V(pulse)	Clock signal
	4	EN_SEL	I	DC3.3V	Selector signal
	5	EN_RDY	O	DC0V/3.3V	Ready signal
	6	EN_PAU	I	DC0V/3.3V	Pause signal
	7	DEK_OPN1	O	DC0V/3.3V	PF cassette 1 open/close detection signal
	8	DEK_OPN2	O	DC0V/3.3V	Cassette 2 open/close signal
	9	+3.3V4	O	DC3.3V	DC3.3V power output
	10	GND	-	-	Ground
	11	-	-	-	Not used
	12	PF_FINAL_SENS	O	DC0V/3.3V	PF conveying sensor 1: On/Off
YC14	1	HOR_UNIT	I	DC0V/3.3V	Horizontal conveying unit open/close detection
	2	3.3V1	O	DC3.3V	DC3.3V power output
YC15	1	FDR_CL	O	DC0V/24V	Paper feed R_CL: On/Off
	2	+24V1	O	DC24V	DC24V power output

Connector	Pin	Signal	I/O	Voltage	Description
	3	HOR_CL1	O	DC0V/24V	Horizontal conveying unit CL1: On/Off
	4	+24V1	O	DC24V	DC24V power output
	5	HOR_CL2	O	DC0V/24V	Horizontal conveying unit CL2: On/Off
	6	+24V1	O	DC24V	DC24V power output
	7	FDL_CL	O	DC0V/24V	Paper feed L_CL: On/Off
	8	+24V2	O	DC24V	DC24V power output
YC16	1	MMOT_DIR	O	DC0V/5V	Main motor rotation direction
YC16	2	MMOT_RDY	O	DC0V/5V	Main motor ready waiting signal
	3	MMOT_CLK	O	DC0V/5V	Main motor clock signal
	4	MMOT_REM	O	DC0V/5V	Main motor remote signal
	5	GND	-	-	Ground
	6	+24V1	O	DC24V	DC24V power output

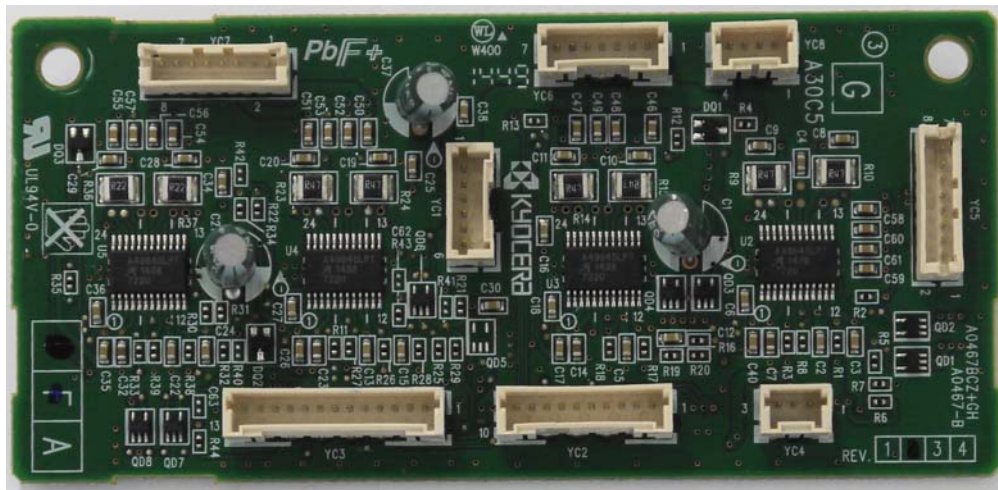
**(16)BR PWB**

**Connector position**



Connector	Destination
YC1	Engine PWB
YC2	Engine PWB
YC3	Engine PWB
YC4	BR conveying sensor 2
YC5	BR conveying decurler motor, BR conveying guide motor
YC6	BR conveying sensor 1, BR conveying unit switch
YC7	BR conveying motor 1, BR conveying motor 2
YC8	BR conveying decurler sensor

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	+24V3	I	DC24V	DC24V power input from Main body
	2	+24V3	I	DC24V	DC24V power input from Main body
	3	GND	-	-	Ground
	4	GND	-	-	Ground
	5	+5V2	I	DC5V	DC5V power input from Main body
	6	GND	-	-	Ground
YC2	1	DECAL DIR	O	DC0V/3.3V	BR conveying decurler motor drive switching signal
	2	DECAL PD	O	DC0V/3.3V	BR conveying decurler motor control signal
	3	DECAL CLK	O	DC0V/3.3V(pulse)	BR conveying decurler motor clock signal
	4	DECAL MODE	O	DC0V/3.3V	BR conveying decurler motor control signal
	5	DECAL REM	O	DC0V/3.3V	BR conveying decurler motor: On/Off
	6	GUIDE DIR	O	DC0V/3.3V	BR conveying guide motor drive switching signal
	7	GUIDE PD	O	DC0V/3.3V	BR conveying guide motor control signal
	8	GUIDE CLK	O	DC0V/3.3V(pulse)	BR conveying guide motor clock signal
	9	GUIDE REM	O	DC0V/3.3V	BR conveying guide motor: On/Off
	10	DECAL_HP_SENS	I	DC0V/3.3V	BR conveying decurler sensor: On/Off
YC3	1	BRIDGE1_SENS	O	DC0V/5V	BR conveying sensor 1: On/Off
	2	OPEN_SENS	O	DC0V/5V	BR conveying unit switch: On/Off

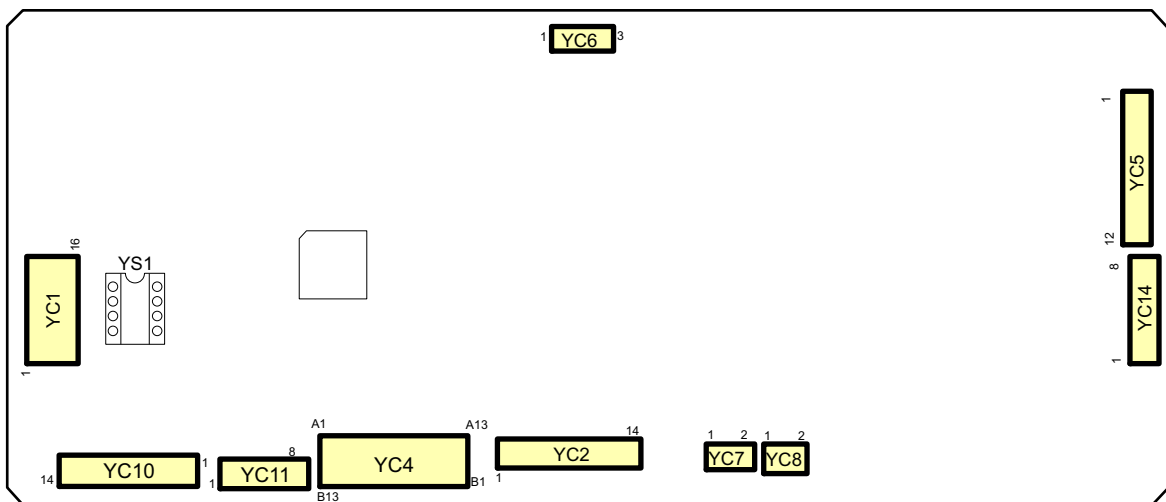
Connector	Pin	Signal	I/O	Voltage	Description
	3	BRIDGE2_SENS	O	DC0V/5V	BR conveying sensor 2: On/Off
	4	BRIDGE1_DIR	I	DC0V/5V	BR conveying motor 1 control signal
	5	BRIDGE1_PD	I	DC0V/5V	BR conveying motor 1 control signal
	6	BRIDGE1_CLK	I	DC0V/5V(pulse)	BR conveying motor 1 clock signal
	7	BRIDGE1_MODE/ BRIDGE_SET	I	DC0V/5V	BR conveying motor 1 mode signal
	8	BRIDGE1_REM	I	DC0V/5V	BR conveying motor 1: On/Off
	9	BRIDGE2_DIR	I	DC0V/5V	BR conveying motor 2 control signal
	10	BRIDGE2_PD	I	DC0V/5V	BR conveying motor 2 control signal
	11	BRIDGE2_CLK	I	DC0V/5V(pulse)	BR conveying motor 2 clock signal
	12	BRIDGE2_MODE	I	DC0V/5V	BR conveying motor 2 mode signal
	13	BRIDGE2_REM	I	DC0V/5V	BR conveying motor 2: On/Off
YC4	1	GND	-	-	Ground
	2	BRIDGE2_SENS	I	DC0V/5V	BR conveying sensor 2: On/Off
	3	+5V2	O	DC5V	DC5V power output to BR conveying sensor 2
YC5	1	DECAL_B/	O	DC0V/24V(pulse)	BR conveying decurler motor drive control signal
	2	DECAL_A/	O	DC0V/24V(pulse)	BR conveying decurler motor drive control signal
	3	DECAL_B	O	DC0V/24V(pulse)	BR conveying decurler motor drive control signal
	4	DECAL_A	O	DC0V/24V(pulse)	BR conveying decurler motor drive control signal
	5	GUIDE_B/	O	DC0V/24V(pulse)	BR conveying guide motor drive control signal
	6	GUIDE_A/	O	DC0V/24V(pulse)	BR conveying guide motor drive control signal
	7	GUIDE_B	O	DC0V/24V(pulse)	BR conveying guide motor drive control signal
	8	GUIDE_A	O	DC0V/24V(pulse)	BR conveying guide motor drive control signal
YC6	1	GND	-	-	Ground
	2	BRIDGE1_SENS	I	DC0V/5V	BR conveying sensor 1: On/Off
	3	+5V2	O	DC5V	DC5V power output to BR conveying sensor 1
	4	GND	-	-	Ground
	5	OPEN_SENS	I	DC0V/5V	BR conveying unit switch: On/Off
	6	+5V2	O	DC5V	DC5V power output to BR conveying unit switch
	7	NC	-	-	Not used



Connector	Pin	Signal	I/O	Voltage	Description
YC7	1	BRIDGE1_B/	O	DC0V/24V(pulse)	BR conveying motor 1 drive control signal
	2	BRIDGE1_A/	O	DC0V/24V(pulse)	BR conveying motor 1 drive control signal
	3	BRIDGE1_B	O	DC0V/24V(pulse)	BR conveying motor 1 drive control signal
	4	BRIDGE1_A	O	DC0V/24V(pulse)	BR conveying motor 1 drive control signal
	5	BRIDGE2_B/	O	DC0V/24V(pulse)	BR conveying motor 2 drive control signal
	6	BRIDGE2_A/	O	DC0V/24V(pulse)	BR conveying motor 2 drive control signal
	7	BRIDGE2_B	O	DC0V/24V(pulse)	BR conveying motor 2 drive control signal
	8	BRIDGE2_A	O	DC0V/24V(pulse)	BR conveying motor 2 drive control signal
YC8	1	NC	-	-	Not used
	2	GND	-	-	Ground
	3	DECAL_HP_SENS	I	DC0V/5V	BR conveying decurler sensor: On/ Off
	4	+5V2	O	DC5V	DC5V power output to BR conveying decurler sensor

**(17)DP main PWB**

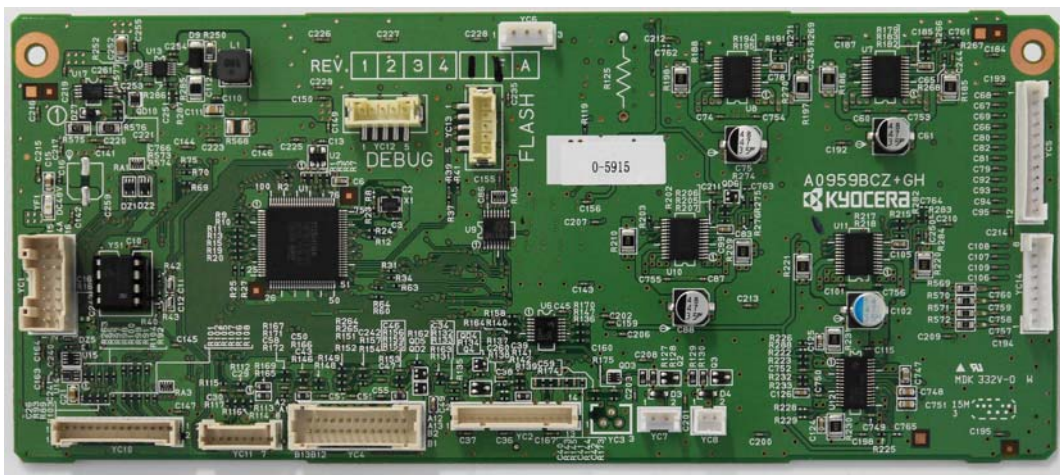
**Connector position**



Connector	Destination
YC1	Engine PWB
YC2	DP original length sensor, DP original detection sensor, DP lift lower limit sensor, DP original width sensor
YC4	DP lift upper limit sensor, DP paper feed sensor, DP eject sensor, LED PWB, DP CCD sensor, DP open/close sensor

Connector	Destination
YC5	DP paper feed motor, DP registration motor, DP lift motor
YC6	DP top cover switch
YC7	DP drive fan motor
YC8	DP CIS fan motor
YC10	SHD PWB
YC11	Multi feed sensor
YC14	DP conveying motor, DP eject motor

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	ENG_TMG	O	DC0V/3.3V	Timing signal
	2	ENG_RDY	O	DC0V/3.3V	Serial communication ready signal
	3	ENG_SEL	I	DC0V/3.3V	Serial communication select signal
	4	ENG_CLK	I	DC0V/3.3V(pulse)	Serial communication clock signal
	5	ENG_SI	I	DC0V/3.3V(pulse)	Serial communication data signal
	6	ENG_SO	O	DC0V/3.3V(pulse)	Serial communication data signal
	7	DP_OPEN	O	DC0V/3.3V	DP open/close sensor: On/Off
	8	EN_FD_SW	O	DC0V/3.3V	DP original feed sensor: On/Off
	9	EN_SET_SW	O	DC0V/3.3V	DP original sensor: On/Off
	10	+3.3V3	I	DC0V/3.3V	DC3.3V power input
	11	GND	-	-	Ground
	12	GND	-	-	Ground
	13	GND	-	-	Ground
	14	+24V	I	DC24V	DC24V power output
	15	+24V	I	DC24V	DC24V power output

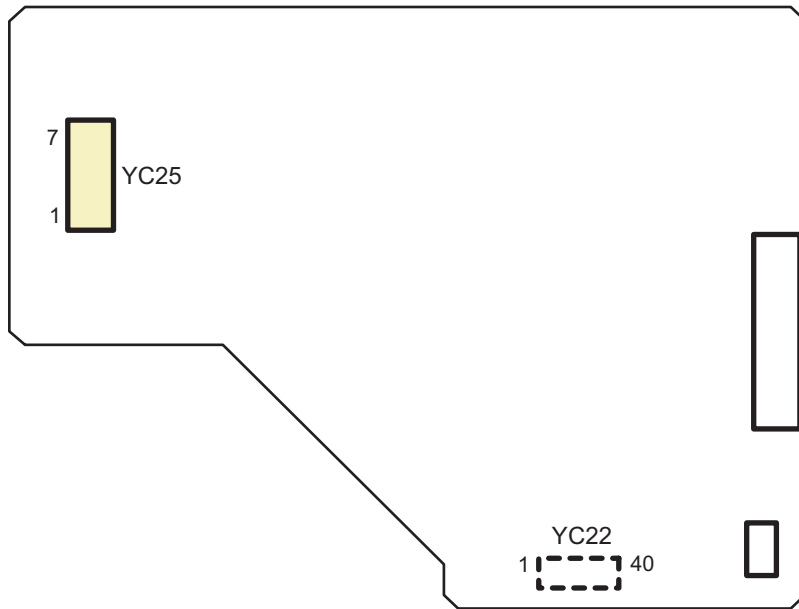
Connector	Pin	Signal	I/O	Voltage	Description
	16	+24V	I	DC24V	DC24V power output
YC2	1	3.3V	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	LNG_SW	I	DC0V/3.3V	DP original length sensor: On/Off
	4	LNG_CLK	O	DC0V/3.3V(pulse)	Sensor LED clock signal
	5	GND	-	-	Ground
	6	SET_SW	I	DC0V/3.3V	DP original sensor: On/Off
	7	3.3V	O	DC3.3V	DC3.3V power output
	8	ANODE	O	DC3.3V	DC3.3V power output
	9	GND	-	-	Ground
	10	LF_DNSW	I	DC0V/3.3V	DP lift lower limit sensor: On/Off
	11	WIDE3	I	DC0V/3.3V	DP original width sensor: On/Off
	12	WIDE2	I	DC0V/3.3V	DP original width sensor: On/Off
	13	GND	-	-	Ground
	14	WIDE1	I	DC0V/3.3V	DP original width sensor: On/Off
YC4	A01	ANODE	O	DC3.3V	DC3.3V power output
	A02	GND	-	-	Ground
	A03	LF_UPSW	I	DC0V/3.3V	DP lift upper limit sensor: On/Off
	A04	GND	-	-	Ground
	A05	FD_SW	I	DC0V/3.3V	DP original feed sensor: On/Off
	A06	+3.3V	O	DC3.3V	DC3.3V power output
	A07	GND	-	-	Not used
	A08	RGST_SW(V)	-	-	Not used
	A09	+3.3V	-	-	Not used
	A10	ANODE	O	DC3.3V	DC3.3V power output
	A11	GND	-	-	Ground
	A12	EXIT_SW(M)	I	DC0V/3.3V	DP eject sensor: On/Off
	A13	NC	-	-	Not used
	B01	NC	-	-	Not used
	B02	+24V	O	DC24V	DC24V power output
	B03	LED_REM	I	DC0V/3.3V	LED remote signal
	B04	GND	-	-	Not used
	B05	GND	-	-	Ground
	B06	CCD_TMG_SW	I	DC0V/3.3V	CCD sensor: On/Off
	B07	+3.3V	O	DC3.3V	DC3.3V power output
B08	ANODE	O	DC3.3V	DC3.3V power output	

Connector	Pin	Signal	I/O	Voltage	Description
	B09	GND	-	-	Ground
	B10	DP_OPEN	I	DC0V/3.3V	DP open/close sensor: On/Off
	B11	ANODE	-	-	Not used
	B12	GND	-	-	Not used
	B13	SKEW_SW	-	-	Not used
YC5	1	FEED_OUT2B	O	DC0V/24V(pulse)	DP original feed motor control signal
	2	FEED_OUT2A	O	DC0V/24V(pulse)	DP original feed motor control signal
	3	FEED_OUT1A	O	DC0V/24V(pulse)	DP original feed motor control signal
	4	FEED_OUT1B	O	DC0V/24V(pulse)	DP original feed motor control signal
	5	RGST_OUT2B	O	DC0V/24V(pulse)	DP registration motor control signal
	6	RGST_OUT2A	O	DC0V/24V(pulse)	DP registration motor control signal
	7	RGST_OUT1A	O	DC0V/24V(pulse)	DP registration motor control signal
	8	RGST_OUT1B	O	DC0V/24V(pulse)	DP registration motor control signal
	9	LIFT_OUT2B	O	DC0V/24V(pulse)	DP lift motor control signal
	10	LIFT_OUT2A	O	DC0V/24V(pulse)	DP lift motor control signal
	11	LIFT_OUT1A	O	DC0V/24V(pulse)	DP lift motor control signal
	12	LIFT_OUT1B	O	DC0V/24V(pulse)	DP lift motor control signal
YC6	1	+24V	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	+R24V	I	DC0V/24V	DC24V power input
YC7	1	R24V	O	DC24V	DC24V power output
	2	FAN_REM1	I	DC0/DC24V	Drive fan motor remote signal
YC8	1	R24V	O	DC24V	DC24V power output
	2	FAN_REM2	I	DC0/DC24V	CIS fan motor remote signal
YC10	1	CIS_TMG_SW	I	DC0V/3.3V	CIS sensor: On/Off
	2	SHD_CLK	O	DC0V/3.3V(pulse)	Serial communication clock signal
	3	SHD_SO	O	DC0V/3.3V(pulse)	Serial communication data signal
	4	SHD_SEL	O	DC0V/3.3V	Serial communication select signal
	5	SHD_PAGEST	O	DC0V/3.3V	Sub-scanning valid range timing input (VSYNC)
	6	RESETN	O	DC0V/3.3V	Reset signal
	7	SHD_OVMON	I	DC0V/3.3V	Monitoring signal for the sub-scanning effective range signal
	8	SHD_SI	I	DC0V/3.3V(pulse)	Serial communication data signal

Connector	Pin	Signal	I/O	Voltage	Description
	9	SHD_RDY	I	DC0V/3.3V	Serial communication synchronizing signal
	10	NC	-	-	-
	11	24V	O	DC24V	DC24V power output
	12	24V	O	DC24V	DC24V power output
	13	GND	-	-	Ground
	14	GND	-	-	Ground
YC11	1	SCLK	O	DC0V/3.3V(pulse)	Communication clock signal
	2	SDA	I/O	DC0V/3.3V(pulse)	Communication data signal
	3	1Piece_SIG	I	DC0V/3.3V	Paper detection signal
	4	2Piece_SIG	I	DC0V/3.3V	Paper detection signal
	5	GND	-	-	Ground
	6	3.3V	O	DC3.3V	DC3.3V power output
	7	GND	-	-	Ground
	8	24V	O	DC24V	DC24V power output
YC14	1	CNVY4_OUT2B	O	DC0V/24V(pulse)	DP conveying motor control signal
	2	CNVY3_OUT2A	O	DC0V/24V(pulse)	DP conveying motor control signal
	3	CNVY2_OUT1B	O	DC0V/24V(pulse)	DP conveying motor control signal
	4	CNVY1_OUT1A	O	DC0V/24V(pulse)	DP conveying motor control signal
	5	REVE4_OUT1B	O	DC0V/24V(pulse)	DP eject motor control signal
	6	REVE2_OUT1A	O	DC0V/24V(pulse)	DP eject motor control signal
	7	REVE1_OUT2A	O	DC0V/24V(pulse)	DP eject motor control signal
	8	REVE3_OUT2B	O	DC0V/24V(pulse)	DP eject motor control signal

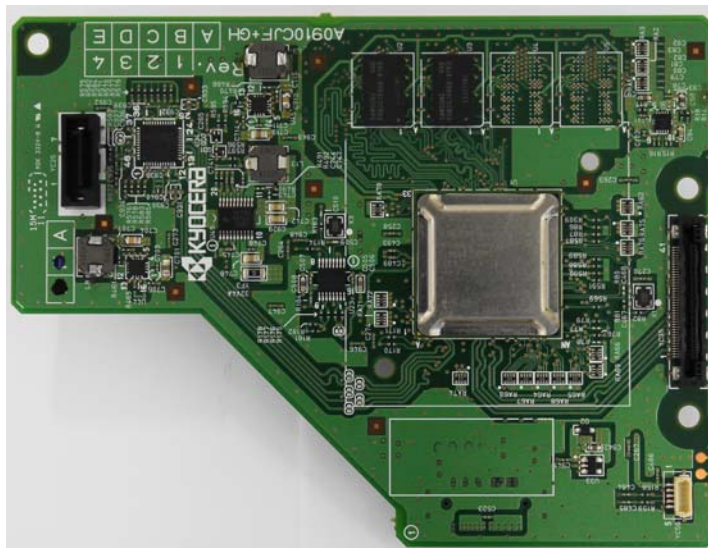
### (18)DP relay PWB

#### Connector position



Connector	Destination
YC22	Main PWB
YC25	SHD PWB

#### PWB photograph



#### Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC22	1	GND	-	-	Ground
	2	GND(DP_CONNECTION)	-	-	Ground
	3	GND	I	DC0V/1.8V	Main PWB connection detection

Connector	Pin	Signal	I/O	Voltage	Description
	4	PCIEEP_TXDP0	-	-	Ground
	5	5.0V3	I	LVDS	Image data signal
	6	PCIEN_DP2M	I	DC5V	DC5V power input
	7	5.0V3	I	LVDS	Image data signal
	8	GND	I	DC5V	DC5V power input
	9	5.0V3	-	-	Ground
	10	GND	I	DC5V	DC5V power input
	11	5.0V3	-	-	Ground
	12	PCIEP_M2DP	I	DC5V	DC5V power input
	13	5.0V3	O	LVDS	Image data signal
	14	PCIEN_M2DP	I	DC5V	DC5V power input
	15	5.0V3	O	LVDS	Image data signal
	16	GND	I	DC5V	DC5V power input
	17	5.0V3	-	-	Ground
	18	GND	I	DC5V	DC5V power input
	19	5.0V3	-	-	Ground
	20	PCIEP_REFCLK_D P2M	I	DC5V	DC5V power input
	21	GND	I	LVDS	Image clock signal
	22	PCIEN_REFCLK_D P2M	-	-	Ground
	23	GND	I	LVDS	Image clock signal
	24	GND	-	-	Ground
	25	GND	-	-	Ground
	26	GND	-	-	Ground
	27	GND	-	-	Ground
	28	PCIERC_SWRST_ N_M2DP	-	-	Ground
	29	GND	I	DC0V/3.3V	Reset input
	30	DP_RST_N	-	-	Ground
	31	GND	I	DC0V/3.3V	Reset input
	32	GND	-	-	Ground
	33	GND	-	-	Ground
	34	GND	-	-	Ground
	35	GND	-	-	Ground
	36	GND	-	-	Ground
	37	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	38	GND	-	-	Ground
	39	GND	-	-	Ground
	40	GND	-	-	Ground
YC25	1	GND	-	-	Ground
	2	HTPDN	-	-	Not connected
	3	LOCKN	O	DC0V/3.3V	Control signal
	4	GND	-	-	Ground
	5	RX0N	I	LVDS	Image data
	6	RX0P	I	LVDS	Image data
	7	GND	-	-	Ground

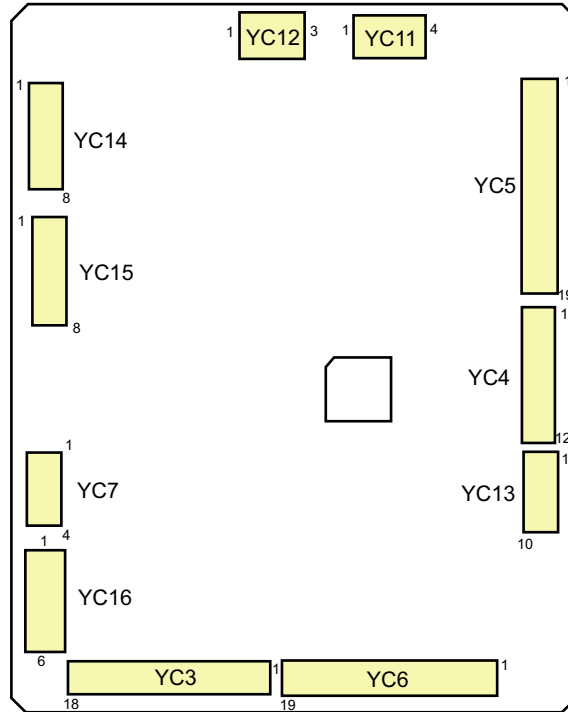
\*:The voltage value depends on the destination



## 8 - 2 Description for PWB (OPTION)

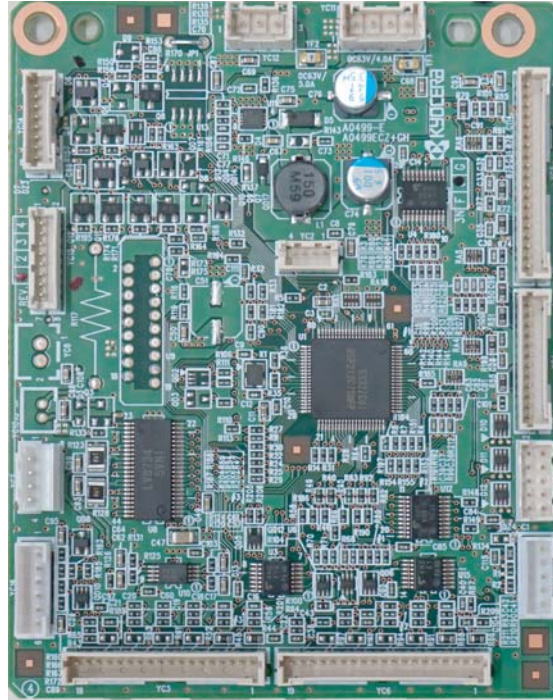
### (1)PF main PWB (PF-730(B))

#### Connector position



Connector	Destination
YC3	PF paper length switch 1, PF paper width switch 1, PF upper/lower paper gauge sensor 2
YC4	SHD PWB
YC5	PF conveying cover switch, PF conveying sensor 2, PF conveying clutch 1, PF paper sensor 1, PF lift sensor 1, PF paper feed sensor 1
YC6	PF paper length switch 2, PF paper width switch 2, PF upper/lower paper gauge sensor 1
YC7	PF Lift motor 1, PF Lift motor 2
YC11	Engine PWB (main body)
YC12	Side multi tray
YC13	Engine PWB (main body)
YC15	PF paper feed clutch 1, PF paper feed clutch 2, PF conveying clutch 1, PF conveying clutch 2
YC16	PF paper feed motor

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC3	1	DDEP1_SW_PW	O	DC1.2V	DC1.2V power output
	2	GND	-	-	Ground
	3	DDEP1_SW	I	DC0V/3.3V	PF upper paper gauge sensor 2: On/Off
	4	DDEP2_SW_PW	O	DC1.2V	DC1.2V power output
	5	GND	-	-	Ground
	6	DDEP2_SW	I	DC0V/3.3V	PF lower paper gauge sensor 2: On/Off
	7	NC	-	-	Not used
	8	NC	-	-	Not used
	9	DSIZE1_SW	I	DC0V/3.3V	PF paper length switch 1: On/Off
	10	NC	-	-	Not used
	11	NC	-	-	Not used
	12	DSIZE2_SW	I	DC0V/3.3V	PF paper length switch 1: On/Off
	13	NC	-	-	Not used
	14	GND	-	-	Ground
	15	DSIZE3_SW	I	DC0V/3.3V	PF paper length switch 1: On/Off
	16	NC	-	-	Not used
	17	GND	-	-	Ground
	18	DSIZE4_SW	I	DC0V/3.3V	PF paper width switch 1: On/Off
YC4	1	EMPD_SW_PW	O	DC1.2V	DC1.2V power output

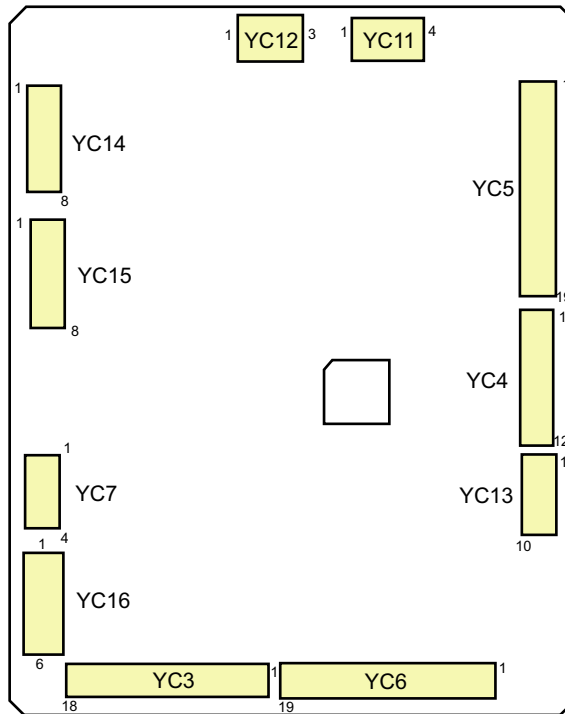
Connector	Pin	Signal	I/O	Voltage	Description
	2	GND	-	-	Ground
	3	EMPD_SW	I	DC0V/3.3V	PF paper sensor 2: On/Off
	4	LMTU_SW_PW	O	DC1.2V	DC1.2V power output
	5	GND	-	-	Ground
	6	LMTD_SW	I	DC0V/3.3V	PF lift sensor 2: On/Off
	7	3.3V3	O	DC3.3V	DC3.3V power output
	8	FDD_SW	I	DC0V/3.3V	PF paper feed sensor 2: On/Off
	9	GND	-	-	Ground
	10	HFD1_SW_PW	O	DC1.2V	DC1.2V power output
	11	GND	-	-	Ground
	12	HFDU_SW	I	DC0V/3.3V	PF conveying sensor 1: On/Off
YC5	1	GND	-	-	Ground
	2	RCOV_SW	I	DC0V/3.3V	PF conveying cover switch: On/Off
	3	NC	-	-	Not used
	4	NC	-	-	Not used
	5	DVFD_SW_PW	O	DC1.2V	DC1.2V power output
	6	GND	-	-	Ground
	7	VFDSW	I	DC0V/3.3V	PF conveying sensor 2: On/Off
	8	24V	-	-	Not used
	9	PFU_SOL_ACT	-	-	Not used
	10	PFU_SOL_KEP	-	-	Not used
	11	UEMP_SW_PW	O	DC1.2V	DC1.2V power output
	12	GND	-	-	Ground
	13	UEMP_SW	I	DC0V/3.3V	PF paper sensor 1: On/Off
	14	ULIM_SW_PW	O	DC1.2V	DC1.2V power output
	15	GND	-	-	Ground
	16	ULIM_SW	I	DC0V/3.3V	PF lift sensor 1: On/Off
	17	3.3V1	O	DC3.3V	DC3.3V power output
	18	UFD_SW	I	DC0V/3.3V	PF paper feed sensor 1: On/Off
	19	GND	-	-	Ground
YC6	1	UDEP1_SW_PW	O	DC1.2V	DC1.2V power output
	2	GND	-	-	Ground
	3	UDEP1_SW	I	DC0V/3.3V	PF upper paper gauge sensor 1: On/Off
	4	UDEP2_SW_PW	O	DC1.2V	DC1.2V power output
	5	GND	-	-	Ground
	6	UDEP2_SW	I	DC0V/3.3V	PF lower paper gauge sensor 1: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	7	NC	-	-	Not used
	8	NC	-	-	Not used
	9	DSIZE1_SW	I	DC0V/3.3V	PF paper length switch 2: On/Off
	10	NC	-	-	Not used
	11	NC	-	-	Not used
	12	DSIZE2_SW	I	DC0V/3.3V	PF paper length switch 2: On/Off
	13	NC	-	-	Not used
	14	GND	-	-	Ground
	15	DSIZE3_SW	I	DC0V/3.3V	PF paper length switch 2: On/Off
	16	NC	-	-	Not used
	17	GND	-	-	Ground
	18	DSIZE4_SW	I	DC0V/3.3V	PF paper width switch 2: On/Off
	19	NC	-	-	Not used
YC7	1	OUT2B	O	DC0V/24V(pulse)	PF Lift motor 2 drive control signal
	2	OUT2A	O	DC0V/24V(pulse)	PF Lift motor 2 drive control signal
	3	OUT1B	O	DC0V/24V(pulse)	PF Lift motor 1 drive control signal
	4	OUT1A	O	DC0V/24V(pulse)	PF Lift motor 1 drive control signal
YC11	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V1	I	DC24V	DC24V power input
	4	24V1	I	DC24V	DC24V power input
YC12	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V	O	DC24V	DC24V power output to Side deck/Side multi tray
YC13	1	ENG_SDO	O	DC0V/3.3V(pulse)	Communication data signal
	2	ENG_SDI	I	DC0V/3.3V(pulse)	Communication data signal
	3	ENG_CLK	I	DC0V/3.3V(pulse)	Communication clock signal
	4	ENG_SEL	I	DC0V/3.3V	Communication select signal
	5	ENG_RDY	O	DC0V/3.3V	Communication ready signal
	6	ENG_PAU	I	DC0V/3.3V	Communication pause signal
	7	DEK_OPN1	O	DC0V/3.3V	PF cassette 4 open/close signal output
	8	DEK_OPN2	O	DC0V/3.3V	PF cassette 3 open/close signal output
	9	+3.3V2	I	DC3.3V	DC3.3V power input
	10	GND	-	-	Ground
YC14	1	NC	-	-	Not used

Connector	Pin	Signal	I/O	Voltage	Description
	2	NC	-	-	Not used
	3	NC	-	-	Not used
	4	NC	-	-	Not used
	5	NC	-	-	Not used
	6	24V3	-	-	Not used
	7	DPF_SOL_ACT	-	-	Not used
	8	DPF_SOL_KEP	-	-	Not used
YC15	1	UFD_CL	O	DC0V/24V	PF conveying clutch 1: On/Off
	2	24V1	O	DC24V	DC24V power output
	3	UPF_CL	O	DC0V/24V	PF paper feed clutch 1: On/Off
	4	24V1	O	DC24V	DC24V power output
	5	DPF_CL	O	DC0V/24V	PF paper feed clutch 2: On/Off
	6	24V1	O	DC24V	DC24V power output
	7	DFD_CL	O	DC0V/24V	PF conveying clutch 2: On/Off
	8	24V1	O	DC24V	DC24V power output
YC16	1	CW/CCW	O	DC0V/24V	PF paper feed motor clockwise/reverse signal
	2	READY	I	DC0V/24V	PF paper feed motor ready signal
	3	CLOCK	O	DC0V/24V(pulse)	PF paper feed motor clock signal
	4	REMOTE	O	DC0V/24V	PF paper feed motor remote signal
	5	GND	-	-	Ground
	6	24V1	O	DC24V	DC24V power output

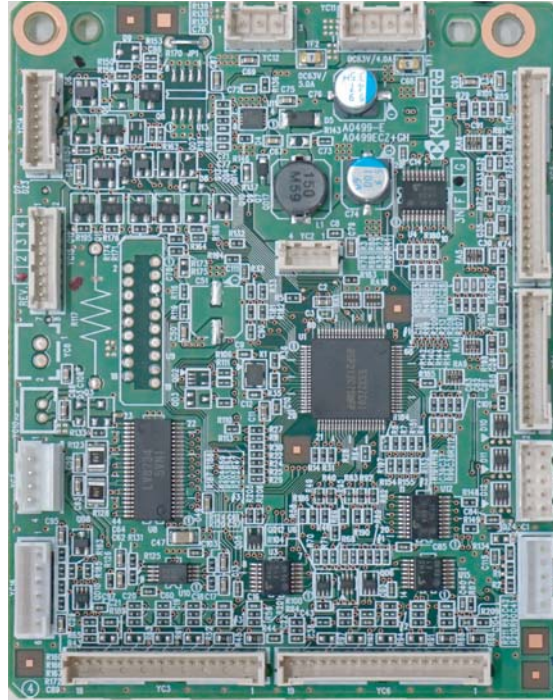
**(2)PF main PWB (PF-740(B))**

**Connector position**



Connector	Destination
YC3	PF paper size detection switch 1, PF cassette detection switch 1, PF upper/lower paper gauge sensor 1
YC4	PF paper sensor 2, PF lift sensor 2, PF feed sensor 2, PF conveying sensor 2, PF conveying clutch 1
YC5	PF conveying cover switch, PF conveying sensor 1, PF conveying clutch 1, PF paper sensor 1, PF lift sensor 1, PF paper feed sensor 1
YC6	PF paper size detection switch 2, PF cassette detection switch 2, PF upper/lower paper gauge sensor 2
YC7	PF Lift motor 1, PF Lift motor 2
YC11	Engine PWB (main body)
YC12	Side multi tray
YC13	Engine PWB (main body)
YC14	PF conveying unit switch
YC15	PF paper feed clutch 1, PF paper feed clutch 2, PF conveying clutch 2, PF conveying clutch 3
YC16	PF paper feed motor

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC3	1	RDEP_SW1_PW	O	DC1.2V	DC1.2V power output
	2	GND	-	-	Ground
	3	RDEP_SW1	I	DC0V/3.3V	PF lower paper gauge sensor 1: On/Off
	4	RDEP_SW2_PW	O	DC1.2V	DC1.2V power output
	5	GND	-	-	Ground
	6	RDEP_SW2	I	DC0V/3.3V	PF upper paper gauge sensor 1: On/Off
	7	NC	-	-	Not used
	8	NC	-	-	Not used
	9	NC	-	-	Not used
	10	NC	-	-	Not used
	11	NC	-	-	Not used
	12	NC	-	-	Not used
	13	SIZER_SW_PW	O	DC1.2V	DC1.2V power output
	14	GND	-	-	Ground
	15	SIZER_SW_PW	I	DC0V/3.3V	PF paper size detection switch 1: On/Off
	16	DEKR_SW_PW	O	DC1.2V	DC1.2V power output
	17	GND	-	-	Ground
	18	DEKR_SW	I	DC0V/3.3V	PF cassette detection switch 1: On/Off
YC4	1	EMPL_SW_PW	O	DC1.2V	DC1.2V power output

Connector	Pin	Signal	I/O	Voltage	Description
	2	GND	-	-	Ground
	3	EMPL_SW	I	DC0V/3.3V	PF paper sensor 2: On/Off
	4	LMTL_SW_PW	O	DC1.2V	DC1.2V power output
	5	GND	-	-	Ground
	6	LMTL_SW	I	DC0V/3.3V	PF lift sensor 2: On/Off
	7	3.3V3	O	DC3.3V	DC3.3V power output
	8	FDL_SW	I	DC0V/3.3V	PF paper feed sensor 2: On/Off
	9	GND	-	-	Ground
	10	HFD_SW1_PW	O	DC1.2V	DC1.2V power output
	11	GND	-	-	Ground
	12	HFD_SW1	I	DC0V/3.3V	PF conveying sensor 2: On/Off
YC5	1	GND	-	-	Ground
	2	RCOVER_SW	I	DC0V/3.3V	PF conveying cover switch: On/Off
	3	VFD_CL	O	DC0V/24V	PF conveying clutch 1: On/Off
	4	24V1	O	DC24V	DC24V power output
	5	VFD_SW_PW	O	DC1.2V	DC1.2V power output
	6	GND	-	-	Ground
	7	VFD_SW	I	DC0V/3.3V	PF conveying sensor 1: On/Off
	8	24V	-	-	Not used
	9	PFR_SOL_ACT	-	-	Not used
	10	PFR_SOL_KEP	-	-	Not used
	11	EMPR_SW_PW	O	DC1.2V	DC1.2V power output
	12	GND	-	-	Ground
	13	EMPR_SW	I	DC0V/3.3V	PF paper sensor 1: On/Off
	14	LIMR_SW_PW	O	DC1.2V	DC1.2V power output
	15	GND	-	-	Ground
	16	LIMR_SW	I	DC0V/3.3V	PF lift sensor 1: On/Off
	17	3.3V1	O	DC3.3V	DC3.3V power output
	18	FDR_SW	I	DC0V/3.3V	PF paper feed sensor 1: On/Off
	19	GND	-	-	Ground
YC6	1	LEDP_SW1_PW	O	DC1.2V	DC1.2V power output
	2	GND	-	-	Ground
	3	LDEP_SW1	I	DC0V/3.3V	PF lower paper gauge sensor 2: On/Off
	4	LDEP_SW2_PW	O	DC1.2V	DC1.2V power output
	5	GND	-	-	Ground
	6	LDEP_SW2	I	DC0V/3.3V	PF upper paper gauge sensor 2: On/Off

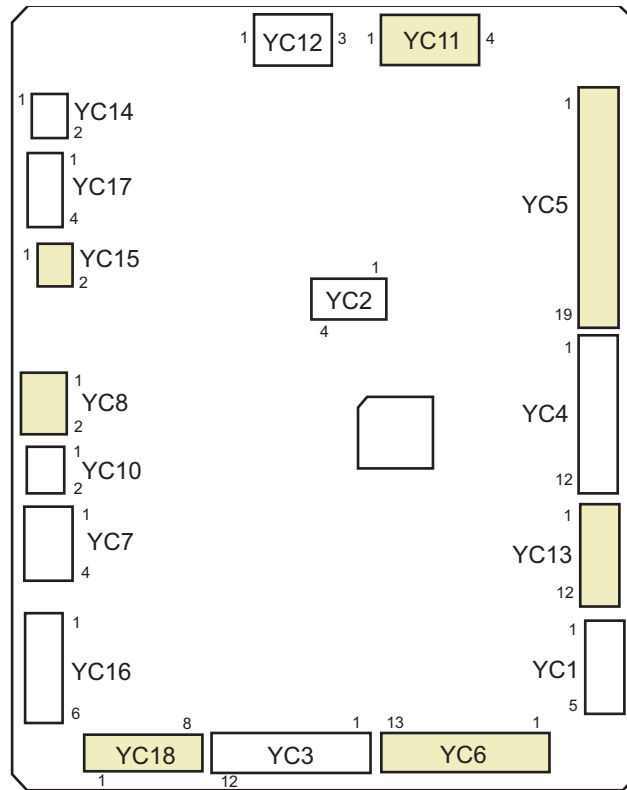


Connector	Pin	Signal	I/O	Voltage	Description
	7	LDEP_SW3_PW	-	-	Not used
	8	GND	-	-	Not used
	9	LDEP_SW3	-	-	Not used
	10	LDEP_SW4_PW	-	-	Not used
	11	GND	-	-	Not used
	12	LDEP_SW4	-	-	Not used
	13	SIZEL_SW_PW	O	DC1.2V	DC1.2V power output
	14	GND	-	-	Ground
	15	SIZEL_SW	I	DC0V/3.3V	PF paper size detection switch 2: On/Off
	16	DEKL_SW_PW	O	DC1.2V	DC1.2V power output
	17	GND	-	-	Ground
	18	DEKL_SW	I	DC0V/3.3V	PF cassette detection switch 2: On/Off
	19	NC	-	-	Not used
YC7	1	OUT2B	O	DC0V/24V(pulse)	PF Lift motor 2 drive control signal
	2	OUT2A	O	DC0V/24V(pulse)	PF Lift motor 2 drive control signal
	3	OUT1B	O	DC0V/24V(pulse)	PF Lift motor 1 drive control signal
	4	OUT1A	O	DC0V/24V(pulse)	PF Lift motor 1 drive control signal
YC11	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V2	I	DC24V	DC24V power input
	4	24V2	I	DC24V	DC24V power input
YC12	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V	O	DC24V	DC24V power output to Side deck/Side multi tray
YC13	1	ENG_SDO	O	DC0V/3.3V(pulse)	Communication data signal
	2	ENG_SDI	I	DC0V/3.3V(pulse)	Communication data signal
	3	ENG_CLK	I	DC0V/3.3V(pulse)	Communication clock signal
	4	ENG_SEL	I	DC0V/3.3V	Communication select signal
	5	ENG_RDY	O	DC0V/3.3V	Communication ready signal
	6	ENG_PAU	I	DC0V/3.3V	Communication pause signal
	7	DEK_OPN1	O	DC0V/3.3V	PF cassette 4 open/close signal output
	8	DEK_OPN2	O	DC0V/3.3V	PF cassette 3 open/close signal output
	9	+3.3V2	I	DC3.3V	DC3.3V power input
	10	GND	-	-	Ground
YC14	1	HUNIT_SW	I	DC0V/3.3V	PF conveying unit switch: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	2	3.3V1	-	DC3.3V	DC3.3V power output
	3	24V3	-	-	Not used
	4	RESOL_ACT	-	-	Not used
	5	RESOL_KEP	-	-	Not used
	6	24V3	-	-	Not used
	7	PFL_SOL_ACT	-	-	Not used
	8	PFL_SOL_KEP	-	-	Not used
YC15	1	RFR_CL	O	DC0V/24V	PF paper feed clutch 1: On/Off
	2	24V1	O	DC24V	DC24V power output
	3	HFD1_CL	O	DC0V/24V	PF conveying clutch 2: On/Off
	4	24V1	O	DC24V	DC24V power output
	5	HFD2_CL	O	DC0V/24V	PF conveying clutch 3: On/Off
	6	24V1	O	DC24V	DC24V power output
	7	PFL_CL	O	DC0V/24V	PF paper feed clutch 2: On/Off
	8	24V1	O	DC24V	DC24V power output
YC16	1	CW/CCW	O	DC0V/24V	PF paper feed motor clockwise/reverse signal
	2	READY	I	DC0V/24V	PF paper feed motor ready signal
	3	CLOCK	O	DC0V/24V(pulse)	PF paper feed motor clock signal
	4	REMOTE	O	DC0V/24V	PF paper feed motor remote signal
	5	GND	-	-	Ground
	6	24V1	O	DC24V	DC24V power output

**(3)PF main PWB (PF-7120)**

**Connector position**



Connetor	Destination
YC5	PF set switch, Paper paper feed solenoid, PF paper sensor, PF lift upper limit sensor, PF paper feed sensor
YC6	PF paper gauge sensor 1 upper/2 lower, PF lift lower limit sensor, PF deck sensor
YC8	PF lift motor
YC1	: PF main PWB
YC1	: PF main PWB
YC15	PF paper feed clutch
YC18	PF conveying motor

## PWB photograph



## Connector table

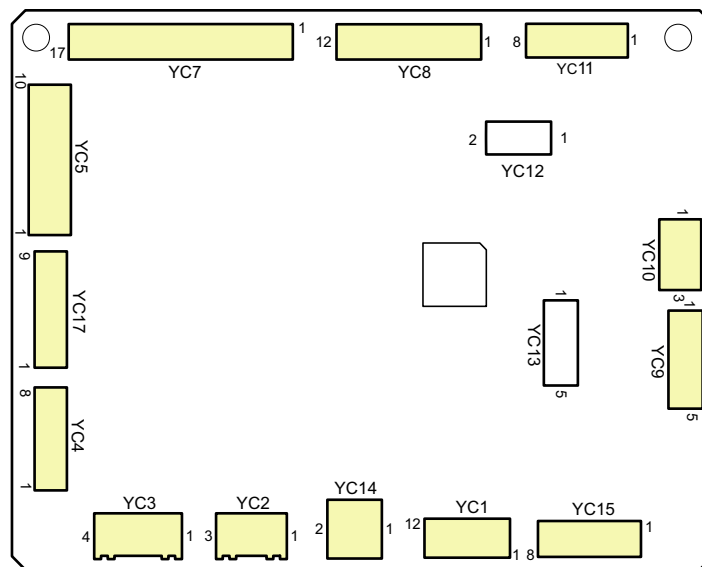
Connector	Pin	Signal	I/O	Voltage	Description
YC5	1	GND	-	-	Ground
	2	CVROP_SW	I	DC0V/3.3V	PF set switch: On/Off
	3	VER_CL	-	-	Not used
	4	+24V2_F1	-	-	Not used
	5	VCSW_3.3V1	-	-	Not used
	6	GND	-	-	Not used
	7	VCSW	-	-	Not used
	8	+24V2_F1	O	DC24V	DC24V power output
	9	FDR_SOLA	O	DC0V/24V	PF paper feed solenoid (absorption): On/Off
	10	FDR_SOLK	O	DC0V/24V	PF paper feed solenoid (retention): On/Off
	11	EPRSW_3.3V1	O	DC3.3V	DC3.3V power output
	12	GND	-	-	Ground
	13	EPRSW	I	DC0V/3.3V	PF paper sensor: On/Off
	14	RULMSW_3.3V1	O	DC3.3V	DC3.3V power output
	15	3.3V4	-	-	Ground
	16	RULMSW	I	DC0V/3.3V	PF lift upper limit sensor: On/Off
	17	3.3V1	O	DC3.3V	DC3.3V power output
	18	P0RSW	I	DC0V/3.3V	PF paper feed sensor: On/Off
	19	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
YC6	1	LDPSW1_3.3V1	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	LDPSW1	I	DC0V/3.3V	PF upper paper gauge sensor 1: On/Off
	4	LDPSW2_3.3V1	O	DC3.3V	DC3.3V power output
	5	GND	-	-	Ground
	6	LDPSW2	I	DC0V/3.3V	PF lower paper gauge sensor 2: On/Off
	7	SZSW2_3.3V1	O	DC3.3V	DC3.3V power output
	8	GND	-	-	Ground
	9	SZSW2	I	DC0V/3.3V	DP lift lower limit sensor: On/Off
	10	DEK_OPN1_3.3V2	-	-	Not used
	11	GND	-	-	Ground
	12	DEK_OPN1	I	DC0V/3.3V	PF deck sensor: On/Off
	13	NC	-	-	Not used
YC8	1	OUT2	O	DC0V/24V(pulse)	PF Lift motor control signal
	2	OUT1	O	DC0V/24V(pulse)	PF Lift motor control signal
YC11	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V2	I	DC24V	DC24V power input
	4	24V2	I	DC24V	DC24V power input
YC13	1	SDO	O	DC0V/3.3V(pulse)	Communication data signal
	2	SDI	I	DC0V/3.3V(pulse)	Communication data signal
	3	CLK	I	DC0V/3.3V(pulse)	Communication clock signal
	4	SEL	I	DC0V/3.3V	Communication select signal
	5	RDY	O	DC0V/3.3V	Communication ready signal
	6	PAUSE	I	DC0V/3.3V	Communication pause signal
	7	DEK_OPN1	O	DC0V/3.3V	Deck open/close signal output
	8	DEK_OPN2	-	-	Not used
	9	+3.3V4	O	DC3.3V	DC3.3V power input
	10	GND	-	-	Ground
	11	SD_FINAL_SENS	O	DC0V/3.3V	PF paper feed sensor: On/Off
	12	PF_FINAL_SENS	-	-	Not used
YC15	1	FDR_CL	O	DC0V/24V	PF paper feed clutch: On/Off
	2	+24V2_F1	O	DC24V	DC24V power output
YC18	1	FMOT_CH_A	I	DC0V/24V(pulse)	PF paper feed motor control signal
	2	FMOT_CH_B	I	DC0V/24V(pulse)	PF paper feed motor control signal
	3	3.3V	O	DC3.3V	DC3.3V power output

Connector	Pin	Signal	I/O	Voltage	Description
	4	FMOT_DIR	O	DC0V/3.3V	PF paper feed motor rotation switching signal
	5	FMOT_PWM	O	DC0V/3.3V(pulse)	PF paper feed motor drive signal
	6	FMOT_BRAKE	O	DC0V/3.3V	PF paper feed motor stop signal
	5	GND	-	-	Ground
	6	+24V2_F1	O	DC24V	DC24V power output

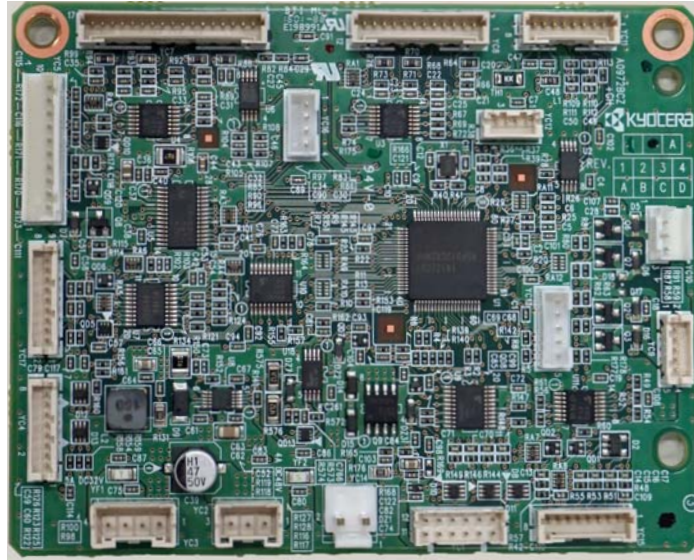
**(4)PF main PWB (PF-7130)**

**Connector position**



Connector	Destination
YC1	Engine PWB (main body)
YC2	Engine PWB (main body)
YC3	Paper feeder/Large capacity paper feeder
YC4	Paper feeder/Large capacity paper feeder
YC5	PF paper feed clutch, PF lift motor, PF paper feed motor
YC7:	PF conveying cover switch, PF pickup solenoid, PF paper sensor, PF lift sensor, PF feed sensor, PF upper paper gauge sensor, PF lower paper gauge sensor
YC8:	PF eject sensor, PF conveying sensor 1, PF conveying sensor 2, PF conveying sensor 3
YC9:	PF conveying clutch 1, PF conveying clutch 2, PF conveying clutch 3
YC10	PF Feedshift solenoid
YC11	PF multi feed sensor
YC14	PF top cover switch
YC15	PF paper length switch, PF paper width switch, PF set switch
YC17	PF registration motor

## PWB photograph



## Destination

Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	SDI(ENG_SDO)	O	DC0V/3.3V(pulse)	Communication data signal
	2	SDO(ENG_SDI)	I	DC0V/3.3V(pulse)	Communication data signal
	3	CLK(ENG_CLK)	I	DC0V/3.3V(pulse)	Communication clock signal
	4	SEL(ENG_SEL)	I	DC0V/3.3V	Communication select signal
	5	RDY(ENG_RDY)	O	DC0V/3.3V	Communication ready signal
	6	ENG_PAU	I	DC0V/3.3V	Communication pause signal
	7	DEK_OPN1	O	DC0V/3.3V	Cassette open/close signal output
	8	N.C	-	-	Not used
	9	+3.3V2	I	DC3.3V	DC3.3V power input
	10	GND	-	-	Ground
	11	FINAL SENS	O	DC0V/3.3V	PF conveying sensor 3: On/Off
	12	N.C	-	-	Not used
YC2	1	24V1	I	DC24V	DC24V power input
	2	GND	-	-	Ground
	3	GND	-	-	Ground
YC3	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V1	O	DC24V	DC24V power output
	4	24V1	O	DC24V	DC24V power output
YC4	1	SDO(TAN_SDI)	O	DC0V/3.3V(pulse)	Communication data signal
	2	SDI(TAN_SDO)	I	DC0V/3.3V(pulse)	Communication data signal

Connector	Pin	Signal	I/O	Voltage	Description
	3	CLK(TAN_CLK)	O	DC0V/3.3V(pulse)	Communication clock signal
	4	SEL(TAN_SEL)	O	DC0V/3.3V	Communication select signal
	5	RDY(TAN_RDY)	I	DC0V/3.3V	Communication ready signal
	6	PAU(TAN_PAU)	O	DC0V/3.3V	Communication pause signal
	7	GND	-	-	Ground
	8	+3.3V2	O	DC3.3V	DC3.3V power output
YC5	1	24V2	O	DC24V	DC24V power output
	2	FDCL	O	DC0V/24V	PF paper feed clutch: On/Off
	3	LIFT MOTOR1B	O	DC0V/24V(pulse)	PF Lift motor drive control signal
	4	LIFT MOTOR1A	O	DC0V/24V(pulse)	PF Lift motor drive control signal
	5	MM_DIR	O	DC0V/24V	PF paper feed motor control signal
	6	MM_RDY	I	DC0V/24V	PF paper feed motor ready signal
	7	MM_CLK	O	DC0V/24V(pulse)	PF paper feed motor clock signal
	8	MM_REM	O	DC0V/24V	PF paper feed motor remote signal
	9	GND	-	-	Ground
	10	24V2	O	DC24V	DC24V power output
YC7	1	R_COVER_SW	I	DC0V/DC3.3V	PF conveying cover switch: On/Off
	2	GND	-	-	Ground
	3	3.3V1	O	DC3.3V	DC3.3V power output
	4	GND	-	-	Ground
	5	EPRSW	I	DC0V/DC3.3V	PF paper detection sensor: On/Off
	6	3.3V1	O	DC3.3V	DC3.3V power output
	7	GND	-	-	Ground
	8	FDSW	I	DC0V/DC3.3V	Pf lift sensor: On/Off
	9	3.3V1	O	DC3.3V	DC3.3V power output
	10	SW	I	DC0V/DC3.3V	PF paper feed sensor: On/Off
	11	GND	-	-	Ground
	12	3.3V	-	DC3.3V -	DC3.3V power output
	13	GND	O	-	Ground
	14	EPSW1	I	DC0V/DC3.3V	PF upper paper gauge sensor: On/Off
	15	3.3V1	O	DC3.3V	DC3.3V power output
	16	GND	-	-	Ground
	17	EPSW2	I	DC0V/DC3.3V	PF lower paper gauge sensor: On/Off
YC8	1	3.3V1	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	FDSW4	I	DC0V/3.3V	PF eject sensor: On/Off

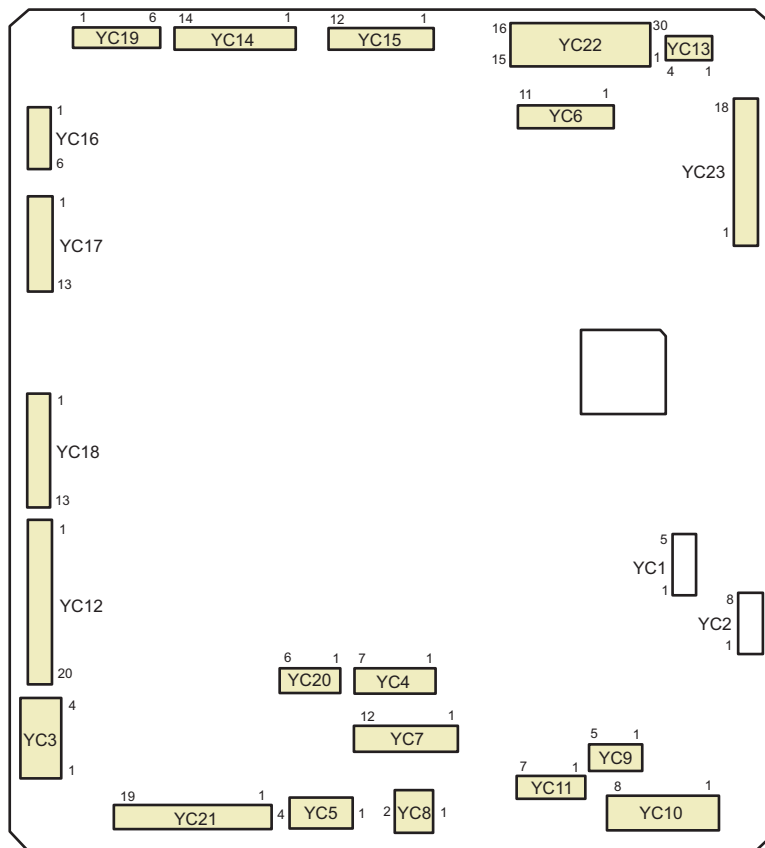


Connector	Pin	Signal	I/O	Voltage	Description
	4	3.3V1	O	DC3.3V	DC3.3V power output
	5	GND	-	-	Ground
	6	FDSW3	I	DC0V/3.3V	PF conveying sensor 3: On/Off
	7	3.3V1	O	DC3.3V	DC3.3V power output
	8	GND	-	-	Ground
	9	FDSW2	I	DC0V/3.3V	PF conveying sensor 2: On/Off
	10	3.3V1	O	DC3.3V	DC3.3V power output
	11	GND	-	-	Ground
	12	FDSW1	I	DC0V/3.3V	PF conveying sensor 1: On/Off
YC9	1	N.C.	-	-	-
	2	24V2			DC24V power output
	3	FDCL2	O	DC24V	PF conveying clutch 2: On/Off
	4	24V2	O	DC0V/3.3V	DC24V power output
	5	FDCL1	O	DC24V	PF conveying clutch 1: On/Off
YC10	1	24V2	O	DC24V	DC24V power output
	2	SEPARATE A	I	DC0V/24V	PF feedshift solenoid: On/Off(absorption)
	3	SEPARATE K	I	DC0V/24V	PF feedshift solenoid: On/Off(absorption)
	4	-	-	-	-
YC11	1	SS_SCL	O	DC0V/3.3V(pulse)	Communication clock signal
	2	SS_SDA	O	DC0V/3.3V	Communication data signal
	3	SS_1P	I	DC0V/3.3V	PF multi feed sensor (light emission): On/Off
	4	SS_2P	I	DC0V/3.3V	PF multi feed sensor (photo receptor): On/Off
	5	GND	-	-	Ground
	6	3.3V1	O	DC3.3V	DC3.3V power output
	7	GND	-	-	Ground
	8	24V1	O	DC24V	DC24V power output
YC14	1	24V2	I	DC0V/24V	PF top cover switch: On/Off
	2	24V1	O	DC24V	DC24V power output
YC15	1	CA_SIZE1	I	DC0V/3.3V	PF paper length switch: On/Off
	2	CA_SIZE2	I	DC0V/3.3V	PF paper length switch: On/Off
	3	GND	-	-	Ground
	4	CA_SIZE3	I	DC0V/3.3V	PF paper length switch: On/Off
	5	CA_SIZE4	I	DC0V/3.3V	PF paper width switch: On/Off
	6	GND	-	-	Ground
	7	SW	I	DC0V/3.3V	PF set switch: On/Off
	8	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
YC17	1	MAIN CH A	I	DC0V/3.3V	Encoder output
	2	MAIN CH B	I	DC0V/3.3V	Encoder output
	3	3.3V1	O	DC3.3V	DC3.3V power output
	4	MAIN DIR	O	DC0V/3.3V	PF registration motor rotation direction signal
	5	MAIN PWM	O	DC0V/3.3V	PF registration motor PWM signal
	6	MAIN BREAK	O	DC0V/3.3V	PF registration motor brake signal
	7	GND	-	-	Ground
	8	24V2	O	DC24V	DC24V power output
	9	N.C	-	-	Not used

**(5)DF main PWB (DF-7110)**

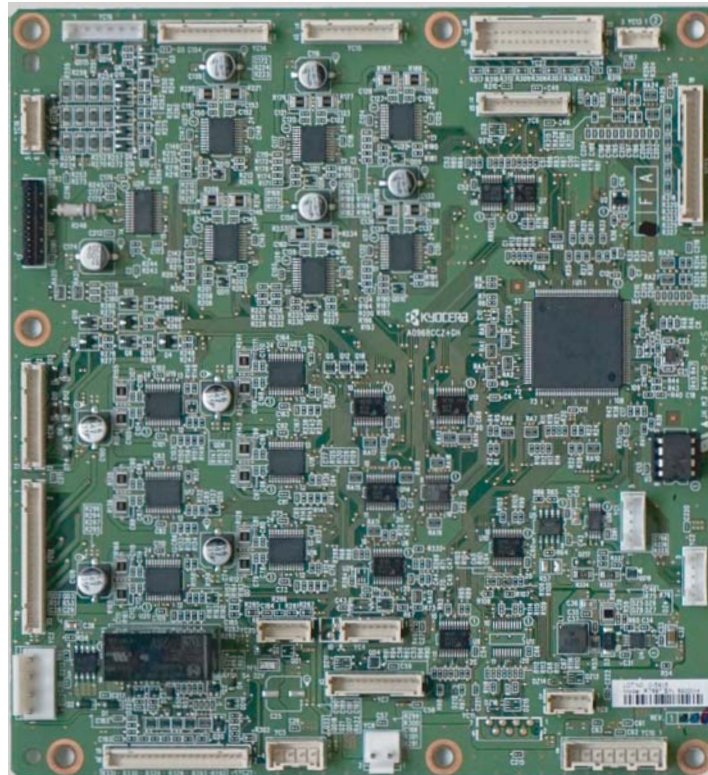
**Connector position**



Connector	Desitination
YC3	DF eject cover switch, DF front cover switch
YC4	Engine PWB
YC5	Engine PWB
YC6	MT PWB
YC7	PH PWB
YC8:	PH PWB

Connector	Desitination
YC9:	BF PWB
YC10	BF PWB
YC12	DF slide motor, DF eject motor, DF middle conveying motor, DF entry motor, DF eject release motor
YC13	DF tray upper paper full sensor 2
YC14	DF shift release motor, DF shift motor 1/2, DF exit clutch
YC15	DF paddle motor, DF side registration motor 1/2
YC16	Eject fan
YC21	DF sub exit sensor, DF sub tray full sensor, DF entry sensor, DF operation PWB, DF tray upper paper full sensor 1
YC22	DF slide sensor, DF side registration sensor 1/2, DF exit paper sensor, DF bundle exit sensor, DF tray sensor 1/2, DF paddle sensor, DF adjusting sensor, DF shift set sensor
YC23	DF shift sensor 1/2, DF tray sensor 3/4/5, DF shift release sensor

### PWB photograph



### Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC3	1	24V1	O	DC24V	DC24V power output
	2	EJECT COV SIG	I	DC0V/24V	DF eject cover switch: On/Off
	3	FRONT COV SOURCE	O	DC24V	DC24V power output
	4	FRONT COV SIG	I	DC0V/24V	DF front cover switch: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
YC4	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	ENG RDY	O	DC0V/3.3V	Ready signal
	4	ENG SEL	I	DC0V/3.3V	Select signal
	5	ENG CLK	I	DC0V/3.3V(pulse)	Serial clock signal
	6	ENG DI	I	DC0V/3.3V(pulse)	Serial communication data signal input
	7	ENG DO	O	DC0V/3.3V(pulse)	Serial communication data signal output
YC5	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V1	I	DC24V	DC24V power input
	4	24V1	I	DC24V	DC24V power input
YC6	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	5V	O	DC5V	DC5V power output
	5	24V1	O	DC24V	DC24V power output
	6	24V1	O	DC24V	DC24V power output
	7	MT DO	O	DC0V/5V(pulse)	Serial communication data signal output
	8	MT DIN	I	DC0V/5V(pulse)	Serial communication data signal input
	9	MT CLK	O	DC0V/5V(pulse)	Serial clock signal
	10	MT SEL	O	DC0V/5V	Select signal
	11	MT RDY	I	DC0V/5V	Ready signal
YC7	1	5V	O	DC5V	DC5V power output
	2	3.3V	O	DC3.3V	DC3.3V power output
	3	3.3V	O	DC3.3V	DC3.3V power output
	4	GND	-	-	Ground
	5	GND	-	-	Ground
	6	PHPES REM	I	DC0V/3.3V	PH paper edge sensor: On/Off
	7	PHMOT REM	O	DC0V/3.3V	PH motor: On/Off
	8	PU RDY	I	DC0V/3.3V	Ready signal
	9	PU SEL	O	DC0V/3.3V	Select signal
	10	PU CLK	O	DC0V/3.3V	Clock signal
	11	PU DI	I	DC0V/3.3V	Serial communication data signal input
	12	PU DO	O	DC0V/3.3V	Serial communication data signal output
YC8	1	GND	-	-	Ground
	2	24V2	O	DC24V	DC24V power output

Connector	Pin	Signal	I/O	Voltage	Description
YC9	1	BF DI	I	DC0V/3.3V	Serial communication data signal input
	2	BF DO	O	DC0V/3.3V	Serial communication data signal output
	3	BF CLK	O	DC0V/3.3V	Clock signal
	4	BF SEL	O	DC0V/3.3V	Select signal
	5	BF RDY	I	DC0V/3.3V	Ready signal
YC10	1	3.3V	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	5V	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	GND	-	-	Ground
	7	24V2	O	DC24V	DC24V power output
	8	24V2	O	DC24V	DC24V power output
YC12	1	ST MOV MOT 2B	O	DC0V/24V(pulse)	DF slide motor control signal
	2	ST MOV MOT 1B	O	DC0V/24V(pulse)	DF slide motor control signal
	3	ST MOV MOT 2A	O	DC0V/24V(pulse)	DF slide motor control signal
	4	ST MOV MOT 1A	O	DC0V/24V(pulse)	DF slide motor control signal
	5	EJECT MOT 2B	O	DC0V/24V(pulse)	DF eject motor control signal
	6	EJECT MOT 1B	O	DC0V/24V(pulse)	DF eject motor control signal
	7	EJECT MOT 2A	O	DC0V/24V(pulse)	DF eject motor control signal
	8	EJECT MOT 1A	O	DC0V/24V(pulse)	DF eject motor control signal
	9	MIDDLE MOT 2B	O	DC0V/24V(pulse)	DF middle conveying motor control signal
	10	MIDDLE MOT 1B	O	DC0V/24V(pulse)	DF middle conveying motor control signal
	11	MIDDLE MOT 2A	O	DC0V/24V(pulse)	DF middle conveying motor control signal
	12	MIDDLE MOT 1A	O	DC0V/24V(pulse)	DF middle conveying motor control signal
	13	ENTRY MOT 2B	O	DC0V/24V(pulse)	DF entry motor control signal
	14	ENTRY MOT 1B	O	DC0V/24V(pulse)	DF entry motor control signal
	15	ENTRY MOT 2A	O	DC0V/24V(pulse)	DF entry motor control signal
	16	ENTRY MOT 1A	O	DC0V/24V(pulse)	DF entry motor control signal
	17	EJE RELS MOT 2B	O	DC0V/24V(pulse)	DF eject release motor control signal
	18	EJE RELS MOT 1B	O	DC0V/24V(pulse)	DF eject release motor control signal
	19	EJE RELS MOT 2A	O	DC0V/24V(pulse)	DF eject release motor control signal
	20	EJE RELS MOT 1A	O	DC0V/24V(pulse)	DF eject release motor control signal
YC13	1	MTRY U SENS K	I	DC0V/3.3V	DF tray upper paper full sensor 1_LED: On/Off
	2	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	3	MTRY U SENS SIG	I	DC0V/3.3V	DF tray upper paper full sensor 2: On/Off
	4	3.3V	O	DC3.3V	DC3.3V power output
YC14	1	SFT RELS MOT 2B	O	DC0V/24V(pulse)	DF shift release motor control signal
	2	SFT RELS MOT 1B	O	DC0V/24V(pulse)	DF shift release motor control signal
	3	SFT RELS MOT 2A	O	DC0V/24V(pulse)	DF shift release motor control signal
	4	SFT RELS MOT 1A	O	DC0V/24V(pulse)	DF shift release motor control signal
	5	SFT R MOT 2B	O	DC0V/24V(pulse)	DF shift motor 2 control signal
	6	SFT R MOT 1B	O	DC0V/24V(pulse)	DF shift motor 2 control signal
	7	SFT R MOT 2A	O	DC0V/24V(pulse)	DF shift motor 2 control signal
	8	SFT R MOT 1A	O	DC0V/24V(pulse)	DF shift motor 2 control signal
	9	SFT F MOT 2B	O	DC0V/24V(pulse)	DF shift motor 1 control signal
	10	SFT F MOT 1B	O	DC0V/24V(pulse)	DF shift motor 1 control signal
	11	SFT F MOT 2A	O	DC0V/24V(pulse)	DF shift motor 1 control signal
	12	SFT F MOT 1A	O	DC0V/24V(pulse)	DF shift motor 1 control signal
	13	EJECT CL	O	DC0V/24V	DF eject clutch: On/Off
	14	24V2	O	DC24V	DC24V power output
YC15	1	PADDLE MOT 2B	O	DC0V/24V(pulse)	DF paddle motor control signal
	2	PADDLE MOT 1B	O	DC0V/24V(pulse)	DF paddle motor control signal
	3	PADDLE MOT 2A	O	DC0V/24V(pulse)	DF paddle motor control signal
	4	PADDLE MOT 1A	O	DC0V/24V(pulse)	DF paddle motor control signal
	5	SIDE REG R MOT 2B	O	DC0V/24V(pulse)	DF side registration sensor 2 control signal
	6	SIDE REG R MOT 1B	O	DC0V/24V(pulse)	DF side registration sensor 2 control signal
	7	SIDE REG R MOT 2A	O	DC0V/24V(pulse)	DF side registration sensor 2 control signal
	8	SIDE REG R MOT 1A	O	DC0V/24V(pulse)	DF side registration sensor 2 control signal
	9	SIDE REG F MOT 2B	O	DC0V/24V(pulse)	DF side registration sensor 1 control signal
	10	SIDE REG F MOT 1B	O	DC0V/24V(pulse)	DF side registration sensor 1 control signal
YC15	11	SIDE REG F MOT 2A	O	DC0V/24V(pulse)	DF side registration sensor 1 control signal
	12	SIDE REG F MOT 1A	O	DC0V/24V(pulse)	DF side registration sensor 1 control signal
YC16	1	EJECT FAN MOT_SIDE	O	DC0V/24V	Eject fan 1: On/Off
	2	24V2	O	DC24V	DC24V power output

Connector	Pin	Signal	I/O	Voltage	Description
	3	EJECT FAN MOT_SIDE	O	DC0V/24V	Eject fan 2: On/Off
	4	24V2	O	DC24V	DC24V power output
	5	EJECT FAN MOT_CENT	O	DC0V/24V	Eject fan 3: On/Off
	6	24V2	O	DC24V	DC24V power output
YC17	1	STP_MOT OUT2	O	DC0V/24V(pulse)	DF stapler control signal
	2	STP_MOT OUT2	O	DC0V/24V(pulse)	DF stapler control signal
	3	STP_MOT OUT2	O	DC0V/24V(pulse)	DF stapler control signal
	4	STP_MOT OUT2	O	DC0V/24V(pulse)	DF stapler control signal
	5	STP_MOT OUT1	O	DC0V/24V(pulse)	DF stapler control signal
	6	STP_MOT OUT1	O	DC0V/24V(pulse)	DF stapler control signal
	7	STP_MOT OUT1	O	DC0V/24V(pulse)	DF stapler control signal
	8	STP_MOT OUT1	O	DC0V/24V(pulse)	DF stapler control signal
	9	GND	-	-	Ground
	10	LS	I	DC0V/3.3V	DF staple unit LS signal
	11	READY	I	DC0V/3.3V	DF staple unit READY signal
	12	5V	O	DC5V	DC5V power output
	13	HP	I	DC0V/3.3V	DF staple unit HP signal
YC18	1	DRM MOT 2B	O	DC0V/24V(pulse)	DF relief drum motor control signal
	2	DRM MOT 1B	O	DC0V/24V(pulse)	DF relief drum motor control signal
	3	DRM MOT 2A	O	DC0V/24V(pulse)	DF relief drum motor control signal
	4	DRM MOT 1A	O	DC0V/24V(pulse)	DF relief drum motor control signal
	5	24V2	O	DC24V	DC24V power output
	6	MID_DRM SOL ACT	O	DC0V/24V	DF feedshift solenoid 1 (absorption): On/Off
	7	MID_DRM SOL KEEP	O	DC0V/24V	DF feedshift solenoid 1 (retention): On/Off
	8	24V2	O	DC24V	DC24V power output
	9	DRM_BF SOL ACT	O	DC0V/24V	DF feedshift solenoid 2 (absorption): On/Off
	10	DRM_BF SOL KEEP	O	DC0V/24V	DF feedshift solenoid 2 (retention): On/Off
	11	24V2	O	DC24V	DC24V power output
	12	SUB_MID SOL ACT	O	DC0V/24V	DF feedshift solenoid 3 (absorption): On/Off
	13	SUB_MID SOL KEEP	O	DC0V/24V	DF feedshift solenoid 3 (retention): On/Off
YC19	1	BRAKE	O	DC0V/5V	DF tray motor control signal
	2	DIR	O	DC0V/5V	DF tray motor control signal

Connector	Pin	Signal	I/O	Voltage	Description
	3	CLK	O	DC0V/5V	Clock signal
	4	ENABLE	O	DC0V/5V	DF tray motor control signal
	5	GND	-	-	Ground
	6	24V2	O	DC24V	DC24V power output
YC20	1	DRM SENS A	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	DRM SENS SIG	I	DC0V/3.3V	DF drum sensor: On/Off
	4	MID EJE SENS A	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	MID EJE SENS SIG	I	DC0V/3.3V	DP middle sensor: On/Off
YC21	1	STRY EJE SENS A	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	STRY EJE SENS SIG	I	DC0V/3.3V	DP sub eject sensor: On/Off
	4	3.3V	O	DC3.3V	DC3.3V power output
	5	GND	-	-	Ground
	6	STRY FULL SENS SIG	I	DC0V/3.3V	DF sub tray full sensor: On/Off
	7	STRY FULL SENS PLS	O	DC0V/3.3V(pulse)	Pulse signal
	8	GND	-	-	Ground
	9	ENTRY SENS SIG	I	DC0V/3.3V	DF entry sensor: On/Off
	10	3.3V	O	DC3.3V	DC3.3V power output
	11	LED1	O	DC0V/5V	LED output
	12	LED2	O	DC0V/5V	LED output
	13	LED3	O	DC0V/5V	LED output
	14	LED4	O	DC0V/5V	LED output
	15	KEY1	I	DC0V/3.3V	Key input
	16	KEY2	I	DC0V/3.3V	Key input
	17	GND	-	-	Ground
	18	3.3V	O	DC3.3V	DC3.3V power output
	19	MTRY U SENS K	O	DC0V/3.3V	DF tray upper paper full sensor 1: On/Off
YC22	1	STAPLE SENS A	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	STAPLE SENS SIG	I	DC0V/3.3V	DF slide sensor: On/Off
	4	SID REG R SENS A	O	DC5V	DC5V power output
	5	GND	-	-	Ground

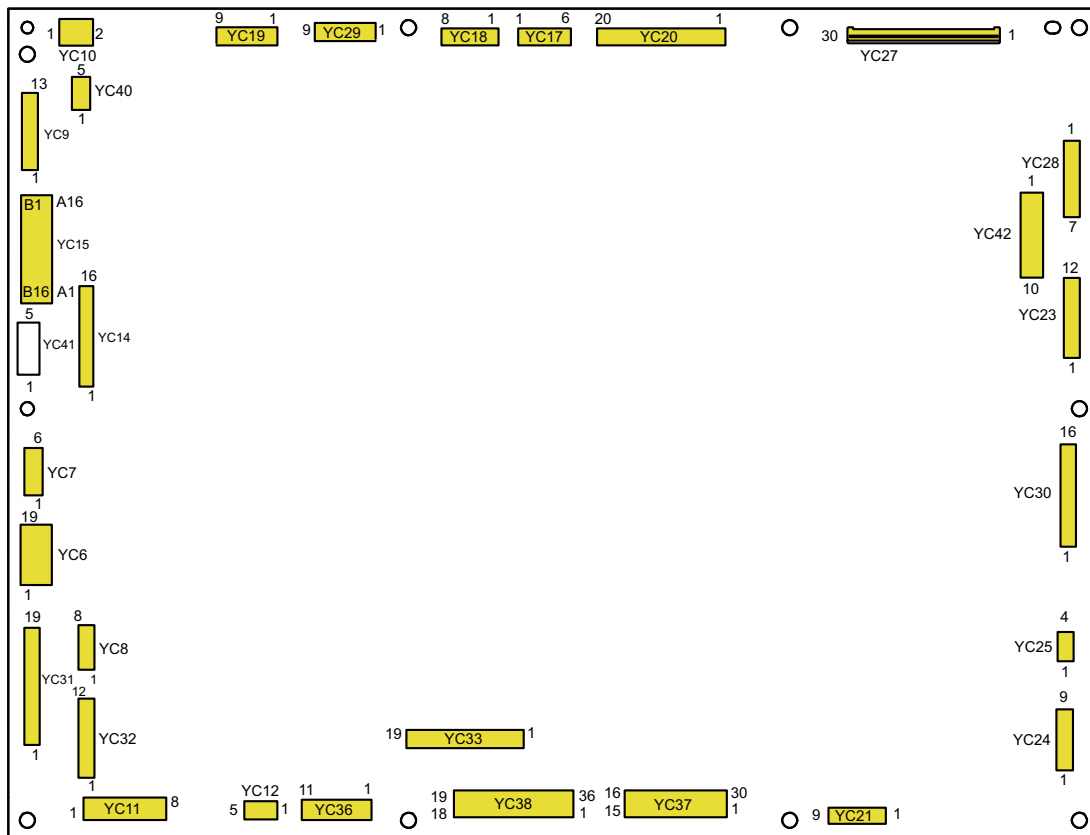


Connector	Pin	Signal	I/O	Voltage	Description
	6	SID REG R SENS SIG	I	DC0V/3.3V	DF side registration sensor 2: On/Off
	7	SID REG F SENS A	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	SID REG F SENS SIG	I	DC0V/3.3V	DF side registration sensor 1: On/Off
	10	GND	-	-	Ground
	11	PAP SENS SIG	I	DC0V/3.3V	DF eject sensor: On/Off
	12	3.3V	O	DC3.3V	DC3.3V power output
	13	BUNDLE SENS A	O	DC5V	DC5V power output
	14	GND	-	-	Ground
	15	BUNDLE SENS SIG	I	DC0V/3.3V	DF bundle eject switch: On/Off
	16	MTRY HP1 SENS A	O	DC5V	DC5V power output
	17	GND	-	-	Ground
	18	MTRY HP1 SENS SIG	I	DC0V/3.3V	DF tray sensor 1: On/Off
	19	MTRY HP2 SENS A	O	DC5V	DC5V power output
	20	GND	-	-	Ground
	21	MTRY HP2 SENS SIG	I	DC0V/3.3V	DF tray sensor 2: On/Off
	22	PADDLE SENS A	O	DC5V	DC5V power output
	23	GND	-	-	Ground
	24	PADDLE SENS SIG	I	DC0V/3.3V	DF paddle sensor: On/Off
	25	ADJUST SENS A	O	DC5V	DC5V power output
	26	GND	-	-	Ground
	27	ADJUST SENS SIG	I	DC0V/3.3V	DF adjusting sensor: On/Off
	28	SFT SET SENS A	O	DC5V	DC5V power output
	29	GND	-	-	Ground
	30	SFT SET SENS SIG	I	DC0V/3.3V	DF shift set sensor: On/Off
YC23	1	SFT F HP SENS A	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	SFT F HP SENS SIG	I	DC0V/3.3V	DF shift sensor 1: On/Off
	4	SFT R HP SENS A	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	SFT R HP SENS SIG	I	DC0V/3.3V	DF shift sensor 2: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	7	MTRY HALF SENS A	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	MTRY HALF SENS SIG	I	DC0V/3.3V	DF tray sensor 3: On/Off
	10	MTRY BF SENS A	O	DC5V	DC5V power output
	11	GND	-	-	Ground
	12	MTRY BF SENS SIG	I	DC0V/3.3V	DF tray sensor 5: On/Off
	13	MTRY FULL SENS A	O	DC5V	DC5V power output
	14	GND	-	-	Ground
	15	MTRY FULL SENS SIG	I	DC0V/3.3V	DF tray sensor 4: On/Off
	16	SFT RELS SENS A	O	DC5V	DC5V power output
	17	GND	-	-	Ground
	18	SFT RELS SENS SIG	I	DC0V/3.3V	DF shift release sensor: On/Off

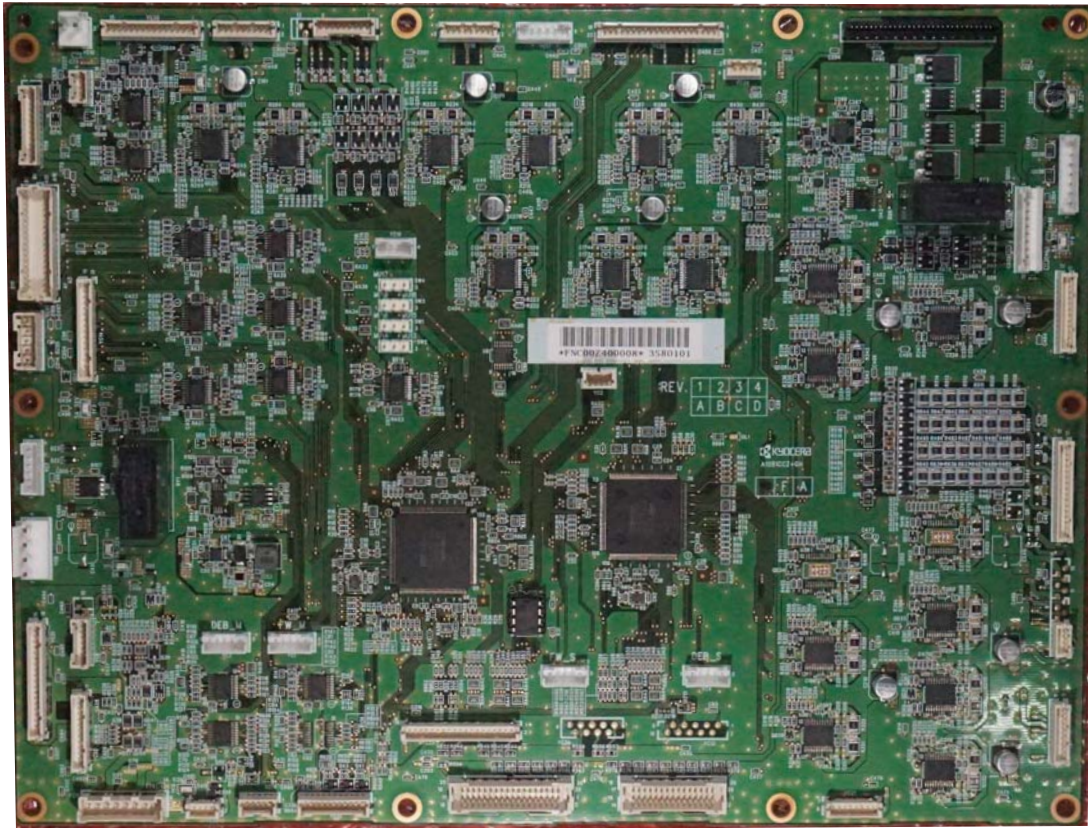
**(6)DF PWB (DF-7130)**

**Connector position**



Connector	Destination
YC6	Power supply input (BR PWB)
YC7	Front cover switch
YC8	Main unit communication interface
YC9	PH PWB communication
YC10	PH PWB power
YC11	BF PWB power
YC12	BF PWB communication
YC14	Middle motor, Exit upper motor
YC15	Paper entry motor, Relief motor, Sub tray exit motor, Sub tray exit middle motor
YC17	Slide motor
YC18	Bundle exit motor 1, Bundle exit motor 2
YC19	Adjusting pulley motor, Paper trail press guide motor
YC20	Exit support guide motor, Exit paper holding motor, Exit paddle motor, Exit motor
YC21	Side registration motor 1, Side registration motor 2
YC23	Shift motor 1, Side registration motor 2, Shift release motor
YC24	Exit release motor, Draw-in pressure release motor
YC25	Adjusting release motor
YC27	Staple (Staple relay PWB)
YC28	Tray motor
YC29	Feedshift solenoid 1/2/3
YC30	Front bundle exit fan, Rear bundle exit fan, Rear middle exit fan, Front middle exit fan, Rear upper exit fan, Front upper exit fan, Upper middle exit fan 1, Upper middle exit fan 2
YC31	Paper entry sensor, Paper entry timing sensor, Drum sensor, Drum timing sensor, Sub tray exit sensor, Sub tray full sensor (photo transmitter)
YC32	DF operation PWB, Tray paper full sensor 1 (photo transmitter), Middle sensor
YC33	Tray sensor 1/2/3/4/5, Tray paper full sensor 2
YC36	Slide sensor, Staple tank switch, Staple full sensor 1/2
YC37	Draw-in release HP sensor, Bundle exit sensor, Paper trail press guide HP sensor, Adjusting release HP sensor, Front shift HP sensor, Rear shift HP sensor, Shift set sensor, Shift release sensor, Lower exit paper sensor
YC38	Side registration HP sensor 1, Side registration HP sensor 2, Bundle exit HP sensor 1/2, Upper exit paper sensor, Exit paper holding sensor, Exit support guide HP sensor, Exit paddle HP sensor
YC40	BR PWB
YC42	Exit guide switch, Switch solenoid

## PWB photograph



## Connector table

Connector	Pin	Signal	I/O	Voltage	Description
YC6	1	24V	I	DC24V	DC24V input
	2	24V	I	DC24V	DC24V input
	3	GND	-	-	Ground
	4	GND	-	-	Ground
YC7	1	24V	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	FR_COVER	I	DC0V/24V	Front cover switch: On/Off
	4	-	-	-	Not used
	5	-	-	-	Not used
	6	-	-	-	Not used
YC8	1	GND	-	-	Ground
	2	DET	O	-	Ground
	3	MFP_RDY	O	DC0V/3.3V	Ready signal
	4	MFP_SEL	I	DC0V/3.3V	Select signal
	5	MFP_CLK	I	DC0V/3.3V(pulse)	Serial communication clock signal
	6	MFP_DI	I	DC0V/3.3V(pulse)	Serial communication data signal input
	7	MFP_DO	O	DC0V/3.3V(pulse)	Serial communication data signal output
YC9	1	5V	O	DC5V	DC5V output
	2	3.3V	O	DC3.3V	DC3.3V output
	3	3.3V	O	DC3.3V	DC3.3V output
	4	GND	-	-	Ground
	5	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	6	PH_EDGE	O	DC0V/3.3V	PH_EDGE signal
	7	PH_MOT	O	DC0V/3.3V	PH_MOT signal
	8	PH_RDY	I	DC0V/3.3V	Ready signal
	9	PH_SEL	O	DC0V/3.3V	Select signal
	10	PH_SCL	O	DC0V/3.3V(pulse)	Serial communication clock signal
	11	PH_SDI	I	DC0V/3.3V(pulse)	Serial communication data signal input
	12	PH_SDO	O	DC0V/3.3V(pulse)	Serial communication data signal output
YC10	1	GND	-	-	Ground
	2	24V	O	DC24V	DC24V output
YC11	1	3.3V	O	DC3.3V	DC3.3V output
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	5V	O	DC5V	DC5V output
	5	GND	-	-	Ground
	6	GND	-	-	Ground
	7	24V	O	DC24V	DC24V output
	8	24V	O	DC24V	DC24V output
YC12	1	BF_SDI	I	DC0V/3.3V(pulse)	Serial communication data signal input
	2	BF_SDO	O	DC0V/3.3V(pulse)	Serial communication data signal output
	3	BF_SCL	O	DC0V/3.3V(pulse)	Serial communication clock signal
	4	BF_SEL	O	DC0V/3.3V	Select signal
	5	BF_RDY	I	DC0V/3.3V	Ready signal
YC14	1	MDLMOT_CH_A	I	DC0V/3.3V(pulse)	Middle motor encoder A signal
	2	MDLMOT_CH_B	I	DC0V/3.3V(pulse)	Middle motor encoder B signal
	3	3.3V	O	DC3.3V	DC3.3V power output
	4	MDLMOT_DIR	O	DC0V/3.3V	Middle motor rotation switching signal
	5	MDLMOT_PWM	O	DC0V/3.3V(pulse)	Middle motor drive control signal
(YC14)	6	MDLMOT_BRAKE	O	DC0V/3.3V	Middle motor brake signal
	7	GND	-	-	Ground
	8	24V	O	DC24V	DC24V power output
	9	EXTUMOT_CH_A	I	DC0V/3.3V(pulse)	Upper exit motor encoder A signal
	10	EXTUMOT_CH_B	I	DC0V/3.3V(pulse)	Upper exit motor encoder B signal
	11	3.3V	O	DC3.3V	DC3.3V power output
	12	EXTUMOT_DIR	O	DC0V/3.3V	Upper exit motor rotation switching signal
	13	EXTUMOT_PWM	O	DC0V/3.3V(pulse)	Upper exit motor drive control signal
	14	EXTUMOT_BRAKE	O	DC0V/3.3V	Upper exit motor brake signal
	15	GND	-	-	Ground
	16	24V	O	DC24V	DC24V power output
YC15	A1	CINMOT_CH_A	I	DC0V/3.3V(pulse)	Paper entry motor encoder A signal
	A2	CINMOT_CH_B	I	DC0V/3.3V(pulse)	Paper entry motor encoder B signal
	A3	3.3V	O	DC3.3V	DC3.3V power output
	A4	CINMOT_DIR	O	DC0V/3.3V	Paper entry motor rotation switching signal
	A5	CINMOT_PWM	O	DC0V/3.3V(pulse)	Paper entry motor drive control signal
	A6	CINMOT_BRAKE	O	DC0V/3.3V	Paper entry motor brake signal
	A7	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	A8	24V	O	DC24V	DC24V power output
	A9	DRMMOT_CH_A	I	DC0V/3.3V(pulse)	Relief drum motor encoder A signal
	A10	DRMMOT_CH_B	I	DC0V/3.3V(pulse)	Relief drum motor encoder B signal
	A11	3.3V	O	DC3.3V	DC3.3V power output
	A12	DRMMOT_DIR	O	DC0V/3.3V	Relief drum motor rotation switching signal
	A13	DRMMOT_PWM	O	DC0V/3.3V	Relief drum motor drive control signal
	A14	DRMMOT_BRAKE	O	DC0V/3.3V	Relief drum motor brake signal
	A15	GND	-	-	Ground
	A16	24V	O	DC24V	DC24V power output
	B1	BEXTMOT_CH_A	I	DC0V/3.3V(pulse)	Sub tray exit motor encoder A signal
	B2	BEXTMOT_CH_B	I	DC0V/3.3V(pulse)	Sub tray exit motor encoder B signal
	B3	3.3V	O	DC3.3V	DC3.3V power output
	B4	BEXTMOT_DIR	O	DC0V/3.3V	Sub tray exit motor rotation switching signal
	B5	BEXTMOT_PWM	O	DC0V/3.3V	Sub tray exit motor drive control signal
	B6	BEXTMOT_BRAKE	O	DC0V/3.3V	Sub tray exit motor brake signal
	B7	GND	-	-	Ground
	B8	24V	O	DC24V	DC24V power output
	B9	-	-	-	Not used
	B10	-	-	-	Not used
	B11	-	-	-	Not used
	B12	-	-	-	Not used
	B13	-	-	-	Not used
	B14	-	-	-	Not used
	B15	-	-	-	Not used
	B16	-	-	-	Not used
YC17 (YC17)	1	STMMOT_A/	O	0V/24V(pulse)	Slide motor drive control
	2	-	-	-	Not used
	3	STMMOT_A	O	DC0V/24V(pulse)	Slide motor drive control
	4	STMMOT_B	O	DC0V/24V(pulse)	Slide motor drive control
	5	-	-	-	Not used
YC18	6	STMMOT_B/	O	0V/24V(pulse)	Slide motor drive control
	1	TABAMOT1_B/	O	DC0V/24V(pulse)	Bundle exit motor 1 drive control
	2	TABAMOT1_B	O	DC0V/24V(pulse)	Bundle exit motor 1 drive control
	3	TABAMOT1_A	O	DC0V/24V(pulse)	Bundle exit motor 1 drive control
	4	TABAMOT1_A/	O	DC0V/24V(pulse)	Bundle exit motor 1 drive control
	5	TABAMOT2_B/	O	DC0V/24V(pulse)	Bundle exit motor 2 drive control
	6	TABAMOT2_B	O	DC0V/24V(pulse)	Bundle exit motor 2 drive control
	7	TABAMOT2_A	O	DC0V/24V(pulse)	Bundle exit motor 2 drive control
	8	TABAMOT2_A/	O	DC0V/24V(pulse)	Bundle exit motor 2 drive control
YC19	1	MCHMOT_B/	O	DC0V/24V(pulse)	Adjusting pulley motor drive control
	2	MCHMOT_A/	O	DC0V/24V(pulse)	Adjusting pulley motor drive control
	3	MCHMOT_B	O	DC0V/24V(pulse)	Adjusting pulley motor drive control
	4	MCHMOT_A	O	DC0V/24V(pulse)	Adjusting pulley motor drive control
	5	PINGMOT_B/	O	DC0V/24V(pulse)	Paper trail press guide motor drive control

Connector	Pin	Signal	I/O	Voltage	Description
	6	PINGMOT_A/	O	DC0V/24V(pulse)	Paper trail press guide motor drive control
	7	PINGMOT_B	O	DC0V/24V(pulse)	Paper trail press guide motor drive control
	8	PINGMOT_A	O	DC0V/24V(pulse)	Paper trail press guide motor drive control
	9	-	-	-	Not used
YC20	1	ESPTMOT_B/	O	DC0V/24V(pulse)	Exit support guide motor drive control
	2	ESPTMOT_A/	O	DC0V/24V(pulse)	Exit support guide motor drive control
	3	ESPTMOT_B	O	DC0V/24V(pulse)	Exit support guide motor drive control
	4	ESPTMOT_A	O	DC0V/24V(pulse)	Exit support guide motor drive control
	5	EHLDMOT_B/	O	DC0V/24V(pulse)	Exit paper holding motor drive control
	6	EHLDMOT_A/	O	DC0V/24V(pulse)	Exit paper holding motor drive control
	7	EHLDMOT_B	O	DC0V/24V(pulse)	Exit paper holding motor drive control
	8	EHLDMOT_A	O	DC0V/24V(pulse)	Exit paper holding motor drive control
	9	EPDLMOT_B/	O	DC0V/24V(pulse)	Exit paddle motor drive control
	10	EPDLMOT_A/	O	DC0V/24V(pulse)	Exit paddle motor drive control
	11	EPDLMOT_B	O	DC0V/24V(pulse)	Exit paddle motor drive control
	12	EPDLMOTA	O	DC0V/24V(pulse)	Exit paddle motor drive control
	13	EXTMOT_CH_A	I	DC0V/3.3V(pulse)	Exit motor encoder A signal
	14	EXTMOT_CH_B	I	DC0V/3.3V(pulse)	Exit motor encoder B signal
	15	3.3V	O	DC3.3V	DC3.3V power output
	16	EXTMOT_DIR	O	DC0V/3.3V	Exit motor rotation switching signal
	17	EXTMOT_PWM	O	DC0V/3.3V	Exit motor drive control signal
	18	EXTMOT_BRAKE	O	DC0V/3.3V	Exit motor brake signal
	19	GND	-	-	Ground
	20	24V	O	DC24V	DC24V power output
YC21	1	WDRMOT_B/	O	DC0V/24V(pulse)	Side registration motor 2 drive control
	2	WDRMOT_B	O	DC0V/24V(pulse)	Side registration motor 2 drive control
	3	WDRMOT_A	O	DC0V/24V(pulse)	Side registration motor 2 drive control
	4	WDRMOT_A/	O	DC0V/24V(pulse)	Side registration motor 2 drive control
(YC21)	5	WDFMOT_B/	O	DC0V/24V(pulse)	Side registration motor 1 drive control
	6	WDFMOT_B	O	DC0V/24V(pulse)	Side registration motor 1 drive control
	7	WDFMOT_A	O	DC0V/24V(pulse)	Side registration motor 1 drive control
	8	WDFMOT_A/	O	DC0V/24V(pulse)	Side registration motor 1 drive control
YC23	1	SFRMOT_B/	O	DC0V/24V(pulse)	Shift motor 1 drive control
	2	SFRMOT_B	O	DC0V/24V(pulse)	Shift motor 1 drive control
	3	SFRMOT_A	O	DC0V/24V(pulse)	Shift motor 1 drive control
	4	SFRMOT_A/	O	DC0V/24V(pulse)	Shift motor 1 drive control
	5	SFFMOT_B/	O	DC0V/24V(pulse)	Shift motor 2 drive control
	6	SFFMOT_B	O	DC0V/24V(pulse)	Shift motor 2 drive control
	7	SFFMOT_A	O	DC0V/24V(pulse)	Shift motor 2 drive control
	8	SFFMOT_A/	O	DC0V/24V(pulse)	Shift motor 2 drive control
	9	SFCMOT_B/	O	DC0V/24V(pulse)	Shift release motor drive control
	10	SFCMOT_B	O	DC0V/24V(pulse)	Shift release motor drive control
	11	SFCMOT_A	O	DC0V/24V(pulse)	Shift release motor drive control
	12	SFCMOT_A/	O	DC0V/24V(pulse)	Shift release motor drive control
YC24	1	EXCMOT_B/	O	DC0V/24V(pulse)	Exit release motor drive control
	2	EXCMOT_B	O	DC0V/24V(pulse)	Exit release motor drive control

Connector	Pin	Signal	I/O	Voltage	Description
	3	EXCMOT_A	O	DC0V/24V(pulse)	Exit release motor drive control
	4	EXCMOT_A/	O	DC0V/24V(pulse)	Exit release motor drive control
	5	PINCMOT_B/	O	DC0V/24V(pulse)	Draw-in pressure release motor drive control
	6	PINCMOT_B	O	DC0V/24V(pulse)	Draw-in pressure release motor drive control
	7	PINCMOT_A	O	DC0V/24V(pulse)	Draw-in pressure release motor drive control
	8	PINCMOT_A/	O	DC0V/24V(pulse)	Draw-in pressure release motor drive control
	9	-	-	-	Not used
YC25	1	MCHCMOT_B/	O	DC0V/24V(pulse)	Adjusting release motor drive control
	2	MCHCMOT_B	O	DC0V/24V(pulse)	Adjusting release motor drive control
	3	MCHCMOT_A	O	DC0V/24V(pulse)	Adjusting release motor drive control
	4	MCHCMOT_A/	O	DC0V/24V(pulse)	Adjusting release motor drive control
YC27	1	STMOT+	O	DC0V/24V	Staple motor drive control
	2	STMOT+	O	DC0V/24V	Staple motor drive control
	3	STMOT+	O	DC0V/24V	Staple motor drive control
	4	STMOT+	O	DC0V/24V	Staple motor drive control
	5	STMOT+	O	DC0V/24V	Staple motor drive control
	6	STMOT+	O	DC0V/24V	Staple motor drive control
	7	STMOT+	O	DC0V/24V	.Staple motor drive control
	8	STMOT+	O	DC0V/24V	.Staple motor drive control
	9	STMOT+	O	DC0V/24V	.Staple motor drive control
	10	STMOT+	O	DC0V/24V	.Staple motor drive control
	11	-	-	-	Not used
	12	STMOT-	O	DC0V/24V	Staple motor drive control
	13	STMOT-	O	DC0V/24V	.Staple motor drive control
	14	STMOT-	O	DC0V/24V	.Staple motor drive control
	15	STMOT-	O	DC0V/24V	.Staple motor drive control
	16	STMOT-	O	DC0V/24V	.Staple motor drive control
	17	STMOT-	O	DC0V/24V	.Staple motor drive control
	18	STMOT-	O	DC0V/24V	.Staple motor drive control
	19	STMOT-	O	DC0V/24V	.Staple motor drive control
	20	STMOT-	O	DC0V/24V	.Staple motor drive control
	21	STMOT-	O	DC0V/24V	.Staple motor drive control
	22	5V	O	DC5V	DC5V power output
	23	5V	O	DC5V	DC5V power output
	24	STLS	I	DC0V/3.3V	Staple sensor: On/Off
	25	STHP	I	DC0V/3.3V	Staple HP sensor: On/Off
	26	GND	-	-	Ground
	27	-	-	-	Not used
	28	STSP	I	DC0V/3.3V	Staple ready: On/Off
	29	GND	-	-	Ground
	30	-	-	-	Not used
YC28	1	TRAYMOT_BRK	O	DC0V/5V	Tray motor brake signal
	2	TRAYMOT_DIR	O	DC0V/5V	Tray motor rotation switching signal

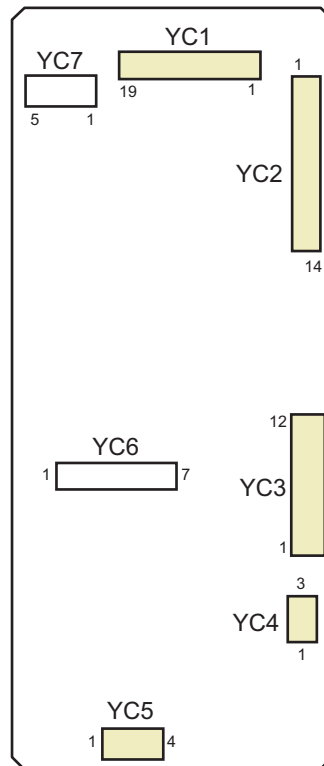


Connector	Pin	Signal	I/O	Voltage	Description
	3	TRAYMOT_LD	I	DC0V/5V	Tray motor rotation synchronizing signal
	4	TRAYMOT_CLK	O	DC0V/5V(pulse)	Tray motor clock signal
	5	TRAYMOT_EN	O	DC0V/5V	Tray motor remote signal
	6	GND	-	-	Ground
	7	24V	O	DC24V	DC24V power output
YC29	1	24V	O	DC24V	DC24V power output
	2	M/DSOL_ATT	O	DC0V/24V	Feedshift solenoid 2 drive control
	3	M/DSOL_HLD	O	DC0V/24V	Feedshift solenoid 2 drive control
	4	24V	O	DC24V	DC24V power output
	5	D/BSOL_ATT	O	DC0V/24V	Feedshift solenoid 1 drive control
	6	D/BSOL_HLD	O	DC0V/24V	Feedshift solenoid 1 drive control
	7	24V	O	DC24V	DC24V power output
	8	S/MSOL_ATT	O	DC0V/24V	Feedshift solenoid 3 drive control
	9	S/MSOL_HLD	O	DC0V/24V	Feedshift solenoid 3 drive control
YC30	1	24V	O	DC24V	DC24V power output
	2	TABA_FAN_CENTER1	O	DC0V/24V	Front bundle exit fan drive signal
	3	24V	O	DC24V	DC24V power output
	4	TABA_FAN_CENTER2	O	DC0V/24V	Rear bundle exit fan drive signal
	5	TABA_FAN_SIDE1			Rear middle exit fan drive signal
	6	24V	O	DC24V	DC24V power output
	7	TABA_FAN_SIDE2			Front middle exit fan drive signal
	8	24V	O	DC24V	DC24V power output
	9	EXTUPR_FAN_SIDE1			Rear upper exit fan drive signal
	10	24V	O	DC24V	DC24V power output
	11	EXTUPR_FAN_SIDE2			Front upper exit fan drive signal
	12	24V	O	DC24V	DC24V power output
	13	EXTUPR_FAN_CENTER 1			Upper middle exit fan 1 drive signal
	14	24V	O	DC24V	DC24V power output
(YC30)	15	EXTUPR_FAN_CENTER 2			Upper middle exit fan 2 drive signal
	16	24V	O	DC24V	DC24V power output
YC31	1	GND	-	-	Ground
	2	CIN_SENS	I	DC0V/3.3V	Paper entry sensor: On/Off
	3	3.3V	O	DC3.3V	DC3.3V power output
	4	GND	-	-	Ground
	5	CINTMG_SENS	I	DC0V/3.3V	Paper entry timing sensor: On/Off
	6	3.3V	O	DC3.3V	DC3.3V power output
	7	GND	-	-	Ground
	8	DRMTMG_SENS	I	DC0V/3.3V	Drum timing sensor: On/Off
	9	3.3V	O	DC3.3V	DC3.3V power output
	10	GND	-	-	Ground
	11	DRM_SENS	I	DC0V/3.3V	Drum (Relief path) sensor: On/Off
	12	3.3V	O	DC3.3V	DC3.3V power output
	13	GND	-	-	Ground
	14	BEXT_SENS	I	DC0V/3.3V	Sub tray exit sensor: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	15	3.3V	O	DC3.3V	DC3.3V power output
	16	3.3V	O	DC3.3V	DC3.3V power output
	17	GND	-	-	Ground
	18	BFULL_SENS	I	DC0V/3.3V	Sub tray full sensor: On/Off
	19	BFULL_PLS	I	DC0V/3.3V(pulse)	Sub tray full sensor photo transmitter control
YC32	1	MST_LED1	O	DC0V/5V	DF operation PWB LED1 drive
	2	MST_LED2	O	DC0V/5V	DF operation PWB LED2 drive
	3	MST_LED3	O	DC0V/5V	DF operation PWB LED3 drive
	4	MST_LED4	O	DC0V/5V	DF operation PWB LED4 drive
	5	MST_KEY1	O	DC0V/3.3V	DF operation PWB KEY1: On/Off
	6	MST_KEY2	O	DC0V/3.3V	DF operation PWB KEY2: On/Off
	7	GND	-	-	Ground
	8	3.3V	O	DC3.3V	DC3.3V power output
	9	ASURF_SENS_K	O	DC0V/3.3V(pulse)	Tray paper full sensor 1: photo transmitter control
	10	GND	-	-	Ground
	11	MDL_SENS	I	DC0V/3.3V	Middle sensor: On/Off
	12	3.3V	O	DC3.3V	DC3.3V power output
YC33	1	AHP2_SENS_LED	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	AHP2_SENS	I	DC0V/3.3V	Tray sensor 1: On/Off
	4	AHP1_SENS_LED	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	AHP1_SENS	I	DC0V/3.3V	Tray sensor 2: On/Off
	7	AHALF_SENS_LED	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	AHALF_SENS	I	DC0V/3.3V	Tray sensor 3: On/Off
	10	BFFULL_SENS_LED	O	DC5V	DC5V power output
	11	GND	-	-	Ground
(YC33)	12	BFFULL_SENS	I	DC0V/3.3V	Tray sensor 5: On/Off
	13	AFULL_SENS_LED	O	DC5V	DC5V power output
	14	GND	-	-	Ground
	15	AFULL_SENS	I	DC0V/3.3V	Tray sensor 4: On/Off
	16	ASURF_SENS_K	I	DC0V/3.3V(pulse)	Tray paper full sensor 2: photo transmitter control
	17	GND	-	-	Ground
	18	ASURF_SENS	I	DC0V/3.3V	Tray paper full sensor 2: On/Off
	19	3.3V	O	DC3.3V	DC3.3V power output
YC36	1	STPMHP_SENS_LED	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	STPMHP_SENS	I	DC0V/3.3V	Staple drive HP sensor: On/Off
	4	STPTANK_LED A	O	DC3.3V	TNKLED_Rear control signal
	5	STPTANK_LED B	O	DC3.3V	TNKLED_Middle control signal
	6	STPTANK_LED C	O	DC3.3V	TNKLED_Center control signal
	7	STPTANK_AN	I	DC3.3V	DC3.3V power output
	8	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	9	STPTANK_SW	I	DC0V/3.3V	Staple tank switch: On/Off
	10	STPTANK_FULL	I	DC0V/3.3V	Staple full sensor: On/Off
	11	GND	-	-	Ground
YC37	1	PINCHP_SENS_LED	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	PINCHP_SENS	I	DC0V/3.3V	Draw-in release HP sensor: On/Off
	4	EXCHP_SENS_LED	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	EXCHP_SENS	I	DC0V/3.3V	Exit release HP sensor: On/Off
	7	PINGHP_SENS_LED	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	PINGHP_SENS	I	DC0V/3.3V	DF trail press guide HP sensor: On/Off
	10	RESERVE_4_LED	-	-	Not used
	11	GND	-	-	Not used
	12	RESERVE_4	-	-	Not used
	13	RESERVE_5_LED	-	-	Not used
	14	GND	-	-	Not used
	15	RESERVE_5	-	-	Not used
	16	MCHCHP_SENS_LED	O	DC5V	DC5V power output
	17	GND	-	-	Ground
	18	MCHCHP_SENS	I	DC0V/3.3V	Adjusting release HP sensor: On/Off
	19	SFFHP_SENS_LED	O	DC5V	DC5V power output
	20	GND	-	-	Ground
	21	SFFHP_SENS	I	DC0V/3.3V	Front shift HP sensor: On/Off
	22	SFRHP_SENS_LED	O	DC5V	DC5V power output
	23	GND	-	-	Ground
	24	SFRHP_SENS	I	DC0V/3.3V	Rear shift HP sensor: On/Off
	25	SFSET_SENS_LED	O	DC5V	DC5V power output
	26	GND	-	-	Ground
(YC37)	27	SFSET_SENS	I	DC0V/3.3V	Shift set sensor: On/Off
	28	SFCHP_SENS_LED	O	DC5V	DC5V power output
	29	GND	-	-	Ground
	30	SFCHP_SENS	I	DC0V/3.3V	Shift release sensor: On/Off
YC38	1	WDFHP_SENS_LED	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	WDFHP_SENS	I	DC0V/3.3V	Side registration HP sensor 1: On/Off
	4	WDRHP_SENS_LED	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	WDRHP_SENS	I	DC0V/3.3V	Side registration HP sensor 2: On/Off
	7	TABA1_SENS_LED	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	TABA1_SENS	I	DC0V/3.3V	Bundle exit HP sensor 1: On/Off
	10	TABA2_SENS_LED	O	DC5V	DC5V power output
	11	GND	-	-	Ground
	12	TABA2_SENS	I	DC0V/3.3V	Bundle exit HP sensor 2: On/Off
	13	3.3V	O	DC3.3V	DC3.3V power output

Connector	Pin	Signal	I/O	Voltage	Description
	14	EXIT_SENS_K	O	DC0V/3.3V(pulse)	Upper exit paper sensor photo transmitter control
	15	EXIT_SENS_K	I	DC0V/3.3V(pulse)	Upper exit paper sensor photo transmitter control
	16	GND	-	-	Ground
	17	EXIT_SENS	I	DC0V/3.3V	Upper exit paper sensor: On/Off
	18	3.3V	O	DC3.3V	DC3.3V power output
	19	-	-	-	Not used
	20	-	-	-	Not used
	21	-	-	-	Not used
	22	-	-	-	Not used
	23	-	-	-	Not used
	24	-	-	-	Not used
	25	-	-	-	Not used
	26	-	-	-	Not used
	27	-	-	-	Not used
	28	EHL1_SENS_LED	O	DC5V	DC5V power output
	29	GND	-	-	Ground
	30	EHL1_SENS	I	DC0V/3.3V	Exit paper holding sensor: On/Off
	28	ESPTH_SENS_LED	O	DC5V	DC5V power output
	29	GND	-	-	Ground
	30	ESPTH_SENS	I	DC0V/3.3V	Exit support guide HP sensor: On/Off
	28	EPDLHP_SENS_LED	O	DC5V	DC5V power output
	29	GND	-	-	Ground
	30	EPDLHP_SENS	I	DC0V/3.3V	Exit paddle HP sensor: On/Off
YC40	1	STACKER_TXD	O	DC0V/3.3V(pulse)	Stucker UART communication(transmission)
	2	STACKER_RXD	I	DC0V/3.3V(pulse)	Stucker UART communication(receive)
	3	GND	-	-	Ground
	4	5VIF	I	DC5V	DC5V power input
YC42	1	EXTIL_SW_24V	O	DC24V	DC24V power output
	2	GND	-	-	Ground
	3	EXTIL_SW	I	DC0V/24V	Exit guider switch: On/Off
	4	GND	-	-	Ground
	5	24V	O	DC24V	DC24V power output
	6	ILSOL_ATT	O	DC0V/24V	Exit switching solenoid drive control
	7	ILSOL_HLD	O	DC0V/24V	Exit switching solenoid drive control
	8	-	-	-	Not used
	9	-	-	-	Not used
	10	-	-	-	Not used

**(7)MT main PWB (MT-730(B))****Connector position**

Connector	Destination
YC1	MB tray sensor 1/2/3, MB exit sensor 2
YC2	MB tray sensor 4/5/6/7, MB exit sensor 1, MB home position sensor
YC3	DF main PWB
YC4	MB right cover switch
YC5	MB conveying motor

**Connector table**

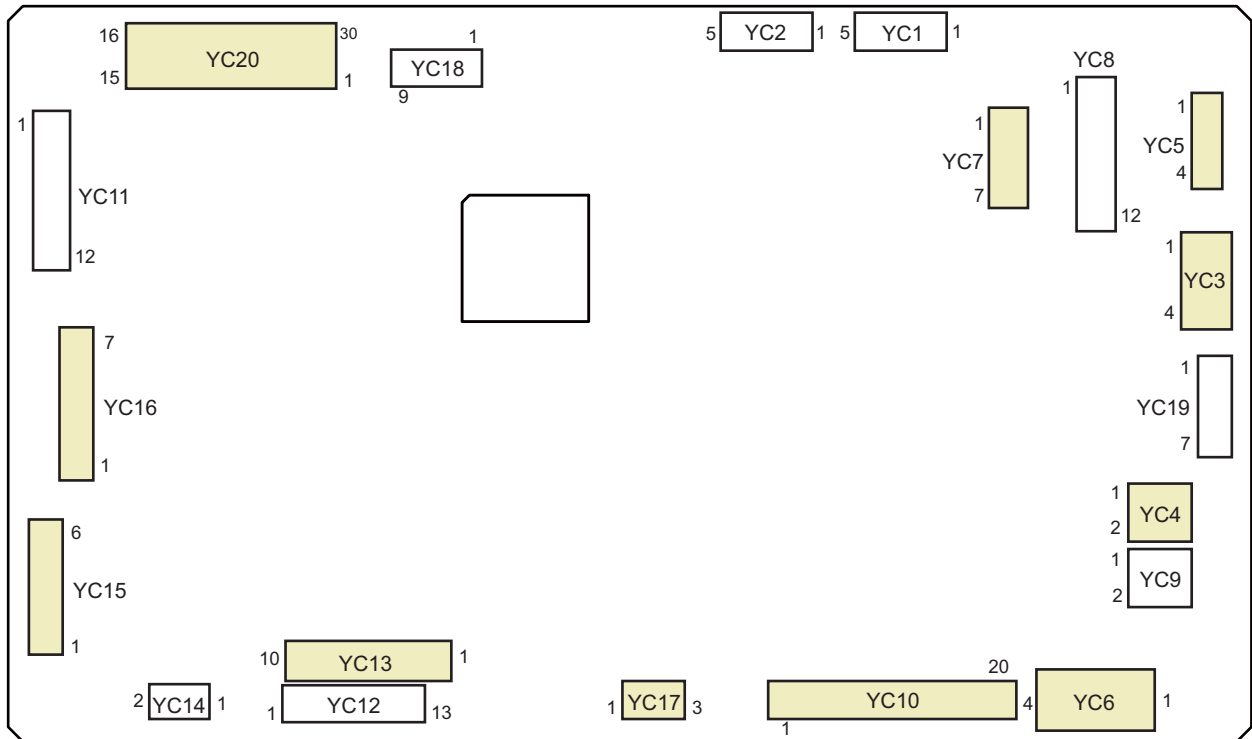
Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	GND	-	-	Ground
	2	OFS1	I	DC0V/5V	MB tray sensor 1: On/Off
	3	5V	O	DC5V	DC5V power output
	4	GND	-	-	Ground
	5	OFS2	I	DC0V/5V	MB tray sensor 2: On/Off
	6	5V	O	DC5V	DC5V power output
	7	GND	-	-	Ground
	8	OFS3	I	DC0V/5V	MB tray sensor 3: On/Off
	9	5V	O	DC5V	DC5V power output
	10	LED	O	DC0V/5V	LED signal
	11	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	12	TEJS	I	DC0V/5V(pulse)	MB eject sensor 2: On/Off (photo receptor)
	13	5V	O	DC5V	DC5V power output
YC2	1	GND	-	-	Ground
	2	OFS4	I	DC0V/5V	MB tray sensor 4: On/Off
	3	5V	O	DC5V	DC5V power output
	4	GND	-	-	Ground
	5	OFS5	I	DC0V/5V	MB tray sensor 5: On/Off
	6	5V	O	DC5V	DC5V power output
	7	GND	-	-	Ground
	8	OFS6	I	DC0V/5V	MB tray sensor 6: On/Off
	9	5V	O	DC5V	DC5V power output
	10	GND	-	-	Ground
	11	OFS7	I	DC0V/5V	MB tray sensor 7: On/Off
	12	5V	O	DC5V	DC5V power output
	13	5V	O	DC5V	DC5V power output
	14	LED	O	DC0V/5V(pulse)	MB eject sensor 1: Off/On (light emission)
	15	GND	-	-	Ground
	16	HP SIG	I	DC0V/5V	MB home position sensor: On/Off
	17	5V	O	DC5V	DC5V power output
	18	GND	-	-	Ground
	19	NC	-	-	Not used
	20	5V	O	DC5V	DC5V power output
YC3	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	5V	I	DC5V	DC5V power input
	5	24V	I	DC24V	DC24V power input
	6	24V	I	DC24V	DC24V power input
	7	SDI	I	DC0V/5V(pulse)	Mail box serial communication data signal
	8	SDO	O	DC0V/5V(pulse)	Mail box serial communication data signal
	9	SCLK	I	DC0V/5V(pulse)	Mail box clock signal
	10	SEL	I	DC0V/5V	Mail box select signal
	11	READY	O	DC0V/5V	Mail box ready signal
YC4	1	R24V	I	DC24V	DC24V power input
	3	24V	O	DC24V	DC24V power output

Connector	Pin	Signal	I/O	Voltage	Description
YC5	1	MOTOR_A	O	DC0V/24V(pulse)	MB conveying motor control signal
	2	MOTORA	O	DC0V/24V(pulse)	MB conveying motor control signal
	3	MOTORB	O	DC0V/24V(pulse)	MB conveying motor control signal
	4	MOTOR_B	O	DC0V/24V(pulse)	MB conveying motor control signal

**(8)BF main PWB (BF-730)**

**Connector position**



Connector	Destination
YC3	DF main PWB
YC4	BF left cover switch
YC5	DF main PWB
YC6	BF set switch, BF tray open/close switch
YC7	DF main PWB
YC10	BF adjustment motor 1/2, BF side registration motor 1/2, BF entry motor
YC13	BF staple motor
YC15	BF blade motor
YC16	BF main motor
YC17	BF feedshift solenoid
YC20	BF adjustment sensor 1/2, BF side registration sensor 1/2, BF tray full sensor, BF exit sensor, BF conveying sensor, BF paper sensor, BF blade sensor, BF entry sensor

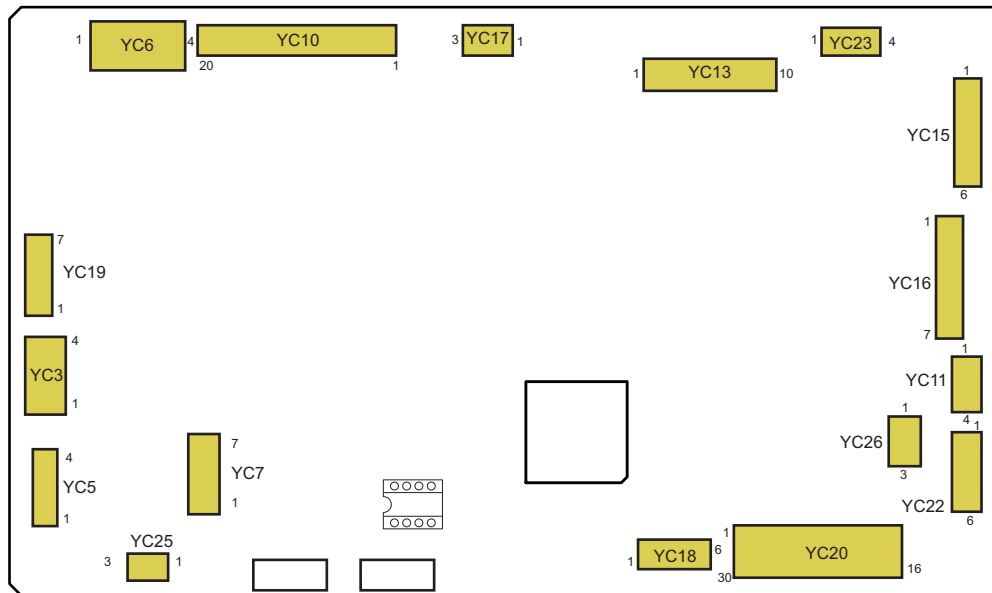
**Connector table**

Connector	Pin	Signal	I/O	Voltage	Description
YC3	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V	I	DC24V	DC24V power input
	4	24V	I	DC24V	DC24V power input
YC4	1	24V1	I	DC24V	DC24V power input
	2	FRONT COV SIG	I	DC0V/24V	Left cover switch On/Off
YC5	1	3.3V	I	DC3.3V	DC3.3V power input
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	5V	I	DC5V	DC5V power input
YC6	1	24V	O	DC24V	DC24V power output
	2	FRONT COV SIG	I	DC0V/24V	Set switch: On/Off
	3	24V	O	DC24V	DC24V power output
	4	EJECT COV SIG	I	DC0V/24V	Tray open/close switch: On/Off
YC7	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	ENG_RDY	O	DC0V/3.3V	Ready signal
	4	ENG_SEL	I	DC0V/3.3V	Select signal
	5	ENG_CLK	I	DC0V/3.3V	Clock signal
	6	ENG_DI	I	DC0V/3.3V	Serial communication data signal input
	7	ENG_DO	O	DC0V/3.3V	Serial communication data signal output
YC10	1	EXTMOT_2B	O	DC0V/24V(pulse)	BF adjusting motor 2 control signal
	2	EXTMOT_1B	O	DC0V/24V(pulse)	BF adjusting motor 2 control signal
	3	EXTMOT_2A	O	DC0V/24V(pulse)	BF adjusting motor 2 control signal
	4	EXTMOT_1A	O	DC0V/24V(pulse)	BF adjusting motor 2 control signal
	5	MDLMOT_2B	O	DC0V/24V(pulse)	BF side registration sensor 2 control signal
	6	MDLMOT_1B	O	DC0V/24V(pulse)	BF side registration sensor 2 control signal
	7	MDLMOT_2A	O	DC0V/24V(pulse)	BF side registration sensor 2 control signal
	8	MDLMOT_1A	O	DC0V/24V(pulse)	BF side registration sensor 2 control signal
	9	CINMOT_2B	O	DC0V/24V(pulse)	BF entry motor control signal
	10	CINMOT_1B	O	DC0V/24V(pulse)	BF entry motor control signal
	11	CINMOT_2A	O	DC0V/24V(pulse)	BF entry motor control signal
	12	CINMOT_1A	O	DC0V/24V(pulse)	BF entry motor control signal
	13	EXCMOT_2B	O	DC0V/24V(pulse)	BF adjusting motor 1 control signal
	14	EXCMOT_1B	O	DC0V/24V(pulse)	BF adjusting motor 1 control signal
	15	EXCMOT_2A	O	DC0V/24V(pulse)	BF adjusting motor 1 control signal



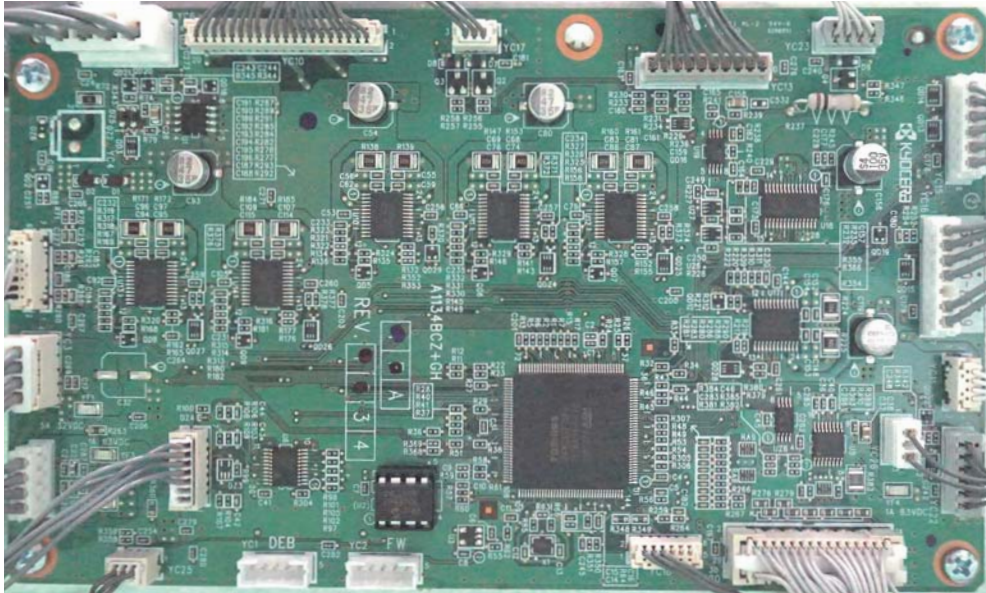
Connector	Pin	Signal	I/O	Voltage	Description
	16	EXCMOT_1A	O	DC0V/24V(pulse)	BF adjusting motor 1 control signal
	17	STMMOT_2B	O	DC0V/24V(pulse)	BF side registration sensor 1 control signal
	18	STMMOT_1B	O	DC0V/24V(pulse)	BF side registration sensor 1 control signal
	19	STMMOT_2A	O	DC0V/24V(pulse)	BF side registration sensor 1 control signal
	20	STMMOT_1A	O	DC0V/24V(pulse)	BF side registration sensor 1 control signal
YC13	1	5V	O	DC5V	DC5V power output
	2	STLS2	I	DC0V/5V	BF staple unit LS2 signal
	3	GND	-	-	Ground
	4	STLS1	I	DC0V/5V	BF staple unit LS1 signal
	5	STHP	I	DC0V/5V	BF staple unit HP signal
	6	STMOT_OUT1	O	DC0V/24V(pulse)	BF staple motor control signal
	7	STMOT_OUT1	O	DC0V/24V(pulse)	BF staple motor control signal
	8	FGND	-	-	Ground
	9	STMOT_OUT2	O	DC0V/24V(pulse)	BF staple motor control signal
	10	STMOT_OUT2	O	DC0V/24V(pulse)	BF staple motor control signal
YC15	1	FLDMOT_BRK	O	DC0V/5V(pulse)	BF blade motor control signal
	2	FLDMOT_DIR	O	DC0V/5V(pulse)	BF blade motor control signal
	3	FLDMOT_CLK	O	DC0V/5V(pulse)	BF blade motor control signal
	4	FLDMOT_EN	O	DC0V/5V(pulse)	BF blade motor control signal
	5	GND	-	-	Ground
	6	24V2	O	DC24V	DC24V power output
YC16	1	FLDMOT_DIR	O	DC0V/5V(pulse)	BF main motor control signal
	2	FLDMOT_ALM	O	DC0V/5V(pulse)	BF main motor control signal
	3	FLDMOT_CLK	O	DC0V/5V(pulse)	BF main motor control signal
	4	FLDMOT_EN	O	DC0V/5V(pulse)	BF main motor control signal
	5	N.C.	-	-	Not used
	6	GND	-	-	Ground
	7	24V2	O	DC24V	DC24V power output
YC17	1	24V2	O	DC24V	DC24V power output
	2	3FSOL_ATT	O	DC24V	BF feedshift solenoid: On/Off (actuate)
	3	3FSOL_HLD	O	DC24V	BF feedshift solenoid: On/Off (return)
YC20	1	5V	O	DC5V	DC5V power output
	2	GND	-	-	Ground
	3	BDLFT_HP	I	DC0V/3.3V	BF adjusting sensor 1: On/Off
	4	5V	O	DC5V	DC5V power output
	5	GND	-	-	Ground

Connector	Pin	Signal	I/O	Voltage	Description
	6	WDL_HP	I	DC0V/3.3V	BF side registration sensor 1: On/Off
	7	5V	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	FULL	I	DC0V/3.3V	BF tray full sensor: On/Off
	10	5V	O	DC5V	DC5V power output
	11	GND	-	-	Ground
	12	OUT	I	DC0V/3.3V	BR eject sensor: On/Off
	13	5V	O	DC5V	DC5V power output
	14	GND	-	-	Ground
	15	TRANSPORT	I	DC0V/3.3V	BF conveying sensor: On/Off
	16	5V	O	DC5V	DC5V power output
	17	GND	-	-	Ground
	18	PAPER	I	DC0V/3.3V	BF paper sensor: On/Off
	19	5V	O	DC5V	DC5V power output
	20	GND	-	-	Ground
	21	WDU_HP	I	DC0V/3.3V	BF side registration sensor 2: On/Off
	22	5V	O	DC5V	DC5V power output
	23	GND	-	-	Ground
	24	BLD_HP	I	DC0V/3.3V	BF blade sensor: On/Off
	25	GND	-	-	Ground
	26	BULOW_HP	I	DC0V/3.3V	BF adjusting sensor 2: On/Off
	27	3.3V	O	DC3.3V	DC3.3V power output
	28	GND	-	-	Ground
	29	CARRY_IN	I	DC0V/3.3V	BF entry sensor: On/Off
	30	3.3V	O	DC3.3V	DC3.3V power output

**(9)BF PWB (BF-9100)****Connector position**

Connector	Destination
YC3	DF PWB power
YC5	DF PWB power
YC6	Set switch, Tray open/close switch
YC7	DF PWB communication
YC10	Adjusting motor 1/2, Side registration motor 1/2, Paper entry motor
YC11	Paddle motor
YC13	Staple unit
YC15	Blade motor
YC16	Main motor
YC17	Feedshift solenoid
YC18	Conveying tray sensor
YC19	Paper sensor, Paddle sensor
YC20	Adjusting sensor 1/2, Exit sensor, Vertical conveying sensor, Side registration sensor 1/2, Blade sensor, Paper entry sensor
YC22	Conveying tray motor
YC23	Front paper entry fan, Rear paper entry fan
YC25	Exit pressure release sensor
YC26	Exit pressure release motor

## PWB photograph



## Connector table

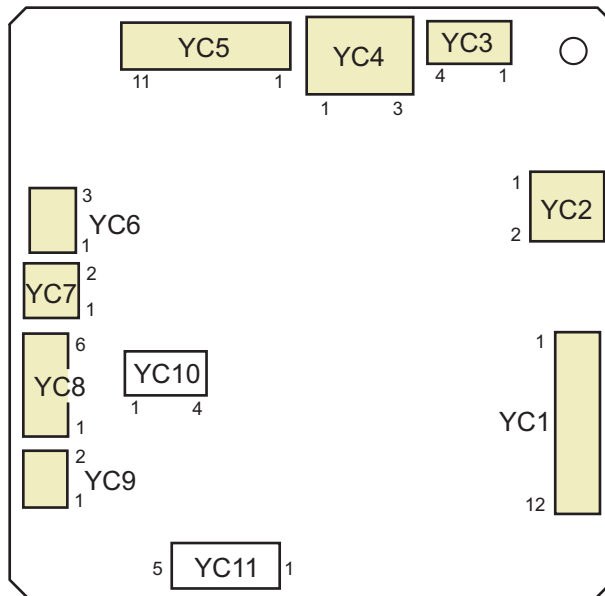
Connector	Pin	Signal	I/O	Voltage	Description
YC3	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	24V	I	DC24V	DC24V power input
	4	24V	I	DC24V	DC24V power input
YC5	1	3.3V	I	DC3.3V	DC3.3V power input
	2	GND	-	-	Ground
	3	GND	-	-	Ground
	4	5V	I	DC5V	DC5V power input
YC6	1	24V	O	DC24V	DC24V power output
	2	FRONT COV SIG	I	DC0V/24V	BF set switch: On/Off
	3	24V	O	DC24V	DC24V power output
	4	EJECT COV SIG	I	DC0V/24V	Tray open/close switch: On/Off
YC7	1	GND	-	-	Ground
	2	GND	-	-	Ground
	3	ENG_RDY	O	DC0V/3.3V	Ready signal
	4	ENG_SEL	I	DC0V/3.3V	Select signal
	5	ENG_CLK	I	DC0V/3.3V	Clock signal
	6	ENG_DI	I	DC0V/3.3V	Serial communication data signal input
	7	ENG_DO	O	DC0V/3.3V	Serial communication data signal output
YC10 (YC10)	1	EXTMOT_2B	O	DC0V/24V(pulse)	Adjustment motor 2 control signal
	2	EXTMOT_1B	O	DC0V/24V(pulse)	Adjustment motor 2 control signal
	3	EXTMOT_2A	O	DC0V/24V(pulse)	Adjustment motor 2 control signal
	4	EXTMOT_1A	O	DC0V/24V(pulse)	Adjustment motor 2 control signal
	5	MDLMOT_2B	O	DC0V/24V(pulse)	Side registration motor 2 control signal
	6	MDLMOT_1B	O	DC0V/24V(pulse)	Side registration motor 2 control signal
	7	MDLMOT_2A	O	DC0V/24V(pulse)	Side registration motor 2 control signal
	8	MDLMOT_1A	O	DC0V/24V(pulse)	Side registration motor 2 control signal
	9	CINMOT_2B	O	DC0V/24V(pulse)	Paper entry motor control signal

Connector	Pin	Signal	I/O	Voltage	Description
	10	CINMOT_1B	O	DC0V/24V(pulse)	Paper entry motor control signal
	11	CINMOT_2A	O	DC0V/24V(pulse)	Paper entry motor control signal
	12	CINMOT_1A	O	DC0V/24V(pulse)	Paper entry motor control signal
	13	EXCMOT_2B	O	DC0V/24V(pulse)	Adjustment motor 1 control signal
	14	EXCMOT_1B	O	DC0V/24V(pulse)	Adjustment motor 1 control signal
	15	EXCMOT_2A	O	DC0V/24V(pulse)	Adjustment motor 1 control signal
	16	EXCMOT_1A	O	DC0V/24V(pulse)	Adjustment motor 1 control signal
	17	STMMOT_2B	O	DC0V/24V(pulse)	Side registration motor 1 control signal
	18	STMMOT_1B	O	DC0V/24V(pulse)	Side registration motor 1 control signal
	19	STMMOT_2A	O	DC0V/24V(pulse)	Side registration motor 1 control signal
	20	STMMOT_1A	O	DC0V/24V(pulse)	Side registration motor 1 control signal
YC13	1	5V	O	DC5V	DC5V power output
	2	STLS2	I	DC0V/5V	Staple unit LS2 signal
	3	GND	-	-	Ground
	4	STLS1	I	DC0V/5V	Staple unit LS1 signal
	5	STHP	I	DC0V/5V	Staple unit HP signal
	6	STMOT_OUT1	O	DC0V/24V(pulse)	Stapler motor control signal
	7	STMOT_OUT1	O	DC0V/24V(pulse)	Stapler motor control signal
	8	FGND	-	-	Ground
	9	STMOT_OUT2	O	DC0V/24V(pulse)	Stapler motor control signal
	10	STMOT_OUT2	O	DC0V/24V(pulse)	Stapler motor control signal
YC15	1	FLDMOT_BRK	O	DC0V/5V(pulse)	Blade motor control signal
	2	FLDMOT_DIR	O	DC0V/5V(pulse)	Blade motor control signal
	3	FLDMOT_CLK	O	DC0V/5V(pulse)	Blade motor control signal
	4	FLDMOT_EN	O	DC0V/5V(pulse)	Blade motor control signal
	5	GND	-	-	Ground
	6	24V2	O	DC24V	DC24V power output
YC16	1	FLDMOT_DIR	O	DC0V/5V(pulse)	Main motor control signal
	2	FLDMOT_ALM	O	DC0V/5V(pulse)	Main motor control signal
	3	FLDMOT_CLK	O	DC0V/5V(pulse)	Main motor control signal
	4	FLDMOT_EN	O	DC0V/5V(pulse)	Main motor control signal
	5	N.C.	-	-	Not used
	6	GND	-	-	Ground
	7	24V2	O	DC24V	DC24V power output
YC17	1	24V2	O	DC24V	DC24V power output
	2	3FSOL_ATT	O	DC24V	Feedshift solenoid: On/Off (actuate)
	3	3FSOL_HLD	O	DC24V	Feedshift solenoid: On/Off (return)
YC20	1	5V	O	DC5V	DC5V power output
	2	GND	-	-	Ground
(YC20)	3	BDLFT_HP	I	DC0V/3.3V	Adjustment sensor 1: On/Off
	4	5V	O	DC5V	DC5V power output
	5	GND	-	-	Ground
	6	WDL_HP	I	DC0V/3.3V	Side registration sensor 1: On/Off
	7	5V	O	DC5V	DC5V power output
	8	GND	-	-	Ground
	9	FULL	I	DC0V/3.3V	Tray full sensor: On/Off

Connector	Pin	Signal	I/O	Voltage	Description
	10	5V	O	DC5V	DC5V power output
	11	GND	-	-	Ground
	12	OUT	I	DC0V/3.3V	Exit sensor: On/Off
	13	5V	O	DC5V	DC5V power output
	14	GND	-	-	Ground
	15	TRANSPORT	I	DC0V/3.3V	Vertical conveying sensor: On/Off
	16	-	-	-	Not used
	17	-	-	-	Not used
	18	-	-	-	Not used
	19	5V	O	DC5V	DC5V power output
	20	GND	-	-	Ground
	21	WDU_HP	I	DC0V/3.3V	Side registration sensor 2: On/Off
	22	5V	O	DC5V	DC5V power output
	23	GND	-	-	Ground
	24	BLD_HP	I	DC0V/3.3V	Blade sensor: On/Off
	25	GND	-	-	Ground
	26	BULOW_HP	I	DC0V/3.3V	Adjustment sensor 2: On/Off
	27	3.3V	O	DC3.3V	DC3.3V power output
	28	GND	-	-	Ground
	29	CARRY_IN	I	DC0V/3.3V	Paper entry sensor: On/Off
	30	3.3V	O	DC3.3V	DC3.3V power output
YC22	1	FDTRAY_DIR	O	DC0V/5V	Conveying tray motor brake signal
	2	FDTRAY_LD	I	DC0V/3.3V	Conveying tray motor rotation synchronizing signal
	3	FDTRAY_CLK	O	DC0V/5V(pulse)	Conveying tray motor clock signal
	4	FDTRAY_EN	O	DC0V/5V	Conveying tray motor remote signal
	5	GND	-	-	Ground
	6	24V2	O	DC24V	DC24V power output
YC23	1	BF_FAN2	O	DC0V/24V	Booklet FAN drive signal
	2	24V2	O	DC24V	DC24V power output
	3	BF_FAN1	O	DC0V/24V	Booklet FAN drive signal
	4	24V2	O	DC24V	DC24V power output
YC25	1	EXT_RLS_SENS_A	O	DC1.2V	LED power output
	2	GND	-	-	Ground
	3	EXT_RLS_SENS		DC0V/3.3V	Exit pressure release sensor: On/Off
YC26	1	OUT2	O	DC0V/24V	Exit pressure release motor control signal
	2	N.C.	-	-	Ground
	3	OUT1	O	DC0V/24V	Exit pressure release motor control signal

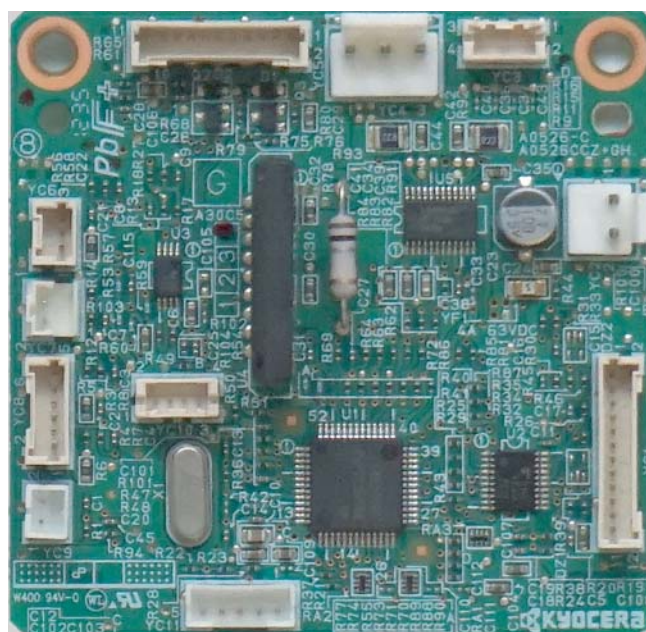
**(10)PH main PWB (PH-7)**

**Connector positio**



Connector	Destination
YC1	DF main PWB
YC2	DF main PWB
YC3	PH slide motor
YC4	PH motor
YC5	PH solenoid, PH paper edge sensor 1, PH tank full sensor
YC6:	PH slide sensor
YC7:	PH paper edge sensor 2
YC8:	PH pulse sensor, PH home position sensor
YC9:	PH tank set switch

**PWB photograph**



## Connector table

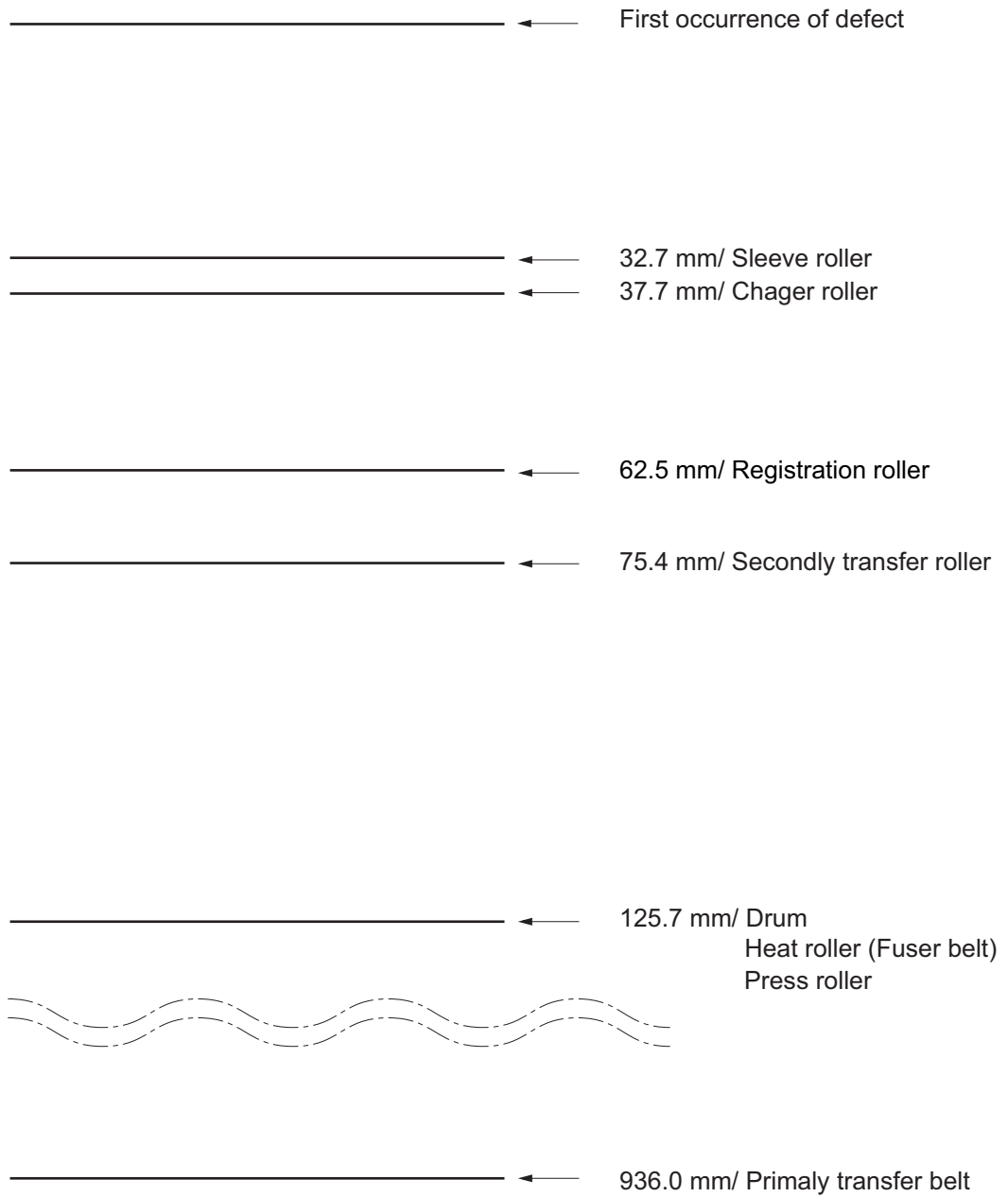
Connector	Pin	Signal	I/O	Voltage	Description
YC1	1	PH_SDI	I	DC0V/3.3V(pulse)	Serial communication data signal input
	2	PH_SDO	O	DC0V/3.3V(pulse)	Serial communication data signal output
	3	PH_CLK	I	DC0V/3.3V(pulse)	Clock signal
	4	PH_SEL	I	DC0V/3.3V	Select signal
	5	PH_RDY	O	DC0V/3.3V	Ready signal
	6	PHMOT_REQ	I	DC0V/3.3V	PH motor: On/Off
	7	PHPES_REQ	I	DC0V/3.3V	PH paper edge detection: On/Off
	8	GND	-	-	Ground
	9	GND	-	-	Ground
	10	3.3V	I	DC3.3V	DC3.3V power input
	11	3.3V	I	DC3.3V	DC3.3V power input
	12	5.0V	I	DC5V	DC5V power input
YC2	1	GND	-	-	Ground
	2	24V2	I	DC24V	DC24V power input
YC3	1	PHADJ_MOT 2B	O	DC0V/24V(pulse)	PH slide motor control signal
	2	PHADJ_MOT 1B	O	DC0V/24V(pulse)	PH slide motor control signal
	3	PHADJ_MOT 2A	O	DC0V/24V(pulse)	PH slide motor control signal
	4	PHADJ_MOT 1A	O	DC0V/24V(pulse)	PH slide motor control signal
YC4	1	PHMOT_N	O	DC0V/24V(pulse)	PH motor control signal
	2	NC	-	-	Not used
	3	PHMOT_P	O	DC0V/24V(pulse)	PH motor control signal
YC5	1	24V2	O	DC24V	DC24V power output
	2	PHSOL_PUL	O	DC0V/24V	PF solenoid: On/Off (actuate)
	3	PHSOL_RET	O	DC0V/24V	PF solenoid: On/Off (return)
	4	PHLED_A	O	DC0V/3.3V	PH paper edge sensor 1_A: On/Off
	5	PHLED_B	O	DC0V/3.3V	PH paper edge sensor 1_B: On/Off
	6	PHLED_C	O	DC0V/3.3V	PH paper edge sensor 1_C: On/Off
	7	PHLED_D	O	DC0V/3.3V	PH paper edge sensor 1_D: On/Off
	8	PHLED_3.3V	O	DC3.3V	DC3.3V power output
	9	5.0V	O	DC5V	DC5V power output
	10	PHTNK_FUL	I	DC0V/5V	PH tank full sensor: On/Off
	11	GND	-	-	Ground
YC6	1	SENS3.3V	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	PHADJ_HP	I	DC0V/3.3V	PH slide sensor: On/Off



Connector	Pin	Signal	I/O	Voltage	Description
YC7	1	PHPES_DET	I	DC0V/3.3V	PH paper edge sensor 2: On/Off
	2	GND	-	-	Ground
YC8	1	SENS3.3V	O	DC3.3V	DC3.3V power output
	2	GND	-	-	Ground
	3	PHMOT_PLS	I	DC0V/3.3V	PH pulse sensor: On/Off
	4	SENS3.3V	O	DC3.3V	DC3.3V power output
	5	GND	-	-	Ground
	6	PHMOT_HP	I	DC0V/3.3V	PH home position sensor: On/Off
YC9	1	PHTNK_SET	I	DC0V/3.3V	PH tank set switch: On/Off
	2	GND	-	-	Ground

## 9 Appendixes

### 9 - 1 Repetitive defects gauge



The repetitive marks interval may vary depending on operating conditions.

## 9 - 2 Firmware environment commands

The printer maintains a number of printing parameters in its memory. These parameters may be changed permanently with the FRPO (Firmware RePrOgram) commands.

This section provides information on how to use the FRPO command and its parameters using examples.

### Using FRPO commands for reprogramming the firmware

The current settings of the FRPO parameters are listed as the optional values on the service status page.

Before changing any FRPO parameters, print out a service status page, so you will know the parameter values before the changes are made. To return FRPO parameters to their factory default values, send the FRPO INIT (FRPO-INITialize) command. (!R! FRPO INIT; EXIT;)

The FRPO command is sent to the printer in the following sequence:

```
!R! FRPO parameter, value; EXIT;
```

Example: Changing emulation mode to PC-PR201/65A

```
!R! FRPO P1, 6; EXIT;
```

## FRPO parameters

Items	FRPO	Setting value	Factory setting
Top margin	A1	Integer value in inch	0
	A2	decimal value in 1/100 inch increments	0
Left margin	A3	Integer value in inch	0
	A4	decimal value in 1/100 inch increments	0
Page length	A5	Integer value in inch	17
	A6	decimal value in 1/100 inch increments	30
Page width	A7	Integer value in inch	17
	A8	decimal value in 1/100 inch increments	30
PRESCRIBE compatible mode	B0	0 to 255	0 2 (100V)
Default pattern resolution	B8	0: 300 dpi 1: 600 dpi	0
Default copy number	C0	1 to 999	1
Page orientation	C1	0: Portrait 1: Landscape	0
Default font	C2	Middle two digits of power-up font	0
	C3	Last two digits of power-up font	0
	C5	First two digits of power-up font	0
PCL font switching	C8	0:HP compatible mode 32:Compatibility mode	0
Total host buffer size	H8	0 to 99 in units of the size defined by FRPO S5	5
Form feed time-out value	H9	Value in units of 5 seconds (0 to 99).	6 1 (100V)
Reduction (100V model only)	J0	0: 100% 5: 70 % 6: 81 % 7: 86 % 8: 94 % 9: 98 %	0
Auto linefeed mode (100V model only) (Japanese emulation only)	J7	0: Auto linefeed 1: No auto linefeed	0
Horizontal offset (100V model only)	K0	-7 to +7 (Integer), unit: cm	0
	K1	-99 to +99 (Decimal), unit: 1/100 cm	0
Vertical offset (100V model only)*	K2	-7 to +7 (Integer), unit: cm	0
	K3	-99 to +99 (Decimal), unit: 1/100 cm	0

Items	FRPO	Setting value	Factory setting
Kanji font number setting (100V model only)	K4	0: Same as V7 1: Mincho 40 dots 2: Gothic 40 dots 5: Mincho 48 dots 6: Gothic 48 dots	0
New/old JIS code switching (100V model only)	K6	0: JIS X 0208: 1990 1: JIS X 0208: 1978 8: JIS X 0213: 2004	0
KIR mode	N0	0: OFF 2: ON	2
Duplex printing mode selection	N4	0: OFF 1: Long-edge mode (long-edge bind) 2: Short-edge mode (Short-edge bind)	0
Sleep timer time-out time	N5	1 to 240 minutes	60
Eco Print mode	N6	0: OFF 2: ON	0
Resolution	N8	0: 300dpi 1: 600dpi 3: 1200dpi	1
Default emulation mode	P1	6: PCL6 (except PCL XL) 9: KPD L	6 9 (120V)
Carriage-return action	P2	0: Ignores 0x0d 1: CR 2: CR+LF	1
Linefeed action	P3	0: Ignores 0x0d 1: LF 2: CR+LF	1
KPD L auto switching	P4	0: None 1: Auto switching	0 1(120V model)
KPD L auto switching alternate emulation	P5	Same as P1 (except 9)	6

Items	FRPO	Setting value	Factory setting
AES option Page eject command and action when automatic emulation switching (AES) is triggered	P7	If the data is neither applicable to KPD L nor alternate emulation after the AES is started, it is processed in the alternate emulation . 0: All page eject commands 1: None 2: All page eject commands and Prescribe EXIT command 3: Prescribe EXIT command only 4: ^L command only 6: Prescribe EXIT command and ^L command If the data is neither applicable to KPD L nor alternate emulation after the AES is started, it is processed in KPD L. 10: Data other than KPD L print data is printed in the alternate emulation.	10 11 (120V)
Command recognition character	P9	ASCII code of 33 to 126	82(R)
Stacker setting at start-up	R0	1: Main tray 7: When the 4000-sheet finisher is installed	1 7 (When DF-7110 is installed)
Paper size(start-up)	R2	0: Size of the default paper cassette (See R4.) 1: Envelope Monarch 2: Envelope #10 3: Envelope DL 4: Envelope C5 5: Executive 6: Letter 7: Legal 8: ISO A4 9: JIS B5 10: ISO A3 11: JIS B4 12: Ledger 13: ISO A5 14: ISO A6 15: JIS B6 16: Envelope #9 17: Envelope #6-3/4	0

Items	FRPO	Setting value	Factory setting
Paper size(start-up)	R2	18: ISO B5 19: Custom 20: B4toA4(100 V model only) 21: A3toA4(100 V model only) 22: A4toA4[98%](100 V model only) 23: STKtoA4(100 V model only) 24: STKtoB4(100 V model only) 30: C4 31: Hagaki 32: Oufuku Hagaki 33: Oficio II 38: 12x18 39: 8K 40: 16K 42: 8.5x13.5 50: Statement 51: Folio 52: Youkei type 2 53: Youkei type 4	
Default paper source	R4	0: MP paper feed section 1: Cassette 1 2: Cassette 2 3: Cassette 3 4: Cassette 4 5: Cassette 5 6: Cassette 6 7: Cassette 7	1
Sort pin full detection	S3	0: Stop at paper full detection 1: Output tray change at paper full detection	0
A4/Letter override	S4	0: OFF 1: ON	1 0 (100V)
Host buffer size rate (H8 value and integration)	S5	0: 10KB 1: 100KB 2: 1MB	1
Wide A4	T6	0: OFF 1: ON	0
Line spacing	U0	Lines per inch (integer value)	6
	U1	Lines per inch (fraction value)	0
Character spacing	U2	Characters per inch (integer value)	10
	U3	Characters per inch (fraction value)	0

Items	FRPO	Setting value	Factory setting
Country code of the resident fonts	U6	0: US 1: France 2: Germany 3: U.K. 4: Denmark 5: Sweden 6: Italy 7: Spain 8: Japan 9: US legal 10: IBM PC-850 (Multi-lingual) 11: IBM PC-860 (Portuguese) 12: IBM PC-863 (Canadian French) 13: IBM PC-865 (Norwegian) 14: Norway 15: Denmark 2 16: Spain 2 17: Latin America	41 0 (100V)
Supported symbol sets	U7	0: Same as the default emulation mode (P1) 1: IBM 6: PCL	53 0 (100V)
Default font pitch*	U8	Default font pitch/integer	10
	U9	Default font pitch/decimal	0
ANK outline font size at start-up*	V0	Integer value of ANK outline font size at power-up Upper 2-digit/valid value: 00 to 09	0
	V1	Integer value of ANK outline font size at power-up Lower 2-digit/valid value: 00 to 99	12
	V2	Decimal value of ANK outline font size at power-up Valid value: 00, 25, 50, 75	0
ANK outline font name at start-up*	V3	ANK outline font name at power-up	Courier
Initial Kanji outline font size (100 V model only)*	V4	Upper 2-digit integer value of Kanji outline font size at start-up Valid value range: 00 to 09	0
	V5	2-digit integer value of the Kanji outline font size at start-up Valid value range: 00 to 99	10
	V6	2-digit decimal value of the Kanji outline font size at start-up Valid value: 00, 25, 50, 75	0
Initial Kanji outline font name (100V model only)*	V7	Kanji outline font name at start-up	MTHSMINCH O-W3



Items	FRPO	Setting value	Factory setting
Default weight(courier and letter Gothic)	V9	0: Courier = darkness Letter Gothic = darkness 1: Courier = regular Letter Gothic = darkness 4: Courier = darkness Letter Gothic = regular 5: Courier = regular Letter Gothic = regular	5
Paper type for the MP tray	X0	1: Plain 2: Transparency 3: Preprinted 4: Labels 5: Bond 6: Recycled 7: Vellum 8: Rough (except 100V model) 9: Letterhead 10: Color 11: Prepunched 12: Envelope 13: Hagaki 14: Coated 16: Thick 17: High quality 18: Index Tab Dividers 21 to 28 : Custom 1 to Custom 8	1
Paper type (Paper cassettes 1 to 4)	X1 X2 X3 X4	1: Plain 3: Preprinted 5: Bond 6: Recycled 7: Vellum 8: Rough (except 100V model) 9: Letterhead 10: Color 11: Prepunched 12: Envelope 16: Thick 17: High quality 21 to 28 : Custom 1 to Custom 8	1

Items	FRPO	Setting value	Factory setting
Paper type (Option paper cassette 5 to 7)	X5 X6 X7	1: Plain 3: Preprinted 5: Bond 6: Recycled 7: Vellum 8: Rough (except 100V model) 9: Letterhead 10: Color 11: Prepunched 12: Envelope 16: Thick 17: High quality 21 to 28 : Custom 1 to Custom 8	1
Cassette selection mode (PCL)	X9	0: Paper selection depending on an escape sequence compatible with HP-LJ5Si 2: Paper selection depending on an escape sequence compatible with HP-LJ8000	0
Auto error clear at an error	Y0	0: OFF 1: ON	0
Auto error clear timeout time	Y1	Value in units of 5 seconds (0 to 99).	6
Paper error detection at duplex printing Paper size and type error detection at fixed paper source	Y3	0: Not detected 127: Detected	127
Forced duplex printing setting (Media type is Preprinted, Prepunched and Letterhead only)	Y4	0: OFF 1: ON	0
PDF direct printing	Y5	0: Zoom depending on paper size 1: Loads paper which is the same size as the image 2: Loads Letter, A4 size paper depending on the image sizeEnlarges or reduces the image to fit in the current paper size 3: Loads Letter, A4 size paper depending on the image size 8: Printed in full magnification 9: Loads Letter, A4 size paper depending on the image size 10: Loads Letter, A4 size paper depending on the image sizeEnlarges or reduces the image to fit in the current paper size 13 to 99: Same action as default value(0)	0
Job box error control	Y6	0: No error control 1: Output the error list 2: Displays the error 3: Displays the error and prints the error report	3

\*: Ignored depending on emulation

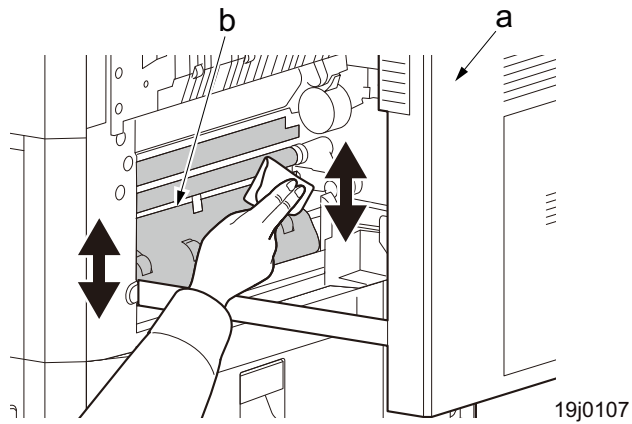
## 9 - 3 Inner Cleaning

### (1) Cleaning the paper conveying plate

If toner is observed at the edge of the paper conveying guide.

#### Procedure

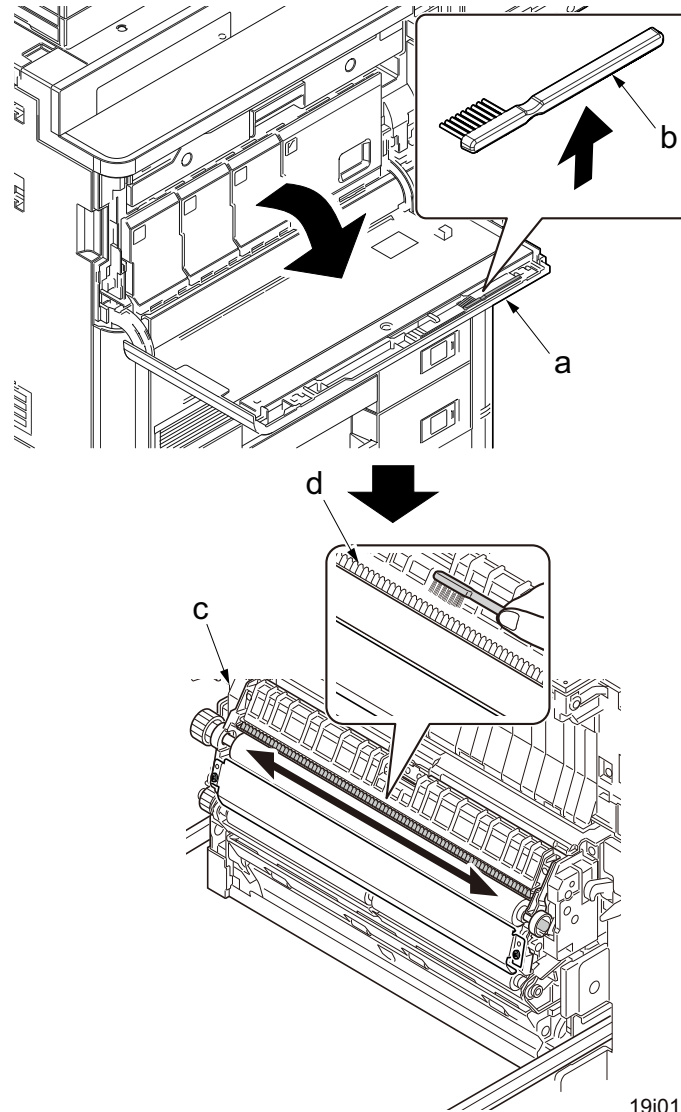
- 1 Pull out the conveying unit (a).**
- 2 Clean the side of the paper conveying plate (b), which paper runs through.**  
Use a dry and soft cloth for cleaning.



## (2)Cleaning the separator

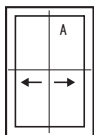
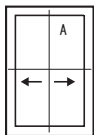
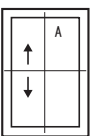
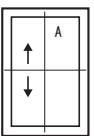
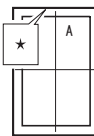
- 1 Open the front cover (a) and remove the cleaning brush (blue colored) (b).
- 2 Pull out the conveying unit (c).
- 3 As shown in the figure, clean dirt from the separator by moving the brush from side to side along the separator.

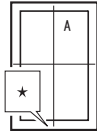
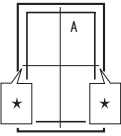
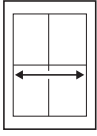
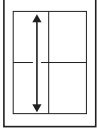
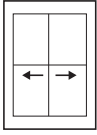
### Procedure

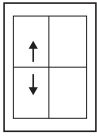


19j0108

## 9 - 4 Chart of image adjustment procedures

Adjusting order	Item	Image	Maintenance mode		Page	Setting procedure		Remarks
			Item No.	Mode		Method	Setting	
1	Adjusting the center line of the MP tray (Adjustment of writing)  Changes the LSU writing start timing.		U034	LSU Out Left	<a href="#">P.6-47</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.[LSU Out Left] -[MPT]</li> <li>3 Press the System Menu key.</li> <li>4 Press the Start key.(Pattern output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	<ul style="list-style-type: none"> <li>• *When the setting value is increased, the image moves rightward.</li> <li>• *When adjusting for the duplex copy, select [Duplex].</li> </ul>
2	Adjusting the center line of the cassettes (Adjustment of writing)  Changes the LSU writing start timing.		U034	LSU Out Left	<a href="#">P.6-47</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.LSU Out Left - [Cassette1] to[Cassette7]</li> <li>3 Press the System Menu key.</li> <li>4 Press the Start key.(Pattern output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	<ul style="list-style-type: none"> <li>• *When the setting value is increased, the image moves rightward.</li> <li>• *When adjusting for the duplex copy, select [Duplex].</li> </ul>
3	Adjusting the leading edge registration of the MP tray (Adjustment of writing)  Changes the secondary paper feed timing.		U034	LSU Out Top	<a href="#">P.6-47</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.[Lsu Out Top] -[MPT(L)]</li> <li>3 Press the System Menu key.</li> <li>4 Press the Start key.(Pattern output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	<ul style="list-style-type: none"> <li>• *When the setting value is increased, the image moves downward.</li> <li>• *When adjusting for the duplex copy, select [Duplex].</li> </ul>
4	Adjusting the leading edge registration of the cassette (Adjustment of writing)  Changes the secondary paper feed timing.		U034	LSU Out Top	<a href="#">P.6-47</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.[Lsu Out Top] - [Cassette(L)]</li> <li>3 Press the System Menu key.</li> <li>4 Press the Start key.(Pattern output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	<ul style="list-style-type: none"> <li>• *When the setting value is increased, the image moves downward.</li> <li>• *When adjusting for the duplex copy, select [Duplex].</li> </ul>
5	Adjusting the leading edge margin (Adjustment of writing)  Changes the LSU illumination start timing.		U402	Lead	<a href="#">P.6-233</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.[Lead]</li> <li>3 Press the System Menu key.</li> <li>4 Press the Start key.(Pattern output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	<ul style="list-style-type: none"> <li>• *When the setting value is increased, the image get longer.</li> </ul>

Adjusting order	Item	Image	Maintenance mode		Page	Setting procedure		Remarks
			Item No.	Mode		Method	Setting	
6	Adjusting the trailing edge margin (Adjustment of writing)  Changes the LSU illumination end timing.		U402	Trail	<a href="#">P.6-233</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.[Trail]</li> <li>3 Press the System Menu key.</li> <li>4 Press the Start key.(Pattern output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	<ul style="list-style-type: none"> <li>*When the setting value is increased, the margin get larger.</li> </ul>
7	Adjusting the left and right margins (Adjustment of writing)  Changes the LSU illumination start/end timing.		U402	A Margin C Margin	<a href="#">P.6-233</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.Select [A Margin] or [C Margin].</li> <li>3 Press the System Menu key.</li> <li>4 Press the Start key.(Pattern output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	<ul style="list-style-type: none"> <li>*When the setting value is increased, the image get longer.</li> </ul>
8	Adjusting magnification of the scanner in the main scanning direction  Processes data.		U065	Main Scan	<a href="#">P.6-73</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content.[Main Scan]</li> <li>3 Press the System Menu key.</li> <li>4 Place an original and press the Start key (Test copy output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	U065: When using on the contact glass <ul style="list-style-type: none"> <li>*When the setting value is increased, the image get larger.</li> </ul>
9	Adjusting magnification of the scanner in the sub scanning direction (scanning adjustment)  Changes the original scanning speed.		U065 U070	Sub Scan Sub Scan(F) Sub Scan(B) Sub Scan(CIS)	<a href="#">P.6-73</a> <a href="#">P.6-78</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content. U065: [Sub Scan] U070: [Sub Scan(F)], [Sub Scan(B)] or [Sub Scan(CIS)]</li> <li>3 Press the System Menu key.</li> <li>4 Place an original and press the Start key. (Test copy output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	U065: When using on the contact glass <ul style="list-style-type: none"> <li>*When the setting value is increased, the image get larger.</li> </ul> U070: When using document processor <ul style="list-style-type: none"> <li>*When the setting value is increased, the image get longer.</li> </ul>
10	Adjusting the center line (Adjustment of reading)  Scan data is processed.		U067 U072	Front Front Back CIS	<a href="#">P.6-76</a> <a href="#">P.6-81</a>	<ol style="list-style-type: none"> <li>1 Press the Start key.</li> <li>2 Select the adjustment content U067: [Front] U072: [Front], [Back] or [CIS]</li> <li>3 Press the System Menu key.</li> <li>4 Place an original and press the Start key. (Test copy output)</li> <li>5 Press the System Menu key.</li> <li>6 Execute the adjustment.</li> </ol>	<ol style="list-style-type: none"> <li>1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.</li> <li>2 Press the Start key to set the setting value.</li> <li>3 Press the [Stop] key.</li> </ol>	U067: When using on the contact glass <ul style="list-style-type: none"> <li>*When the setting value is increased, the image moves leftward.</li> </ul> U072: When using document processor <ul style="list-style-type: none"> <li>*Back adjustment selects [Back] at the time of duplex mode.</li> <li>*When the setting value is increased, the image moves rightward.</li> </ul>

Adjusting order	Item	Image	Maintenance mode		Page	Setting procedure		Remarks
			Item No.	Mode		Method	Setting	
11	Adjusting the leading edge registration (Adjustment of reading)  Changes the original scan start timing.		U066	Front	<a href="#">P.6-75</a>	1 Press the Start key. 2 Press the System Menu key.	1 By using the [Left/Right],[+/-] cursor or the numeric keys, change the setting value.	U066: When using on the contact glass • *When the setting value is increased, the image moves forward.  U071: When using document processor • *Back adjustment selects [Back Head] at the time of duplex mode. • *When the setting value is increased, the image moves forward.
			U071	Front Head Back Head	<a href="#">P.6-79</a>	3 Place an original and press the Start key. (Test copy output) 4 Press the System Menu key. 5 Select the adjustment content U066: [Front] U071: [Front Head] or [Back Head]	2 Press the Start key to set the setting value. 3 Press the [Stop] key.	

When maintenance item U411 (Automatic adjustment in the scanner) is run using the specified original (P/N 7505000005), the following adjustments are automatically made:

- Scanner magnification adjustment in the sub scanning direction (U065)
- Adjusts the scanner leading edge registration (U066)
- Adjusting the scanner center line (U067)
- Chromatic aberration in the main scanning direction
- Chromatic aberration in the sub scanning direction
- MTF correction
- Input gamma in color mode
- Color correction matrix
- Input gamma in monochrome mode

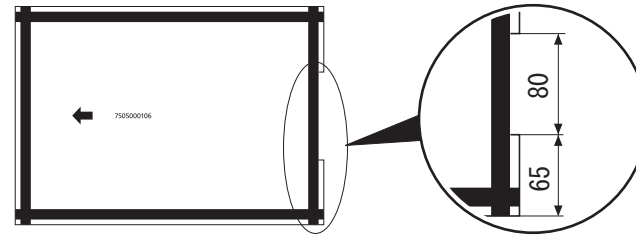
**Image quality**

Items	Specifications
100% magnification	Printer: ±0.8% Copy: ±1.5% Using DP: ±2.0%
Magnification	Copy: ±2.0% Using DP: ±2.5%
Lateral squareness	Copy: ±2.0mm/200mm Using DP: ±2.5mm/200mm
Leading edge timing	Print: 2.0 mm or less Copy: 2.0mm or less Using DP: 2.5mm or less
Skewed paper feed (left-right difference)	Print: 1.0mm /100mm or less Copy: 1.0mm /100mm or less(table) 1.5mm/100mm or less(document processor?)
Lateral image shifting	Print: ±2.0mm or less(cassette) ±3.0mm or less(MP tray) Copy: ±2.0mm or less(cassette) ±3.0mm or less(MP tray) Using DP: ±2.0mm or less(cassette) ±3.0mm or less(MP tray)

When maintenance item U411 (Automatic adjustment in the scanner) is run using the specified original (P/N 302AC68243), the following adjustments are automatically made:

When running this test chart, you first must clean the feed rollers with alcohol and ensure the DP width guides are correctly positioned against the original.

### DP adjustment original (ChartB)



- Adjusting the DP sub scanning magnification (U070)
- Adjusting the DP leading edge registration (U071)
- Adjusting the DP center line (U072)

When maintenance item U411 (Automatic adjustment in the scanner: DP Auto Adj) is run using the specified original, the following adjustments are automatically made:

- Adjusting the DP sub scanning magnification (U070)
- Adjusting the DP leading edge registration (U071)
- Adjusting the DP center line (U072)

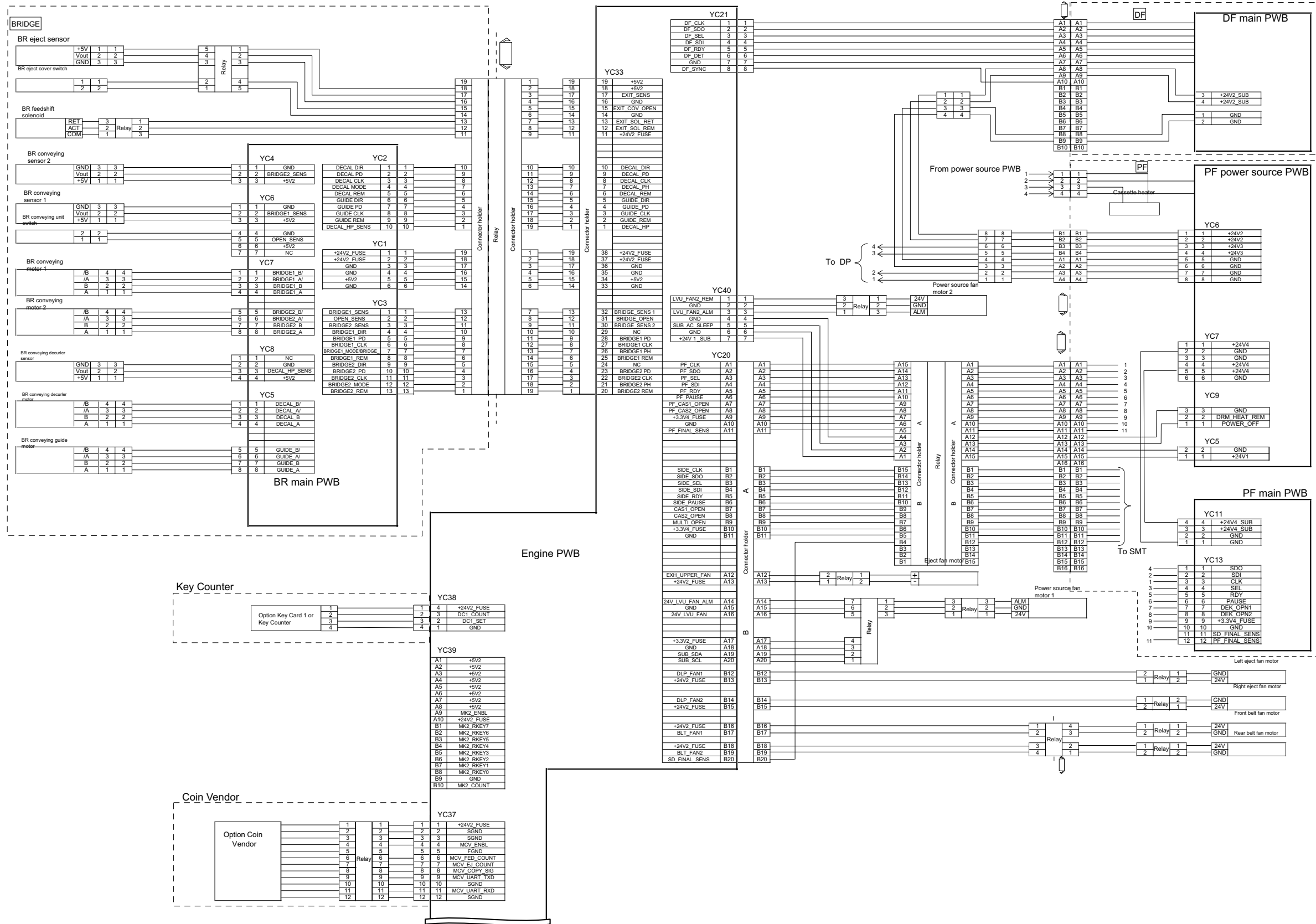
When maintenance item U415 (Print Position Auto Adjust) is run using the specified original, the following adjustments are automatically made. (See page [P.6-251](#))

- Adjusting the printer leading edge registration (U034)
- Adjusting the printer center line (U034)
- Adjusting the printer margin (U402)

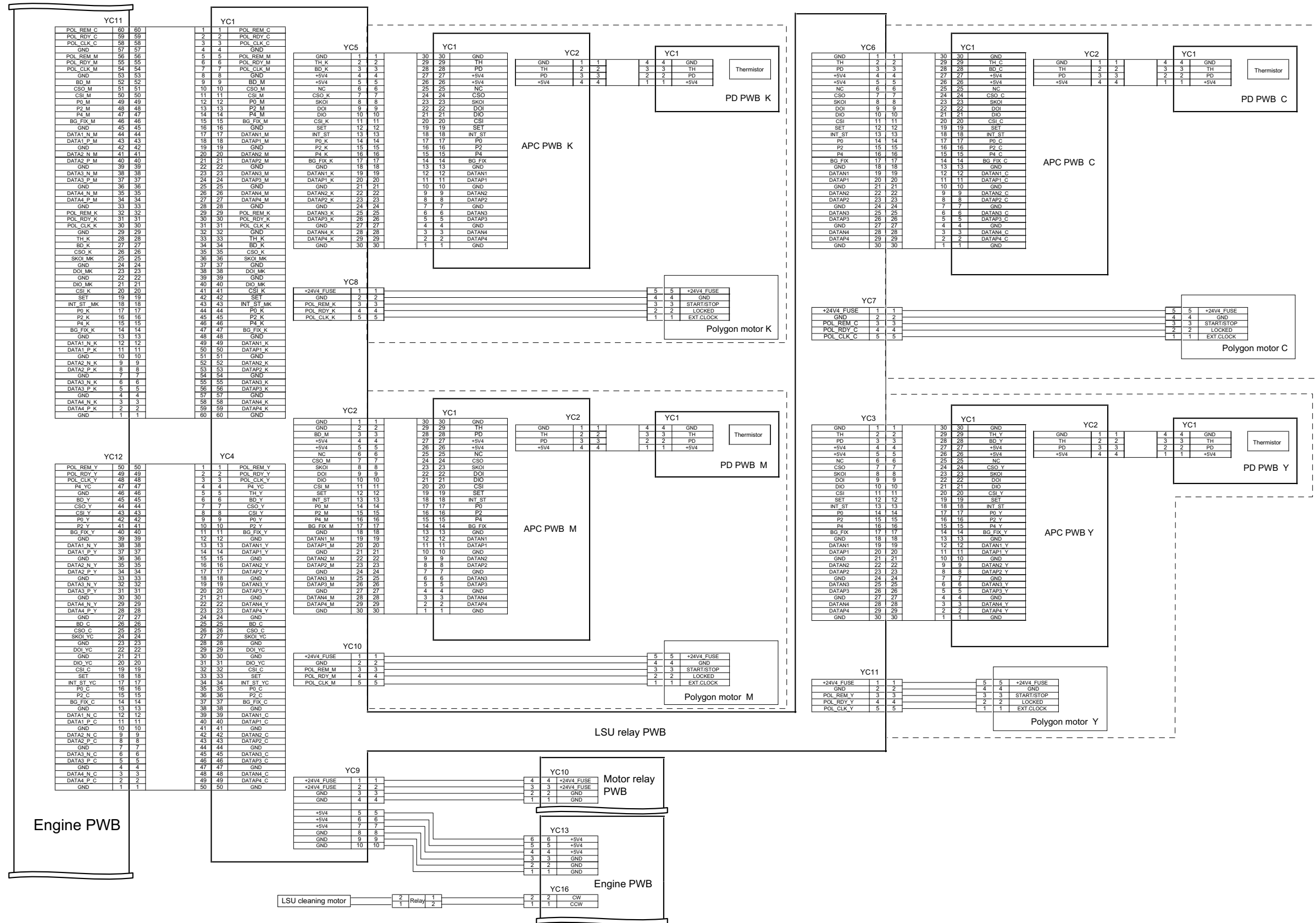


# 9 - 5 Wiring diagram

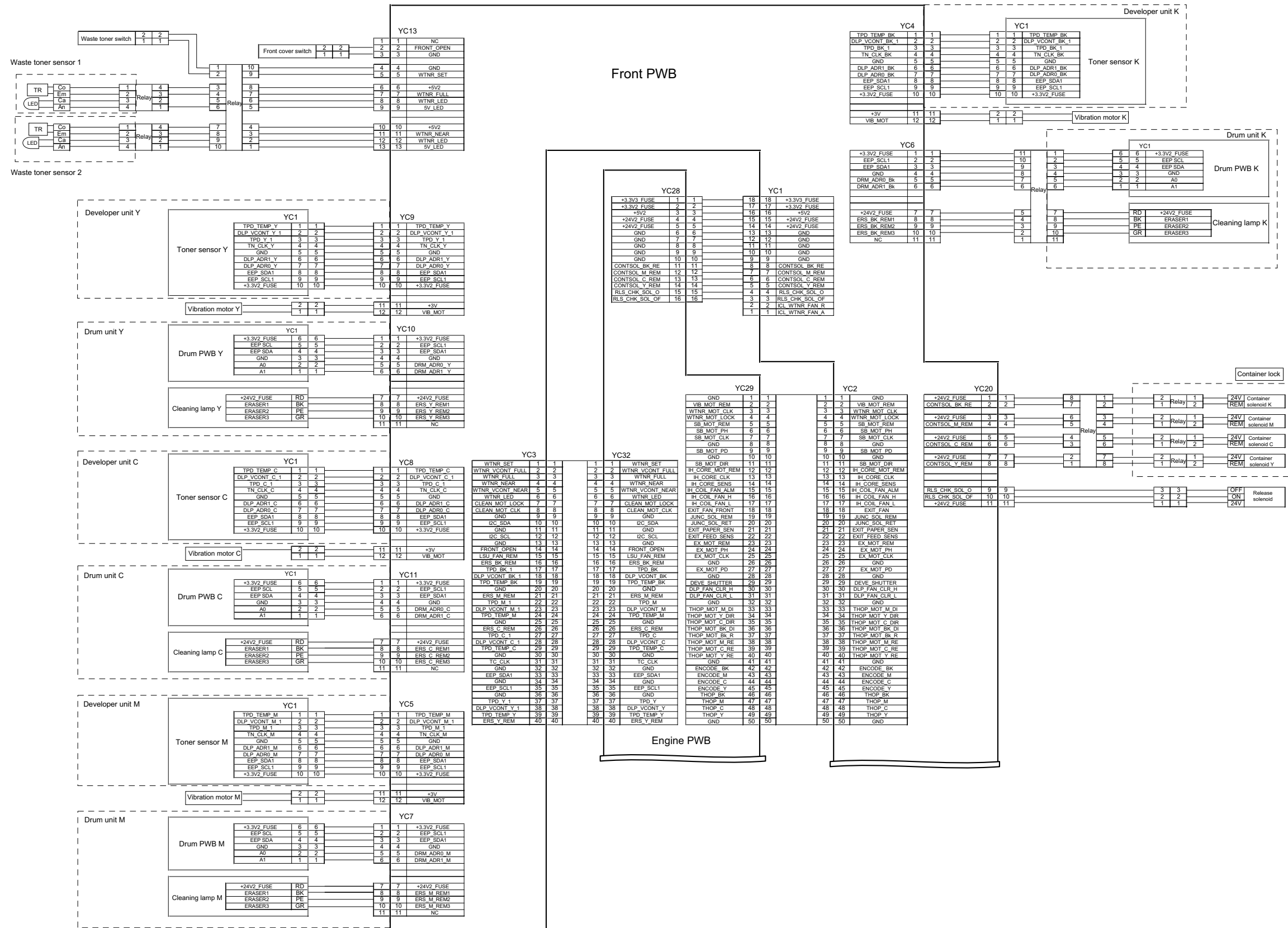
## (1)Engine PWB



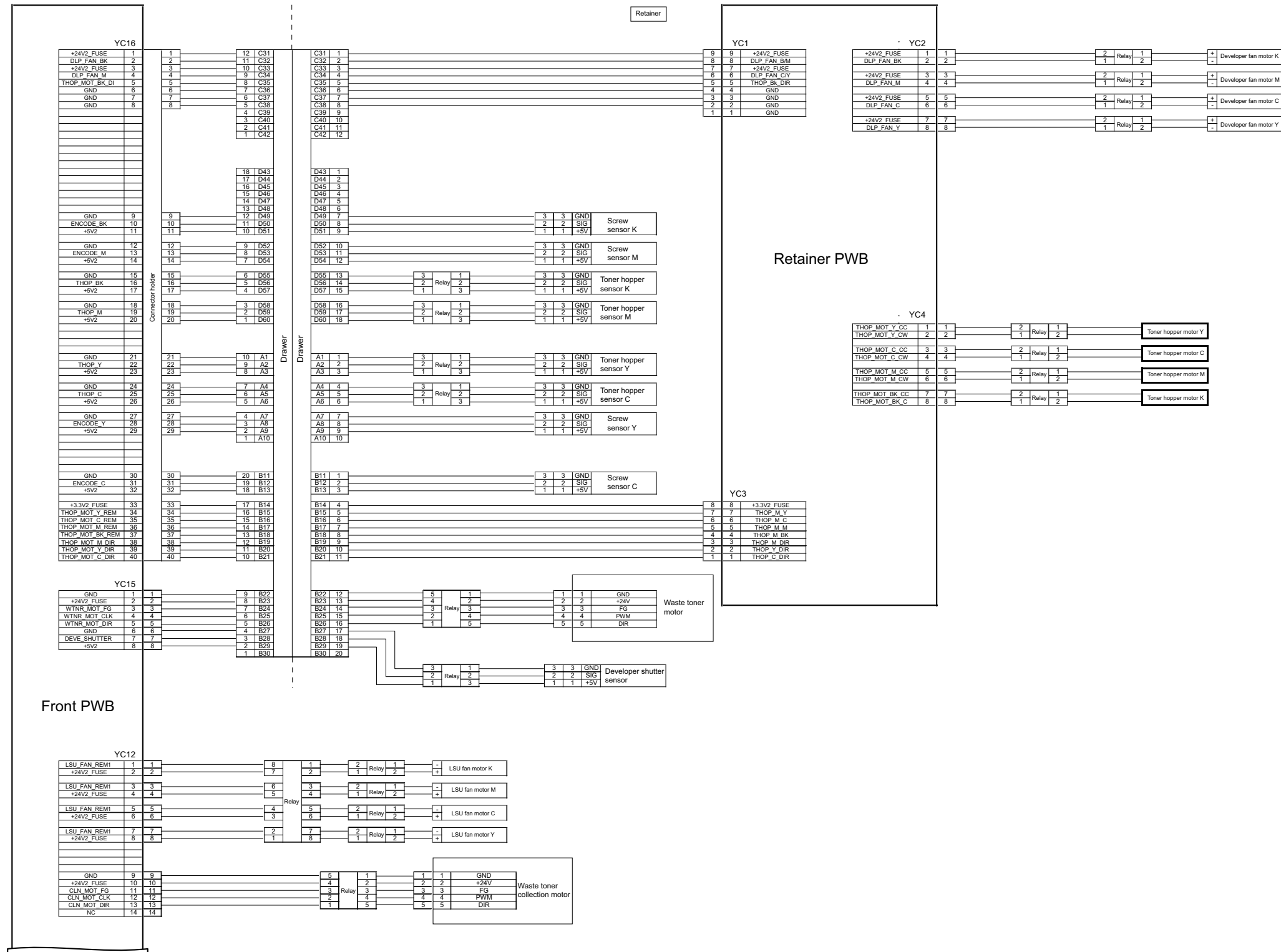
(2)Laser Scanner



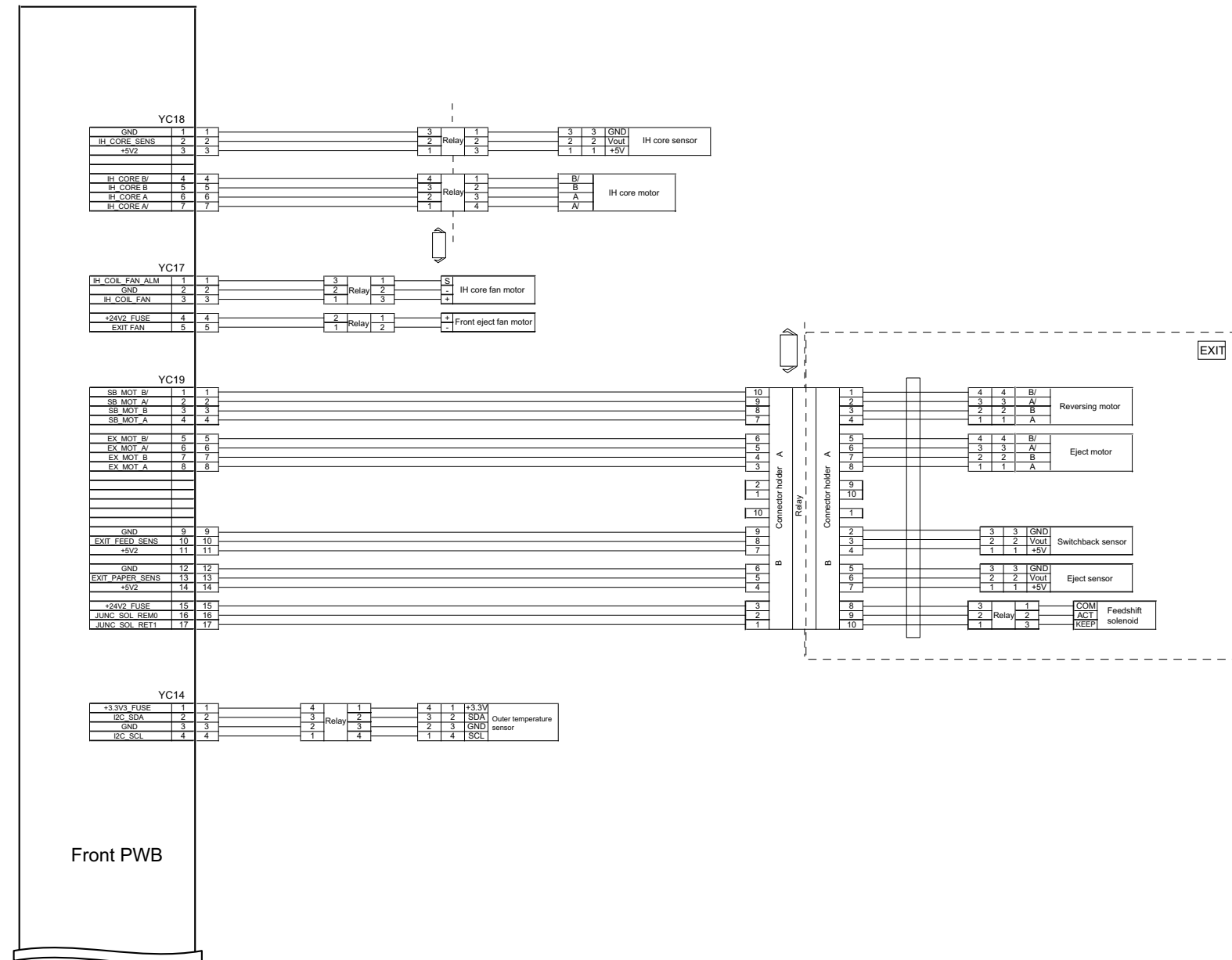
(3)Front PWB (1)



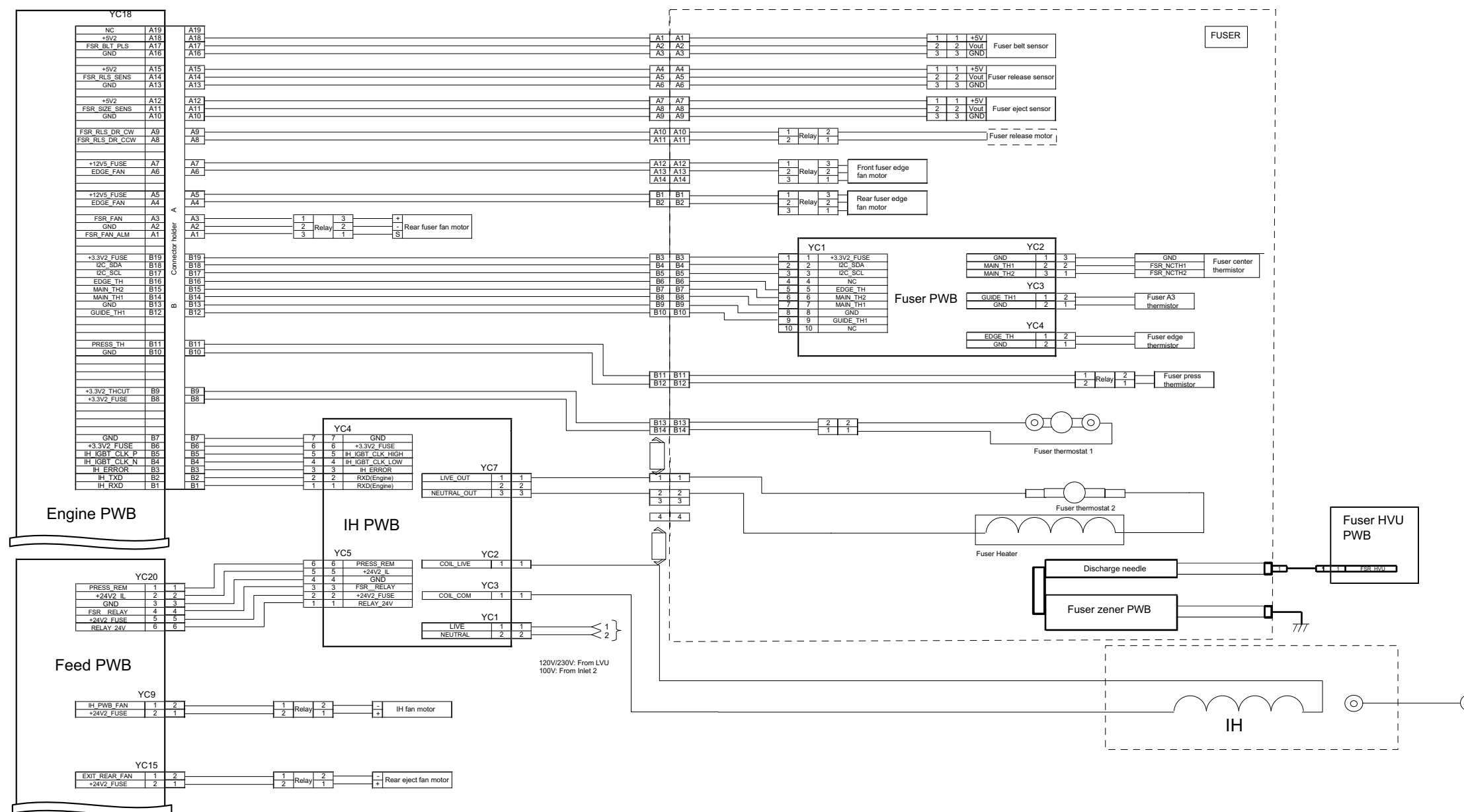
(4)Front PWB (2)



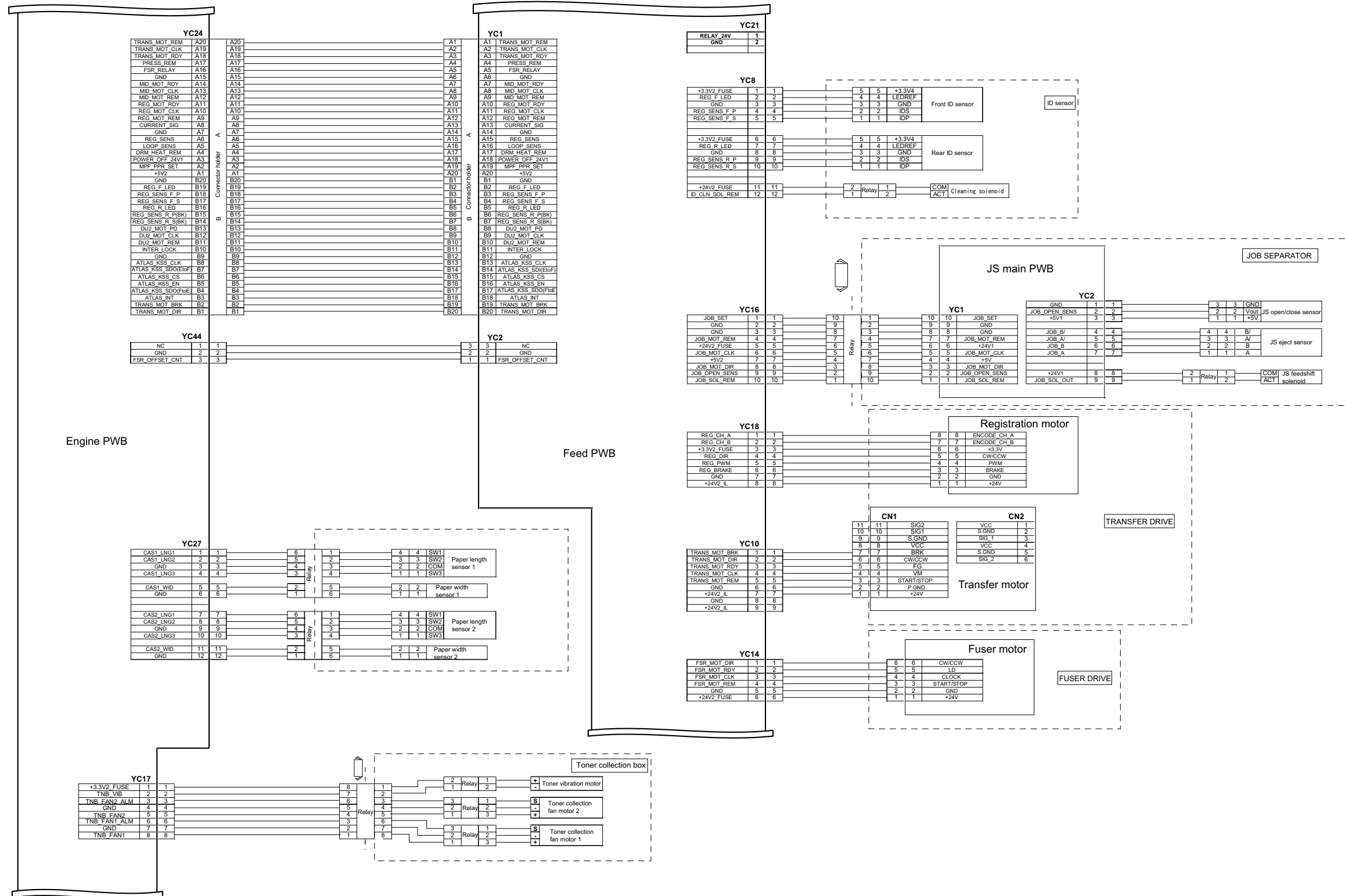
(5)Front PWB (3)



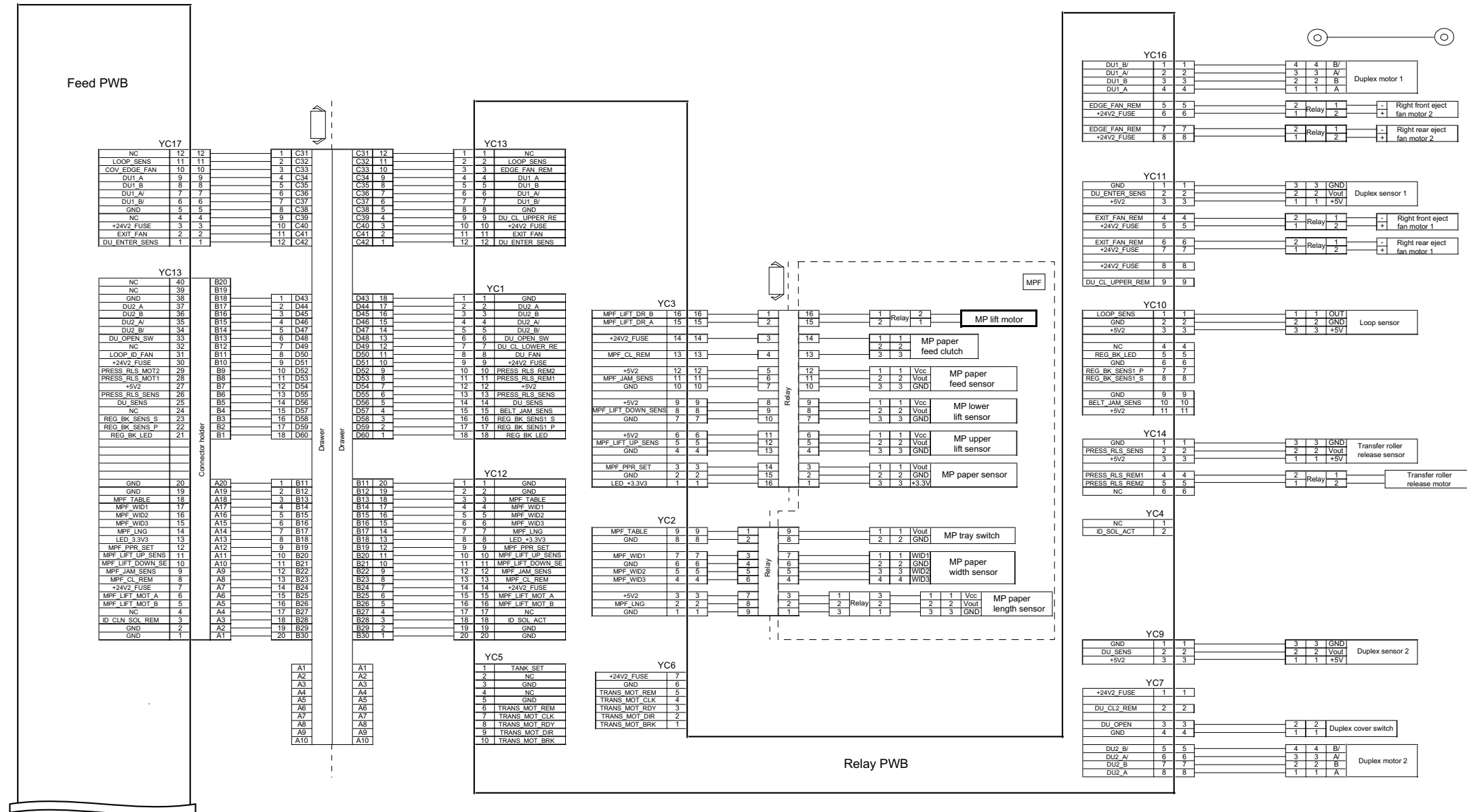
(6)Fuser



(7)Feed PWB (1)

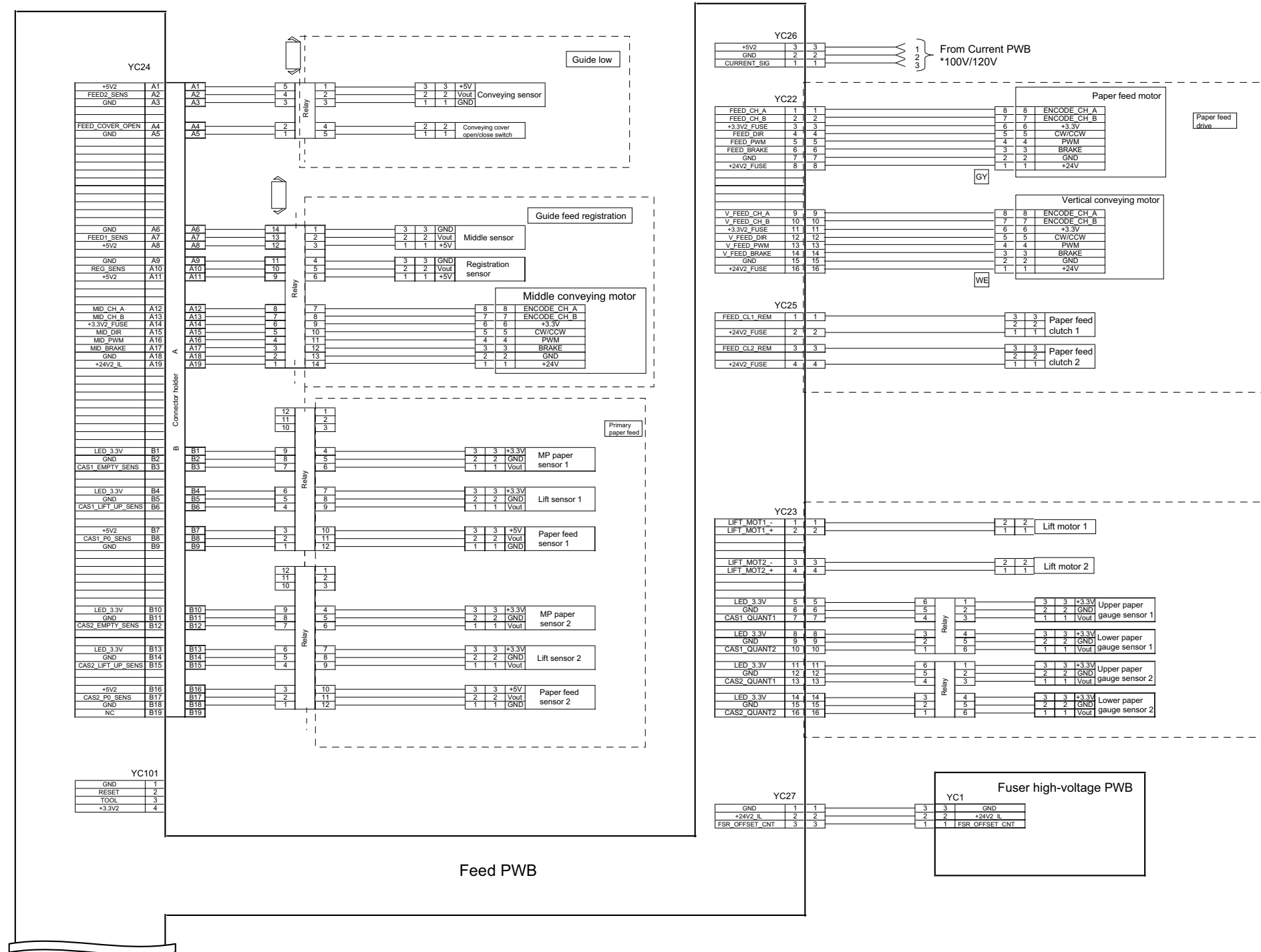


(8)Feed PWB (2)

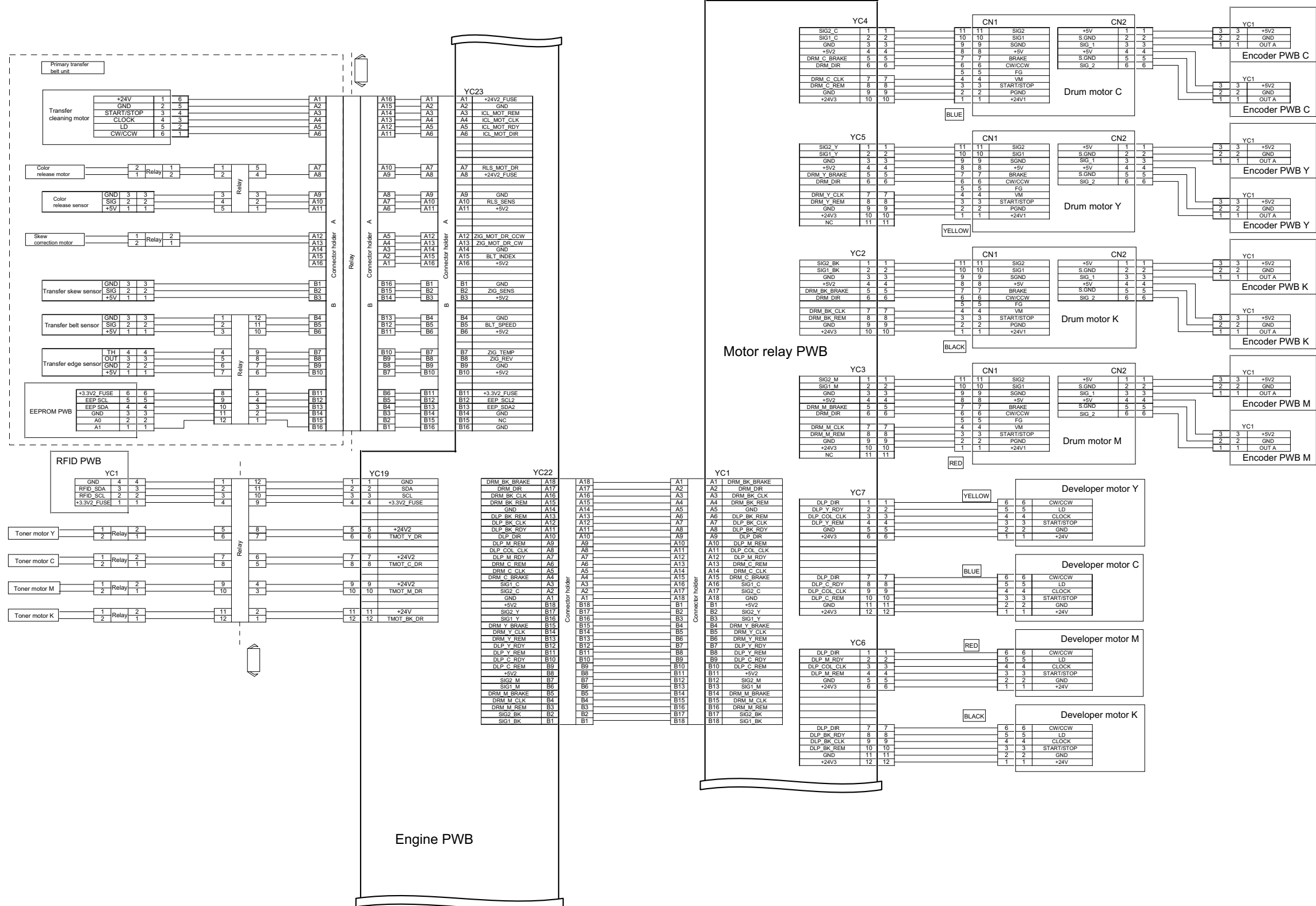




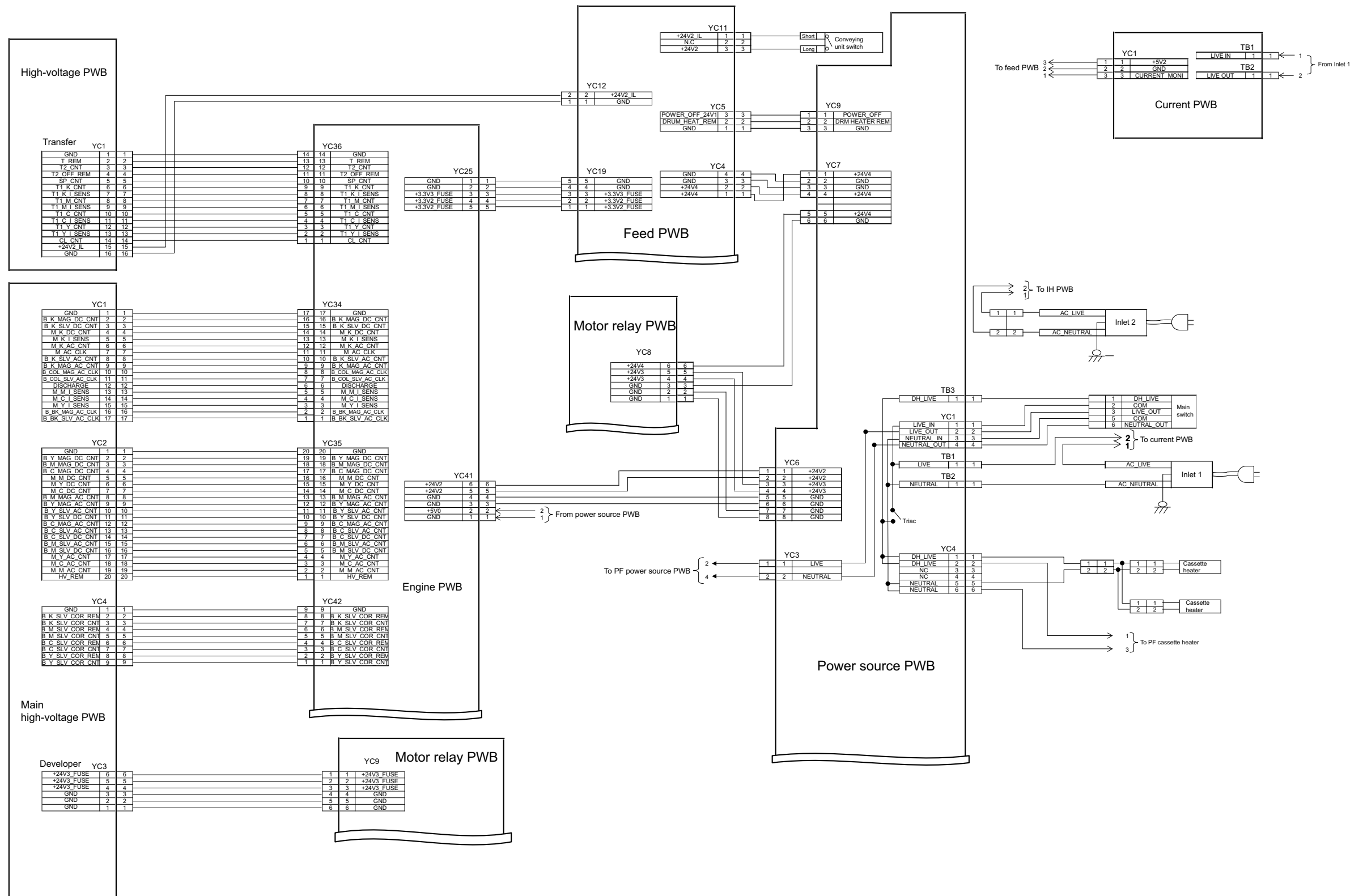
(9)Feed PWB (3)



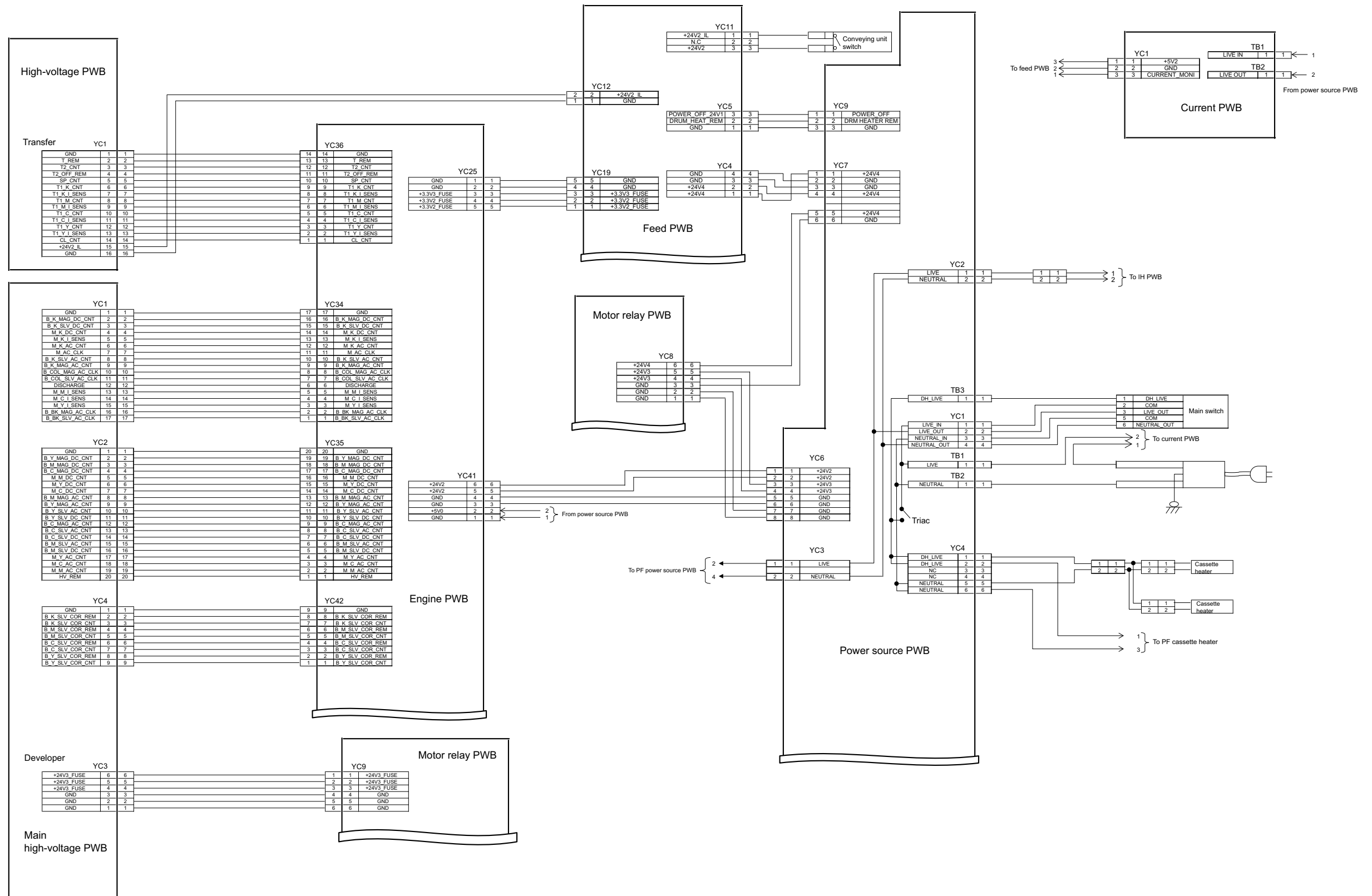
(10)Motor relay PWB



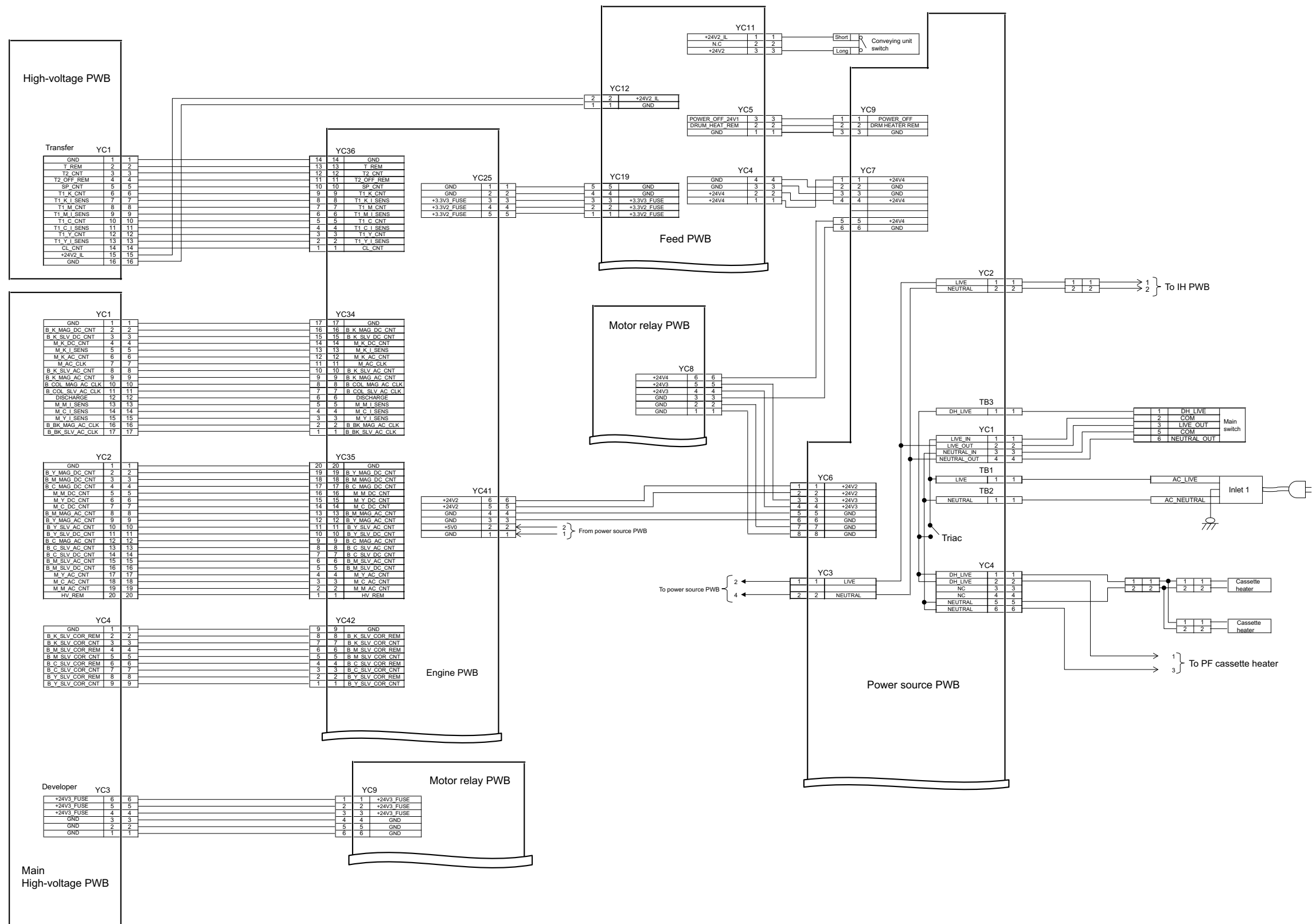
(11)Power source PWB / High-voltage PWB (100V)



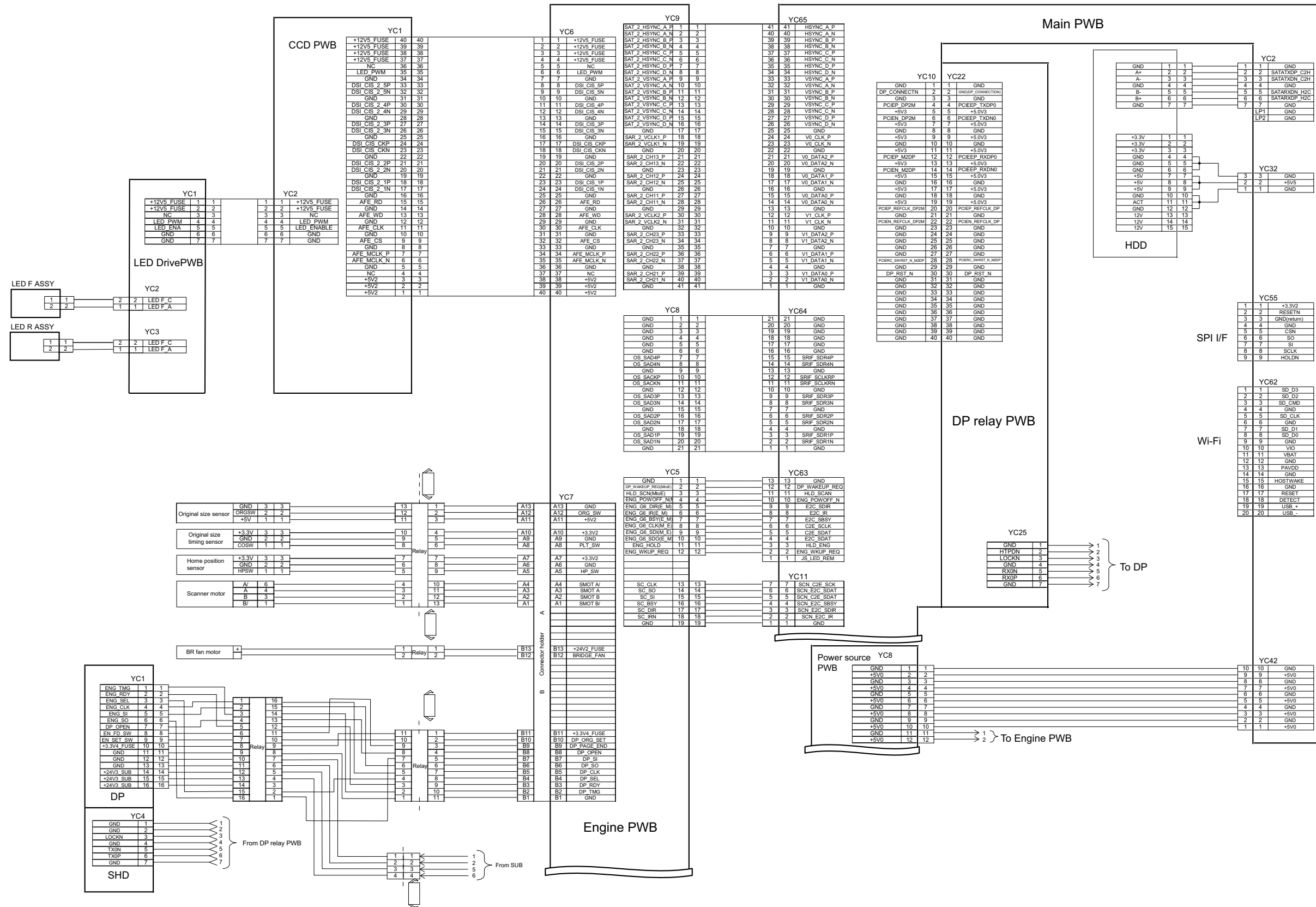
(120V)



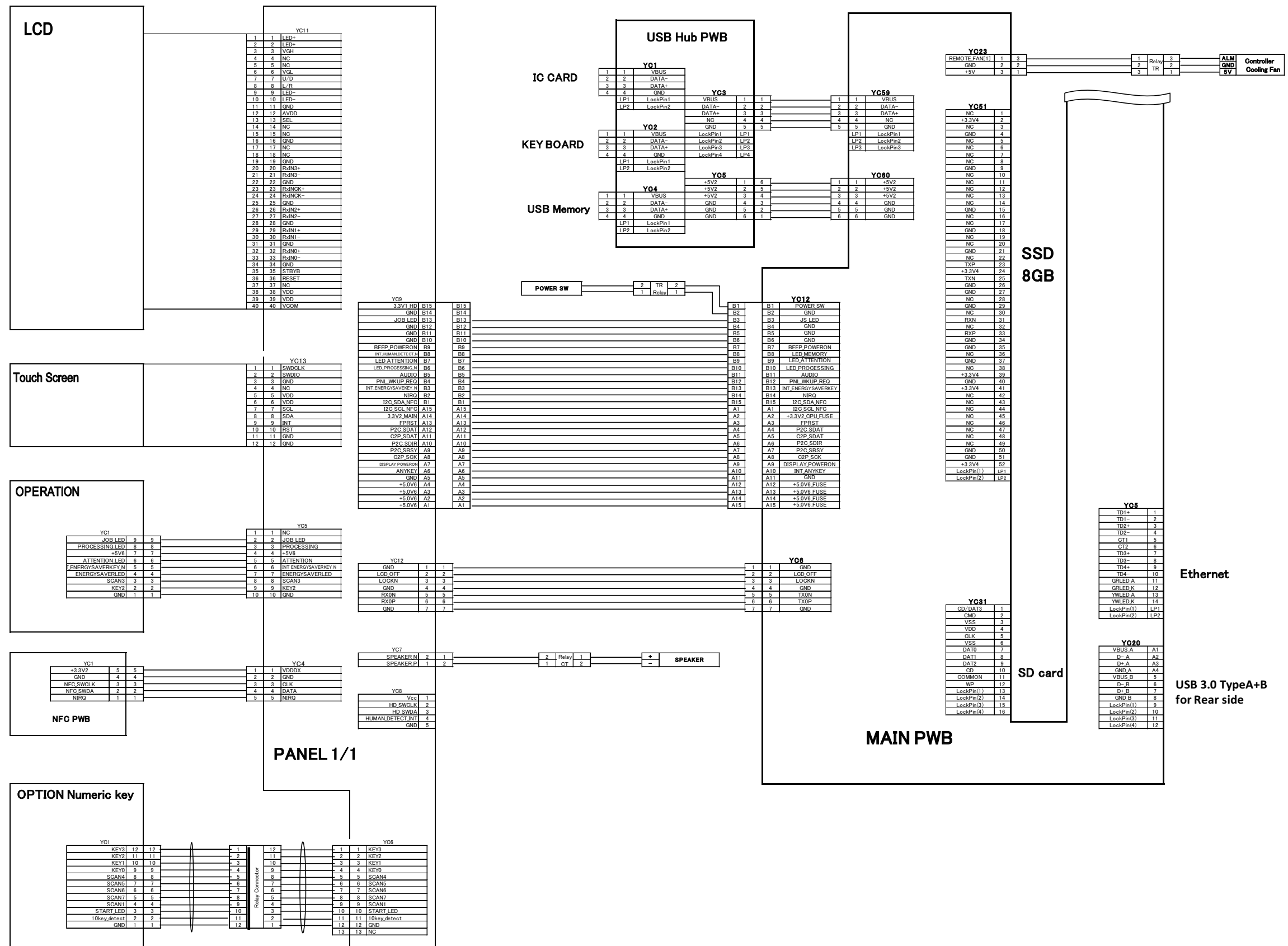
(220-240V)



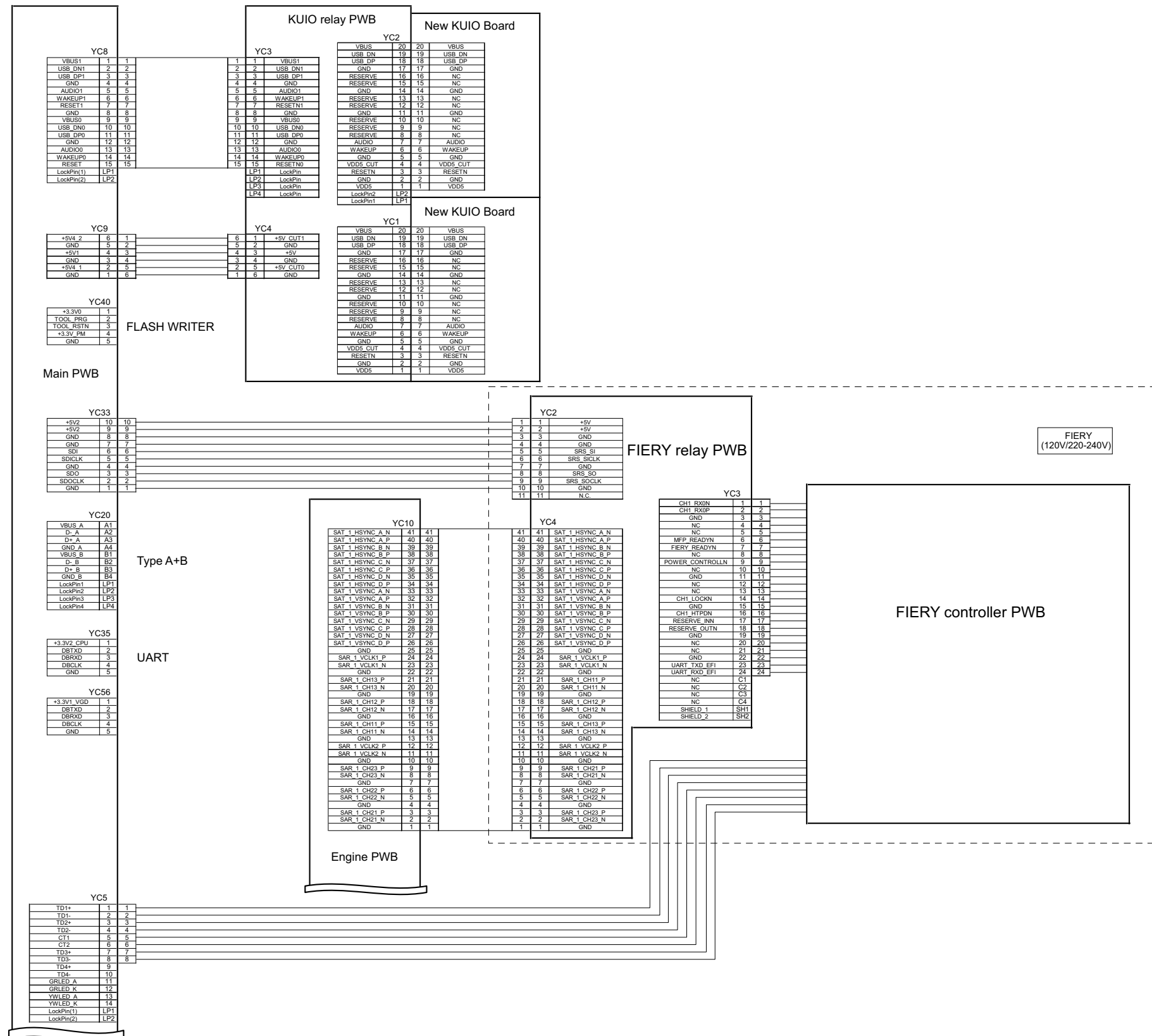
(12)CCD / Engine PWB



(13)Operation panel main PWB

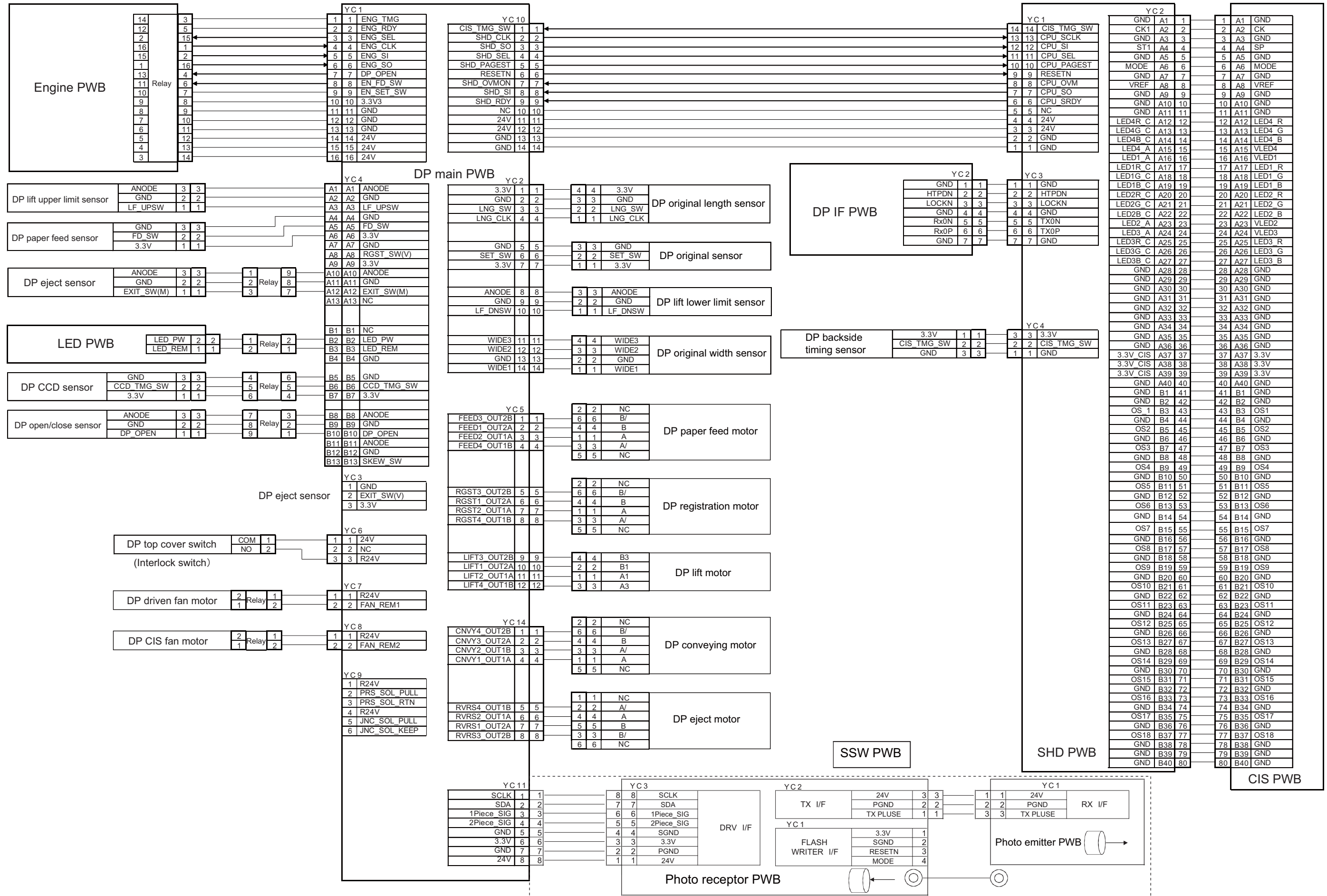


(14)Main PWB

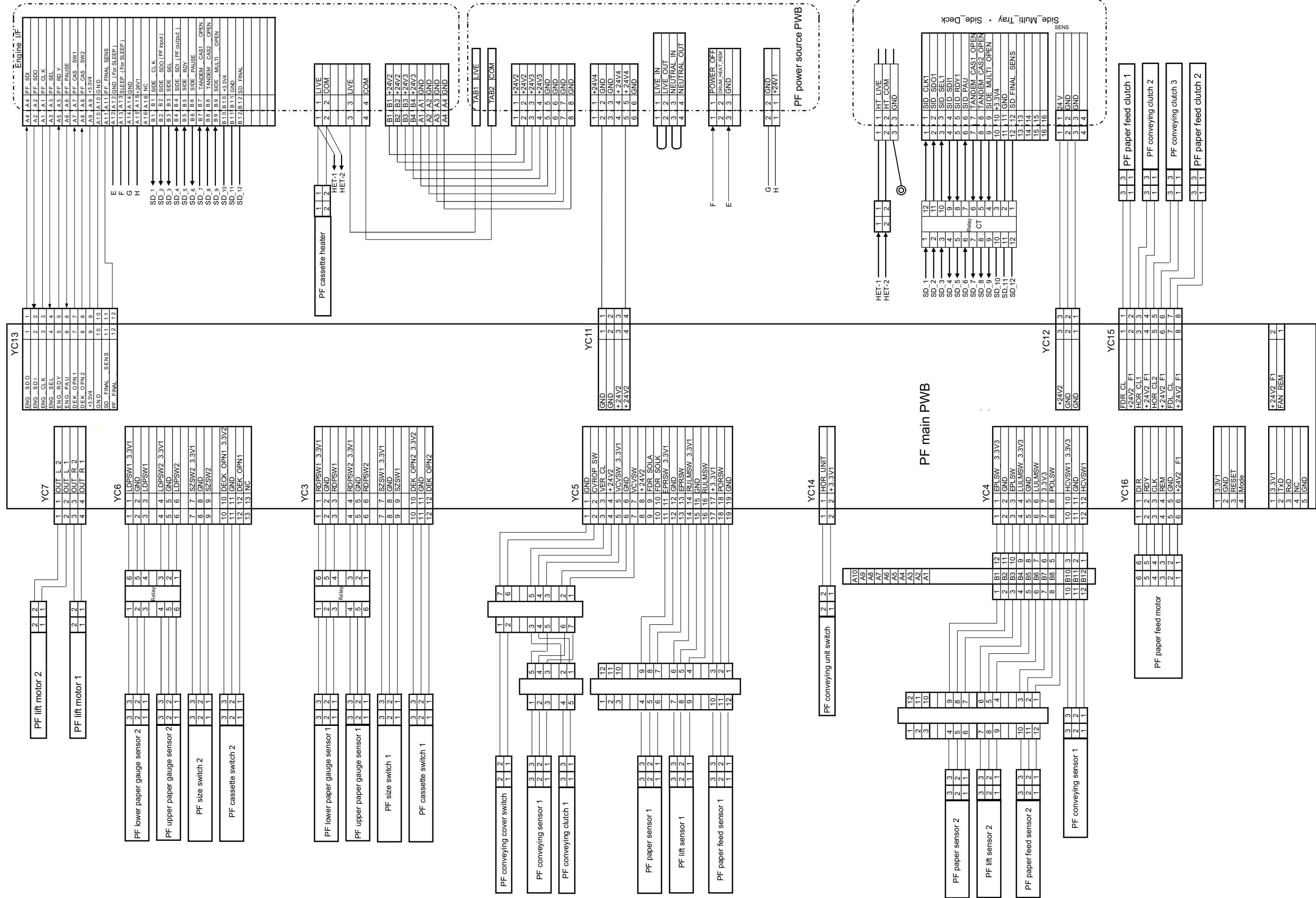




(15) Document processor

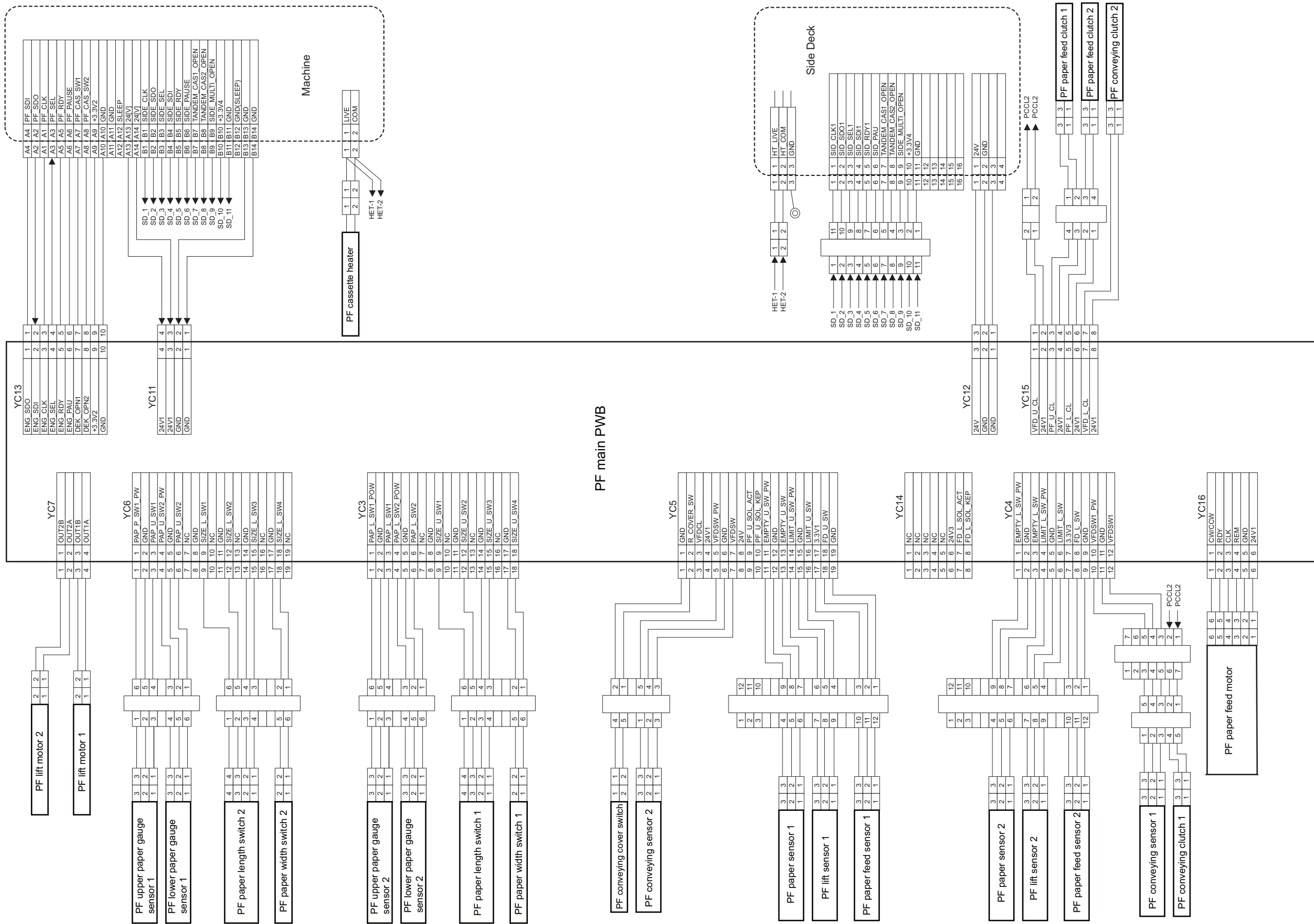


(16)PF main PWB

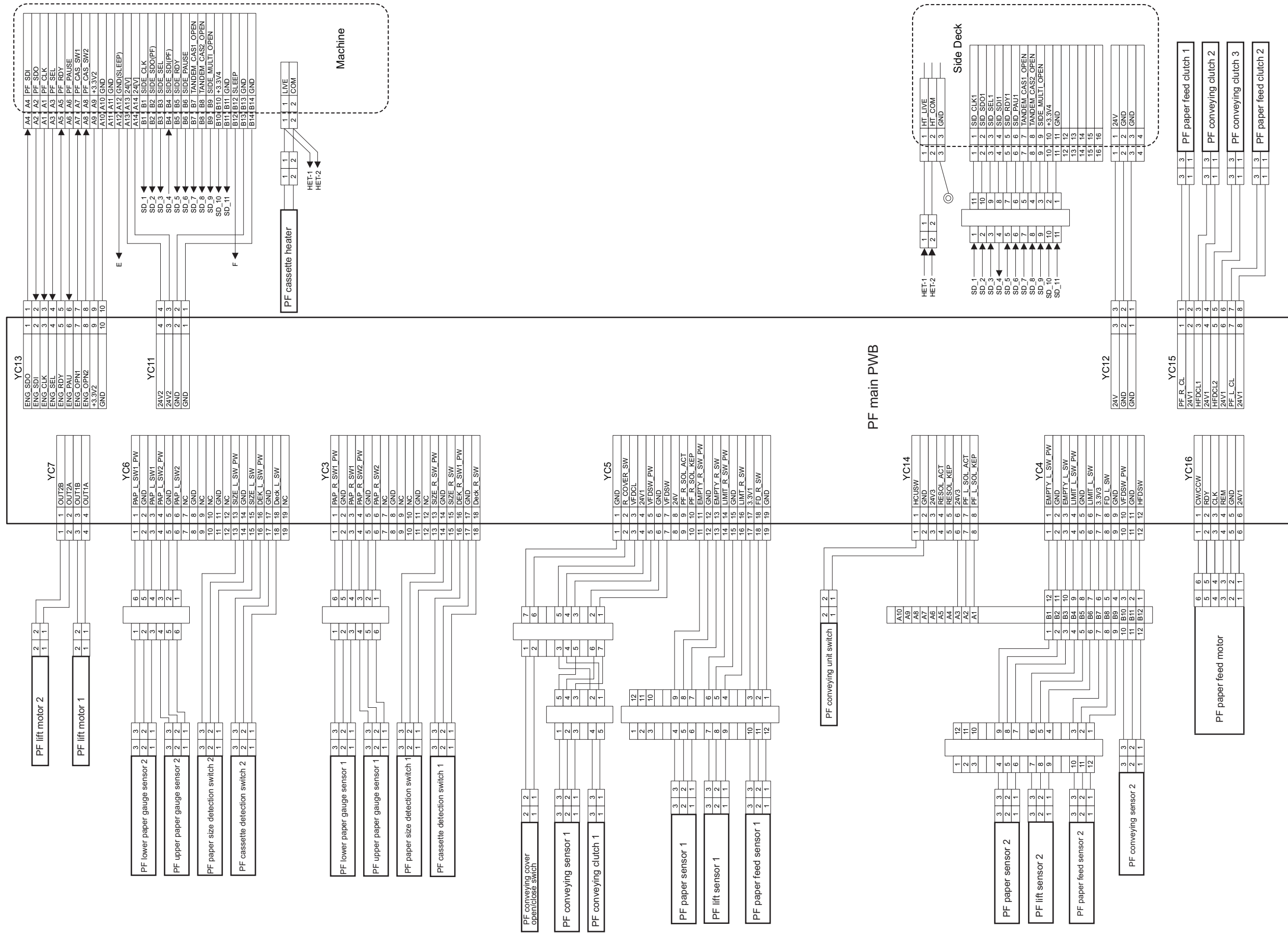


### 9 - 6 Wiring diagram (Options)

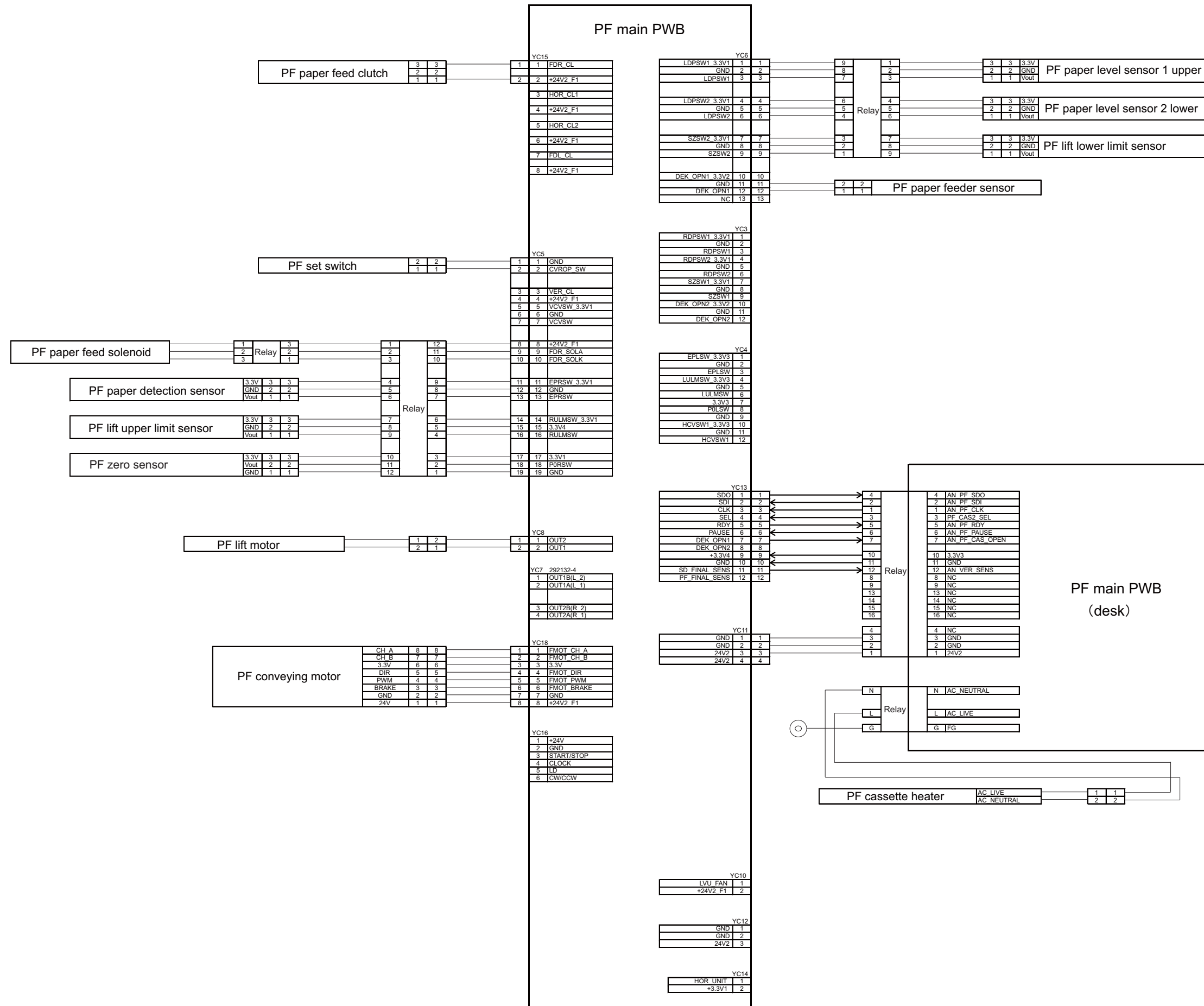
#### (1) Paper feeder (PF-730(B)) wiring diagram



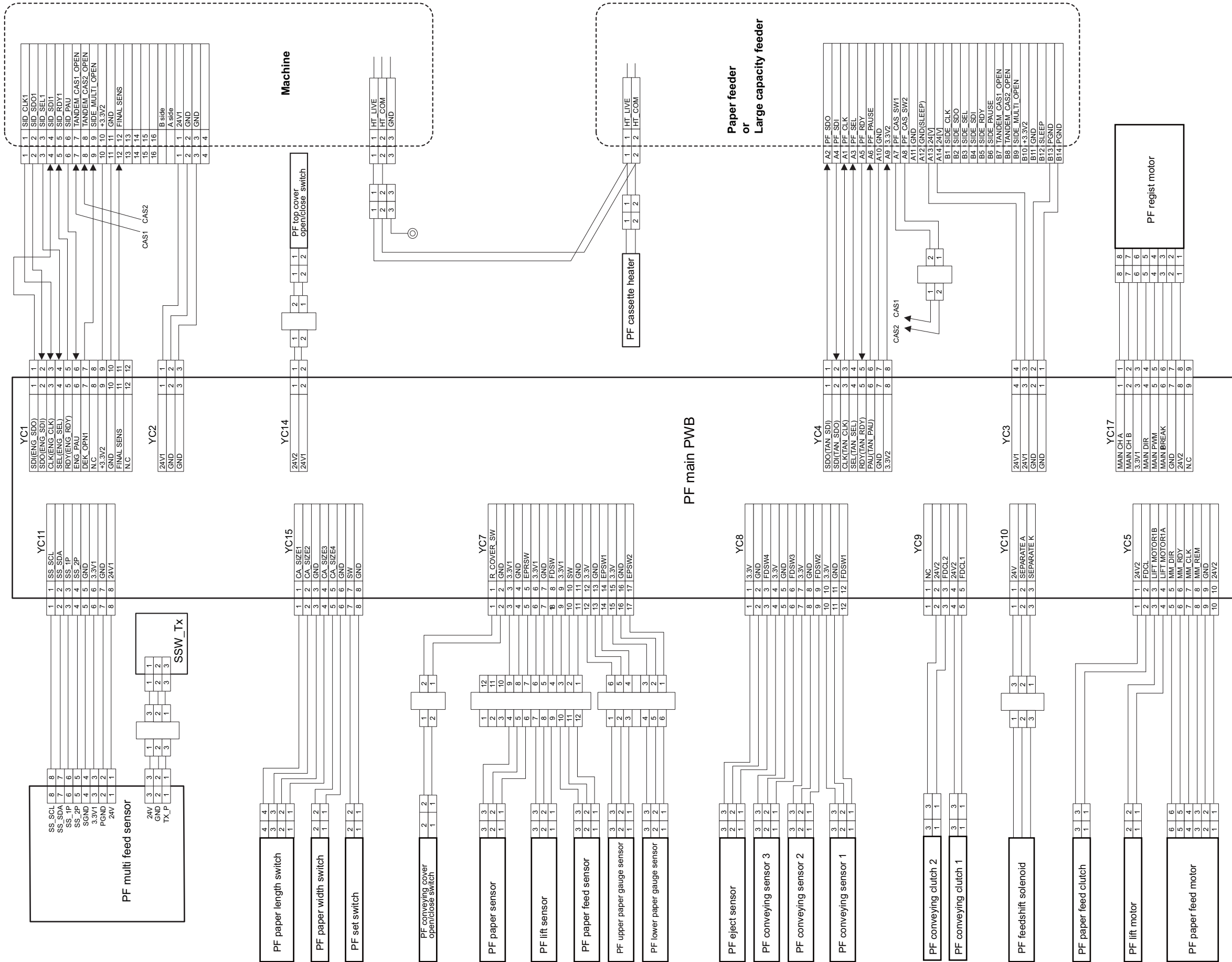
(2) Paper feeder (PF-740(B)) wiring diagram



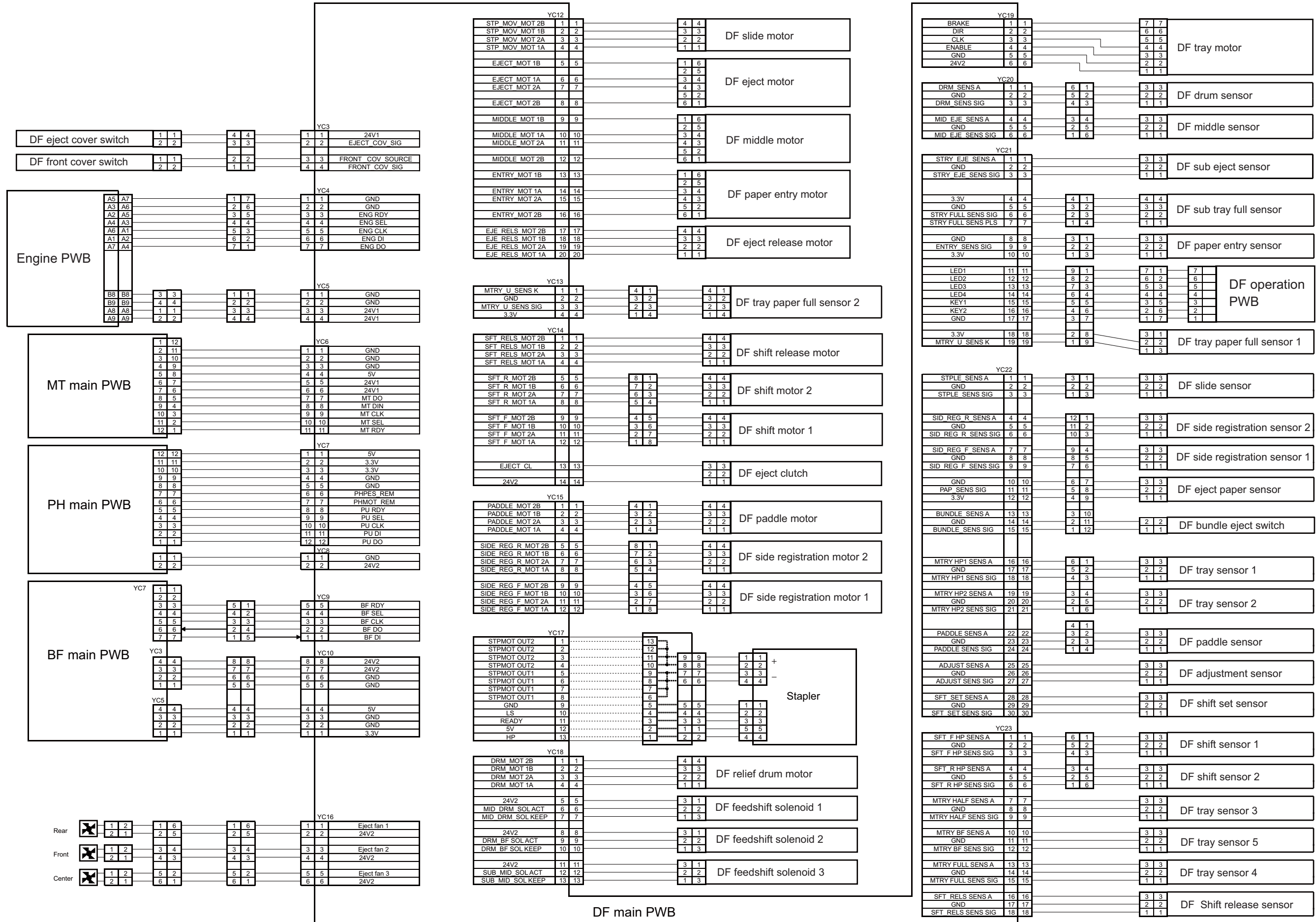
(3) Paper feeder (PF-7120) wiring diagram



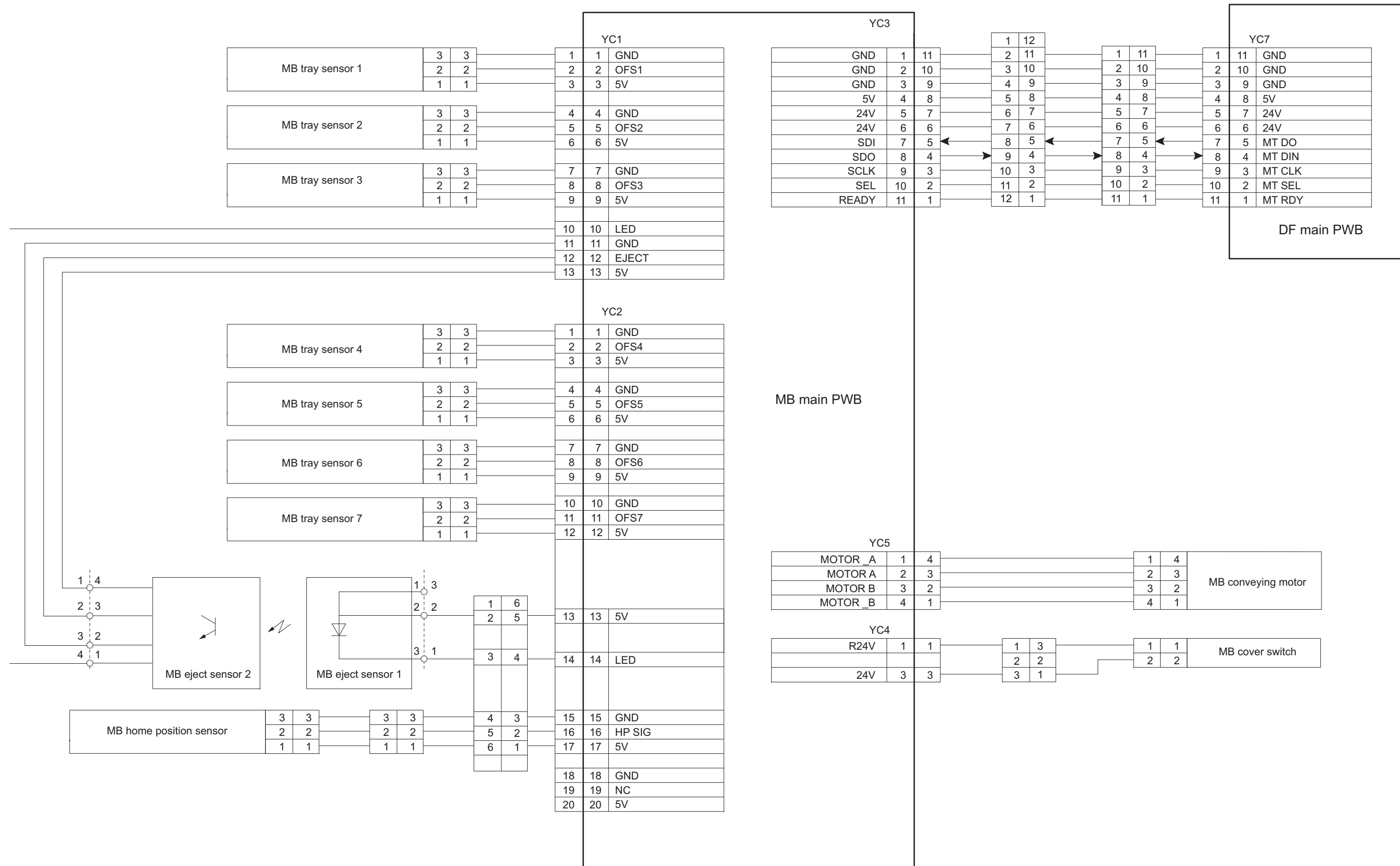
(4)Paper feeder (PF-7130) wiring diagram



(5) Finisher (DF-7110) wiring diagram

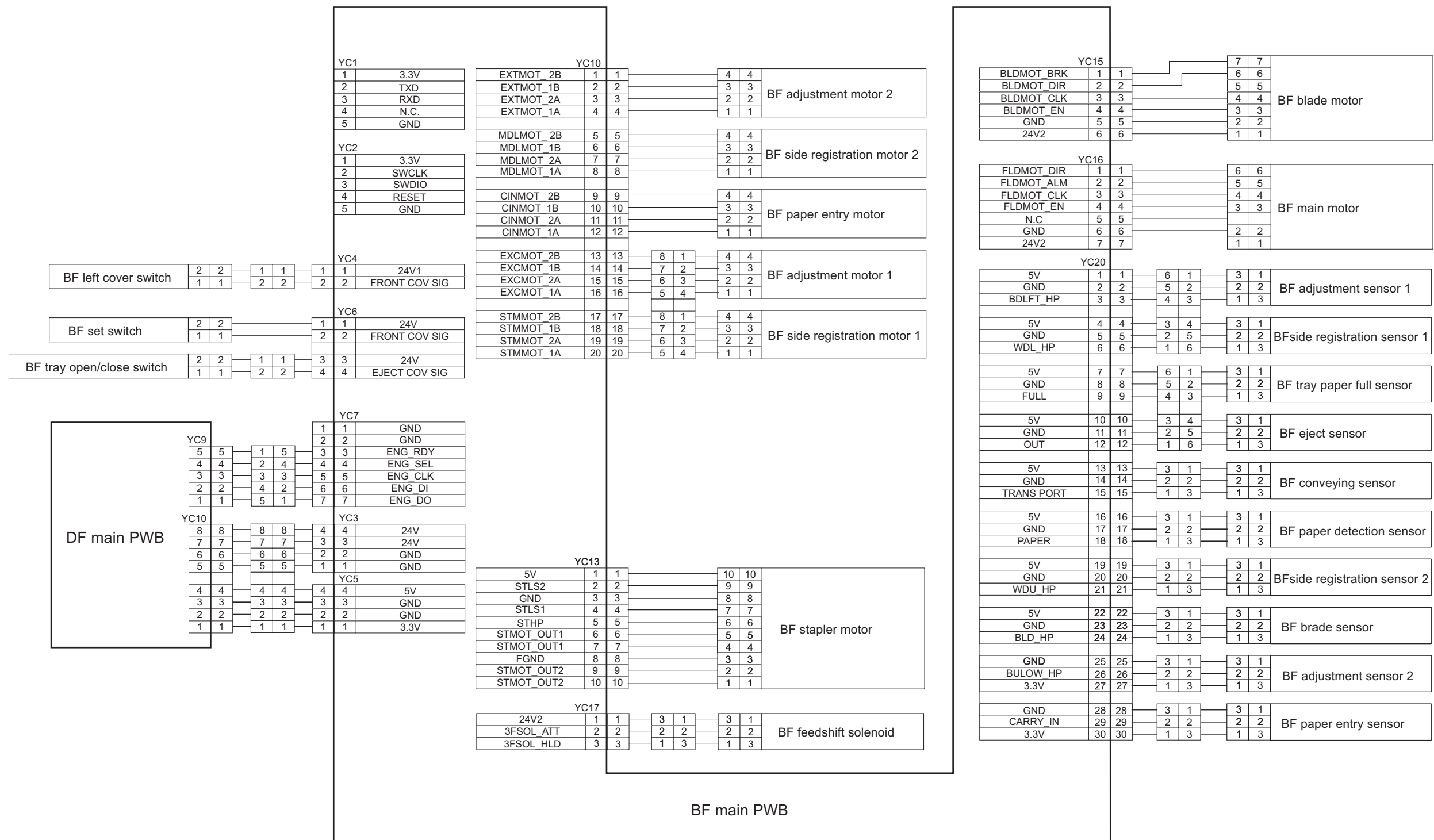


(6)Mailbox (MT-730(B)) wiring diagram: for DF-7110

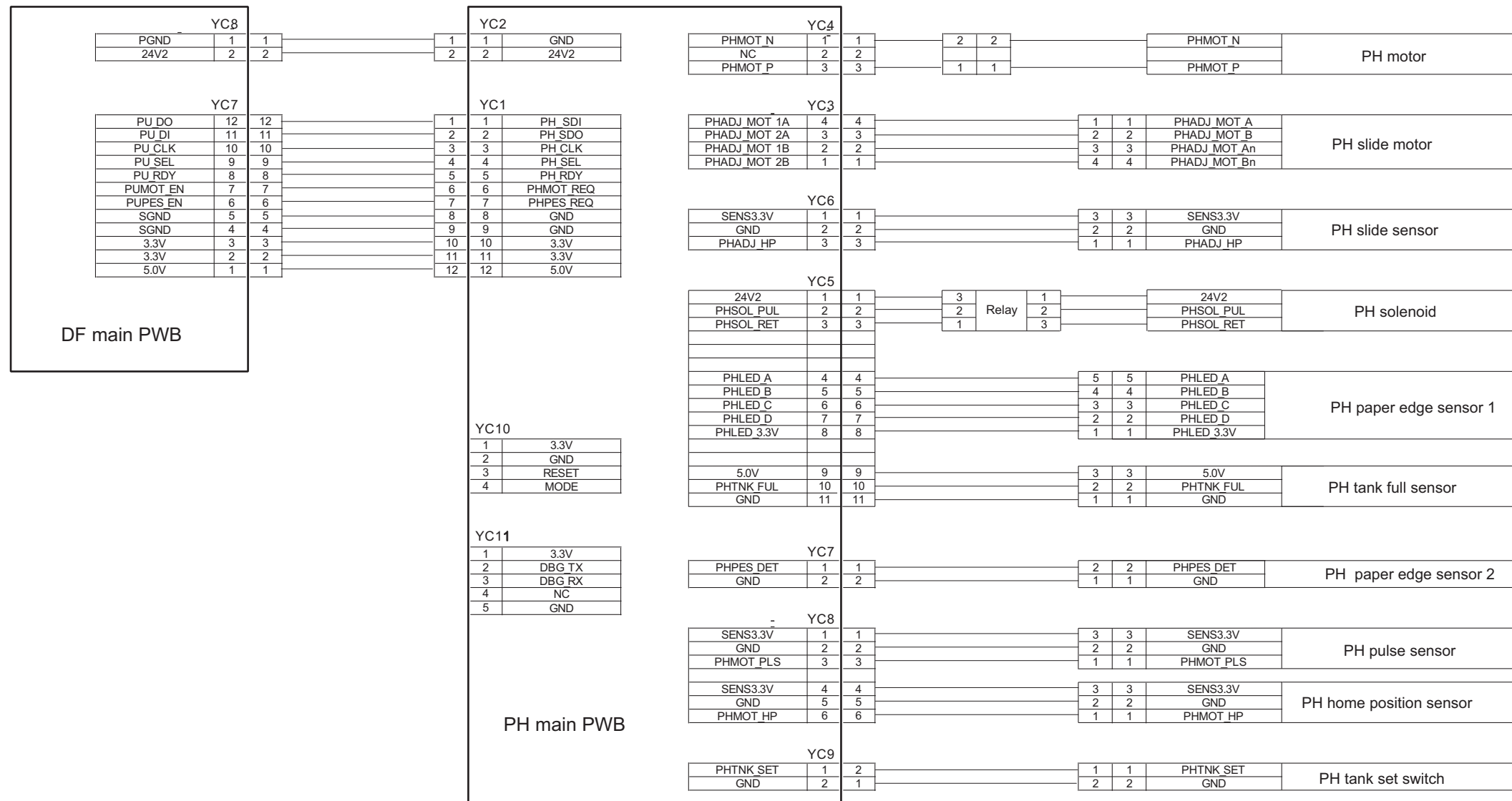




(7)Booklet folder (BF-730) wiring diagram: for DF-7110



(8)Punch unit (PH-7) wiring diagram: for DF-7110



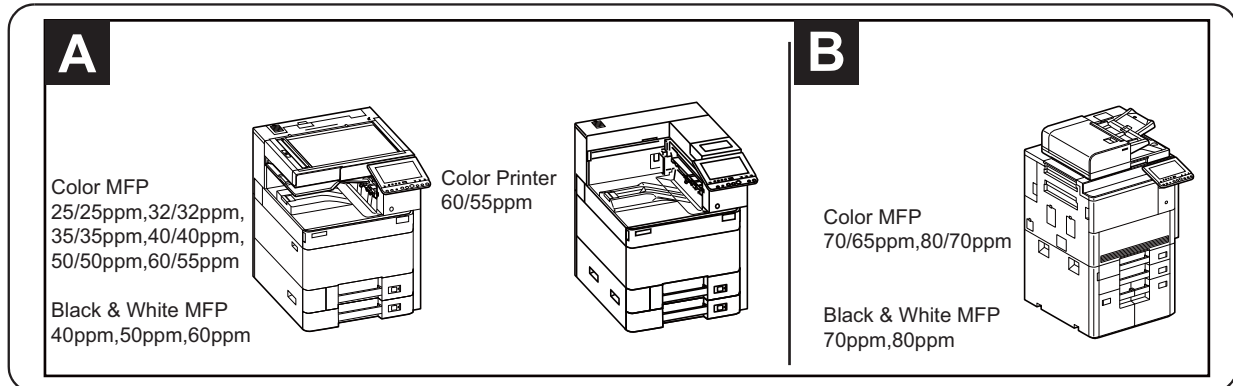
## **9 - 7 Installation Guide**

**(1)PF-7120**

# **PF-7120**

## **(3000 sheet Side Feeder)**

# **Installation Guide**

**English**

A different procedure is required depending on the product which is installed with this unit. Each procedure is described in the following pages.  
For installation with the MFP(A) / Printer, see Page 1 to Page 10, Page 16 to Page 24.  
For installation with a MFP(B), see Page 11 to Page 24.

**Français**

Une procédure différente est requise selon le produit qui est installé avec cette unité. Chaque procédure est décrite dans les pages suivantes.  
Pour l'installation avec une imprimante multifonction(A) Imprimante, voir Page 1 à Page 10, Page 16 à Page 24.  
Pour l'installation avec une imprimante multifonction(B), voir Page 11 à Page 24.

**Español**

El procedimiento es diferente según el producto que se instale con esta unidad. En las siguientes páginas, se describe cada procedimiento.  
Para la instalación con un MFP(A) / Impresora, consulte las páginas de la 1 a la 10, páginas de la 16 a la 24.  
Para la instalación con un MFP(B), consulte las páginas de la 11 a la 24.

**Deutsch**

Je nach verwendetem Modell ist eine andere Vorgehensweise zur Installation dieses Teils erforderlich. Die unterschiedlichen Vorgehensweisen werden auf den folgenden Seiten erläutert.  
Bei Installation an einem MFP(A) / Drucker siehe Seiten 1 bis 10, Seiten 16 bis 24.  
Bei Installation an einem MFP(B) siehe Seiten 11 bis 24.

**Italiano**

Si richiede una procedura diversa in funzione del prodotto su cui è installata l'unità. Le singole procedure sono descritte nelle pagine seguenti.  
Per l'installazione con un MFP(A) / stampante, vedere le pagine da 1 a 10, pagine da 16 a 24.  
Per l'installazione con un MFP(B), vedere le pagine da 11 a 24.

**简体中文**

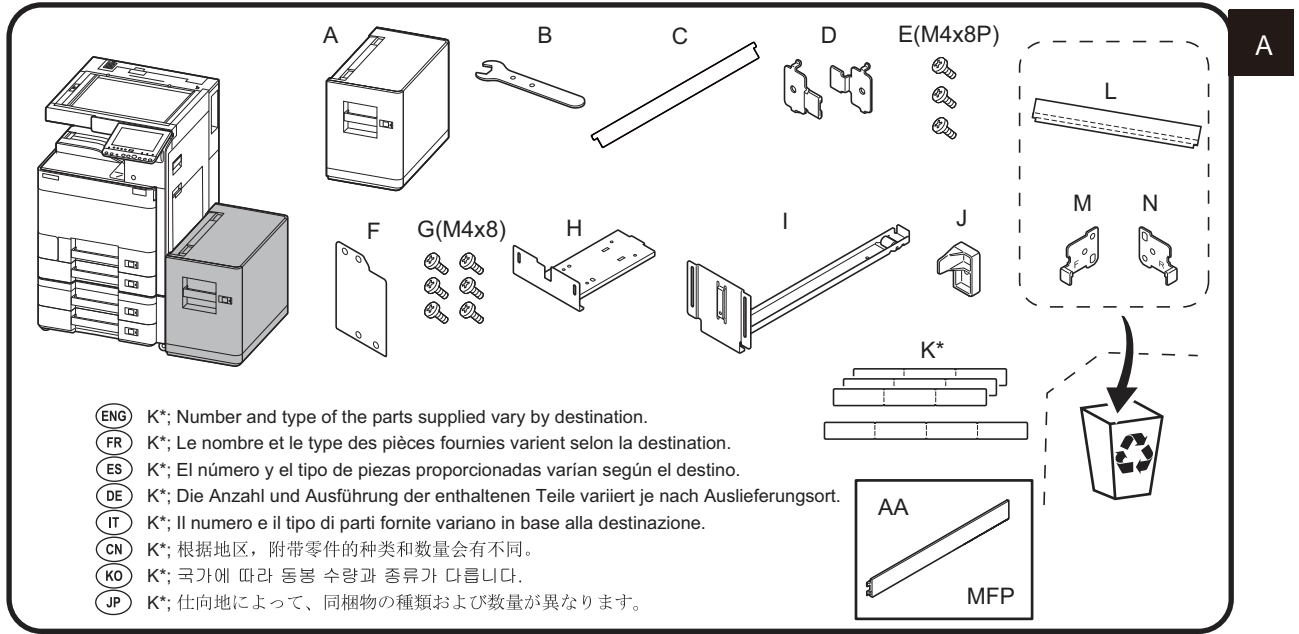
根据安装对象，安装步骤略有不同。各个步骤记载在下面的页面。  
安装到 MFP(A) / 打印机上时，请参见 P1-P10, P16-P24。  
安装到 MFP(B) 上时，请参见 P11-P24。

**한국어**

이 장치에 설치되는 제품에 따라 절차가 다릅니다. 다음 페이지에서 각 절차를 설명합니다.  
MFP(A) / 프린터에 설치하는 경우 1 페이지 ~ 10 페이지, 16 페이지 ~ 24 페이지를 참조하십시오.  
MFP(B) 에 설치하는 경우 11 페이지 ~ 24 페이지를 참조하십시오.

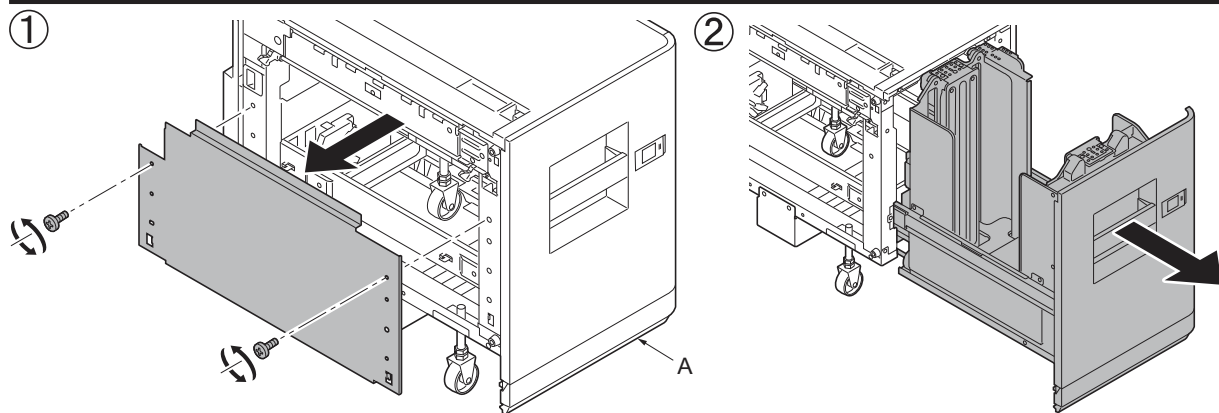
**日本語**

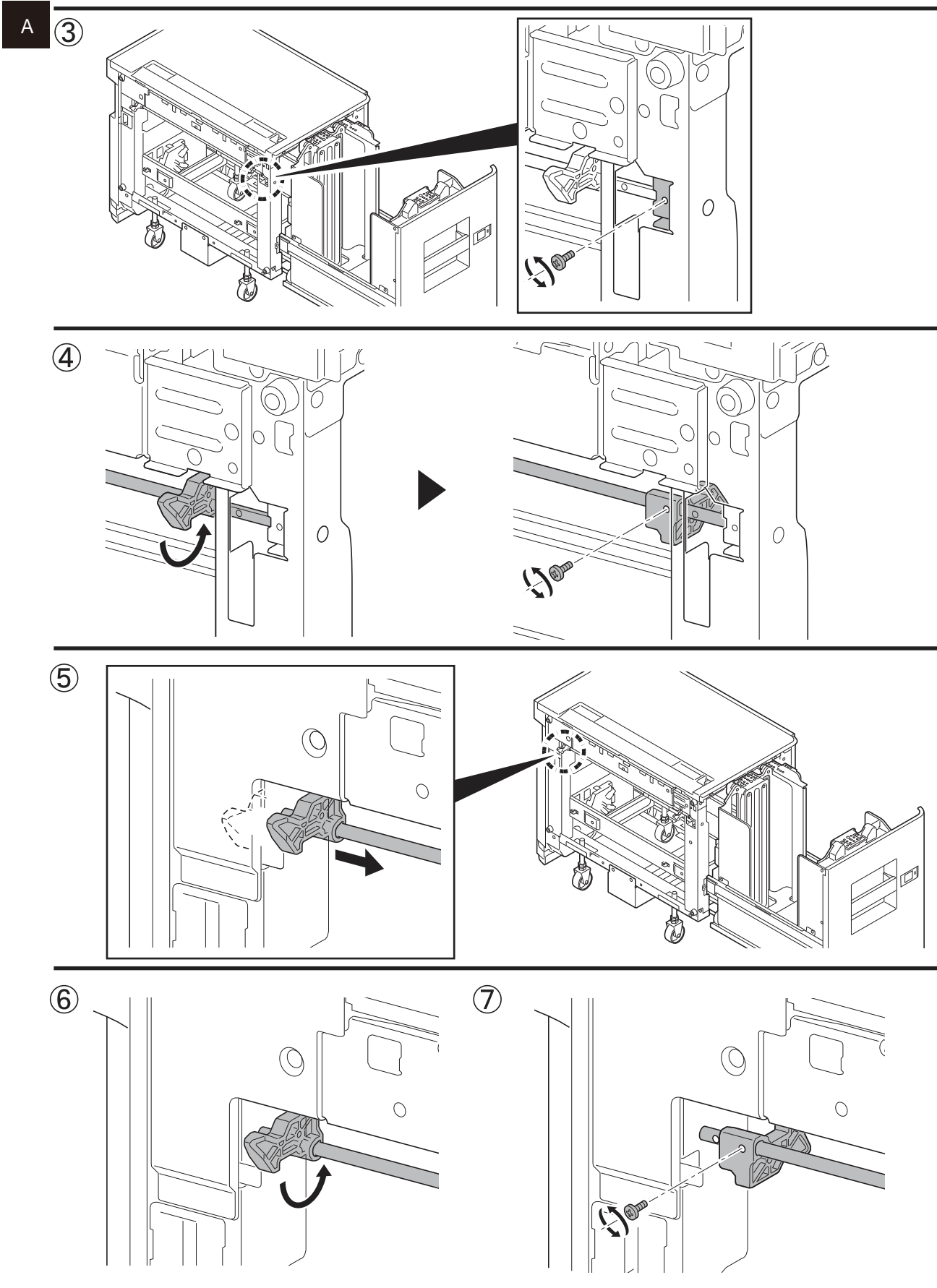
装着する対象によって、取付手順は異なります。それぞれ、以下のページに記載しています。  
MFP(A) / プリンターに設置する場合; 1 ページ ~ 10 ページ, 16 ページ ~ 24 ページ  
MFP(B) に設置する場合; 11 ページ ~ 24 ページ

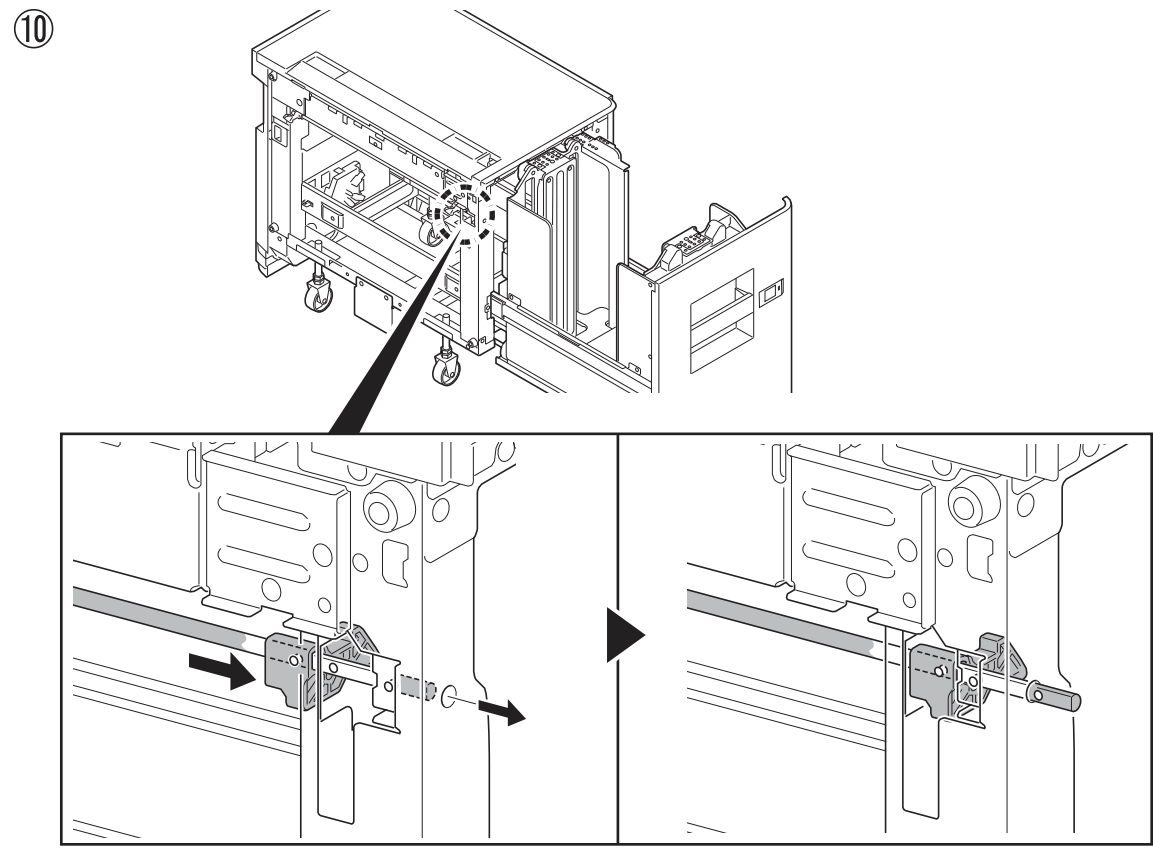
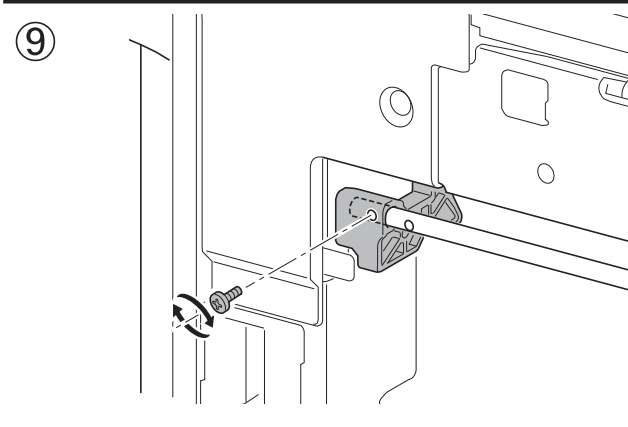
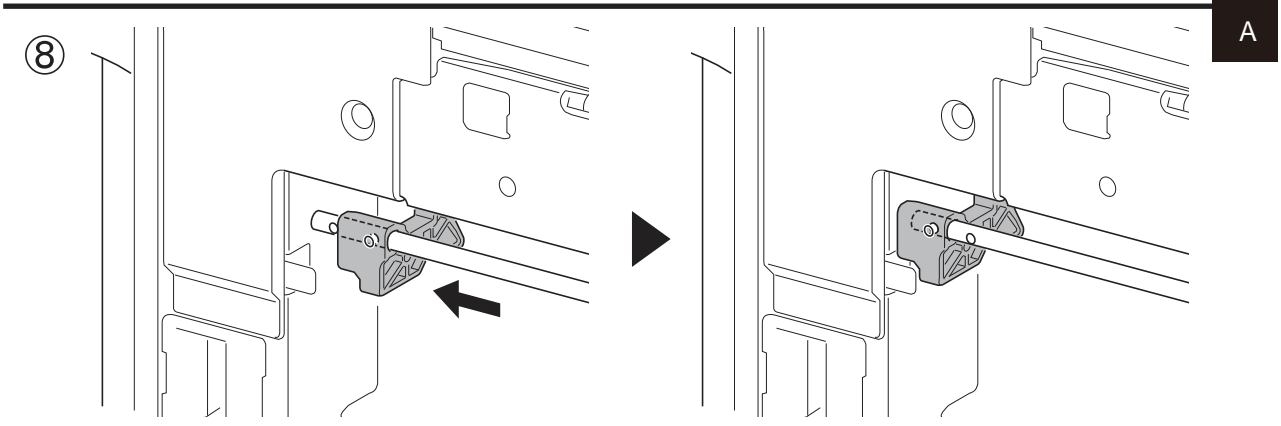


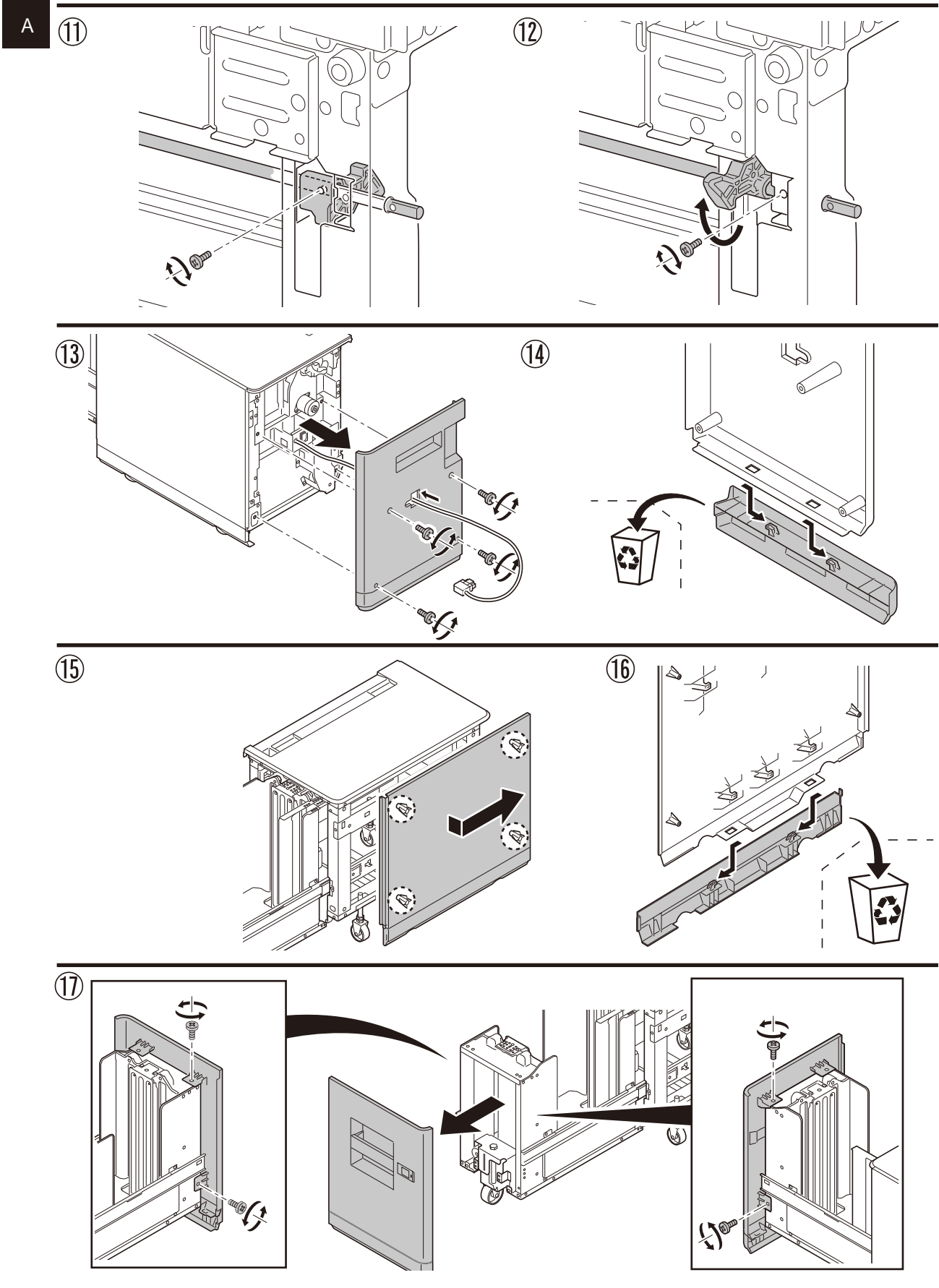
- (ENG) Be sure to remove any tape and/or cushioning materials from the parts supplied.
- (FR) Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
- (ES) Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.
- (DE) Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.
- (IT) Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
- (CN) 如果附属品上带有固定胶带、缓冲材料时, 请务必揭下。
- (KO) 동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.
- (JP) 同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。

- (ENG) While the illustrations in this installation guide are for the MFP models, contents of the installation work are common for the MFP and printer models.
- (FR) Les illustrations de ce guide d' installation concernent les modèles MFP, mais les interventions d' installation sont communes aux modèles MFP et imprimantes.
- (ES) Aunque las ilustraciones de esta guía de instalación hacen referencia a los modelos MFP, el contenido de los procedimientos de instalación es el mismo para los modelos MFP y de impresora.
- (DE) Obwohl die Abbildungen in dieser Installationsanleitung sich auf MFPs beziehen, ist die Vorgehensweise für MFPs und Drucker die gleiche.
- (IT) Sebbene le illustrazioni contenute in questa guida di installazione siano relative a modelli MFP, i contenuti della procedura di installazione sono gli stessi per MFP e stampanti.
- (CN) 安装步骤中的视图是 MFP 机型, 不过 MFP 和打印机的安装步骤是相同的。
- (KO) 이 설치 가이드는 MFP 모델용이지만, 설치 작업은 MFP와 프린터 공통입니다.
- (JP) 設置手順書内のイラストは、MFP ですが、設置作業は MFP/プリンター共通です。



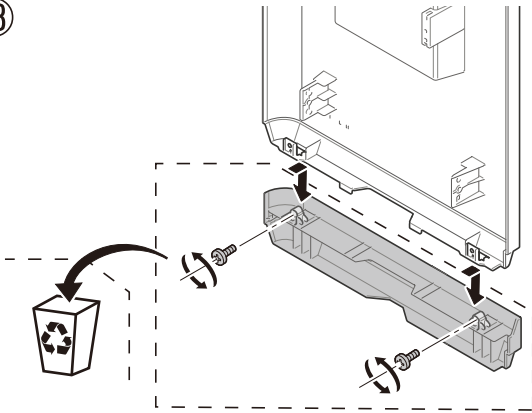




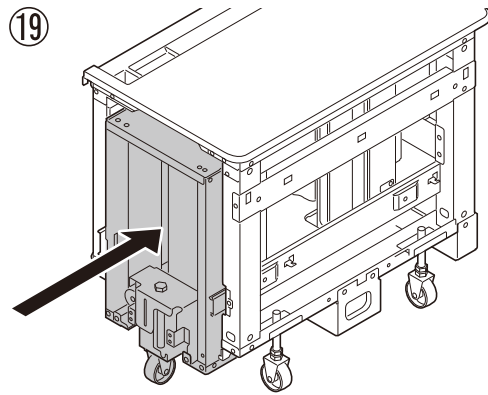




18

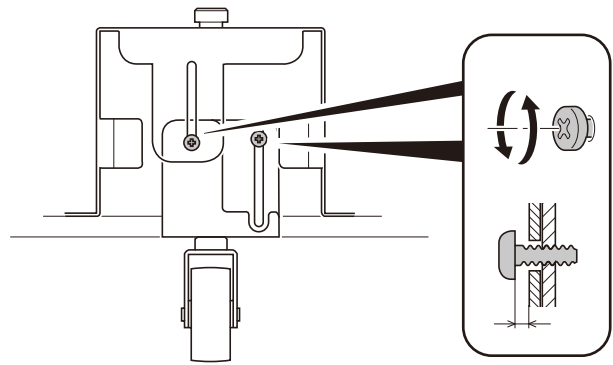
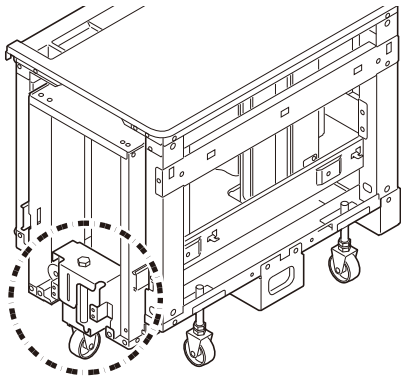


19

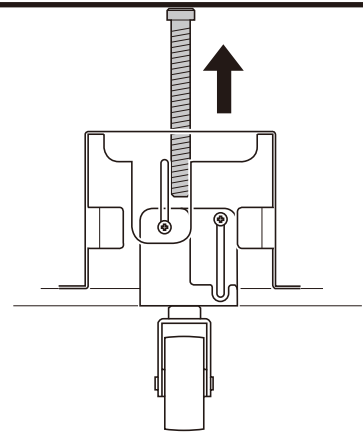
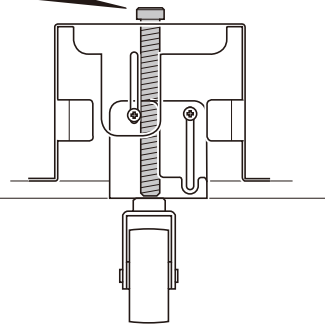
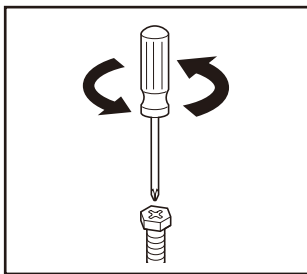


A

20

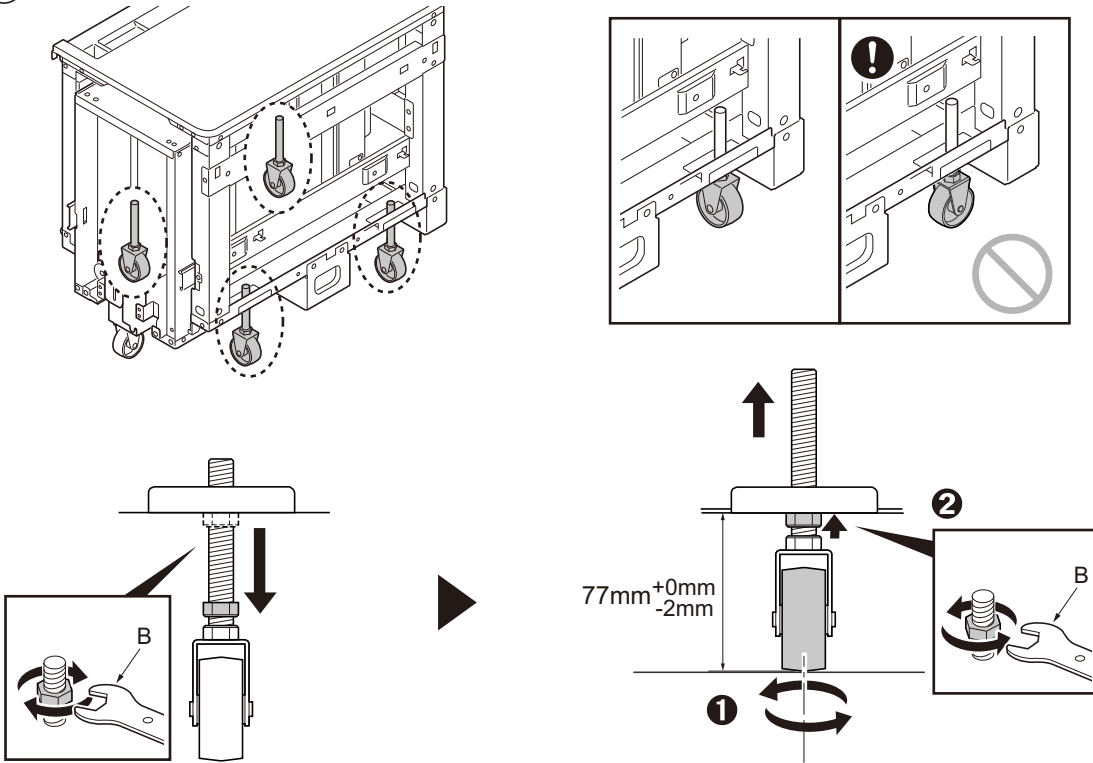


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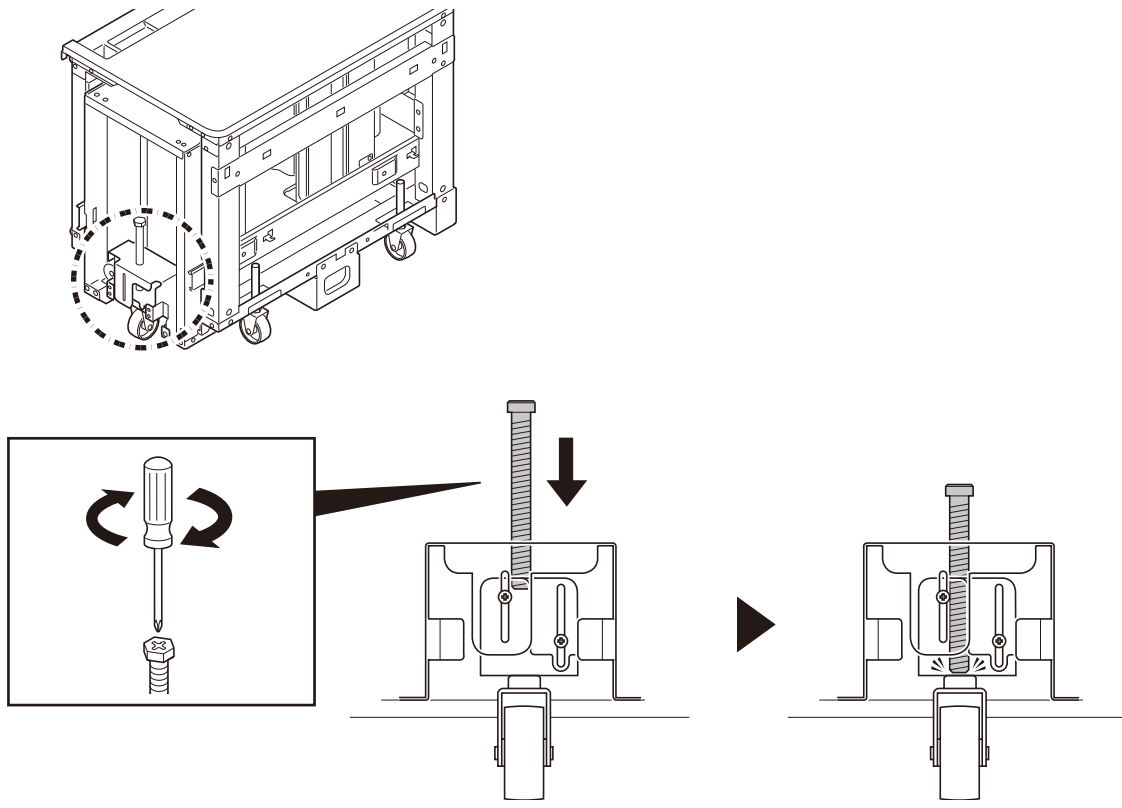


A

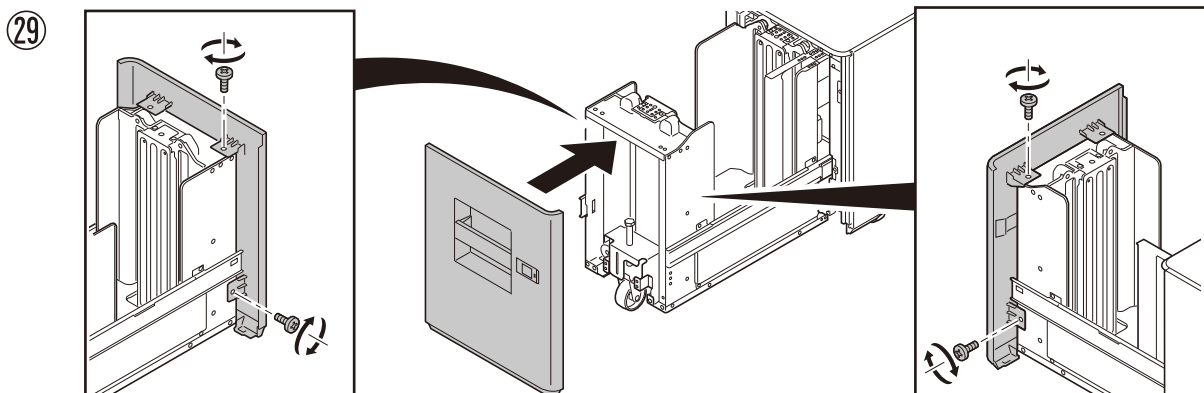
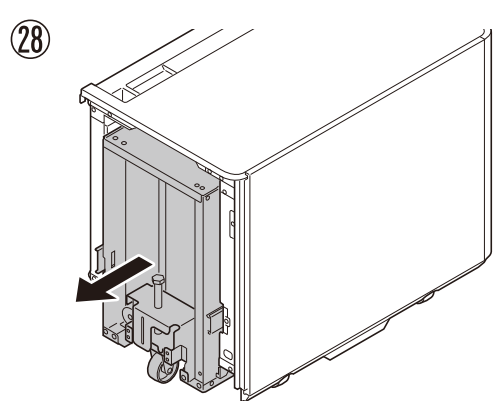
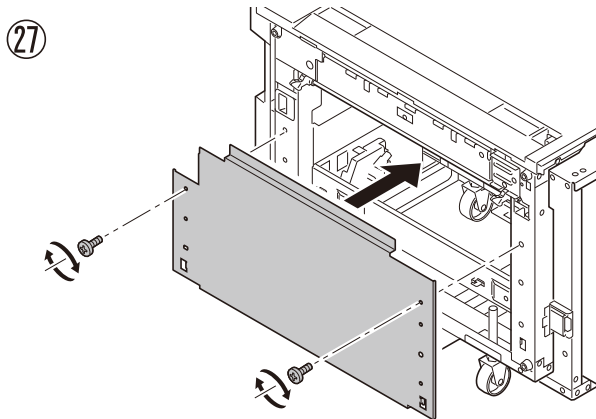
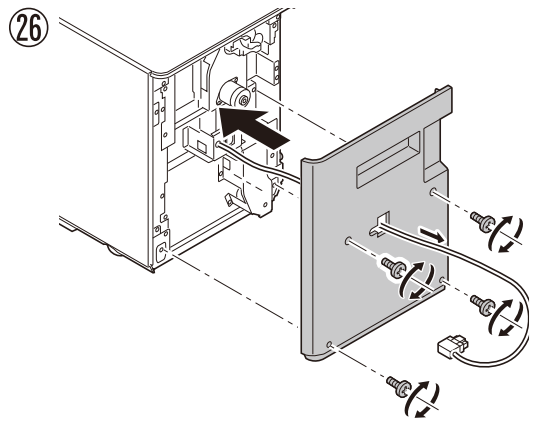
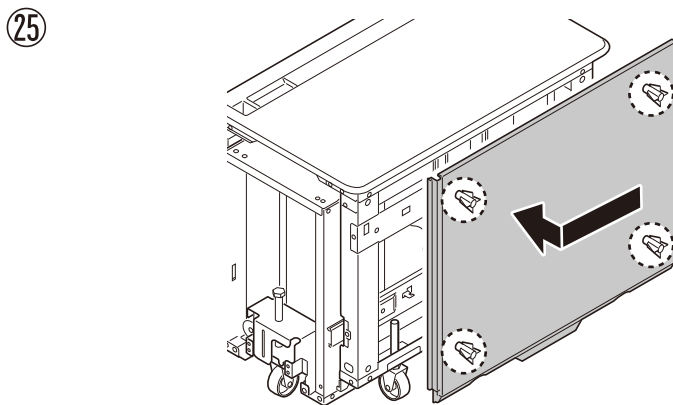
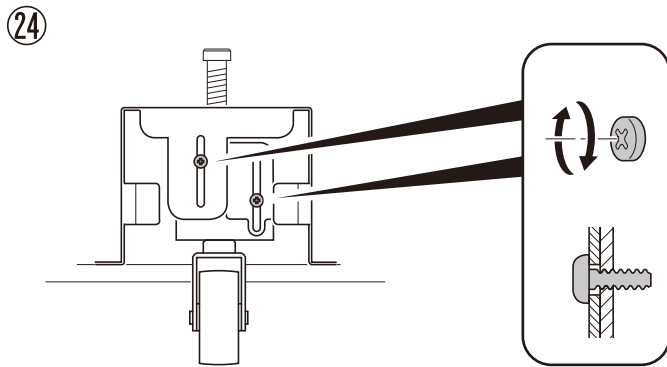
22

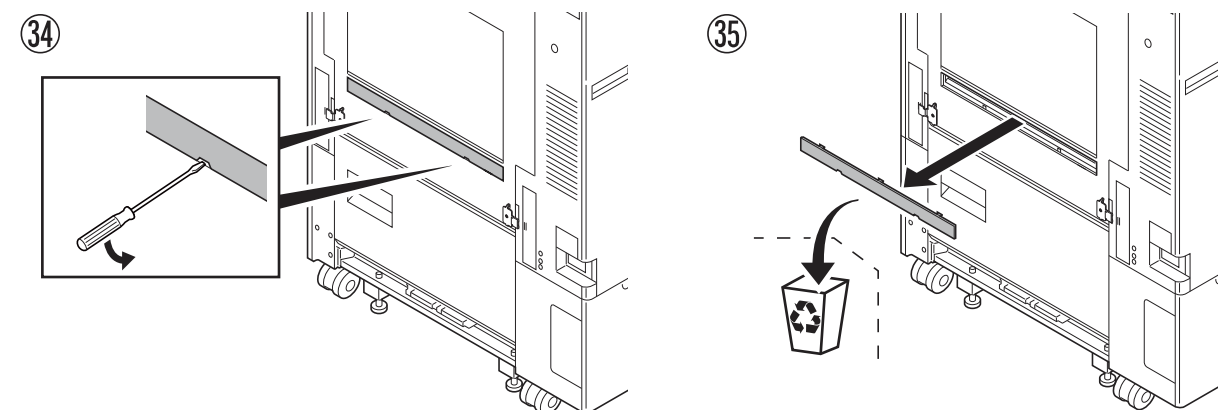
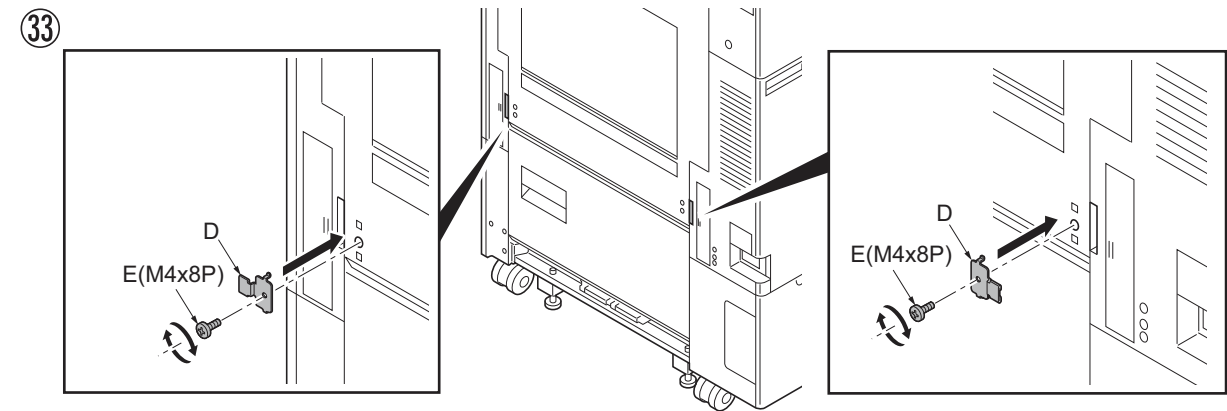
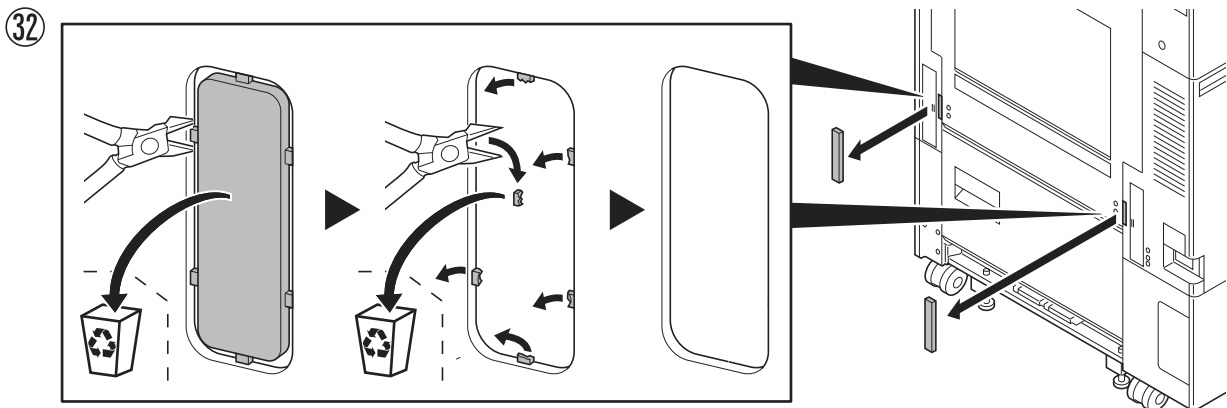
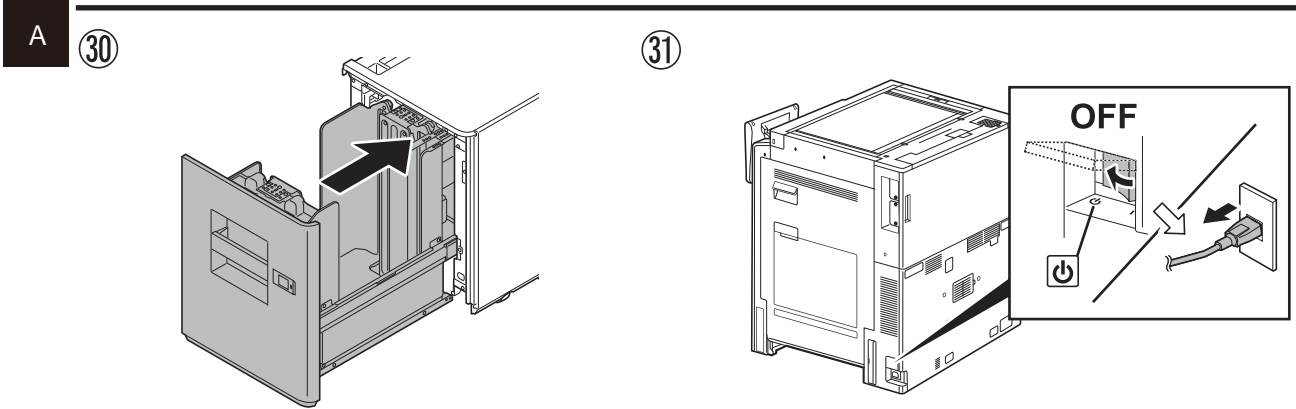


23

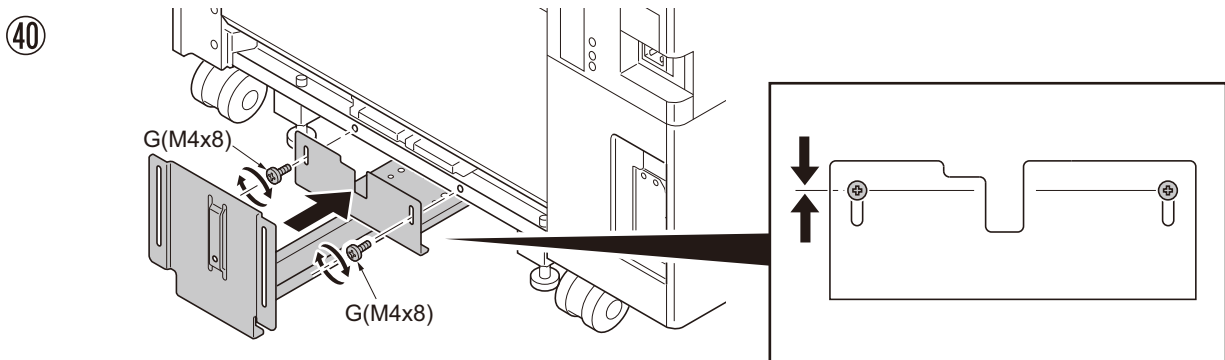
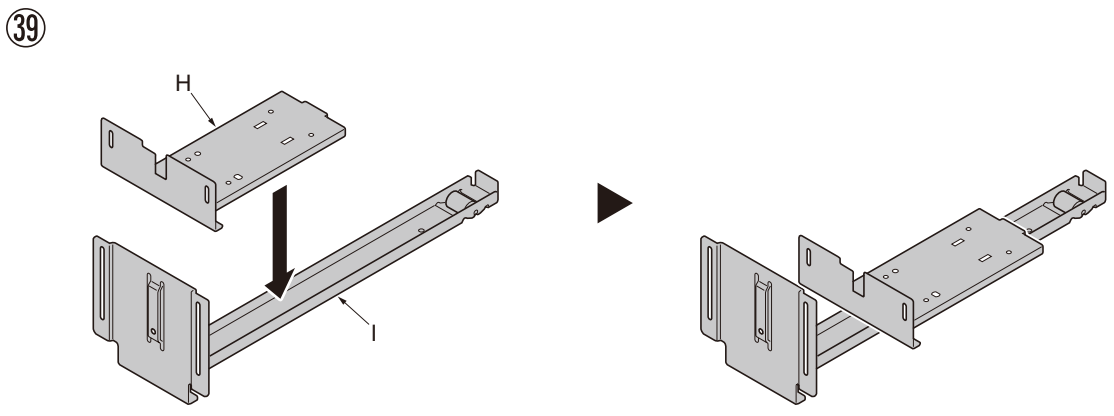
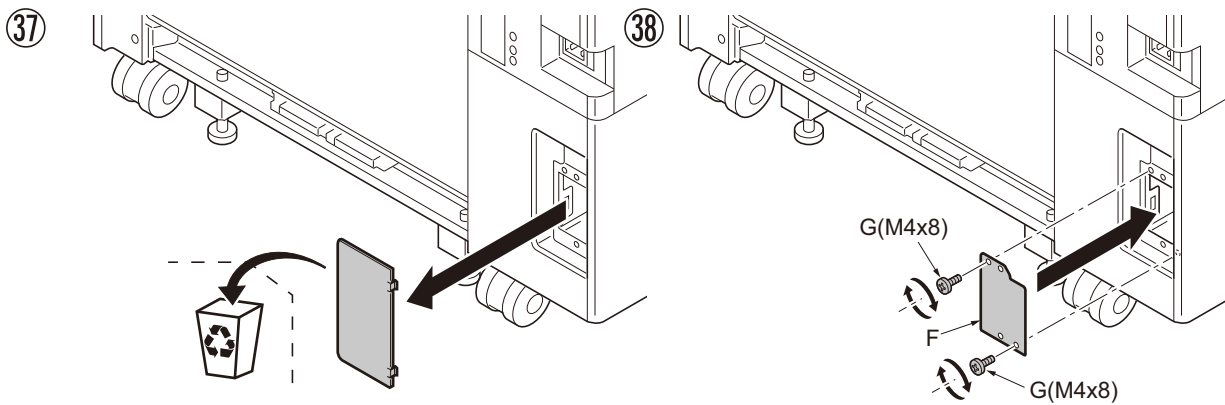
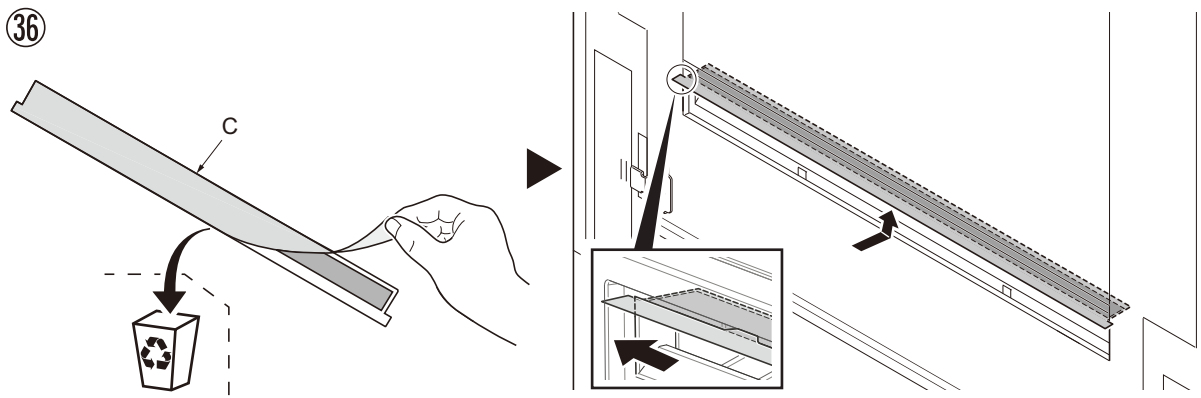


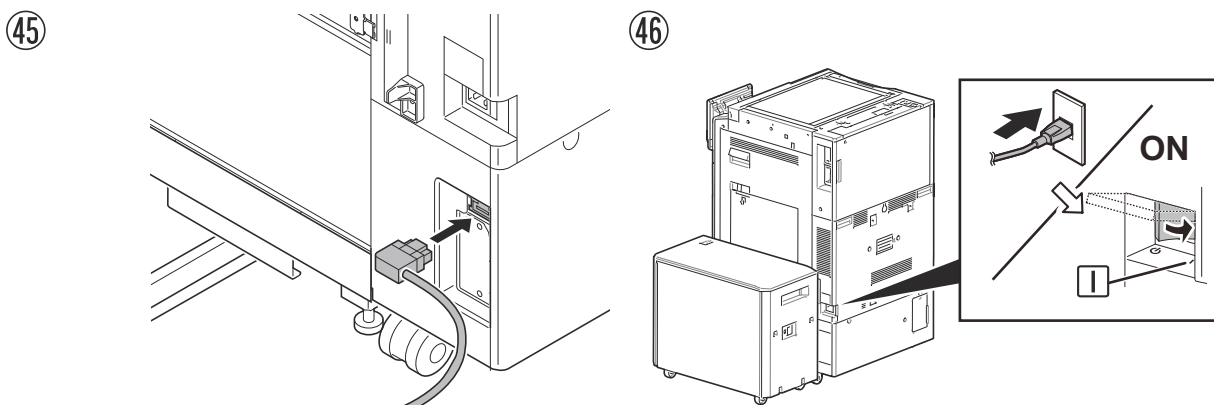
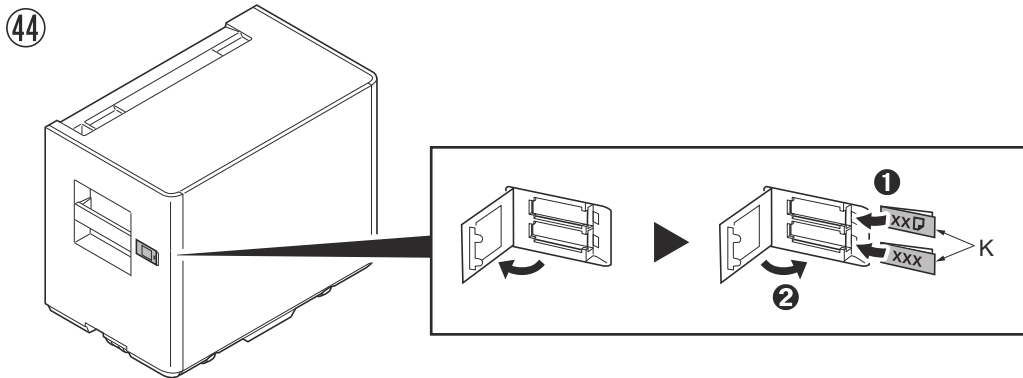
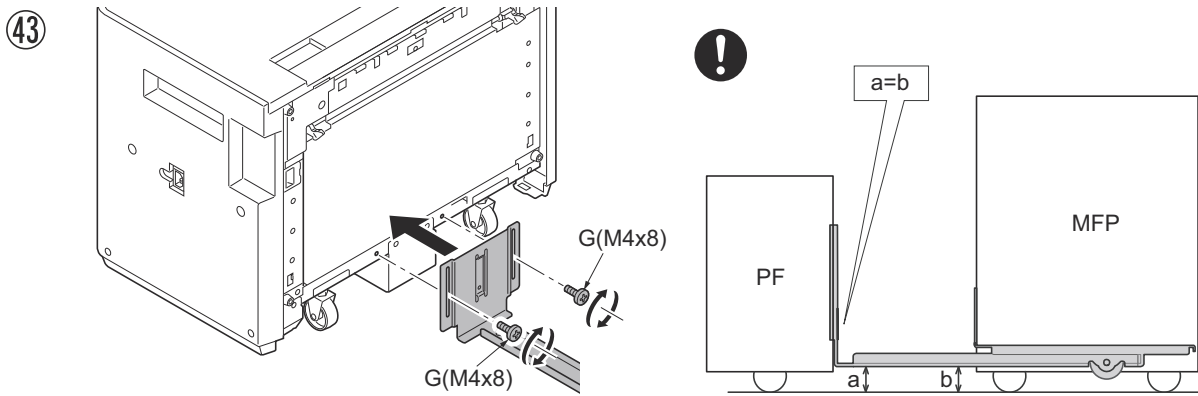
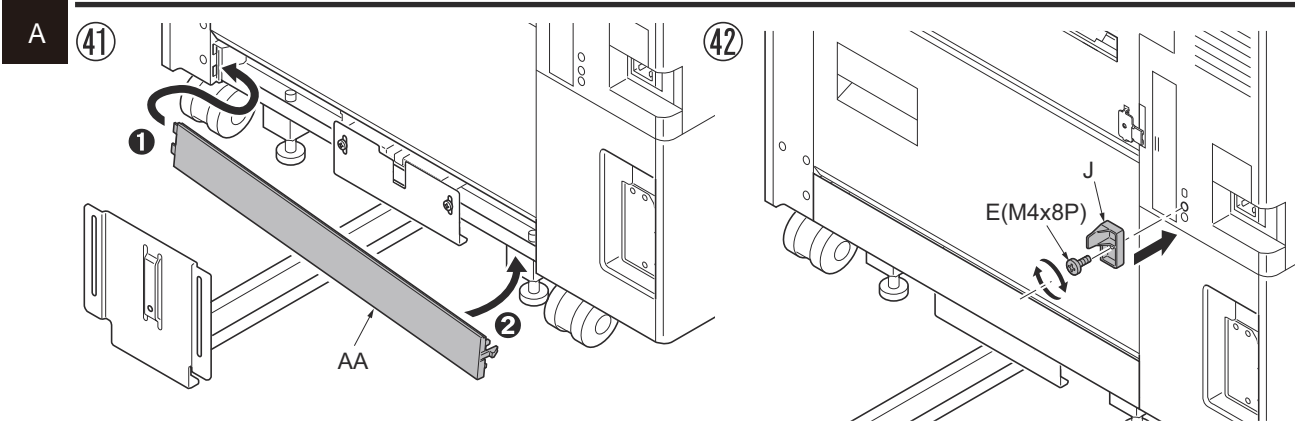
A

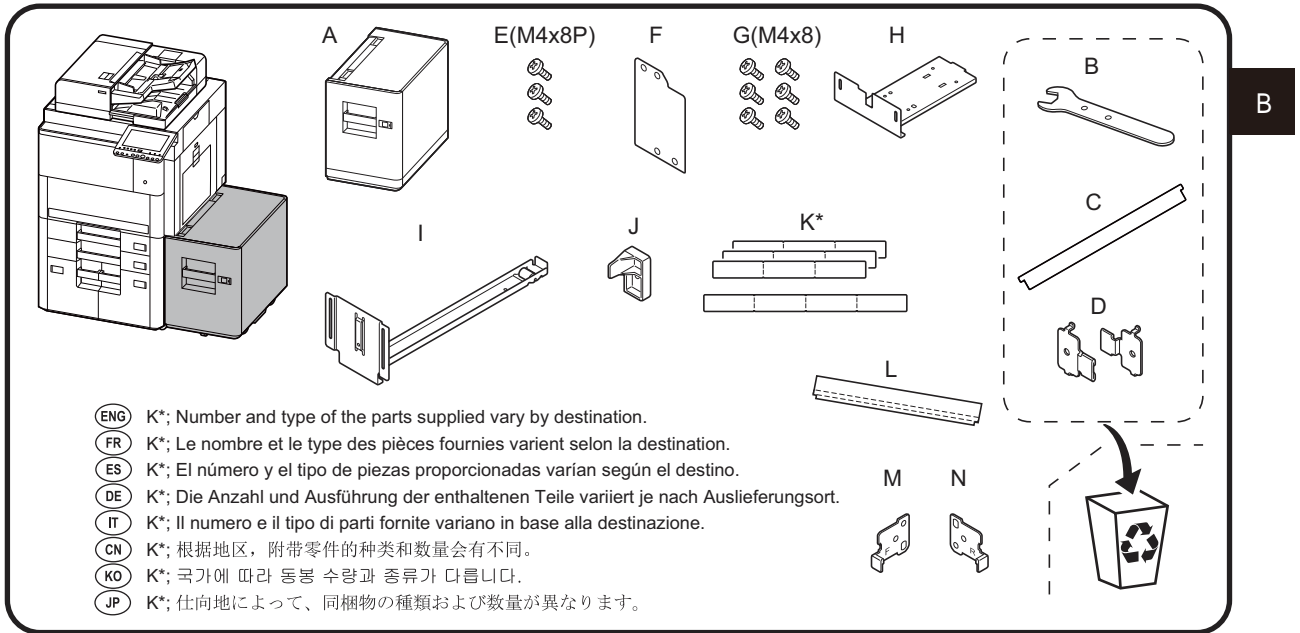




A

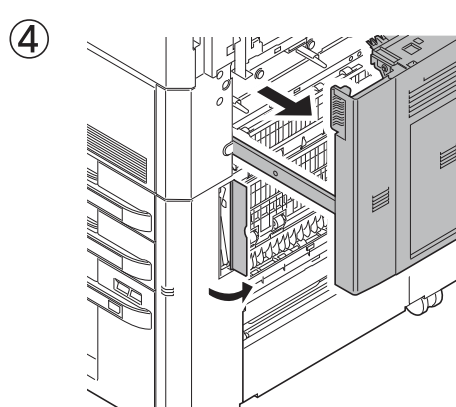
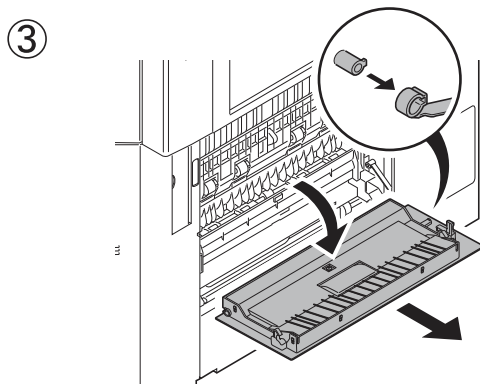
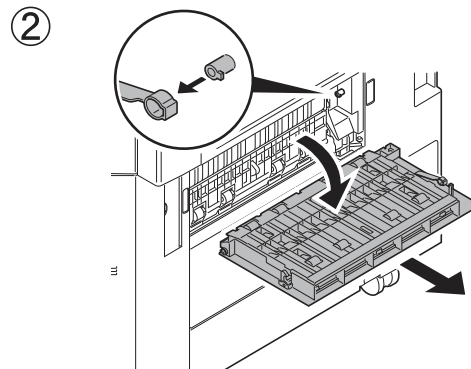
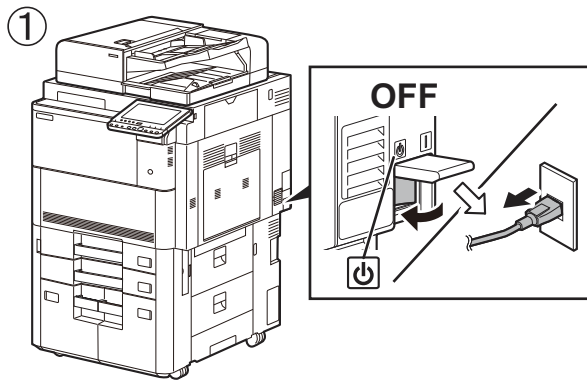




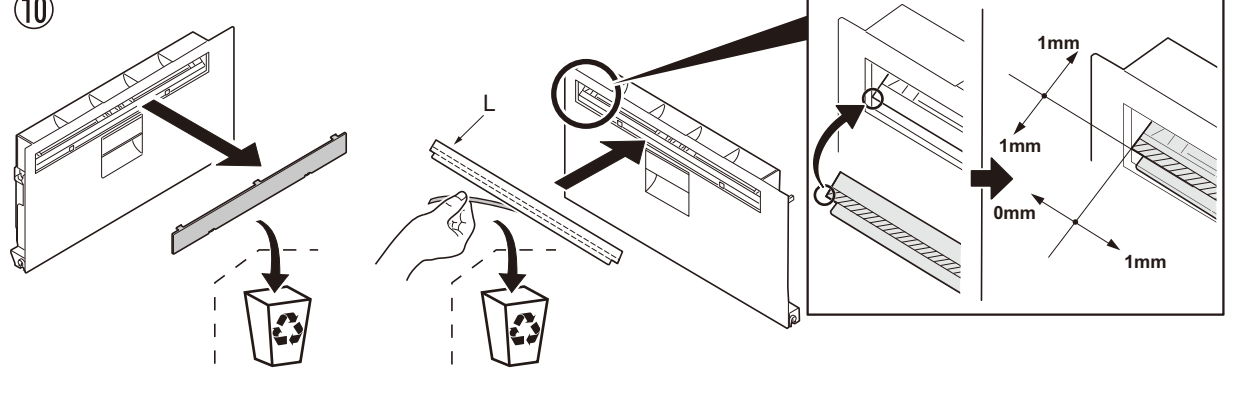
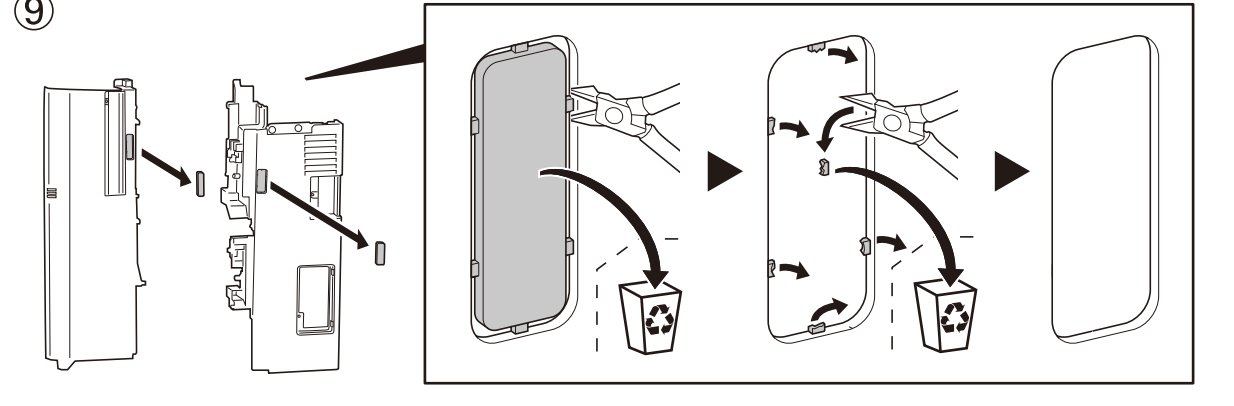
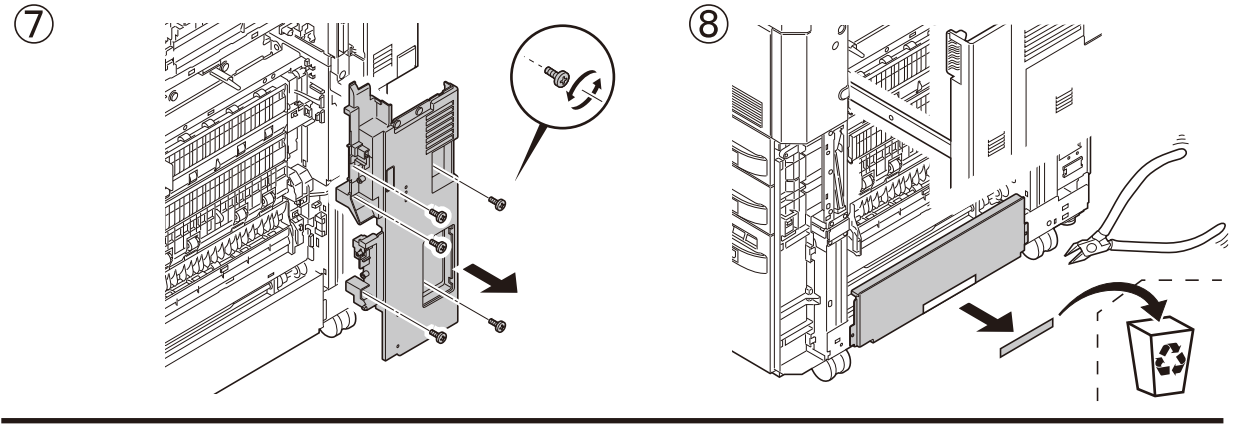
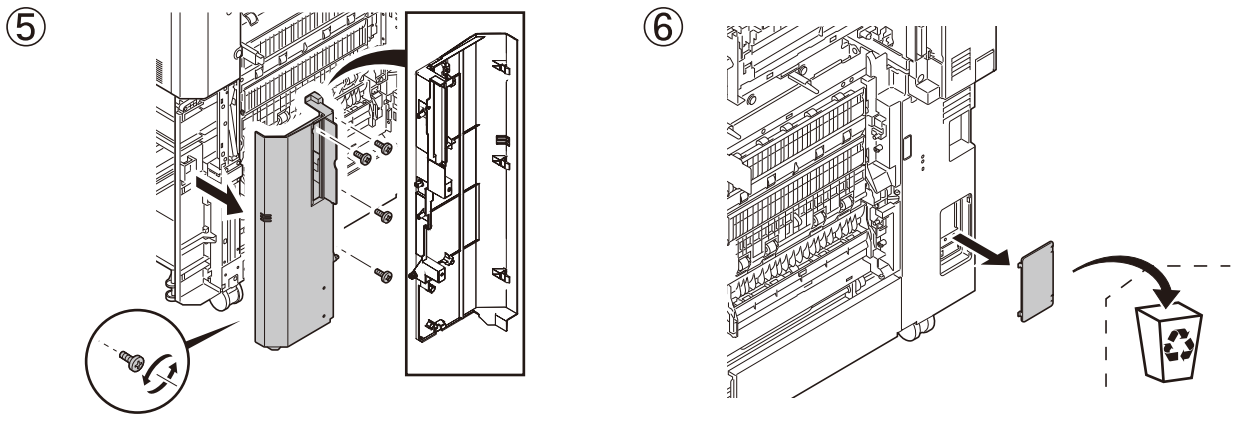


- (ENG) K\*: Number and type of the parts supplied vary by destination.
- (FR) K\*: Le nombre et le type des pièces fournies varient selon la destination.
- (ES) K\*: El número y el tipo de piezas proporcionadas varían según el destino.
- (DE) K\*: Die Anzahl und Ausführung der enthaltenen Teile variiert je nach Auslieferungsort.
- (IT) K\*: Il numero e il tipo di parti fornite variano in base alla destinazione.
- (CN) K\*: 根据地区，附带零件的种类和数量会有不同。
- (KO) K\*: 국가에 따라 동봉 수량과 종류가 다릅니다.
- (JP) K\*: 仕向地によって、同梱物の種類および数量が異なります。

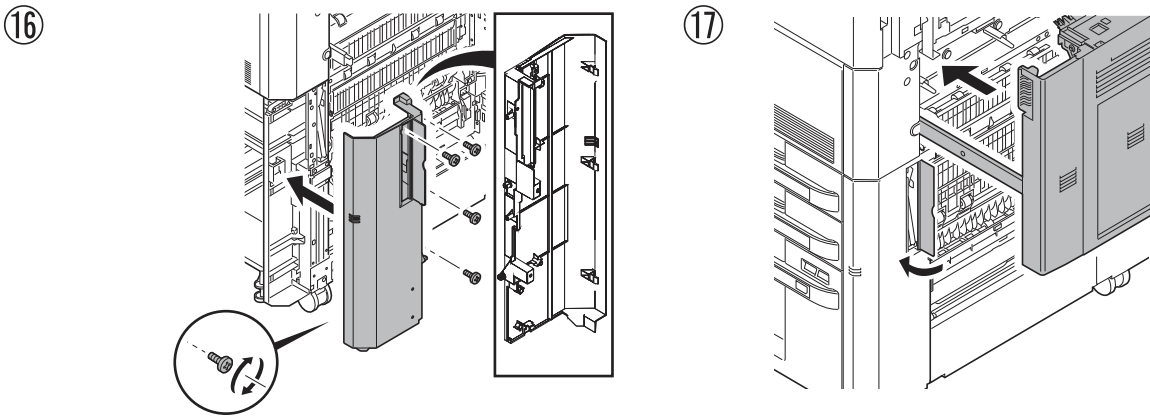
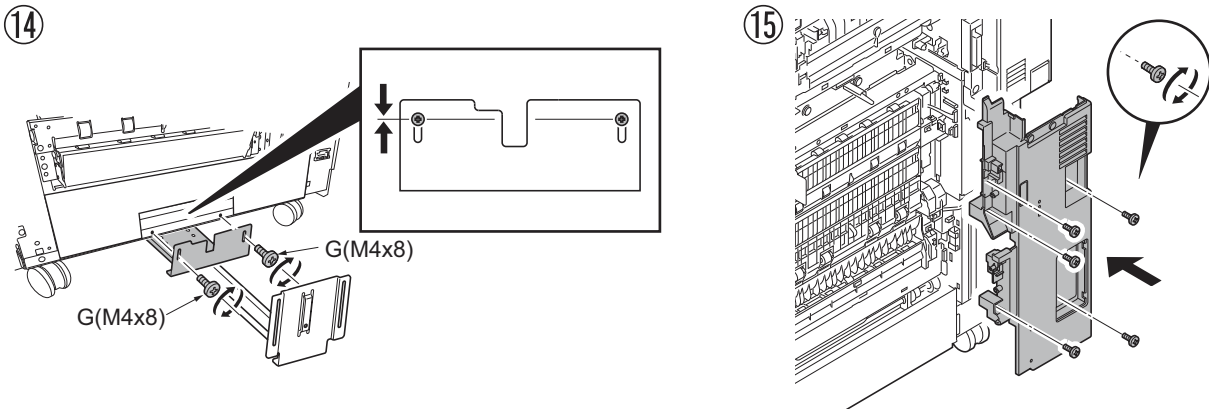
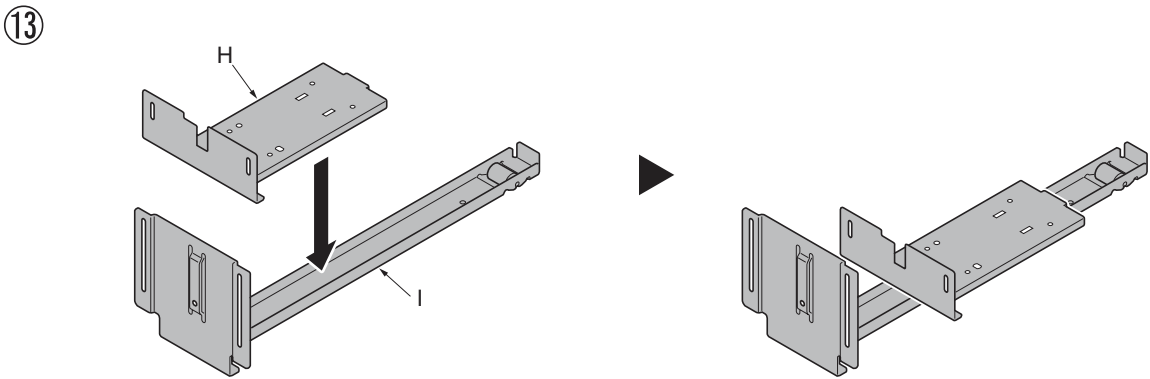
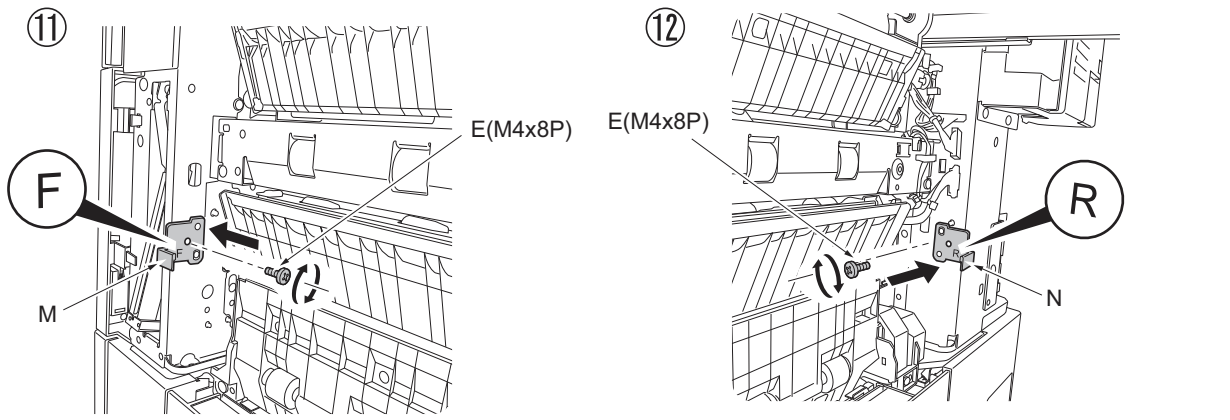
- (ENG) Be sure to remove any tape and/or cushioning materials from the parts supplied.
- (FR) Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
- (ES) Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.
- (DE) Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.
- (IT) Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
- (CN) 如果附属品上带有固定胶带、缓冲材料时，请务必揭下。
- (KO) 동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.
- (JP) 同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。



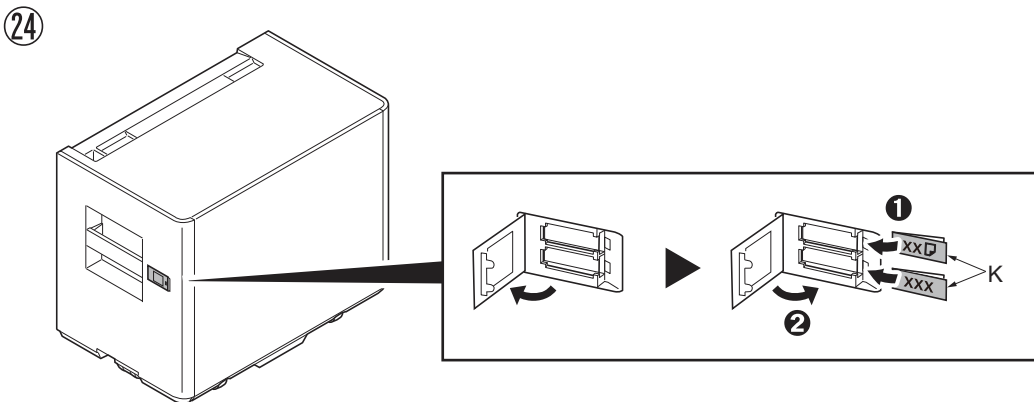
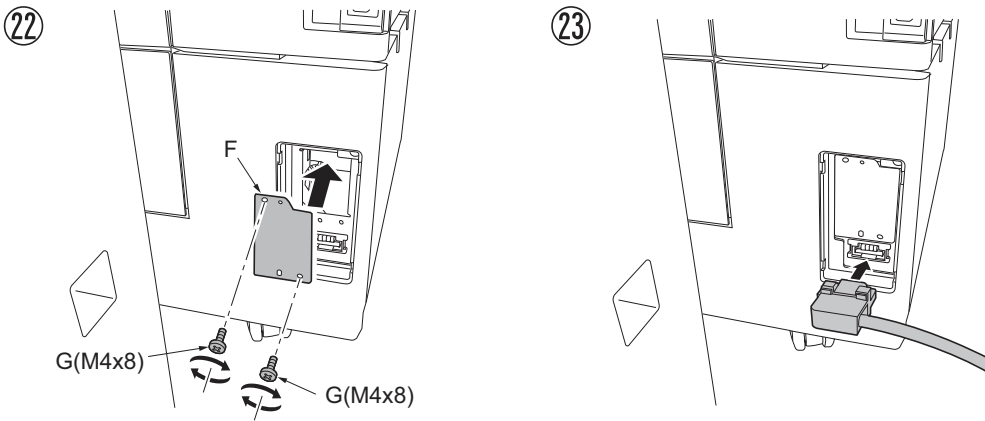
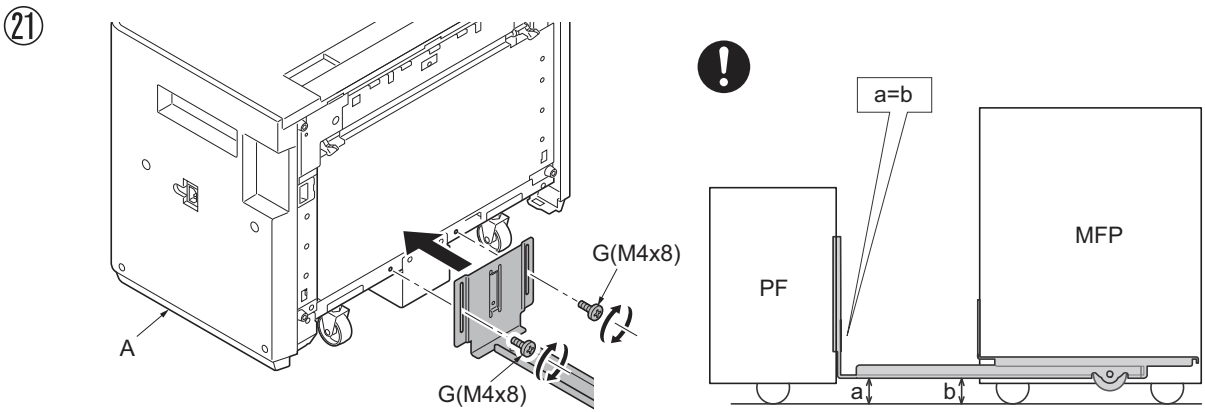
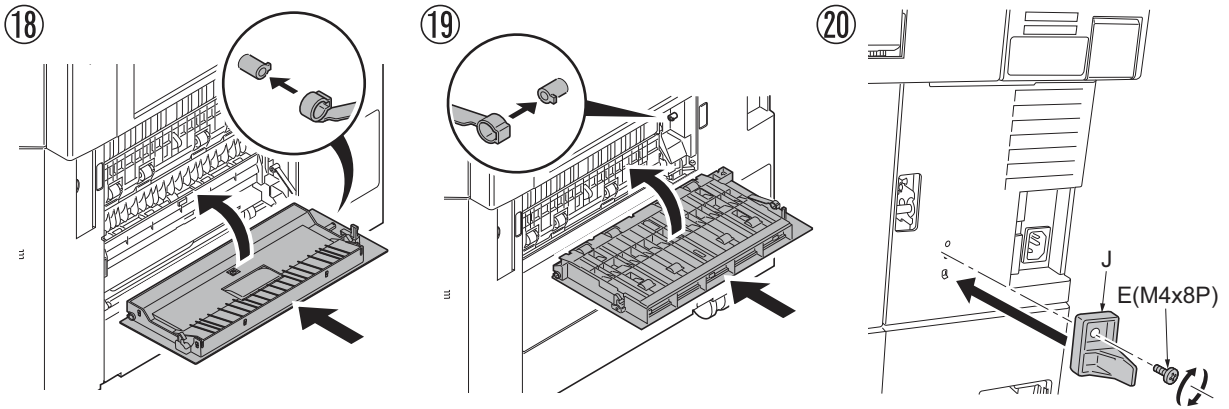
B



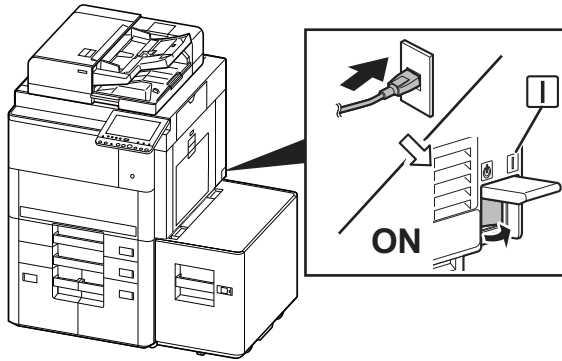




**B**



25



B

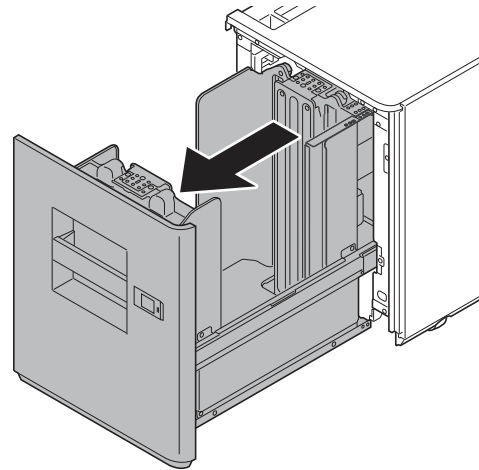
A

B

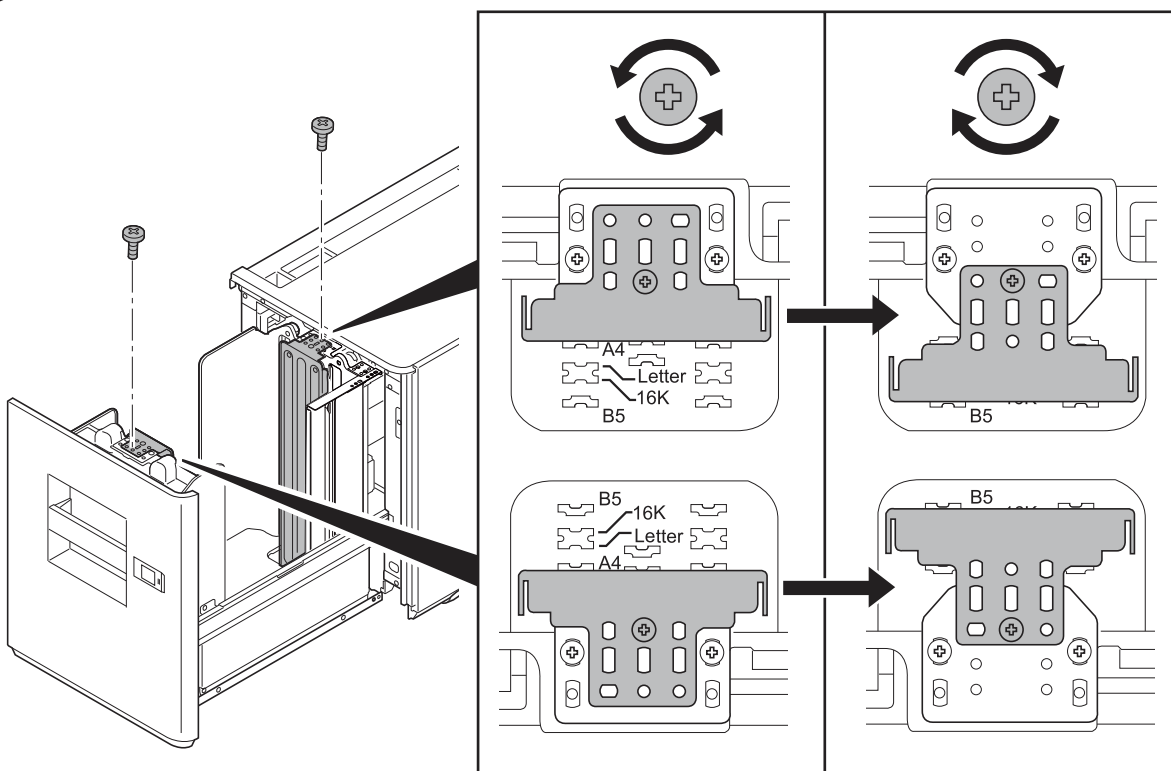
- ⓔ Changing paper size
- ⓕ Modification du format du papier
- ⓖ Cómo cambiar el tamaño de papel
- ⓓ Ändern des Papierformats
- ⓗ Cambio del formato della carta
- Ⓒ 纸张尺寸更改
- Ⓚ 용지크기 변경
- Ⓜ 用紙サイズ変更

**A4 → B5**

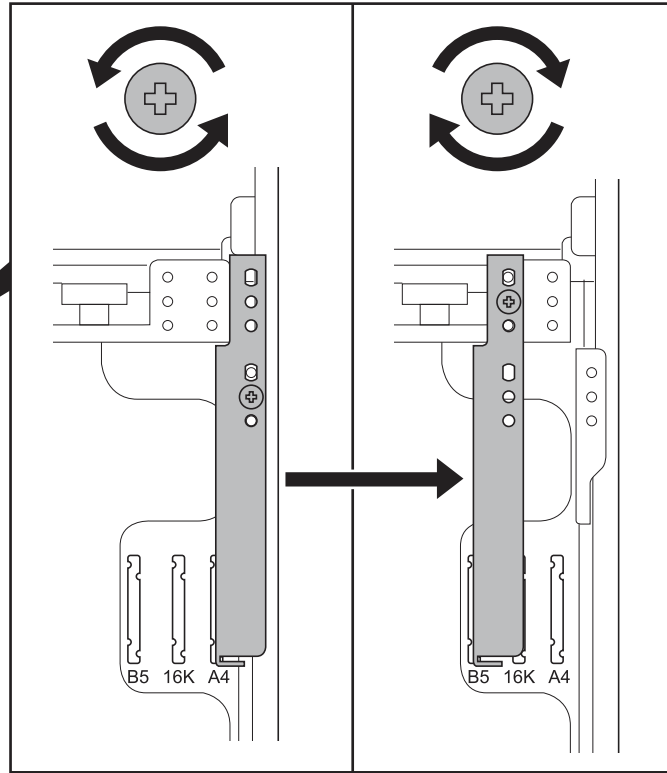
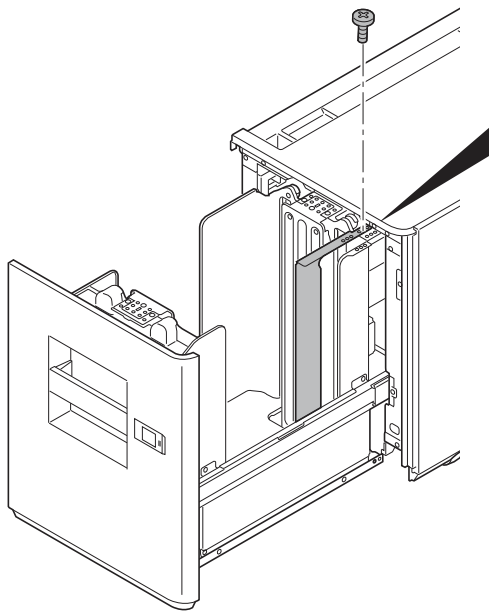
①



②



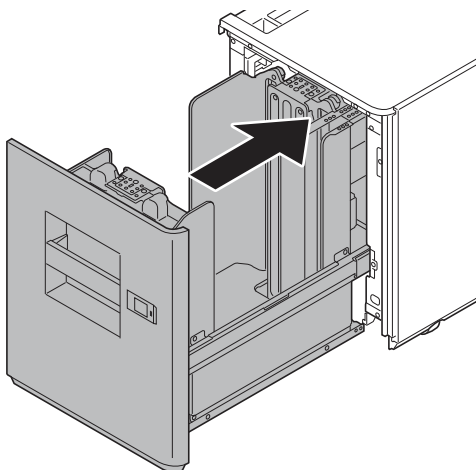
③



A

B

④



⑤

- (ENG) Run maintenance mode U208 and set the paper size.  
\*Proceed to step ⑥ on page 22.
- (FR) Exécuter le mode maintenance U208 et définir le format du papier.  
\*Passer à l'étape ⑥ de la page 22.
- (ES) Active el modo de mantenimiento U208 y ajuste el tamaño de papel.  
\*Vaya al paso ⑥ de la página 22.
- (DE) Führen Sie den Wartungsmodus U208 aus und stellen Sie das Papierformat ein.  
\*Weitergehen zu Schritt ⑥ auf Seite 22.
- (IT) Eseguire la modalita manutenzione U208 e impostare i formato carta.  
\*Procedere al passo ⑥ a pagina 22.
- (CN) 执行维修模式U208, 进行纸张尺寸的设置。  
※ 跳至P22 的步骤⑥。
- (KO) 메인テナンス 모드 U208을 실행해 용지크기 설정을 합니다.  
※ P22 의 순서 ⑥ 로 진행 .
- (JP) メンテナンスモードU208を実行し、用紙サイズの設定をおこなう。  
※P22 の手順 ⑥ へ進む。

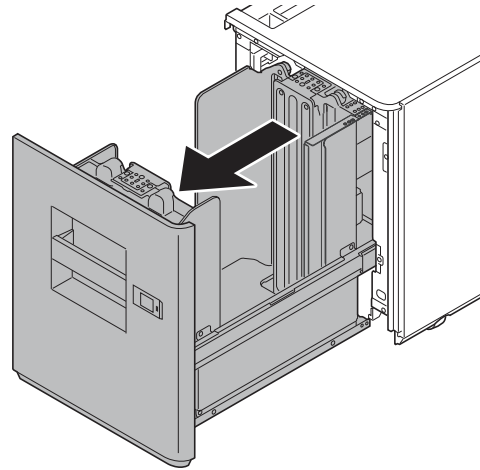
A

B

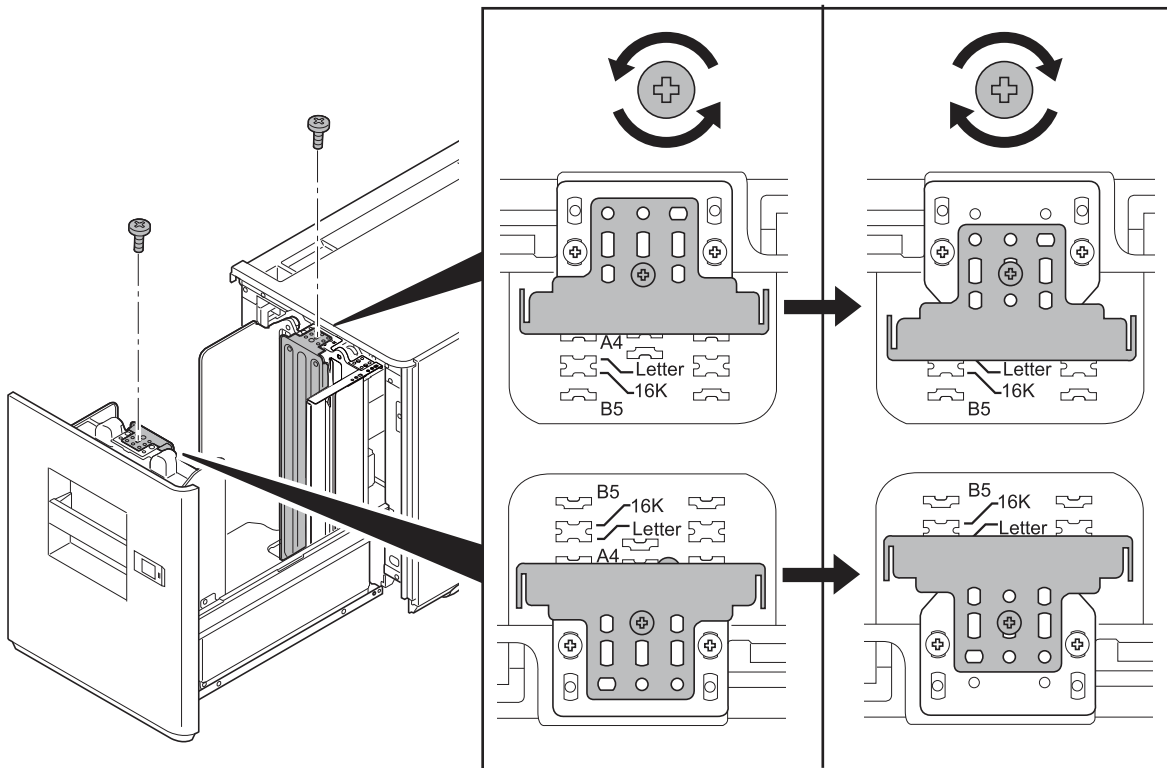
- ① ENG Changing paper size
- ② FR Modification du format du papier
- ③ ES Cómo cambiar el tamaño de papel
- ④ DE Ändern des Papierformats
- ⑤ IT Cambio del formato della carta
- ⑥ CN 纸张尺寸更改
- ⑦ KO 용지크기 변경
- ⑧ JP 用紙サイズ変更

## A4 → Letter

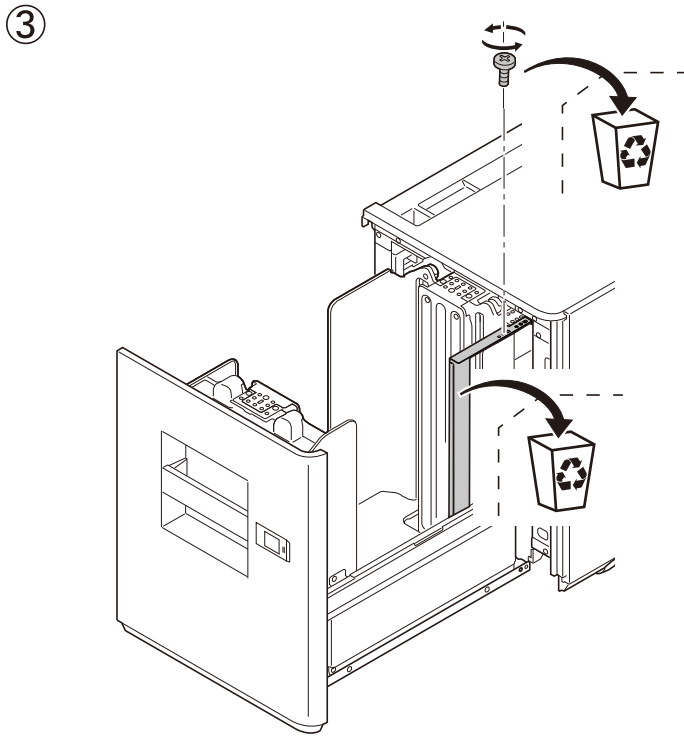
①



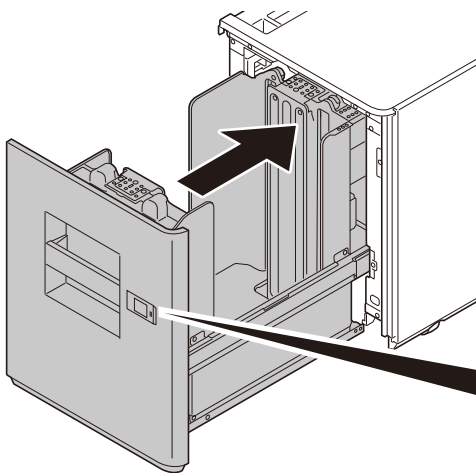
②



A  
B

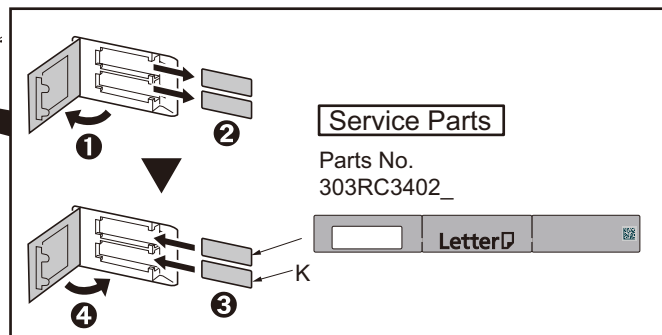


④



⑤

- (ENG) Run maintenance mode U208 and set the paper size.  
\*Proceed to step ⑥ on page 22.
- (FR) Exécuter le mode maintenance U208 et définir le format du papier.  
\*Passer à l'étape ⑥ de la page 22.
- (ES) Active el modo de mantenimiento U208 y ajuste el tamaño de papel.  
\*Vaya al paso ⑥ de la página 22.
- (DE) Führen Sie den Wartungsmodus U208 aus und stellen Sie das Papierformat ein.  
\*Weitergehen zu Schritt ⑥ auf Seite 22.
- (IT) Eseguire la modalita manutenzione U208 e impostare il formato carta.  
\*Procedere al passo ⑥ a pagina 22.
- (CN) 执行维修模式U208, 进行纸张尺寸的设置。  
\*跳至P22 的步骤⑥。
- (KO) 메인テナンス 모드 U208을 실행해 용지크기 설정을 합니다.  
\*P22 의 순서 ⑥ 로 진행 .
- (JP) メンテナンスモードU208を実行し、用紙サイズの設定をおこなう。  
\*P22 の手順 ⑥ へ進む。



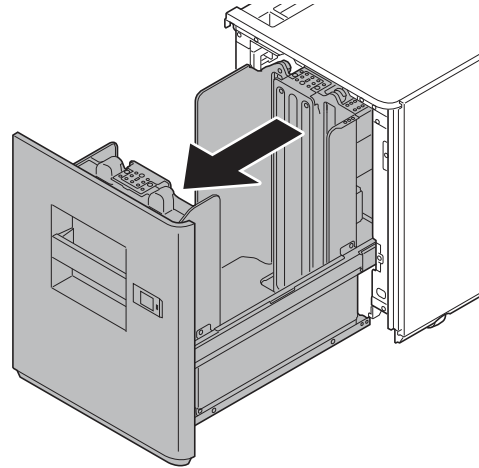
A

B

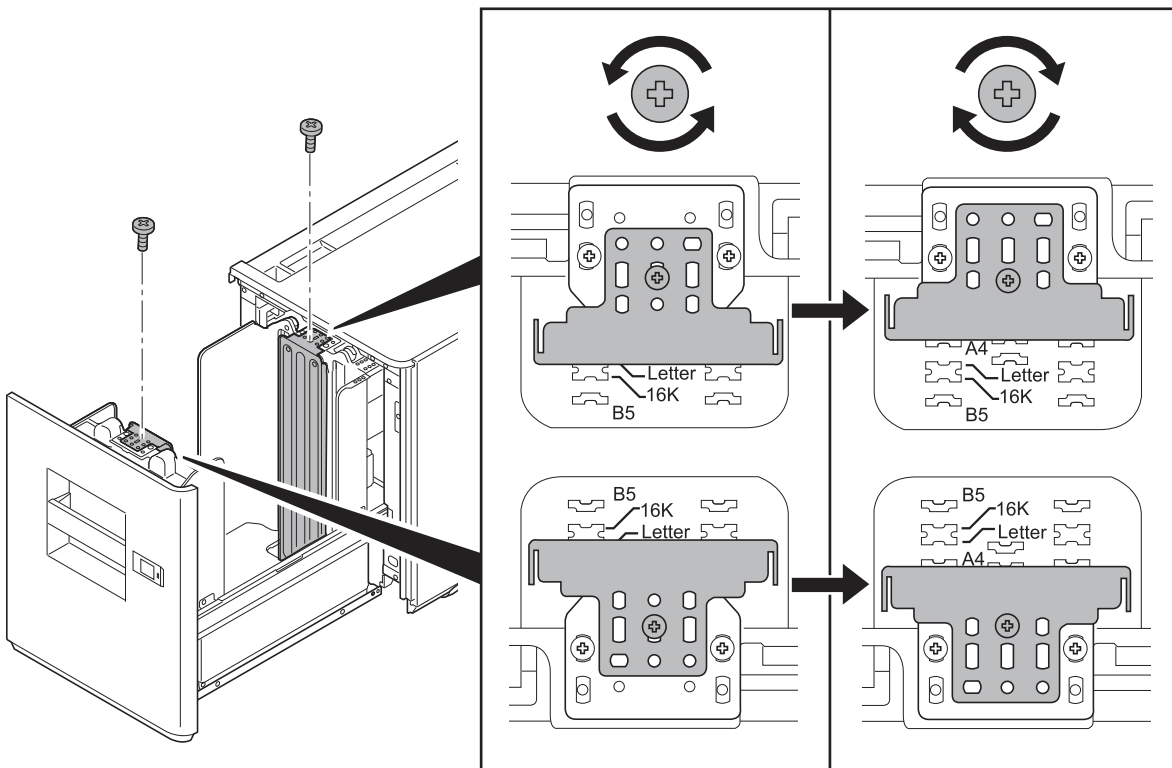
- Ⓔ Changing paper size
- Ⓕ Modification du format du papier
- Ⓖ Cómo cambiar el tamaño de papel
- Ⓗ Ändern des Papierformats
- Ⓙ Cambio del formato della carta
- Ⓚ 纸张尺寸更改
- Ⓛ 용지크기 변경
- Ⓜ 用紙サイズ変更

## Letter → A4

①



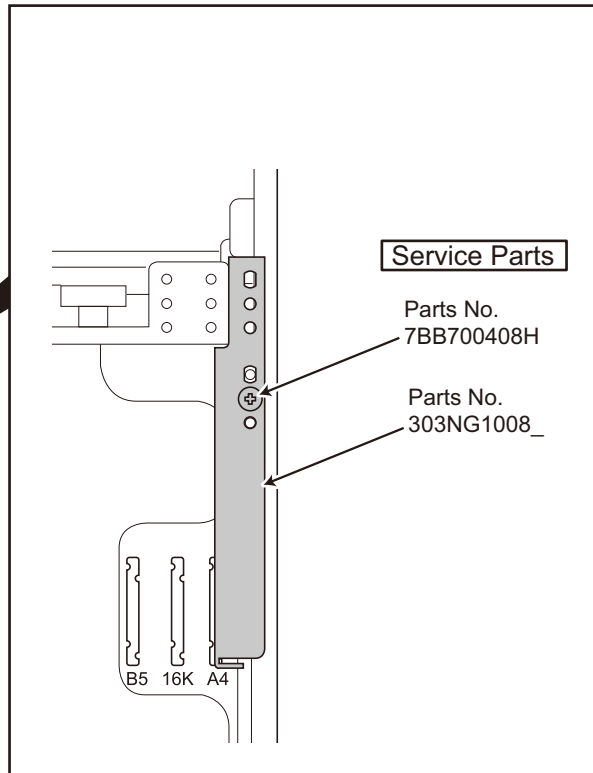
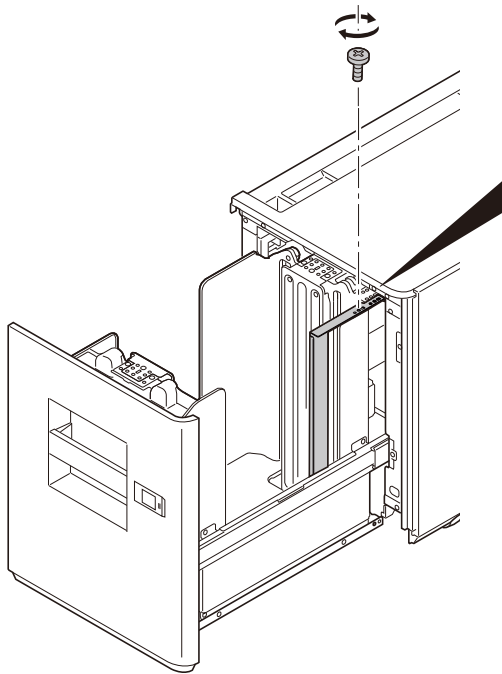
②



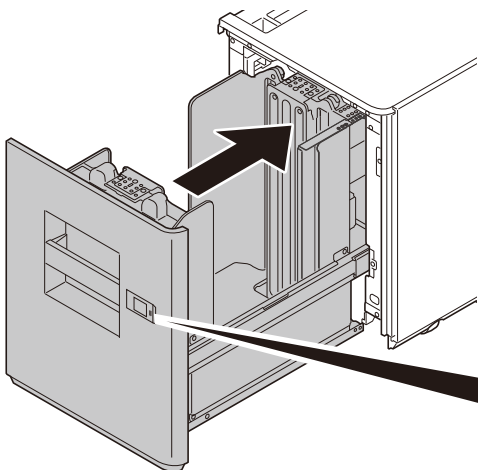


A  
B

③

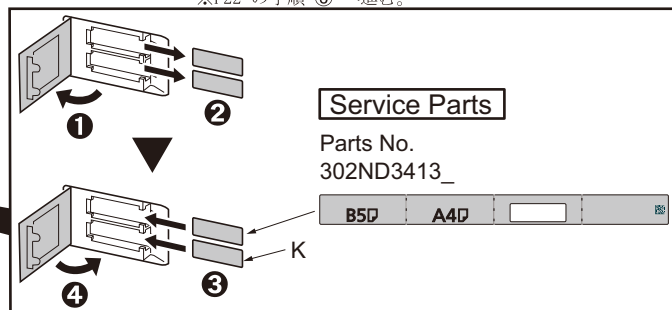


④



⑤

- ENG** Run maintenance mode U208 and set the paper size.  
\*Proceed to step ⑥ on page 22.
- FR** Exécuter le mode maintenance U208 et définir le format du papier.  
\*Passer à l'étape ⑥ de la page 22.
- ES** Active el modo de mantenimiento U208 y ajuste el tamaño de papel.  
\*Vaya al paso ⑥ de la página 22.
- DE** Führen Sie den Wartungsmodus U208 aus und stellen Sie das Papierformat ein.  
\*Weitergehen zu Schritt ⑥ auf Seite 22.
- IT** Eseguire la modalita manutenzione U208 e impostare il formato carta.  
\*Procedere al passo ⑥ a pagina 22.
- CN** 执行维修模式U208, 进行纸张尺寸の設定。  
※跳至P22 的步骤⑥。
- KO** 메인テナンス 모드 U208을 실행해 용지크기 설정을 합니다.  
※P22의 순서 ⑥로 진행.
- JP** メンテナンスモードU208を実行し、用紙サイズの設定をおこなう。  
※P22 の手順 ⑥へ進む。



A

B

⑥

ENG

**Adjusting the cursor width**

1. Load paper in the cassettes.
2. If the gap between the front deck cursor (3) and the paper (2) is outside the 0.5 to 1.0 mm range when the paper (2) is touching up against the rear deck cursor (1), perform the following adjustment.  
\* A cursor width that is too small can hinder paper feeding,  
while a cursor width that is too large can lead to problems such as skewed paper feed.

FR

**Réglage de la largeur du curseur**

1. Charger les tiroirs en papier.
2. Si l'écartement entre le curseur de platine avant (3) et le papier (2) est hors des limites de 0,5 à 1,0 mm quand le papier (2) touche le curseur de platine arrière (1), procéder au réglage suivant.  
\* Une largeur trop faible du curseur risque d'empêcher l'entraînement du papier et une largeur trop grande risque d'entraîner des problèmes du type entraînement du papier de biais.

ES

**Cómo ajustar la anchura del cursor**

1. Cargue papel en los cajones.
2. Si la separación entre el cursor frontal de la plataforma (3) y el papel (2) está fuera del rango de 0,5 a 1,0 mm cuando el papel (2) toca el cursor trasero de la plataforma (1), haga el siguiente ajuste.  
\* Una anchura del cursor demasiado pequeña puede impedir la alimentación de papel;  
una anchura del cursor demasiado grande puede provocar problemas con la alimentación torcida de papel.

DE

**Einstellen der Cursor-Breite**

1. Papier in die Papierladen einlegen.
2. Falls der Abstand zwischen dem vorderen Konsole-Cursor (3) und dem Papier (2) außerhalb des Bereichs 0,5 bis 1,0 mm liegt, wenn das Papier (2) am hinteren Konsole-Cursor (1) anliegt, ist folgende Einstellung vorzunehmen.  
\* Eine zu kleine Cursor-Breite kann den Papiereinzug behindern,  
wogegen eine zu große Cursor-Breite verkanteten Papiereinzug und ähnliche Probleme verursachen kann.

IT

**Regolazione della larghezza del cursore**

1. Caricare carta nei cassetti.
2. Se lo spazio tra il cursore frontale del deck (3) e la carta (2) è fuori della gamma da 0,5 a 1,0 mm quando la carta (2) tocca il cursore posteriore del deck (1), eseguire la regolazione seguente.  
\* Una larghezza dei cursori troppo piccola può ostacolare l'alimentazione della carta,  
mentre un'alarghezza dei cursori troppo grande può essere causa di problemi,  
come ad esempio l'alimentazione obliqua della carta.

CN

**游标宽度的调节**

1. 在供纸盒中装入纸张。
2. 在堆纸板后部游标(1)与纸张(2)接触的状态下,如果堆纸板前部游标(3)与纸张(2)的间隙超出了0.5~1.0mm的范围,须进行以下调节。  
※如果游标宽度过小,可能造成不供纸,游标宽度过大,则可能发生歪斜进纸等情况。

KO

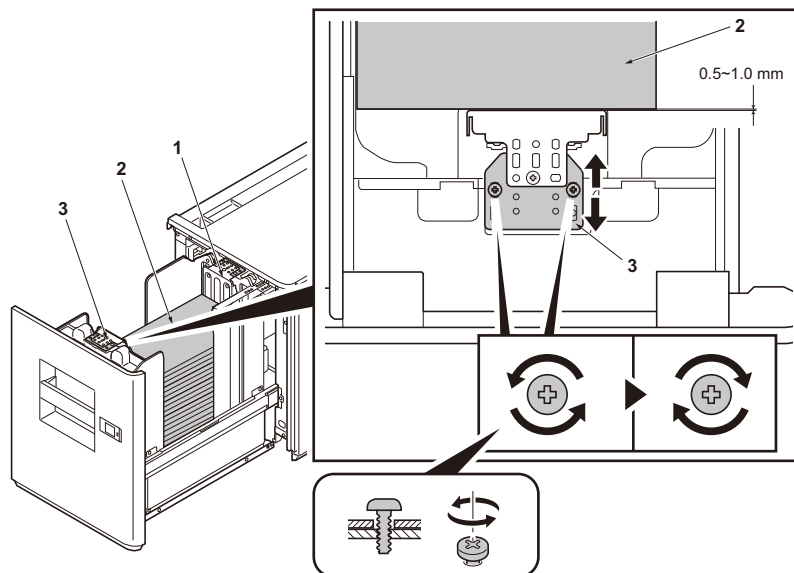
**커서 폭 조정**

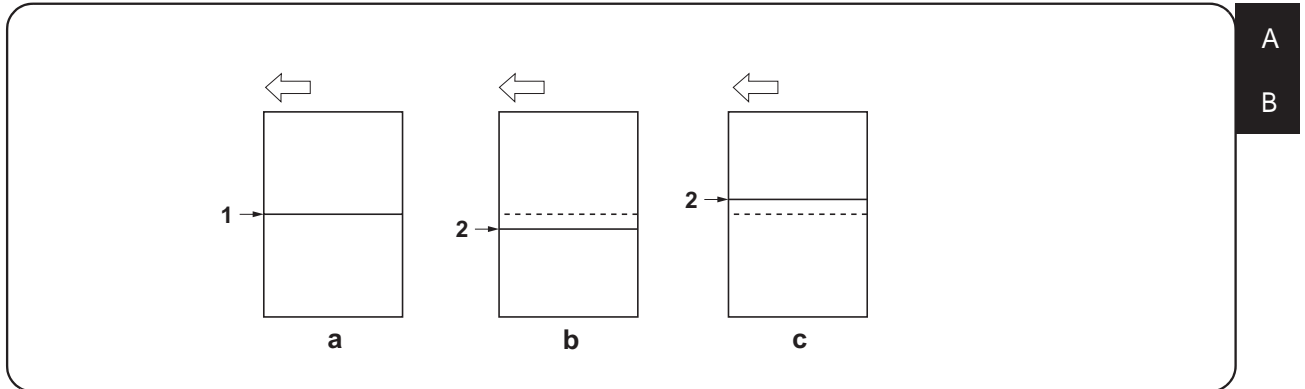
1. 카세트에 용지를 장착합니다.
2. 데크커서 뒤(1)에 용지(2)가 접하고 있는 상태에서 데크커서 앞(3)과 용지(2)의 틈이 0.5 ~ 1.0mm의 범위외의 경우에는 이하의 조정을 합니다.  
※커서 폭이 작으면 무급지, 커서 폭이 크면 경사급지 등이 발생할 가능성이 있습니다.

JP

**カーソル幅の調整**

1. カセットに用紙をセットする。
2. デッキカーソル後(1)に用紙(2)が接している状態で、デッキカーソル前(3)と用紙(2)の隙間が0.5~1.0mmの範囲外の場合は、以下の調整をおこなう。  
※カーソル幅が小さいと無給紙、カーソル幅が大きいと斜め給紙などが発生する可能性がある。



**English**

## Adjusting the center line

1. Check the deviation between the center (1) of a correct image (a) and the center (2) of a test pattern. If the gap exceeds the reference value, adjust the gap according to the following procedure.  
<Reference value> Within  $\pm 2.0$  mm
2. Set the maintenance mode U034 and select [LSU Out Left] > [Cassette5].

**Français**

## Réglage de l'axe

1. Vérifier la déviation entre l'axe (1) d'une image correcte (a) et l'axe (2) d'une forme d'essai. Si l'écart excède la valeur de référence, le régler selon la procédure suivante.  
<Valeur de référence>  $\pm 2,0$  mm max
2. Passez en mode maintenance U034 et sélectionnez [LSU Out Left] > [Cassette5].

**Español**

## Ajuste de la línea central

1. Compruebe la desviación entre el centro (1) de una imagen correcta (a) y el centro (2) de un patrón de prueba. Si la separación supera el valor de referencia, ajústela siguiendo este procedimiento.  
<Valor de referencia> Dentro de  $\pm 2,0$  mm
2. Configure el modo de mantenimiento U034 y seleccione [LSU Out Left] > [Cassette5].

**Deutsch**

## Einstellen der Mittelinie

1. Überprüfen Sie die Abweichung zwischen der Mitte (1) eines korrekten Bilds (a) und der Mitte (2) eines Prüfmusters. Wenn der Abstand größer als der Bezugswert ist, den Abstand mit dem folgenden Verfahren einstellen.  
<Bezugswert> Innerhalb  $\pm 2,0$  mm
2. Aktivieren Sie den Wartungsmodus U034 und wählen Sie [LSU Out Left] > [Cassette5].

**Italiano**

## Regolazione della linea centrale

1. Controllare la deviazione tra il centro (1) di un'immagine corretta (a) e il centro (2) di un modello di prova. Se lo scostamento supera il valore di riferimento, regolare lo scostamento stesso seguendo questa procedura.  
<Valore di riferimento> Entro  $\pm 2,0$  mm
2. Impostare la modalità manutenzione U034 e selezionare [LSU Out Left] > [Cassette5].

**简体中文**

## 中心线调节

1. 确认标准图像 (a) 的中心位置 (1) 与测试图案的中心位置 (2) 的偏移。如果偏移值超过标准值，则按照下列步骤进行调整。  
<标准值>  $\pm 2.0$ mm 以内
2. 进入维修保养模式 U034，把 [LSU Out Left] > [Cassette5]。

**한국어**

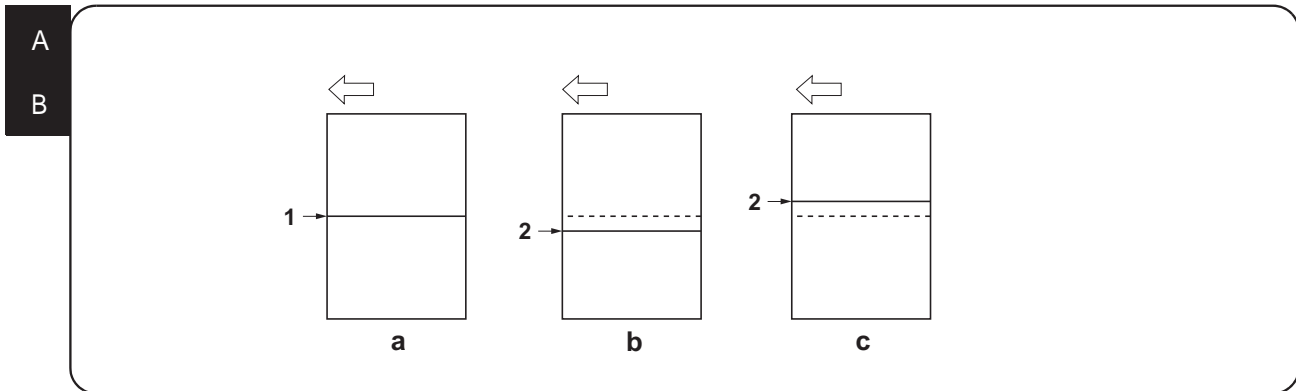
## 센터라인 조정

1. 적정화상 (a) 의 센터 (1) 와 테스트패턴의 센터 (2) 의 차이를 확인합니다. 차이가 기준치 외의 경우 다음의 순서대로 조정을 합니다.  
<기준치>  $\pm 2.0$ mm 이내
2. 메인テナンス 모드 U034 를 설정하고 [LSU Out Left] > [Cassette5] 를 선택합니다.

**日本語**

## センターライン調整

1. 適正画像 (a) のセンター (1) とテストパターンセンター (2) のずれを確認する。ずれが基準値外の場合、次の手順で調整をおこなう。  
<基準値>  $\pm 2.0$ mm 以内。
2. メンテナンスモード U034 をセットし、[LSU Out Left] > [Cassette5] を選択する。



## 3. Adjust the values.

Test pattern (b) : Increase the setting value.

Test pattern (c) : Decrease the setting value.

Amount of change per step: 0.1mm

## 4. Press the [Start] key to confirm the setting value.

## 5. Print the test pattern.

## 6. Repeat the steps 2 to 5 above until the gap of line (2) in test pattern is within the reference.

<Reference value> Wthin  $\pm 2.0$  mm

## 3. Régler les valeurs.

Mire d'essai (b) : Augmentez la valeur de réglage.

Mire d'essai (c) : Diminuez la valeur de réglage.

Changement par graduation d'échelle: 0,1mm

## 4. Appuyez sur la touche de [Départ] pour confirmer la valeur de réglage.

## 5. Imprimez le motif de test.

## 6. Répétez les étapes 2 à 5 ci-dessus jusqu'à ce que l'espace de la ligne (2) dans le motif de test soit dans la référence.

<Valeur de référence>  $\pm 2,0$  mm max.

## 3. Ajuste los valores.

Patrón de prueba (b) : Aumente el valor de configuración.

Patrón de prueba (c) : Reduzca el valor de configuración.

Magnitud del cambio por incremento: 0,1mm

## 4. Pulse la tecla de [Inicio] para confirmar el valor de configuración.

## 5. Imprima el patrón de prueba.

## 6. Repita los pasos del 2 al 5 anteriores hasta que el espacio de línea (2) del patrón de prueba esté dentro de los valores de referencia.

<Valor de referencia> Dentro de  $\pm 2,0$  mm

## 3. Die Werte einstellen.

Testmuster (b) : Den Einstellwert erhöhen.

Testmuster (c) : Den Einstellwert verringern.

Änderung pro Schritt: 0,1mm

## 4. Den Einstellwert durch Drücken der [Start]-Taste bestätigen.

## 5. Drucken Sie die Testseite aus.

## 6. Wiederholen Sie die Schritte 2 bis 5 solange, bis der Abstand der Linie (2) auf der Testseite sich innerhalb der Referenz befindet.

<Bezugswert> Innerhalb  $\pm 2,0$  mm

## 3. Regolare i valori.

Modello di prova (b) : Aumentare il valore dell'impostazione.

Modello di prova (c) : Diminuire il valore dell'impostazione.

Entità modifica per passo: 0,1mm

## 4. Premere il tasto di [Avvio] per confermare il valore dell'impostazione.

## 5. Stampare lo schema di prova.

## 6. Ripetere i punti da 2 a 5 sopra indicati fino a portare lo spazio della linea (2) nello schema di prova all'interno del riferimento.

<Valore di riferimento> Entro  $\pm 2,0$  mm

## 3. 調整設定値。

测试图案 (b) : 调高设定值。

测试图案 (c) : 调低设定值。

设定值的一个调整单位变化量 : 0.1mm

## 4. 按 [开始] 键, 以确定设定值。

## 5. 打印测试图案。

## 6. 重复步骤 2 ~ 5, 直至测试样张的线 (2) 的偏移值达到标准值以内。

<标准值>  $\pm 2.0$ mm 以内

## 3. 설정치를 조정합니다 .

테스트 패턴 (b) : 설정치를 높입니다 .

테스트 패턴 (c) : 설정치를 내립니다 .

1 스텝당 변화량:0.1mm

## 4. [ 복사 / 시작 ] 키를 누르고 설정치를 확인합니다 .

## 5. 시험 패턴을 인쇄합니다 .

## 6. 테스트 패턴에서 라인 (2) 의 격차가 기준 이 내가 될 때까지 2 단계 ~ 5 단계를 반복 수행 합니다 .

<기준치>  $\pm 2.0$ mm 이내

## 3. 設定値を調整する。

テストパターン (b) : 設定値を上げる。

テストパターン (c) : 設定値を下げる。

1 ステップ当たりの変化量:0.1mm

## 4. [ スタート ] キーを押し、設定値を確定する。

## 5. テストパターンを出力する。

## 6. テストパターンの線 (2) のずれが基準値内になるまで手順 2 ~ 5 を繰り返す。

<基準値>  $\pm 2.0$ mm 以内。



2017.7  
303RL56710-05

(2)PF-7130+PF-730(B)/PF-740(B)

# **PF-7130+PF-730(B)/ PF-7130+PF-740(B) (500 sheet×3 Side Feeder) / (500, 1500 sheet×2 Large Capacity Side Feeder )**

## **Installation Guide**

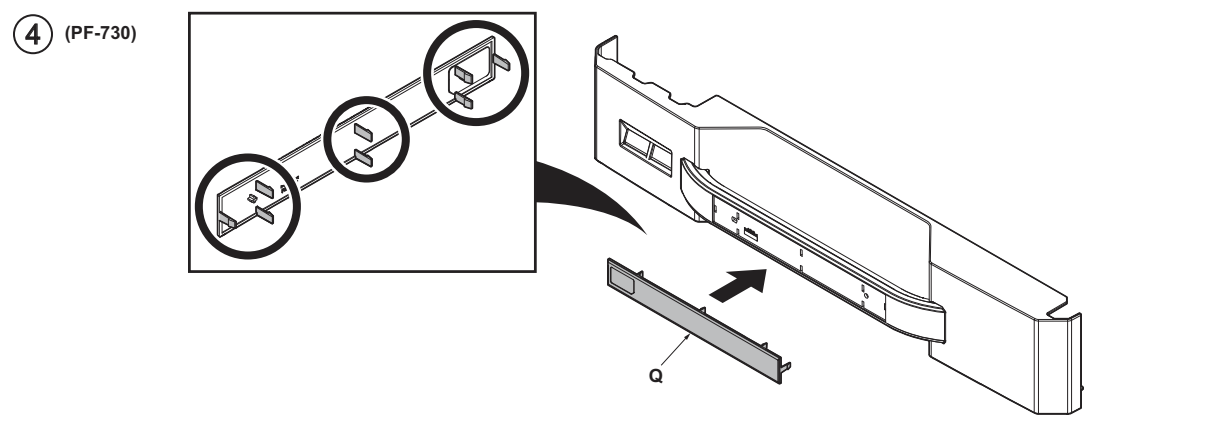
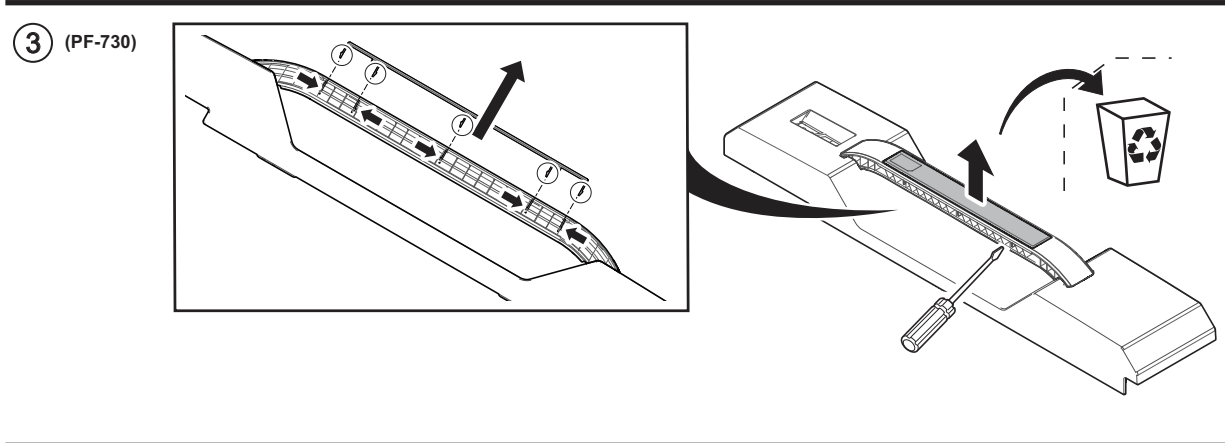
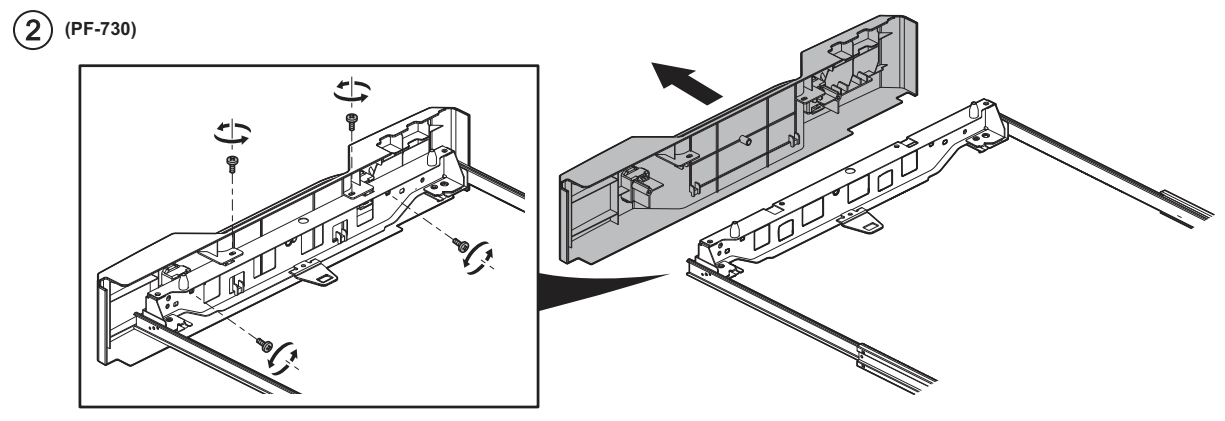
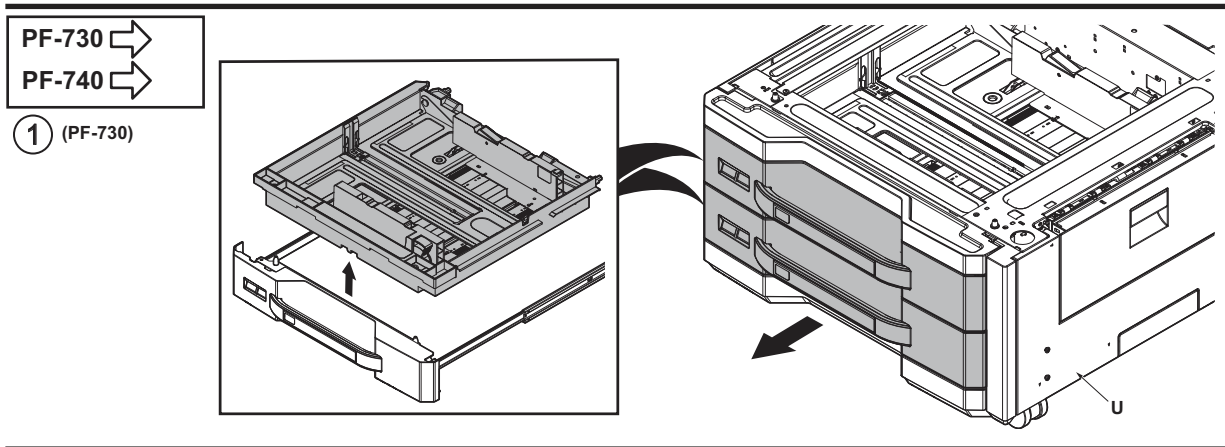
(ENG) G\*: Number and type of the parts supplied vary by destination.  
 (FR) G\*: Le nombre et le type des pièces fournies varient selon la destination.  
 (ES) G\*: El número y el tipo de piezas proporcionadas varían según el destino.  
 (DE) G\*: Die Anzahl und Ausführung der enthaltenen Teile variiert je nach Auslieferungsort.  
 (IT) G\*: Il numero e il tipo di parti fornite variano in base alla destinazione.  
 (CN) G\*: 根据地区，附带零件的种类和数量会有不同。  
 (KO) G\*: 국가에 따라 동봉 수량과 종류가 다릅니다.  
 (JP) G\*: 仕向地によって、同梱物の種類および数量が異なります。

**(PF-730)**

**(PF-740)**

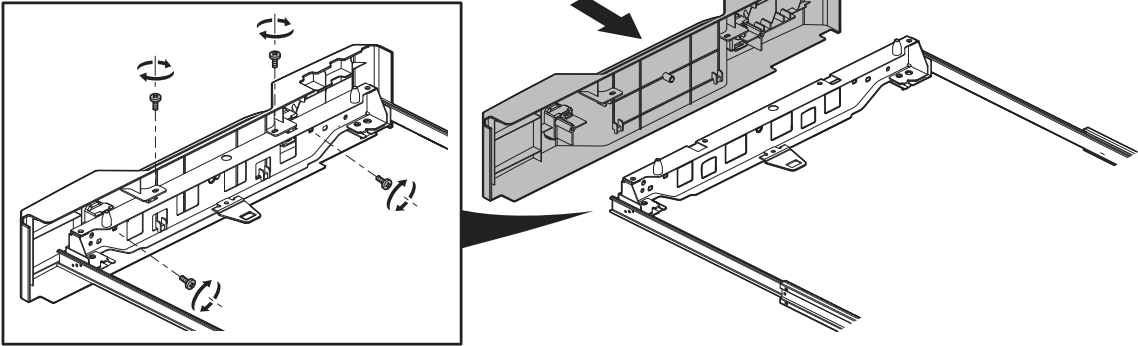
(ENG) AA\*,CC\*: Number and type of the parts supplied vary by destination.  
 (FR) AA\*,CC\*: Le nombre et le type des pièces fournies varient selon la destination.  
 (ES) AA\*,CC\*: El número y el tipo de piezas proporcionadas varían según el destino.  
 (DE) AA\*,CC\*: Die Anzahl und Ausführung der enthaltenen Teile variiert je nach Auslieferungsort.  
 (IT) AA\*,CC\*: Il numero e il tipo di parti fornite variano in base alla destinazione.  
 (CN) AA\*,CC\*: 根据地区，附带零件的种类和数量会有不同。  
 (KO) AA\*,CC\*: 국가에 따라 동봉 수량과 종류가 다릅니다.  
 (JP) AA\*,CC\*: 仕向地によって、同梱物の種類および数量が異なります。

- (ENG) Be sure to remove any tape and/or cushioning materials from the parts supplied.  
 (FR) Veillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.  
 (ES) Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.  
 (DE) Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.  
 (IT) Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.  
 (CN) 如果附属品上带有固定胶带，缓冲材料时务必揭下。  
 (KO) 동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.  
 (JP) 同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。

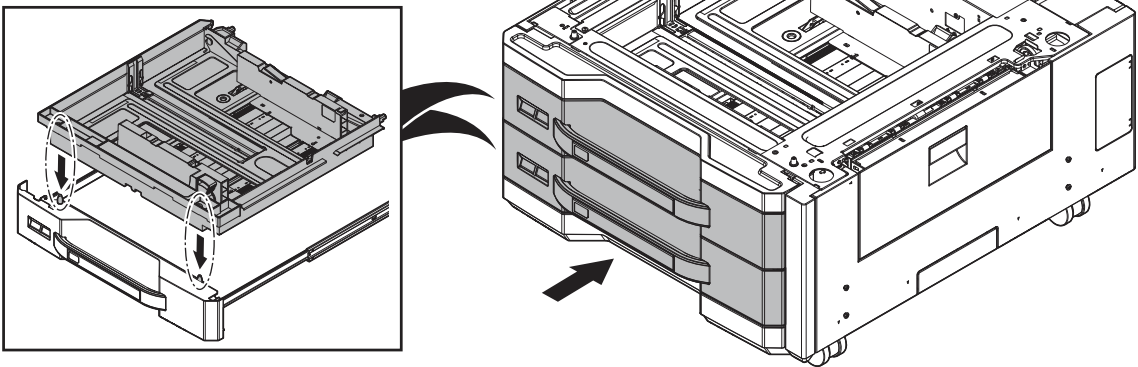




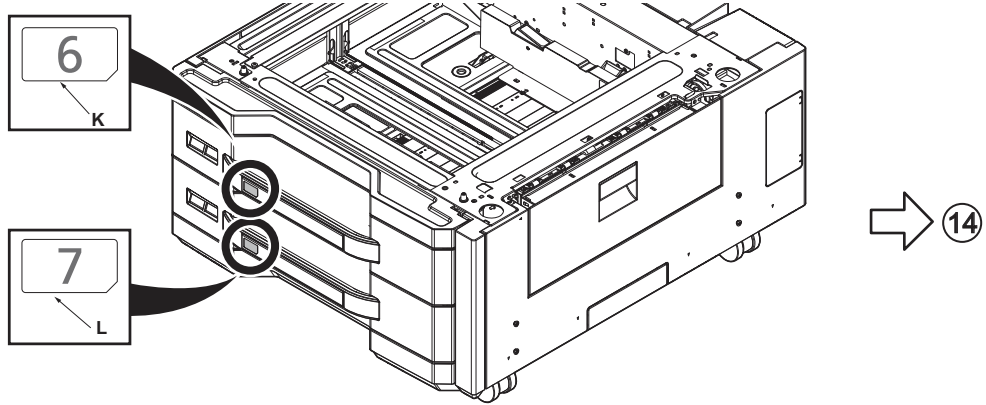
5 (PF-730)



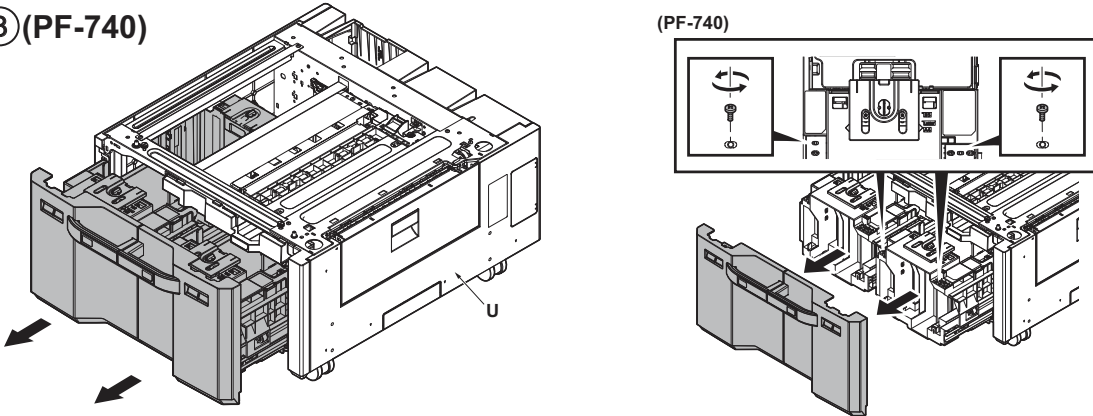
6 (PF-730)



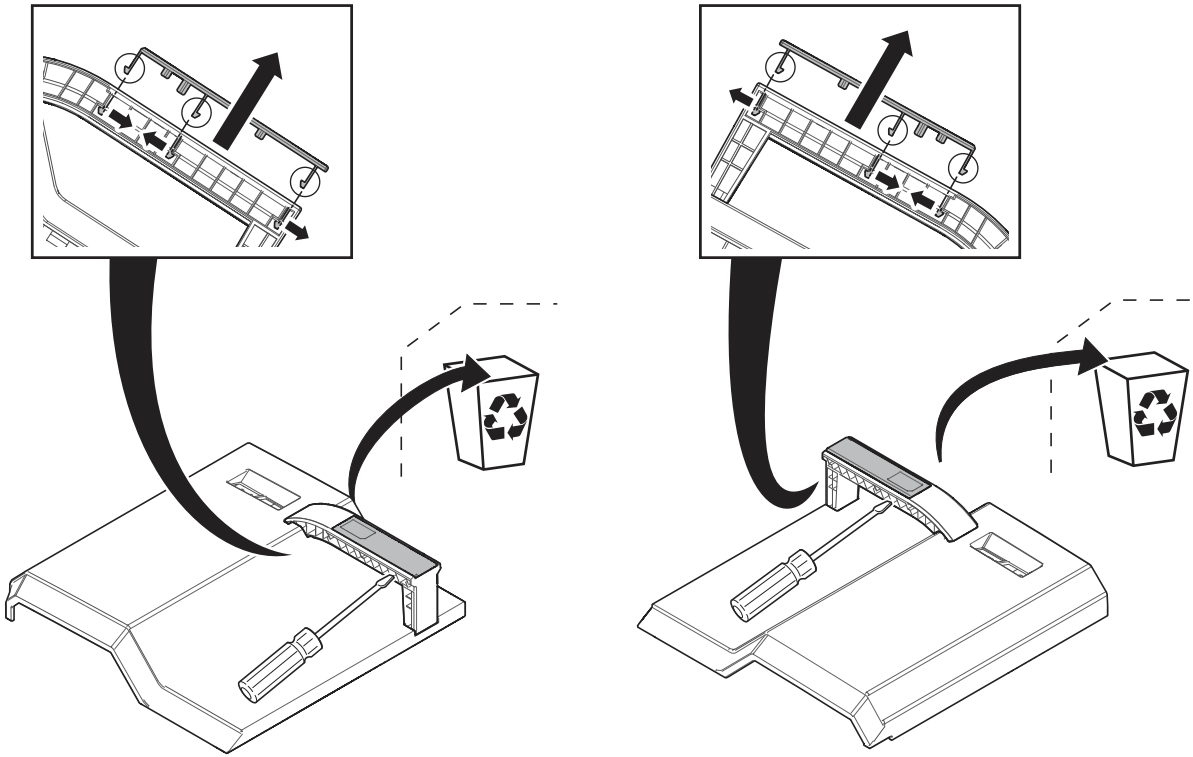
7 (PF-730)



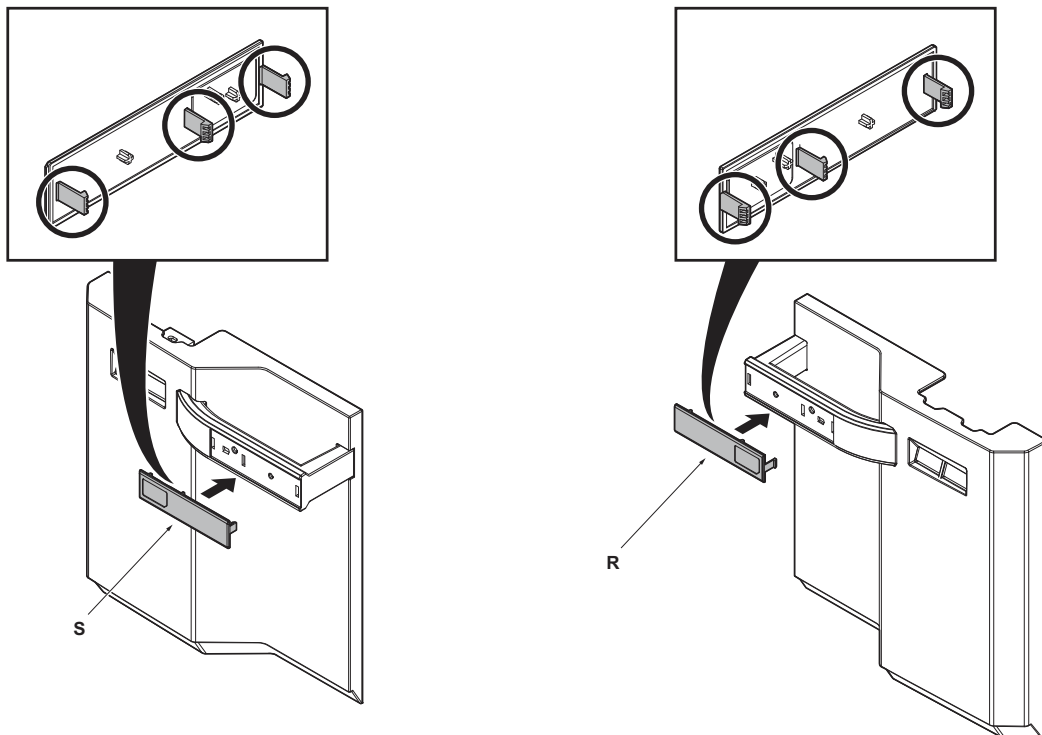
8 (PF-740)



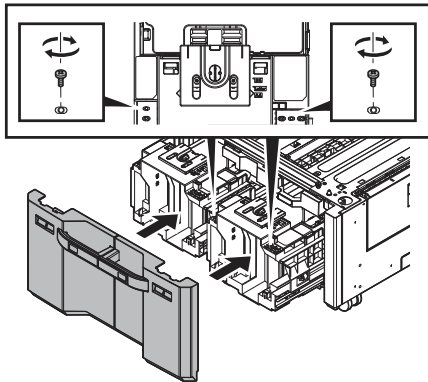
9 (PF-740)



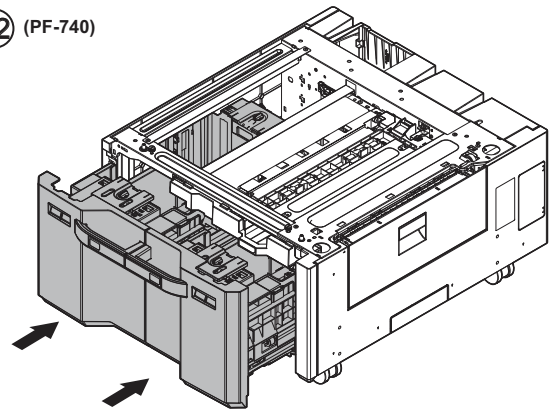
10 (PF-740)



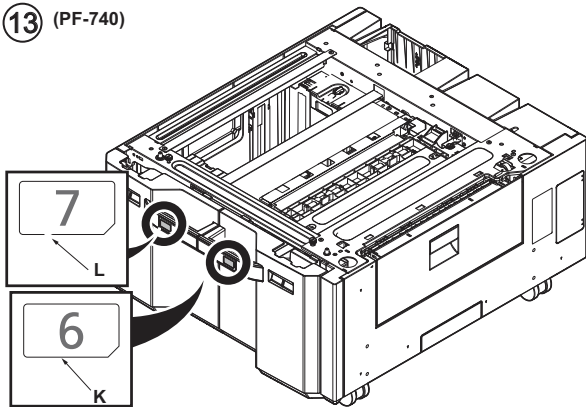
11 (PF-740)



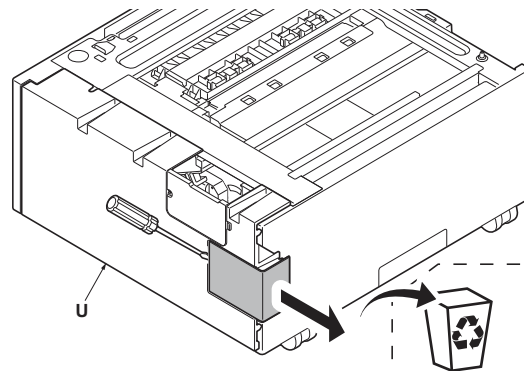
12 (PF-740)



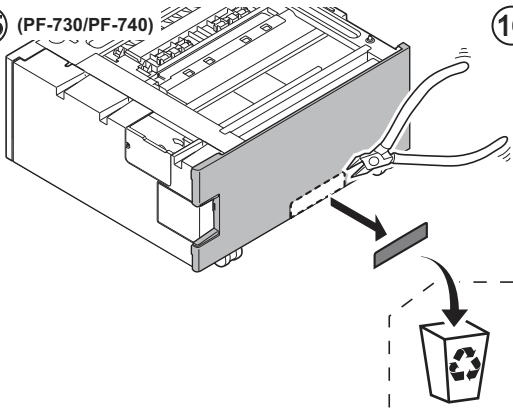
13 (PF-740)



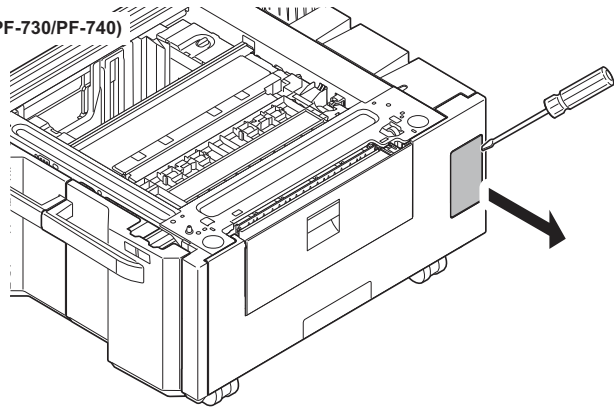
14 (PF-730/PF-740)



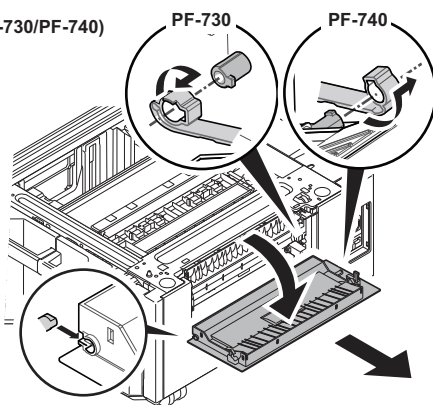
15 (PF-730/PF-740)



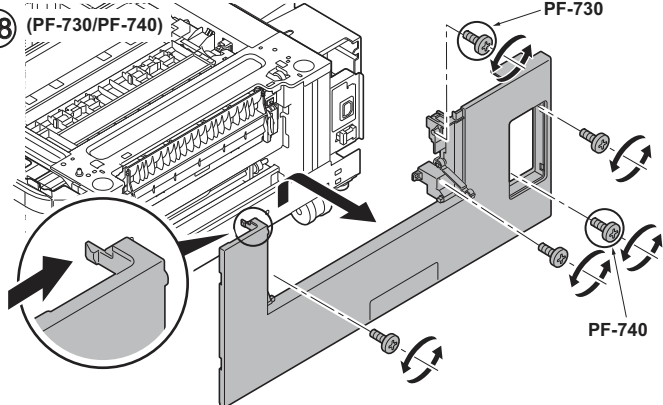
16 (PF-730/PF-740)

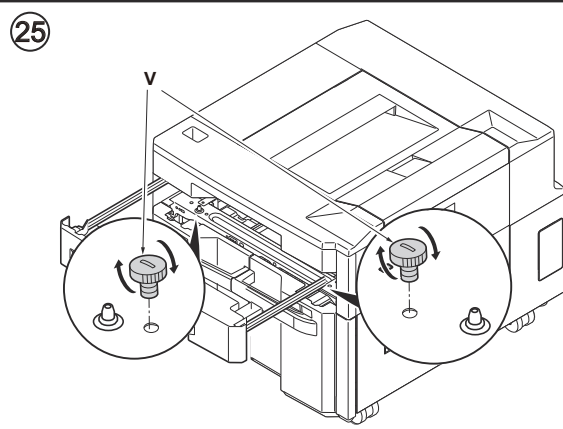
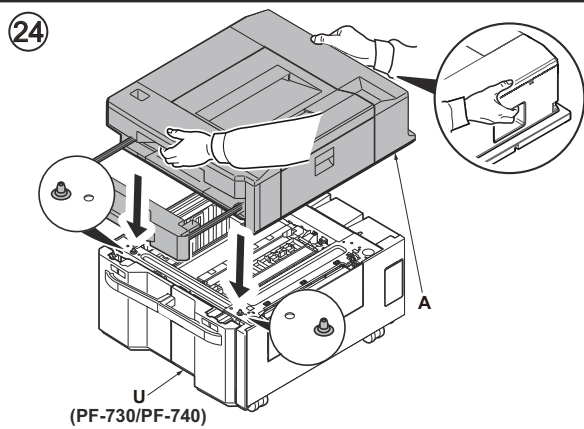
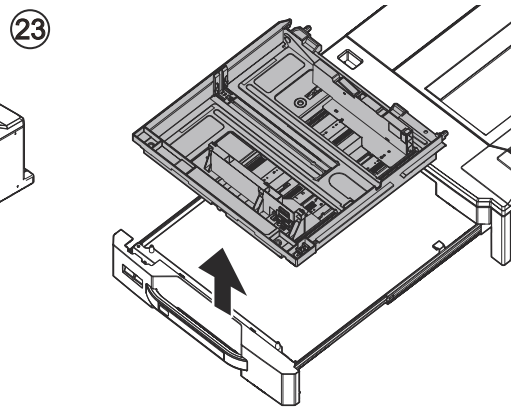
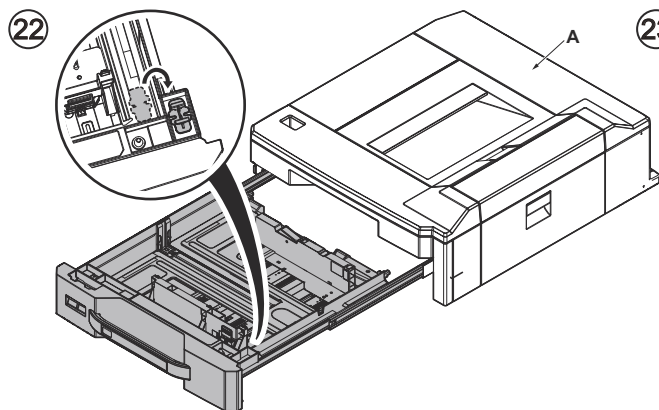
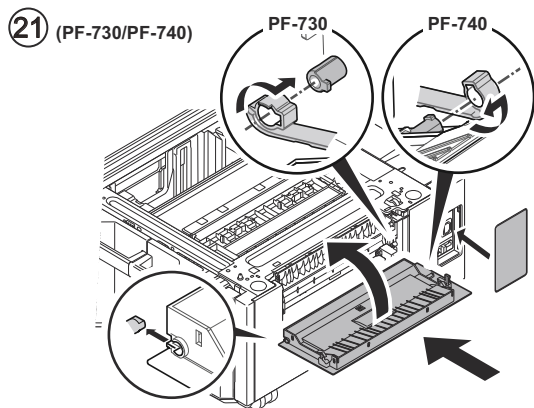
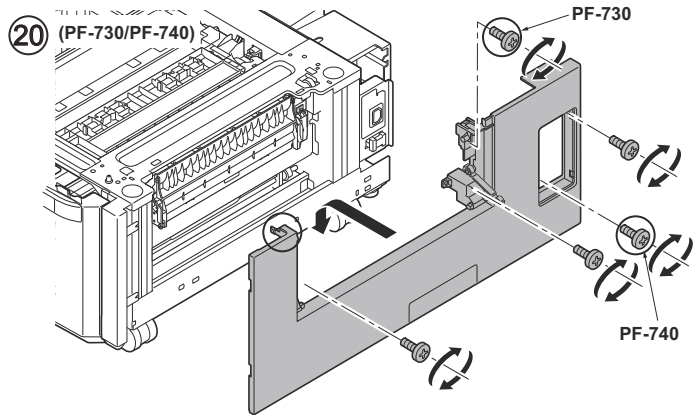
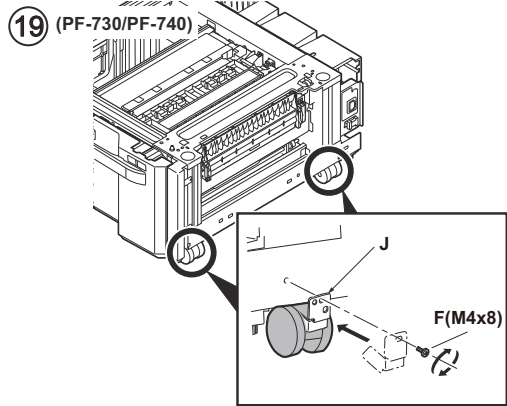


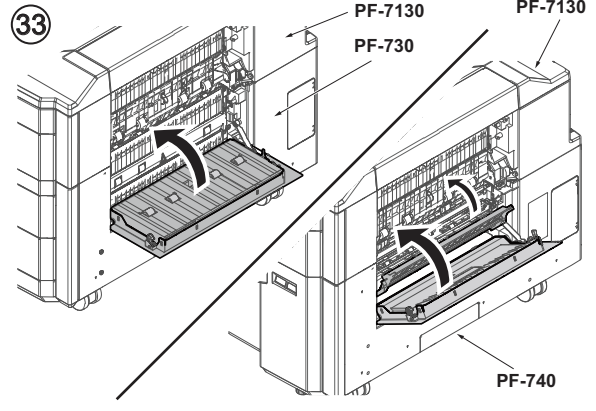
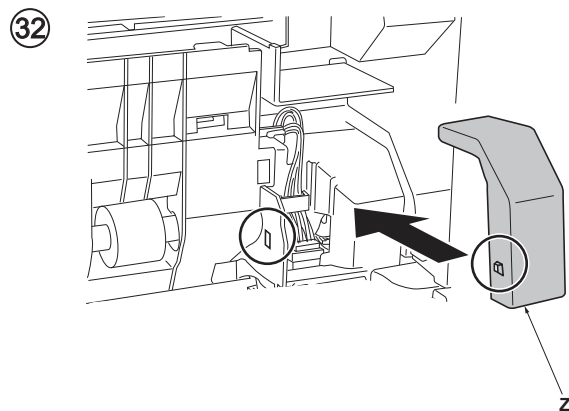
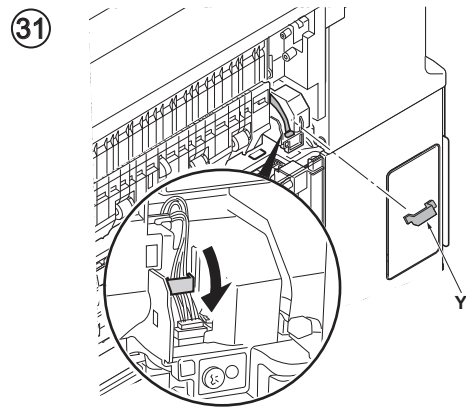
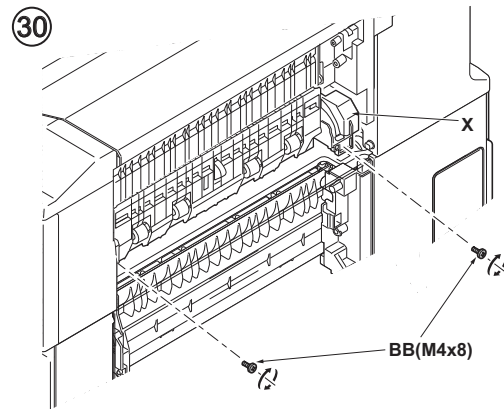
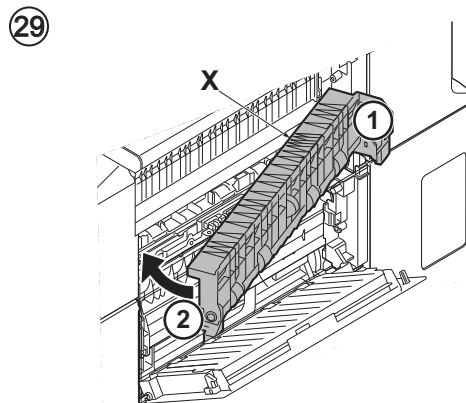
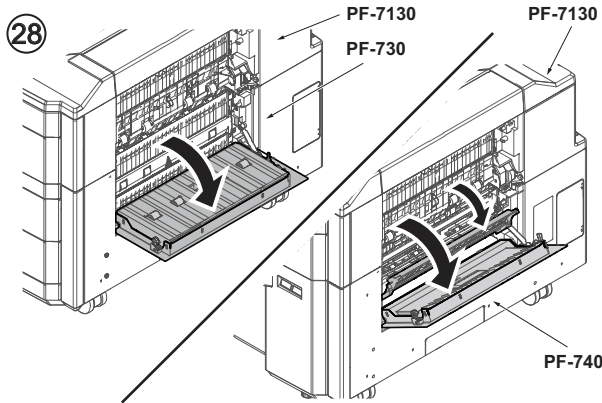
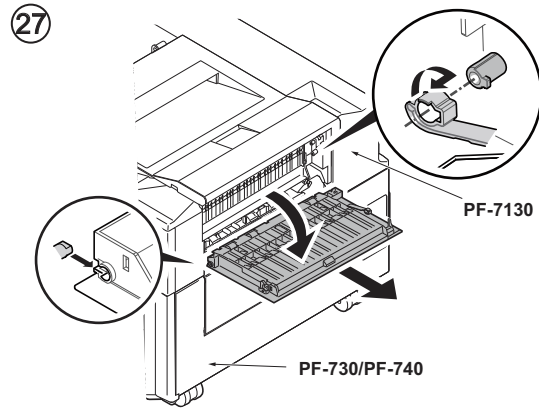
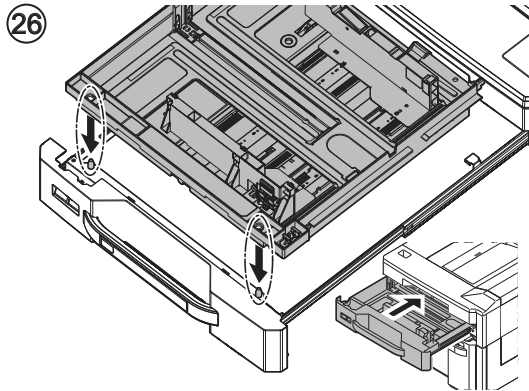
17 (PF-730/PF-740)

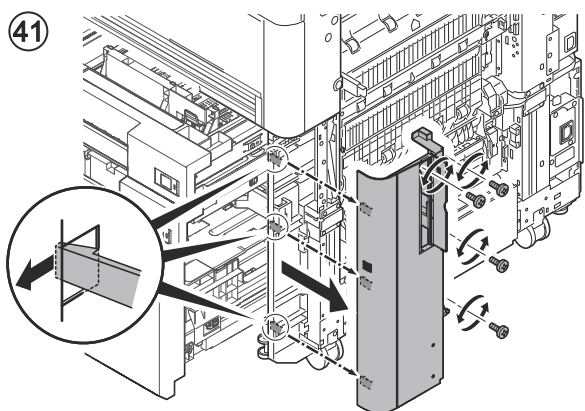
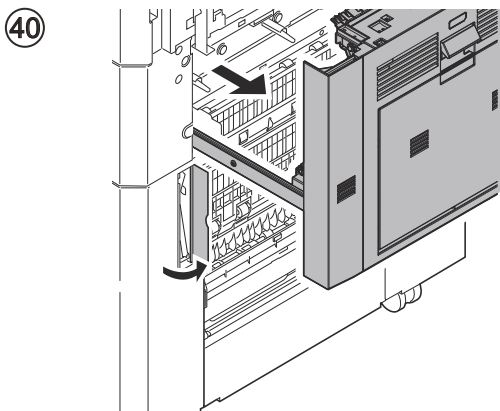
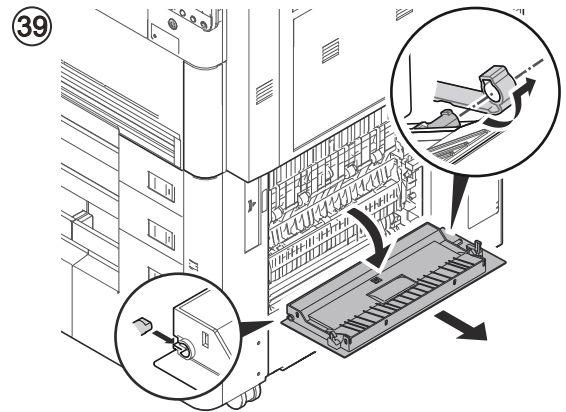
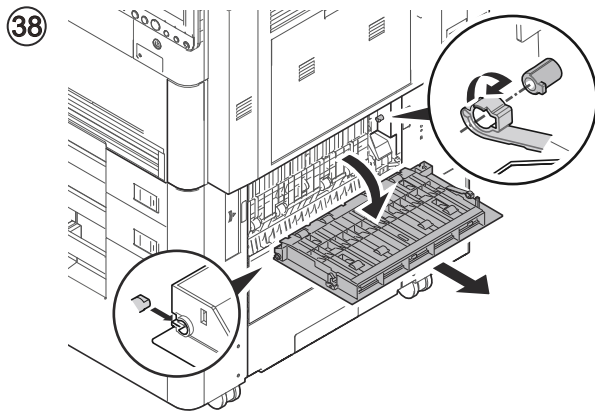
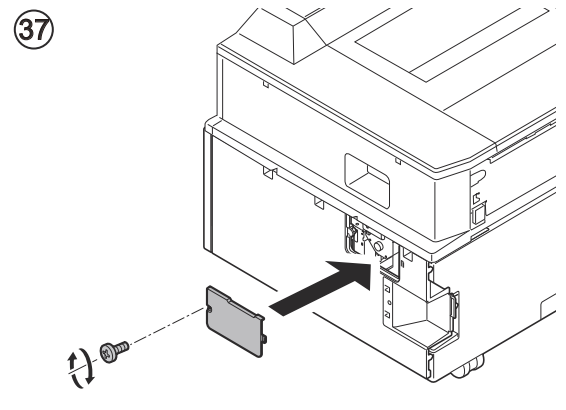
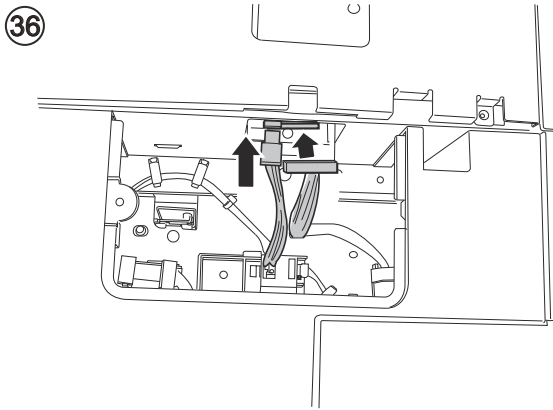
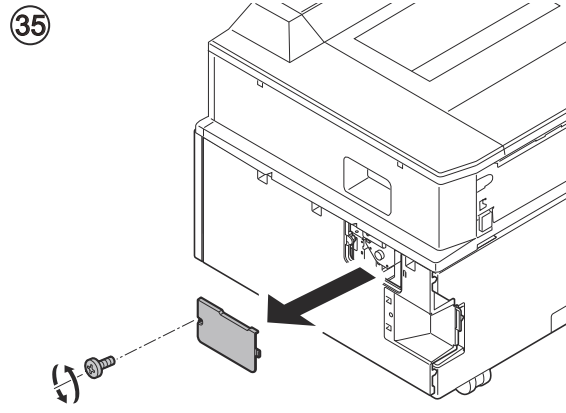
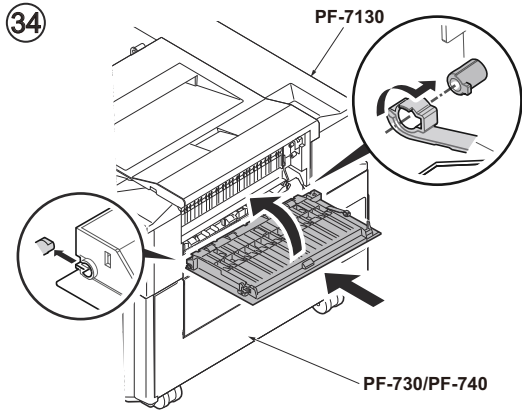


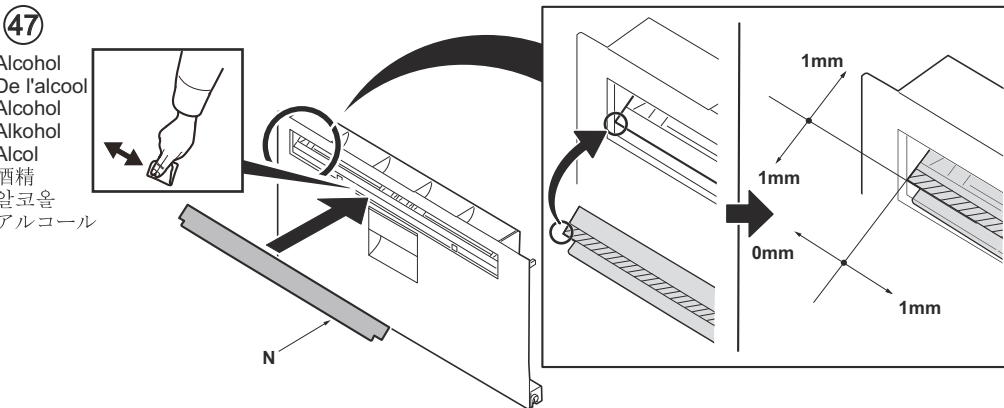
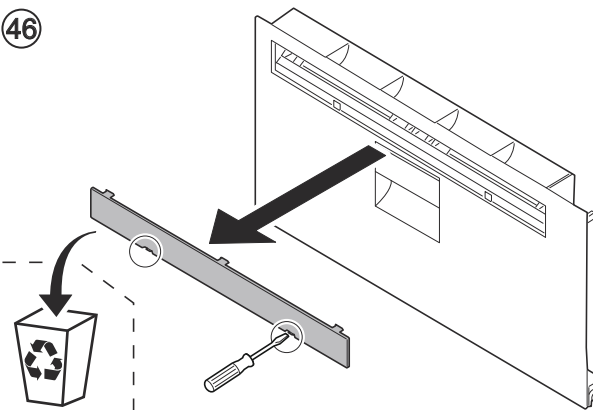
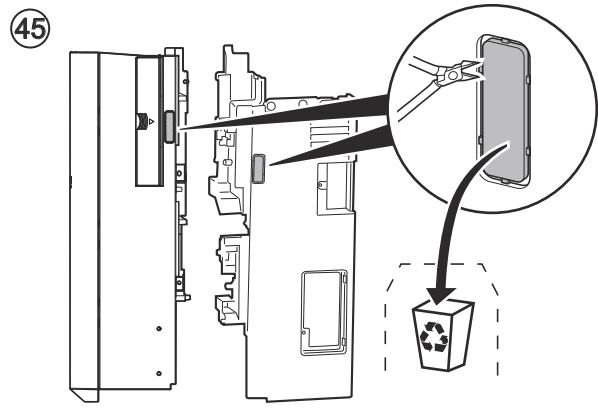
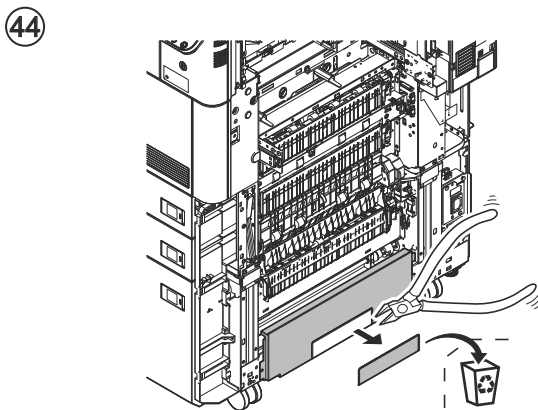
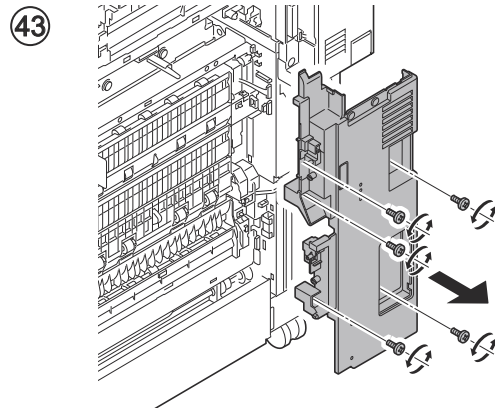
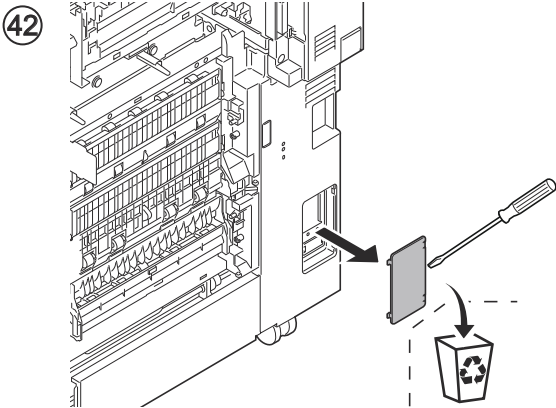
18 (PF-730/PF-740)



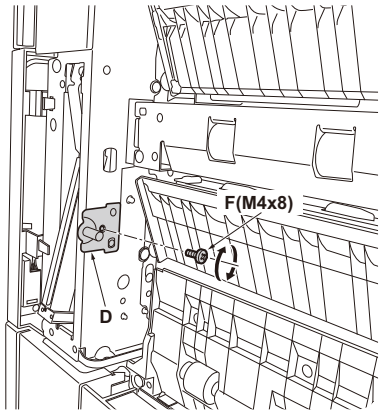




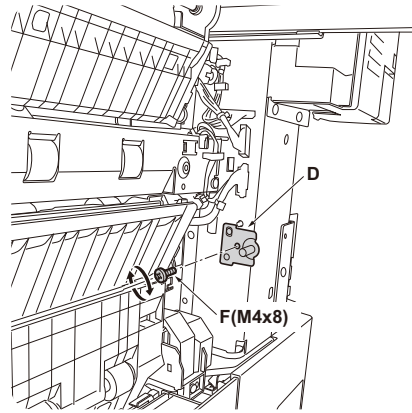




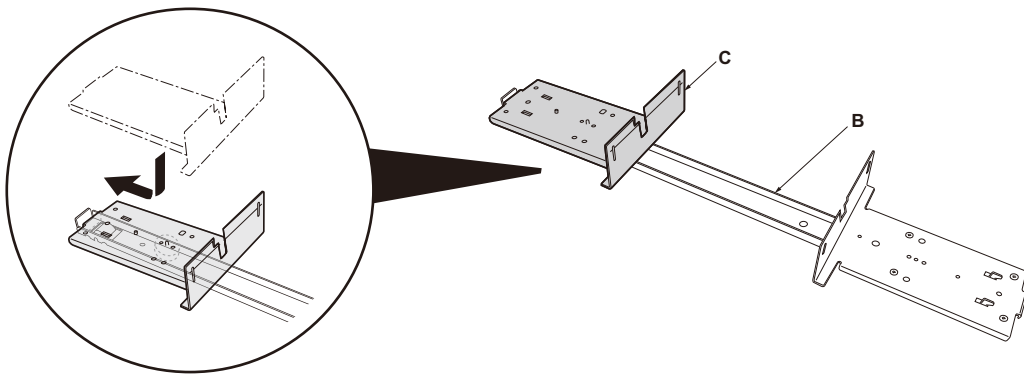
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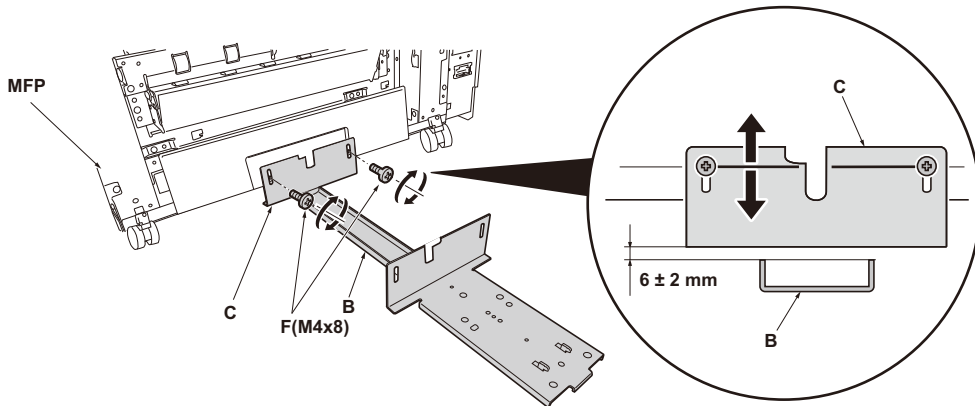
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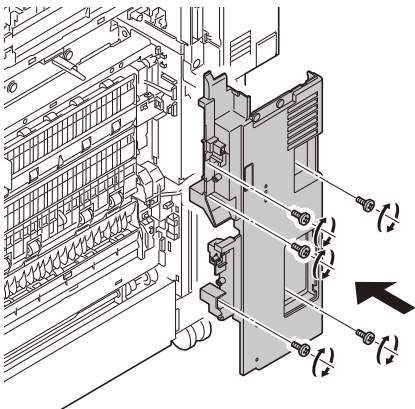
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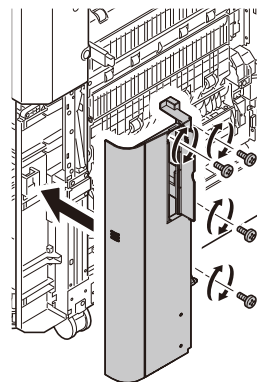
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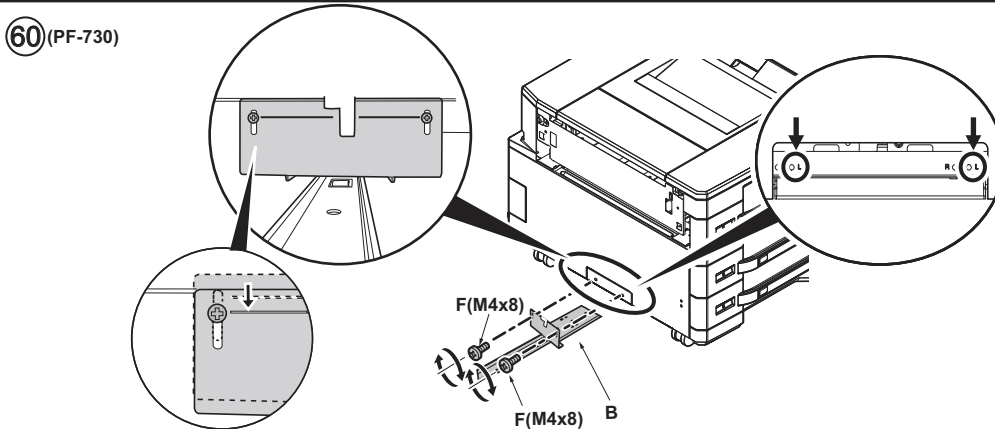
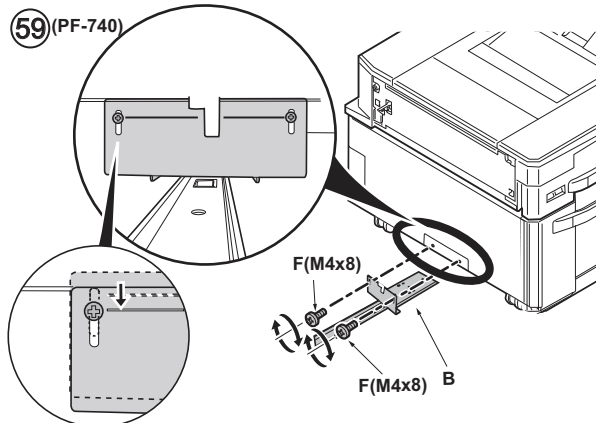
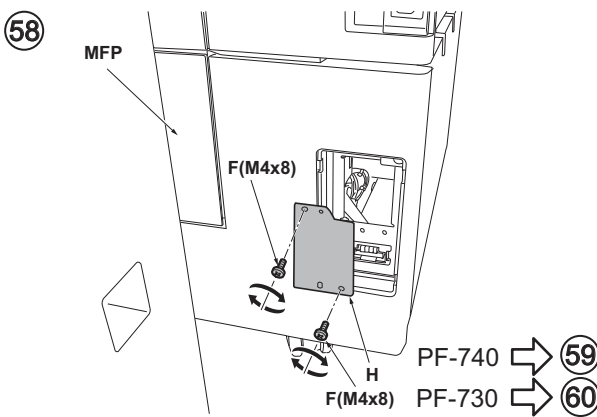
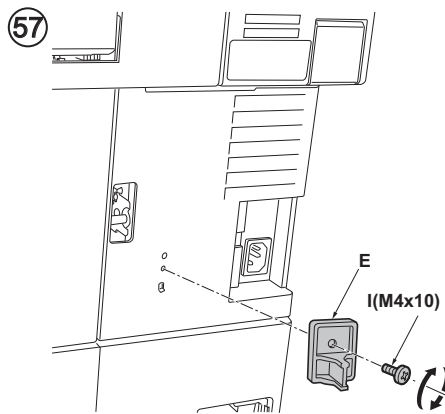
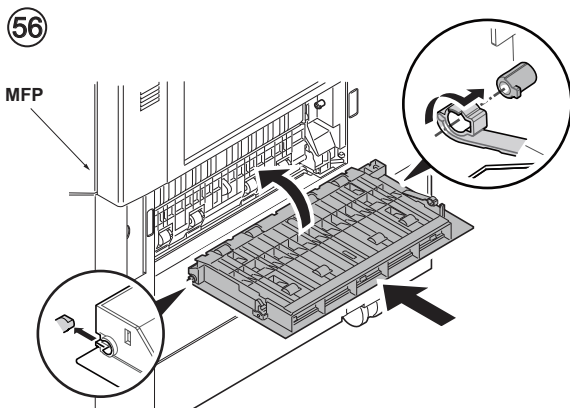
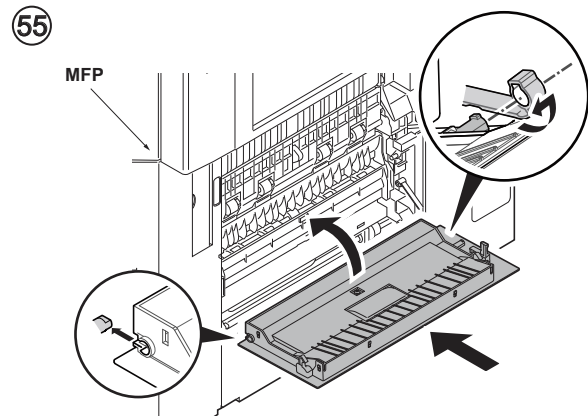
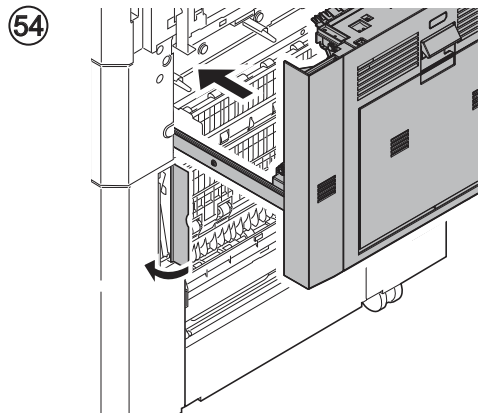
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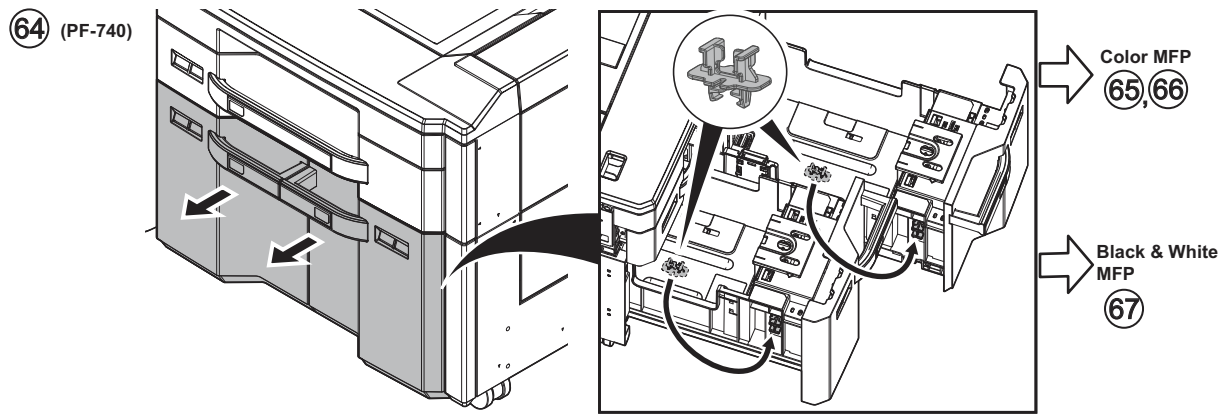
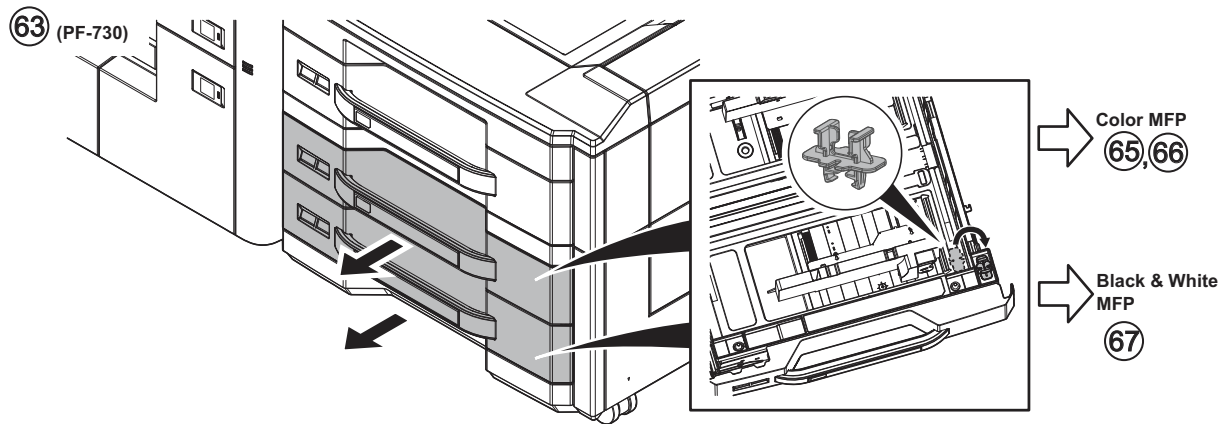
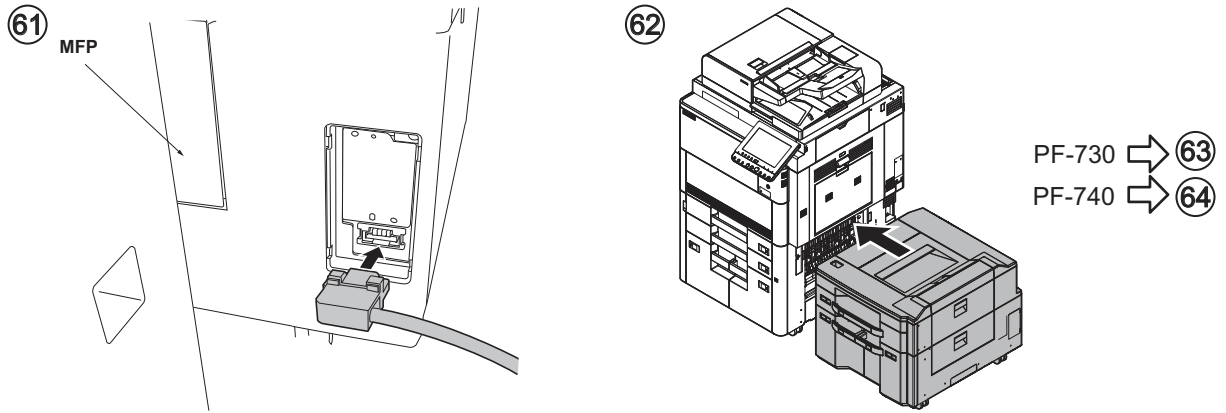


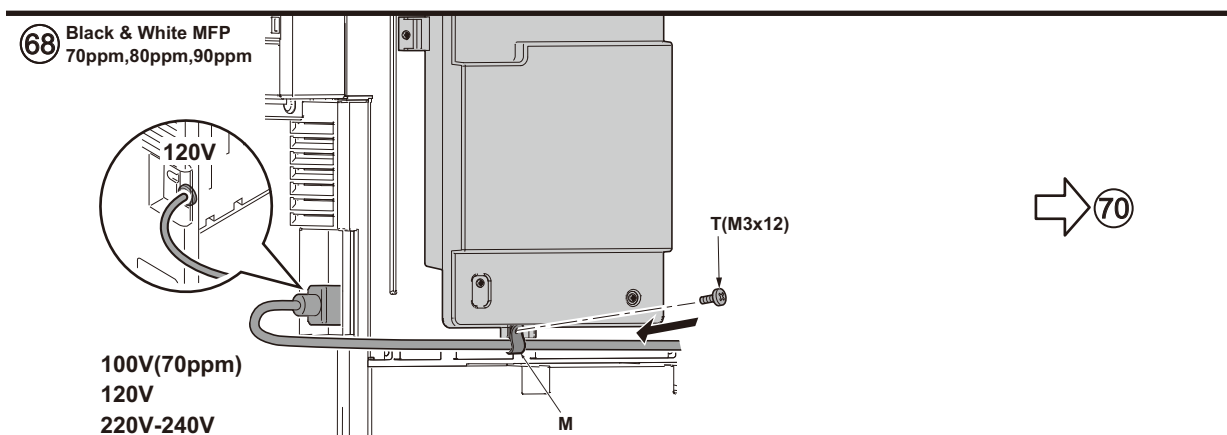
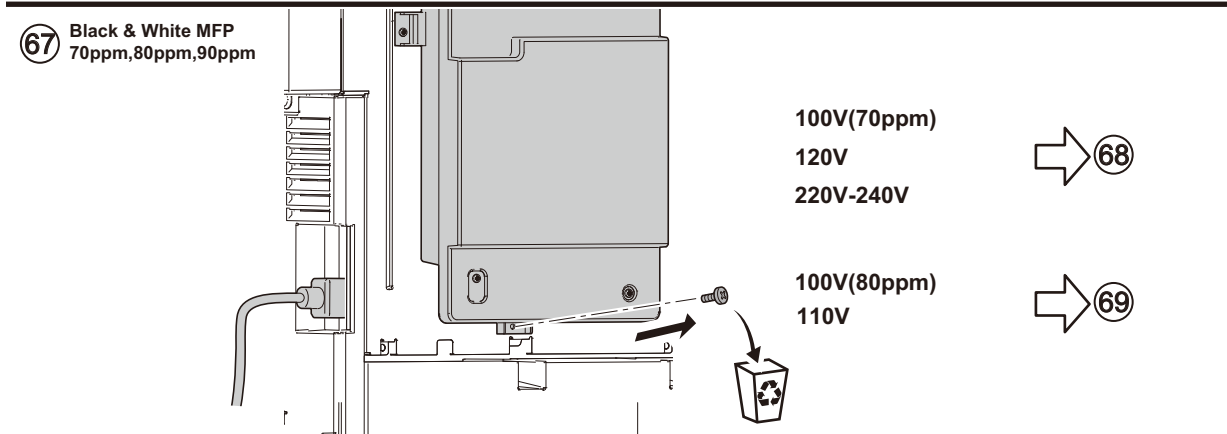
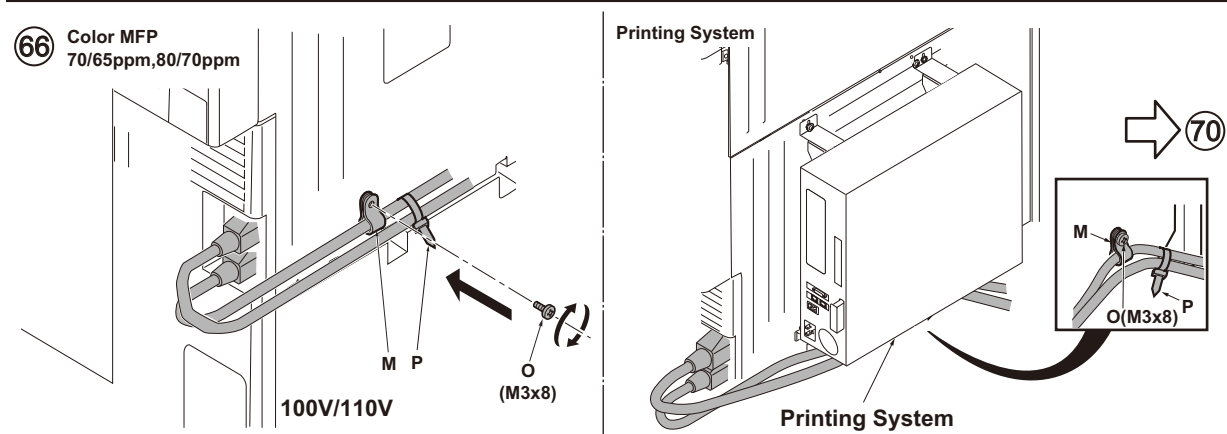
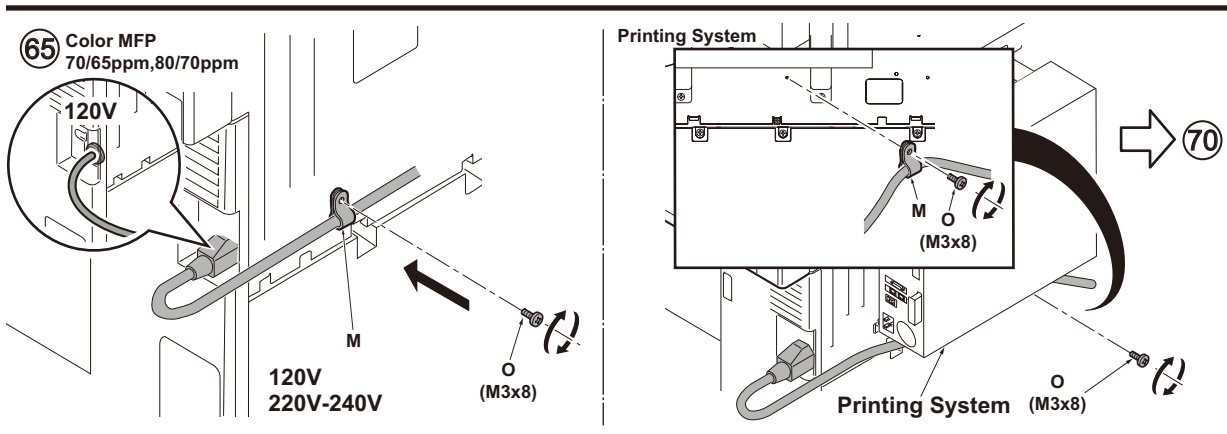
53

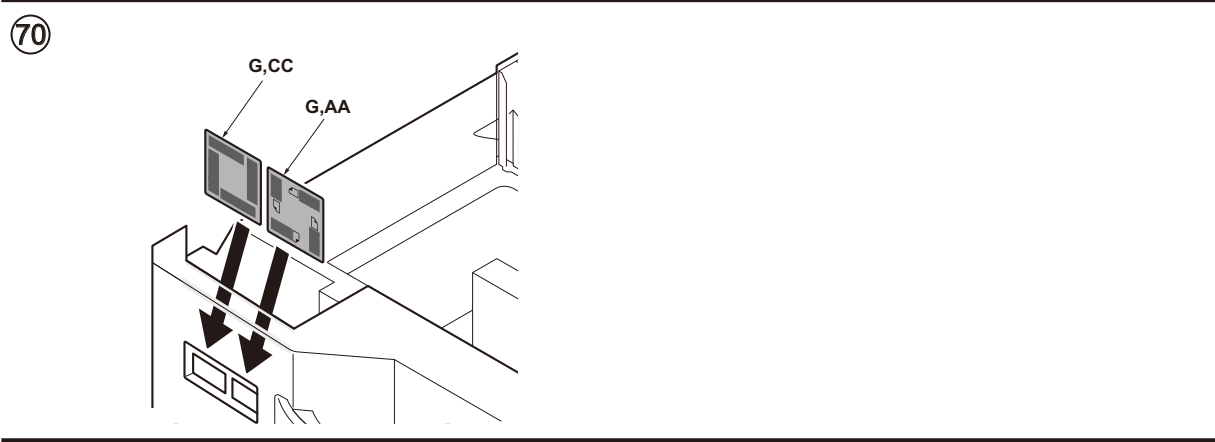
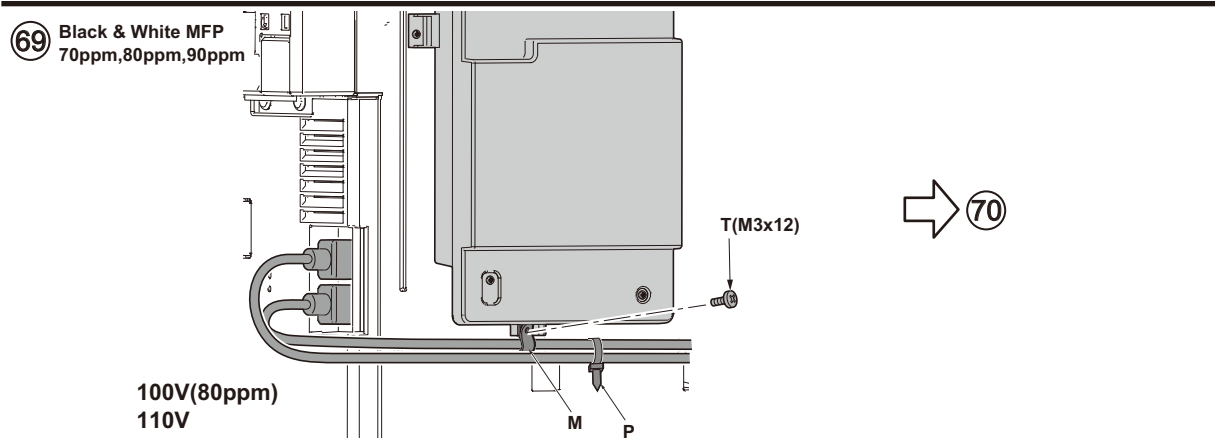






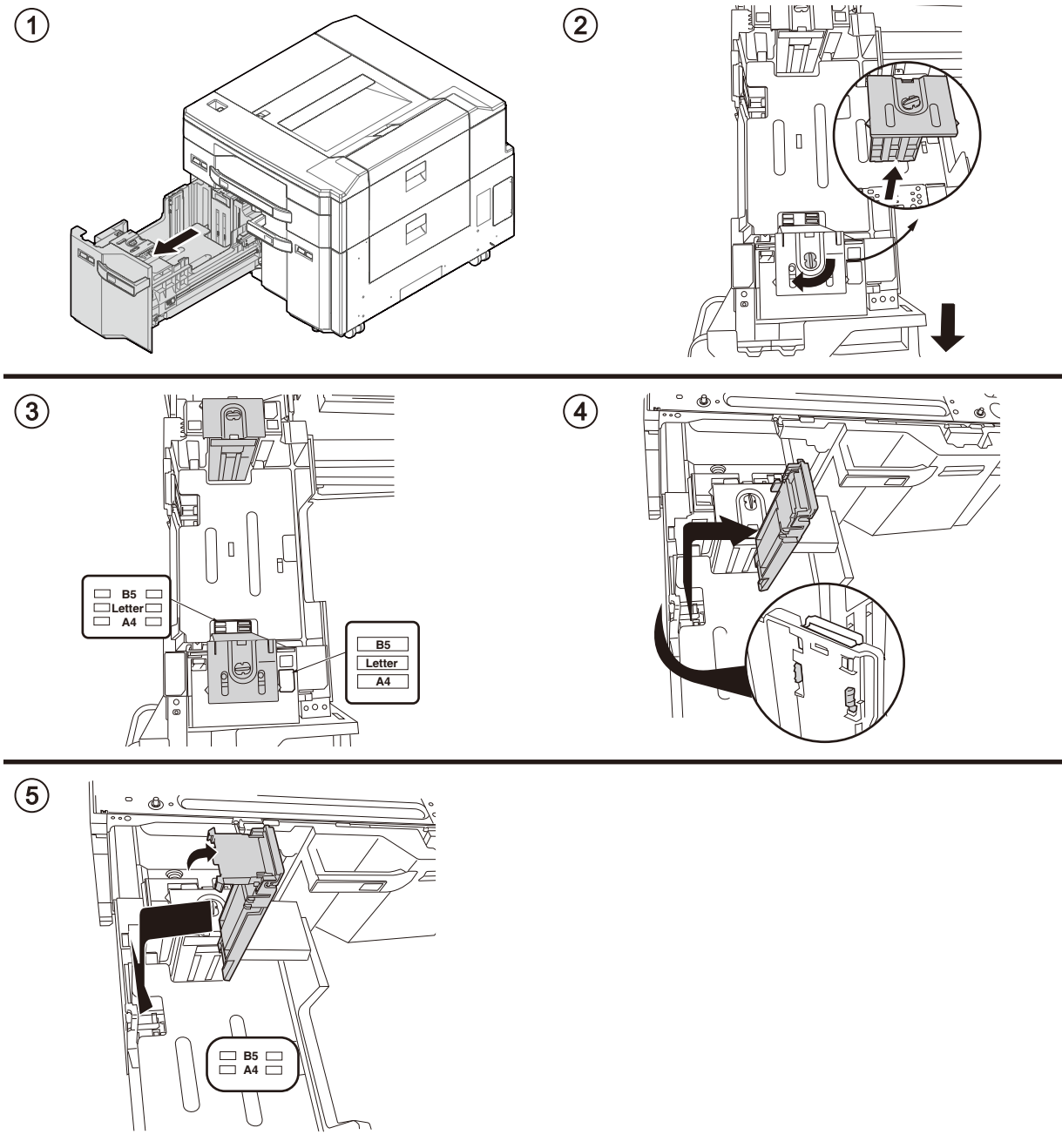






- ① ENG Changing paper size (PF-740)
- ② FR Modification du format du papier (PF-740)
- ③ ES Cómo cambiar el tamaño de papel (PF-740)
- ④ DE Ändern des Papierformats (PF-740)
- ⑤ IT Cambio del formato della carta (PF-740)
- ⑥ CN 纸张尺寸更改 (PF-740)
- ⑦ KO 용지크기 변경 (PF-740)
- ⑧ JP 用紙サイズ変更 (PF-740)

**A4 → B5**



**(ENG) Adjusting the cursor width (PF-740)**

\* A cursor width that is too small can hinder paper feeding, while a cursor width that is too large can lead to problems such as skewed paper feed.

**(FR) Réglage de la largeur du curseur (PF-740)**

\* Une largeur trop faible du curseur risque d'empêcher l'entraînement du papier et une largeur trop grande risque d'entraîner des problèmes du type entraînement du papier de biais.

**(ES) Cómo ajustar la anchura del cursor (PF-740)**

\* Una anchura del cursor demasiado pequeña puede impedir la alimentación de papel; una anchura del cursor demasiado grande puede provocar problemas con la alimentación torcida de papel.

**(DE) Einstellen der Cursor-Breite (PF-740)**

\* Eine zu kleine Cursor-Breite kann den Papiereinzug behindern, wogegen eine zu große Cursor-Breite verkanteten Papiereinzug und ähnliche Probleme verursachen kann.

**(IT) Regolazione della larghezza del cursore (PF-740)**

\* Una larghezza dei cursori troppo piccola può ostacolare l'alimentazione della carta, mentre una larghezza dei cursori troppo grande può essere causa di problemi, come ad esempio l'alimentazione obliqua della carta.

**(CN) 游标宽度的调节 (PF-740)**

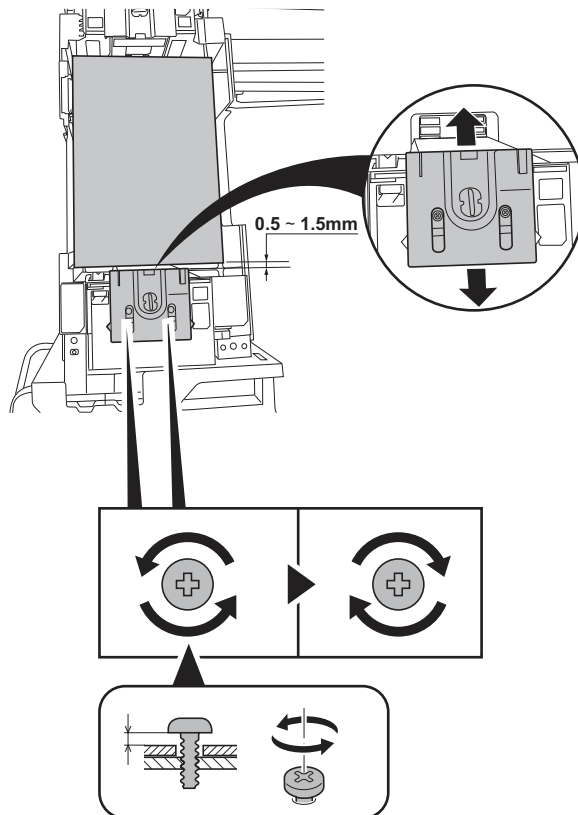
※如果游标宽度过小,可能造成不供纸,游标宽度过大,则可能发生歪斜进纸等情况。

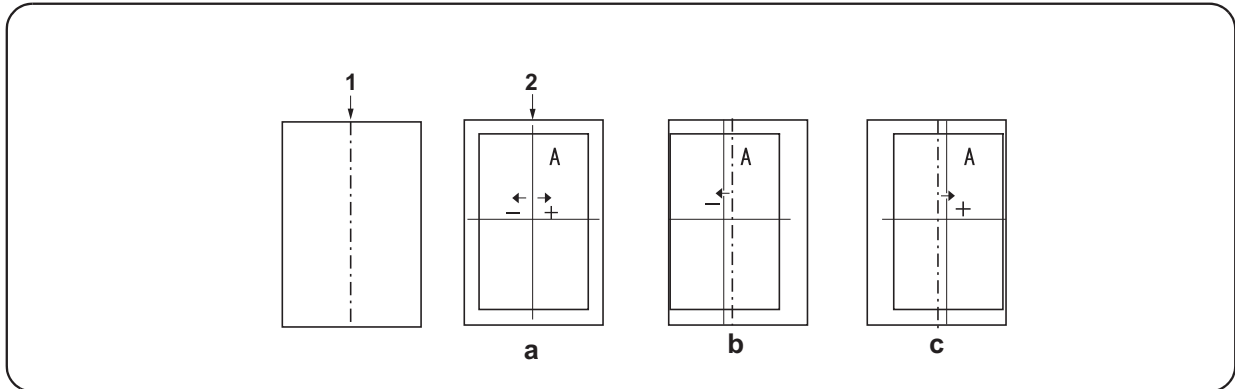
**(KO) 커서 폭 조정 (PF-740)**

※커서 폭이 작으면 무급지, 커서 폭이 크면 경사급지 등이 발생할 가능성이 있습니다.

**(JP) カーソル幅の調整 (PF-740)**

※カーソル幅が小さいと無給紙、カーソル幅が大きいと斜め給紙などが発生する可能性がある。



**English**

## Adjusting the center line

1. Check the gap between the paper center (1) and the line (2) of test pattern (a). If the gap exceeds the reference value, adjust the gap according to the following procedure.  
<Reference value> within  $\pm 0.5\text{mm}$ .
2. Set the maintenance mode U034 and select [LSU Out Left] > [Cassette5], [Cassette6] or [Cassette7].

**Français**

## Réglage de l'axe

1. Vérifier l'espace entre le centre du papier (1) et la ligne (2) du motif de (a). Si l'écart excède la valeur de référence, le régler selon la procédure suivante.  
<Valeur de référence>  $\pm 0,5\text{mm}$  max.
2. Passez en mode maintenance U034 et sélectionnez [LSU Out Left] > [Cassette5], [Cassette6] ou [Cassette7].

**Español**

## Ajuste de la línea central

1. Compruebe el espacio entre el centro del papel (1) y la línea (2) del patrón de prueba (a). Si la separación supera el valor de referencia, ajústela siguiendo este procedimiento.  
<Valor de referencia> Dentro de  $\pm 0,5\text{mm}$ .
2. Configure el modo de mantenimiento U034 y seleccione [LSU Out Left] > [Cassette5], [Cassette6] o [Cassette7].

**Deutsch**

## Einstellen der Mittelinie

1. Überprüfen Sie den Abstand zwischen der Papiermitte (1) und der Linie (2) auf der Testseite (a). Wenn der Abstand größer als der Bezugswert ist, den Abstand mit dem folgenden Verfahren einstellen.  
<Bezugswert> Innerhalb  $\pm 0,5\text{mm}$ .
2. Aktivieren Sie den Wartungsmodus U034 und wählen Sie [LSU Out Left] > [Cassette5], [Cassette6] oder [Cassette7].

**Italiano**

## Regolazione della linea centrale

1. Controllare lo spazio tra il centro del foglio (1) e la linea (2) dello schema di prova (a). Se lo scostamento supera il valore di riferimento, regolare lo scostamento stesso seguendo questa procedura.  
<Valore di riferimento> Entro  $\pm 0,5\text{mm}$ .
2. Impostare la modalità manutenzione U034 e selezionare [LSU Out Left] > [Cassette5], [Cassette6] o [Cassette7].

**简体中文**

## 中心线调节

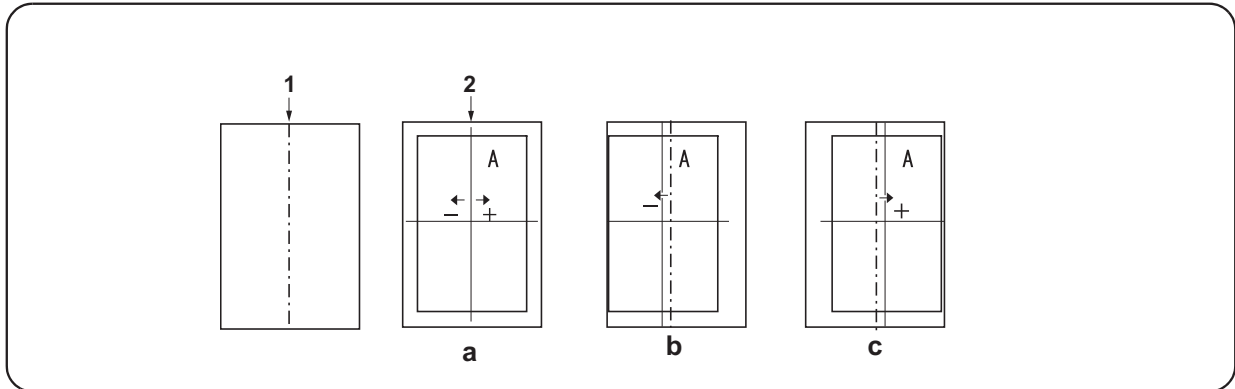
1. 确认纸张的中心(1)和测试样张(a)的线(2)之间的偏移值。如果偏移值超过标准值,则按照下列步骤进行调整。  
<标准值>  $\pm 0.5\text{mm}$  以内
2. 进入维修保养模式 U034, 把 [LSU Out Left] > [Cassette5], [Cassette6] 或 [Cassette7]。

1. < >  $\pm 0.5\text{mm}$
2. U034 [LSU Out Left] > [Cassette5], [Cassette6] [Cassette7]

**日本語**

## センターライン調整

1. 紙のセンター(1)とテストパターン(a)の線(2)のずれを確認する。ずれが基準値外の場合、次の手順で調整をおこなう。  
<基準値>  $\pm 0.5\text{mm}$  以内
2. メンテナンスモード U034 をセットし、[LSU Out Left] > [Cassette5], [Cassette6] または [Cassette7] を選択する。



## 3. Adjust the values.

Test pattern (b) : Increase the setting value.

Test pattern (c) : Decrease the setting value.

Amount of change per step: 0.1mm

## 4. Press the [Start] key to confirm the setting value.

## 5. Print the test pattern.

## 6. Repeat the steps 2 to 5 above until the gap of line (2) in test pattern (a) is within the reference.

<Reference value> within  $\pm 0.5$ mm.

## 3. Régler les valeurs.

Mire d'essai (b) : Augmentez la valeur de réglage.

Mire d'essai (c) : Diminuez la valeur de réglage.

Changement par graduation d'échelle: 0,1mm

## 4. Appuyer sur la touche de [Départ] pour confirmer la valeur de réglage.

## 5. Imprimez le motif de test.

## 6. Répéter les étapes 2 à 5 ci-dessus jusqu'à ce que l'espace de la ligne (2) dans le motif de test (a) soit dans la référence.

<Valeur de référence>  $\pm 0,5$ mm max.

## 3. Ajuste los valores.

Patrón de prueba (b) : Aumente el valor de configuración.

Patrón de prueba (c) : Reduzca el valor de configuración.

Magnitud del cambio por incremento: 0,1mm

## 4. Pulse la tecla de [Inicio] para confirmar el valor de configuración.

## 5. Imprima el patrón de prueba.

## 6. Repita los pasos del 2 al 5 anteriores hasta que el espacio de línea (2) del patrón de prueba (a) esté dentro de los valores de referencia.

<Valor de referencia> dentro de  $\pm 0,5$ mm.

## 3. Die Werte einstellen.

Testmuster (b) : Den Einstellwert erhöhen.

Testmuster (c) : Den Einstellwert verringern.

Änderung pro Schritt: 0,1mm

## 4. Den Einstellwert durch Drücken der [Start]-Taste bestätigen.

## 5. Drucken Sie die Testseite aus.

## 6. Wiederholen Sie die Schritte 2 bis 5 solange, bis der Abstand der Linie (2) auf der Testseite (a) sich innerhalb der Referenz befindet.

<Bezugswert> Innerhalb  $\pm 0,5$ mm.

## 3. Regolare i valori.

Modello di prova (b) : Aumentare il valore dell'impostazione.

Modello di prova (c) : Diminuire il valore dell'impostazione.

Entità modifica per passo: 0,1mm

## 4. Premere il tasto di [Avvio] per confermare il valore dell'impostazione.

## 5. Stampare lo schema di prova.

## 6. Ripetere i punti da 2 a 5 sopra indicati fino a portare lo spazio della linea (2) nello schema di prova (a) all'interno del riferimento.

<Valore di riferimento> entro  $\pm 0,5$ mm

## 3. 調整設定値。

测试图案 (b) : 调高设定值。

测试图案 (c) : 调低设定值。

设定值的一个调整单位变化量 : 0.1mm

## 4. 按 [ 开始 ] 键, 以确定设定值。

## 5. 打印测试图案。

## 6. 重复步骤 2 ~ 5, 直至测试样张 (a) 的线 (2) 的偏移值达到标准值以内。

<标准值>  $\pm 0.5$ mm 以内

## 3.

(b) :

(c) :

1 :0.1mm

## 4. [ / ]

## 5.

## 6. 가 (a) (2) 가

가 2 ~ 5

< >  $\pm 0.5$ mm

## 3. 設定値を調整する。

テストパターン (b) : 設定値を上げる。

テストパターン (c) : 設定値を下げる。

1ステップ当たりの変化量:0.1mm

## 4. [ スタート ] キーを押し、設定値を確定する。

## 5. テストパターンを出力する。

## 6. テストパターン (a) の線 (2) のずれが基準値内になるまで手順 2 ~ 5 を繰り返す。

<基準値>  $\pm 0.5$ mm 以内





2017. 12  
303S05671002

**(3)DF-7110**

# **DF-7110**

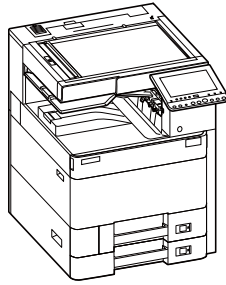
## **(4000 sheet Finisher)**

# **Installation Guide**

**A**

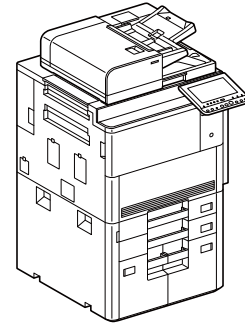
Color MFP  
25/25ppm,32/32ppm,  
35/35ppm,40/40ppm,  
50/50ppm,60/55ppm

Black & White MFP  
40ppm,50ppm,60ppm

**B**

Color MFP  
70/65ppm,80/70ppm

Black & White MFP  
70ppm,80ppm

**English**

A different procedure is required depending on the product which is installed with this unit. Each procedure is described in the following pages.

For installation with a MFP(A), see Page 1 to Page 7, Page 16 to Page 17.

For installation with a MFP(B), see Page 8 to Page 17.

**Français**

Une procédure différente est requise selon le produit qui est installé avec cette unité. Chaque procédure est décrite dans les pages suivantes.

Pour l'installation avec une imprimante multifonction(A), voir Page 1 à Page 7, Page 16 à Page 17.

Pour l'installation avec une imprimante multifonction(B), voir Page 8 à Page 17.

**Español**

El procedimiento es diferente según el producto que se instale con esta unidad. En las siguientes páginas, se describe cada procedimiento.

Para la instalación con un MFP(A), consulte las páginas de la 1 a la 7, páginas de la 16 a la 17.

Para la instalación con un MFP(B), consulte las páginas de la 8 a la 17.

**Deutsch**

Je nach verwendetem Modell ist eine andere Vorgehensweise zur Installation dieses Teils erforderlich. Die unterschiedlichen Vorgehensweisen werden auf den folgenden Seiten erläutert.

Bei Installation an einem MFP(A) siehe Seiten 1 bis 7, Seiten 16 bis 17.

Bei Installation an einem MFP(B) siehe Seiten 8 bis 17.

**Italiano**

Si richiede una procedura diversa in funzione del prodotto su cui è installata l'unità. Le singole procedure sono descritte nelle pagine seguenti.

Per l'installazione con un MFP(A), vedere le pagine da 1 a 7, pagine da 16 a 17.

Per l'installazione con un MFP(B), vedere le pagine da 8 a 17.

**简体中文**

根据安装对象，安装步骤略有不同。各个步骤记载在下面的页面。

安装到 MFP(A) 上时，请参见 P1-P7, P16-P17。

安装到 MFP(B) 上时，请参见 P8-P17。

**한국어**

이 장치에 설치되는 제품에 따라 절차가 다릅니다. 다음 페이지에서 각 절차를 설명합니다.

MFP(A)에 설치하는 경우 1 페이지 ~ 7 페이지, 16 페이지 ~ 17 페이지를 참조하십시오.

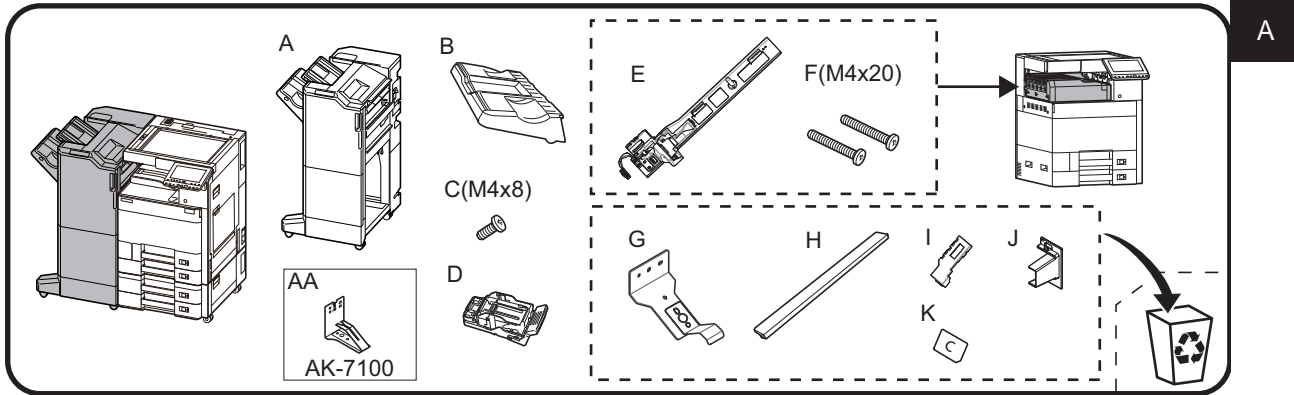
MFP(B)에 설치하는 경우 8 페이지 ~ 17 페이지를 참조하십시오.

**日本語**

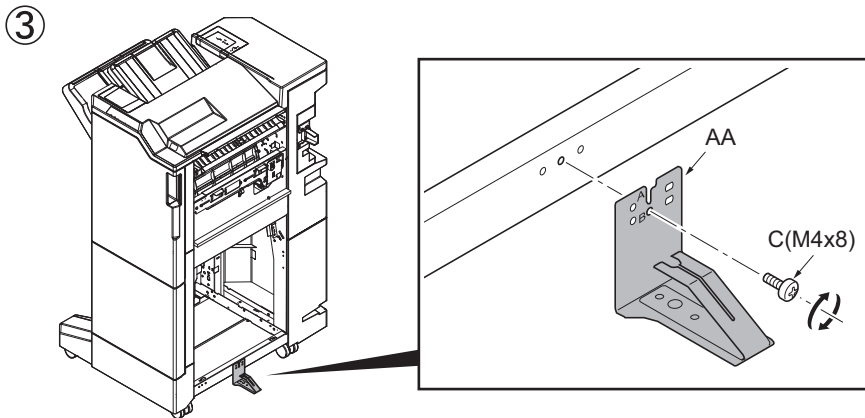
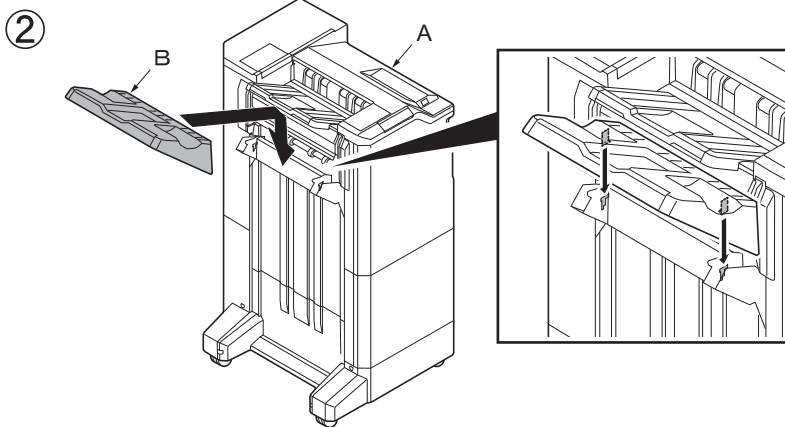
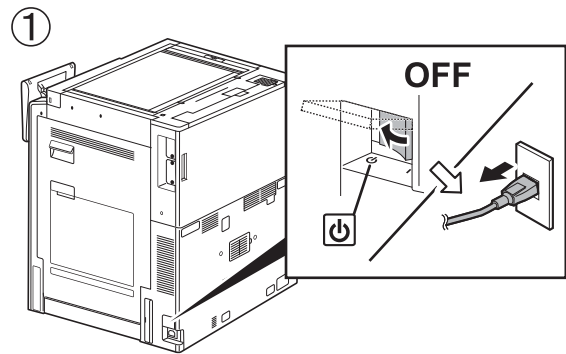
装着する対象によって、取付手順は異なります。それぞれ、以下のページに記載しています。

MFP(A)に設置する場合;1ページ~7ページ,16ページ~17ページ

MFP(B)に設置する場合;8ページ~17ページ



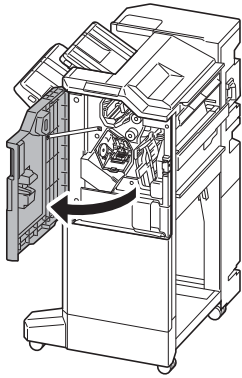
- Ⓔ ENG Be sure to remove any tape and/or cushioning materials from the parts supplied.
- Ⓕ FR Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
- Ⓖ ES Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.
- Ⓗ DE Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.
- Ⓘ IT Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
- Ⓚ CN 如果附属品上带有固定胶带，缓冲材料时必须揭下。
- Ⓛ KO 동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.
- Ⓜ JP 同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。



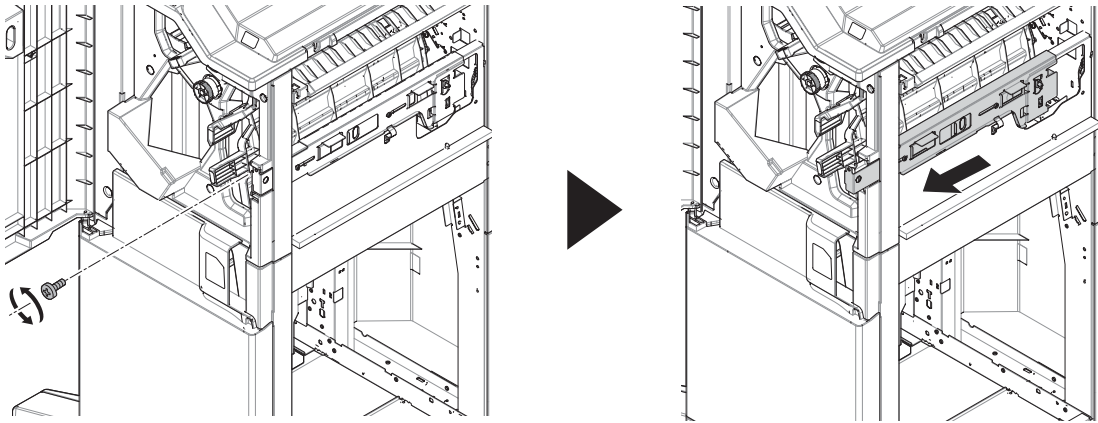


A

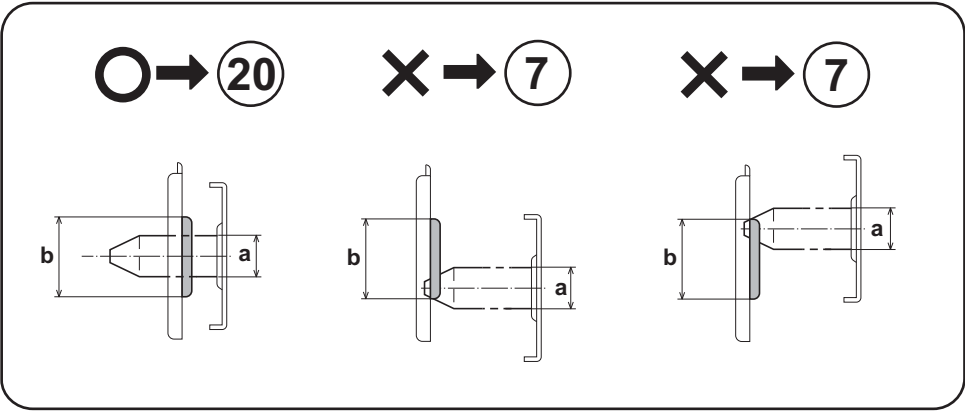
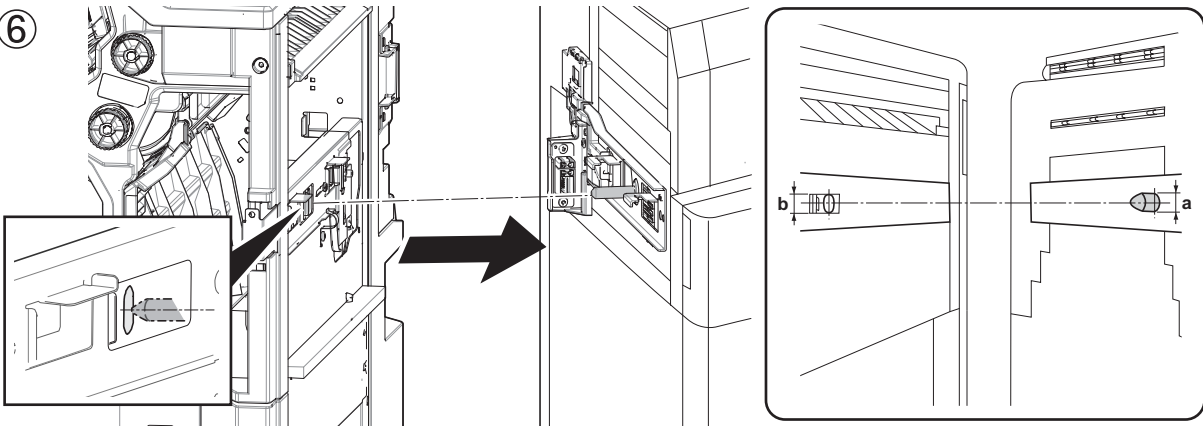
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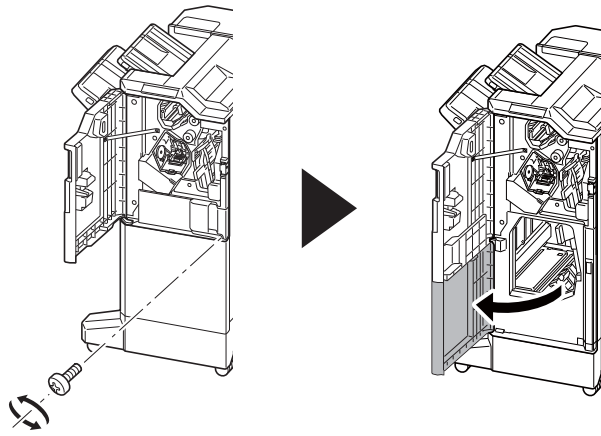
⑤



⑥

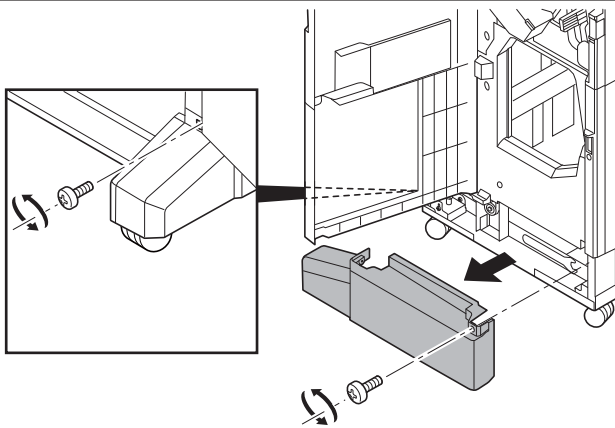


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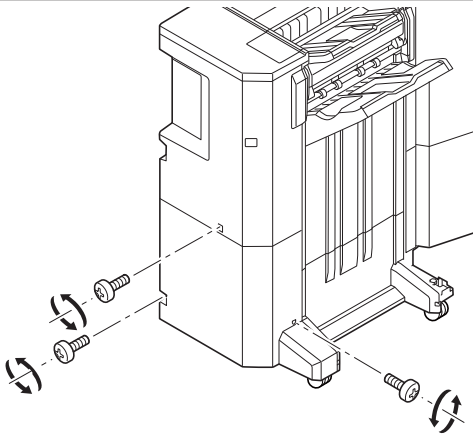


A

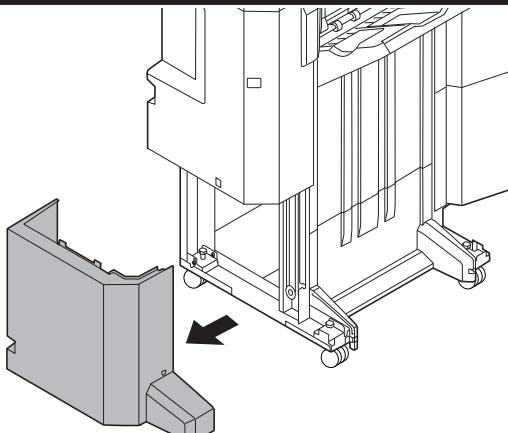
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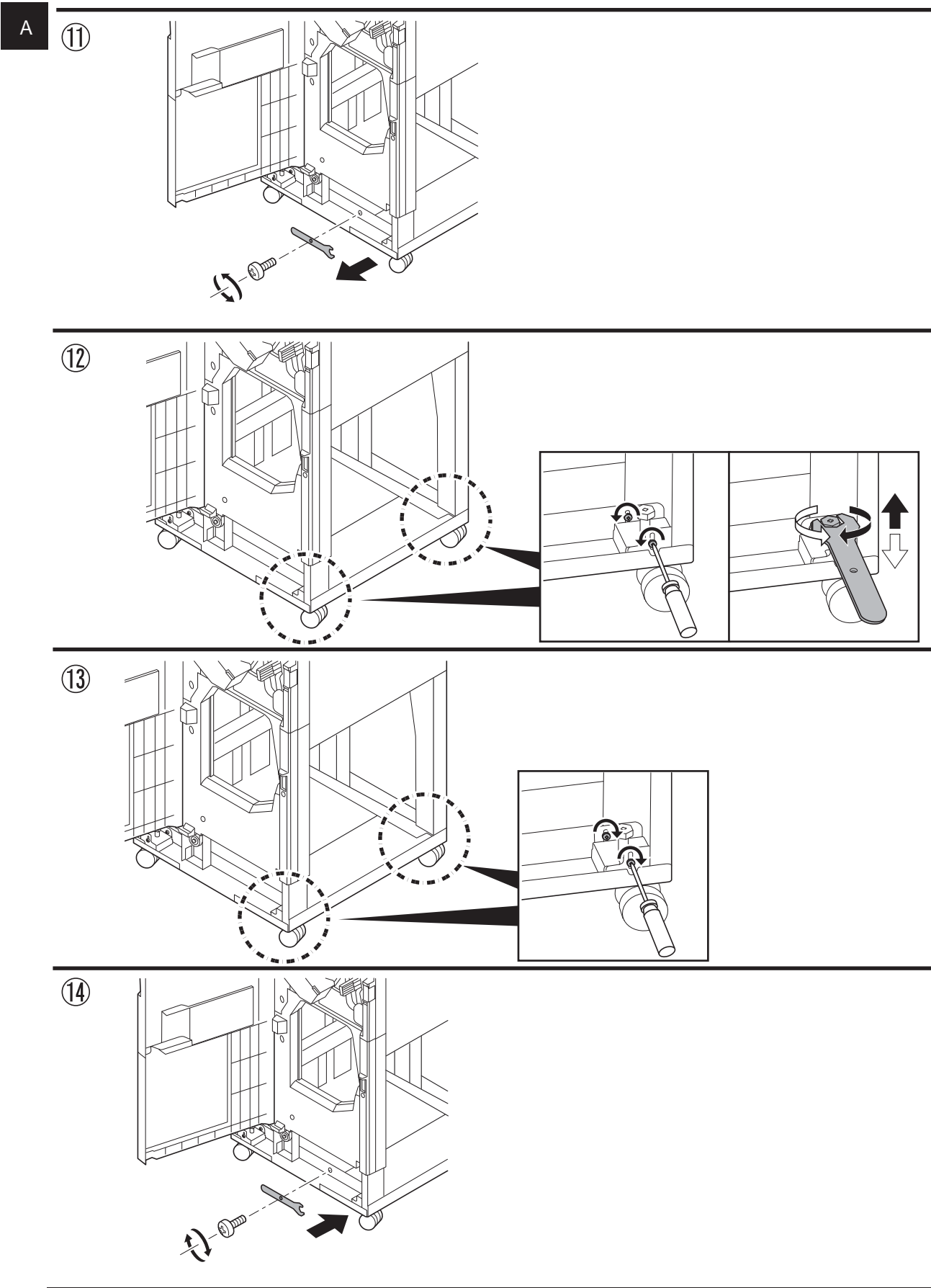


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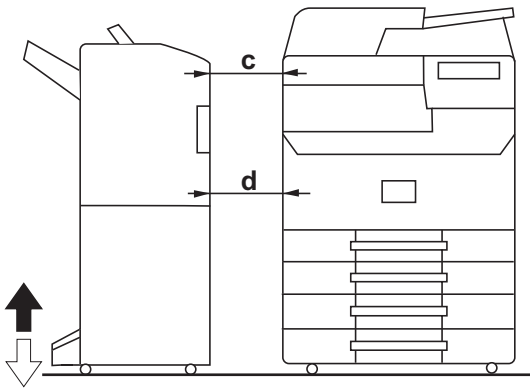
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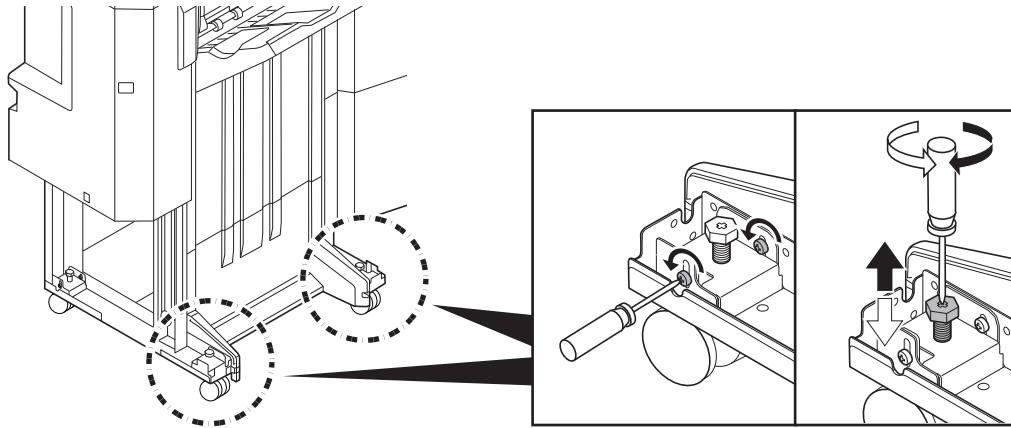
A



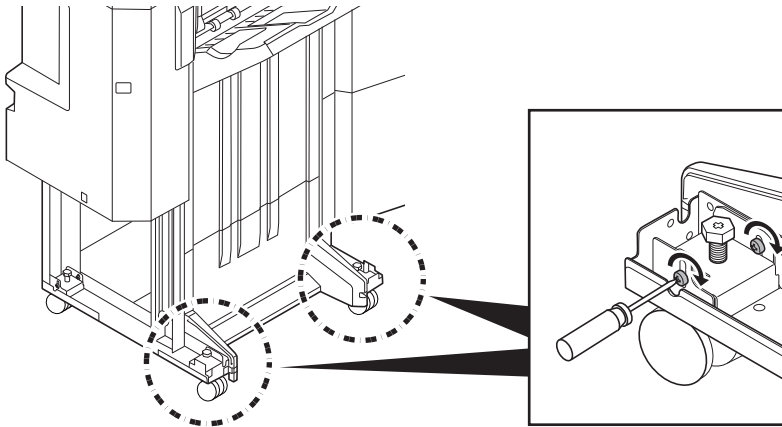
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$c > d, c < d \rightarrow 15$

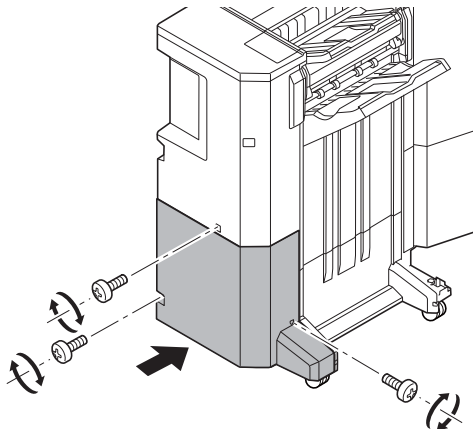
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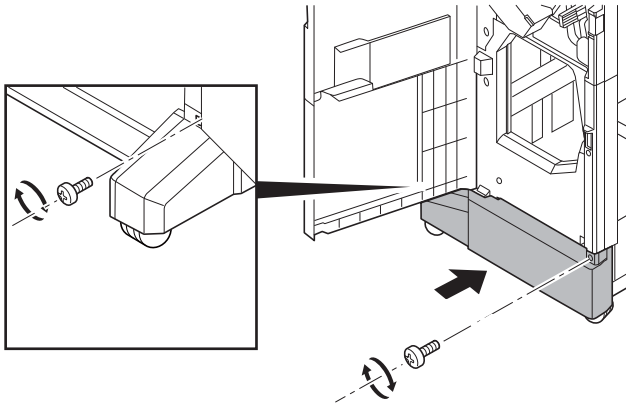


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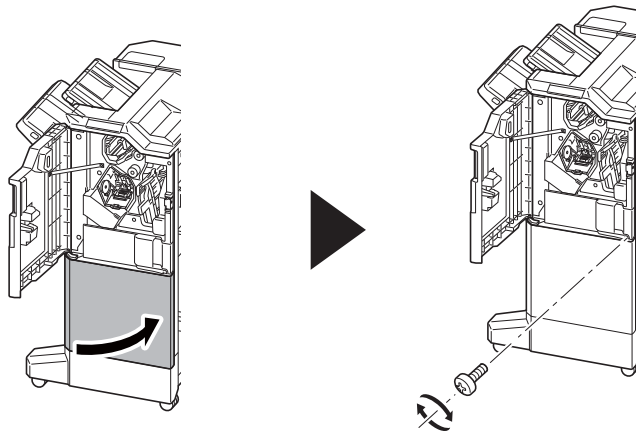


A

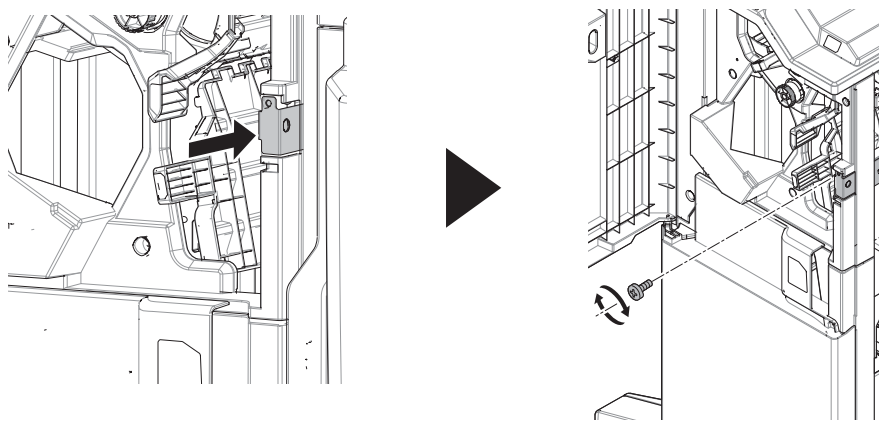
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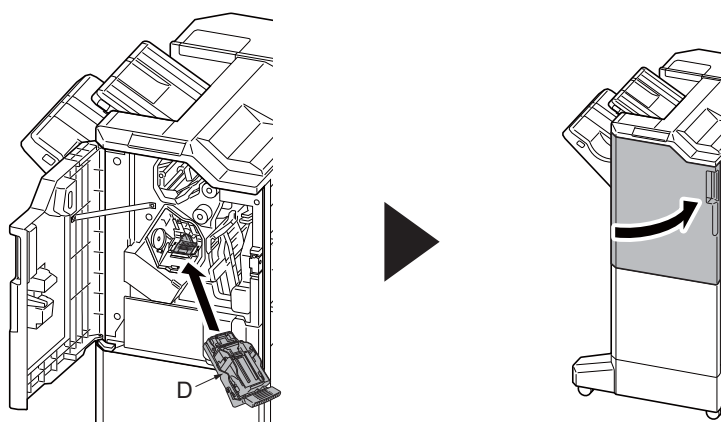
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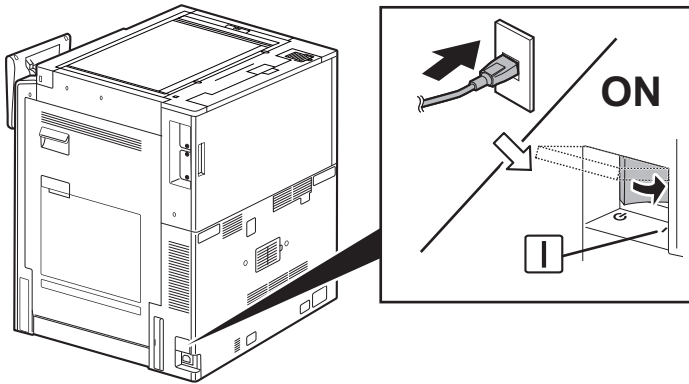
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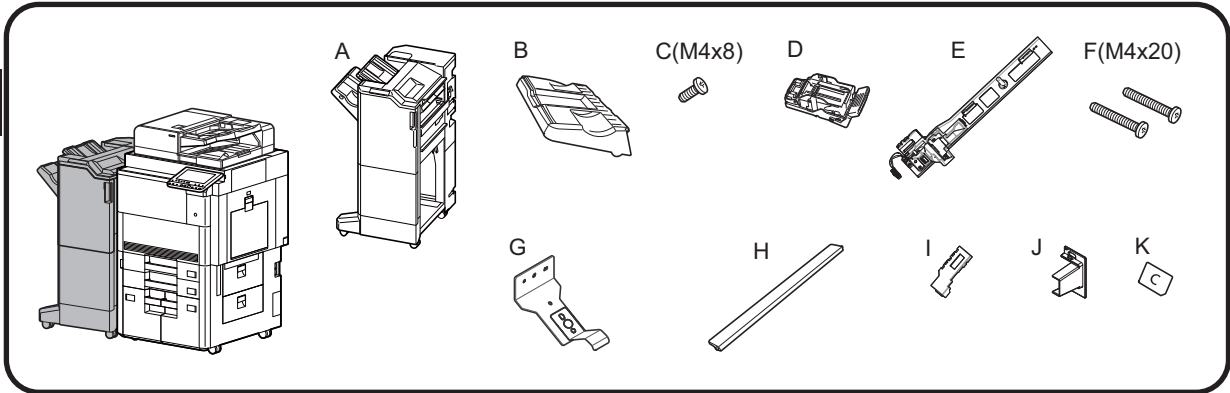


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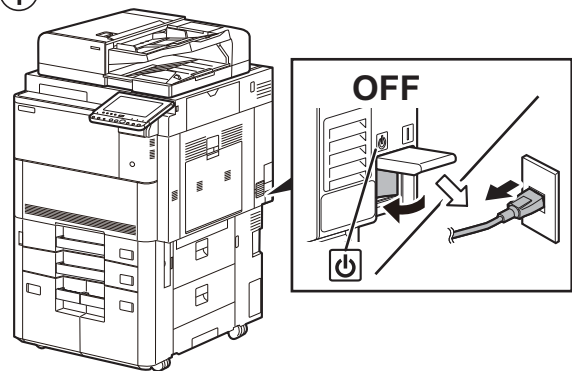
A

B

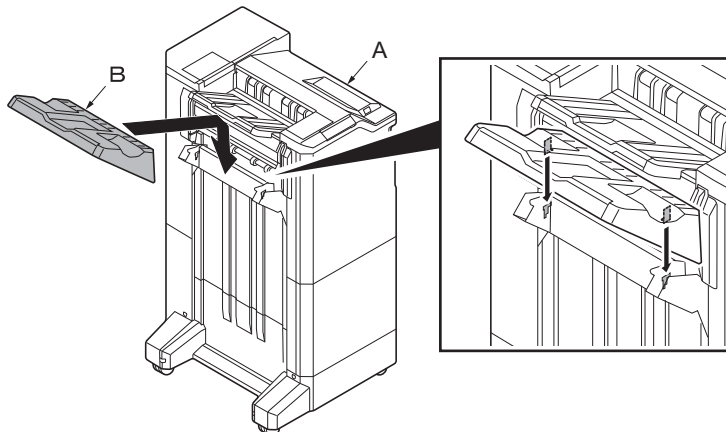


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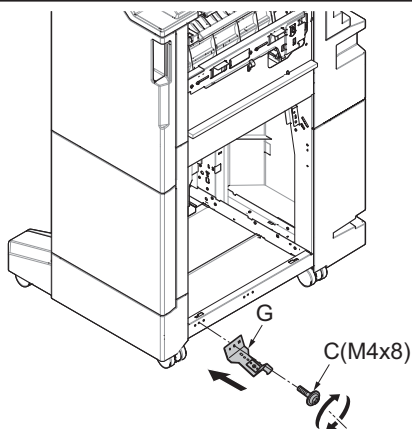
- Ⓜ ENG Be sure to remove any tape and/or cushioning materials from the parts supplied.
- Ⓜ FR Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
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- Ⓜ IT Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
- Ⓜ CN 如果附属品上带有固定胶带, 缓冲材料时务必揭下。
- Ⓜ KO 동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.
- Ⓜ JP 同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。



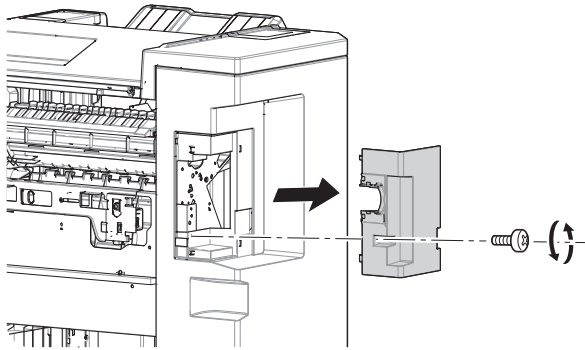
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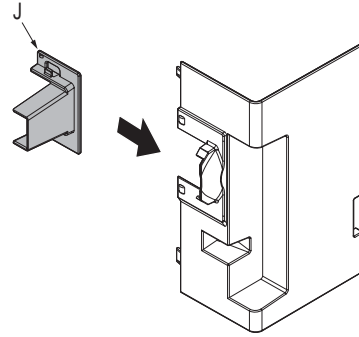
③



④

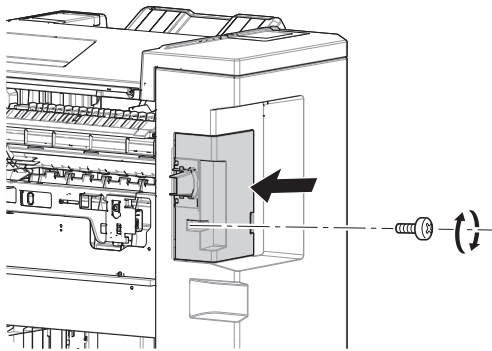


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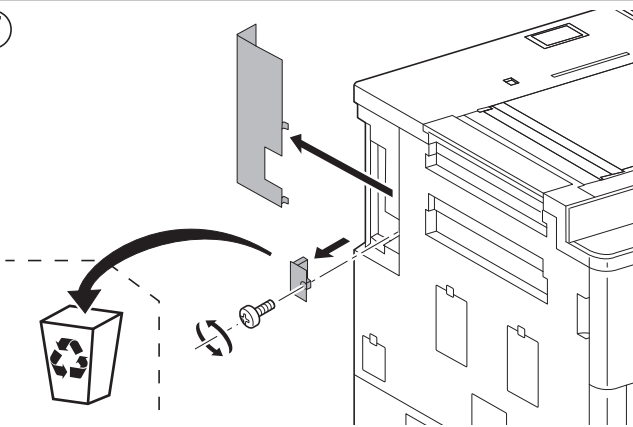


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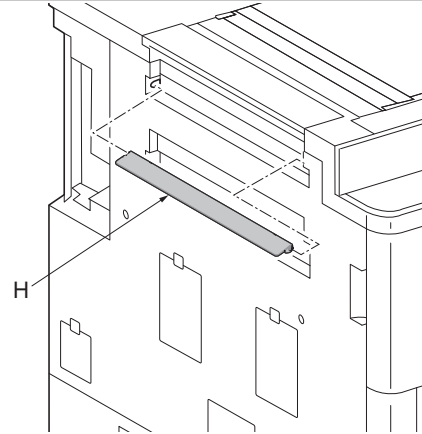
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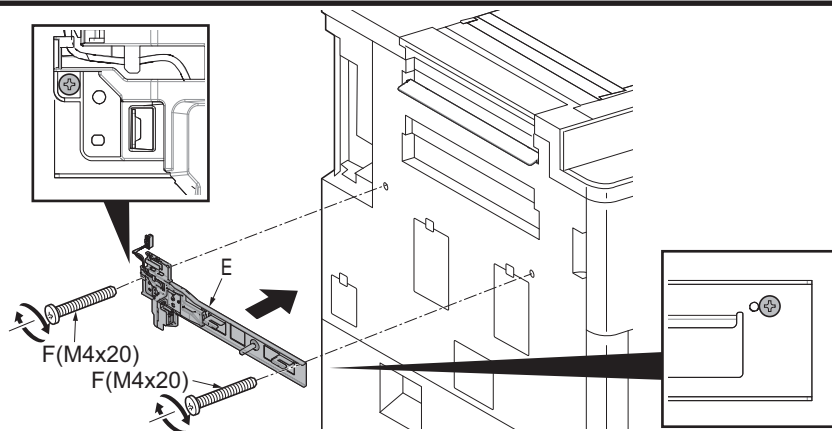
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⑧

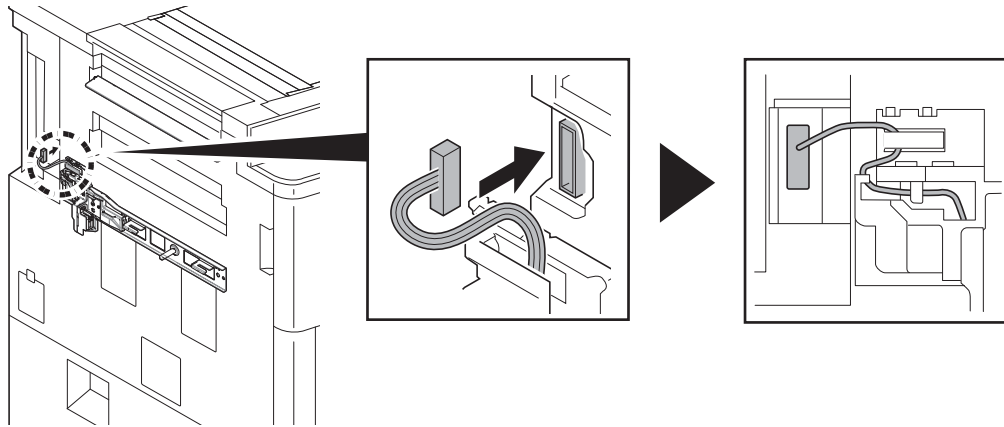


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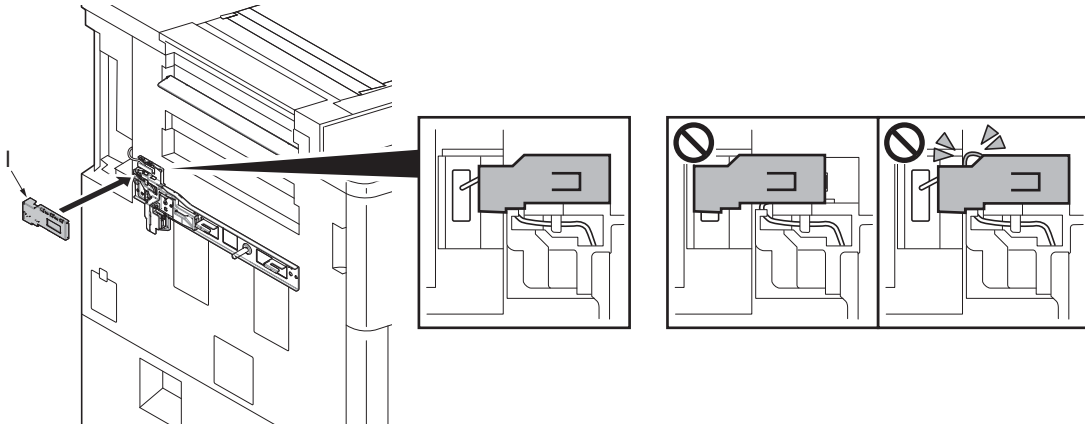


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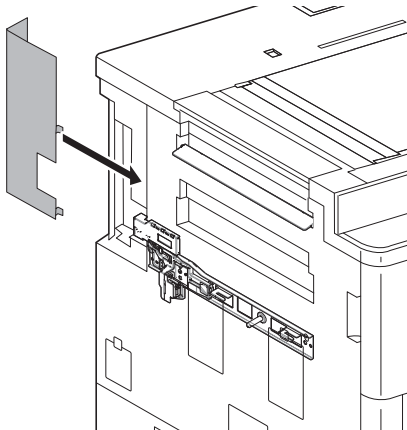
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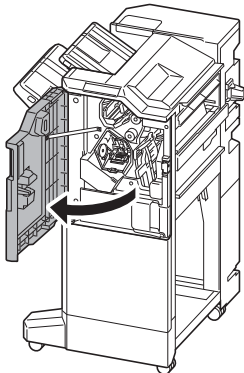
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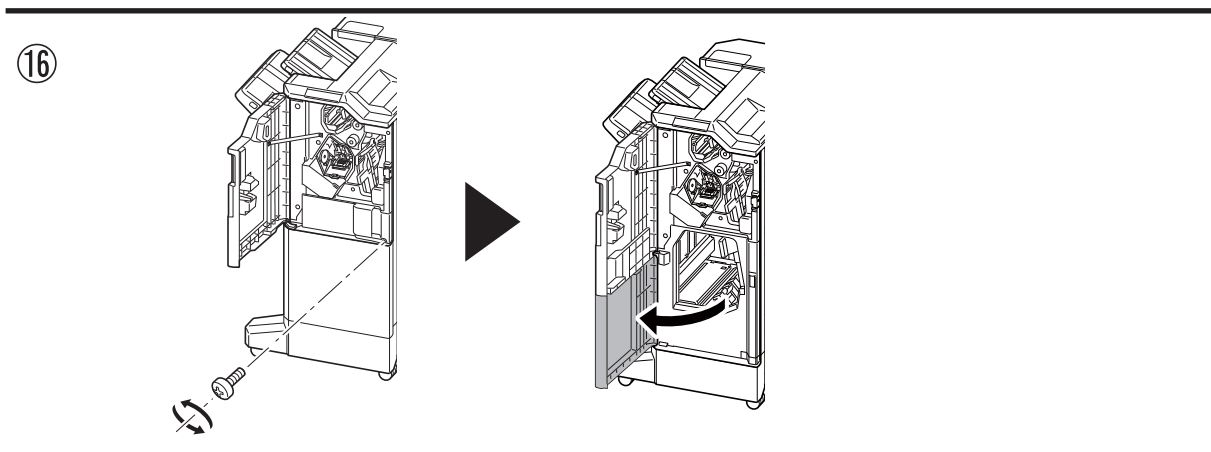
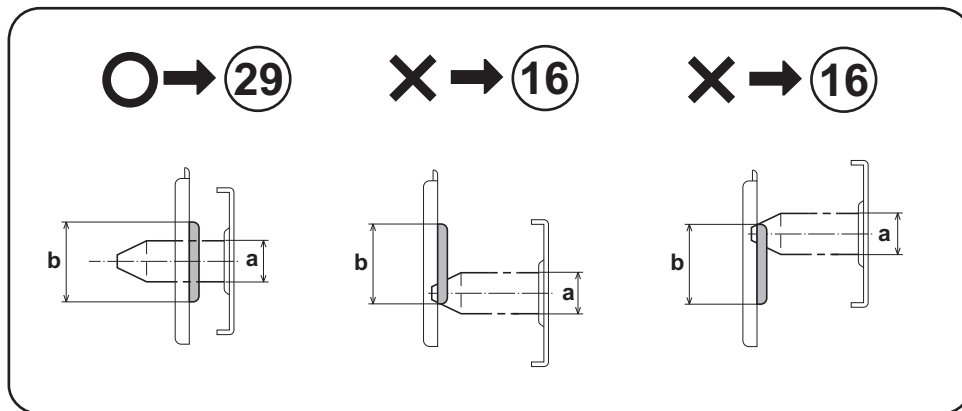
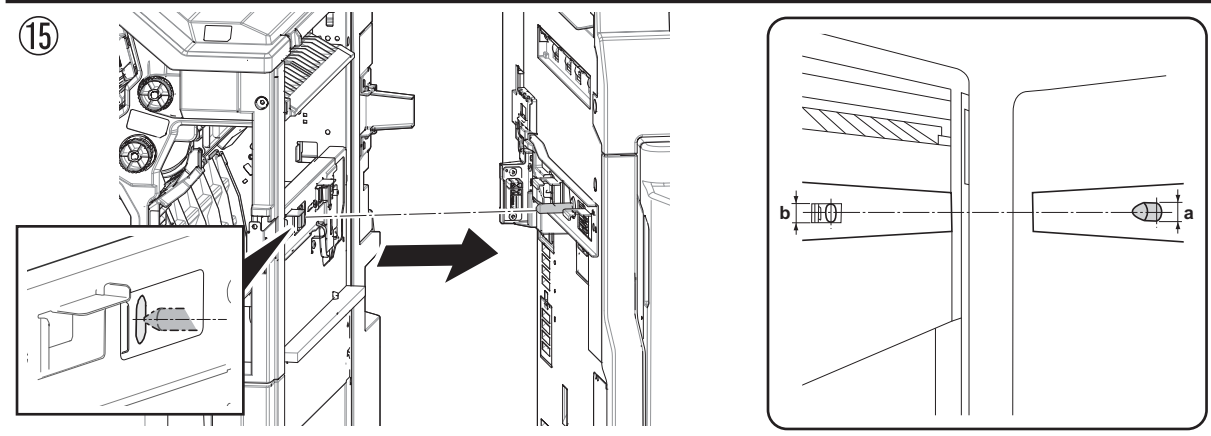
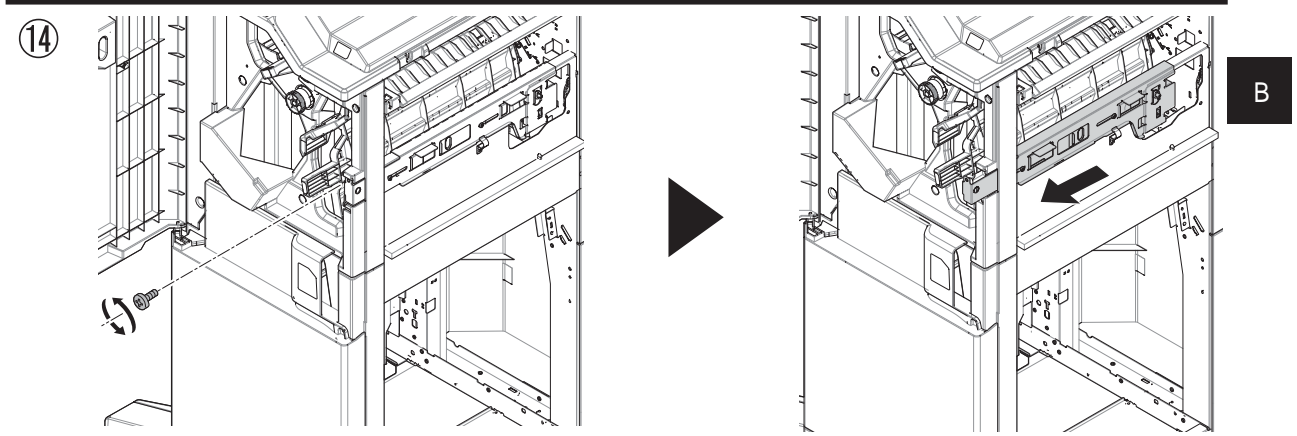


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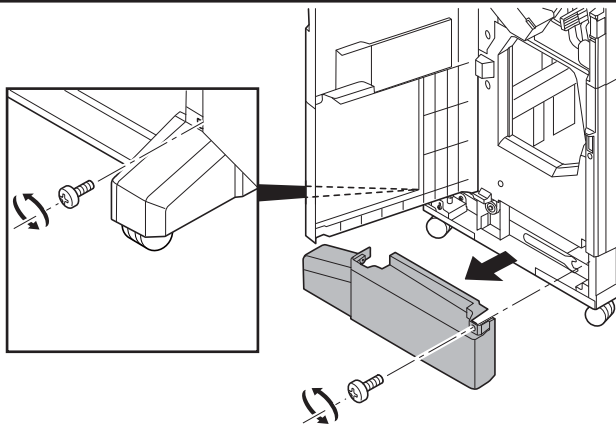
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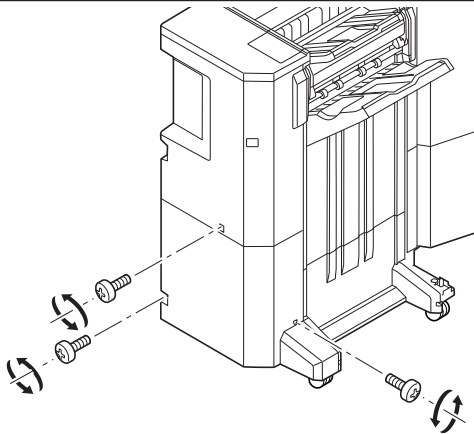


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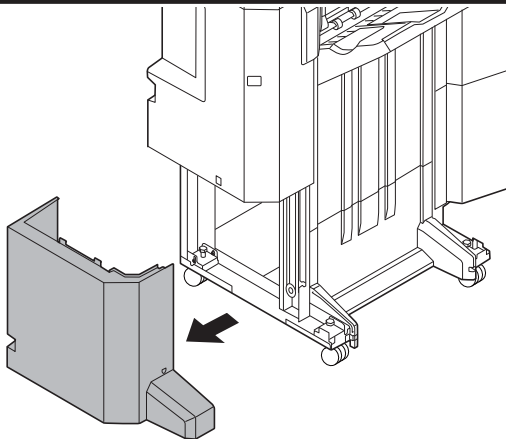
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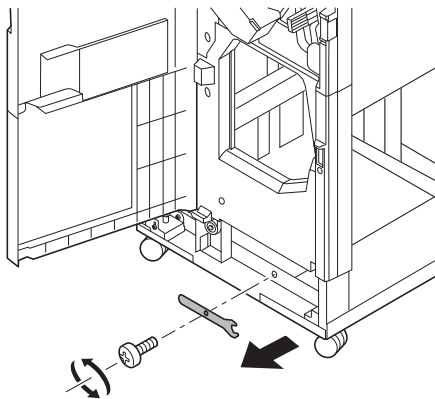
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19

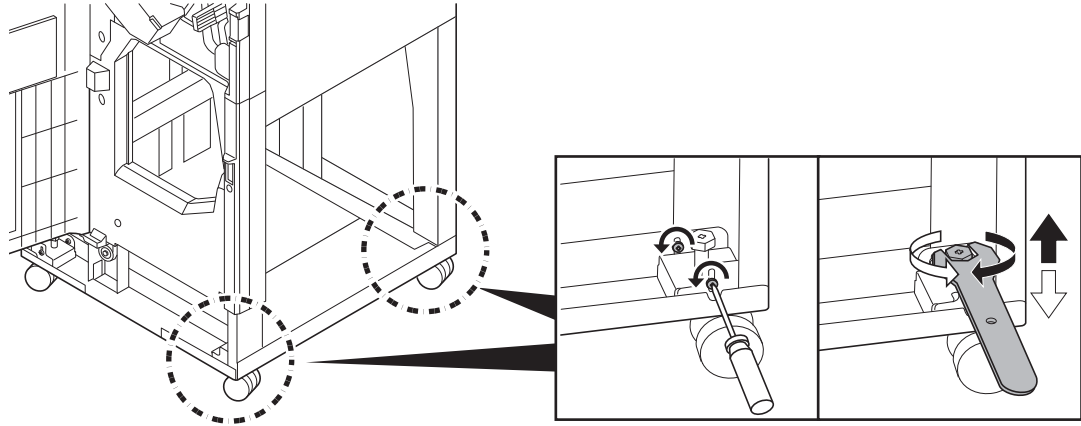


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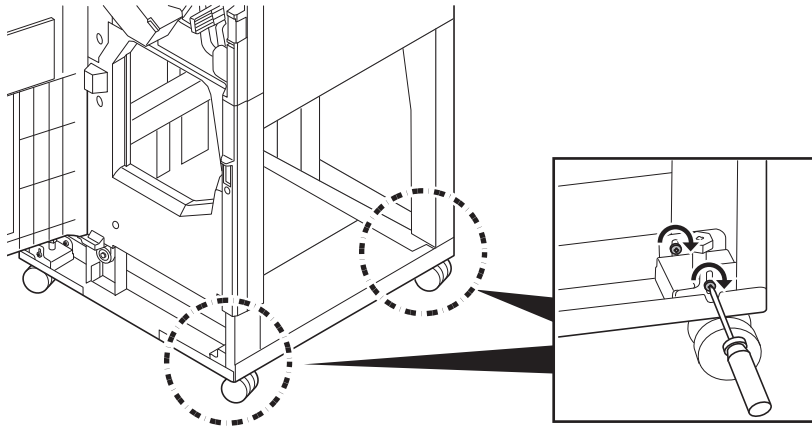


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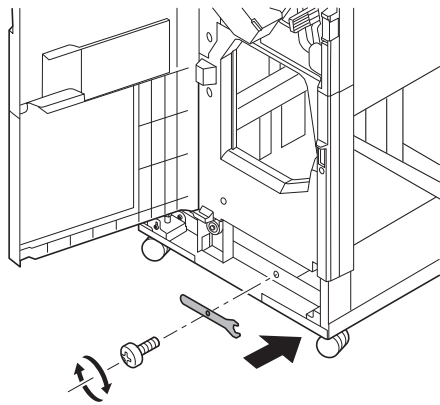


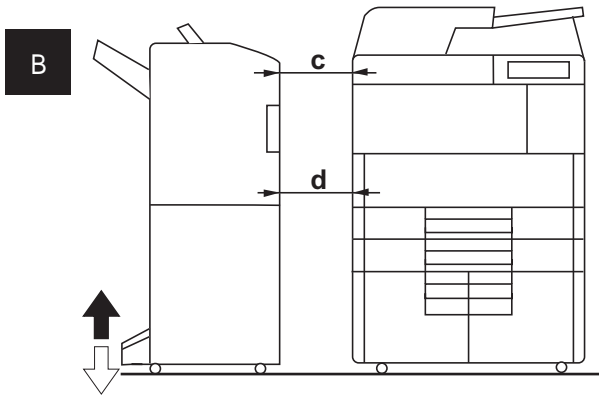
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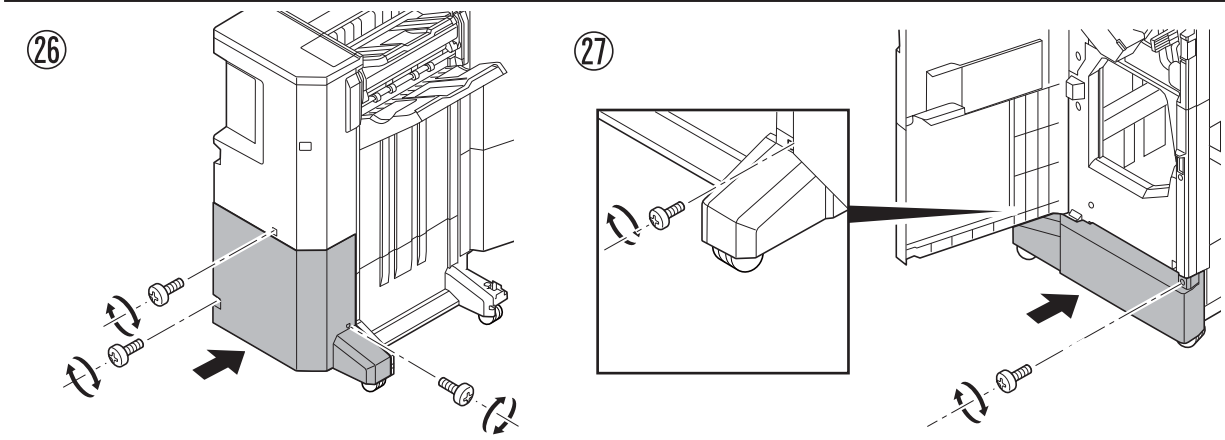
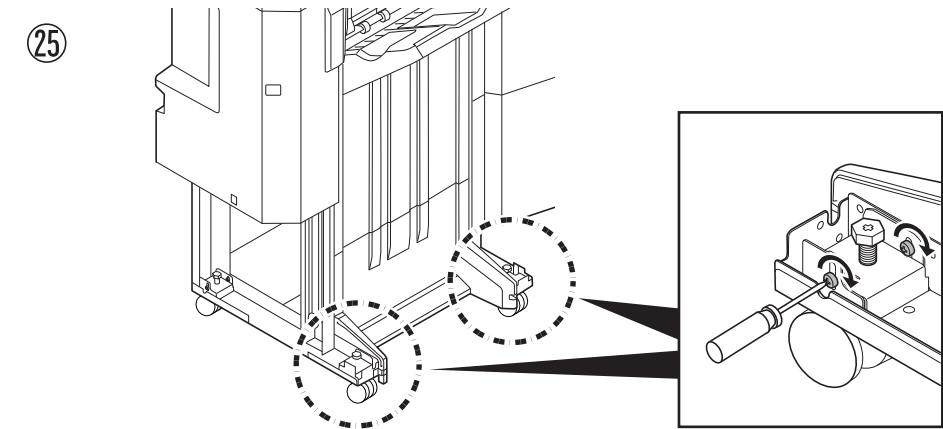
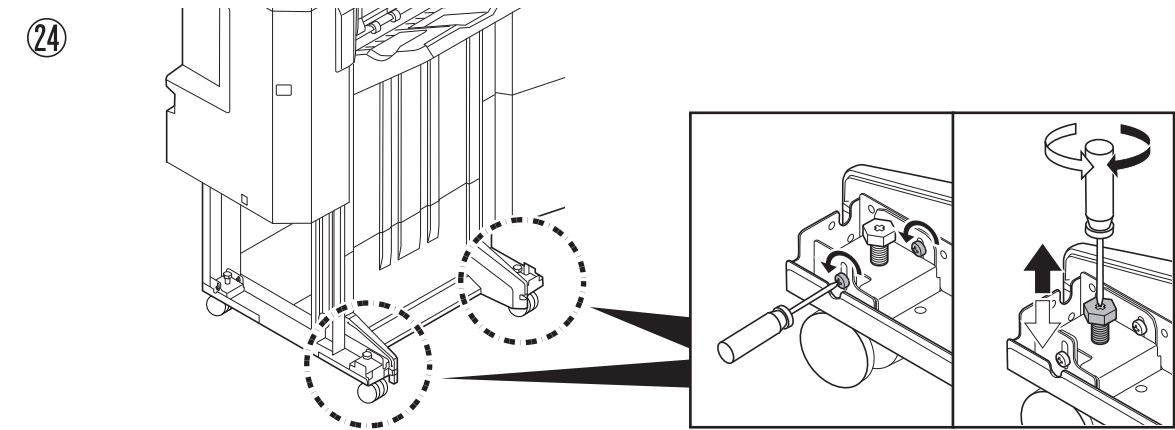
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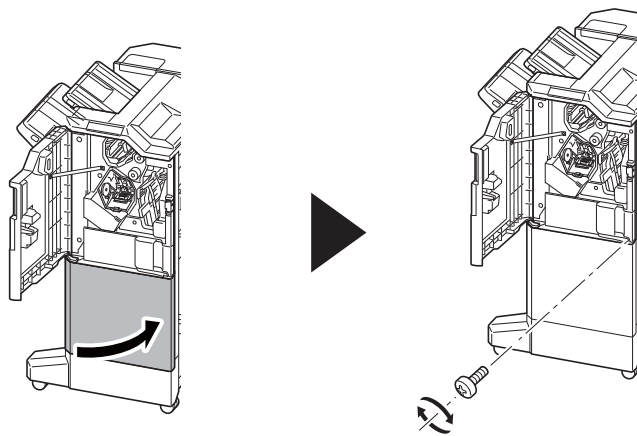


$c = d \rightarrow 26$

$c > d, c < d \rightarrow 24$

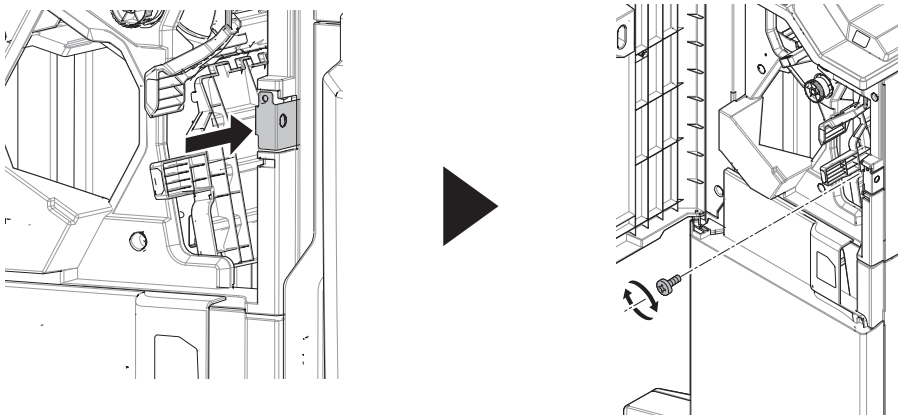


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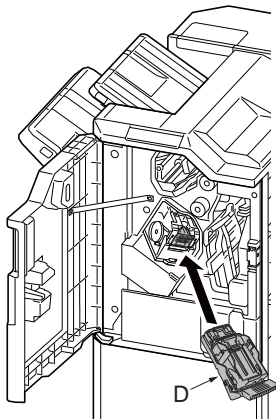


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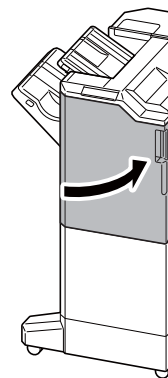
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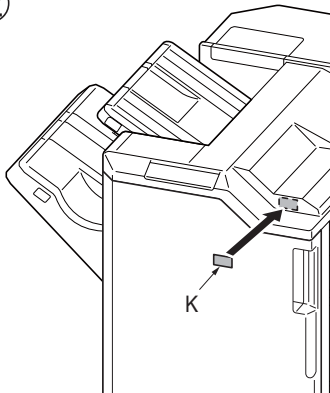
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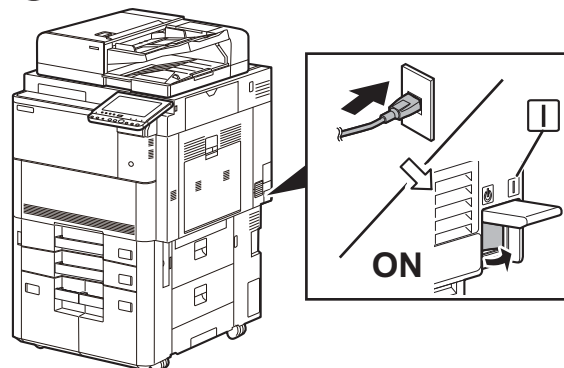
31



32

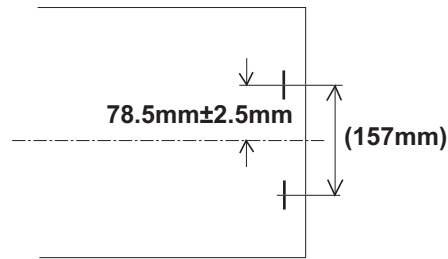


33



A

B

**English**

## Adjusting the stapling position

1. Connect the machine power plug to the wall outlet and turn the machine main power switch on.
2. Make a test copy using staple mode (double stapled).
3. Check whether the stapling position is o -center.If the staple position is o -center, followthe procedure below to adjust the position.  
<Reference value> 78.5 mm ± 2.5 mm from the center of the paper

**Français**

## Ajustement de la position d'agrafage

1. Insérer la fiche d'alimentation de la machine dans la prise murale et mettre la machine sous tension.
2. Procéder à une copie d'essai en mode agrafage (double agrafage).
3. Vérifier que la position d'agrafage n'est pas en décalage. Si la position d'agrafage est décalée, la régler en procédant de la manière suivante.  
<Valeur de référence> 78,5 mm ± 2,5 mm depuis le milieu de la feuille de papier

**Español**

## Ajuste de la posición de grapado

1. Conecte el enchufe de la máquina al receptáculo de pared y encienda el interruptor principal de la máquina.
2. Haga una copia de prueba en el modo de grapado (grapado doble).
3. Compruebe si la posición de grapado está descentrada. Si la posición de grapado está des centrada, realice el siguiente procedimiento para ajustar la posición.  
<Valor de referencia> 78,5 mm ± 2,5 mm del centro del papel

**Deutsch**

## Justage der Heftposition

1. Stecken Sie den Netzstecker des Geräts in die Wandsteckdose und schalten Sie das Gerät am Hauptschalter ein.
2. Erstellen Sie eine Probekopie im Heftmodus (doppelt geheftet).
3. Prüfen Sie, ob die Heftposition außermittig ist. Falls die Heftposition außermittig ist, müssen Sie sie wie folgend einstellen.  
<Bezugswert> 78,5 mm ± 2,5 mm von der Blattmitte

**Italiano**

## Regolazione della posizione di pinzatura

1. Collegare la spina alla presa di corrente a muro e accendere l'interruttore di alimentazione della macchina.
2. Eseguire una copia di prova utilizzando la modalità di spillatura con punti metallici (spillatura doppia).
3. Verificare che la posizione di spillatura non sia fuori centro. Se la posizione di spillatura è fuori centro, seguire la procedura riportata sotto per regolare la posizione.  
<Valore di riferimento> 78,5 mm ± 2,5 mm dal centro del foglio

**简体中文**

## 调节装订位置

1. 将机器上的电源插头插入电源插座中，打开主电源开关。
2. 在装订模式（2点固定）下进行测试复印。
3. 确认装订位置的偏差。装订位置偏离中心时，按以下步骤进行调节。  
<基准值> 距离纸张中心 78.5mm±2.5mm

**한국어**

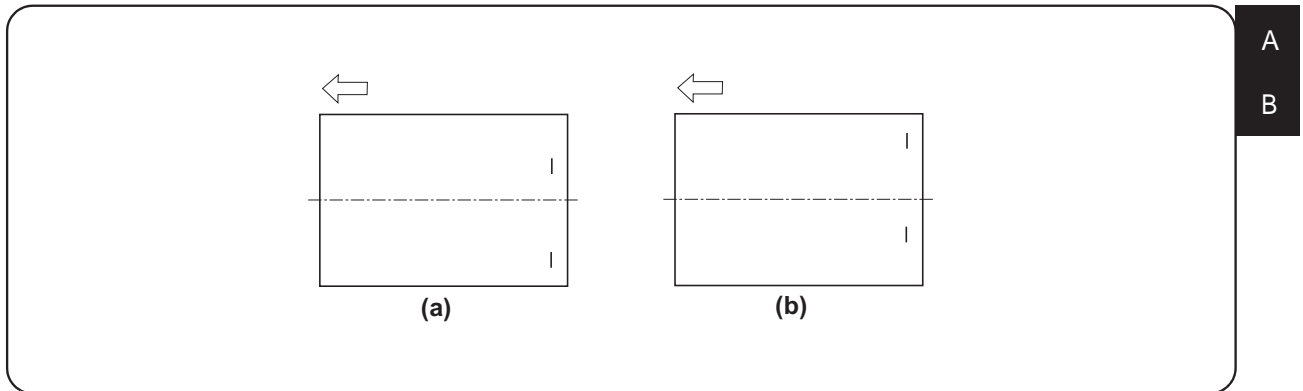
## 스태이플 위치 조정

1. 본체 전원플러그를 콘센트에 꽂고 주 전원 스위치를 ON으로 합니다.
2. 스타이플 모드 (2점) 에서 시험복사를 합니다.
3. 스타이플 위치의 센터 어긋남을 확인합니다. 스타이플 위치가 중심에서 벗어난 경우, 다음 순서로 조정을 합니다.  
<기준치> 용지 센터에서 78.5mm±2.5mm

**日本語**

## ステーブル位置の調整

1. 機械本体の電源プラグをコンセントに差し込み、主電源スイッチをONにする。
2. ステーブルモード(2箇所止め)でテストコピーを行う。
3. ステーブル位置のセンターずれを確認する。ステーブル位置が中心からずれていた場合、次の手順で調整を行う。  
<基準値> 用紙センターより 78.5mm±2.5mm



- |  |  |
|--|--|
| <p>4. Set the maintenance mode U246 and select [Finisher] &gt; [Staple HP].</p> <p>5. Adjust the values.</p> <p>If the paper is stapled too close to the front of the machine (a): Increase the setting value.</p> <p>If the paper is stapled too close to the rear of the machine (b): Decrease the setting value.</p> <p>Amount of change per step: 0.1 mm</p>   | <p>6. Press the [Start] key to confirm the setting value.</p> <p>7. Perform a test copy.</p> <p>8. Repeat steps 4 to 7 until the staple position is within the reference value.</p> <p>&lt;Reference value&gt; 78.5 mm <math>\pm</math> 2.5 mm from the center of the paper</p>  |
| <p>4. Passez en mode maintenance U246 et sélectionnez [Finisher] &gt; [Staple HP].</p> <p>5. Régler les valeurs.</p> <p>Si le papier est agrafé trop près de l'avant de la machine (a): augmenter la valeur de réglage.</p> <p>Si le papier est agrafé trop près de l'arrière de la machine (b): réduire la valeur de réglage.</p> <p>Changement par graduation d'échelle : 0,1 mm</p>   | <p>6. Appuyer sur la touche de [Départ] pour confirmer la valeur de réglage.</p> <p>7. Effectuer une copie de test.</p> <p>8. Recommencer les étapes 4 à 7 jusqu'à ce que la position d'agrafe soit conforme à la valeur de référence.</p> <p>&lt;Valeur de référence&gt; 78,5 mm <math>\pm</math> 2,5 mm depuis le milieu de la feuille de papier</p> |
| <p>4. Configure el modo de mantenimiento U246 y seleccione [Finisher] &gt; [Staple HP].</p> <p>5. Ajuste los valores.</p> <p>Si el grapado del papel se encuentra demasiado cerca del frente de la máquina (a): aumente el valor de configuración.</p> <p>Si el grapado del papel se encuentra demasiado cerca de la parte posterior de la máquina (b): disminuya el valor de configuración.</p> <p>Magnitud del cambio por incremento: 0,1 mm</p> | <p>6. Pulse la tecla de [Inicio] para confirmar el valor de configuración.</p> <p>7. Haga una copia de prueba.</p> <p>8. Repita los pasos 4 a 7 hasta que la posición de grapado se encuentre dentro del valor de referencia.</p> <p>&lt;Valor de referencia&gt; 78,5 mm <math>\pm</math> 2,5 mm del centro del papel</p>                              |
| <p>4. Aktivieren Sie den Wartungsmodus U246 und wählen Sie [Finisher] &gt; [Staple HP].</p> <p>5. Die Werte einstellen.</p> <p>Falls das Papier zu nahe am vorderen Rand des Geräts (a) abgestapelt wird: Vergrößern Sie den Stellwert.</p> <p>Falls das Papier zu nahe am hinteren Rand des Geräts (b) abgestapelt wird: Verkleinern Sie den Stellwert.</p> <p>Änderung pro Schritt: 0,1 mm</p>   | <p>6. Den Einstellwert durch Drücken der [Start]-Taste bestätigen.</p> <p>7. Eine Testkopie erstellen.</p> <p>8. Wiederholen Sie die Schritte 4 bis 7, bis die Heftposition im Bereich des Bezugswerts liegt.</p> <p>&lt;Bezugswert&gt; 78,5 mm <math>\pm</math> 2,5 mm von der Blattmitte</p>   |
| <p>4. Impostare la modalità manutenzione U246, quindi selezionare [Finisher] &gt; [Staple HP].</p> <p>5. Regolare i valori.</p> <p>Se il foglio viene spillato troppo vicino alla parte anteriore della macchina (a): Aumentare il valore di impostazione.</p> <p>Se il foglio viene spillato troppo vicino alla parte posteriore della macchina (b): Diminuire il valore di impostazione.</p> <p>Entità modifica per passo: 0,1 mm</p>            | <p>6. Premere il tasto di [Avvio] per confermare il valore dell'impostazione.</p> <p>7. Eseguire una copia di prova.</p> <p>8. Ripetere i passi 4 to 7 finché la posizione di spillatura risulta all'interno del valore di riferimento.</p> <p>&lt;Valore di riferimento&gt; 78,5 mm <math>\pm</math> 2,5 mm dal centro del foglio</p>                 |
| <p>4. 进入维修保养模式 U246, 把 [Finisher]&gt;[Staple HP]。</p> <p>5. 调整设定值。</p> <p>装订位置向机器前部偏移时 (a) : 调高设定值。</p> <p>装订位置向机器后部偏移时 (b) : 调低设定值。</p> <p>设定值的一个调整单位变化量 : 0.1mm</p>  | <p>6. 按 [开始] 键, 以确定设定值。</p> <p>7. 进行测试复印。</p> <p>8. 重复步骤 4 ~ 7, 直到装订位置在基准范围内为止。</p> <p>&lt;基准值&gt; 距离纸张中心 78.5mm<math>\pm</math>2.5mm</p>  |
| <p>4. 메인テナンス 모드 U246 을 설정하고 [Finisher] &gt; [Staple HP] 를 선택합니다.</p> <p>5. 설정치를 조정합니다.</p> <p>스테이플 위치가 기기앞측으로 벗어난 경우 (a): 설정치를 높입니다.</p> <p>스테이플 위치가 기기뒷측으로 벗어난 경우 (b): 설정치를 낮춥니다.</p> <p>1 스텝당 변화량: 0.1mm</p>   | <p>6. [ 복사 / 시작 ] 키를 누르고 설정치를 확인합니다.</p> <p>7. 시험복사를 합니다.</p> <p>8. 스테이플 위치가 기준치내가 될 때까지 순서 4 ~ 7 을 반복합니다.</p> <p>&lt; 기준치 &gt; 용지 센터에서 78.5mm<math>\pm</math>2.5mm</p>  |
| <p>4. メンテナンスモード U246 をセットし、[Finisher] &gt; [Staple HP] を選択する。</p> <p>5. 設定値を調整する。</p> <p>ステーブル位置が機械前側にずれている場合 (a) : 設定値を上げる。</p> <p>ステーブル位置が機械後側にずれている場合 (b) : 設定値を下げる。</p> <p>1 ステップ当たりの変化量: 0.1mm</p>  | <p>6. [ スタート ] キーを押し、設定値を確定する。</p> <p>7. テストコピーを行う。</p> <p>8. ステーブル位置が基準値内になるまで、手順 4 ~ 7 を繰り返す。</p> <p>&lt; 基準値 &gt; 用紙センターより 78.5mm<math>\pm</math>2.5mm</p>  |



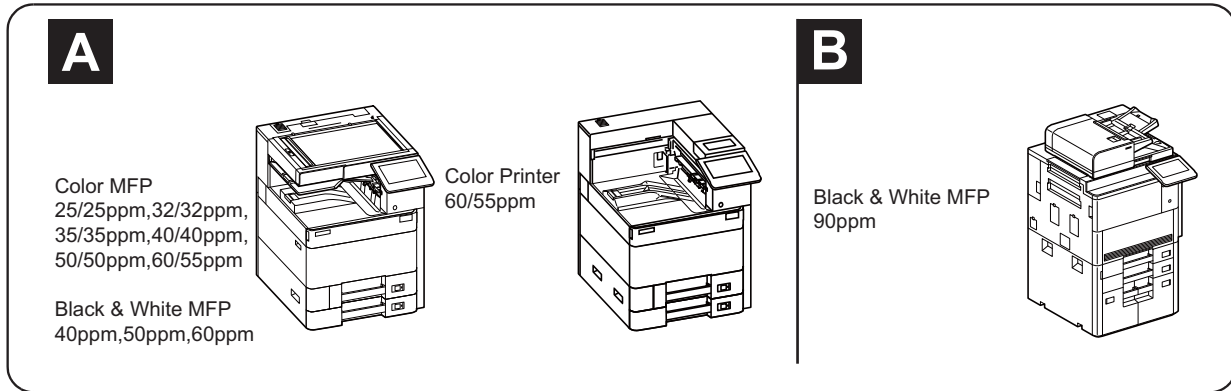
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**(4)DF-7130**

# **DF-7130**

## **(100-sheet staple finisher) Installation Guide**



(EN)

A different procedure is required depending on the product which is installed with this unit. Each procedure is described in the following pages.  
For installation with a MFP(A), see Page 1 to Page 7.  
For installation with a MFP(B), see Page 8 to Page 16.

(FR)

Une procédure différente est requise selon le produit qui est installé avec cette unité. Chaque procédure est décrite dans les pages suivantes.  
Pour l'installation avec une imprimante multifonction(A), voir Page 1 à Page 7.  
Pour l'installation avec une imprimante multifonction(B), voir Page 8 à Page 16.

(ES)

El procedimiento es diferente según el producto que se instala con esta unidad. En las siguientes páginas, se describe cada procedimiento.  
Para la instalación con un MFP(A), consulte las páginas de la 1 a la 7.  
Para la instalación con un MFP(B), consulte las páginas de la 8 a la 16.

(DE)

Je nach verwendetem Modell ist eine andere Vorgehensweise zur Installation dieses Teils erforderlich. Die unterschiedlichen Vorgehensweisen werden auf den folgenden Seiten erläutert.  
Bei Installation an einem MFP(A) siehe Seiten 1 bis 7.  
Bei Installation an einem MFP(B) siehe Seiten 8 bis 16.

(IT)

Si richiede una procedura diversa in funzione del prodotto su cui è installata l'unità. Le singole procedure sono descritte nelle pagine seguenti.  
Per l'installazione con un MFP(A), vedere le pagine da 1 a 7.  
Per l'installazione con un MFP(B), vedere le pagine da 8 a 16.

(ZHCN)

根据安装对象，安装步骤略有不同。各个步骤记载在下面的页面。  
安装到 MFP(A) 上时，请参见 P1-P7。  
安装到 MFP(B) 上时，请参见 P8-P16。

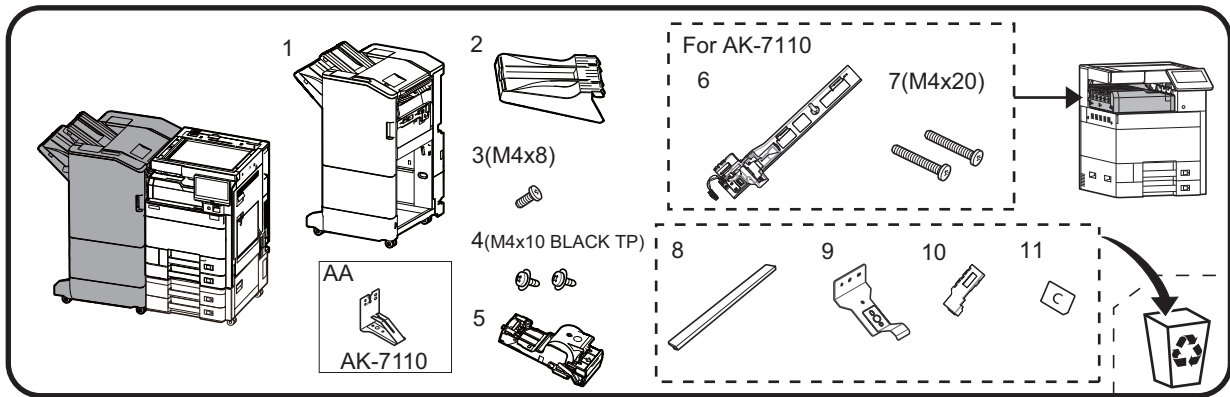
(KO)

이 장치에 설치되는 제품에 따라 절차가 다릅니다. 다음 페이지에서 각 절차를 설명합니다.  
MFP(A) 에 설치하는 경우 1 페이지 ~7 페이지를 참조하십시오.  
MFP(B) 에 설치하는 경우 8 페이지 ~16 페이지를 참조하십시오.

(JA)

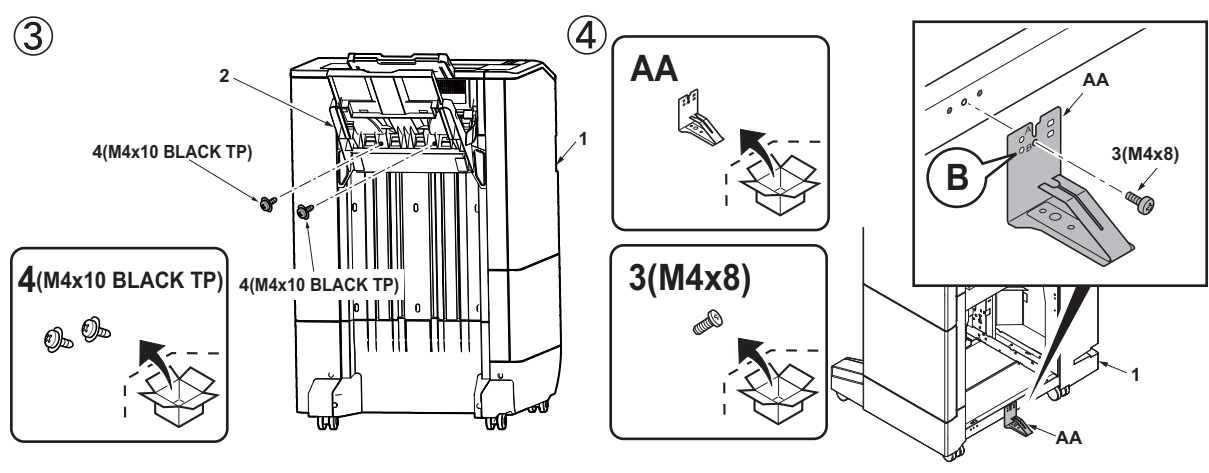
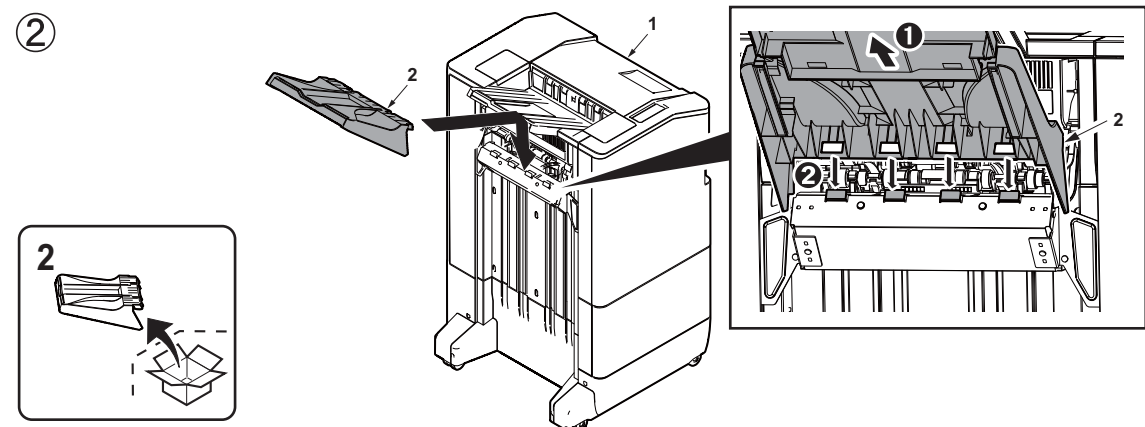
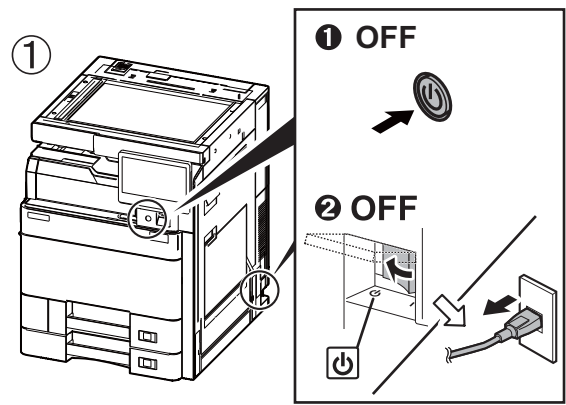
装着する対象によって、取付手順は異なります。それぞれ、以下のページに記載しています。  
MFP(A) に設置する場合;1 ページ～7 ページ  
MFP(B) に設置する場合;8 ページ～16 ページ





A

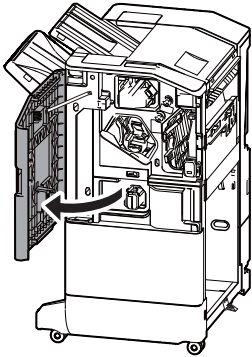
- (EN) Be sure to remove any tape and/or cushioning materials from the parts supplied.
- (FR) Veillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
- (ES) Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.
- (DE) Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.
- (IT) Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
- (ZHCN) 如果附属品上带有固定胶带、缓冲材料时, 请务必揭下。
- (KO) 동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.
- (JA) 同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。



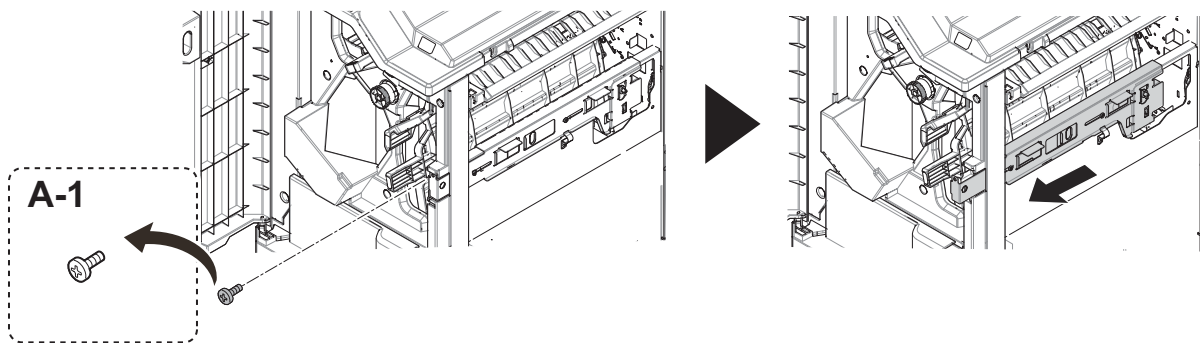
1

A

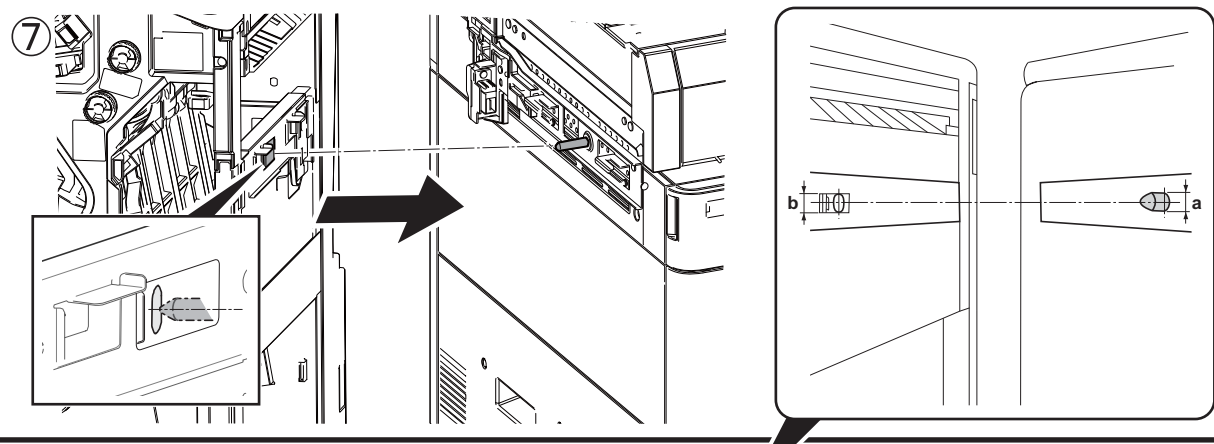
⑤



⑥



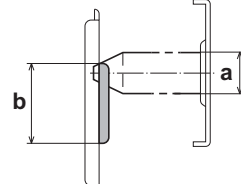
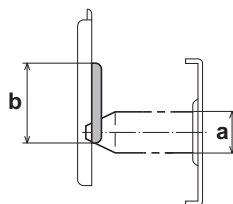
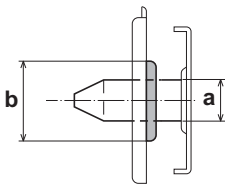
⑦



OK → ⑳

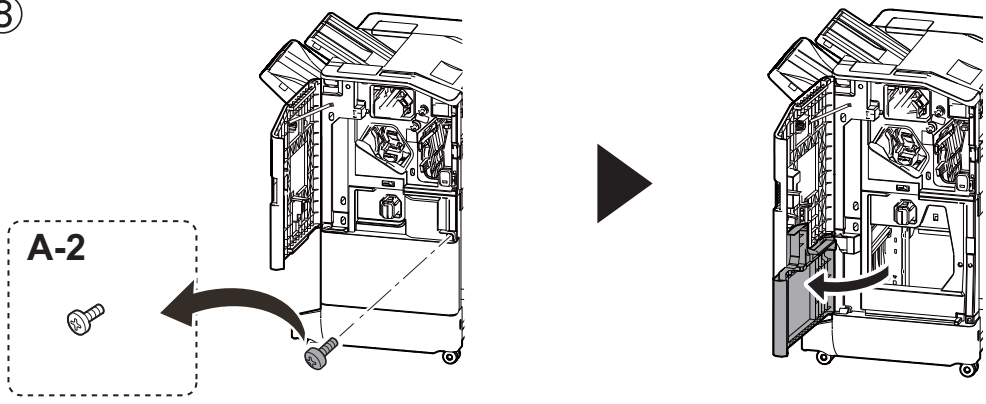
NG → ⑧

NG → ⑧

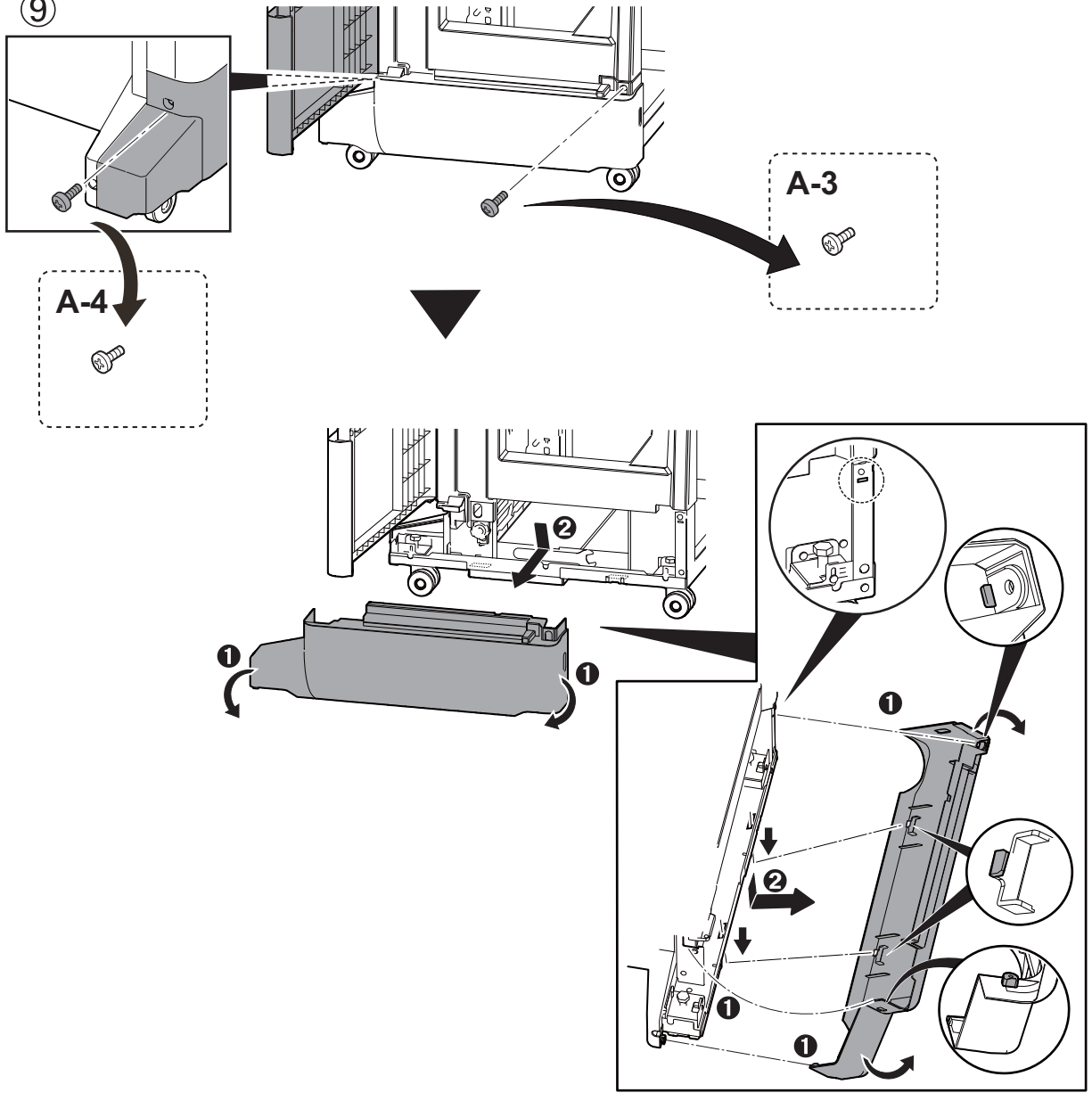


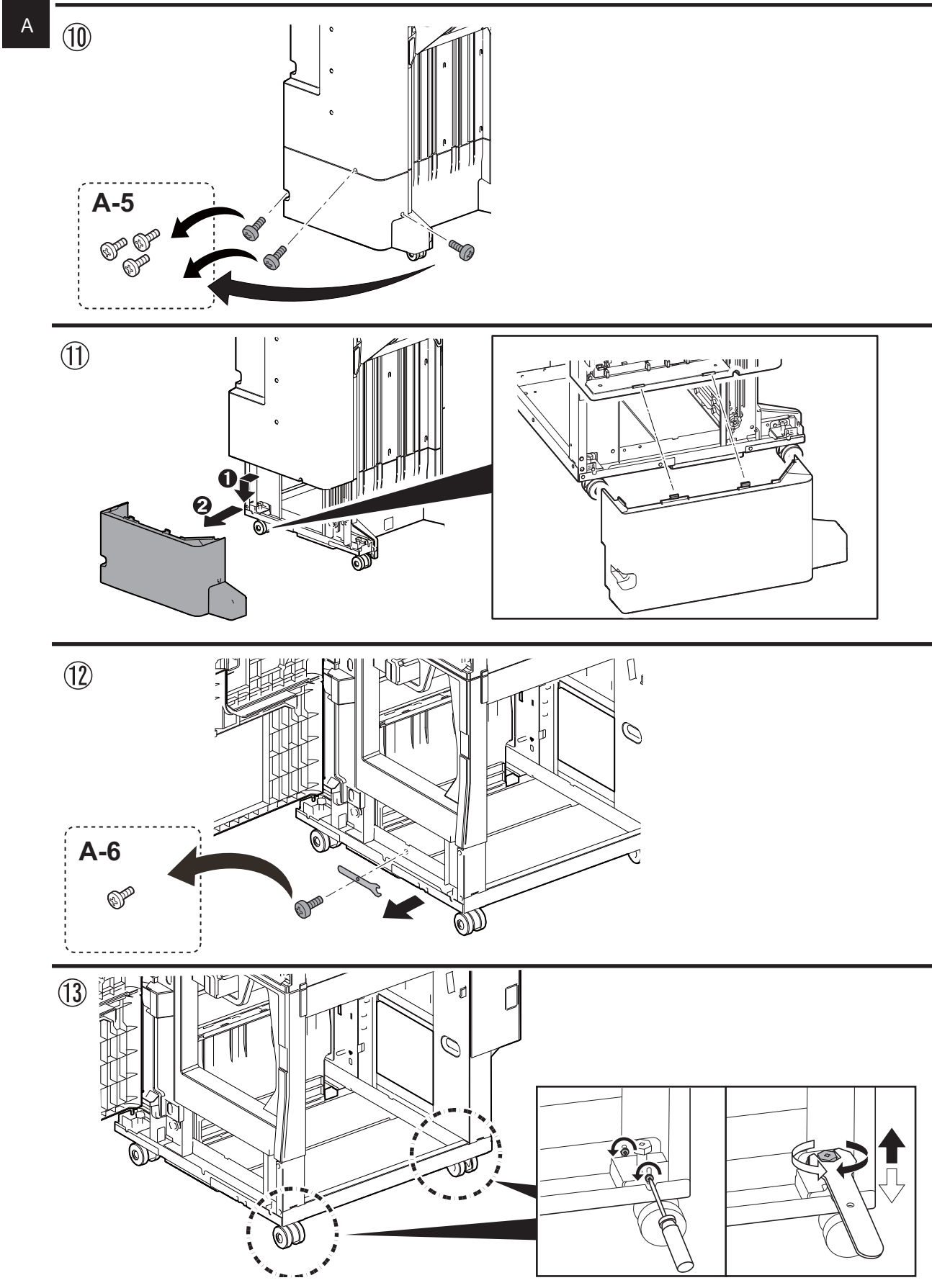
8

A



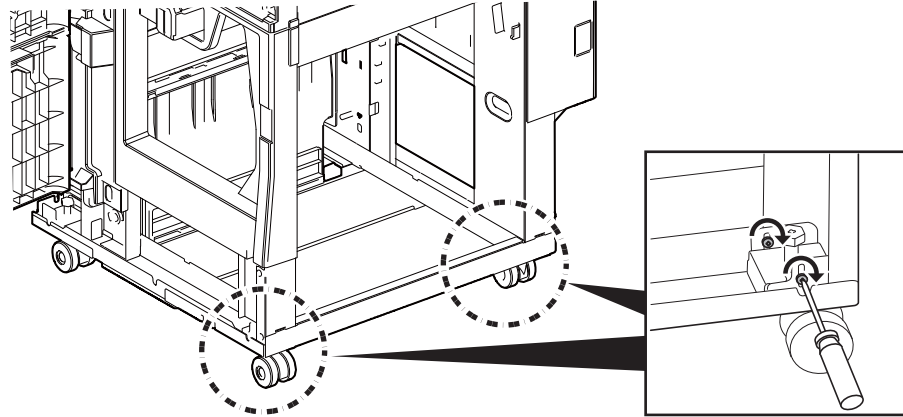
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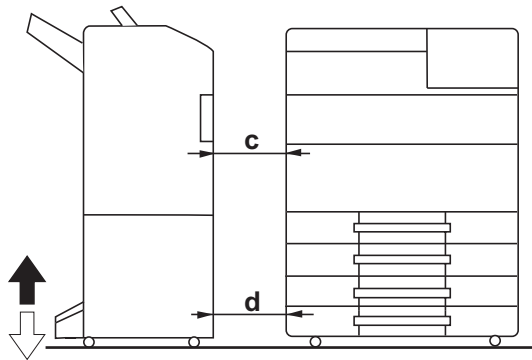
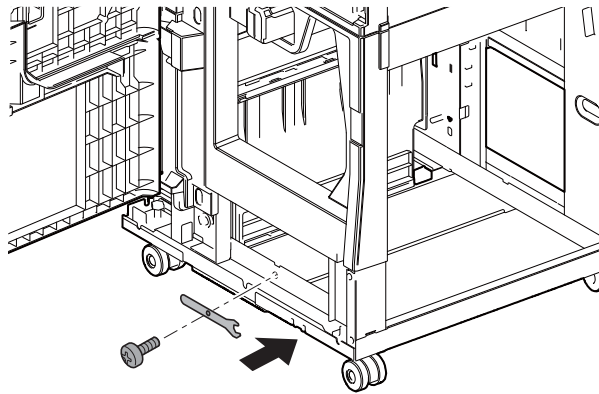
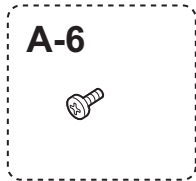


14

A



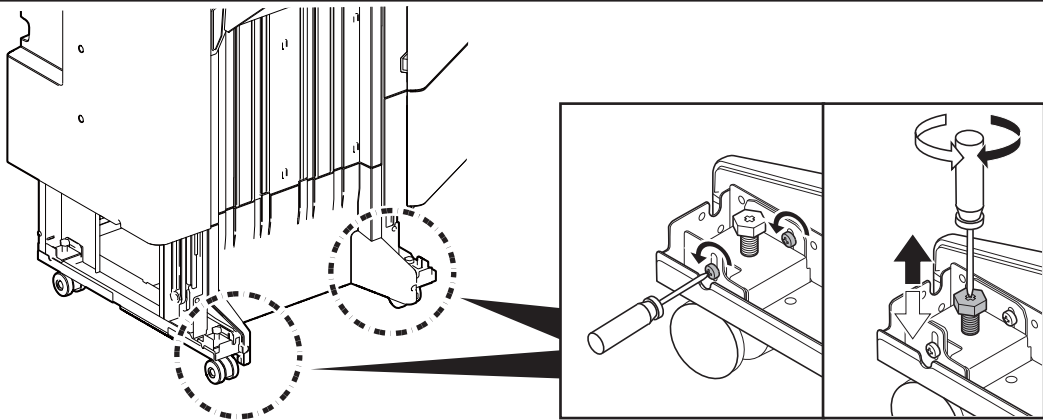
15



$c = d \rightarrow 18$

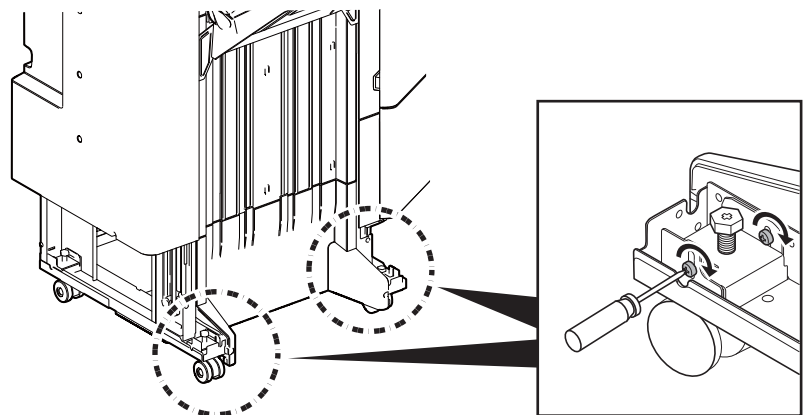
$c > d, c < d \rightarrow 16$

16



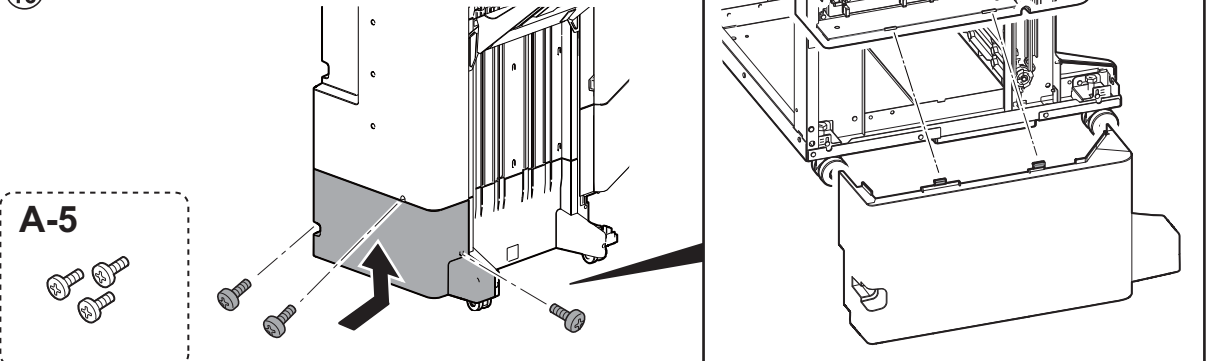
A

17



18

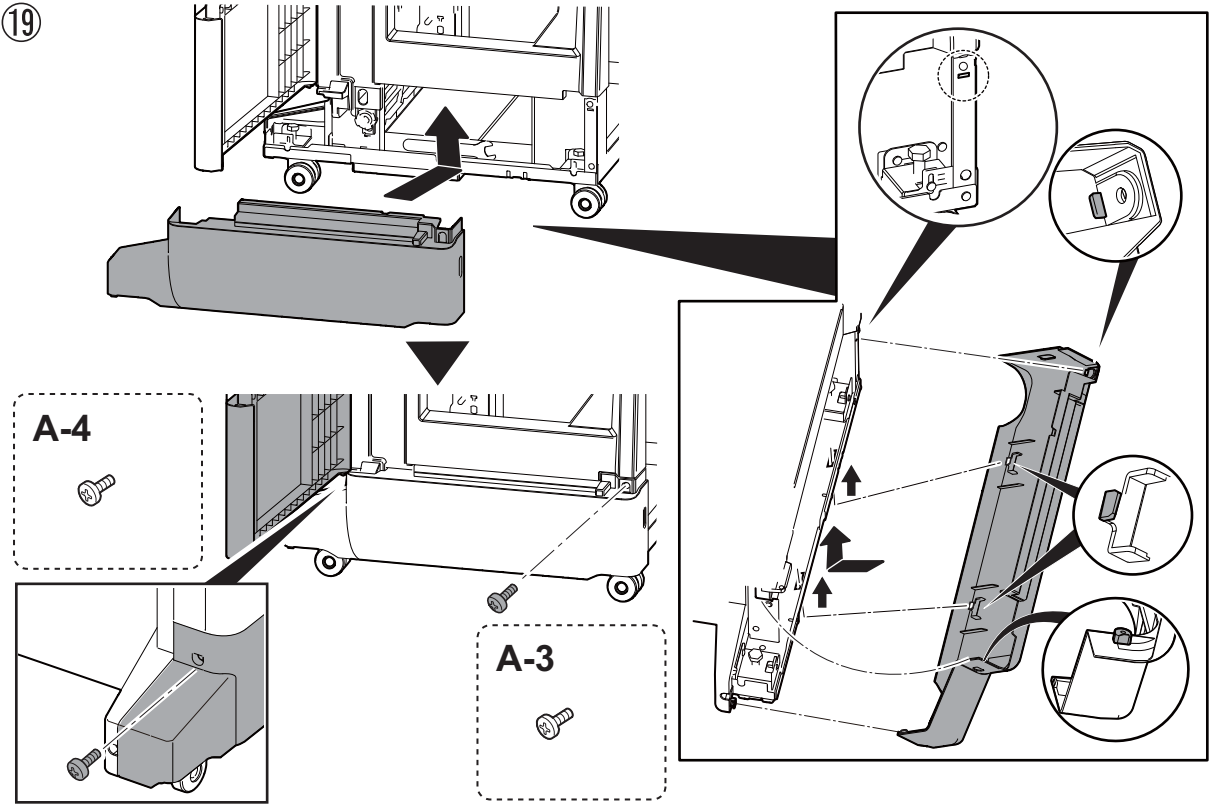
A-5



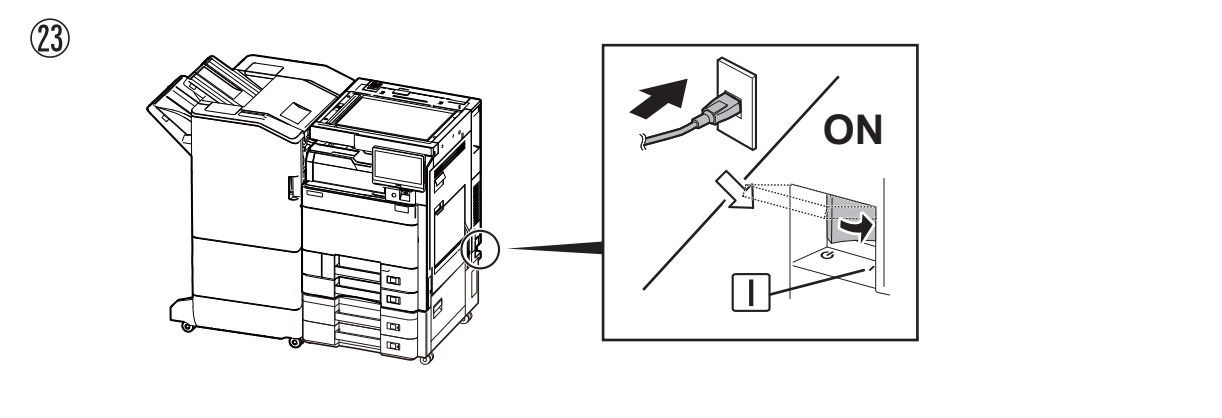
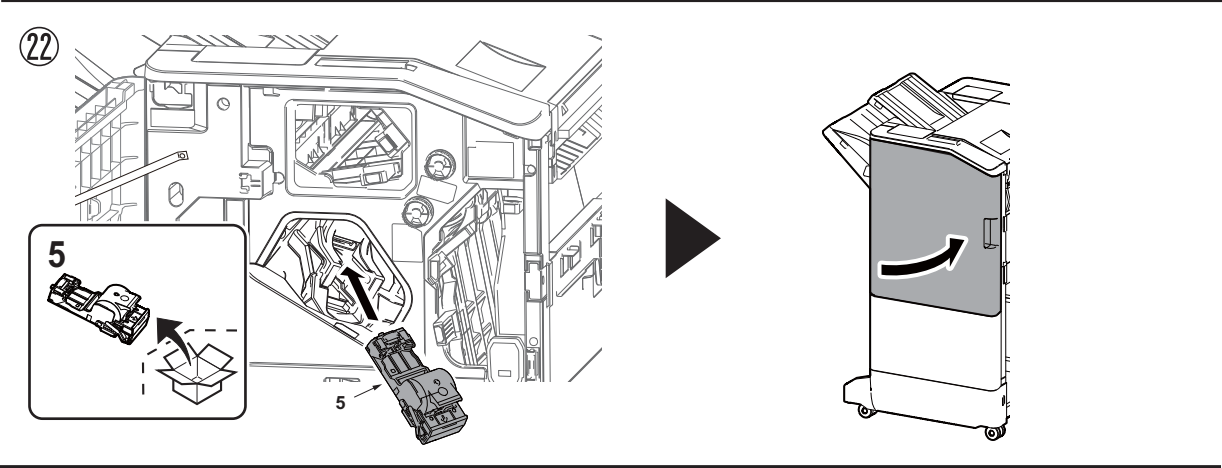
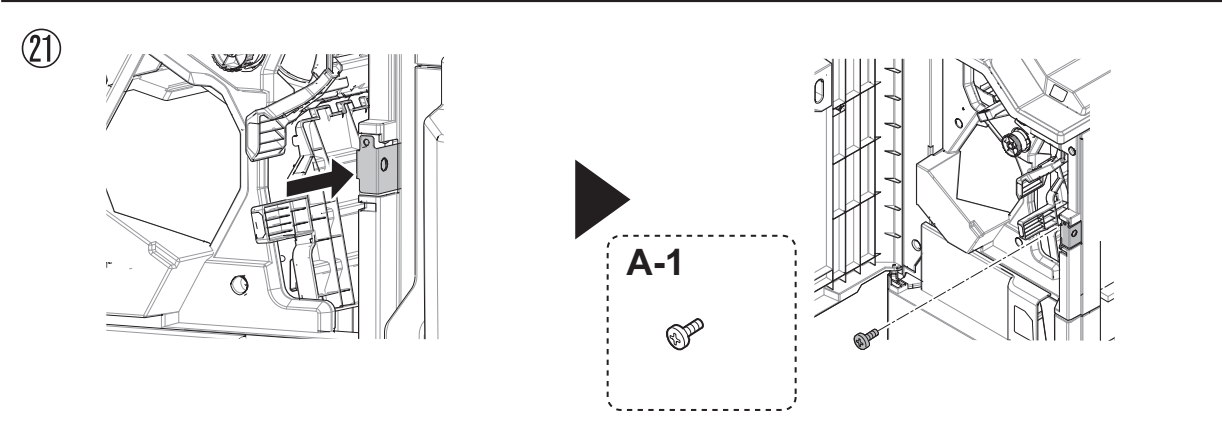
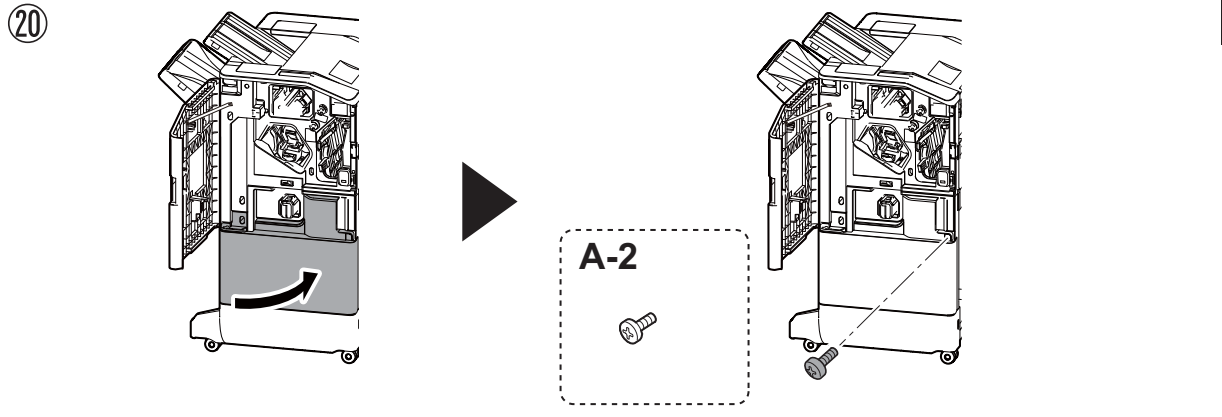
19

A-4

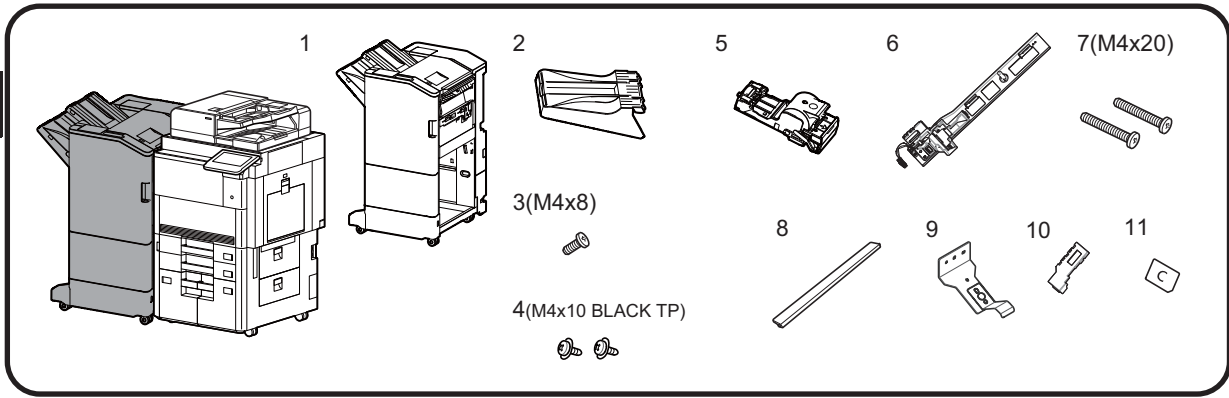
A-3



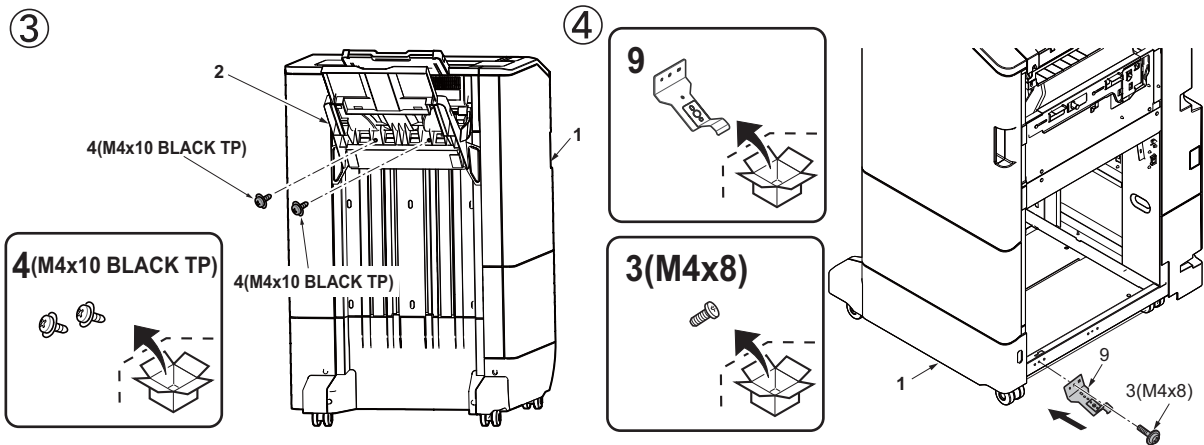
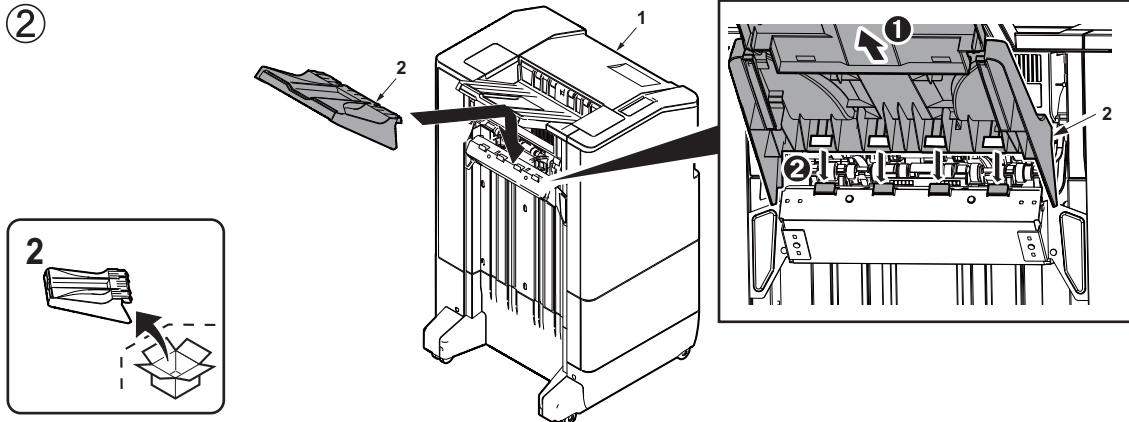
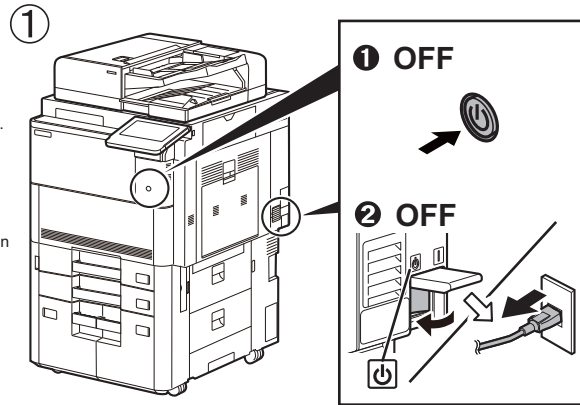
A



B

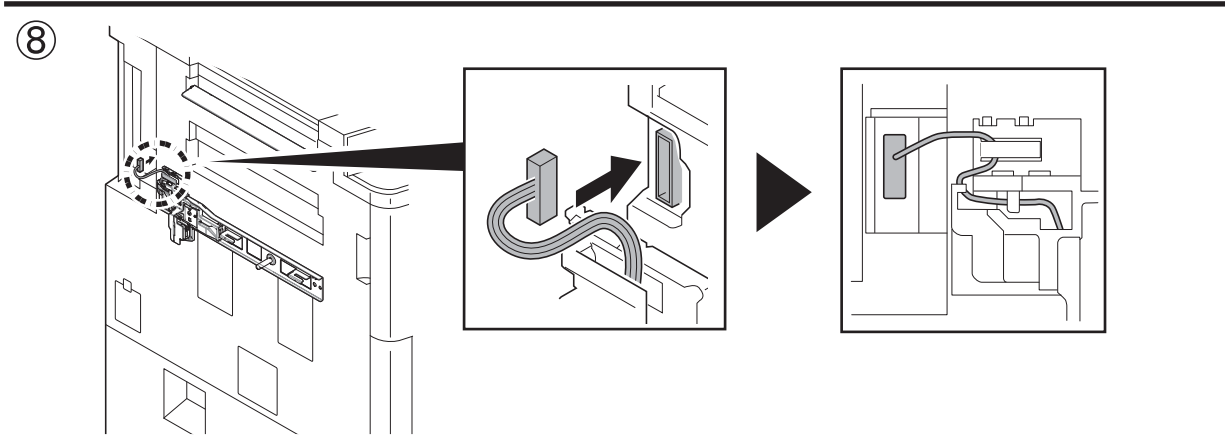
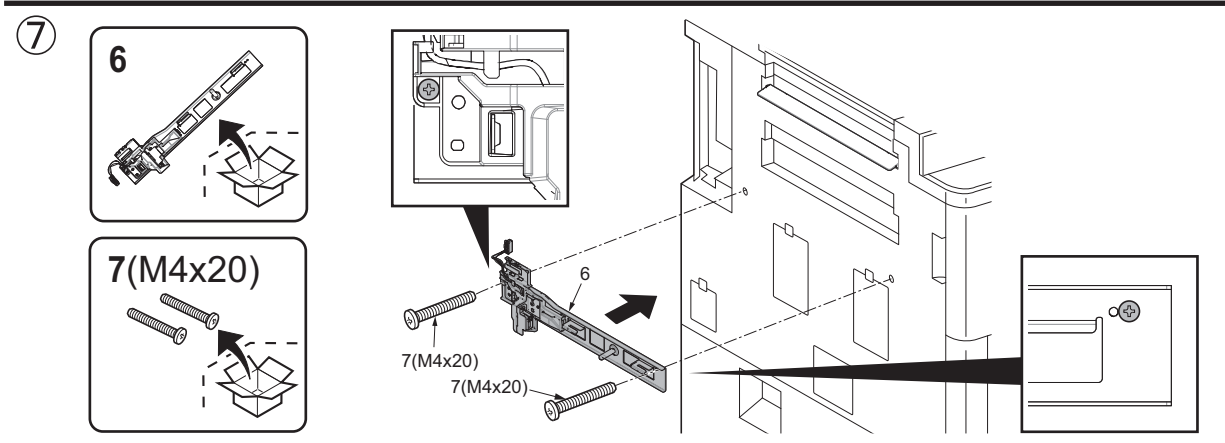
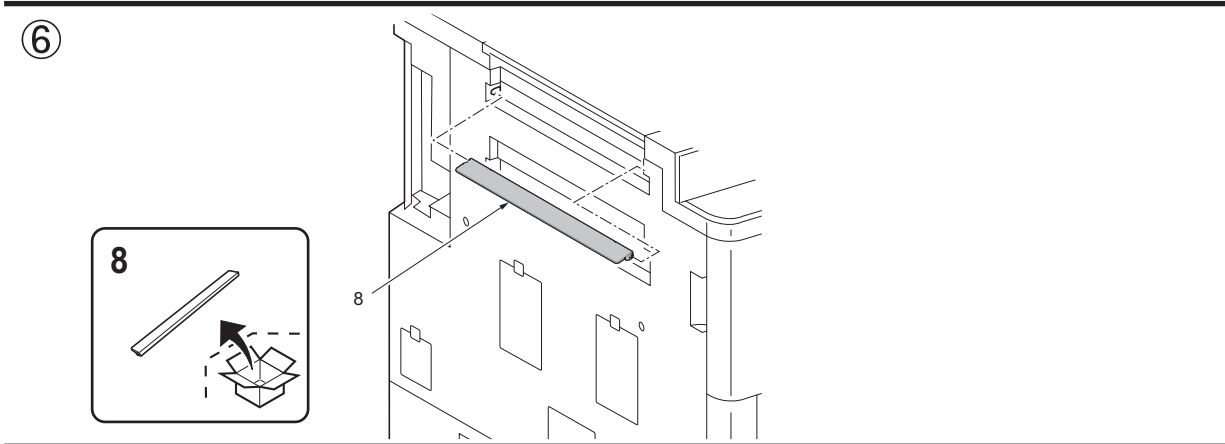
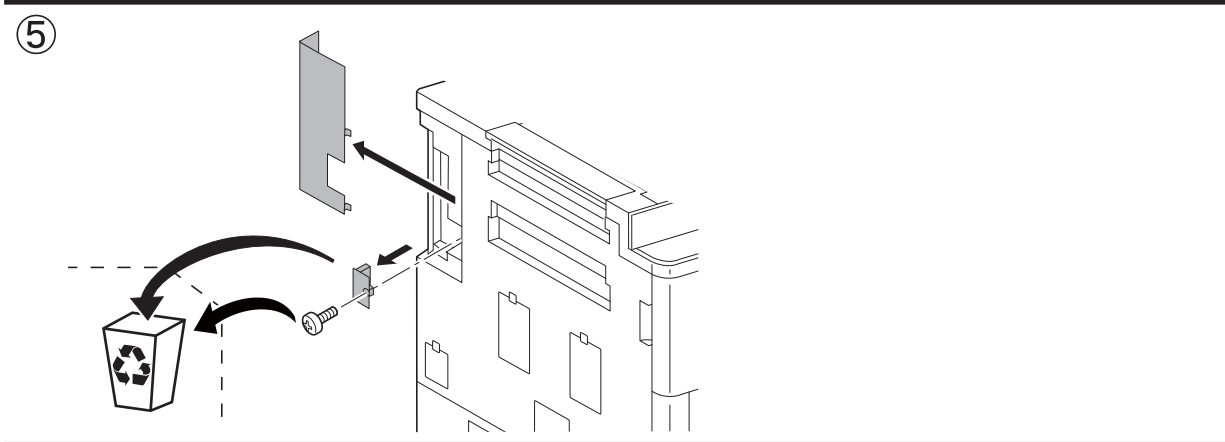


- (EN) Be sure to remove any tape and/or cushioning materials from the parts supplied.
- (FR) Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
- (ES) Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.
- (DE) Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.
- (IT) Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
- (ZHCN) 如果附属品上带有固定胶带、缓冲材料时，请务必揭下。
- (KO) 동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.
- (JA) 同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。



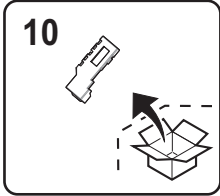


B

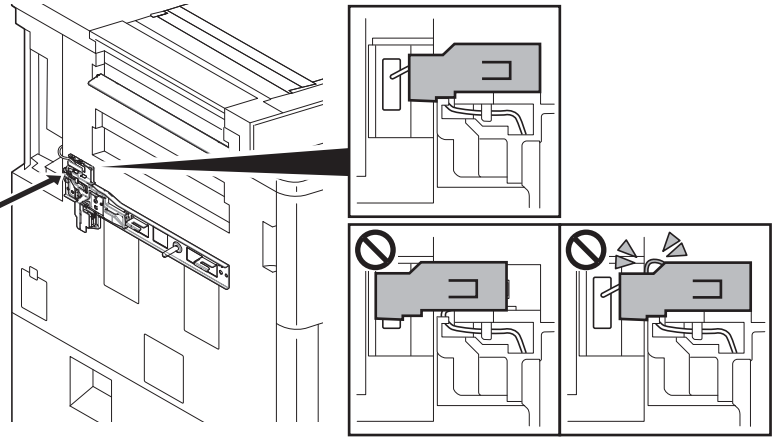


**B**

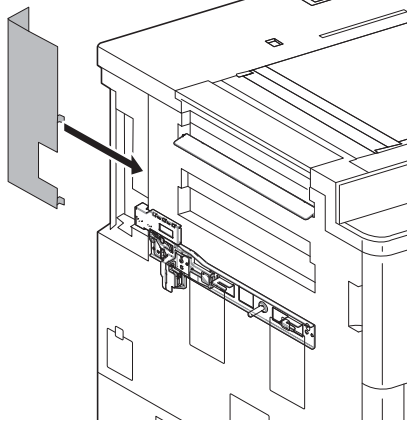
⑨



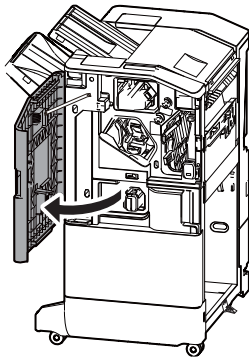
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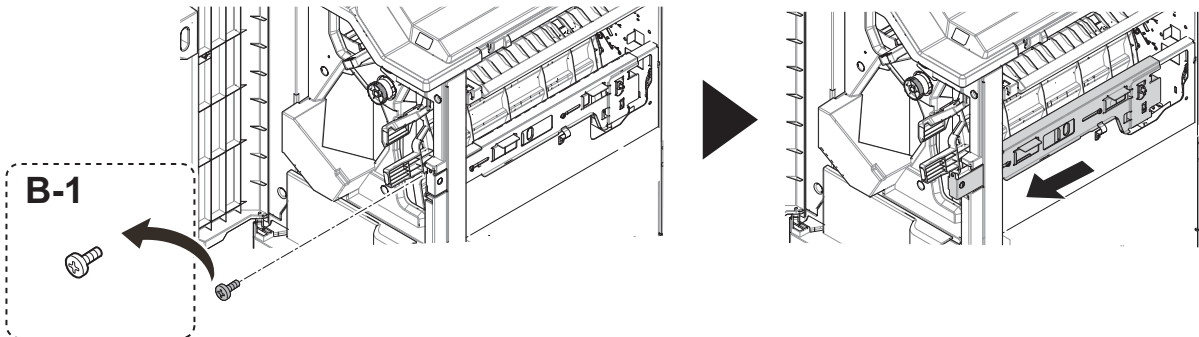
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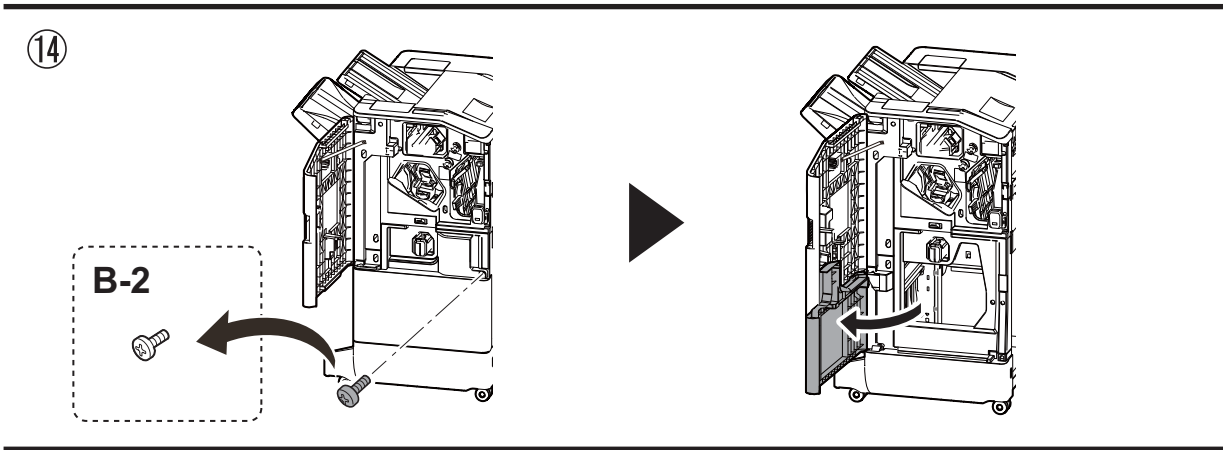
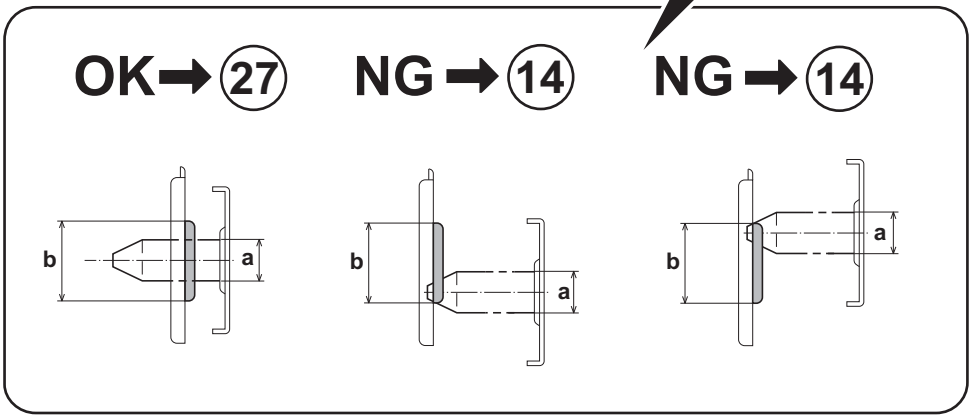
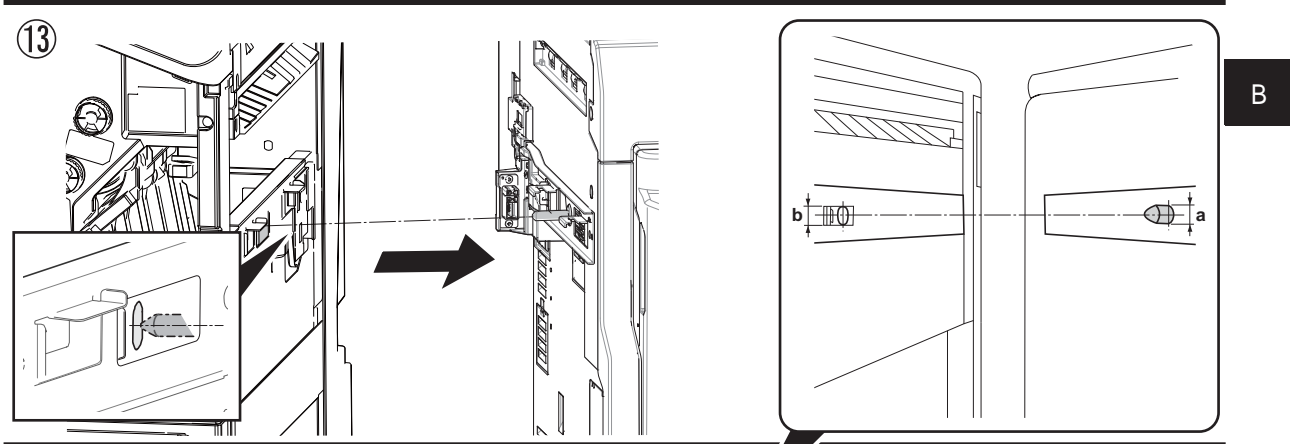


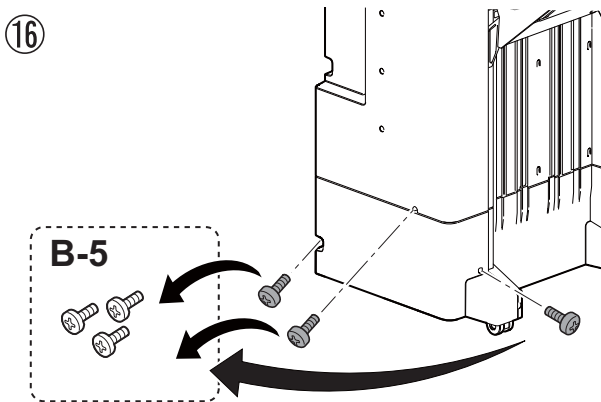
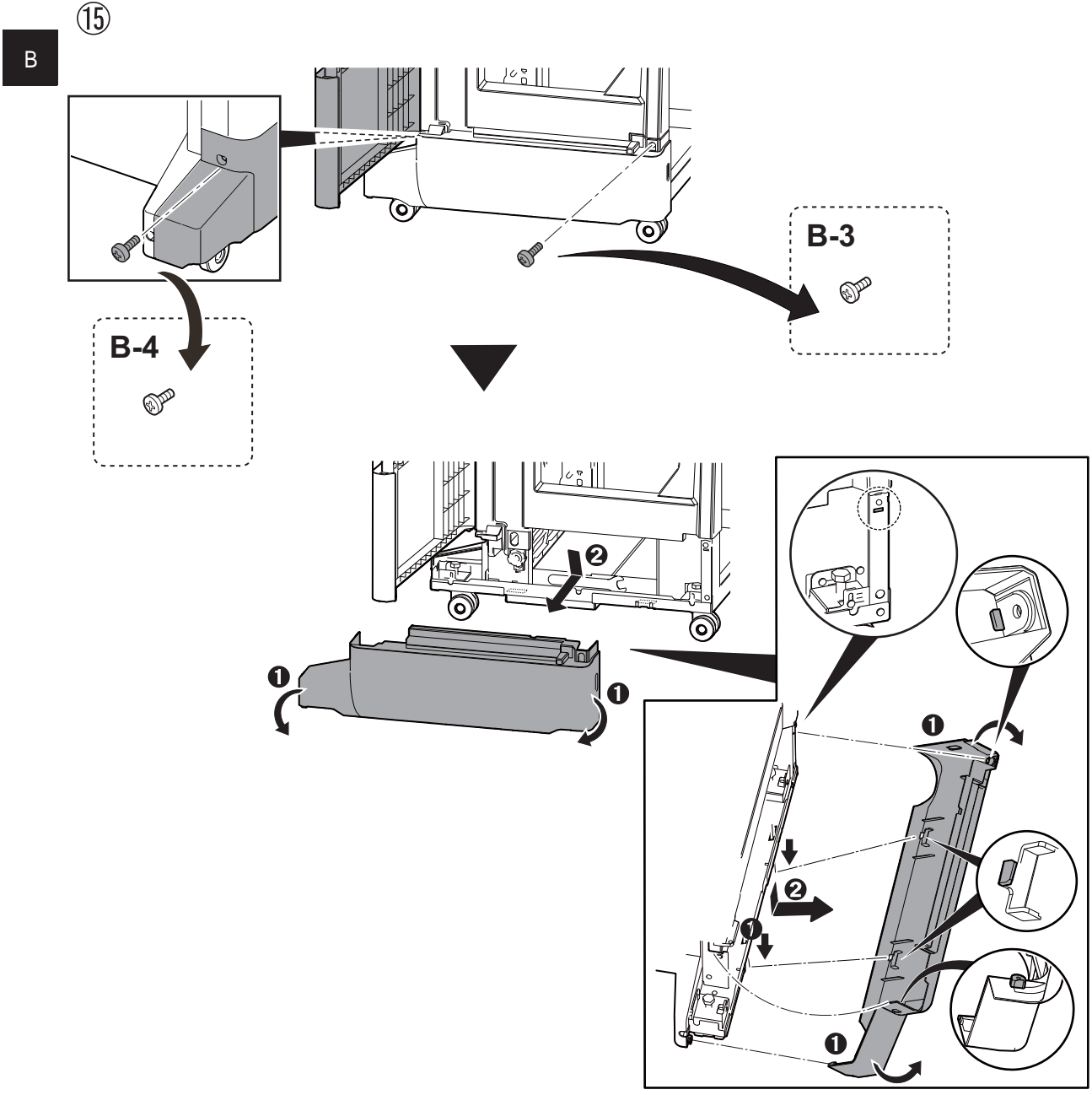
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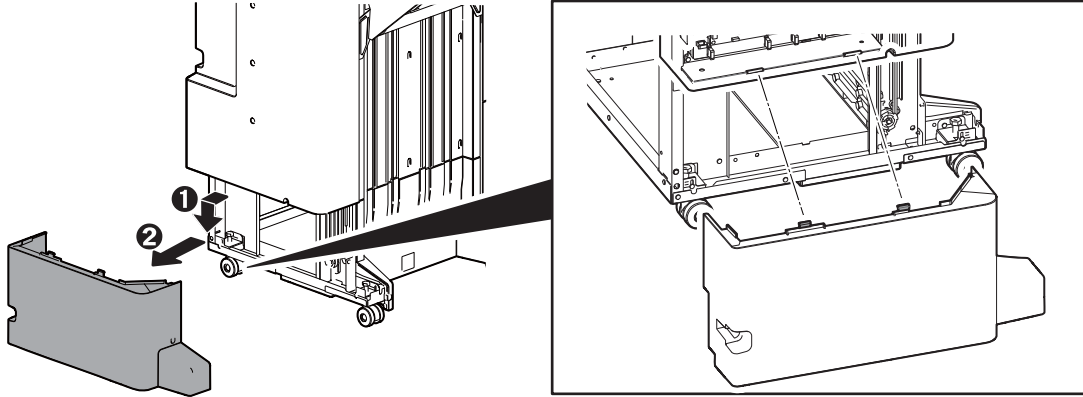
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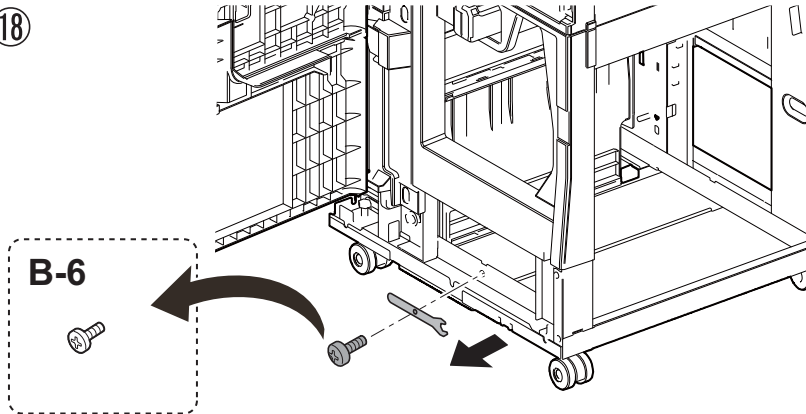


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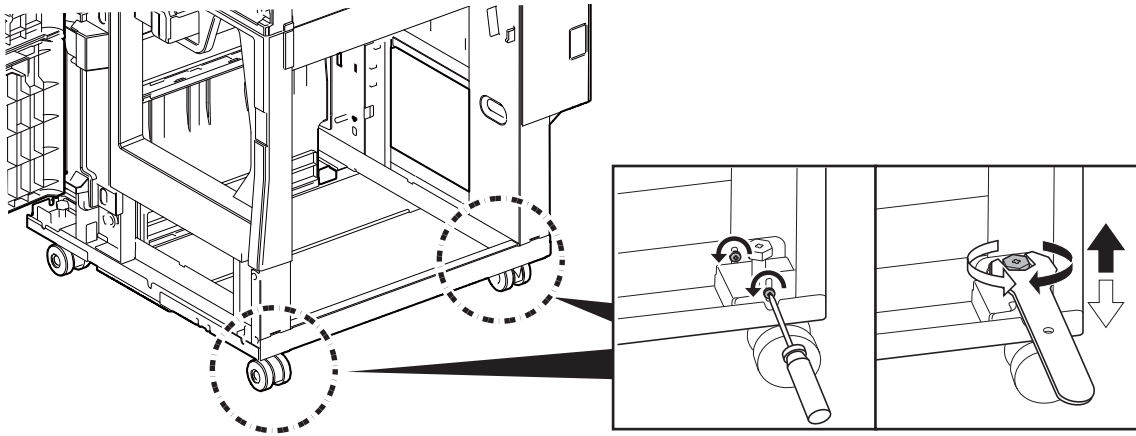


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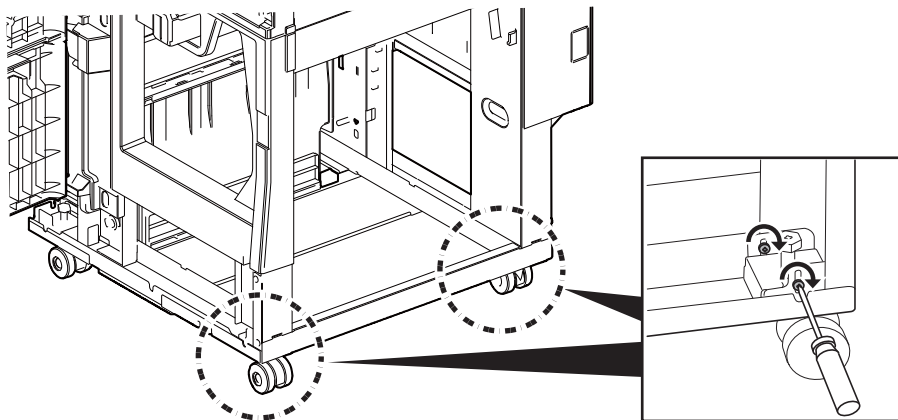
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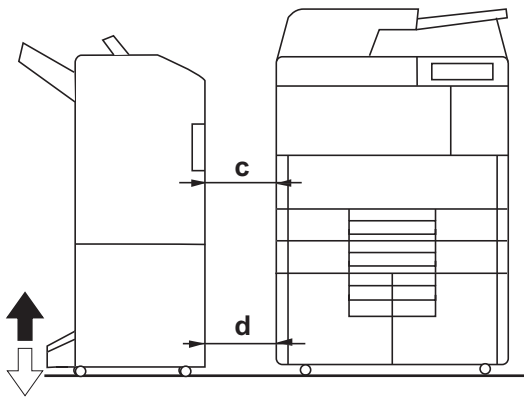
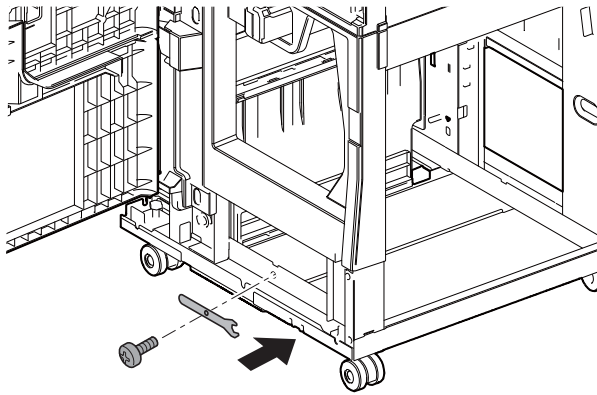
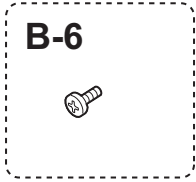


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B

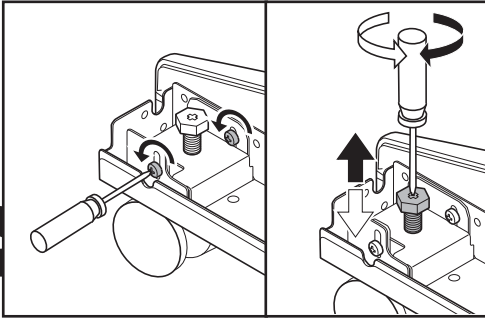
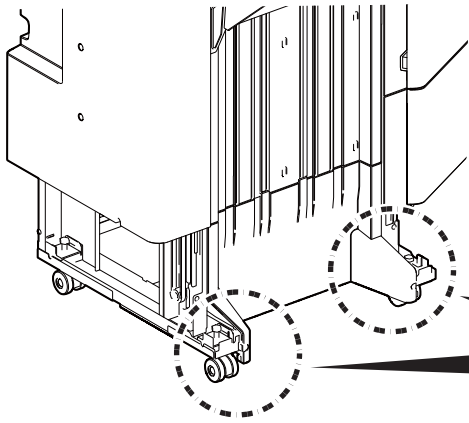
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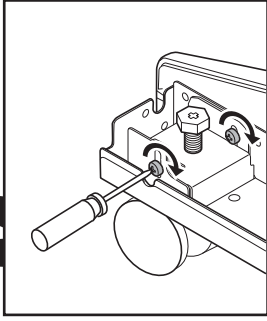
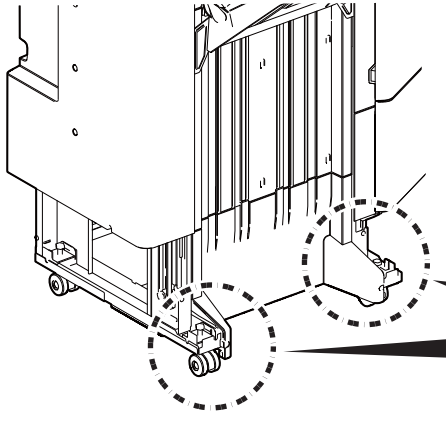
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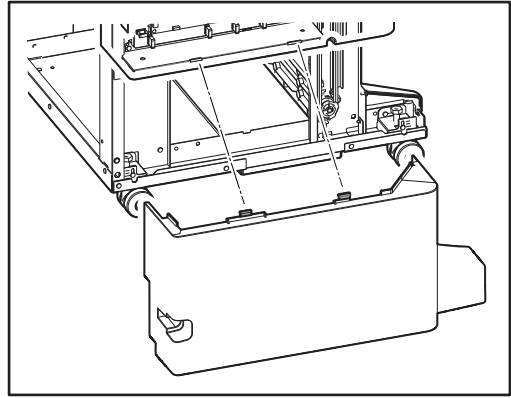
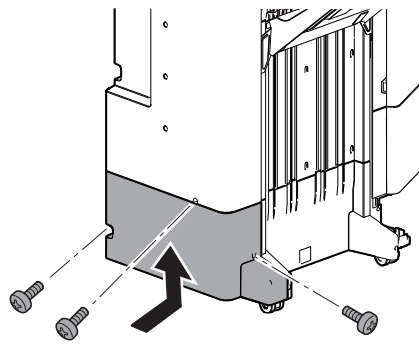
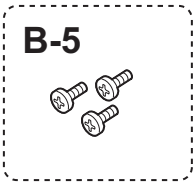


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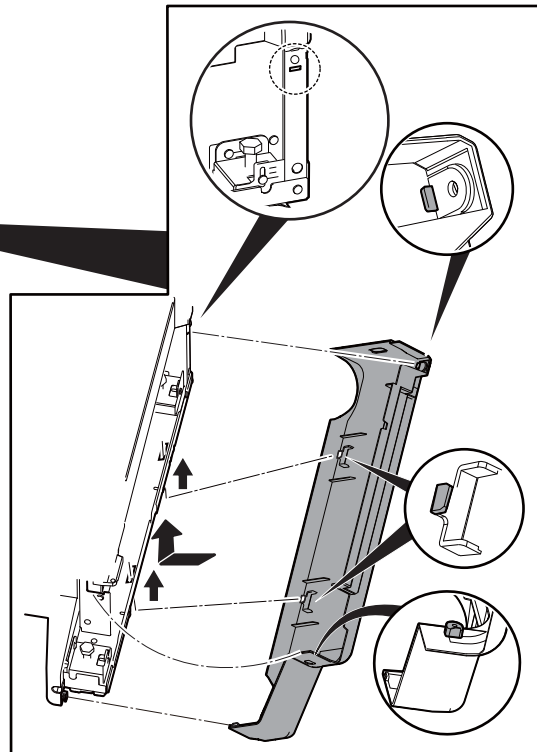
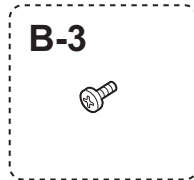
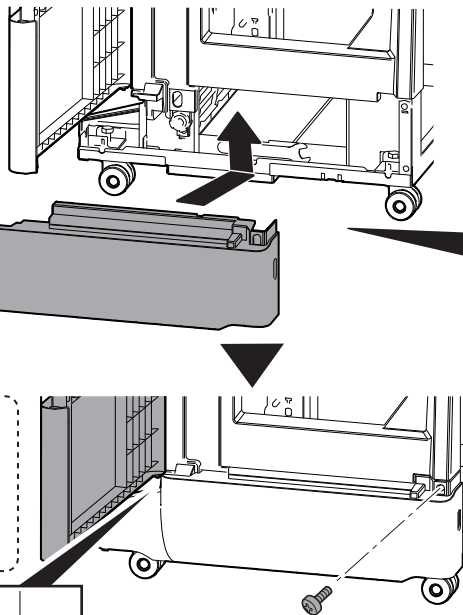
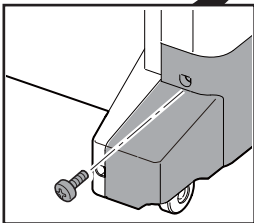
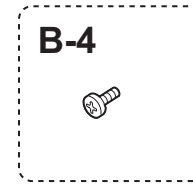


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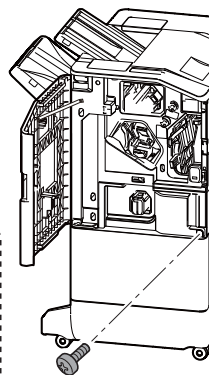
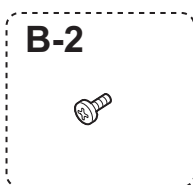
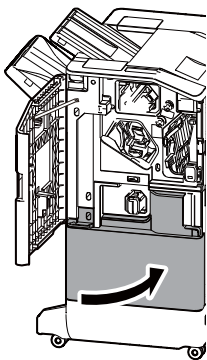
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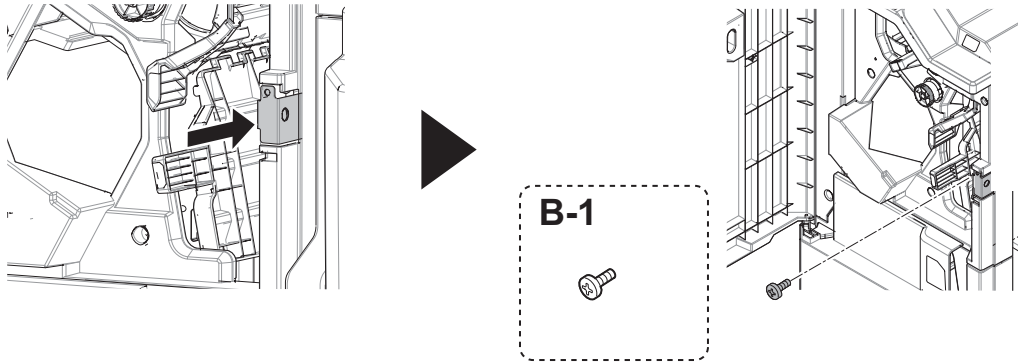


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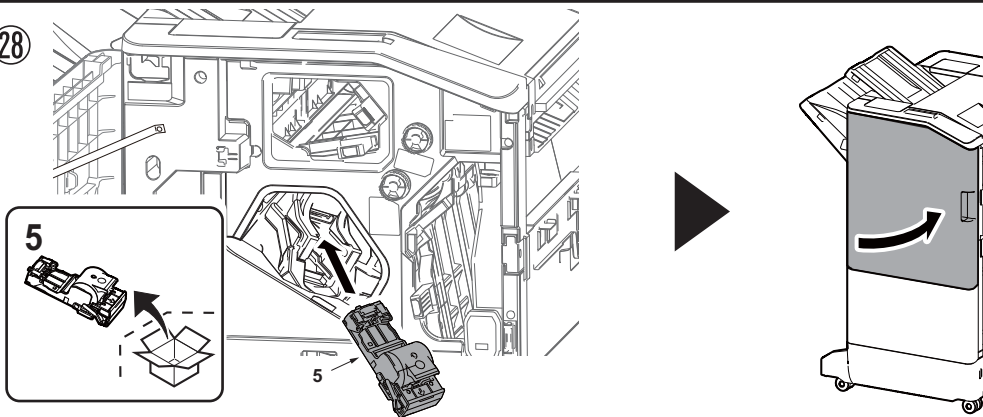


**B**

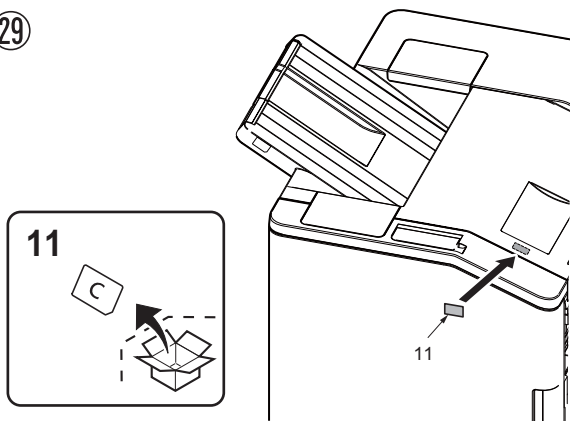
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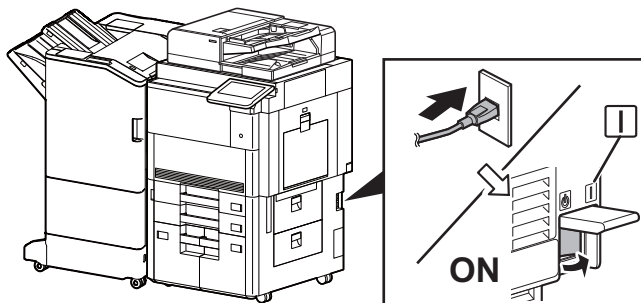
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**(5)MT-730(B)**

# **MT-730(B)**

## **(Mailbox)**

# **Installation Guide**

**English**

A different procedure is required depending on the product which is installed with this unit. Each procedure is described in the following pages.  
When installing to a document finisher, see Page 1 to Page 6.  
When installing to a Printer, see Page 7 to Page 12.

**Français**

Une procédure différente est requise selon le produit qui est installé avec cette unité. Chaque procédure est décrite dans les pages suivantes.  
Lors de l'installation sur un module finition de documents, voir Page 1 à Page 6.  
Lors de l'installation sur une imprimante, voir Page 7 à Page 12.

**Español**

El procedimiento es diferente según el producto que se instale con esta unidad. En las siguientes páginas, se describe cada procedimiento.  
Para la instalación con un finalizador de documentos, consulte las páginas de la 1 a la 6.  
Para la instalación con una impresora, consulte las páginas de la 7 a la 12.

**Deutsch**

Je nach verwendetem Modell ist eine andere Vorgehensweise zur Installation dieses Teils erforderlich. Die unterschiedlichen Vorgehensweisen werden auf den folgenden Seiten erläutert.  
Bei Installation an einem Dokumentenfinisher siehe Seiten 1 bis 6.  
Bei Installation an einem Drucker siehe Seiten 7 bis 12.

**Italiano**

Si richiede una procedura diversa in funzione del prodotto su cui è installata l'unità. Le singole procedure sono descritte nelle pagine seguenti.  
Quando si installa un finisher documenti, vedere le pagine da 1 a 6.  
Quando si installa una stampante, vedere le pagine da 7 a 12.

**简体中文**

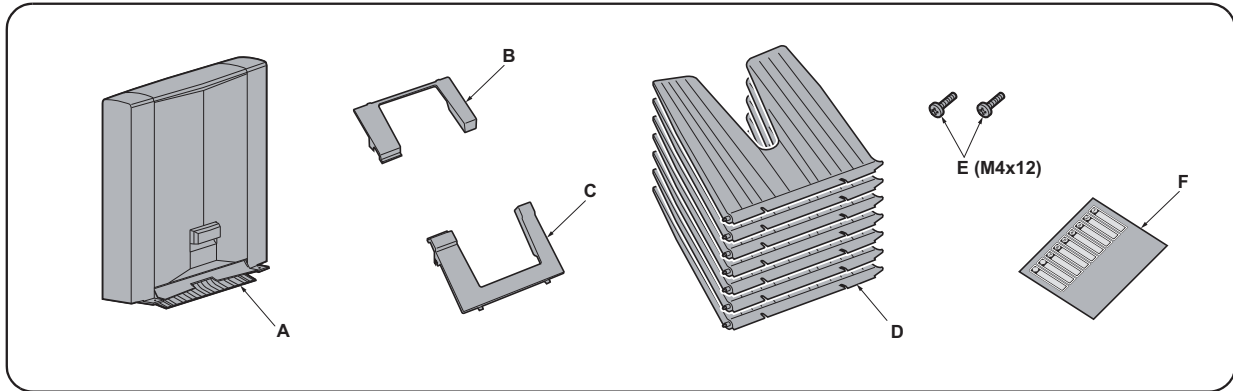
根据安装对象，安装步骤略有不同。各个步骤记载在下面的页面。  
安装到装订器时，请参见第1～6页。  
安装到打印机时，请参见第7～12页。

**한국어**

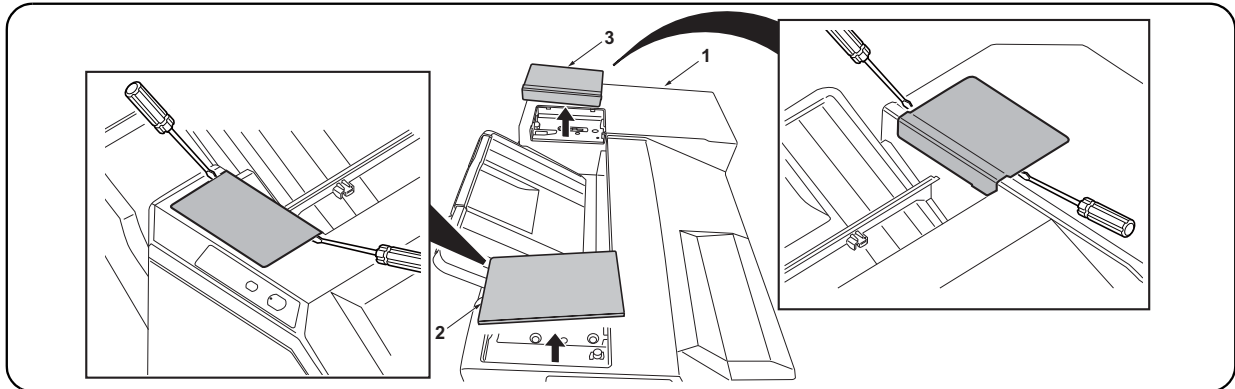
이 장치에 설치되는 제품에 따라 절차가 다릅니다. 다음 페이지에서 각 절차를 설명합니다.  
문서 피니셔에 설치하는 경우 1 페이지 ~ 6 페이지를 참조하십시오.  
프린터에 설치하는 경우 7 페이지 ~ 12 페이지를 참조하십시오.

**日本語**

装着する対象によって、取付手順は異なります。それぞれ、以下のページに記載しています。  
ドキュメントフィニッシャーに設置する場合;1 ページ~ 6 ページ  
プリンターに設置する場合;7 ページ~ 12 ページ



<b>English</b> <b>Supplied parts</b> A. Mailbox ..... 1 B. Front mounting plate cover ..... 1 C. Rear mounting plate cover ..... 1 D. Copy eject bins ..... 7		E. M4 × 12 screw ..... 2 F. Tray name label (for users) ..... 1	Be sure to remove any tape and/or cushioning materials from the parts supplied.
<b>Français</b> <b>Pièces fournies</b> A. Boîte à lettres ..... 1 B. Couvercle de la plaque de montage avant ..... 1 C. Couvercle de la plaque de montage arrière ... 1 D. Case d'éjection de copies ..... 7		E. Vis M4 × 12 ..... 2 F. Étiquette de nom de plateau (pour les utilisateurs) ..... 1	Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
<b>Español</b> <b>Partes suministradas</b> A. Buzón de correo ..... 1 B. Cubierta de la placa de montaje frontal ..... 1 C. Cubierta de la placa de montaje trasera ..... 1 D. Bandejas de expulsión de copias ..... 7		E. Tornillo M4 × 12 ..... 2 F. Etiqueta de nombre de la bandeja (para usuarios) ..... 1	Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.
<b>Deutsch</b> <b>Enthaltene Teile</b> A. Mailbox ..... 1 B. Vordere Abdeckung der Montageplatte ..... 1 C. Hintere Abdeckung der Montageplatte ..... 1 D. Kopienausgabefächer ..... 7		E. Schraube M4 × 12 ..... 2 F. Fachnamenaufkleber (für Benutzer) ..... 1	Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.
<b>Italiano</b> <b>Parti fornite</b> A. Mailbox ..... 1 B. Coperchio della piastra di montaggio anteriore .. 1 C. Coperchio della piastra di montaggio posteriore. 1 D. Scomparti di espulsione delle copie ..... 7		E. Vite M4 × 12 ..... 2 F. Etichetta di nome del vassoio (per utenti) ..... 1	Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
<b>简体中文</b> <b>附属品</b> A. 邮箱 ..... 1 B. 支撑板前盖板 ..... 1 C. 支撑板后盖板 ..... 1 D. 接纸盘 ..... 7		E. M4×12 螺丝 ..... 2 F. 托盘名称标贴 (用户用) ..... 1	如果附属品上带有固定胶带, 缓冲材料时务必揭下。
<b>한국어</b> <b>동봉품</b> A. 메일박스 ..... 1 B. 부착판커버 앞 ..... 1 C. 부착판커버 뒤 ..... 1 D. 배출핀 ..... 7		E. 나사 M4 × 12 ..... 2 F. 트레이 명칭 스티 (사용자용) ..... 1	동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.
<b>日本語</b> <b>同梱品</b> A. メールボックス ..... 1 B. 取付板カバー前 ..... 1 C. 取付板カバー後 ..... 1 D. 排出ピン ..... 7		E. ビス M4×12 ..... 2 F. トレイ名称シール(ユーザー用) ..... 1	同梱品に固定テープ、緩衝材が付いている場合は必ず取り外すこと。

**Procedure**

Before starting installation, be sure to turn the main power switch of the machine off, and unplug the power plug from the wall outlet.

1. Remove the front top cover (2) and rear top cover (3) at the top of the finisher (1) using a flat-blade screwdriver or the like.

**Procédure**

Avant de commencer l'installation, s'assurer de mettre la machine hors tension et de débrancher la fiche d'alimentation de la prise murale.

1. Retirer le couvercle supérieur avant (2) et le couvercle supérieur arrière (3) situés en haut du retoucheur (1) à l'aide d'un tournevis à tête plate ou d'un outil équivalent.

**Procedimiento**

Antes de iniciar la instalación, asegúrese de apagar el interruptor de encendido de la máquina y desenchufar el cable de alimentación de la toma de pared.

1. Remueva la cubierta superior delantera (2) y la cubierta superior trasera (3) en la parte superior del finalizador (1) utilizando un destornillador de punta plana o similar.

**Verfahren**

Bevor Sie mit der Installation beginnen überzeugen Sie sich, dass der Netzschalter des Geräts ausgeschaltet und das Stromkabel aus der Steckdose gezogen ist.

1. Entfernen Sie die vordere obere Abdeckung (2) und die hintere obere Abdeckung (3) an der Oberseite des Finishers (1) mit einem Klingenschraubendreher oder dergleichen.

**Procedura**

Prima di iniziare l'installazione, spegnere la macchina e scollegare la spina dalla presa di corrente.

1. Rimuovere il coperchio superiore anteriore (2) e il coperchio superiore posteriore (3) dalla parte superiore del finitore (1) utilizzando un cacciavite a punta piatta, o un attrezzo simile.

**安装步骤**

安装前务必关闭机器的主电源开关，并从墙壁插座拔下电源插头。

1. 用一字形螺丝刀拆下装订器 (1) 上部的顶罩前盖板 (2) 和顶罩后盖板 (3)。

**설치순서**

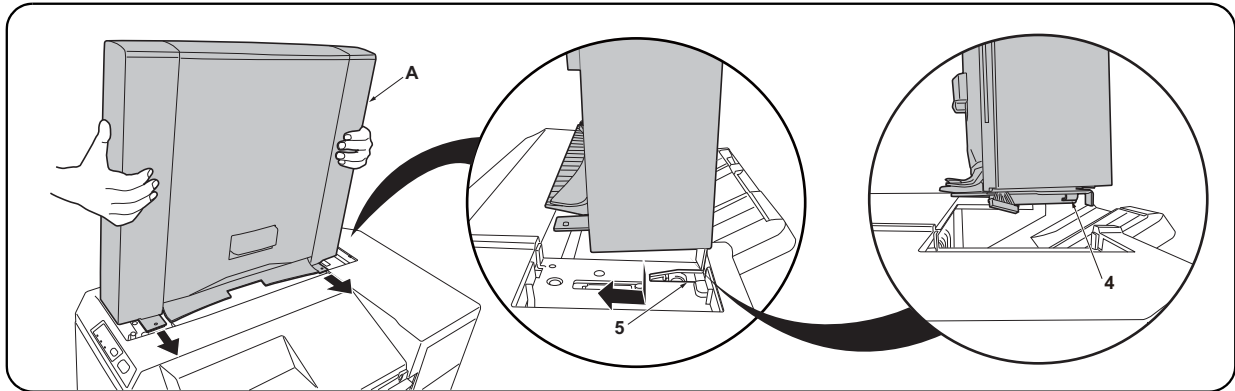
설치를 시작하기 전에 반드시 본체의 주 전원 스위치를 끄고 벽 콘센트에서 전원 플러그를 분리하십시오.

1. 피니셔 (1) 상부의 윗커버 앞 덮개 (2), 윗커버 뒤 덮개 (3) 를 마이너스 드라이버 등으로 제거합니다.

**取付手順**

必ず機械本体の主電源スイッチを OFF にし、機械本体の電源プラグを抜いてから作業すること。

1. フィニッシャー (1) 上部の天カバー前フタ (2)、天カバー後フタ (3) をマイナスドライバーなどで取り外す。



2. Fit the hooks (4) located at the front and rear of the bottom of the mailbox (A) into the notches (5) located at the front and rear of the top of the finisher (1) as shown in the illustration and attach the mailbox (A) to the finisher (1).

**Note:**

Lift the front and rear of the mailbox (A) lightly upward to make sure that no gap is made between the mailbox (A) and the machine.

2. Insérer les crochets (4) se trouvant à l'avant et à l'arrière au fond de la boîte à lettres (A) dans les encoches (5) situées à l'avant et à l'arrière en haut du retoucheur (1) comme illustré ici, puis fixer la boîte à lettres (A) au retoucheur (1).

**Remarque:**

Lever légèrement l'avant et l'arrière de la boîte à lettres (A) de sorte qu'il n'y ait aucun interstice entre la boîte à lettres (A) et la machine.

2. Coloque los ganchos (4) ubicados en la parte inferior frontal y trasera del buzón de correo (A) en las muescas (5) ubicadas en la parte superior frontal y trasera del finalizador (1), como se muestra en la ilustración, y coloque el buzón de correo (A) en el finalizador (1).

**Nota:**

Levante ligeramente la parte frontal y trasera del buzón de correo (A) para asegurarse de que no queda espacio entre el buzón de correo (A) y la máquina.

2. Setzen Sie die Haken (4) an der Vorder- und Rückseite der Mailbox (A) in die Öffnungen (5) vorne und hinten an der Oberseite des Finishers (1) ein, wie in der Abbildung dargestellt, und bringen Sie die Mailbox (A) am Finisher (1) an.

**Hinweis:**

Heben Sie die Vorder- und Rückseite der Mailbox (A) ein wenig an, damit sich kein Spalt zwischen der Mailbox (A) und dem Gerät bildet.

2. Inserire i ganci (4) posizionati sul davanti e sul dietro della parte di fondo della mailbox (A), negli incavi (5) posizionati sul davanti e sul dietro della parte superiore del finitore (1) come mostrato nell'illustrazione, e fissare la mailbox (A) al finitore (1).

**Nota:**

Sollevarle leggermente la parte anteriore e posteriore della mailbox (A) verso l'alto per accertarsi che non vi sia dello spazio tra la mailbox (A) e la macchina.

2. 如图所示, 将位于邮箱 (A) 底部前后侧的卡扣 (4) 嵌入位于装订器 (1) 顶部前后侧的凹口 (5), 并将邮箱 (A) 安装至装订器 (1)。

**注:**

轻轻向上提升邮箱 (A) 的前后侧, 确保邮箱 (A) 未处于悬浮状态。

2. 메일박스 (A) 하부의 앞뒤에 있는 후크 (4) 를 피니셔 (1) 상부의 앞뒤에 있는 파인 홈에 (5) 에 일러스트와 같이 삽입하고 메일박스 (A) 를 피니셔측에 장착합니다.

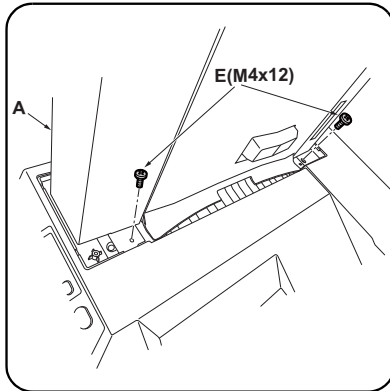
**주**

메일박스 (A) 의 앞뒤를 각각 상방향으로 가볍게 들어 메일박스 (A) 가 떠 있지 않은 것을 확인합니다.

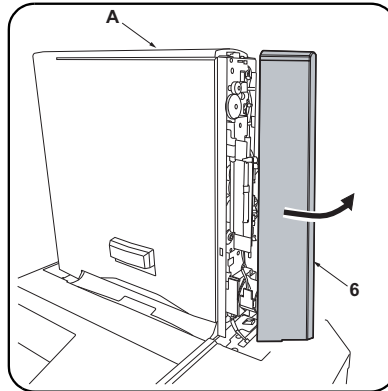
2. メールボックス (A) 下部の前後にあるフック (4) をフィニッシャー(1) 上部の前後にある切り欠き部 (5) にイラストのように挿入し、メールボックス (A) をフィニッシャー(1) に取り付ける。

**注意**

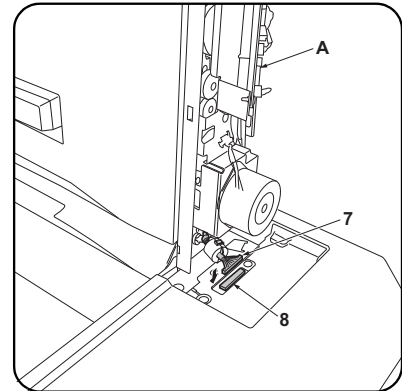
メールボックス (A) の前後をそれぞれ上方向に軽く持ち上げ、メールボックス (A) が浮かないことを確認する。



3. Secure the mailbox (A) using the two screws M4x12 (E).



4. Remove the rear cover (6) of the mailbox (A).



5. Plug the connector (7) of the mailbox (A) into the connector (8) of the machine body.  
6. Reinstall the rear cover (6) of the mailbox (A).

3. Fixer la boîte à lettres (A) à l'aide de deux vis M4x12 (E).

4. Retirer le couvercle arrière (6) de la boîte à lettres (A).

5. Brancher le connecteur (7) de la boîte à lettres (A) dans le connecteur (8) de la machine body.  
6. Remonter le couvercle arrière (6) de la boîte à lettres (A).

3. Fije el buzón de correo (A) con dos tornillos M4x12 (E).

4. Quite la cubierta posterior (6) del buzón de correo (A).

5. Enchufe el conector (7) del buzón de correo (A) al conector (8) del cuerpo de la máquina.  
6. Vuelva a instalar la cubierta posterior (6) del buzón de correo (A).

3. Sichern Sie die Mailbox (A) mit zwei Schrauben M4x12 (E).

4. Entfernen Sie die hintere Abdeckung (6) der Mailbox (A).

5. Stecken Sie den Stecker (7) der Mailbox (A) in die Steckbuchse (8) des Gerätegehäuses.  
6. Bringen Sie die hintere Abdeckung (6) der Mailbox (A) wieder an.

3. Fissare la mailbox (A) utilizzando le due viti M4x12 (E).

4. Rimuovere il coperchio posteriore (6) della mailbox (A).

5. Collegare il connettore (7) della mailbox (A) al connettore (8) del corpo macchina.  
6. Reinstallare il coperchio posteriore (6) della mailbox (A).

3. 使用两个螺丝 M4x12 (E) 固定邮箱 (A)。

4. 拆下邮箱 (A) 的后部盖板 (6)。

5. 将邮箱 (A) 的接插件 (7) 插入机器的接插件 (8)。  
6. 重新安装邮箱 (A) 的后盖板 (6)。

3. M4x12 나사 (E) 두 개를 사용하여 메일박스 (A) 를 고정합니다 .

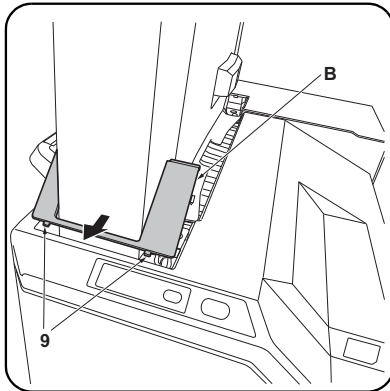
4. 메일박스 (A) 의 뒤커버 (6) 를 떼어냅니다 .

5. 메일박스 (A) 의 커넥터 (7) 를 본체의 커넥터 (8) 에 연결합니다  
6. 메일박스 (A) 의 뒤커버 (6) 를 다시 장착합니다 .

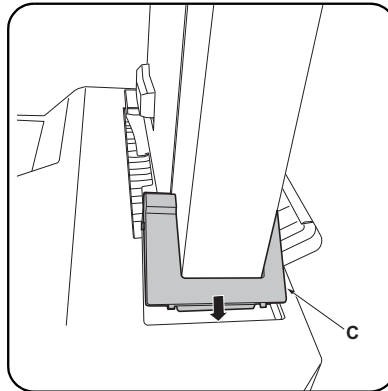
3. ビス M4×12(E) 2 本で、メールボックス (A) を固定する。

4. メールボックス (A) の後カバー(6) を取り外す。

5. メールボックス (A) のコネクタ(7) を機械本体のコネクタ (8) に接続する。  
6. メールボックス (A) の後カバー(6) を元通りに取り付ける。



7. Insert the 2 hooks (9) on the front mounting plate cover (B) for the mailbox into the finisher to install the cover (B).



8. Install the rear mounting plate cover (C) on the finisher in the same way.

7. Insérer les 2 crochets (9) du couvercle de la plaque de montage avant (B) de la boîte à lettres dans le retoucheur pour installer ce couvercle (B).

8. Installer le couvercle de la plaque de montage arrière (C) sur le retoucheur en procédant de la même manière.

7. Para instalar la cubierta (B), inserte los 2 ganchos (9) de la cubierta de la placa de montaje frontal (B) para el buzón de correo en el finalizador.

8. Instale de la misma manera la cubierta de la placa de montaje trasera (C) en el finalizador.

7. Setzen Sie die 2 Haken (9) an der vorderen Abdeckung der Montageplatte (B) für die Mailbox in den Finisher ein, um die Abdeckung (B) zu installieren.

8. Bringen Sie auf gleiche Weise die hintere Abdeckung der Montageplatte (C) am Finisher an.

7. Inserire nel finitore i 2 ganci (9) posizionati sul coperchio della piastra di montaggio anteriore (B) per la mailbox, per installare il coperchio (B).

8. Installare il coperchio della piastra di montaggio posteriore (C) sul finitore nella stessa maniera.

7. 将邮箱的安装板前部盖板 (B) 的 2 个卡扣 (9) 插入到装订器中, 以安装安装板前部盖板 (B)。

8. 按相同方法将安装板后部盖板 (C) 安装到装订器上。

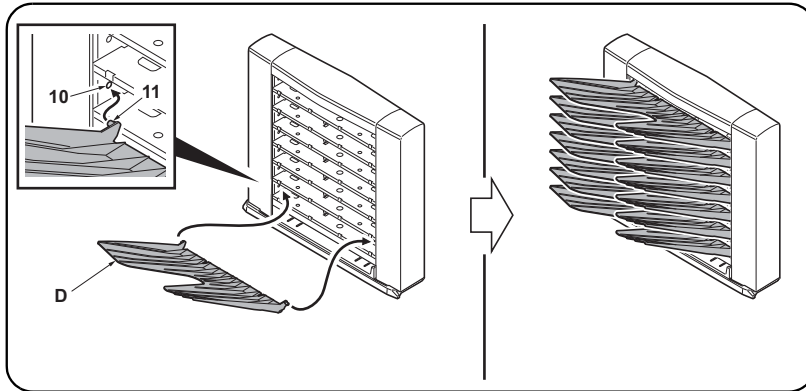
7. 메일박스의 부착판 커버 앞 (B) 의 후크 (9) 2 곳을 피니셔에 삽입하고 부착판 커버 앞 (B) 을 장착합니다 .

8. 같은 방식으로 부착판 커버 뒤 (C) 를 피니셔에 장착합니다 .

7. メールボックスの取付板カバー前 (B) のフック (9) 2箇所をフィニッシャーに挿入し、取付板カバー前 (B) を取り付ける。

8. 同様に取付板カバー後 (C) をフィニッシャーに取り付ける。





**9.** Fit the seven copy eject bins (D) to the ejection section of the mailbox (A) from the lowest bin to the highest.  
Press both ends of each copy eject bin (D) to bend it a little, then fit the bin by inserting the front and rear pins (10) into the round holes (11) at the front and rear of the mailbox.

**10.** Insert the power plug from the machine into the outlet, turn the main power switch on, and verify the machine operates normally.

**9.** Fixer les sept cases d'éjection de copies (D) sur la section d'éjection de la boîte à lettres (A), en procédant de la case située tout en bas à celle située tout en haut.  
Appuyer sur les deux extrémités de chaque case d'éjection des copies (D) pour cintrer légèrement cette pièce, puis monter la case en insérant les broches avant et arrière (10) dans les trous ronds (11) à l'avant et à l'arrière de la boîte à lettres.

**10.** Insérer la fiche d'alimentation de la machine dans la prise et mettre la machine sous tension, puis vérifier qu'elle fonctionne correctement.

**9.** Presione ambos extremos de cada bandeja de expulsión de copias (D) para doblarlas un poco; después, coloque la bandeja insertando los pasadores delantero y trasero (10) en los orificios redondos (11) en la parte frontal y posterior del buzón de correo.

**10.** Enchufe el cable de alimentación de la máquina en la toma de corriente y encienda el interruptor principal para comprobar que la máquina funciona correctamente.

**9.** Setzen Sie die sieben Kopienausgabefächer (D) in die Ausgabeöffnungen der Mailbox (A) ein, beginnend vom untersten Fach zum höchsten.  
Drücken Sie beide Enden jedes Kopienausgabefachs (D) zusammen, um es etwas zu biegen. Setzen Sie das Fach ein, indem Sie die vorderen und hinteren Stifte (10) in die Rundlöcher (11) vorne und hinten an der Mailbox einsetzen.

**10.** Stecken Sie den Netzstecker des Geräts in eine Steckdose und schalten Sie den Hauptschalter des Geräts ein, um den Betrieb zu prüfen.

**9.** Installare i sette scomparti di espulsione delle copie (D) nella sezione di espulsione della mailbox (A), iniziando dallo scomparto più in basso fino a quello più in alto.  
Premere le due estremità di ciascuno scomparto di espulsione delle copie (D) in modo da piegarlo leggermente, quindi installare lo scomparto inserendo i perni anteriore e posteriore (10) nei fori rotondi (11) presenti sul fronte e sul retro della mailbox.

**10.** Inserire la spina nella presa di corrente, accendere la macchina e controllare che funzioni correttamente.

**9.** 从邮箱 (A) 的排出部下面起按顺序安装 7 个接纸盘 (D)。  
按住接纸盘 (D) 的左右两侧并使其稍稍下垂, 通过将前后的销钉 (10) 插入邮箱前后的圆孔 (11) 中来安装接纸盘。

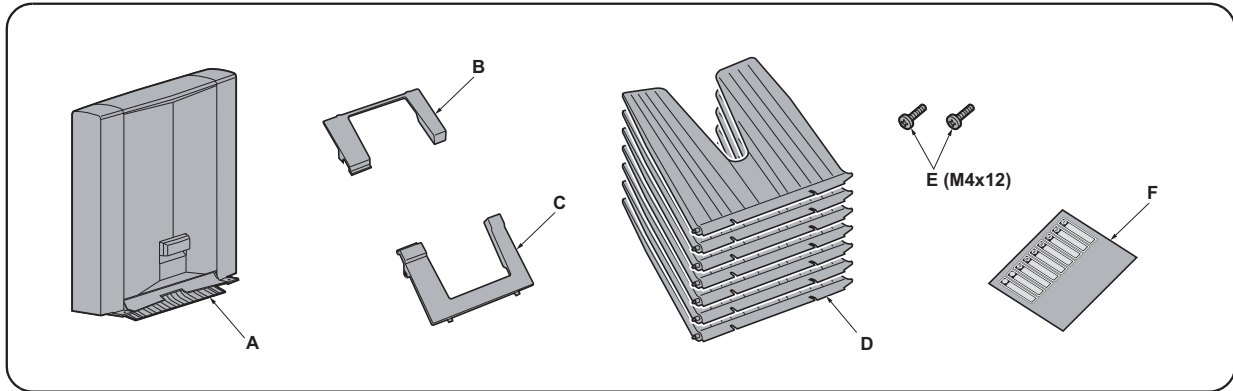
**10.** 将机器的电源插头插入插座, 然后打开主电源开关并确认机器能否正常操作。

**9.** 배출핀 (D) 7 개를 메일박스 (A) 의 배출부에 밑에서부터 순서대로 장착합니다.  
배출핀 (D) 의 좌우를 밀어 조금 휘게해 앞뒤의 핀 (10) 을 메일박스의 앞뒤의 둥근 구멍 (11) 에 삽입합니다.

**10.** 기기본체의 전원 플러그를 콘센트에 꽂고 주 전원 스위치를 ON 으로 해서 동작을 확인 합니다.

**9.** 排出ピン (D) 7 枚をメールボックス (A) の排出部から下から順番に取り付ける。  
排出ピン (D) の左右を押し少ししたませ、前後のピン (10) をメールボックスの前後の丸穴 (11) に挿入する。

**10.** 機械本体の電源プラグをコンセントに差し込み、主電源スイッチをONにして動作を確認する。



<b>English</b> <b>Supplied parts</b> A. Mailbox ..... 1 B. Front mounting plate cover ..... 1 C. Rear mounting plate cover ..... 1 D. Copy eject bins ..... 7		E. M4 × 12 screw ..... 2 F. Tray name label (for users) ..... 1	Be sure to remove any tape and/or cushioning materials from the parts supplied.
<b>Français</b> <b>Pièces fournies</b> A. Boîte à lettres ..... 1 B. Couvercle de la plaque de montage avant ..... 1 C. Couvercle de la plaque de montage arrière ... 1 D. Case d'éjection de copies ..... 7		E. Vis M4 × 12 ..... 2 F. Étiquette de nom de plateau (pour les utilisateurs) ..... 1	Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
<b>Español</b> <b>Partes suministradas</b> A. Buzón de correo ..... 1 B. Cubierta de la placa de montaje frontal ..... 1 C. Cubierta de la placa de montaje trasera ..... 1 D. Bandejas de expulsión de copias ..... 7		E. Tornillo M4 × 12 ..... 2 F. Etiqueta de nombre de la bandeja (para usuarios) ..... 1	Asegúrese de quitar todas las cintas y/o material amortiguador de las partes suministradas.
<b>Deutsch</b> <b>Enthaltene Teile</b> A. Mailbox ..... 1 B. Vorderer Abdeckung der Montageplatte ..... 1 C. Hintere Abdeckung der Montageplatte ..... 1 D. Kopienausgabefächer ..... 7		E. Schraube M4 × 12 ..... 2 F. Fachnamenaufkleber (für Benutzer) ..... 1	Stellen Sie sicher, dass sämtliche Klebebänder und/oder Polstermaterial von den gelieferten Teilen entfernt wurden.
<b>Italiano</b> <b>Parti fornite</b> A. Mailbox ..... 1 B. Coperchio della piastra di montaggio anteriore .. 1 C. Coperchio della piastra di montaggio posteriore. 1 D. Scomparti di espulsione delle copie ..... 7		E. Vite M4 × 12 ..... 2 F. Etichetta di nome del vassoio (per utenti) ..... 1	Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite.
<b>简体中文</b> <b>附属品</b> A. 邮箱 ..... 1 B. 支撑板前盖板 ..... 1 C. 支撑板后盖板 ..... 1 D. 接纸盘 ..... 7		E. M4×12 螺丝 ..... 2 F. 托盘名称标贴 (用户用) ..... 1	如果附属品上带有固定胶带, 缓冲材料时务必揭下。  不使用 B 和 C。
<b>한국어</b> <b>동봉품</b> A. 메일박스 ..... 1 B. 부착판커버 앞 ..... 1 C. 부착판커버 뒤 ..... 1 D. 배출핀 ..... 7		E. 나사 M4 × 12 ..... 2 F. 트레이 명칭 스티 (사용자용) ..... 1	동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거하십시오.  B 와 C 는 사용되지 않습니다.
<b>日本語</b> <b>同梱品</b> A. メールボックス ..... 1 B. 取付板カバー前 ..... 1 C. 取付板カバー後 ..... 1 D. 排出ピン ..... 7		E. ビス M4×12 ..... 2 F. トレイ名称シール(ユーザー用) ..... 1	同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。  B,C は使用しない。

**Note**

The Attachment Kit(AK-736) must be installed before the mailbox is installed.

**Procedure**

Before starting installation, be sure to turn the main power switch of the machine off, and unplug the power plug from the wall outlet.

**Remarque**

L'Attachment Kit (AK-736) doit être installé avant d'installer la boîte à lettres.

**Procédure**

Avant de commencer l'installation, s'assurer de mettre la machine hors tension et de débrancher la fiche d'alimentation de la prise murale.

**Nota**

El Attachment Kit (AK-736) se debe instalar antes de la instalación del buzón de correo.

**Procedimiento**

Antes de iniciar la instalación, asegúrese de apagar el interruptor de encendido de la máquina y desenchufar el cable de alimentación de la toma de pared.

**Hinweis**

Das Attachment Kit (AK-736) muss vor der Installation der Mailbox installiert werden.

**Vorgehensweise**

Bevor Sie mit der Installation beginnen überzeugen Sie sich, dass der Netzschalter des Geräts ausgeschaltet und das Stromkabel aus der Steckdose gezogen ist.

**Nota**

Installare l'Attachment Kit (AK-736) prima di installare il vassoio mailbox.

**Procedura**

Prima di iniziare l'installazione, spegnere la macchina e scollegare la spina dalla presa di corrente.

**注**

在安装邮箱前，请先安装连接组件（AK-736）。

**安装步骤**

安装前务必关闭机器的主电源开关，并从墙壁插座拔下电源插头。

**주**

메일박스를 설치하기 전에 부착 키트 (AK-736) 를 설치해야 합니다 .

**설치순서**

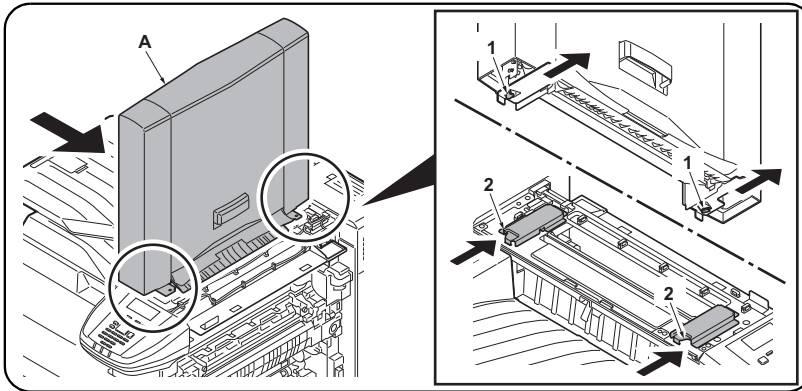
설치를 시작하기 전에 반드시 본체의 주 전원 스위치를 끄고 벽 콘센트에서 전원 플러그를 분리하십시오 .

**注意**

メールボックスを取付ける前にアタッチメントキット (AK-736) の取付けをおこなうこと。

**取付手順**

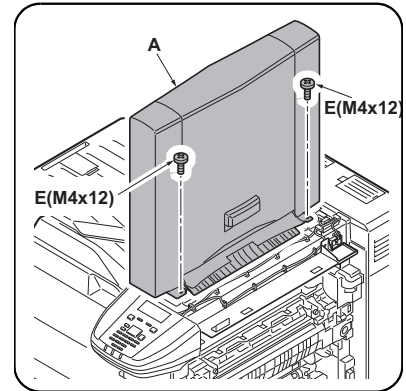
必ず機械本体の主電源スイッチを OFF にし、機械本体の電源プラグを抜いてから作業すること。



1. Insert the hooks (1) located at the front and rear of the bottom of the mailbox (A) into the notches (2) of the machine and attach the mailbox (A) to the machine.

**Note**

Lift the front and rear of the mailbox (A) lightly upward to make sure that no gap is made between the mailbox (A) and the machine.



2. Secure the mailbox (A) using the two screws M4x12 (E).

1. Insérer les crochets (1) situés à l'avant et à l'arrière du fond de la boîte à lettres (A) dans les encoches (2) de la machine et fixer la boîte aux lettres (A) à la machine.

**Remarque**

Lever légèrement l'avant et l'arrière de la boîte à lettres (A) de sorte qu'il n'y ait aucun interstice entre la boîte à lettres (A) et la machine.

2. Fixer la boîte à lettres (A) à l'aide de deux vis M4x12 (E).

1. Inserte los enganches (1) que se encuentran en la parte frontal y trasera de la parte inferior del buzón de correo (A) en las hendiduras (2) de la máquina y acople el buzón de correo (A) a la máquina.

**Nota**

Levante ligeramente la parte frontal y trasera del buzón de correo (A) para asegurarse de que no queda espacio entre el buzón de correo (A) y la máquina.

2. Fije el buzón de correo (A) con dos tornillos M4x12 (E).

1. Führen Sie die Haken (1), die sich hinten und vorne an der Unterseite der Mailbox (A) befinden, in die Aufnahmen (2) des Geräts ein und befestigen Sie die Mailbox (A) am Gerät.

**Hinweis**

Heben Sie die Vorder- und Rückseite der Mailbox (A) ein wenig an, damit sich kein Spalt zwischen der Mailbox (A) und dem Gerät bildet.

2. Sichern Sie die Mailbox (A) mit zwei Schrauben M4x12 (E).

1. Inserire i ganci (1) posti sul fronte e sul retro della sezione inferiore della mailbox (A) negli incavi (2) presenti sulla macchina e fissare la mailbox (A) sulla macchina.

**Nota**

Sollevarle leggermente la parte anteriore e posteriore della mailbox (A) verso l'alto per accertarsi che non vi sia dello spazio tra la mailbox (A) e la macchina.

2. Fissare la mailbox(A) utilizzando le due viti M4x12 (E).

1. 将位于邮箱 (A) 底部前、后侧的挂钩 (1) 插入机器的凹槽 (2)，然后将邮箱 (A) 安装至机器。

**注**

轻轻向上提升邮箱 (A) 的前后侧，确保邮箱 (A) 未处于悬浮状态。

2. 使用两个螺丝 M4x12 (E) 固定邮箱 (A)。

1. 메일박스 (A) 의 전후면 하단에 있는 후크 (1) 를 본체의 노치 (2) 에 삽입하여 메일박스 (A) 를 본체에 부착합니다.

**주**

메일박스 (A) 의 앞뒤를 각각 상방향으로 가볍게 들어 메일박스 (A) 가 떠 있지 않은 것을 확인합니다.

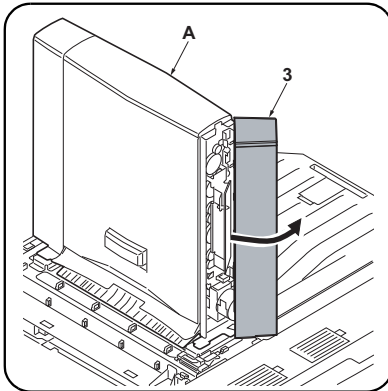
2. M4x12 나사 (E) 두 개를 사용하여 메일박스 (A) 를 고정합니다.

1. メールボックス (A) 下部の前後にあるフック (1) を機械本体の切り欠き (2) に挿入し、メールボックス (A) を機械本体に取り付ける。

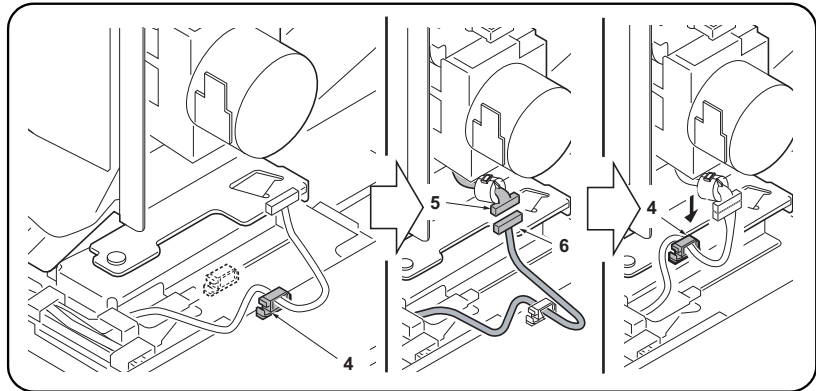
**注意**

メールボックス (A) の前後をそれぞれ上方向に軽く持ち上げ、メールボックス (A) が浮かないことを確認する。

2. ビス M4×12(E)2 本で、メールボックス (A) を固定する。



3. Remove the rear cover (3) of the mailbox (A).



4. Remove the wire saddle (4).  
 5. Plug the connector (5) of the mailbox (A) into the connector (6) of the machine body.  
 6. Install the wire saddle (4) in the position as shown in the figure.  
 7. Reinstall the rear cover (3) of the mailbox (A).

3. Retirer le couvercle arrière (3) de la boîte à lettres (A).

4. Retirer le serre-câble (4).  
 5. Brancher le connecteur (5) de la boîte à lettres (A) dans le connecteur (6) du corps de la machine.  
 6. Installer le serre-câble (4) dans la position illustrée sur la figure.  
 7. Remonter le couvercle arrière (3) de la boîte à lettres (A).

3. Quite la cubierta posterior (3) del buzón de correo (A).

4. Retire la abrazadera del cable (4).  
 5. Enchufe el conector (5) del buzón de correo (A) al conector (6) del cuerpo de la máquina.  
 6. Instale la abrazadera del cable (4) en la posición que se muestra en la imagen.  
 7. Vuelva a instalar la cubierta posterior (3) del buzón de correo (A).

3. Entfernen Sie die hintere Abdeckung (3) der Mailbox (A).

4. Entfernen Sie die Kabelbefestigung (4).  
 5. Stecken Sie den Stecker (5) der Mailbox (A) in die Steckbuchse (6) des Gerätegehäuses.  
 6. Installieren Sie die Kabelbefestigung (4) an der im Bild gezeigten Position.  
 7. Bringen Sie die hintere Abdeckung (3) der Mailbox (A) wieder an.

3. Rimuovere il coperchio posteriore (3) della mailbox (A).

4. Rimuovere l'unità sella (4).  
 5. Collegare il connettore (5) della mailbox (A) al connettore (6) del corpo macchina.  
 6. Installare l'unità sella (4) nella posizione indicata in figura.  
 7. Reinstallare il coperchio posteriore (3) della mailbox (A).

3. 拆下邮箱 (A) 的后部盖板 (3)。

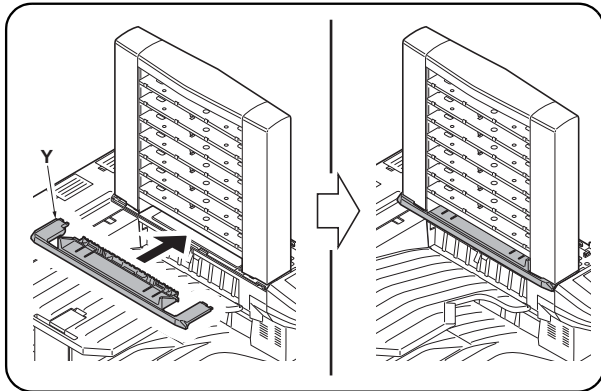
4. 取下束线夹 (4)。  
 5. 将邮箱 (A) 的接插件 (5) 插入机器的接插件 (6)。  
 6. 把束线夹 (4) 安装到图示位置。  
 7. 重新安装邮箱 (A) 的后盖板 (3)。

3. 메일박스 (A) 의 뒤커버 (3) 를 떼어냅니다 .

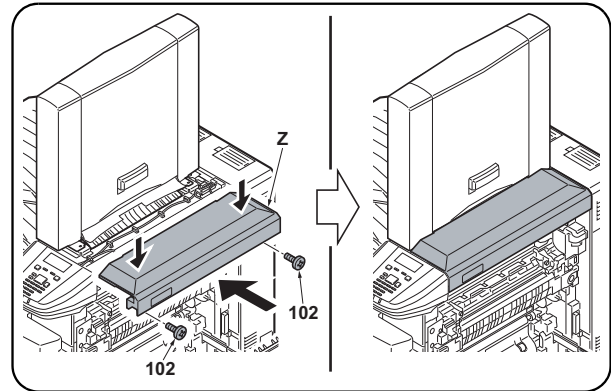
4. 와이어 새들 (4) 을 분리합니다 .  
 5. 메일박스 (A) 의 커넥터 (5) 를 본체의 커넥터 (6) 에 연결합니다 .  
 6. 와이어 새들 (4) 을 그림에 표시된 위치에 설치합니다 .  
 7. 메일박스 (A) 의 뒤커버 (3) 를 다시 장착합니다 .

3. メールボックス (A) の後カバー (3) を取り外す。

4. ワイヤースドル (4) を外す。  
 5. メールボックス (A) のコネクタ (5) を機械本体のコネクタ (6) に接続する。  
 6. ワイヤースドル (4) を図の位置に取り付ける。  
 7. メールボックス (A) の後カバー (3) を元通りに取り付ける。



8. Install the left cover (Y) in place.



9. Using the two screws (102) removed in step 2 in the installation guide for the AK-736, install the right cover (Z).  
\*While pressing the right cover(Z) downwards, fix the right cover(J).

8. Monter le couvercle gauche (Y) en position.

9. À l'aide des deux vis (102) retirées à l'étape 2 du guide d'installation pour l'AK-736, installez le capot droit (Z).  
\*Fixer le capot droit (Z) en le maintenant enfoncé vers le bas.

8. Instale la cubierta izquierda (Y) en la ubicación prevista.

9. Con los dos tornillos (102) que quitó en el paso 2 de la guía de instalación para AK-736, instale la cubierta derecha (Z).  
\*A la vez que ejerce presión sobre la cubierta derecha (Z), fije la cubierta derecha (Z).

8. Installieren Sie die linke Abdeckung (Y).

9. Mit den zwei Schrauben (102), die Sie in Schritt 2 der Installationsanleitung für das AK-736 entfernt haben, bringen Sie die rechte Abdeckung (Z) wieder an.  
\*Drücken Sie die rechte Abdeckung (Z) leicht nach unten, während Sie diese befestigen.

8. Installare il coperchio di sinistra (Y) in posizione.

9. Utilizzando le due viti (102) rimosse al punto 2 della procedura descritta nella guida di installazione del kit AK-736, installare il coperchio destro (Z).  
\*Premere verso il basso il coperchio destro (Z) per fissarlo in posizione.

8. 将左盖板 (Y) 安装到位。

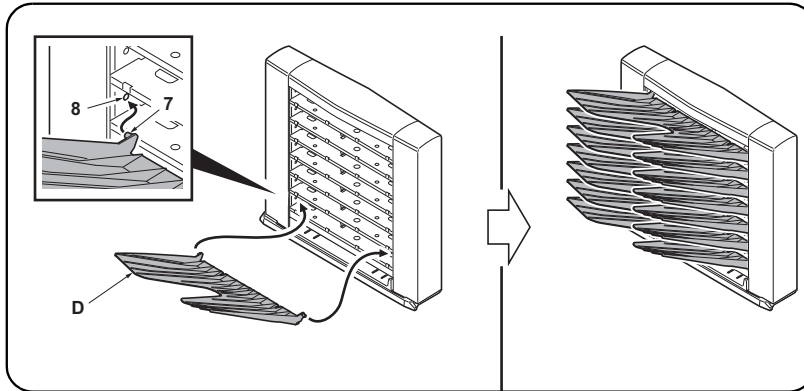
9. 请用 AK-736 安装手册步骤 2 中取下的 2 颗螺丝 (102) 来安装右盖板 (Z)。  
\*把右盖板 (Z) 边向下按, 边固定。

8. 좌측 커버 (Y) 를 제자리에 장착합니다 .

9. AK-736 설치 설명서의 2 단계에서 분리한 나사 (102) 두 개를 사용하여 우측 커버 (Z) 를 장착합니다 .  
\* 우측 커버 (Z) 를 아래쪽으로 누르는 동시에 우측 커버 (Z) 를 고정하십시오 .

8. 左カバー (Y) を取り付けます。

9. AK-736 設置手順書の手順 2 で外したビス (102) 2 本で、右カバー (Z) を取り付けます。  
\* 右カバー (Z) を下方向に押さえながら、固定する。



- 10.** Fit the seven copy eject bins (D) to the ejection section of the mailbox (A) from the lowest bin to the highest.  
Press both ends of each copy eject bin (D) to bend it a little, then fit the bin by inserting the front and rear pins (7) into the round holes (8) at the front and rear of the mailbox.

- 10.** Fixer les sept cases d'éjection de copies (D) sur la section d'éjection de la boîte à lettres (A), en procédant de la case située tout en bas à celle située tout en haut.  
Appuyer sur les deux extrémités de chaque case d'éjection des copies (D) pour cintrer légèrement cette pièce, puis monter la case en insérant les broches avant et arrière (7) dans les trous ronds (8) à l'avant et à l'arrière de la boîte à lettres.

- 10.** Presione ambos extremos de cada bandeja de expulsión de copias (D) para doblarlas un poco; después, coloque la bandeja insertando los pasadores delantero y trasero (7) en los orificios redondos (8) en la parte frontal y posterior del buzón de correo.

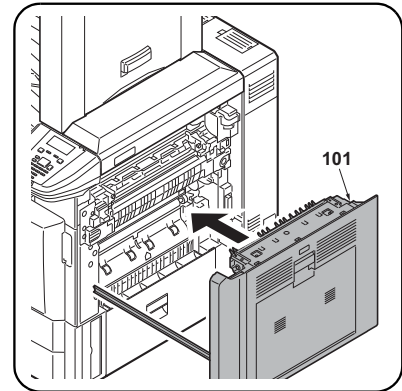
- 10.** Setzen Sie die sieben Kopienausgabefächer (D) in die Ausgabeöffnungen der Mailbox (A) ein, beginnend vom untersten Fach zum höchsten.  
Drücken Sie beide Enden jedes Kopienausgabefachs (D) zusammen, um es etwas zu biegen. Setzen Sie das Fach ein, indem Sie die vorderen und hinteren Stifte (7) in die Rundlöcher (8) vorne und hinten an der Mailbox einsetzen.

- 10.** Installare i sette scomparti di espulsione delle copie (D) nella sezione di espulsione della mailbox (A), iniziando dallo scomparto più in basso fino a quello più in alto.  
Premere le due estremità di ciascuno scomparto di espulsione delle copie (D) in modo da piegarlo leggermente, quindi installare lo scomparto inserendo i perni anteriore e posteriore (7) nei fori rotondi (8) presenti sul fronte e sul retro della mailbox.

- 10.** 从邮箱 (A) 的排出部下面起按顺序安装 7 个接纸盘 (D)。  
按住接纸盘 (D) 的左右两侧并使其稍稍下垂, 通过将前后的销钉 (7) 插入邮箱前后的圆孔 (8) 中来安装接纸盘。

- 10.** 배출핀 (D) 7 개를 메일박스 (A) 의 배출부에 밑에서부터 순서대로 장착합니다.  
배출핀 (D) 의 좌우를 밀어 조금 휘게해 앞뒤의 핀 (7) 을 메일박스의 앞뒤의 둥근 구멍 (8) 에 삽입합니다.

- 10.** 排出ピン (D) 7 枚をメールボックス (A) の排出部に下から順番に取り付ける。  
排出ピン (D) の左右を押し少ししたませ、前後のピン (7) をメールボックスの前後の丸穴 (8) に挿入する。



- 11.** Close the paper conveying unit (101).  
**12.** Insert the power plug from the machine into the outlet, turn the main power switch on, and verify the machine operates normally.

- 11.** Fermer l'unité de transport du papier (101).  
**12.** Insérer la fiche d'alimentation de la machine dans la prise et mettre la machine sous tension, puis vérifier qu'elle fonctionne correctement.

- 11.** Cierre la unidad de transporte de papel (101).  
**12.** Enchufe el cable de alimentación de la máquina en la toma de corriente y encienda el interruptor principal para comprobar que la máquina funciona correctamente.

- 11.** Schließen Sie die Papierführung (101).  
**12.** Stecken Sie den Netzstecker des Geräts in eine Steckdose und schalten Sie den Hauptschalter des Geräts ein, um den Betrieb zu prüfen.

- 11.** Chiudere l'unità trasporto carta (101).  
**12.** Inserire la spina nella presa di corrente, accendere la macchina e controllare che funzioni correttamente.

- 11.** 关闭纸张传输单元 (101)。  
**12.** 将机器的电源插头插入插座, 然后打开主电源开关并确认机器能否正常操作。

- 11.** 반송 유닛 (101) 을 닫습니다.  
**12.** 기기본체의 전원 플러그를 콘센트에 꽂고 주 전원 스위치를 ON 으로 해서 동작을 확인합니다.

- 11.** 搬送ユニット (101) を閉じる。  
**12.** 機械本体の電源プラグをコンセントに差し込み、主電源スイッチを ON にして動作を確認する。



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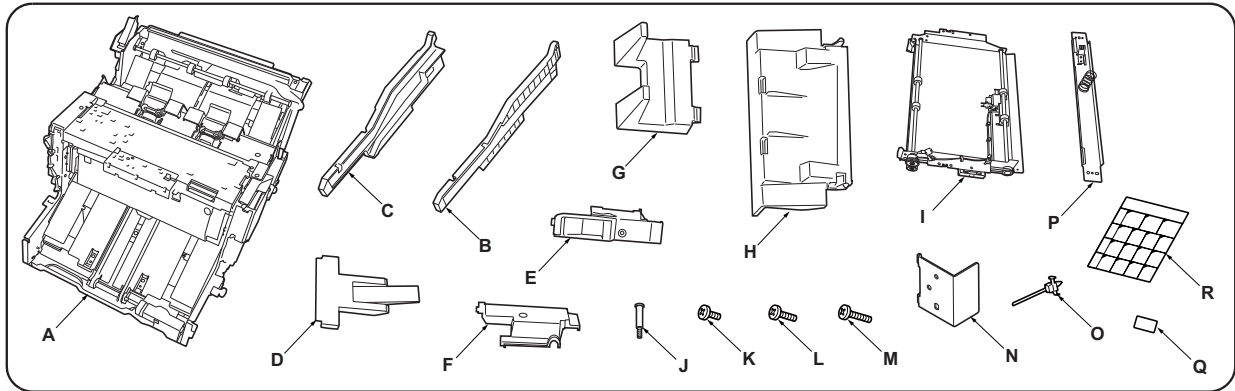


**(6)BF-730**

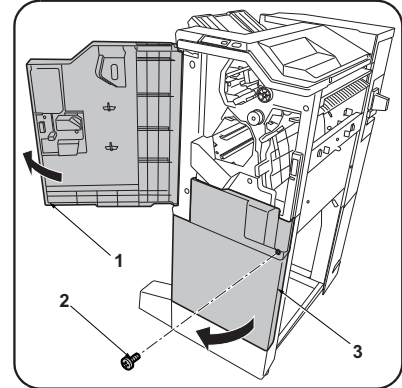
# **BF-730**

## **(Folding Unit)**

# **Installation Guide**



<b>English</b>		E. Front side cover..... 1	L. M4 x 10 screw (black)..... 2
Supplied parts		F. Rear side cover..... 1	M. M4 x 12 screw ..... 4
A. Center-Folding unit..... 1	G. Output stock tray..... 1	H. Output tray..... 1	N. Lock plate ..... 2
B. Front rail..... 1	I. Relay paper conveying unit..... 1	J. Pin..... 1	O. Binding band..... 1
C. Rear rail..... 1	K. M4 x 8 screw..... 11	L. M4 x 10 screw (black)..... 2	P. Guide..... 1
D. Output stopper..... 1		M. M4 x 12 screw ..... 4	Q. D7 label..... 1
		N. Lock plate ..... 2	R. Operation label ..... 1
		O. Binding band..... 1	
		P. Guide..... 1	
		Q. D7 label..... 1	
		R. Operation label ..... 1	
<b>Français</b>		E. Capot latéral avant..... 1	L. Vis M4 x 10 (noire)..... 2
Pièces fournies		F. Capot latéral arrière..... 1	M. Vis M4 x 12..... 4
A. Plieuse..... 1	G. Plateau de sortie du papier..... 1	H. Plateau de sortie..... 1	N. Plaque de verrouillage..... 2
B. Glissière avant..... 1	I. Unité de transport du papier de relais..... 1	J. Goupille..... 1	O. Collier de fixation..... 1
C. Glissière arrière..... 1	K. Vis M4 x 8..... 11	L. Vis M4 x 10 (noire)..... 2	P. Guide..... 1
D. Butée de sortie..... 1		M. Vis M4 x 12..... 4	Q. Étiquette D7..... 1
		N. Plaque de verrouillage..... 2	R. Étiquette de fonctionnement..... 1
		O. Collier de fixation..... 1	
		P. Guide..... 1	
		Q. Étiquette D7..... 1	
		R. Étiquette de fonctionnement..... 1	
<b>Español</b>		E. Cubierta lateral frontal..... 1	L. Tornillo M4 x 10 (negro)..... 2
Partes suministradas		F. Cubierta lateral posterior..... 1	M. Tornillo M4 x 12..... 4
A. Unidad de plegado..... 1	G. Bandeja de recolección de papel de salida... 1	H. Bandeja de salida..... 1	N. Placa de cierre..... 2
B. Carril frontal..... 1	I. Unidad de transporte de papel por relevador... 1	J. Pasador..... 1	O. Correa de sujeción..... 1
C. Carril posterior..... 1	K. Tornillo M4 x 8..... 11	L. Tornillo M4 x 10 (negro)..... 2	P. Guía..... 1
D. Tope de salida..... 1		M. Tornillo M4 x 12..... 4	Q. Etiqueta D7..... 1
		N. Placa de cierre..... 2	R. Etiqueta de funcionamiento..... 1
		O. Correa de sujeción..... 1	
		P. Guía..... 1	
		Q. Etiqueta D7..... 1	
		R. Etiqueta de funcionamiento..... 1	
<b>Deutsch</b>		E. Vordere Seitenabdeckung..... 1	L. M4 x 10 Schraube (schwarz)..... 2
Gelieferte Teile		F. Hintere Seitenabdeckung..... 1	M. M4 x 12 Schraube..... 4
A. Mittenfalteinheit..... 1	G. Ausgabestapel Fach..... 1	H. Ausgabefach..... 1	N. Sperrplatte..... 2
B. Vordere Schiene..... 1	I. Eingesetzte Papierfördereinheit..... 1	J. Stift..... 1	O. Schellenband..... 1
C. Hintere Schiene..... 1	K. M4 x 8 Schraube..... 11	L. M4 x 10 Schraube (schwarz)..... 2	P. Führung..... 1
D. Ausgabeanschlag..... 1		M. M4 x 12 Schraube..... 4	Q. D7 Aufkleber..... 1
		N. Sperrplatte..... 2	R. Bedienungsaufkleber..... 1
		O. Schellenband..... 1	
		P. Führung..... 1	
		Q. D7 Aufkleber..... 1	
		R. Bedienungsaufkleber..... 1	
<b>Italiano</b>		E. Coperchio laterale anteriore..... 1	L. Vite M4 x 10 (nera)..... 2
Parti di fornitura		F. Coperchio laterale posteriore..... 1	M. Vite M4 x 12..... 4
A. Unità di piegatura centrale..... 1	G. Vassoio di uscita stoccaggio..... 1	H. Vassoio di uscita..... 1	N. Piastra di bloccaggio..... 2
B. Rotaia anteriore..... 1	I. Unità relay di trasporto carta..... 1	J. Perno..... 1	O. Fascetta di legatura..... 1
C. Rotaia posteriore..... 1	K. Vite M4 x 8..... 11	L. Vite M4 x 10 (nera)..... 2	P. Guida..... 1
D. Fermo di uscita..... 1		M. Vite M4 x 12..... 4	Q. Etichetta D7..... 1
		N. Piastra di bloccaggio..... 2	R. Etichetta di operazione..... 1
		O. Fascetta di legatura..... 1	
		P. Guida..... 1	
		Q. Etichetta D7..... 1	
		R. Etichetta di operazione..... 1	
<b>简体中文</b>		E. 前部侧盖板..... 1	L. M4×10 螺丝 (黑)..... 2
附属品		F. 后部侧盖板..... 1	M. M4×12 螺丝..... 4
A. 中缝装订一折页单元..... 1	G. 堆纸托盘..... 1	H. 排纸托盘..... 1	N. 锁定板..... 2
B. 前部导轨..... 1	I. 中间搬运单元..... 1	J. 销钉..... 1	O. 束线带..... 1
C. 后部导轨..... 1	K. M4×8 螺丝..... 11	L. M4×10 螺丝 (黑)..... 2	P. 导板..... 1
D. 排纸挡板..... 1		M. M4×12 螺丝..... 4	Q. D7 标签..... 1
		N. 锁定板..... 2	R. 操作标签..... 1
		O. 束线带..... 1	
		P. 导板..... 1	
		Q. D7 标签..... 1	
		R. 操作标签..... 1	
<b>한국어</b>		E. 사이드 커버 앞..... 1	L. 나사 M4×10 (흑)..... 2
동봉품		F. 사이드 커버 뒤..... 1	M. 나사 M4×12..... 4
A. 접기 유니트..... 1	G. 배지 저장 트레이..... 1	H. 배지 트레이..... 1	N. 잠금 플레이트..... 2
B. 레일 앞..... 1	I. 중계 반송 유니트..... 1	J. 핀..... 1	O. 결속 밴드..... 1
C. 레일 뒤..... 1	K. 나사 M4×8..... 11	L. 나사 M4×10 (흑)..... 2	P. 가이드..... 1
D. 배지 스톱퍼..... 1		M. 나사 M4×12..... 4	Q. D7 라벨..... 1
		N. 잠금 플레이트..... 2	R. 조작라벨..... 1
		O. 결속 밴드..... 1	
		P. 가이드..... 1	
		Q. D7 라벨..... 1	
		R. 조작라벨..... 1	
<b>日本語</b>		E. サイドカバー前..... 1	L. ビス M4×10(黒)..... 2
同梱品		F. サイドカバー後..... 1	M. ビス M4×12..... 4
A. 中折りユニット..... 1	G. 排紙ストックトレイ..... 1	H. 排紙トレイ..... 1	N. ロックプレート..... 2
B. レール前..... 1	I. 中継搬送ユニット..... 1	J. ピン..... 1	O. 結束バンド..... 1
C. レール後..... 1	K. ビス M4×8..... 11	L. ビス M4×10(黒)..... 2	P. ガイド..... 1
D. 排紙ストッパー..... 1		M. ビス M4×12..... 4	Q. D7 ラベル..... 1
		N. ロックプレート..... 2	R. 操作ラベル..... 1
		O. 結束バンド..... 1	
		P. ガイド..... 1	
		Q. D7 ラベル..... 1	
		R. 操作ラベル..... 1	



Be sure to remove any tape and/or cushioning material from supplied parts.

**Procedure**  
Before installing the center-folding unit, turn the MFP's main power switch off and unplug the power cable from the power supply. Install the document finisher, and then install the center-folding unit.

1. Open the upper front cover (1) of the document finisher.  
2. Remove the screw (2) and open the lower front cover (3).  
(NOTICE)  
Discard the screw (2) and do not fasten the lower front cover (3).

Veillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.

**Procédure**  
Avant d'installer la plieuse, mettez l'interrupteur d'alimentation principal du MFP hors tension et débranchez le câble d'alimentation de la prise de courant. Installez le finisseur de document, puis installez la plieuse.

1. Ouvrir le couvercle avant supérieur (1) du retoucheur de document.  
2. Déposer la vis (2) et ouvrir le couvercle avant inférieur (3).  
(AVIS)  
Jeter la vis (2) et ne pas fixer le capot inférieur avant (3).

Asegúrese de despegar todas las cintas y/o material amortiguador de las partes suministradas.

**Procedimiento**  
Antes de instalar la unidad de plegado, desconecte el interruptor de alimentación principal de la MFP y desenchufe el cable de alimentación de la toma de corriente. Instale primero el finalizador de documentos y luego instale la unidad de plegado.

1. Abra la cubierta frontal superior (1) del finalizador de documentos.  
2. Quite el tornillo (2) y abra la cubierta frontal inferior (3).  
(AVISO)  
Descarte el tornillo (2) y no ajuste la cubierta frontal inferior (3).

Entfernen Sie Klebeband und/oder Dämpfungsmaterial vollständig von den mitgelieferten Teilen.

**Verfahren**  
Bevor Sie mit dem Einbau der Mittenfalteinheit beginnen, stellen Sie sicher, dass der Hauptschalter des Kopierers ausgeschaltet und das Netzkabel aus der Steckdose gezogen ist. Bringen Sie den Dokument-Finisher zuerst und dann erst die Mittenfalteinheit an.

1. Öffnen Sie die obere vordere Abdeckung (1) des Dokument-Finishers.  
2. Entfernen Sie die Schraube (2) und öffnen Sie die untere vordere Abdeckung (3).  
(HINWEIS)  
Entsorgen Sie die Schraube (2) und befestigen Sie nicht die untere vordere Abdeckung (3).

Accertarsi di rimuovere tutti i nastri adesivi e/o il materiale di imbottitura dalle parti fornite.

**Procedura**  
Prima di installare l'unità di piegatura centrale, assicurarsi che l'interruttore principale della fotocopiatrice sia spento e che il cavo di alimentazione non sia inserito nella presa. Installare prima la finitrice e poi procedere all'installazione dell'unità di piegatura centrale.

1. Aprire il coperchio superiore anteriore (1) della finitrice di documenti.  
2. Rimuovere la vite (2) ed aprire il coperchio inferiore anteriore (3).  
(NOTIFICA)  
Eliminare le viti (2) e non fissare il coperchio inferiore anteriore (3).

如果附属品上带有固定胶带, 缓冲材料时务必揭下。

**安装步骤**  
安装中缝装订 — 折页单元前, 请关闭 MFP 的主电源开关并从电源拔下电源线。安装装订器, 然后安装中缝装订 — 折页单元。

1. 打开装订器的前部上盖板 (1)。  
2. 拆除 1 颗螺丝 (2), 打开前部下盖板 (3)。  
(注意)  
废除螺丝 (2), 前部下盖板 (3) 不需固定。

동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거할 것.

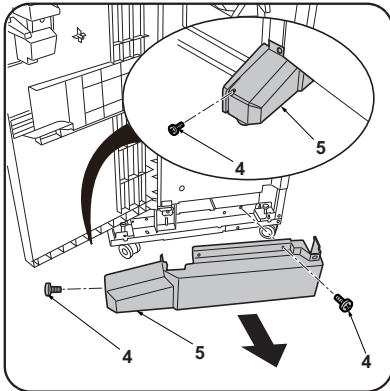
**장착순서**  
중첩 유닛을 설치할 때에는 반드시 MFP 본체의 주전원 스위치를 OFF 로 하고 전원플러그를 뽑은 후 작업을 할 것.  
문서 피니셔를 설치 후, 중첩 유닛을 설치 할 것.

1. 문서 피니셔 앞 상커버 (1) 를 엽니다.  
2. 나사 (2) 1 개를 제거하고 앞 하커버 (3) 를 엽니다.  
(주의)  
나사 (2) 는 폐기하고 전면 아래커버 (3) 는 고정하지 않습니다.

同梱品に固定テープ、緩衝材がついている場合は、必ず取り外すこと。

**取付手順**  
中折りユニットを設置するときは、必ず MFP 本体の主電源スイッチを OFF にし、電源プラグを抜いてから作業すること。  
ドキュメントフィニッシャーを設置後、中折りユニットを設置すること。

1. ドキュメントフィニッシャーの前上カバー (1) を開く。  
2. ビス (2) 1 本を外し、前下カバー (3) を開く。  
(注意)  
ビス (2) は廃棄とし、前下カバー (3) は固定しない。



3. Remove the 2 screws (4) and remove the foot cover (5).

3. Déposer les 2 vis (4) puis le couvercle du pied (5).

3. Quite los 2 tornillos (4) y quite la cubierta de la pata (5).

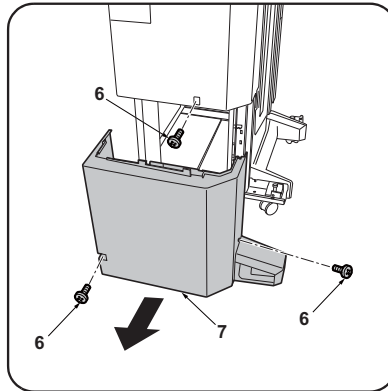
3. Entfernen Sie die 2 Schrauben (4) und nehmen Sie die Fußabdeckung (5) ab.

3. Rimuovere le 2 viti (4) e quindi rimuovere la copertura del piede (5).

3. 拆除 2 顆螺絲 (4)，拆下腳座蓋板 (5)。

3. 나사 (4) 2 개를 제거하고, 풋커버 (5) 를 제거합니다.

3. ビス (4) 2 本を外し、フットカバー (5) を取り外す。



4. Remove the 3 screws (6) and remove the lower rear cover (7).

4. Déposer les 3 vis (6) puis le couvercle arrière inférieur (7).

4. Quite los 3 tornillos (6) y quite la cubierta posterior inferior (7).

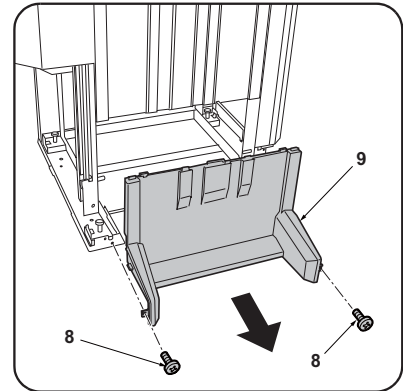
4. Entfernen Sie die 3 Schrauben (6) und nehmen Sie die untere hintere Abdeckung (7) ab.

4. Rimuovere le 3 viti (6) e quindi rimuovere il coperchio inferiore posteriore (7).

4. 拆除 3 顆螺絲 (6)，拆下后部下蓋板 (7)。

4. 나사 (6) 3 개를 제거하고, 뒤 하커버 (7) 를 제거합니다.

4. ビス (6) 3 本を外し、後下カバー (7) を取り外す。



5. Remove 2 screws (8) and remove the lower middle cover (9).

5. Déposer les 2 vis (8) et le couvercle intermédiaire inférieur (9).

5. Quite los 2 tornillos (8) y quite la cubierta intermedia inferior (9).

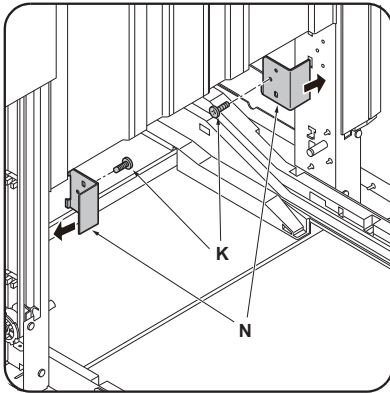
5. Entfernen Sie die 2 Schrauben (8) und nehmen Sie die untere mittlere Abdeckung (9) ab.

5. Rimuovere le 2 viti (8) e quindi rimuovere il pannello centrale inferiore (9).

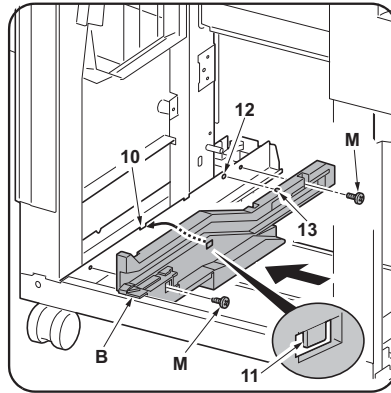
5. 拆除 2 顆螺釘 (8)，拆下中部下蓋板 (9)。

5. 나사 (8) 2 개를 제거하고 중하 커버 (9) 를 떼어 냅니다.

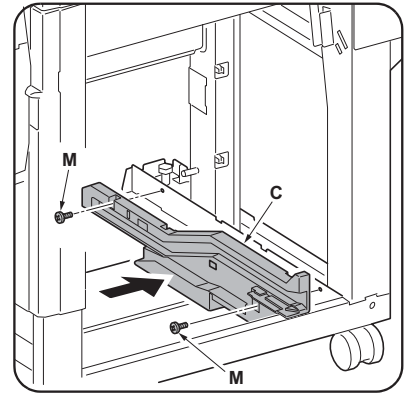
5. ビス (8) 2 本を外し、中下カバー (9) を取り外す。



6. Install the lock plates (N) on the front and rear supports using an M4 x 8 screw (K) each.



7. Place the hook (11) of the front rail (B) on the notch (10) at the front of the document finisher, at the same time inserting the projection (13) on the front rail (B) in the hole (12) in the document finisher.  
8. Fix the front rail (B) using 2 M4 x 12 screws (M).



9. Install the rear rail (C) at the rear of the document finisher using 2 M4 x 12 screws (M) in the same way.

6. Monter les plaques de verrouillage (N) sur les supports avant et arrière en procédant à l'aide d'une vis M4 x 8 (K) dans les deux cas.

7. Placer le crochet (11) de la glissière avant (B) dans l'encoche (10) à l'avant du retoucheur de document tout en insérant la saillie (13) de la glissière avant (B) dans le trou (12) du retoucheur de document.  
8. Fixer la glissière avant (B) à l'aide de 2 vis M4 x 12 (M).

9. Monter la glissière arrière (C) au dos du retoucheur de document en procédant de la même façon et à l'aide de 2 vis M4 x 12 (M).

6. Instale las placas de cierre (N) en los soportes frontal y posterior usando un tornillo M4 x 8 (K) en cada uno.

7. Coloque el gancho (11) del carril frontal (B) en la muesca (10) de la parte frontal del finalizador de documentos al mismo tiempo que inserta el resalto (13) del carril frontal (B) en el orificio (12) del finalizador de documentos.  
8. Fije el carril frontal (B) usando 2 tornillos M4 x 12 (M).

9. Instale el carril posterior (C) en la parte posterior del finalizador de documentos usando 2 tornillos M4 x 12 (M) de la misma forma.

6. Montieren Sie die Sperrplatten (N) an den vorderen und hinteren Stützen mit jeweils einer M4 x 8 Schraube (K).

7. Setzen Sie den Haken (11) der vorderen Schiene (B) in die Aussparung (10) vorne am Dokument-Finisher ein, und setzen Sie dabei auch den Vorsprung (13) an der vorderen Schiene (B) in die Öffnung (12) des Dokument-Finishers ein.  
8. Befestigen Sie die vordere Schiene (B) mit den 2 M4 x 12 Schrauben (M).

9. Montieren Sie die hintere Schiene (C) auf gleiche Weise mit 2 M4 x 12 Schrauben (M) an der Rückseite des Dokument-Finishers.

6. Installare le piastre di bloccaggio (N) sui supporti anteriore e posteriore utilizzando una vite M4 x 8 (K) ciascuna.

7. Posizionare il gancio (11) della rotaia anteriore (B) sull'incavo (10) alla parte anteriore della finitrice di documenti, contemporaneamente inserire la sporgenza (13) sulla rotaia anteriore (B) nel foro (12) nella finitrice di documenti.  
8. Fissare la rotaia anteriore (B) utilizzando 2 viti M4 x 12 (M).

9. Installare la rotaia posteriore (C) alla parte posteriore della finitrice di documenti utilizzando 2 viti M4 x 12 (M) alla stessa maniera.

6. 使用各1顆M4×8(K) 螺釘將鎖定板 (N) 安裝在前後的支柱上。

7. 將前部導軌 (B) 的掛鉤 (11) 嵌入裝訂器前部的缺口 (10)，同時將前部導軌 (B) 的卡銷 (13) 插入到裝訂器的孔 (12) 中。  
8. 使用2顆M4×12(M) 螺釘來固定前部導軌 (B)。

9. 按相同方法，使用2顆M4×12(M) 螺釘將后部導軌 (C) 安裝在裝訂器后部。

6. 잠금 플레이트 (N) 를 앞뒤 지주에 나사 M4×8(K) 각 1 개로 장착합니다 .

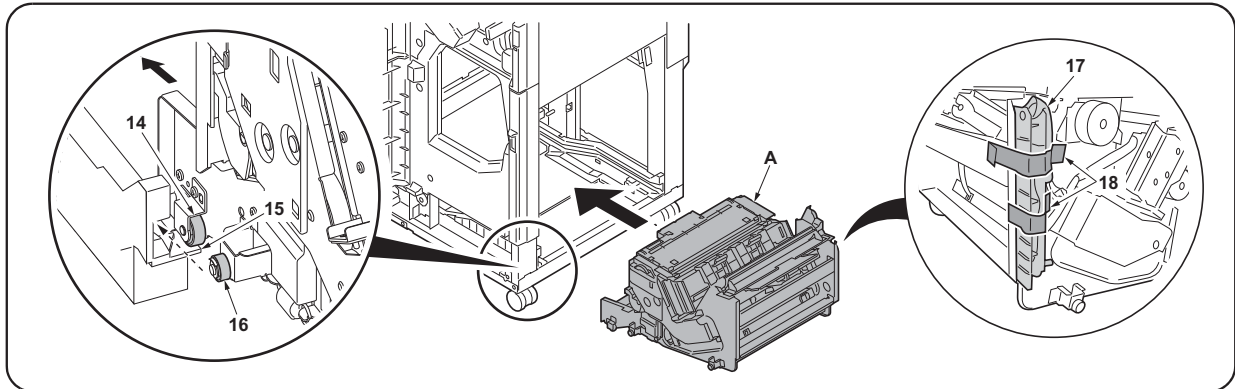
7. 문서 피니셔 앞의 이음부분 (10) 에 레일 앞 (B) 의 후크 (11) 를 걸고 동시에 문서 피니셔 구멍 (12) 에 레일 앞 (B) 의 보스 (13) 를 넣습니다 .  
8. 나사 M4×12(M) 2 개로 레일 앞 (B) 을 고정합니다 .

9. 같은 방식으로 나사 M4×12(M) 2 개로 문서 피니셔 뒤에 레일 뒤 (C) 를 장착합니다 .

6. ロックプレート (N) を前後の支柱にビス M4×8(K) 各1本で取り付ける。

7. ドキュメントフィニッシャー前の切り欠き (10) にレール前 (B) のフック (11) を引っかけ、同時にドキュメントフィニッシャーの穴 (12) にレール前 (B) のボス (13) を入れる。  
8. ビス M4×12(M) 2本でレール前 (B) を固定する。

9. 同様に、ビス M4×12(M) 2本で、ドキュメントフィニッシャー後にレール後 (C) を取り付ける。



10. Place the left rollers (14) at the front and rear of the center-folding unit (A) on the tracks (15) on the inner sides of the rails, and roll in the direction shown. The middle rollers (16) will roll onto the rails.
11. Insert the center-folding unit (A) into the document finisher along the rails.  
(NOTICE)  
Insert without removing the fixing tape (18) for the cable guide (17). (The fixing tape (18) is removed at step 15)

10. Disposer les rouleaux gauche (14) à l'avant et à l'arrière de la plieuse (A) sur les voies (15) de côté interne des glissières et faire rouler dans la direction indiquée. Les rouleaux intermédiaires (16) vont se placer d'eux-mêmes sur les glissières.
11. Insérer la plieuse (A) dans le retourneur de document le long des glissières.  
(AVIS)  
Insérer sans enlever la bande adhésive de fixation (18) pour le guide câble (17). (La bande adhésive de fixation (18) est enlevée à l'étape 15.)

10. Coloque los rodillos izquierdos (14) en las partes frontal y posterior de la unidad de plegado (A) en las pistas (15) de los lados internos de los carriles y hágalos rodar en la dirección de la ilustración. Los rodillos intermedios (16) rodarán sobre los carriles.
11. Inserte la unidad de plegado (A) en el finalizador de documentos a lo largo de los carriles.  
(AVISO)  
Inserte sin quitar la cinta de fijación (18) de la guía para el cable (17). (La cinta de fijación (18) se quita en el paso 15.)

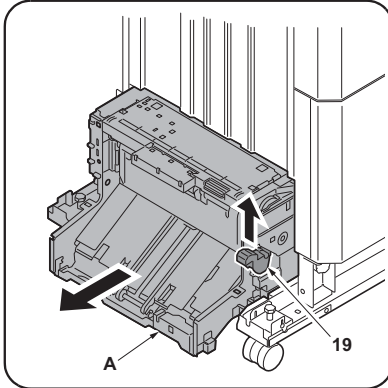
10. Setzen Sie die linken Rollen (14) an der Vorderseite und Rückseite der Mittenfalteinheit (A) auf die Bahnen (15) an den Innenseiten der Schienen, und rollen Sie sie in der dargestellten Richtung. Die mittleren Rollen (16) rollen nun auf die Schienen.
11. Schieben Sie die Mittenfalteinheit (A) entlang den Schienen in den Dokument-Finisher ein.  
(HINWEIS)  
Schieben Sie sie ein, ohne das Klebeband (18) für die Kabelführung (17) zu entfernen. (Das Klebeband (18) wird bei Schritt 15 entfernt.)

10. Posizionare i rulli di sinistra (14) alla parte anteriore e posteriore dell'unità di piegatura centrale (A) sulle piste (15) sui lati interni delle rotaie, e farli scorrere nella direzione mostrata. I rulli intermedi (16) scorreranno sulle rotaie.
11. Inserire l'unità di piegatura centrale (A) nella finitrice di documenti lungo le rotaie.  
(NOTIFICA)  
Inserire senza rimuovere il nastro di fissaggio (18) per la guida cavi (17). (Il nastro di fissaggio (18) viene rimosso al punto 15)

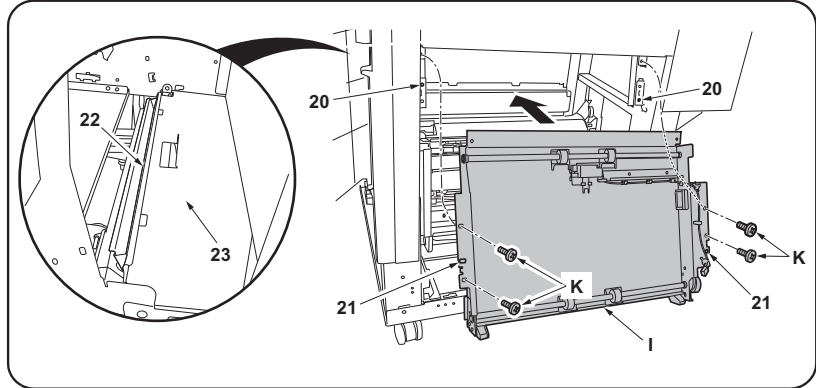
10. 将中缝装订-折页单元 (A) 前后的左侧滑轮 (14) 放在导轨内侧的转动部 (15) 上, 并按箭头方向转动。将中间滑轮 (16) 插入到导轨上。
11. 将中缝装订-折页单元 (A) 沿着导轨插入到装订器中。  
(注意)  
插入时不需剥除电线导板 (17) 的固定胶带 (18)。(在步骤 15 时剥除固定胶带 (18))

10. 접기 유닛 (A) 의 앞뒤에 있는 좌측 코로 (14) 를 레일 내측에 있는 굴림부 (15) 에 얹고 화살표 방향으로 굴립니다. 중간코로 (16) 가 레일에 삽입됩니다.
11. 접기 유닛 (A) 를 레일에 붙여 문서 피니셔에 삽입합니다.  
(주의)  
전선 가이드 (17) 의 고정 테이프 (18) 를 떼어 내지 않고 삽입할 것. (고정 테이프 (18) 는 순서 15 에서 떼어 냅니다.)

10. 中折りユニット (A) の前後にある左コロ (14) を、レールより内側にある転がし部 (15) に乗せ、矢印方向に転がす。中間コロ (16) がレールに挿入される。
11. 中折りユニット (A) をレールに沿ってドキュメントフィニッシャーに挿入する。  
(注意)  
電線ガイド (17) の固定テープ (18) を剥がさずに挿入すること。(固定テープ (18) は手順 15 で剥がす)



12. Release the lock lever (19) and pull out the center-folding unit (A) to the left of the document finisher.



13. Align the holes (21) in the relay paper conveying unit (I) with the 2 projections (20) on the document finisher. Install so that the lip (22) on the top frame of the relay paper conveying unit rests on the document finisher's frame (23).

14. Install the relay paper conveying unit (I) using 4 M4 × 8 screws (K).

12. Libérer le levier de verrouillage (19) et sortir la unité de plegado (A) par la gauche du retoucheur de document.

13. Aligner les trous (21) de l'unité de transport de relais (I) avec les 2 saillies (20) du retoucheur de document. Procéder de sorte que la lèvre (22) du châssis supérieur de l'unité de transport de relais repose sur le châssis du retoucheur de document (23).

14. Installer l'unité de transport de relais (I) à l'aide de 4 vis M4 × 8 (K).

12. Libere la palanca de bloqueo (19) y extraiga la unidad de plegado (A) hacia la izquierda del finalizador de documentos.

13. Alinee los orificios (21) de la unidad de transporte de papel (I) con los dos resaltes (20) del finalizador de documentos. Instale de forma tal que el reborde (22) del marco superior de la unidad de transporte de papel apoye en el marco del finalizador de documentos (23).

14. Instale la unidad de transporte de papel porrelevador (I) usando 4 tornillos M4 × 8 (K).

12. Lösen Sie den Verriegelungshebel (19) und ziehen Sie die Mittenfalteinheit (A) zur linken Seite des Dokument-Finishers heraus.

13. Richten Sie die Öffnungen (21) der eingesetzten Papierfördereinheit (I) auf die 2 Vorsprünge (20) des Dokument-Finishers aus. Montieren Sie so, dass die Lippe (22) am oberen Rahmen der eingesetzten Papierfördereinheit auf dem Rahmen des Dokument-Finishers (23) ruht.

14. Montieren Sie die eingesetzte Papierfördereinheit (I) mit 4 M4 × 8 Schrauben (K).

12. Rilasciare la leva di blocco (19) e quindi estrarre l'unità di piegatura centrale (A) alla sinistra della finitrice di documenti.

13. Allineare i fori (21) nell'unità relay di trasporto carta (I) con le 2 sporgenze (20) sulla finitrice di documenti. Installare in modo che il bordo (22) sulla struttura superiore dell'unità relay di trasporto carta rimanga sulla struttura (23) della finitrice di documenti.

14. Installare l'unità relay di trasportocarta (I) utilizzando 4 viti M4 × 8 (K).

12. 解除锁定杆 (19), 将中缝装订 - 折页单元 (A) 从文档整理器的左侧拉出。

13. 将装订器的 2 处突出部 (20) 与中间搬运单元 (I) 的孔 (21) 对齐。将中间搬运单元上部框架的弯曲部 (22) 放在装订器的框架上 (23) 以进行安装。

14. 使用 4 颗 M4×8 (K) 螺钉来安装后中间搬运单元 (I)。

12. 잠금레버 (19) 를 해제하고 중첩 유니트 (A) 를 문서 피니셔 좌측으로 이동시킵니다 .

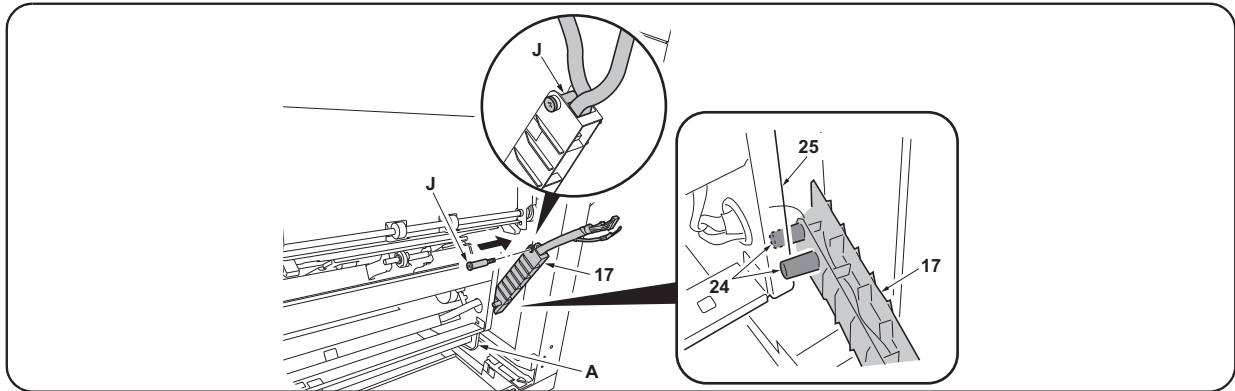
13. 문서 피니셔의 돌기 (20) 2 개로 중계반송 유니트 (I) 의 구멍 (21) 을 맞춥니다 . 중계반송 유니트 상부 프레임의 구부러진 부분 (22) 이 문서 피니셔의 프레임 (23) 에 얹히게 장착합니다 .

14. 나사 M4×8(K) 4 개로 중계반송 유니트 (I) 를 장착합니다 .

12. ロックレバー (19) を解除し、中折りユニット (A) をドキュメントフィニッシャー左側へ引き出す。

13. ドキュメントフィニッシャーの突起 (20) 2 個に中継搬送ユニット (I) の穴 (21) を合わせる。中継搬送ユニット上部フレームの折曲がり部 (22) がドキュメントフィニッシャーのフレーム (23) に乗るように取り付ける。

14. ビス M4×8(K) 4 本で、中継搬送ユニット (I) を取り付ける。



15. Remove the fixing tape (18) for the wire guide (17) and insert the pin (J) into the wire guide (17), with the 2 projections (24) on either side of the frame (25).

(NOTICE)

Insert the pin (J) to keep wires in the wire guide (17).

16. Screw the pin (J) into the document finisher to anchor the wire guide (17).

15. Enlever la bande adhésive de fixation (18) du guide câble (17) et insérer la goupille (J) dans le guide câble (17) avec les 2 saillies (24) de chaque côté du bâti (25).

(AVIS)

Insérer la goupille (J) pour que les câbles demeurent dans le guide câble (17).

16. Visser la goupille (J) dans le retoucheur de document pour fixer le guide câble (17) en place.

15. Quite la cinta de fijación (18) de la guía para el cable (17) e inserte el pasador (J) en la guía para el cable (17) con los 2 resaltes (24) a cada lado del marco (25).

(AVISO)

Inserte el pasador (J) para mantener los cables en la guía para el cable (17).

16. Atornille el pasador (J) en el finalizador de documentos para anclar la guía para el cable (17).

15. Entfernen Sie das Klebeband (18) für die Kabelführung (17) und stecken Sie die Rändelschraube (J) in die Kabelführung (17), wobei der Rahmen (25) zwischen den 2 Vorsprüngen (24) liegen muss.

(HINWEIS)

Stecken Sie die Rändelschraube (J) ein, um die Kabel in der Kabelführung (17) zu halten.

16. Schrauben Sie die Rändelschraube (J) in den Dokument-Finisher, um die Kabelführung (17) zu verankern.

15. Rimuovere il nastro di fissaggio (18) per la guida cavi (17) e quindi inserire il perno (J) nella guida cavi (17), con le 2 sporgenze (24) su ciascun lato della struttura (25).

(NOTIFICA)

Inserire il perno (J) per mantenere i cavi nella guida cavi (17).

16. Avvitare il perno (J) nella finitrice di documenti per ancorare la guida cavi (17).

15. 剥除电线导板 (17) 的固定胶带 (18)，使框架 (25) 处于 2 个卡销 (24) 之间，将 1 个销子 (J) 从电线导板 (17) 上穿过。

(注意)

将销钉 (J) 穿过电线导板 (17) 时，注意避免电线露出电线导板 (17) 外。

16. 将销钉 (J) 的螺纹部分安装到装订器上，以固定电线导板 (17)。

15. 전선 가이드 (17) 의 고정 테이프 (18) 를 떼어 내고 보스 (24) 2 개의 사이에 프레임 (25) 이 들어 있는 상태에서 핀 (J) 1 개를 전선 가이드 (17) 에 통과시킵니다.

(주의)

핀 (J) 은 전선이 전선 가이드 (17) 에서 나오지 않도록 통하게 합니다.

16. 핀 (J) 의 나사부분을 문서 피니셔에 장착하고 전선 가이드 (17) 를 고정합니다.

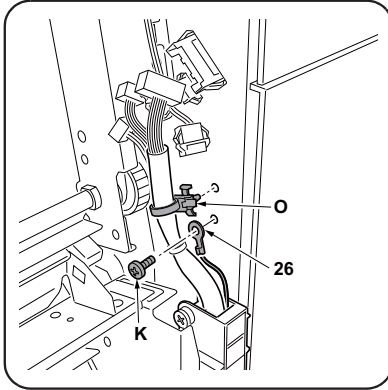
15. 電線ガイド (17) の固定テープ (18) を剥がし、ボス (24) 2 本 の間にフレーム (25) が入っている状態で、ピン (J) 1 本を電線ガイド (17) に通す。

(注意)

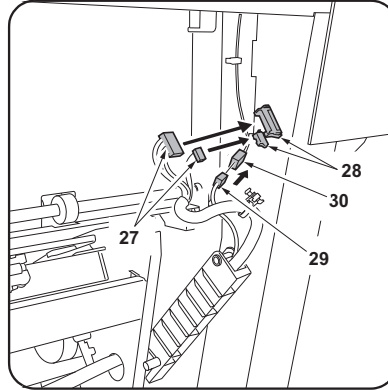
ピン (J) は電線が電線ガイド (17) から出ないように通す。

16. ピン (J) のネジ部分をドキュメントフィニッシャーに取り付け、電線ガイド (17) を固定する。

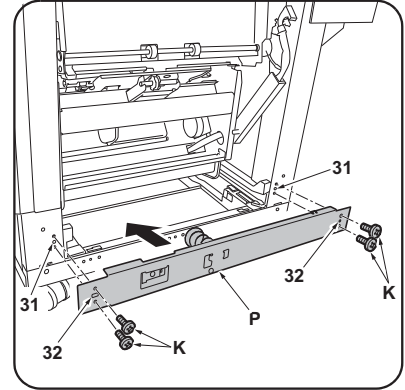




17. Install the ground wire (26) to the frame using an M4 x 8 screw (K).  
18. Install the binding band (O) to the wires and fit the band into the frame.



19. Plug the 2 connectors (27) into the connectors (28) on the document finisher.  
20. Plug the connector (29) into the connector (30) on the relay paper conveying unit (I).



21. Align holes (32) at 2 locations in the guide (P) with projections (31) on the document finisher.  
22. Install the guide (P) on the document finisher using 4 M4 x 8 screws (K).

17. Fixer le câble de terre (26) au châssis en procédant à l'aide d'une vis M4 x 8 (K).  
18. Monter le collier de fixation (O) sur les câbles et assujettir le collier au châssis.

19. Enfiler les 2 connecteurs (27) dans les connecteurs (28) du retoucheur de document.  
20. Enfiler le connecteur (29) dans le connecteur (30) de l'unité de transport de relais (I).

21. Aligner les trous (32) en 2 endroits du guide (P) avec les saillies (31) du retoucheur de document.  
22. Monter le guide (P) sur le retoucheur de document à l'aide de 4 vis M4 x 8 (K).

17. Instale el cable de conexión a tierra (26) en el marco usando un tornillo M4 x 8 (K).  
18. Instale la correa de sujeción (O) en los cables y coloque la correa en el marco.

19. Enchufe los 2 conectores (27) en los conectores (28) del finalizador de documentos.  
20. Enchufe el conector (29) en el conector (30) de la unidad de transporte de papel por relevador (I).

21. Alinee los orificios (32) de los 2 lugares de la guía (P) con los resaltos (31) del finalizador de documentos.  
22. Instale la guía (P) en el finalizador de documentos usando 4 tornillos M4 x 8 (K).

17. Montieren Sie das Massekabel (26) mit einer M4 x 8 Schraube (K) an den Rahmen.  
18. Bringen Sie das Schellenband (O) an den Kabeln an und setzen Sie das Band in den Rahmen ein.

19. Verbinden Sie die 2 Steckverbinder (27) mit den Steckverbindern (28) des Dokument-Finishers.  
20. Verbinden Sie den Steckverbinder (29) mit dem Steckverbinder (30) der eingesetzten Papierfördereinheit (I).

21. Richten Sie die Öffnungen (32) an 2 Stellen in der Führung (P) auf die Vorsprünge (31) des Dokument-Finishers aus.  
22. Montieren Sie die Führung (P) mit 4 M4 x 8 Schrauben (K) am Dokument-Finisher.

17. Installare il cavo di terra (26) alla struttura utilizzando una vite M4 x 8 (K).  
18. Installare la fascetta di legatura (O) ai cavi e quindi fissare la fascetta nella struttura.

19. Inserire i 2 connettori (27) nei connettori (28) sulla finitrice di documenti.  
20. Inserire il connettore (29) nel connettore (30) sull'unità relay di trasporto carta (I).

21. Allineare i fori (32) alle 2 posizioni nella guida (P) con le sporgenze (31) sulla finitrice di documenti.  
22. Installare la guida (P) sulla finitrice di documenti utilizzando 4 viti M4 x 8 (K).

17. 使用 M4×8(K) 螺钉将装接地线 (26) 安装到框架上。  
18. 在电线上安装束线带 (O), 将束线带 (O) 嵌入到框架上。

19. 将 2 个连接器 (27) 与装订器的连接器 (28) 相连接。  
20. 将连接器 (29) 与中间搬运单元 (H) 的连接器 (30) 相连接。

21. 将装订器的 2 处突出部 (31) 与导板 (P) 的孔 (32) 对齐。  
22. 使用 4 颗螺钉 M4×8(K) 将导板 (P) 安装到装订器上。

17. 나사 M4×8(K) 로 접지선 (26) 을 프레임에 장착합니다.  
18. 전선에 결속 밴드 (O) 를 장착하고 프레임에 결속 밴드 (O) 를 끼웁니다.

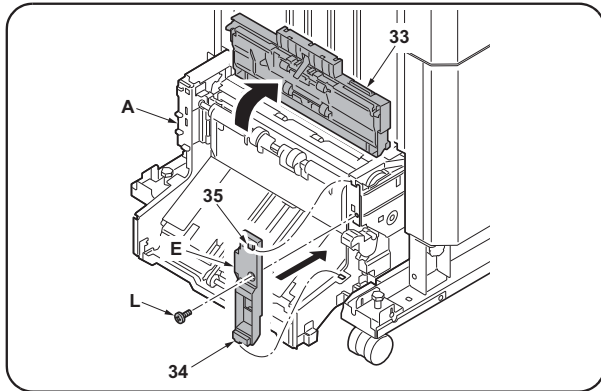
19. 커넥터 (27) 2 개를 문서 피니셔의 커넥터 (28) 에 접속합니다.  
20. 커넥터 (29) 를 중계 유니트 (I) 의 커넥터 (30) 에 접속합니다.

21. 문서 피니셔의 돌기 (31) 2 곳을 가이드 (P) 의 구멍 (32) 에 맞춥니다.  
22. 나사 M4×8(K) 4 개로 문서 피니셔에 가이드 (P) 를 장착합니다.

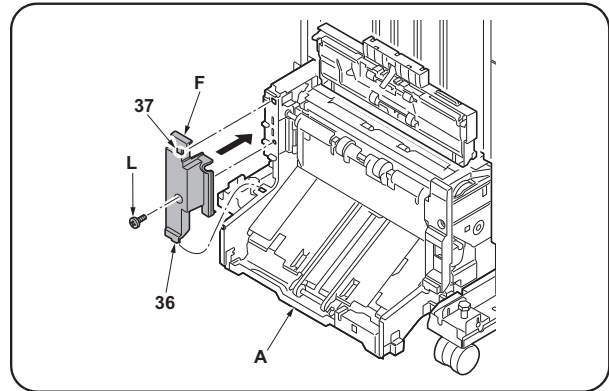
17. 비스 M4×8(K) でアース線 (26) をフレームに取り付ける。  
18. 電線に結束バンド (O) を取り付け、フレームに結束バンド (O) をはめ込む。

19. コネクタ (27) 2 個をドキュメントフィニッシャーのコネクタ (28) に接続する。  
20. コネクタ (29) を中継搬送ユニット (I) のコネクタ (30) に接続する。

21. ドキュメントフィニッシャーの突起 (31) 2箇所にガイド (P) の穴 (32) に合わせる。  
22. ビス M4×8(K) 4 本でドキュメントフィニッシャーにガイド (P) を取り付けます。



23. Open the eject cover (33).  
 24. Engage the projection (34) and hook (35) on the front side cover (E) with the center-folding unit (A). Complete installation of the front side cover (E) using an M4 x 10 screw (black) (L).



25. Engage the projection (36) and hook (37) on the rear side cover (F) with the center-folding unit (A). Complete installation of the rear side cover (F) using an M4 x 10 screw (black) (L).

23. Ouvrir le capot d'éjection (33).  
 24. Engager la saillie (34) et le crochet (35) du capot latéral avant (E) dans la plieuse (A). Finaliser l'installation du capot latéral avant (E) à l'aide d'une vis M4 x 10 (noire) (L).

25. Engager la saillie (36) et le crochet (37) du capot latéral arrière (F) dans la plieuse (A). Finaliser l'installation du capot latéral arrière (F) à l'aide d'une vis M4 x 10 (noire) (L).

23. Abra la cubierta de expulsión (33).  
 24. Enganche el resalto (34) y el gancho (35) de la cubierta lateral frontal (E) con la unidad de plegado (A). Complete la instalación de la cubierta lateral frontal (E) usando un tornillo M4 x 10 (negro) (L).

25. Enganche el resalto (36) y el gancho (37) de la cubierta lateral posterior (F) con la unidad de plegado (A). Complete la instalación de la cubierta lateral posterior (F) usando un tornillo M4 x 10 (negro) (L).

23. Öffnen Sie die Auswurfabdeckung (33).  
 24. Hängen Sie den Vorsprung (34) und den Haken (35) der vorderen Seitenabdeckung (E) in die Mittenfalteinheit (A) ein. Befestigen Sie die vordere Seitenabdeckung (E) mit einer M4 x 10 Schraube (schwarz) (L).

25. Hängen Sie den Vorsprung (36) und den Haken (37) der hinteren Seitenabdeckung (F) in die Mittenfalteinheit (A) ein. Befestigen Sie die hintere Seitenabdeckung (F) mit einer M4 x 10 Schraube (schwarz) (L).

23. Aprire il coperchio di espulsione carta (33).  
 24. Innestare la sporgenza (34) e il gancio (35) sul coperchio laterale anteriore (E) con l'unità di piegatura centrale (A). Completare l'installazione del coperchio laterale anteriore (E) utilizzando una vite M4 x 10 (nera) (L).

25. Innestare la sporgenza (36) e il gancio (37) sul coperchio laterale posteriore (F) con l'unità di piegatura centrale (A). Completare l'installazione del coperchio laterale posteriore (F) utilizzando una vite M4 x 10 (nera) (L).

23. 打开排纸盖板 (33)。  
 24. 将前部侧盖板 (E) 的突出部 (34) 以及挂钩 (35) 嵌入到中缝装订一折页单元 (A) 中, 使用 1 颗 M4×10 (黑) (L) 螺钉来安装前部侧盖板 (E)。

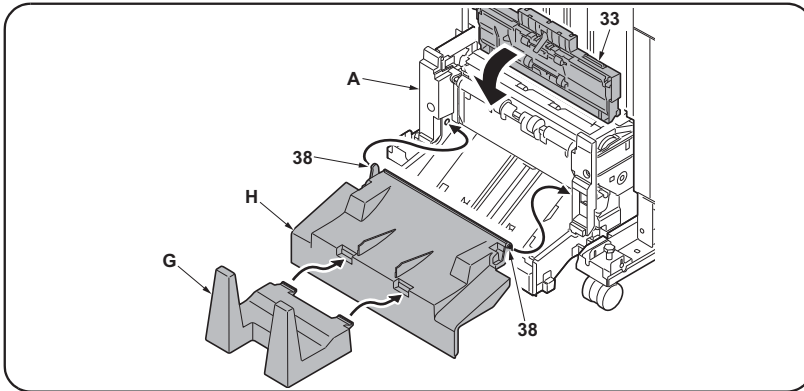
25. 将后部侧盖板 (F) 的突出部 (36) 以及挂钩 (37) 嵌入到中缝装订一折页单元 (A) 中, 使用 1 颗 M4×10 (黑) (L) 螺钉来安装后部侧盖板 (F)。

23. 배출 커버 (33) 를 엽니다.  
 24. 사이드 커버 앞 (E) 의 돌기 (34) 및 후크 (35) 를 접기 유닛 (A) 에 끼웁니다. 나사 M4×10 (흑) (L) 1 개로 사이드 커버 앞 (E) 을 장착합니다.

25. 사이드 커버 뒤 (F) 의 돌기 (36) 및 후크 (37) 를 접기 유닛 (A) 에 끼웁니다. 나사 M4×10 (흑) (L) 1 개로 사이드 커버 뒤 (F) 를 장착합니다.

23. 排出カバー (33) を開く。  
 24. サイドカバー前 (E) の突起 (34) およびフック (35) を、中折りユニット (A) にはめ込む。  
 ビス M4×10 (黒) (L) 1 本で、サイドカバー前 (E) を取り付ける。

25. サイドカバー後 (F) の突起 (36) およびフック (37) を、中折りユニット (A) にはめ込む。  
 ビス M4×10 (黒) (L) 1 本で、サイドカバー後 (F) を取り付ける。



26. Insert the 2 pins (38) on the output tray (H) in the holes in the center-folding unit (A) to install the tray.
27. Install the output stock tray (G) on the output tray (H).
28. Close the eject cover (33).

- 
26. Insérer les 2 goupilles (38) du plateau de sortie (H) dans les trous de la plieuse (A) pour installer le plateau.
  27. Installer la butée de sortie du papier (G) sur le plateau de sortie (H).
  28. Fermer le capot d'éjection (33).

- 
26. Inserte los 2 pasadores (38) de la bandeja de salida (H) en los orificios de la unidad de plegado (A) para instalar la bandeja.
  27. Instale la bandeja de recolección de papel de salida (G) en la bandeja de salida (H).
  28. Cierre la cubierta de expulsión (33).

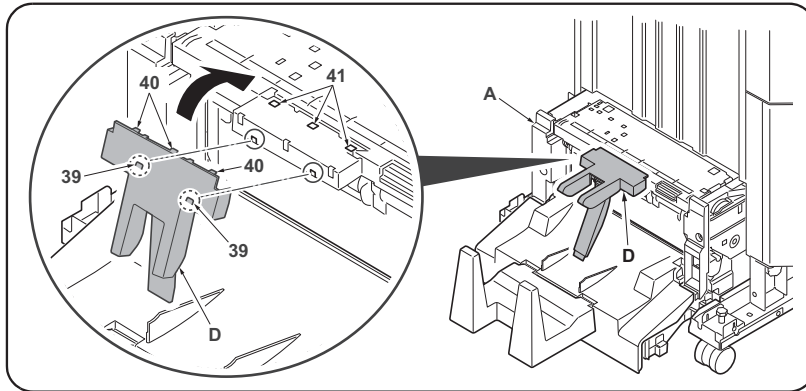
- 
26. Stecken Sie die 2 Rändelschrauben (38) des Ausgabefachs (H) in die Öffnungen der Mittenfalteinheit (A) ein, um das Fach zu installieren.
  27. Bringen Sie das Ausgabestapelfach (G) am Ausgabefach (H) an.
  28. Schließen Sie die Auswurfabdeckung (33).

- 
26. Inserire i 2 perni (38) sul vassoio di uscita (H) nei fori sull'unità di piegatura centrale (A) per installare il vassoio.
  27. Installare il vassoio di uscita stoccaggio (G) sul vassoio di uscita (H).
  28. Chiudere il coperchio di espulsione carta (33).

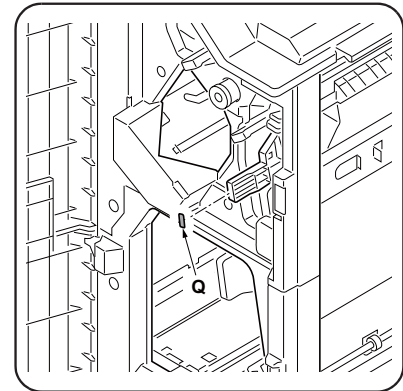
- 
26. 将排纸托盘 (H) 的 2 根销钉 (38) 插入中缝装订一折页单元 (A) 的孔中, 以安装排纸托盘 (H)。
  27. 将堆纸托盘 (G) 安装到排纸托盘 (H) 上。
  28. 关闭排纸盖板 (33)。

- 
26. 배지트레이 (H) 의 핀 (38) 2 개를 접기 유닛 (A) 의 구멍에 넣고 배지 트레이 (H) 를 장착합니다.
  27. 배지 저장 트레이 (G) 를 배지 트레이 (H) 에 장착합니다.
  28. 배출커버 (33) 를 닫습니다.

- 
26. 排紙 트레이 (H) のピン (38) 2 本を中折りユニット (A) の穴に入れ、排紙 트레이 (H) を取り付け
  - る。
  27. 排紙ストック 트레이 (G) を排紙 트레이 (H) に取り付け
  - る。
  28. 排出カバー (33) を閉じる。



29. Insert the 2 projections (39) on the back of the output stopper (D) in the portions circled on the center-folding unit (A).  
Fit the 3 hooks (40) on the output stopper (D) in the holes (41) in the center-folding unit (A).



30. Adhere the D7 label (Q) at the location shown in the figure.

29. Insérer les 2 saillies (39) au dos de la butée de sortie (D) dans les parties encadrées de la plieuse (A).  
Assujettir les 3 crochets (40) de la butée de sortie (D) dans les trous (41) de la plieuse (A).

30. Apposer l'étiquette D7 (Q) à l'endroit repéré sur la figure.

29. Inserte los 2 resaltos (39) de la parte posterior del tope de salida (D) en las porciones marcadas con un círculo de la unidad de plegado (A).  
Coloque los 3 ganchos (40) del tope de salida (D) en los orificios (41) de la unidad de plegado (A).

30. Adhiera la etiqueta D7 (Q) en el lugar que se muestra en la ilustración.

29. Setzen Sie die 2 Vorsprünge (39) auf der Rückseite des Ausgabeanschlages (D) in die mit Kreis bezeichneten Positionen der Mittenfalteinheit (A) ein.  
Setzen Sie die 3 Haken (40) des Ausgabeanschlages (D) in die Öffnungen (41) der Mittenfalteinheit (A) ein.

30. Kleben Sie den D7 Aufkleber (Q) an der abgebildeten Stelle an.

29. Inserire le 2 sporgenze (39) sulla parte posteriore del fermo di uscita (D) nelle porzioni cerchiatoe sull'unità di piegatura centrale (A).  
Fissare i 3 ganci (40) sul fermo di uscita (D) nei fori (41) nell'unità di piegatura centrale (A).

30. Far aderire l'etichetta D7 (Q) alla posizione mostrata nella figura.

29. 将排纸挡板 (D) 内侧的 2 处突出部 (39) 插入到中缝装订一折页单元 (A) 的圆框部。  
将排纸挡板 (D) 的 3 个挂钩 (40) 嵌入到中缝装订一折页单元 (A) 的孔 (41) 中。

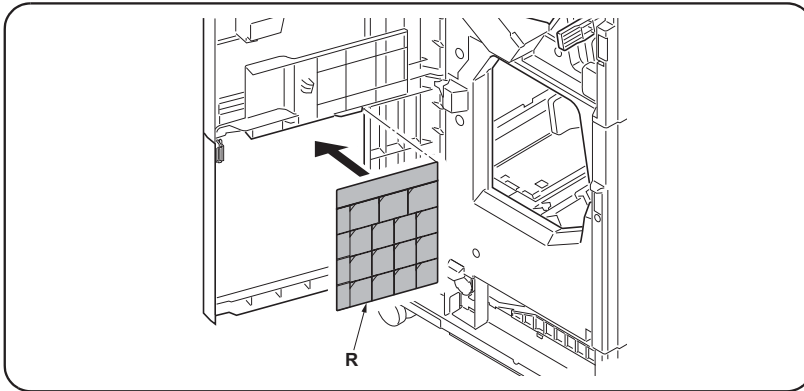
30. 在图示位置黏贴 D7 标签 (Q)。

29. 배지 스톱퍼 (D) 의 안쪽에 있는 돌기 (39) 2 곳을 접기 유닛 (A) 의에 삽입합니다 .  
배지 스톱퍼 (D) 의 후크 (40) 3 곳을 접기 유닛 (A) 의 구멍 (41) 에 끼웁니다 .

30. D7 라벨 (Q) 을 그림의 위치에 붙입니다 .

29. 排紙ストップパー (D) の裏側にある突起 (39) 2箇所を中折リユニット (A) の丸枠部に挿入する。  
排紙ストップパー (D) のフック (40) 3箇所を中折リユニット (A) の穴 (41) にはめ込む。

30. D7 ラベル (Q) を図の位置に貼り付ける。



31. Adhere the Operation label (R) at the location shown in the figure.
32. Reinstall the foot cover (5) and lower rear cover (7).
33. Close the lower front cover (3) and the upper front cover (1).

- 
31. Apposer l'étiquette de fonctionnement (R) à l'endroit repéré sur la figure.
  32. Reposer le couvercle du pied (5) et le couvercle arrière inférieur (7).
  33. Fermer le capot inférieur avant (3) et le couvercle avant supérieur (1).

- 
31. Adhiera la etiqueta de funcionamiento (R) en el lugar que se muestra en la ilustración.
  32. Vuelva a instalar la cubierta de la pata (5) y la cubierta posterior inferior (7).
  33. Cierre la cubierta frontal inferior (3) y la cubierta frontal superior (1).

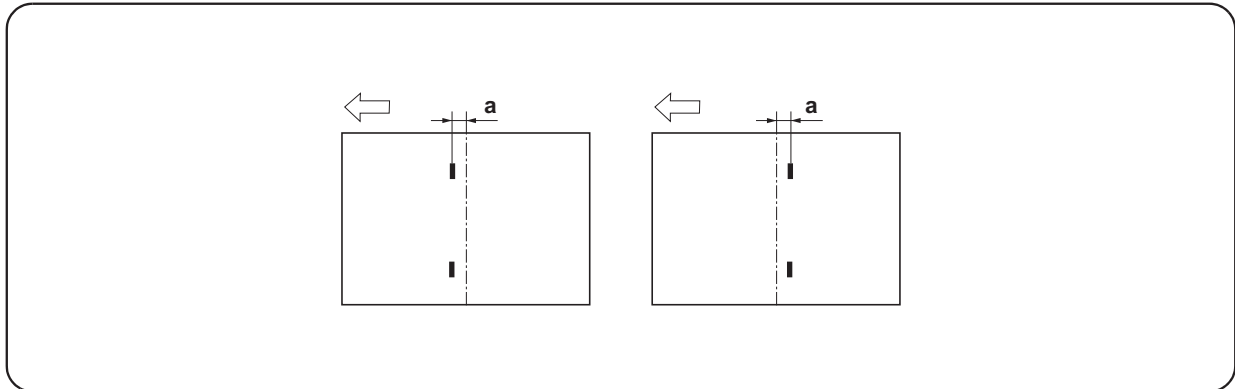
- 
31. Kleben Sie den Bedienungsaufkleber (R) an der abgebildeten Stelle an.
  32. Bringen Sie die Fußabdeckung (5) und die untere hintere Abdeckung (7) wieder an.
  33. Schließen Sie die untere vordere Abdeckung (3) und die obere vordere Abdeckung (1).

- 
31. Far aderire l'etichetta di operazione (R) alla posizione mostrata nella figura.
  32. Reinstallare la copertura del piede (5) e il coperchio inferiore posteriore (7).
  33. Chiudere il coperchio inferiore anteriore (3) e il coperchio superiore anteriore (1).

- 
31. 在图示位置黏贴操作标签 (R)。
  32. 按原样安装脚座盖板 (5) 和后部下盖板 (7)。
  33. 关闭前部下盖板 (3) 和前部上盖板 (1)。

- 
31. 조작 라벨 (R) 을 그림의 위치에 붙입니다 .
  32. 풋커버 (5) 및 뒤하 커버 (7) 를 원래대로 장착합니다 .
  33. 전면 아래커버 (3) 및 전면 윗커버 (1) 를 닫습니다 .

- 
31. 操作ラベル (R) を図の位置に貼り付ける。
  32. フットカバー (5) および後下カバー (7) を元通りに取り付ける。
  33. 前下カバー (3) および前上カバー (1) を閉じる。

**Adjustment of centerfold-stapling position**

Check the distance (a) from the stapling position to the center of the paper. If the distance (a) is over the reference value, follow the procedure below to adjust the position.

<Reference value (a)>  $\pm 2$  mm

1. Set maintenance mode U246, select Booklet and Staple Pos.
2. Adjust the values.
3. Press the Start key to confirm the setting value.

**Réglage de la position d'agrafage des pages centrales dépliées**

Vérifier la distance (a) entre la position d'agrafage et le milieu de la feuille de papier. Si cette distance (a) est supérieure à la valeur de référence, régler la position en procédant de la manière suivante.

<Valeur de référence (a)>  $\pm 2$  mm

1. Passer en mode maintenance U246, sélectionner Booklet et Staple Pos.
2. Régler les valeurs.
3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

**Ajuste de la posición de grapado de la unidad de plegado**

Compruebe la distancia (a) desde la posición de grapado con respecto al centro del papel. Si dicha distancia (a) supera el valor de referencia, realice el siguiente procedimiento para ajustar la posición.

<Valor de referencia (a)>  $\pm 2$  mm

1. Entre en el modo de mantenimiento U246, seleccione Booklet y Staple Pos.
2. Ajuste los valores.
3. Pulse la tecla de Start para confirmar el valor de configuración.

**Einstellung der Mittenfalt-Heftposition**

Überprüfen Sie den Abstand (a) zwischen der Heftposition und der Papiermitte. Falls der Abstand (a) größer als der Bezugswert ist, ist die Position gemäß der nachstehenden Prozedur nachzustellen.

<Bezugswert (a)>  $\pm 2$  mm

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Booklet und Staple Pos.
2. Die Werte einstellen.
3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

**Regolazione della posizione di cucitura dell'unità di piegatura centrale**

Controllare la distanza (a) dalla posizione di spillatura al centro del foglio. Se la distanza (a) è superiore al valore di riferimento, seguire la procedura riportata sotto per regolare la posizione.

<Valore di riferimento (a)>  $\pm 2$  mm

1. Impostare la modalità manutenzione U246, selezionare Booklet e Staple Pos.
2. Regolare i valori.
3. Premere il tasto di Start per confermare il valore dell'impostazione.

**中缝装订位置调整**

检查从装订位置到纸张中心的距离 (a)。如果距离 (a) 超出标准值范围，按照下列步骤调节装订位置。

<标准值 (a)>  $\pm 2$ mm

1. 设置维护模式 U246，选择 Booklet、Staple Pos。
2. 调整设定值。
3. 按 Start 键，以确定设定值。

**접기 스테이플 위치조정**

스테이플 위치에서 용지 중앙까지의 거리 (a) 를 확인합니다. 거리 (a) 가 기준치 외의 경우에는 다음 순서로 조정을 합니다.

<기준치 (a)>  $\pm 2$ mm

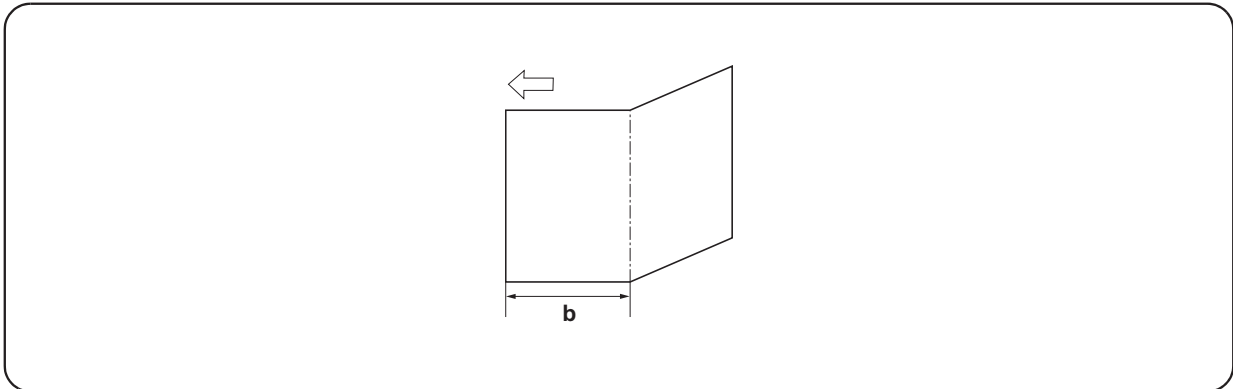
1. 메인テナンス 모드 U246 을 세트하고 Booklet, Staple Pos 를 선택합니다.
2. 설정치를 조정합니다.
3. 시작키를 누르고 설정치를 확인합니다.

**中とじステーブル位置調整**

ステーブル位置から用紙センターまでの距離 (a) を確認する。距離 (a) が基準値外の場合、次の手順で調整を行う。

<基準値 (a)>  $\pm 2$ mm

1. メンテナンスモード U246 をセットし、Booklet、Staple Pos を選択する。
2. 設定値を調整する。
3. スタートキーを押し、設定値を確定する。

**Adjustment of center folding position**

Check the distance (b) from the edge of the paper to the center folding position. If the distance (b) is over the reference value, follow the procedure below to adjust the position.

<Reference value (b)>

A4, Letter: Length of paper  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Length of paper  $\times 1/2 \pm 3$  mm

1. Set maintenance mode U246, select Booklet and Booklet Pos.

2. Adjust the values.

3. Press the Start key to confirm the setting value.

**Réglage de la position de pliage central**

Vérifier la distance (b) entre le bord de la feuille de papier et la position de pliage central. Si cette distance (b) est supérieure à la valeur de référence, régler la position en procédant de la manière suivante.

<Valeur de référence (b)>

A4, Letter : Longueur de la feuille  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Longueur de la feuille  $\times 1/2 \pm 3$  mm

1. Passer en mode maintenance U246, sélectionner Booklet et Booklet Pos.

2. Régler les valeurs.

3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

**Ajuste de la posición de plegado**

Compruebe la distancia (b) desde el borde del papel a la posición de plegado. Si dicha distancia (b) supera el valor de referencia, realice el siguiente procedimiento para ajustar la posición.

<Valor de referencia (b)>

A4, Letter: Longitud del papel  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Longitud del papel  $\times 1/2 \pm 3$  mm

1. Entre en el modo de mantenimiento U246, seleccione Booklet y Booklet Pos.

2. Ajuste los valores.

3. Pulse la tecla de Start para confirmar el valor de configuración.

**Einstellung der Mittenfaltposition**

Überprüfen Sie den Abstand (b) zwischen der Papierkante und der Mittenfaltposition. Falls der Abstand (b) größer als der Bezugswert ist, ist die Position gemäß der nachstehenden Prozedur nachzustellen.

<Bezugswert (b)>

A4, Letter: Papierlänge  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Papierlänge  $\times 1/2 \pm 3$  mm

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Booklet und Booklet Pos.

2. Die Werte einstellen.

3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

**Regolazione della posizione centrale di piegatura**

Controllare la distanza (b) dal bordo della carta alla posizione centrale di piegatura. Se la distanza (b) è superiore al valore di riferimento, seguire la procedura riportata sotto per regolare la posizione.

<Valore di riferimento (b)>

A4, Letter: Lunghezza carta  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Lunghezza carta  $\times 1/2 \pm 3$  mm

1. Impostare la modalità manutenzione U246, selezionare Booklet e Booklet Pos.

2. Regolare i valori.

3. Premere il tasto di Start per confermare il valore dell'impostazione.

**中縫折疊位置調整**

检查从纸张头部到折疊位置的距离 (b)。如果距离 (b) 超出标准值范围, 按照下列步骤调节折疊位置。

<标准值 (b) >

A4, Letter: 纸张长度  $\times 1/2 \pm 2$ mm

A3, Ledger, B4: 纸张长度  $\times 1/2 \pm 3$ mm

1. 设置维护模式 U246, 选择 Booklet、Booklet Pos。

2. 调整设定值。

3. 按 Start 键, 以确定设定值。

**접기 위치조정**

용지 끝에서 접기 위치까지의 거리 (b) 를 확인합니다 . 거리 (b) 가 기준치 외의 경우에는 다음 순서로 조정을 합니다 .

< 기준치 (b) >

A4, Letter: 용지길이  $\times 1/2 \pm 2$ mm

A3, Ledger, B4: 용지길이  $\times 1/2 \pm 3$ mm

1. 메인テナンス 모드 U246 을 세트하고 Booklet, Booklet Pos 를 선택합니다 .

2. 설정치를 조정합니다 .

3. 시작키를 누르고 설정치를 확인합니다 .

**中折り位置調整**

用紙端から中折り位置までの距離 (b) を確認する。距離 (b) が基準値外の場合、次の手順で調整を行う。

<基準値 (b) >

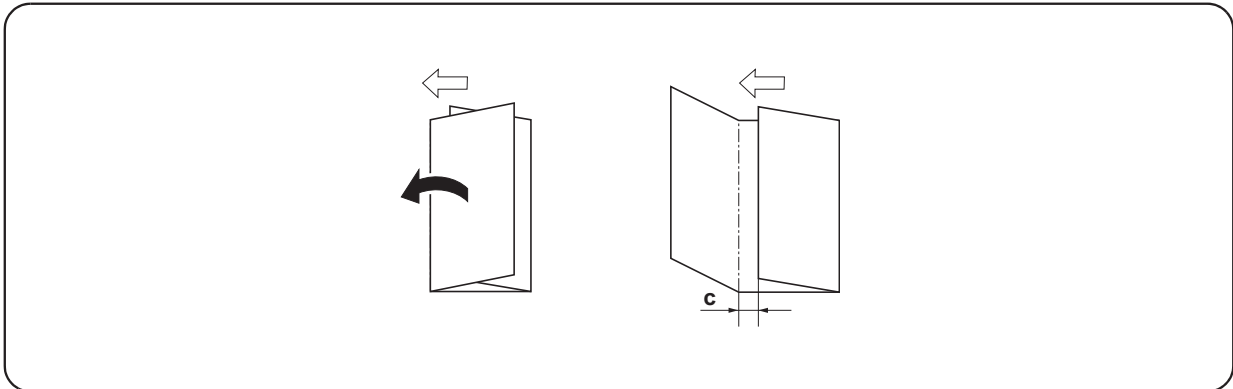
A4, Letter: 用紙長  $\times 1/2 \pm 2$ mm

A3, Ledger, B4: 用紙長  $\times 1/2 \pm 3$ mm

1. メンテナンスモード U246 をセットし、Booklet、Booklet Pos を選択する。

2. 設定値を調整する。

3. スタートキーを押し、設定値を確定する。

**Adjustment of tri-folding position**

Check the distance (c) from the edge of the paper to the second folding position. If the distance (c) is over the reference value, follow the procedure below to adjust the position.

<Reference value (c)>  $7.0 \pm 2 \text{ mm}$

1. Set maintenance mode U246, select Booklet and Three Fold.
2. Adjust the values.
3. Press the Start key to confirm the setting value.

**Réglage de la position de triple pliage**

Vérifier la distance (c) entre le bord de la feuille de papier et la position du deuxième pliage. Si cette distance (c) est supérieure à la valeur de référence, régler la position en procédant de la manière suivante.

<Valeur de référence (c)>  $7,0 \pm 2 \text{ mm}$

1. Passer en mode maintenance U246, sélectionner Booklet et Three Fold.
2. Régler les valeurs.
3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

**Ajuste de la posición de plegado tríptico**

Compruebe la distancia (c) desde el borde del papel a la segunda posición de plegado. Si dicha distancia (c) supera el valor de referencia, realice el siguiente procedimiento para ajustar la posición.

<Valor de referencia (c)>  $7,0 \pm 2 \text{ mm}$

1. Entre en el modo de mantenimiento U246, seleccione Booklet y Three Fold.
2. Ajuste los valores.
3. Pulse la tecla de Start para confirmar el valor de configuración.

**Einstellung der Dreilagfaltposition**

Überprüfen Sie den Abstand (c) zwischen der Papierkante und der zweiten Faltposition. Falls der Abstand (c) größer als der Bezugswert ist, ist die Position gemäß der nachstehenden Prozedur nachzustellen.

<Bezugswert (c)>  $7,0 \pm 2 \text{ mm}$

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Booklet und Three Fold.
2. Die Werte einstellen.
3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

**Regolazione della posizione di piegatura tripla**

Controllare la distanza (c) dal bordo della carta alla posizione della seconda piegatura. Se la distanza (c) è superiore al valore di riferimento, seguire la procedura riportata sotto per regolare la posizione.

<Valore di riferimento (c)>  $7,0 \pm 2 \text{ mm}$

1. Impostare la modalità manutenzione U246, selezionare Booklet e Three Fold.
2. Regolare i valori.
3. Premere il tasto di Start per confermare il valore dell'impostazione.

**三折位置調整**

检查从纸张头部到第2个折叠位置的距离(c)。如果距离(c)超出标准值范围,按照下列步骤调节折叠位置。

<标准(c)>  $7.0 \pm 2 \text{ mm}$

1. 设置维护模式 U246, 选择 Booklet、Three Fold。
2. 调整设定值。
3. 按 Start 键, 以确定设定值。

**두번 접기 위치 조정**

용지끝과 두번째 접히는 위치까지의 거리(c)를 확인합니다. 거리(c)가 기준치 외의 경우에는 다음 순서로 조정을 합니다.

<기준치(c)>  $7.0 \pm 2 \text{ mm}$

1. 메인テナンス 모드 U246 을 세트하고 Booklet, Three Fold 를 선택합니다.
2. 설정치를 조정합니다.
3. 시작키를 누르고 설정치를 확인합니다.

**三折り位置調整**

用紙端と二つ目の折り位置までの距離(c)を確認する。距離(c)が基準値外の場合、次の手順で調整を行う。

<基準値(c)>  $7.0 \pm 2 \text{ mm}$

1. メンテナンスモード U246 をセットし、Booklet、Three Fold を選択する。
2. 設定値を調整する。
3. スタートキーを押し、設定値を確定する。



**NOTICE**

This accessory is for use only with the following Applicant's Listed Machine.  
Machine: DF-790,DF-7110

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**AVIS**

Cet accessoire est utilisable uniquement avec le copieur figurant dans la liste du demandeur suivant.  
Modèle: DF-790,DF-7110

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**AVISO**

Este accesorio es sólo para us ar en las siguientes fotocopiadoras de la lista de solicitantes.  
Modelo: DF-790,DF-7110

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**HINWEIS**

Dieses Zubehör ist nur für den Einsatz mit der folgenden AntragstellerlistenKopiermaschine vorgesehen.  
Modell: DF-790,DF-7110

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**NOTIFICA**

Questo accessorio deve essere usato solo con le seguenti fotocopiatrici nella lista dell'applicante.  
Modello: DF-790,DF-7110

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**注意**

本产品适用于以下机型。  
机型：DF-790,DF-7110

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**주의**

본 제품은 이하의 기종에 적용됩니다.  
기종：DF-790,DF-7110

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**注意**

本製品は、以下の機種に適用します。  
機種：DF-790,DF-7110

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303ND5671002

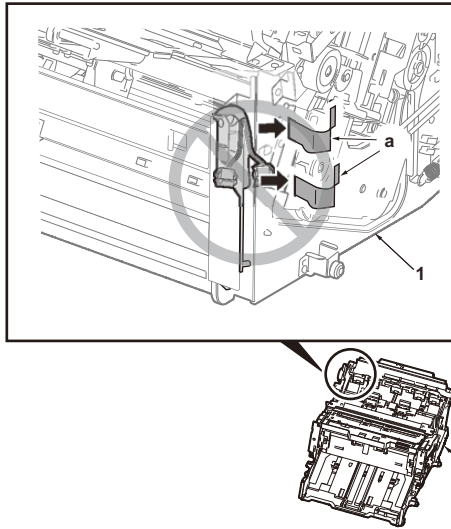
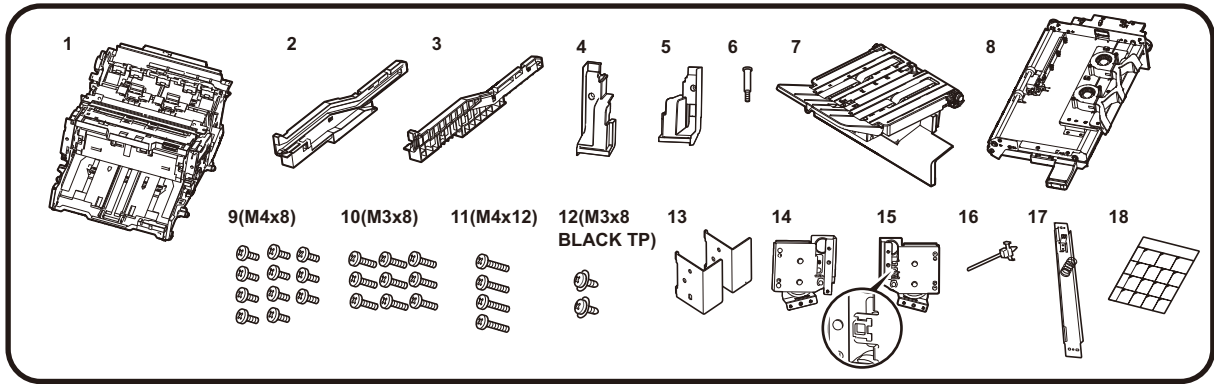
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**(7)BF-9100**

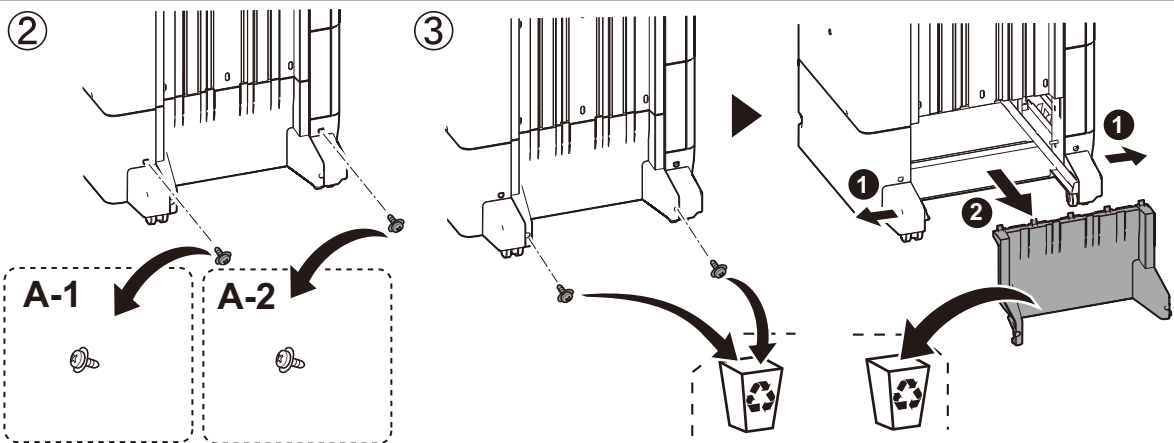
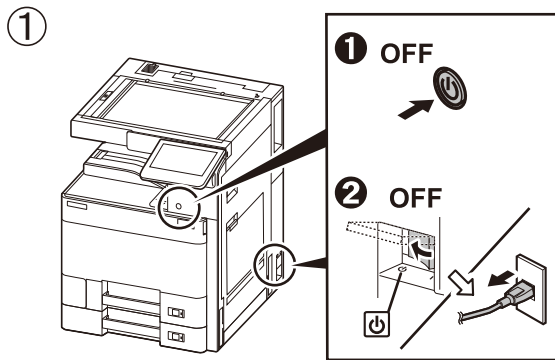
# **BF-9100**

**Folding unit**

# **Installation Guide**

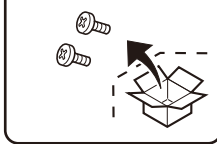


- (EN) Be sure to remove any tape and/or cushioning materials from the parts supplied, except fixing tape of (a). Remove the fixing tape of (a) in step 21.
- (FR) Veuillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies, à l' exception du ruban de fixation de (a). Retirez le ruban de fixation de (a) à l' étape 21.
- (ES) Asegúrese de quitar cualquier cinta y/o material protector de las piezas suministradas, excepto la cinta de fijación de (a). Quite la cinta de fijación de (a) en el paso 21.
- (DE) Stellen Sie sicher, dass alle Klebebänder und/oder Verpackungsreste von den gelieferten Teilen entfernt wurden, außer dem Fixierband aus (a). Entfernen Sie das Fixierband aus (a) in Schritt 21.
- (IT) Rimuovere tutti i nastri adesivi e/o i materiali di protezione dalle parti fornite, ad eccezione del nastro di fissaggio di (a). Rimuovere il nastro di fissaggio di (a) al punto 21.
- (ZHCN) 如果随机品上面有固定胶带和缓冲材料时, 请一定要取下除了 (a) 的固定胶带以外的物品。在步骤 21 时剥除固定胶带 (a)。
- (KO) 고정테이프(a)를 제외하고, 제공된 부품에서 테이프 및 / 또는 완충재를 제거하십시오. 스텝21에서 고정 테이프(a)를 제거합니다.
- (JA) 同梱品に固定テープ、緩衝材がついている場合は、(a)の固定テープ以外は必ず取り外すこと。(a)の固定テープは手順 21 で外すこと。

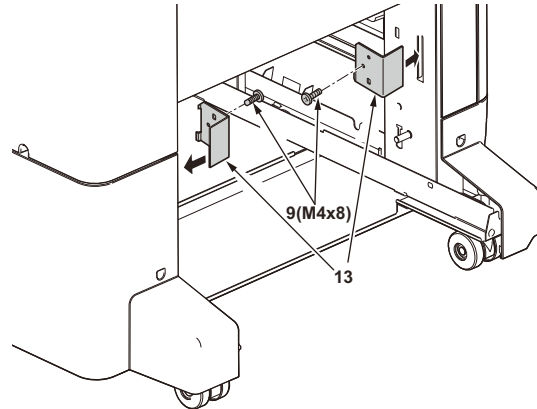
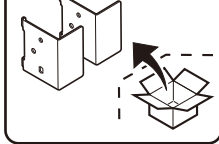


④

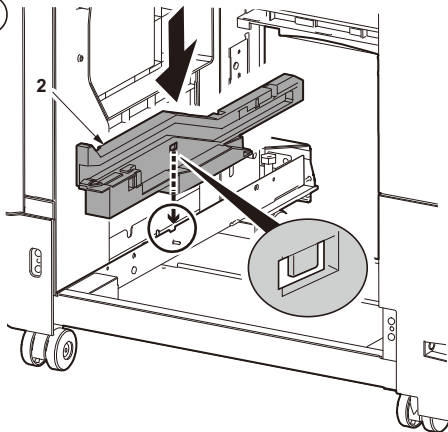
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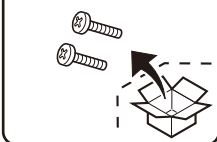
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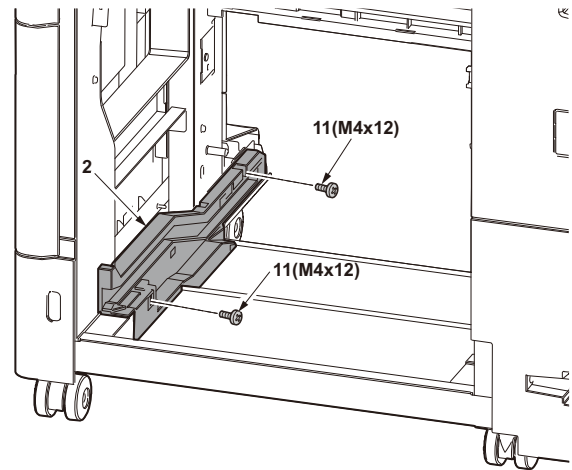
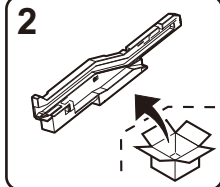
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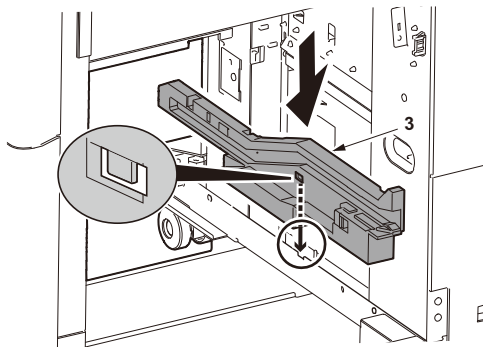
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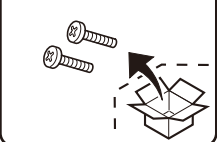
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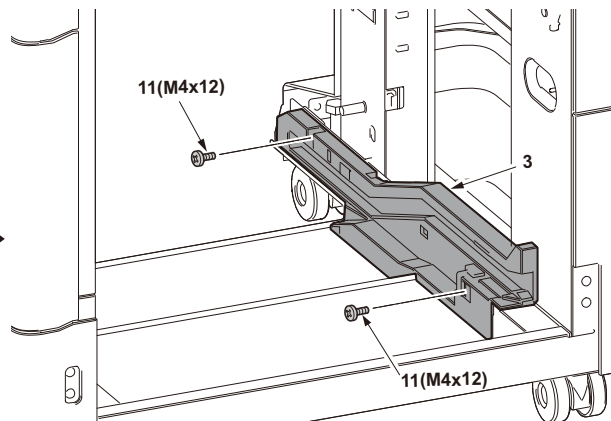
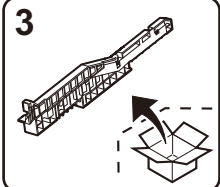
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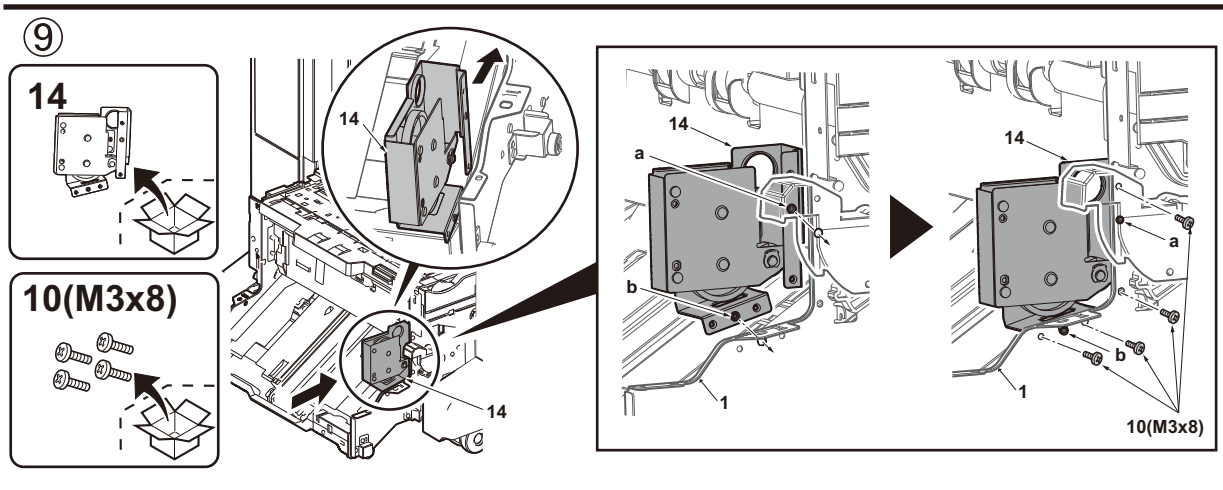
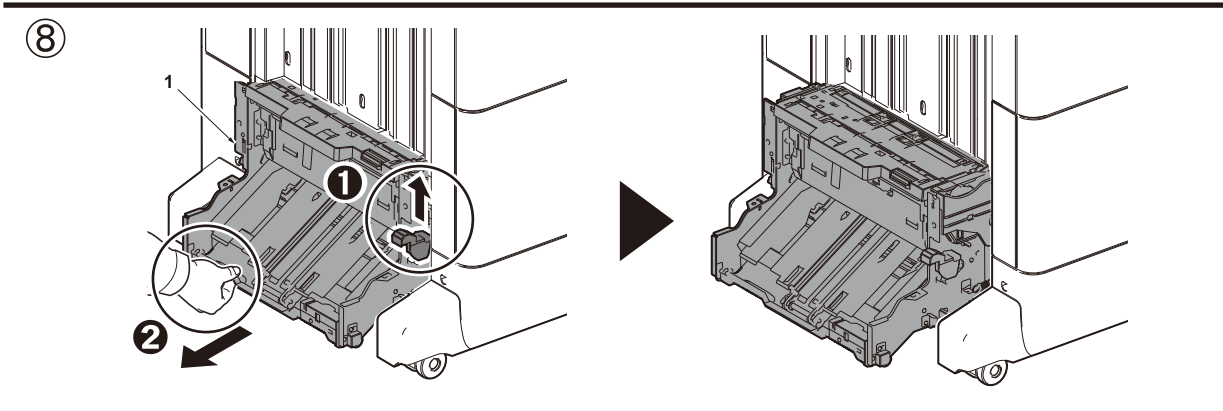
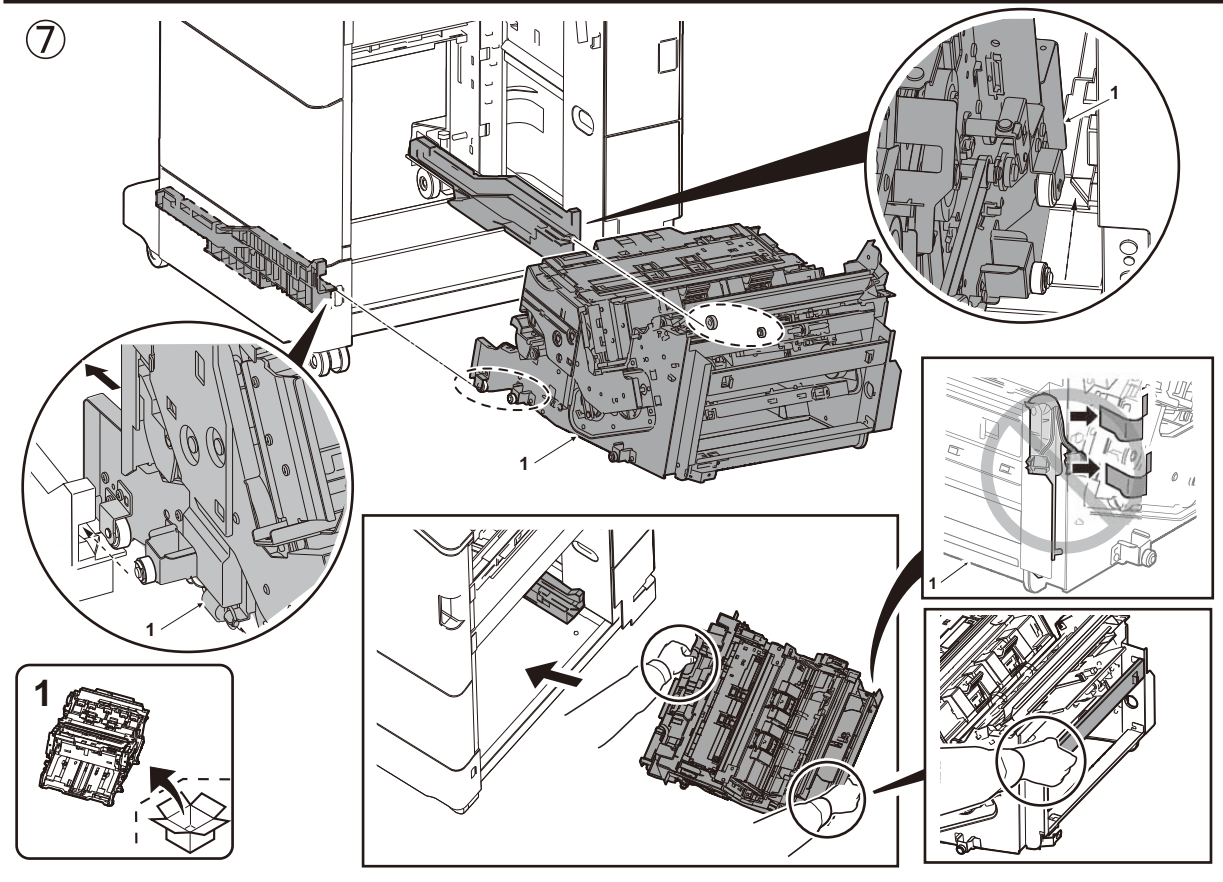


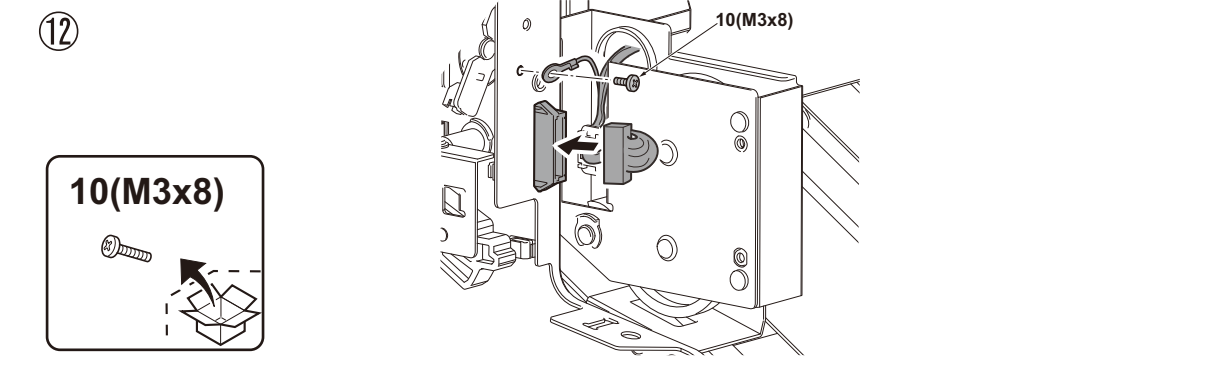
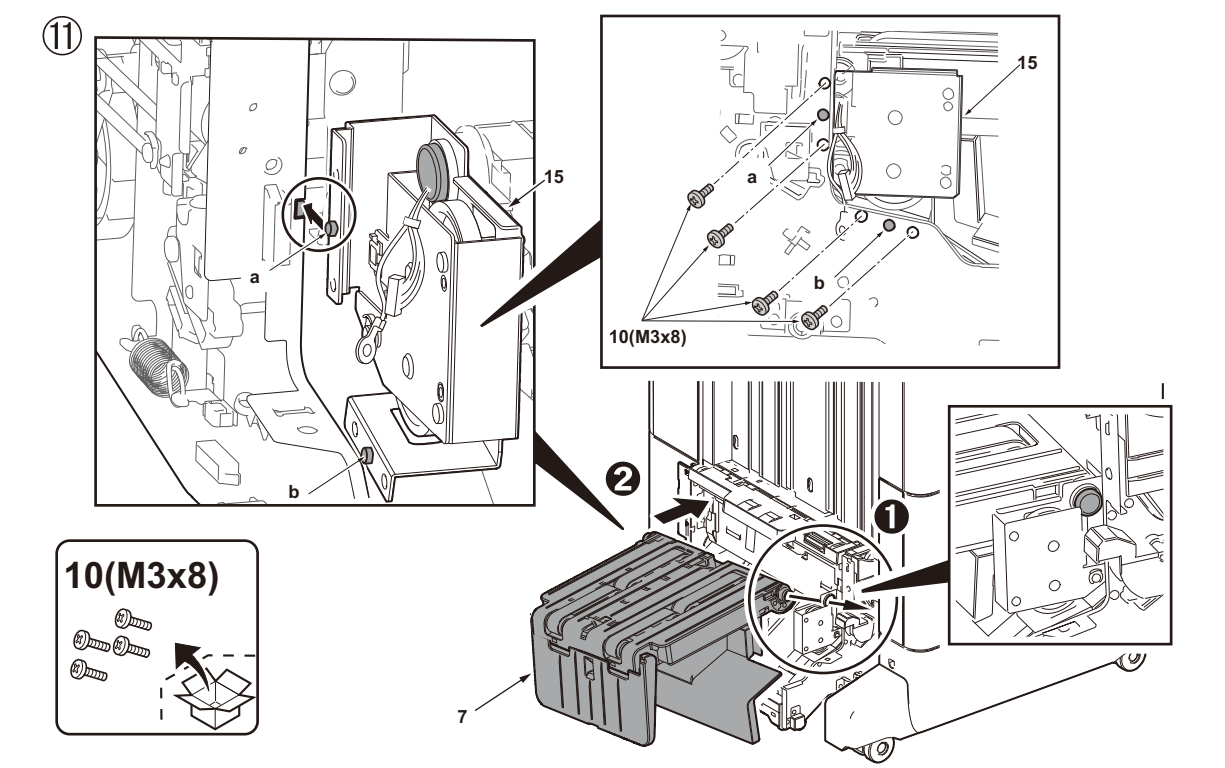
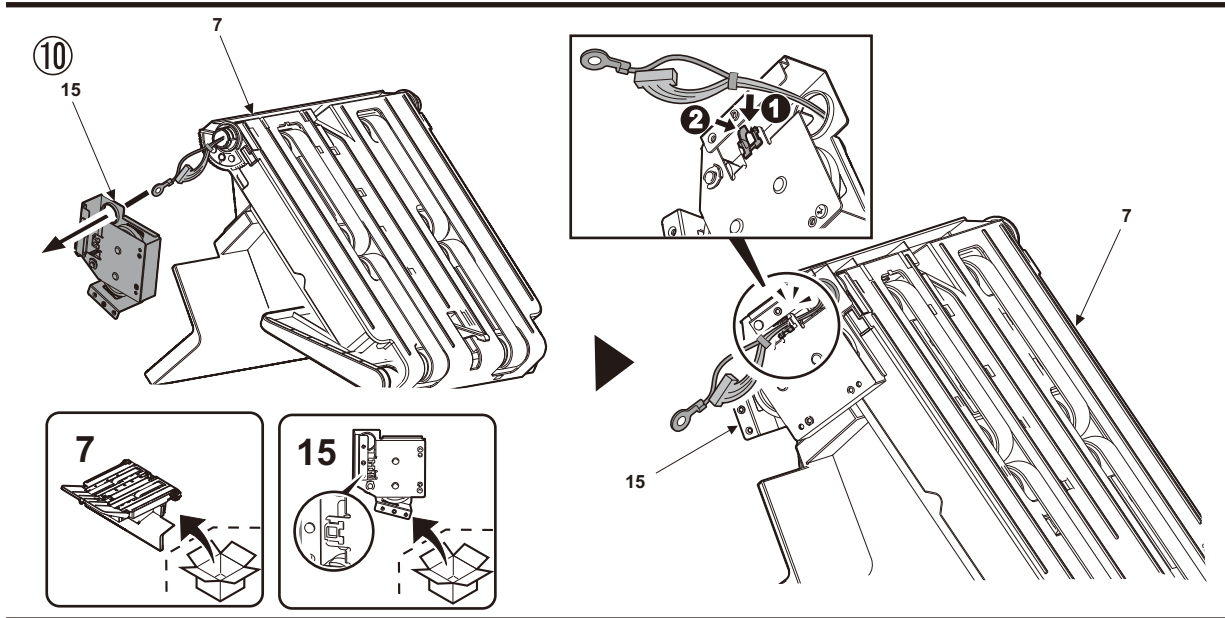
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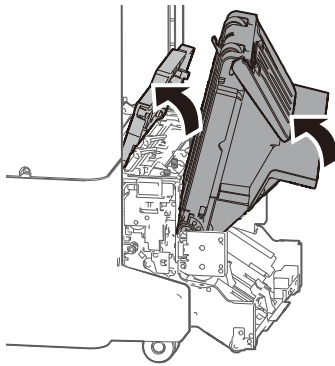
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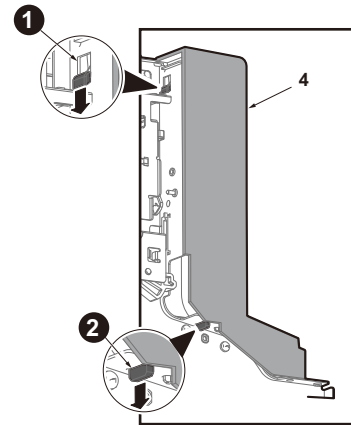
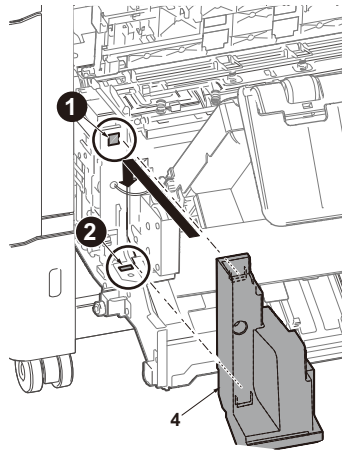
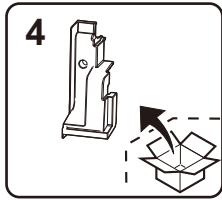




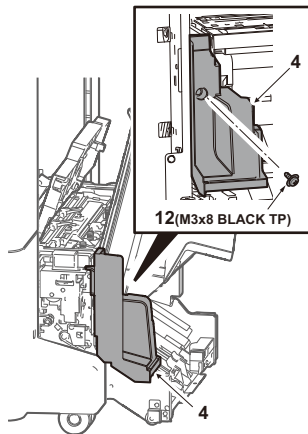
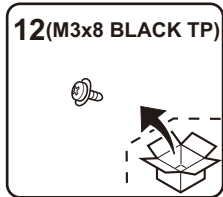
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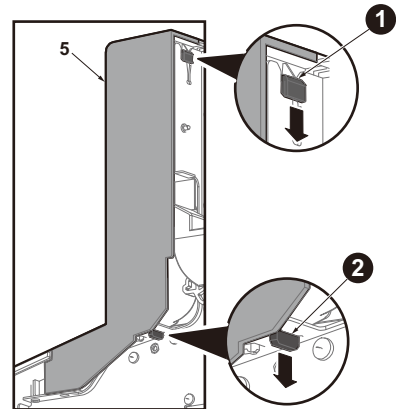
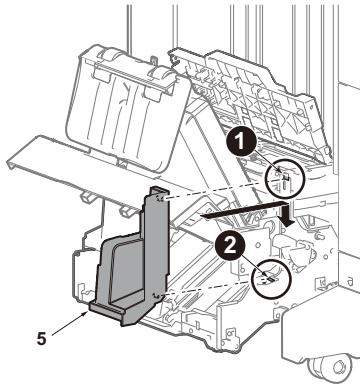
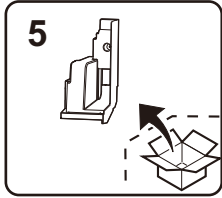


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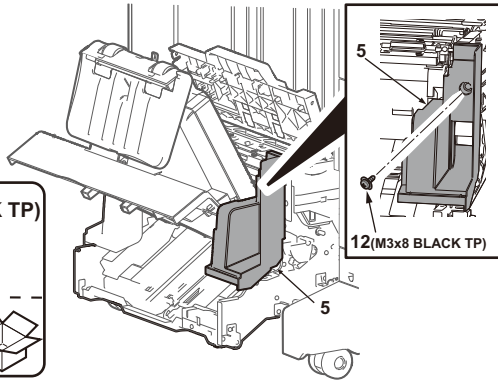
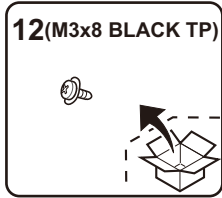




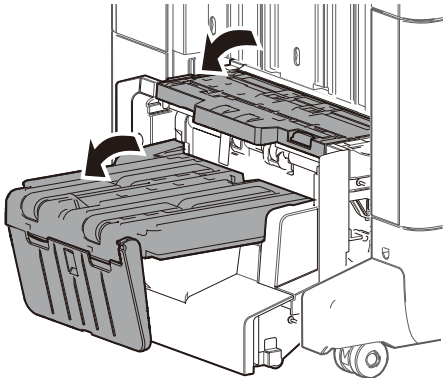
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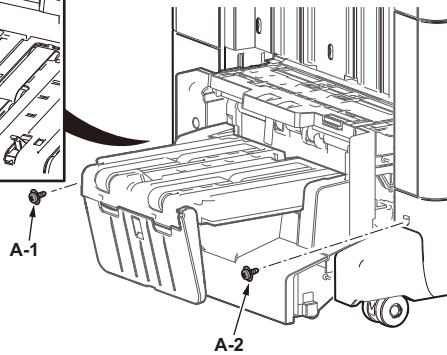
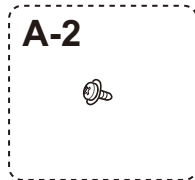
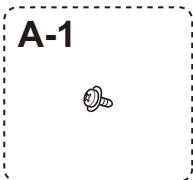
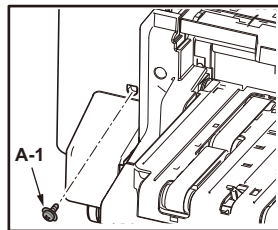
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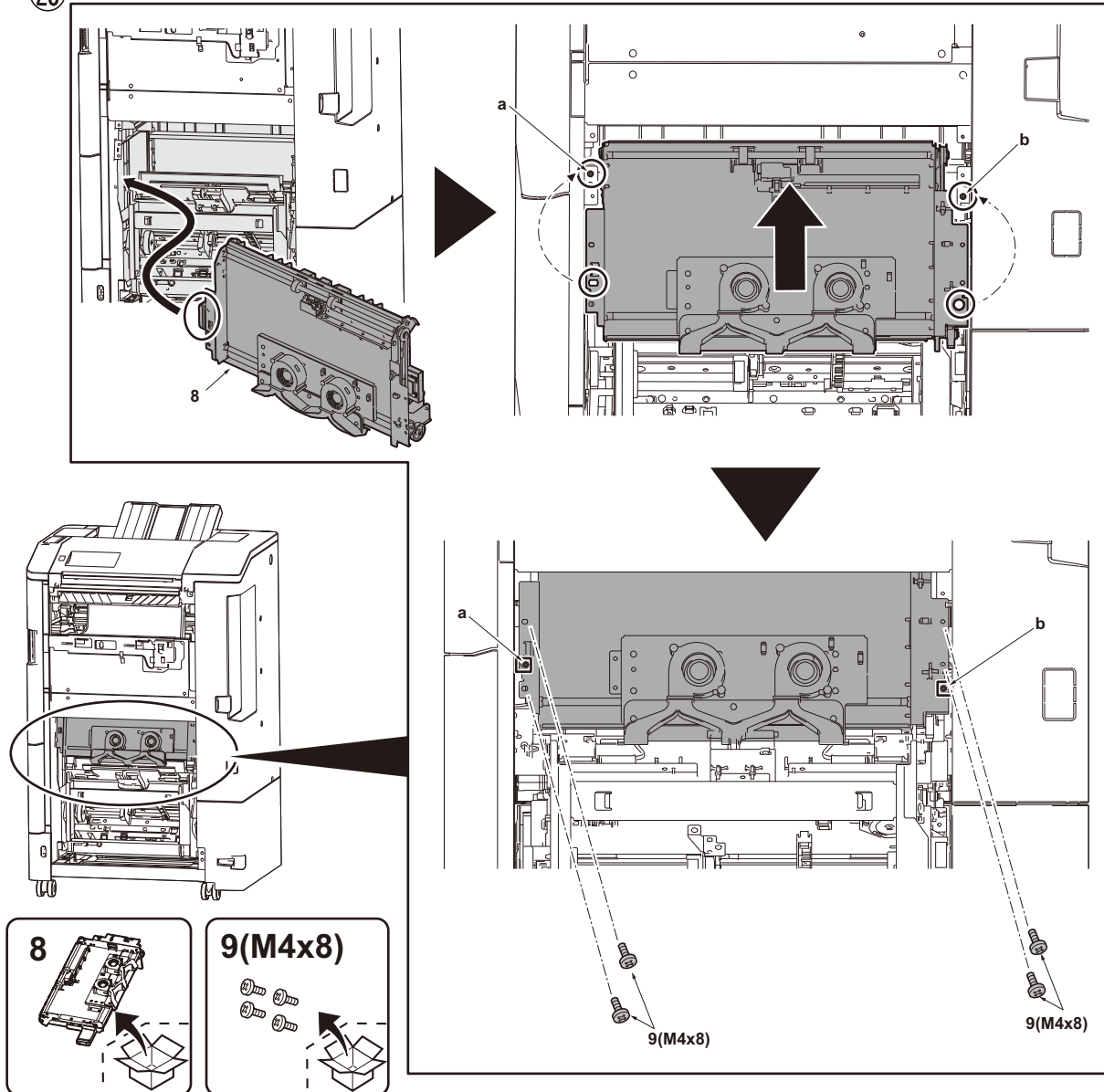
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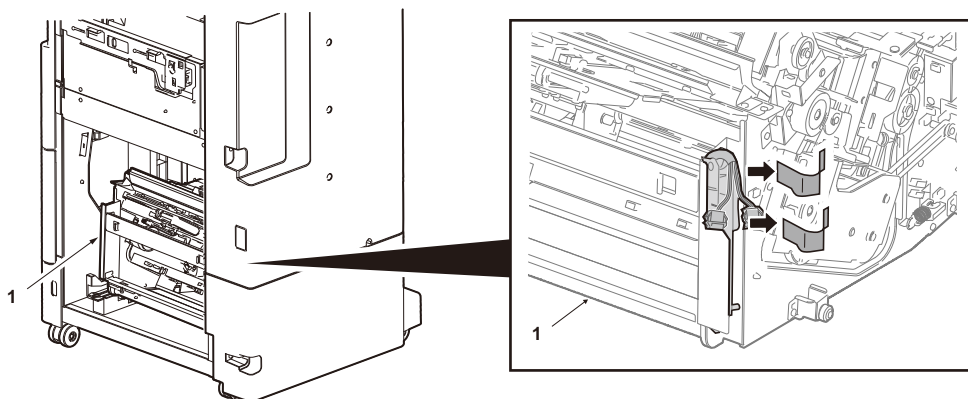
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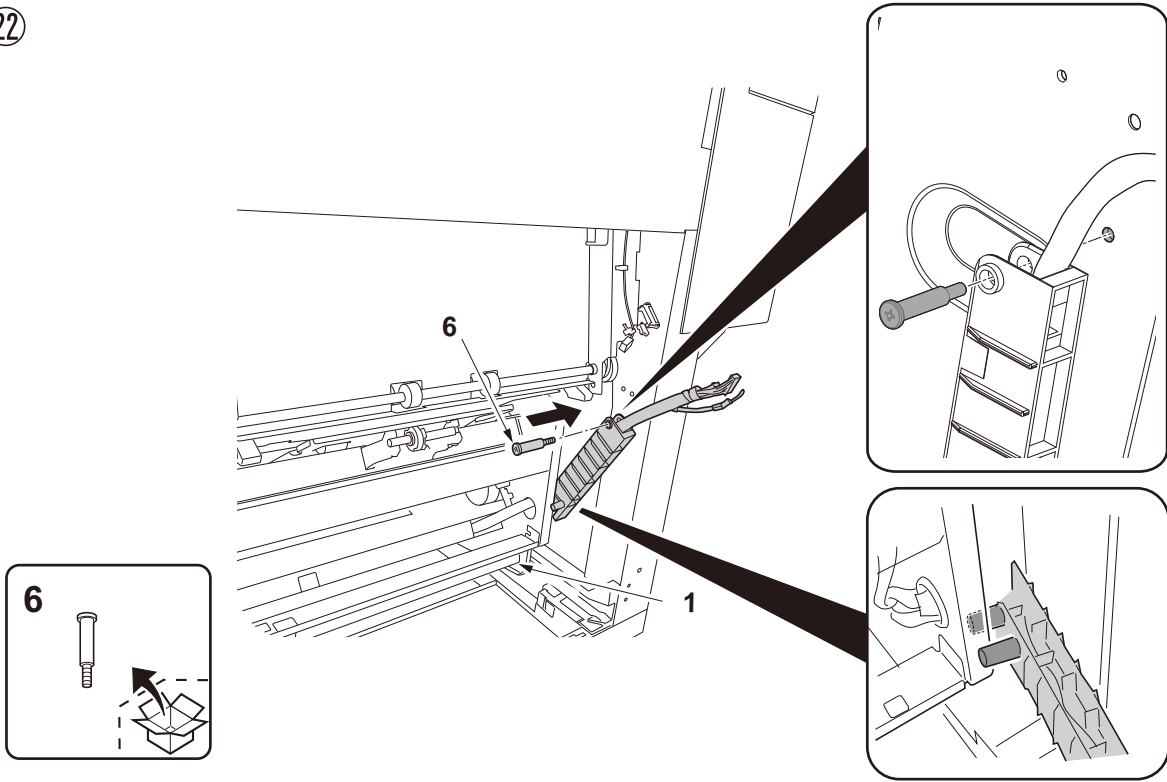
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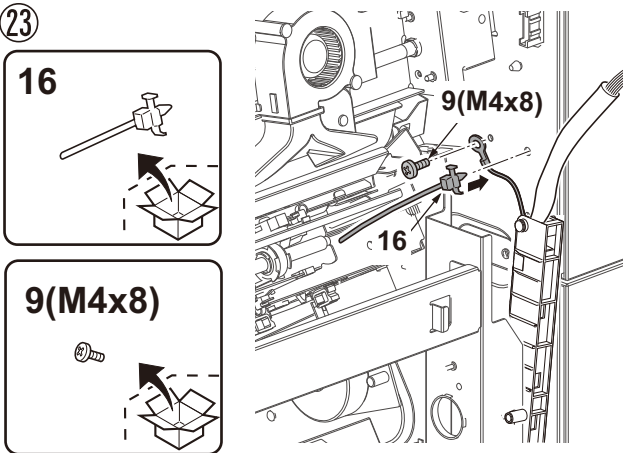
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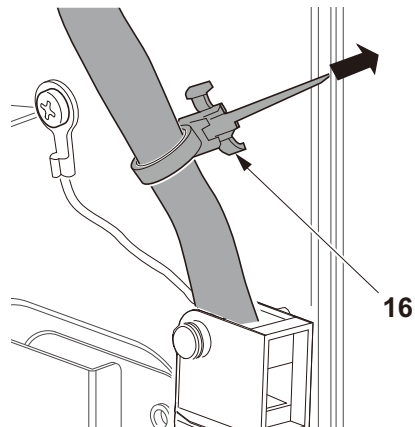
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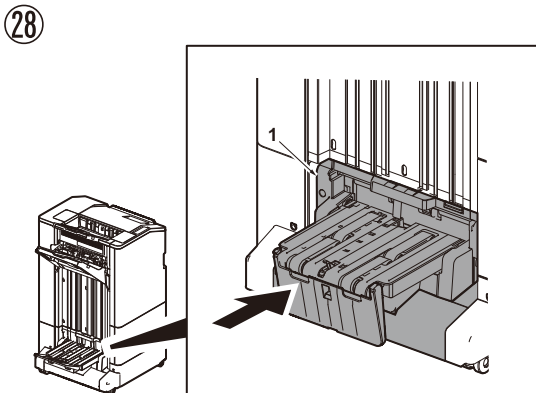
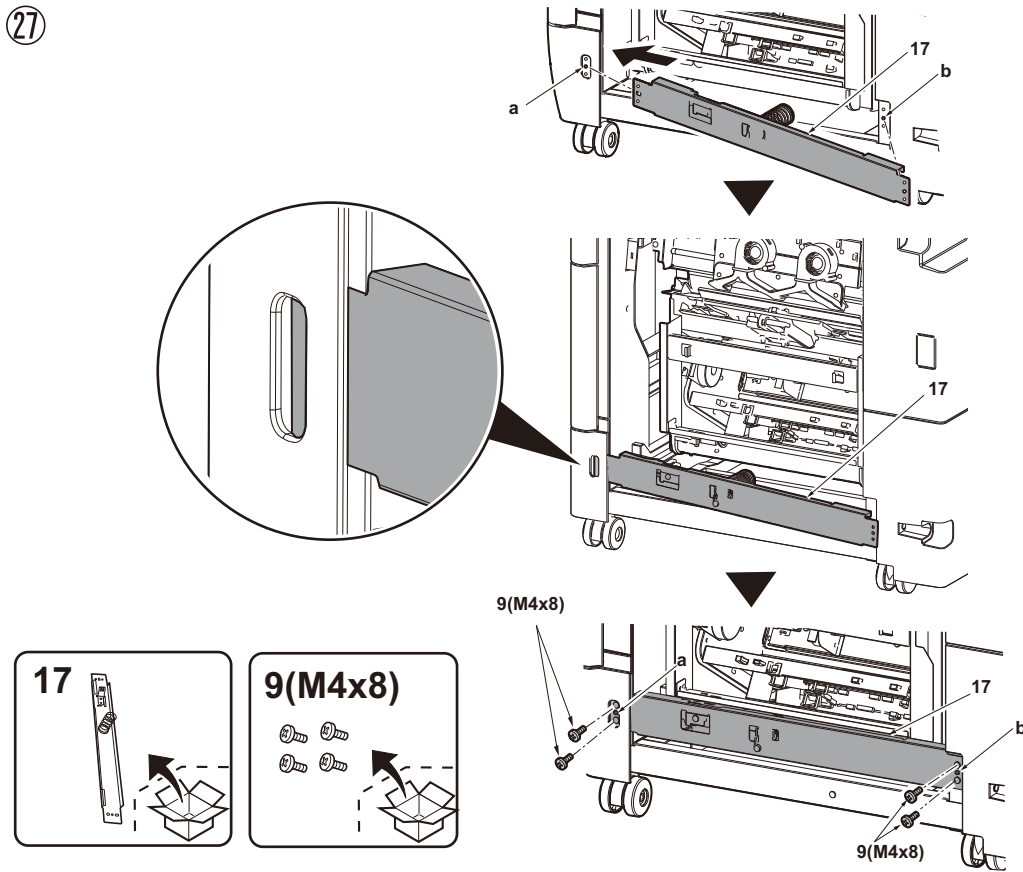
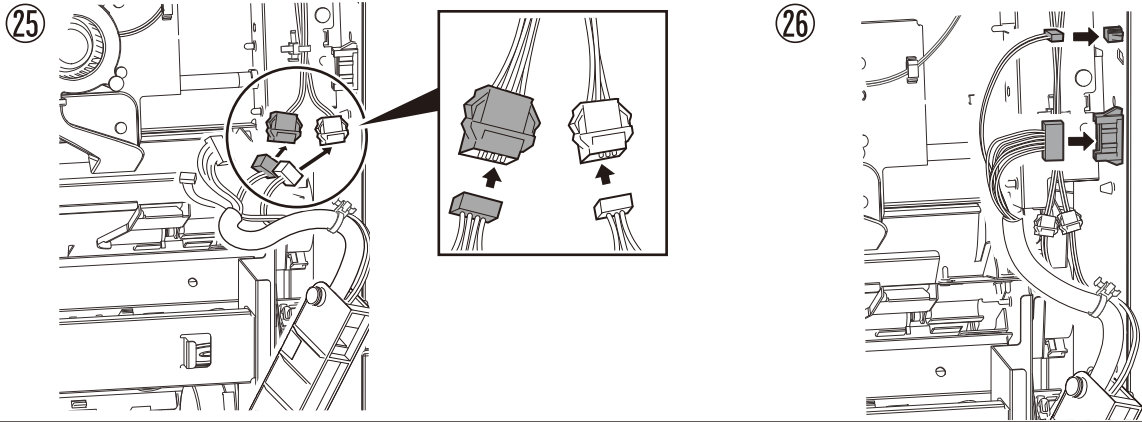


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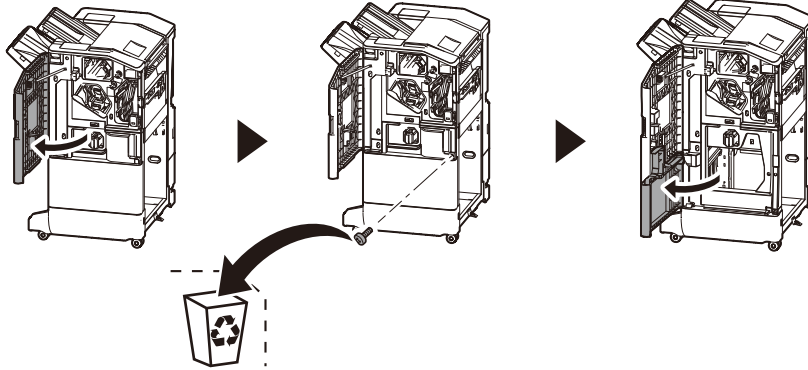


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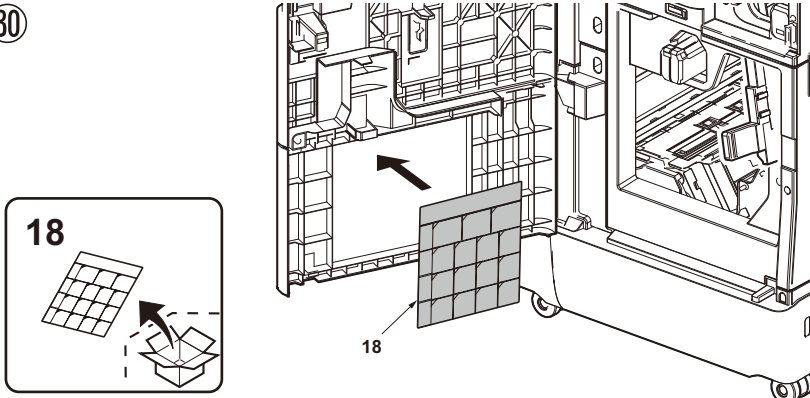




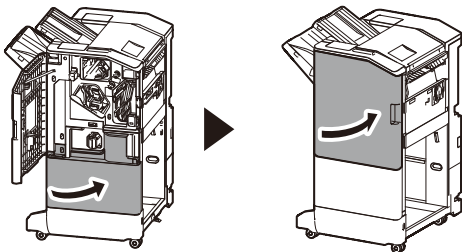
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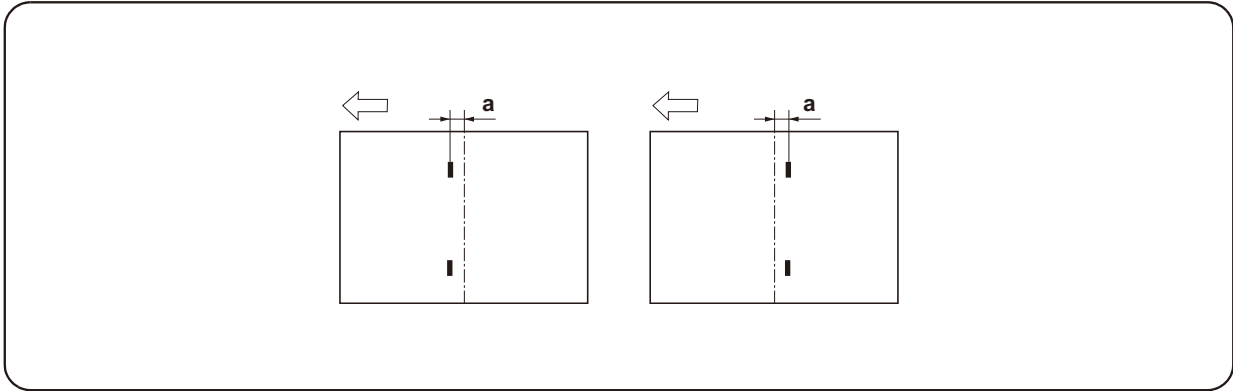


30



31





#### Adjustment of centerfold-stapling position

Check the distance (a) from the stapling position to the center of the paper. If the distance (a) is over the reference value, follow the procedure below to adjust the position.

<Reference value (a)>  $\pm 2$  mm

1. Set maintenance mode U246, select Booklet and Staple Pos#.
2. Adjust the values.
3. Press the Start key to confirm the setting value.

#### Réglage de la position d'agrafage des pages centrales dépliées

Vérifier la distance (a) entre la position d'agrafage et le milieu de la feuille de papier. Si cette distance (a) est supérieure à la valeur de référence, régler la position en procédant de la manière suivante.

<Valeur de référence (a)>  $\pm 2$  mm

1. Passer en mode maintenance U246, sélectionner Booklet et Staple Pos#.
2. Régler les valeurs.
3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

#### Ajuste de la posición de grapado de la unidad de plegado

Compruebe la distancia (a) desde la posición de grapado con respecto al centro del papel. Si dicha distancia (a) supera el valor de referencia, realice el siguiente procedimiento para ajustar la posición.

<Valor de referencia (a)>  $\pm 2$  mm

1. Entre en el modo de mantenimiento U246, seleccione Booklet y Staple Pos#.
2. Ajuste los valores.
3. Pulse la tecla de Start para confirmar el valor de configuración.

#### Einstellung der Mittenfalt-Heftposition

Überprüfen Sie den Abstand (a) zwischen der Heftposition und der Papiermitte. Falls der Abstand (a) größer als der Bezugswert ist, ist die Position gemäß der nachstehenden Prozedur nachzustellen.

<Bezugswert (a)>  $\pm 2$  mm

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Booklet und Staple Pos#.
2. Die Werte einstellen.
3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

#### Regolazione della posizione di cucitura dell'unità di piegatura centrale

Controllare la distanza (a) dalla posizione di spillatura al centro del foglio. Se la distanza (a) è superiore al valore di riferimento, seguire la procedura riportata sotto per regolare la posizione.

<Valore di riferimento (a)>  $\pm 2$  mm

1. Impostare la modalità manutenzione U246, selezionare Booklet e Staple Pos#.
2. Regolare i valori.
3. Premere il tasto di Start per confermare il valore dell'impostazione.

#### 中缝装订位置调整

检查从装订位置到纸张中心的距离 (a)。如果距离 (a) 超出标准值范围，按照下列步骤调节装订位置。

<标准值 (a) >  $\pm 2$ mm

1. 设置维护模式 U246，选择 Booklet>Staple Pos#。
2. 调整设定值。
3. 按 Start 键，以确定设定值。

#### 접기 스테이플 위치조정

스테이플 위치에서 용지 중앙까지의 거리 (a) 를 확인합니다 . 거리 (a) 가 기준치 외의 경우에는 다음 순서로 조정을 합니다 .

<기준치 (a) >  $\pm 2$ mm

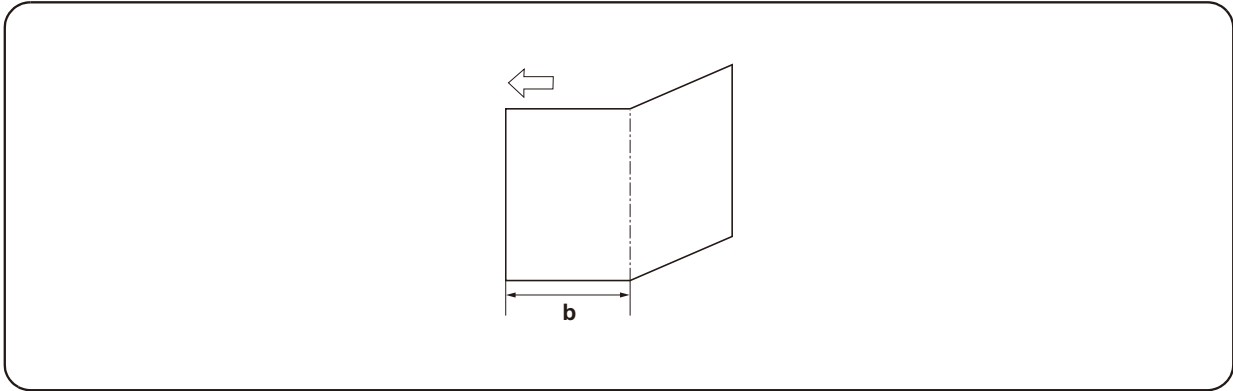
1. 메인テナンス 모드 U246 을 세트하고 Booklet>Staple Pos# 를 선택합니다 .
2. 설정치를 조정합니다 .
3. 시작키를 누르고 설정치를 확인합니다 .

#### 中とじステープル位置調整

ステープル位置から用紙センターまでの距離 (a) を確認する。距離 (a) が基準値外の場合、次の手順で調整を行う。

<基準値 (a) >  $\pm 2$ mm

1. メンテナンスモード U246 をセットし、Booklet>Staple Pos# を選択する。
2. 設定値を調整する。
3. スタートキーを押し、設定値を確定する。



## Adjustment of center folding position

Check the distance (b) from the edge of the paper to the center folding position. If the distance (b) is over the reference value, follow the procedure below to adjust the position.

<Reference value (b)>

A4, Letter: Length of paper  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Length of paper  $\times 1/2 \pm 3$  mm

1. Set maintenance mode U246, select Booklet and Booklet Pos#.

2. Adjust the values.

3. Press the Start key to confirm the setting value.

## Réglage de la position de pliage central

Vérifier la distance (b) entre le bord de la feuille de papier et la position de pliage central. Si cette distance (b) est supérieure à la valeur de référence, régler la position en procédant de la manière suivante.

<Valeur de référence (b)>

A4, Letter : Longueur de la feuille  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Longueur de la feuille  $\times 1/2 \pm 3$  mm

1. Passer en mode maintenance U246, sélectionner Booklet et Booklet Pos#.

2. Régler les valeurs.

3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

## Ajuste de la posición de plegado

Compruebe la distancia (b) desde el borde del papel a la posición de plegado. Si dicha distancia (b) supera el valor de referencia, realice el siguiente procedimiento para ajustar la posición.

<Valor de referencia (b)>

A4, Letter: Longitud del papel  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Longitud del papel  $\times 1/2 \pm 3$  mm

1. Entre en el modo de mantenimiento U246, seleccione Booklet y Booklet Pos#.

2. Ajuste los valores.

3. Pulse la tecla de Start para confirmar el valor de configuración.

## Einstellung der Mittenfaltposition

Überprüfen Sie den Abstand (b) zwischen der Papierkante und der Mittenfaltposition. Falls der Abstand (b) größer als der Bezugswert ist, ist die Position gemäß der nachstehenden Prozedur nachzustellen.

<Bezugswert (b)>

A4, Letter: Papierlänge  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Papierlänge  $\times 1/2 \pm 3$  mm

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Booklet und Booklet Pos#.

2. Die Werte einstellen.

3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

## Regolazione della posizione centrale di piegatura

Controllare la distanza (b) dal bordo della carta alla posizione centrale di piegatura. Se la distanza (b) è superiore al valore di riferimento, seguire la procedura riportata sotto per regolare la posizione.

<Valore di riferimento (b)>

A4, Letter: Lunghezza carta  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: Lunghezza carta  $\times 1/2 \pm 3$  mm

1. Impostare la modalità manutenzione U246, selezionare Booklet e Booklet Pos#.

2. Regolare i valori.

3. Premere il tasto di Start per confermare il valore dell'impostazione.

## 中缝折叠位置调整

检查从纸张头部到折叠位置的距离 (b)。如果距离 (b) 超出标准值范围, 按照下列步骤调节折叠位置。

<标准值 (b) >

A4, Letter: 纸张长度  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: 纸张长度  $\times 1/2 \pm 3$  mm

1. 设置维护模式 U246, 选择 Booklet>Booklet Pos#。

2. 调整设定值。

3. 按 Start 键, 以确定设定值。

## 접기 위치조정

용지 끝에서 접기 위치까지의 거리 (b) 를 확인합니다 . 거리 (b) 가 기준치 외의 경우에는 다음 순서로 조정을 합니다 .

<기준치 (b) >

A4, Letter: 용지길이  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: 용지길이  $\times 1/2 \pm 3$  mm

1. 메인テナンス 모드 U246 을 세트하고 Booklet> Booklet Pos# 를 선택합니다 .

2. 설정치를 조정합니다 .

3. 시작키를 누르고 설정치를 확인합니다 .

## 中折り位置調整

用紙端から中折り位置までの距離 (b) を確認する。距離 (b) が基準値外の場合、次の手順で調整を行う。

<基準値 (b) >

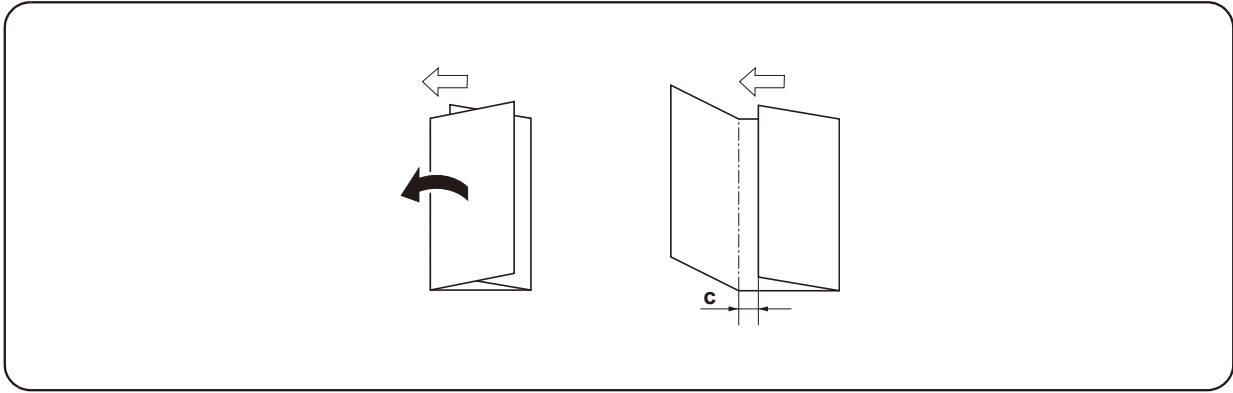
A4, Letter: 用紙長  $\times 1/2 \pm 2$  mm

A3, Ledger, B4: 用紙長  $\times 1/2 \pm 3$  mm

1. メンテナンスモード U246 をセットし、Booklet>Booklet Pos# を選択する。

2. 設定値を調整する。

3. スタートキーを押し、設定値を確定する。

**Adjustment of tri-folding position**

Check the distance (c) from the edge of the paper to the second folding position. If the distance (c) is over the reference value, follow the procedure below to adjust the position.

<Reference value (c)> 7.0 ± 2 mm

1. Set maintenance mode U246, select Booklet and Three Fold.

2. Adjust the values.

3. Press the Start key to confirm the setting value.

**Réglage de la position de triple pliage**

Vérifier la distance (c) entre le bord de la feuille de papier et la position du deuxième pliage. Si cette distance (c) est supérieure à la valeur de référence, régler la position en procédant de la manière suivante.

<Valeur de référence (c)> 7,0 ± 2 mm

1. Passer en mode maintenance U246, sélectionner Booklet et Three Fold.

2. Régler les valeurs.

3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

**Ajuste de la posición de plegado tríptico**

Compruebe la distancia (c) desde el borde del papel a la segunda posición de plegado. Si dicha distancia (c) super a el valor de referencia, realice el siguiente procedimiento para ajustar la posición.

<Valor de referencia (c)> 7,0 ± 2 mm

1. Entre en el modo de mantenimiento U246, seleccione Booklet y Three Fold.

2. Ajuste los valores.

3. Pulse la tecla de Start para confirmar el valor de configuración.

**Einstellung der Dreilagfaltposition**

Überprüfen Sie den Abstand (c) zwischen der Papierkante und der zweiten Faltposition. Falls der Abstand (c) größer als der Bezugswert ist, ist die Position gemäß der nachstehenden Prozedur nachzustellen.

<Bezugswert (c)> 7,0 ± 2 mm

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Booklet und Three Fold.

2. Die Werte einstellen.

3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

**Regolazione della posizione di piegatura tripla**

Controllare la distanza (c) dal bordo della carta alla posizione della seconda piegatura. Se la distanza (c) è superiore al valore di riferimento, seguire la procedura riportata sotto per regolare la posizione.

<Valore di riferimento (c)> 7,0 ± 2 mm

1. Impostare la modalità manutenzione U246, selezionare Booklet e Three Fold.

2. Regolare i valori.

3. Premere il tasto di Start per confermare il valore dell'impostazione.

**三折位置調整**

检查从纸张头部到第2个折叠位置的距离(c)。如果距离(c)超出标准值范围,按照下列步骤调节折叠位置。

<标准(c)> 7.0±2mm

1. 设置维护模式 U246, 选择 Booklet>Three Fold。

2. 调整设定值。

3. 按 Start 键, 以确定设定值。

**두번 접기 위치 조정**

용지끝과 두번째 접히는 위치까지의 거리 (c) 를 확인합니다 . 거리 (c) 가 기준치 외의 경우에는 다음 순서로 조정을 합니다 .

<기준치 (c) > 7.0±2mm

1. 메인テナンス 모드 U246 을 세트하고 Booklet>Three Fold 를 선택합니다 .

2. 설정치를 조정합니다 .

3. 시작키를 누르고 설정치를 확인합니다 .

**三折り位置調整**

用紙端と二つ目の折り位置までの距離 (c) を確認する。距離 (c) が基準値外の場合、次の手順で調整を行う。

<基準値 (c) > 7.0±2mm

1. メンテナンスモード U246 をセットし、Booklet>Three Fold を選択する。

2. 設定値を調整する。

3. スタートキーを押し、設定値を確定する。





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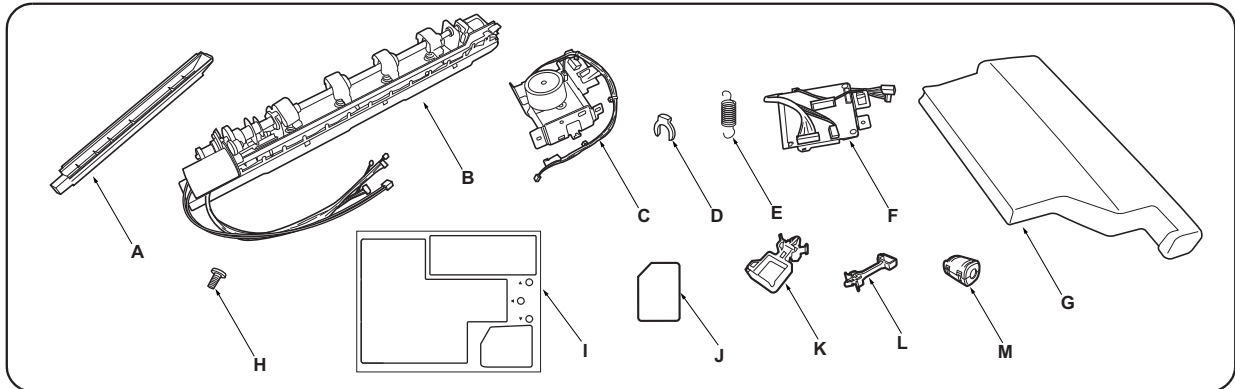


**(8)PH-7A/B/C/D**

# **PH-7A/B/C/D**

## **(Punch Unit)**

# **Installation Guide**



<b>English</b>	E. Spring..... 1	L. Large clamp (for DF-790/DF-791/DF-7110).. 1
Supplied parts	F. Punch PWB ..... 1	M. Ferrite core ..... 1
A. Punch guide..... 1	G. Waste hole punch box ..... 1	Be sure to remove any tape and/or cushioning material from supplied parts.
B. Hole punch unit..... 1	H. M3 x 8 tap Tight S screw ..... 3	*1:DF-7110/DF-7120:(J) is not used.
C. Motor unit..... 1	I. Label sheet ..... 1	
D. Stop ring ..... 1	J. Film (for DF-770/DF-790/DF-791) *1 ..... 1	
	K. Small clamp (for DF-770/DF-7120)..... 1	

<b>Français</b>	E. Ressort ..... 1	L. Grand collier (pour DF-790/DF-791/DF-7110) . 1
Pièces fournies	F. PWB de la perforatrice..... 1	M. Noyau de ferrite ..... 1
A. Guide de perforatrice..... 1	G. Bac de récupération de la perforatrice..... 1	Veillez à retirer les morceaux de bande adhésive et/ou les matériaux de rembourrage des pièces fournies.
B. Perforatrice ..... 1	H. Vis S taraudée M3 x 8 ..... 3	*1:DF-7110/DF-7120:(J) n'est pas utilisé.
C. Moteur ..... 1	I. Feuillet d étiquettes..... 1	
D. Bague d'arrêt ..... 1	J. Film (pour DF-770/DF-790/DF-791) *1 ..... 1	
	K. Petit collier (pour DF-770/DF-7120)..... 1	

<b>Español</b>	E. Resorte ..... 1	L. Sujetador grande (para DF-790/DF-791/DF-7110) 1
Partes suministradas	F. PWB de perforación..... 1	M. Núcleo de ferrita..... 1
A. Guía de perforación..... 1	G. Caja para desechos de la perforación ..... 1	Asegúrese de despegar todas las cintas y/o material amortiguador de las partes suministradas.
B. Perforadora..... 1	H. Tornillo de ajuste M3 x 8..... 3	*1:DF-7110/DF-7120:(J) no se utiliza.
C. Unidad motriz ..... 1	I. Hoja con etiqueta ..... 1	
D. Anillo de tope..... 1	J. Película ( para DF-770/DF-790/DF-791) *1 ..... 1	
	K. Sujetador pequeño (para DF-770/DF-7120) .. 1	

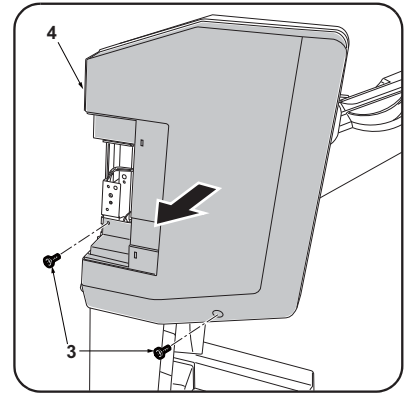
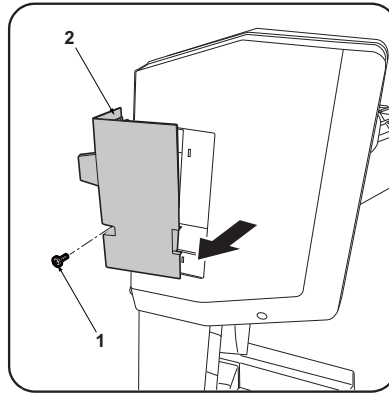
<b>Deutsch</b>	E. Feder ..... 1	L. Große Klemme ( für DF-790/DF-791/DF-7110) 1
Delieferte Teile	F. Locher-PWB ..... 1	M. Ferritkern ..... 1
A. Locherführung ..... 1	G. Lochungsabfallbehälter..... 1	Entfernen Sie Klebeband und/oder Dämpfungsmaterial vollständig von den mitgelieferten Teilen.
B. Lochereinheit ..... 1	H. M3 x 8 Passstift-Verbandschrauben..... 3	*1:DF-7110/DF-7120:(J) wird nicht benötigt.
C. Motoreinheit..... 1	I. Aufkleberbogen..... 1	
D. Anschlagring..... 1	J. Film(für DF-770/DF-790/DF-791) *1 ..... 1	
	K. Kleine Klemme (für DF-770/DF-7120)..... 1	

<b>Italiano</b>	E. Molla ..... 1	L. Morsetto grande (per DF-790/DF-791/DF-7110) 1
Parti di fornitura	F. Scheda a circuiti stampati di perforazione.... 1	M. Nucleo di ferrite..... 1
A. Guida perforazione ..... 1	G. Scarto perforazione ..... 1	Accertarsi di rimuovere tutti i nastri adesivi e/o il materiale di imbottitura dalle parti fornite.
B. Unità di perforazione ..... 1	H. Viti con testa a croce S M3 x 8..... 3	*1:DF-7110/DF-7120:(J) non è utilizzato.
C. Unità motore ..... 1	I. Foglio di etichette..... 1	
D. Anello di bloccaggio..... 1	J. Pellicola(per DF-770/DF-790/DF-791) *1 ..... 1	
	K. Morsetto piccolo (per DF-770/DF-7120)..... 1	

<b>简体中文</b>	E. 弹簧 ..... 1	K. 固定夹 小 (DF-770/DF-7120 用) ..... 1
附属品	F. 打孔单元电路板 ..... 1	L. 固定夹 大 (DF-790/DF-791/DF-7110 用) .. 1
A. 打孔导向板..... 1	G. 打孔纸屑盒 ..... 1	M. 磁环 ..... 1
B. 打孔单元..... 1	H. M3 X 8 攻丝紧固型 S 螺丝 ..... 3	如果附属品上带有固定胶带, 缓冲材料时务必揭下。
C. 电机单元..... 1	I. 标签纸 ..... 1	*1:DF-7110/DF-7120: 不使用 (J)。
D. 止动环..... 1	J. 胶片 (DF-770/DF-790/DF-791 用) *1 ..... 1	

<b>한국어</b>	E. 스프링 ..... 1	K. 클램프 소 (DF-770/DF-7120 용) ..... 1
동봉품	F. 펀치기판 ..... 1	L. 클램프 대 (DF-790/DF-791/DF-7110 용) .. 1
A. 펀치가이드..... 1	G. 펀치폐기박스..... 1	M. 페라이트 코어..... 1
B. 펀치유닛..... 1	H. 나사 M3x8 탭타이트 S..... 3	동봉품에 고정 테이프, 완충재가 붙어 있는 경우에는 반드시 제거할 것.
C. 모터유닛..... 1	I. 라벨 시트 ..... 1	*1:DF-7110/DF-7120:(J) 는 사용되지 않습니다.
D. 스톱링 ..... 1	J. 필름 (DF-770/DF-790/DF-791 용) *1 ..... 1	

<b>日本語</b>	E. バネ ..... 1	L. クランプ大 (DF-790/DF-791/DF-7110 用) .. 1
同梱品	F. パンチ基板 ..... 1	M. フェライトコア ..... 1
A. パンチガイド..... 1	G. パンチくずボックス ..... 1	同梱品に固定テープ、緩衝材が付いている場合は必ず取り外すこと。
B. パンチユニット..... 1	H. ビス M3x8 タップタイト S ..... 3	*1:DF-7110/DF-7120:(J) は使用しない。
C. モーターユニット..... 1	I. ラベルシート ..... 1	
D. ストップリング..... 1	J. フィルム (DF-770/DF-790/DF-791 用) *1 ..... 1	
	K. クランプ小 (DF-770/DF-7120 用) ..... 1	

**Procedure**

Before installing the hole punch unit, make sure the MFP's main power switch is turned off and that its power cord is unplugged from the power outlet.

Install the document finisher first and then install the hole punch unit.

**Removing the cover (DF-770/DF-7120)**

If installing on the DF-790/DF-791/DF-7110, proceed to step 1 on page 3.

1. Remove the screw (1) and remove the small rear cover (2).

2. Remove the 2 screws (3) and remove the upper rear cover (4).

**Procédure**

Avant d'installer la perforatrice, s'assurer que l'interrupteur d'alimentation principal du MFP est hors tension et que le câble d'alimentation est débranché de la prise secteur.

Installer d'abord le finisseur de document, puis installer la perforatrice.

**Dépose du couvercle (DF-770/DF-7120)**

Pour l'installation sur le modèle DF-790/DF-791/DF-7110, passer à l'étape 1 de la page 3.

1. Déposer la vis (1) et déposer le petit couvercle arrière (2).

2. Déposer les 2 vis (3) et déposer le couvercle supérieur arrière (4).

**Procedimiento**

Antes de instalar la perforadora, asegúrese de que el interruptor principal de la alimentación del MFP esté desconectado y de que el cable de alimentación esté desenchufado de la toma de corriente de la pared.

Instale primero el finalizador de documentos y luego instale la perforadora.

**Extracción de la cubierta (DF-770/DF-7120)**

Si realiza la instalación en el DF-790/DF-791/DF-7110, vaya al paso 1 de la página 3.

1. Quite el tornillo (1) y, después, quite la cubierta trasera pequeña (2).

2. Quite los 2 tornillos (3) y, después, quite la cubierta trasera superior (4).

**Verfahren**

Bevor Sie mit dem Einbau der Lochereinheit beginnen, stellen Sie sicher, dass der Hauptschalter des Kopierers ausgeschaltet und das Netzkabel aus der Steckdose gezogen ist. Bringen Sie den Dokument-Finisher zuerst und dann erst die Lochereinheit an.

**Entfernen der Abdeckung (DF-770/DF-7120)**

Zur Installation des DF-790/DF-791/DF-7110 weitergehen zu Schritt 1 auf Seite 3.

1. Die Schraube (1) entfernen und die kleine hintere Abdeckung (2) abnehmen.

2. Die 2 Schrauben (3) entfernen und die obere hintere Abdeckung (4) abnehmen.

**Procedura**

Prima di installare l'unità di perforazione, assicurarsi che l'interruttore principale dell'MFP sia spento e che il cavo di alimentazione sia scollegato dalla presa di corrente.

Installare prima la finitrice e poi procedere all'installazione dell'unità di perforazione.

**Rimozione del coperchio (DF-770/DF-7120)**

Se si installa sull'unità DF-790/DF-791/DF-7110, procedere al passo 1 a pagina 3.

1. Rimuovere la vite (1) e quindi rimuovere il pannello posteriore piccolo (2).

2. Rimuovere le 2 viti (3) e quindi rimuovere il pannello superiore posteriore (4).

**安装步骤**

安装打孔单元时，必须事先关闭 MFP 主机的主电源开关，并拔下电源插头后再进行作业。首先安装装订器，然后安装打孔单元。

**拆下盖板 (DF-770/DF-7120 时)**

安装到 DF-790/DF-791/DF-7110 上时，跳至 P3 的步骤 1。

1. 拆除 1 颗螺丝 (1)，拆下后部小盖板 (2)。

2. 拆除 2 颗螺丝 (3)，拆下后上部盖板 (4)。

**설치순서**

펀치유니트를 부착할 때에는 반드시 MFP 본체의 주 전원 스위치를 OFF로 하고 전원플러그를 뺀 다음 작업을 할 것.  
문서 피니셔를 설치 후, 펀치유니트를 설치 할 것.

**커버제거 (DF-770/DF-7120의 경우)**

DF-790/DF-791/DF-7110에 장착하는 경우에는 P3의 순서 1로 진행합니다.

1. 나사 (1) 1개를 제거하고 뒷 소커버 (2)를 제거합니다.

2. 나사 (3) 2개를 제거하고 뒷 상커버 (4)를 제거합니다.

**取付手順**

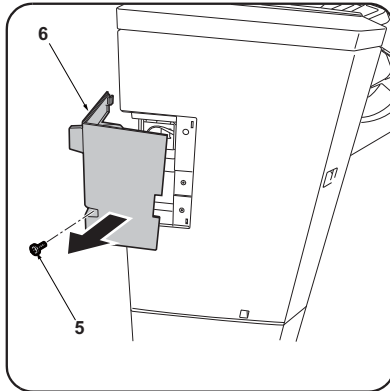
パンチユニットを設置するときは、必ず MFP 本体の主電源スイッチを OFFにし、電源プラグを抜いてから作業すること。  
ドキュメントフィニッシャーを設置後、パンチユニットを設置すること。

**カバーの取り外し (DF-770/DF-7120の場合)**

DF-790/DF-791/DF-7110に装着の場合は、P3の手順 1へ進む。

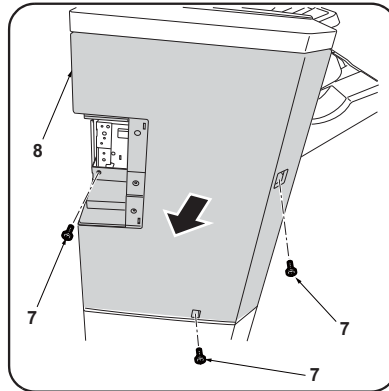
1. ビス (1) 1本を外し、後小カバー (2)を取り外す。

2. ビス (3) 2本を外し、後上カバー (4)を取り外す。

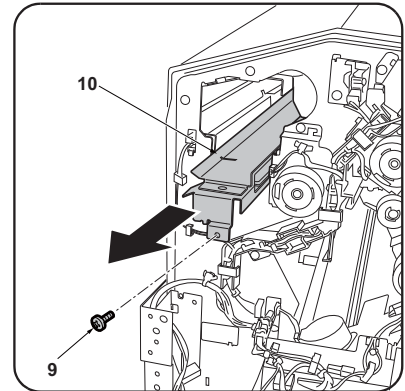


Removing the cover (DF-790/DF-791/DF-7110)

1. Remove the screw (5) and remove the small rear cover (6).



2. Remove the 3 screws (7) and remove the upper rear cover (8).



Installing the hole punch unit  
3. Remove the screw (9) and pull the guide (10) outwards.

Dépose du couvercle (DF-790/DF-791/DF-7110)

1. Déposer la vis (5) et déposer le petit couvercle arrière (6).

2. Déposer les 3 vis (7) et déposer le couvercle supérieur arrière (8).

Installation de la perforatrice

3. Déposer la vis (9) et tirer le guide (10) vers l'extérieur.

Extracción de la cubierta (DF-790/DF-791/DF-7110)

1. Quite el tornillo (5) y, después, quite la cubierta trasera pequeña (6).

2. Quite los 3 tornillos (7) y, después, quite la cubierta trasera superior (8).

Instalación de la perforadora

3. Quite el tornillo (9) y tire de la guía (10) hacia fuera.

Entfernen der Abdeckung (DF-790/DF-791/DF-7110)

1. Die Schraube (5) entfernen und die kleine hintere Abdeckung (6) abnehmen.

2. Die 3 Schrauben (7) entfernen und die obere hintere Abdeckung (8) abnehmen.

Anbringen der Lochereinheit

3. Die Schraube (9) entfernen und die Führung (10) nach außen ziehen.

Rimozione del coperchio (DF-790/DF-791/DF-7110)

1. Rimuovere la vite (5) e quindi rimuovere il pannello posteriore piccolo (6).

2. Rimuovere le 3 viti (7) e quindi rimuovere il pannello superiore posteriore (8).

Installare l'unità di perforazione

3. Rimuovere la vite (9) ed estrarre la guida (10) verso l'esterno.

取下盖板 (DF-790/DF-791/DF-7110 时)

1. 拆除 1 颗螺丝 (5), 拆下后部小盖板 (6)。

2. 拆除 3 颗螺丝 (7), 拆下后上部盖板 (8)。

安装打孔单元

3. 拆除 1 颗螺丝 (9), 将导向板 (10) 向外拉出。

커버제거 (DF-790/DF-791/DF-7110 의 경우)

1. 나사 (5) 1 개를 제거하고 뒷 소커버 (6) 를 제거합니다 .

2. 나사 (7) 3 개를 제거하고 뒷 상커버 (8) 를 제거합니다 .

펀치유닛 부착

3. 나사 (9) 1 개를 제거하고 가이드 (10) 을 앞으로 끌어 당깁니다 .

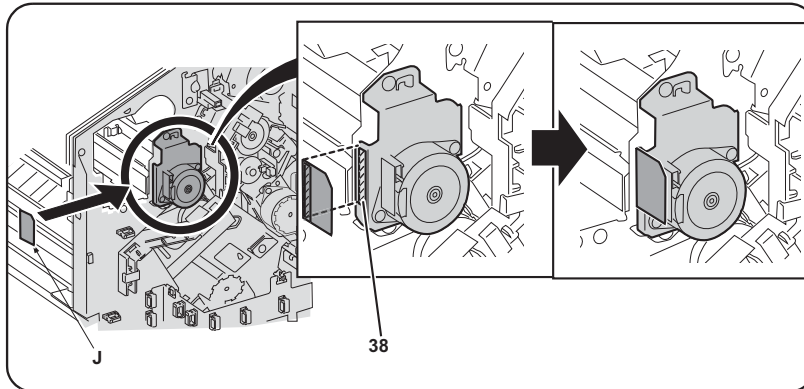
カバーの取り外し (DF-790/DF-791/DF-7110 の場合)

1. ビス (5) 1 本を外し、後小カバー (6) を取り外す。

2. ビス (7) 3 本を外し、後上カバー (8) を取り外す。

パンチユニットの取り付け

3. ビス (9) 1 本を外し、ガイド (10) を手前に引き出す。



4. After using alcohol to clean the shaded portion (38) of the motor shown for adhering the film (J), adhere the film. (DF-770/DF-790/DF-791 only)

4. Après avoir utilisé de l'alcool pour nettoyer la partie du moteur hachurée (38) sur laquelle le film (J) est apposé, collez ce film. (DF-770/DF-790/DF-791 uniquement)

4. Después de utilizar alcohol para limpiar la parte sombreada (38) del motor mostrada en la ilustración para pegar la película (J), pegue la película. (DF-770/DF-790/DF-791 solamente)

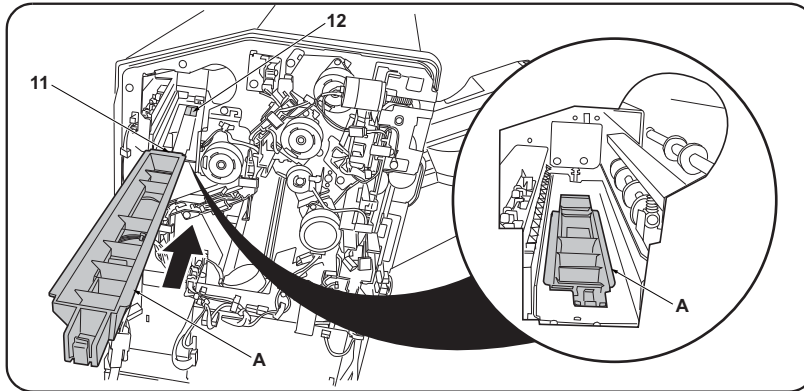
4. Den in der Abbildung grau dargestellten Teil (38) des Motors zum Anbringen des Films (J) mit Alkohol reinigen und dann den Film anbringen. (nur DF-770/DF-790/DF-791)

4. Dopo aver usato l'alcool per pulire la parte ombreggiata (38) del motore, illustrata per l'adesione della pellicola (J), far aderire la pellicola. (solo DF-770/DF-790/DF-791)

4. 用酒精清洁电机斜侧处(38)的粘贴位置后, 粘贴胶片(J)。(仅限DF-770/DF-790/DF-791)

4. 모터 사선부(38)의 부착위치를 알코올 청소 후, 필름(J)을 부착합니다. (DF-770/DF-790/DF-791 만)

4. モーター斜線部(38)の貼り付け位置をアルコール清掃後、フィルム(J)を貼り付ける。(DF-770/DF-790/DF-791のみ)



5. Install the punch guide (A) so that the leading edge of the guide (11) is below the document finisher frame (12).

5. Monter le guide de la perforatrice (A) de sorte que le bord d'attaque du guide (11) se trouve sous le bâti du retoucheur de document (12).

5. Instale la guía de perforación (A) de forma tal que el borde delantero de la guía (11) quede debajo de la carcasa del finalizador de documentos (12).

5. Die Locherführung (A) so einsetzen, dass die Vorderkante der Führung (11) unter dem Rahmen (12) des Dokument-Finishers liegt.

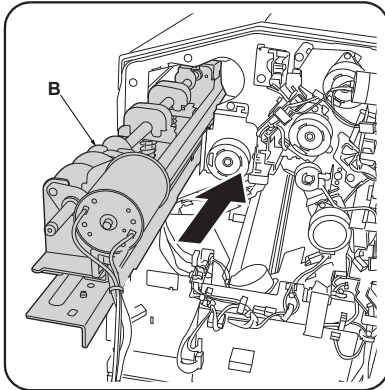
5. Installare la guida perforazione (A) in modo che il bordo principale della guida (11) sia sotto il telaio (12) della finitrice di documenti.

5. 将打孔导向板 (A) 的前端 (11) 安装在装订器的框架 (12) 的下部。

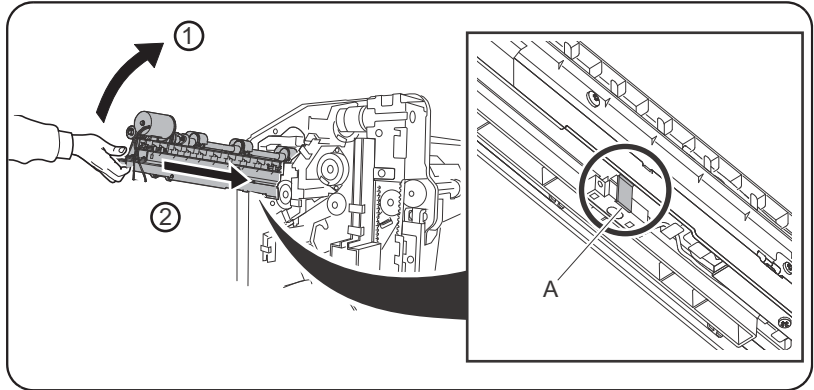
5. 펀치가이드 (A) 의 끝 (11) 이 문서 피니셔의 프레임 (12) 밑으로 되도록 장착합니다 .

5.パンチガイド (A) の先端 (11) がドキュメントフィニッシャーのフレーム (12) の下になるように取り付ける。





6. Insert the hole punch unit (B) into the document finisher.



#### Notes When Installing the Punch Unit

When installing the punch unit at the procedure 6 on page 6, please insert it while slightly holding it up (①, ②).

Please note that the hook at the bottom (A) might be damaged if the punch unit is forcibly installed while holding it down.

6. Insérer la perforatrice (B) dans le retoucheur de document.

#### Notes lors de l'installation de l'unité de perforation:

Lors de l'installation de l'unité de perforation à la procédure 6 de la page 6, veuillez l'insérer en la soulevant légèrement (①, ②).

Veillez noter que le crochet du bas (A) peut être endommagé si l'unité de perforation est installée de force en la maintenant vers le bas.

6. Inserte la perforadora (B) en el finalizador de documentos.

#### Nota al instalar el kit perforador

Al instalar el kit perforador según página 6 del procedimiento 6, introdúzcalo elevándolo ligeramente (①, ②).

Tenga en cuenta que la pestaña de la parte inferior (A) se puede dañar si el kit de perforado se fuerza en la instalación.

6. Die Lochereinheit (B) in den Dokument-Finisher einsetzen.

#### Hinweis zur Installation der Lochereinheit

Wenn Sie die Lochereinheit wie in Schritt 6 auf Seite 6 beschrieben installieren, halten Sie die Lochereinheit beim Einsetzen ein wenig nach oben (①, ②).

Bitte beachten Sie, dass der Haken (A) am Boden beschädigt werden kann, wenn die Lochereinheit bei der Installation nach unten gehalten wird, so dass zu viel Kraftaufwand erforderlich ist.

6. Inserire l'unità di perforazione (B) nella finitrice di documenti.

#### Note per l'installazione dell'unità di perforazione.

Installare l'unità di perforazione, come da procedura 6 pagina 6, inserendola delicatamente e tenendola sollevata (①, ②).

Fare attenzione al gancio nella parte inferiore (A) che potrebbe venir danneggiato se si forza verso il basso durante l'istallazione.

6. 将打孔单元 (B) 插入到装订器中。

#### 安装打孔单元时的注意事项:

按第 6 页中的第 6 步骤安装打孔单元时, 请先把打孔单元微微向上提起后才插入 (①、②)。请注意打孔单元在没有向上提起而被强行插入的话, 有可能会损坏打孔单元底部的扣位 (A)。

6. 펀치유닛 (B) 를 문서 피니셔에 삽입합니다.

#### 펀치유닛 조립시의 주의점

6 페이지 수순 6에서 펀치유닛을 삽입할 때는 펀치유닛을 약간 들어올리면서 삽입하여 주세요. (①, ②)

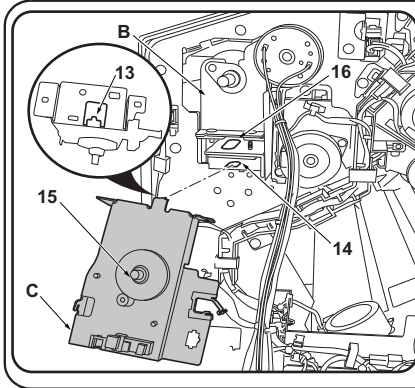
펀치유닛을 아래로 내리면서 강하게 삽입하면 펀치유닛 바닥부의 후크 (A) 를 파손 할 수 있으므로 주의하여 주세요.

6.パンチユニット (B) をドキュメントフィニッシャーに挿入する。

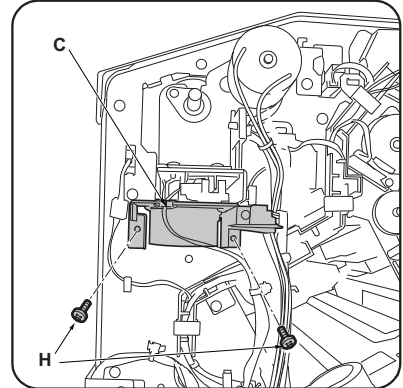
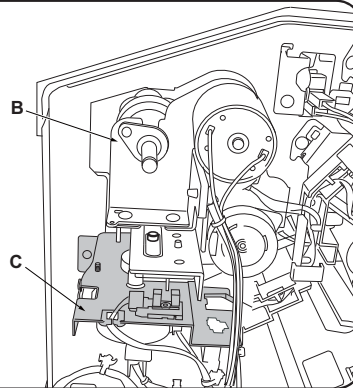
#### パンチユニット取付時の注意点

6ページ 手順6でパンチユニットを挿入するときは、ユニットを少し持ち上げながら挿入して下さい。(①、②)

パンチユニットを下げながら強く挿入するとパンチユニット底部のフック (A) を破損するおそれがありますので、ご注意下さい。



7. Raise the hole punch unit (B) slightly and fit the hook (13) on the motor unit (C) into the groove (14) in the document finisher. At the same time, insert the rod (15) on the motor unit (C) into the hole (16) in the hole punch unit (B).



8. Secure the motor unit (C) with the 2 screws (H).

7. Lever légèrement la perforatrice (B) et insérer le crochet (13) du moteur (C) dans la rainure (14) du retoucheur de documents. Insérer en même temps la tige (15) du moteur (C) dans le trou (16) de la perforatrice (B).

8. Fixer le moteur (C) à l'aide de 2 vis (H).

7. Levante ligeramente la perforadora (B) y encaje el gancho (13) de la unidad motriz (C) en la ranura (14) del finalizador de documentos. Al mismo tiempo, inserte la varilla (15) de la unidad motriz (C) en el orificio (16) de la perforadora (B).

8. Asegure la unidad motriz (C) con los 2 tornillos (H).

7. Die Lochereinheit (B) leicht anheben und den Haken (13) an der Motoreinheit (C) in die Nut (14) des Dokument-Finishers einsetzen. Dabei auch die Stange (15) an der Motoreinheit (C) in die Öffnung (16) der Lochereinheit (B) einstecken.

8. Die Motoreinheit (C) mit den 2 Schrauben (H) sichern.

7. Sollevare leggermente l'unità di perforazione (B) ed inserire il gancio (13) sull'unità motore (C) nella scanalatura (14) della finitrice di documenti. Contemporaneamente, inserire l'asta (15) sull'unità motore (C) nel foro (16) dell'unità di perforazione (B).

8. Fissare l'unità motore (C) con le 2 viti (H).

7. 稍稍抬起打孔单元 (B), 将电机单元 (C) 的卡扣 (13) 嵌入装订器的沟槽 (14) 内。与此同时, 将电机单元 (C) 的轴 (15) 插入打孔单元 (B) 的孔 (16) 中。

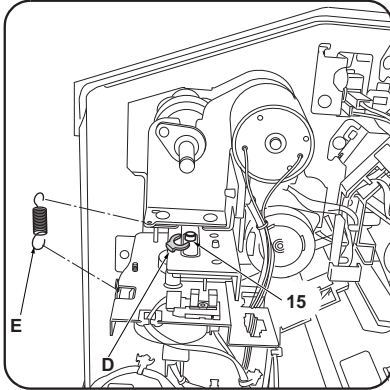
8. 使用 2 颗螺丝 (H) 来固定电机单元 (C)。

7. 펀치유닛 (B) 를 조금 들면서 모터유닛 (C) 후크 (13) 를 문서 피니셔의 구 (14) 에 꽂습니다. 이것과 동시에 모터유닛 (C) 의 축 (15) 을 펀치유닛 (B) 구멍 (16) 에 삽입합니다.

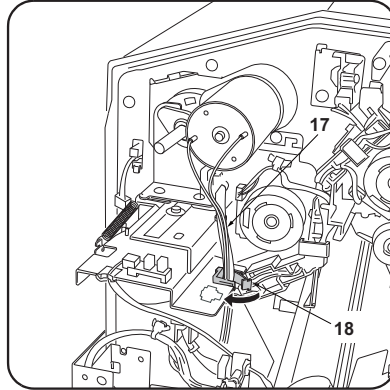
8. 나사 (H) 2 개로 모터유닛 (C) 를 고정합니다.

7.パンチユニット (B) を少し持ち上げながら、モーターユニット (C) のフック (13) をドキュメントフィニッシャーの溝 (14) にはめ込む。これと同時に、モーターユニット (C) の軸 (15) をパンチユニット (B) の穴 (16) に挿入する。

8.ビス (H) 2 本で、モーターユニット (C) を固定する。



9. Fit the stop ring (D) over the motor unit rod (15) and fit the spring (E) between the hole punch unit and motor unit.



10. Run the hole punch unit wire (17) through the motor unit edging (18).

9. Monter la bague d'arrêt (D) sur la tige du moteur (15) et insérer le ressort (E) entre la perforatrice et le moteur.

10. Faire passer le câble de la perforatrice (17) dans le passage de câbles du moteur (18).

9. Coloque el anillo de tope (D) sobre la varilla de la unidad motriz (15) y coloque el resorte (E) entre la perforadora y la unidad motriz.

10. Tienda el cable de la perforadora (17) a través de la pestaña de la unidad motriz (18).

9. Den Anschlagring (D) auf die Stange (15) der Motoreinheit setzen und die Feder (E) zwischen Lochereinheit und Motoreinheit einsetzen.

10. Das Kabel (17) der Lochereinheit durch den Kantenschutz (18) der Motoreinheit führen.

9. Inserire l'anello di bloccaggio (D) sull'asta (15) dell'unità motore ed inserire molla (E) tra l'unità di perforazione e l'unità motore.

10. Far passare il cavo dell'unità di perforazione (17) attraverso il bordo (18) dell'unità motore.

9. 将止动环 (D) 嵌入到电机单元的轴 (15) 上, 在打孔单元与电机单元之间安装弹簧 (E)。

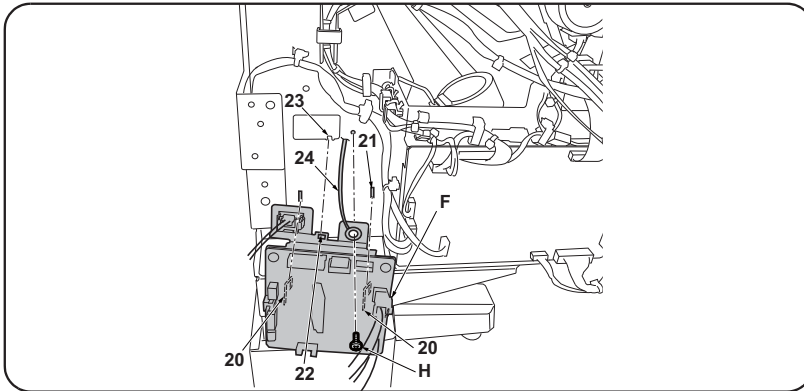
10. 将打孔单元的电线 (17) 穿过电机单元的包边孔 (18)。

9. 모터유닛 축 (15) 에 스톱링 (D) 을 끼고 펀치유닛과 모터유닛 사이에 스프링 (E) 을 설치합니다 .

10. 펀치유닛의 전선 (17) 을 모터유닛의 에징 (18) 에 지나가게 합니다 .

9. 모터ユニットの軸 (15) にストップリング (D) をはめ、パンチユニットとモーターユニットの間にバネ (E) を取り付けます。

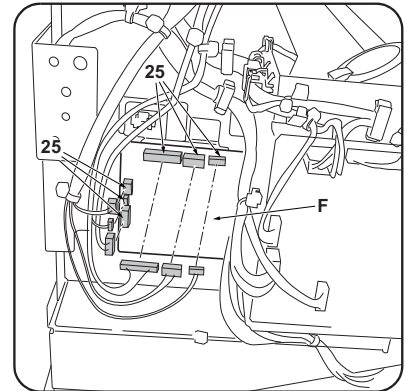
10. パンチユニットの電線 (17) をモーターユニットのエッジング (18) に通す。



Installing the punch PWB and waste hole punch box (DF-770/DF-7120)

If installing on the DF-790/DF-791/DF-7110, proceed to step 11 on page 13.

11. Fit the 2 hooks (20) in the punch PWB (F) into the cut (21) in the document finisher. At the same time, insert the projection (23) on the document finisher into the hole (22) in the punch PWB (F).
12. Using the screw (H), tighten the hole punch unit ground wire (24) and the punch PWB (F) together.



13. Plug the 6 hole punch unit wires into the connectors (25) on the punch PWB (F).

Installation de la PWB de la perforatrice et du bac de récupération de la perforatrice (DF-770/DF-7120).

Pour une installation sur le modèle DF-790/DF-791/DF-7110, passer à l'étape 11 en page 13.

11. Insérer les 2 crochets (20) de la PWB de la perforatrice (F) dans la découpe (21) du retoucheur de document. Insérer en même temps la saillie (23) du retoucheur de document dans le trou (22) de la PWB de la perforatrice (F).

12. Fixer le câble de terre de la perforatrice (24) à la PWB de la perforatrice (F) à l'aide d'une vis (H).

13. Raccorder les 6 câbles de la perforatrice aux connecteurs (25) de la PWB de la perforatrice (F).

Instalación del PWB de perforación y la caja para desechos de la perforación (DF-770/DF-7120)

Si realiza la instalación en el DF-790/DF-791/DF-7110, vaya al paso 11 de la página 13.

11. Coloque los 2 ganchos (20) del PWB de perforación (F) en el corte (21) del finalizador de documentos. Al mismo tiempo, inserte el resalto (23) del finalizador de documentos en el orificio (22) del PWB de perforación (F).

12. Usando el tornillo (H), apriete juntos el cable de conexión a tierra de la perforadora (24) y el PWB de perforación (F).

13. Enchufe los 6 cables de la perforadora a los conectores (25) del PWB de perforación (F).

Installation der Locher-PWB und des Lochungsabfallbehälters (DF-770/DF-7120)

Zur Installation des DF-790/DF-791/DF-7110 weitergehen zu Schritt 11 auf Seite 13.

11. Die 2 Haken (20) in der Locher-PWB (F) in die Aussparung (21) am Dokument-Finisher einsetzen. Dabei auch den Vorsprung (23) am Dokument-Finisher in die Öffnung (22) auf der Locher-PWB (F) einsetzen.

12. Mit der Schraube (H) das Massekabel (24) der Lochereinheit an der Locher-PWB (F) festziehen.

13. Die 6 Kabel der Lochereinheit an die Steckverbinder (25) der Locher-PWB (F) anschließen.

Installazione della scheda a circuiti stampati di perforazione e dello scarto perforazione (DF-770/DF-7120)

Se si installa sull'unità DF-790/DF-791/DF-7110, procedere al passo 11 a pagina 13.

11. Inserire i 2 ganci (20) della scheda a circuiti stampati di perforazione (F) nell'incisione (21) della finitrice di documenti. Contemporaneamente, inserire la sporgenza (23) sulla finitrice di documenti nel foro (22) della scheda a circuiti stampati di perforazione (F).
12. Utilizzando la vite (H), stringere insieme il cavo di terra (24) dell'unità di perforazione e la scheda a circuiti stampati di perforazione (F).

13. Collegare i 6 cavi dell'unità di perforazione nei connettori (25) sulla scheda a circuiti stampati di perforazione (F).

安装电路板与打孔纸屑盒 (DF-770/DF-7120 时)

安装到 DF-790/DF-791/DF-7110 上时, 跳至 P13 的步骤 11。

11. 将打孔电路板 (F) 的 2 个卡扣 (20) 挂在装订器的缺口 (21) 上。同时, 将打孔电路板 (F) 的孔 (22) 卡入装订器的突出部 (23)。
12. 使用 1 颗螺丝 (H) 将打孔单元的接地线 (24) 与打孔电路板 (F) 一起固定。

13. 将打孔单元的 6 根电线与打孔电路板 (F) 的接插件 (25) 相连接。

기판과 펀치폐기박스의 부착 (DF-770/DF-7120 의 경우)

DF-790/DF-791/DF-7110 에 장착하는 경우에는 P13 의 순서 11 로 진행합니다 .

11. 펀치기판 (F) 의 후크 (20) 2 곳을 문서 피니셔의 구멍 (21) 에 겁니다 . 동시에 펀치기판 (F) 구멍 (22) 을 문서 피니셔의 돌기 (23) 에 넣습니다 .
12. 나사 (H) 1 개로 펀치유니트의 접지선 (24) 과 펀치기판 (F) 을 함께 조입니다 .

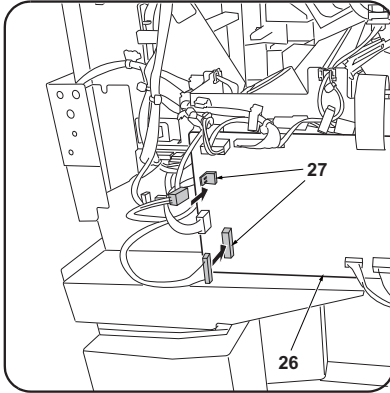
13. 펀치유니트의 전선 6 선을 펀치기판 (F) 커넥터 (25) 에 접속합니다 .

基板とパンチくずボックスの取り付け (DF-770/DF-7120 の場合)

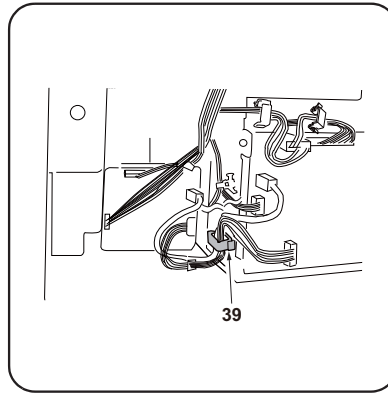
DF-790/DF-791/DF-7110 に装着の場合は、P13 の手順 11 へ進む。

- 11.パンチ基板 (F) のフック (20) 2箇所をドキュメントフィニッシャーの切り欠き (21) に引っ掛ける。同時に、パンチ基板 (F) の穴 (22) をドキュメントフィニッシャーの突起 (23) に入れる。
- 12.ビス (H) 1本で、パンチユニットのアース線 (24) とパンチ基板 (F) を共締めする。

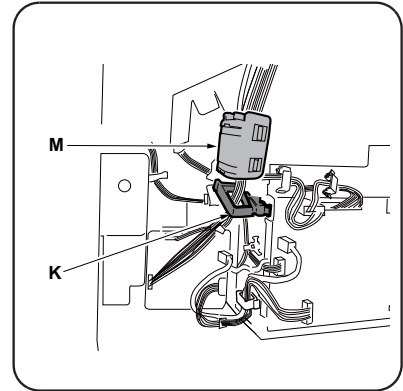
- 13.パンチユニットの電線 6本を、パンチ基板 (F) のコネクタ (25) に接続する。



14. Plug the 2 punch PWB wires into the connectors (27) on the DF main PWB (26).



15. Fasten two wires which were connected in step 14 with the clamp (39).



16. Install the small clamp (K) on the finisher, then pass and fasten the wires from the motor unit and hole punch unit.  
17. Attach the ferrite core (M) to the wire.

14. Raccorder les 2 câbles de la PWB de la perforatrice aux connecteurs (27) de la PWB principale du DF (26).

15. Attacher les deux fils qui ont été connectés à l'étape 14 avec le collier (39).

16. Monter le petit collier (K) sur le retoucheur puis faire passer les câbles du moteur et de la perforatrice dans ce collier pour les fixer en place.  
17. Fixer le noyau en ferrite (M) au câble.

14. Enchufe los 2 cables del PWB de perforación a los conectores (27) del PWB principal del DF (26).

15. Apriete los dos cables que conectó en el paso 14 con la abrazadera (39).

16. Instale el sujetador pequeño (K) en el finalizador, después tienda y ajuste los cables de la unidad motriz y la perforadora.  
17. Fije el núcleo de ferrita (M) al cable.

14. Die 2 Kabel der Locher-PWB an die Steckverbinder (27) der DF-Haupt-PWB anschließen.

15. Befestigen Sie die beiden Kabel, die in Schritt 14 verbunden wurden, mit der Schelle (39).

16. Die kleine Klemme (K) am Finisher anbringen, dann die Kabel von der Motoreinheit und der Lochereinheit hindurchführen und befestigen.  
17. Den Ferritkern (M) am Kabel befestigen.

14. Collegare i 2 cavi della scheda a circuiti stampati di perforazione nei connettori (27) sulla scheda principale PWB (26) della DF.

15. Fissare i due cavi collegati al punto 14 con il morsetto (39).

16. Installare il morsetto piccolo (K) sul finitore, e quindi passare e fissare i cavi dall'unità motore e dall'unità di perforazione.  
17. Applicare il nucleo in ferrite (M) al cavo.

14. 将打孔电路板的 2 根电线与 DF 主电路板 (26) 的接插件 (27) 连接。

15. 使用固定夹 (39) 来固定步骤 14 中连接的 2 根电线。

16. 把小固定夹 (K) 安装在装订器上, 从电机单元和打孔单元出来的导线穿过固定夹来固定。  
17. 用磁环 (M) 套住导线。

14. 펀치기판의 전선 2 선을 DF 주 회로기판 (26) 의 커넥터 (27) 에 접속합니다 .

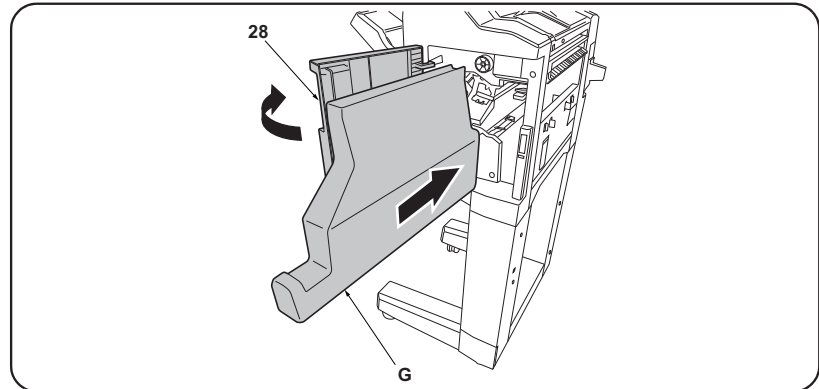
15. 순서 14 로 접속한 2 개의 전선을 클램프 (39) 로 고정해 주십시오 .

16. 클램프 소 (K) 를 피니셔에 장착 , 모터 유니트와 펀치 유니트에서부터 전선을 통과시키고 고정합니다 .  
17. 페라이트 코어 (M) 를 전선으로 장착합니다

14. パンチ基板の電線 2 本を DF 主回路基板 (26) のコネクタ (27) に接続する。

15. 手順 14 で接続した 2 本の電線をクランプ (39) で固定する。

16. クランプ小 (K) をフィニッシャーに取り付け、モーターユニットとパンチユニットからの電線を通し、固定する。  
17. フェライトコア (M) を電線に取り付ける。



18. Replace the upper rear cover (4) and small rear cover (2).

19. Open the upper front cover (28) and insert the waste hole punch box (G).

18. Reposer le couvercle supérieur arrière (4) et le petit couvercle arrière (2).

19. Ouvrir le couvercle supérieur avant (28) et insérer le bac de récupération de la perforatrice (G).

18. Vuelva a colocar la cubierta trasera superior (4) y la cubierta trasera pequeña (2).

19. Abra la cubierta delantera superior (28) e inserte la caja para desechos de la perforación (G).

18. Die obere hintere Abdeckung (4) und die kleine hintere Abdeckung (2) wieder einsetzen.

19. Die obere vordere Abdeckung (28) öffnen und den Lochungsabfallbehälter (G) einsetzen.

18. Ricollocare il pannello superiore posteriore (4) e il pannello posteriore piccolo (2).

19. Aprire il pannello superiore anteriore (28) ed inserire lo scarto perforazione (G).

18. 按原样安装后上部盖板 (4) 与后部小盖板 (2)。

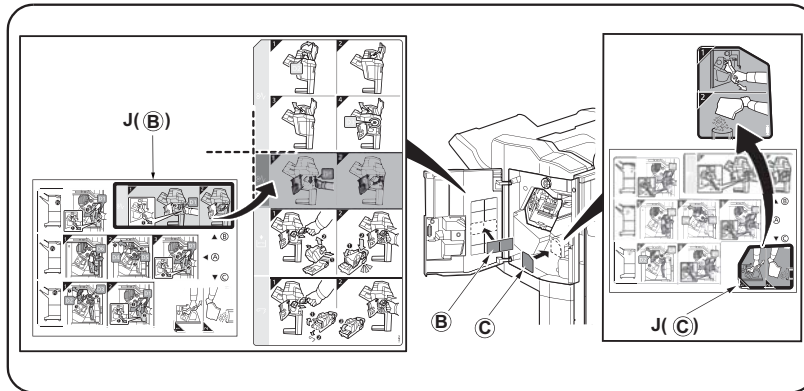
19. 打开前上部盖板 (28), 插入打孔纸屑盒 (G)。

18. 뒷 상커버 (4) 와 후 소커버 (2) 를 원래대로 부착합니다 .

19. 앞 상커버 (28) 를 열고 펀치폐기박스 (G) 를 삽입합니다 .

18. 後上カバー (4) と後小カバー (2) を元通り取り付ける。

19. 前上カバー (28) を開き、パンチくずボックス (G) を挿入する。



20. After cleaning each area with alcohol, adhere the following labels from the label sheet (J) at the locations shown in the illustration: B, C.

21. Close the upper front cover (28).

20. Après avoir nettoyé chaque zone à l'alcool, apposer les étiquettes suivantes du feuillet d'étiquettes (J) aux emplacements indiqués dans l'illustration : B, C.

21. Fermer le couvercle supérieur avant (28).

20. Después de limpiar todas las zonas con alcohol, despegue de la hoja de etiquetas (J) las etiquetas siguientes, y péguelas en los sitios que se indican en la ilustración: B, C.

21. Cierre la cubierta delantera superior (28).

20. Nachdem Sie alle Flächen mit Alkohol gereinigt haben, kleben Sie bitte die folgenden Aufkleber vom Aufkleberbogen (J) an die in der Abbildung angegebenen Stellen: B, C.

21. Die obere vordere Abdeckung (28) schließen.

20. Dopo aver pulito ciascuna zona con alcol, applicare le seguenti etichette del foglio di etichette (J) sui punti mostrati nell'illustrazione: B, C.

21. Chiudere il pannello superiore anteriore (28).

20. 用酒精清洁各区域后, 请在如图所示位置粘帖从标签纸上 (J) 撕下的下列标签 B、C。

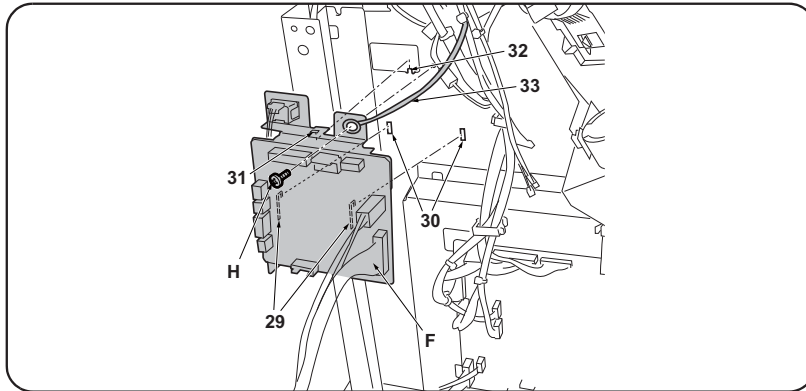
21. 关闭前上部盖板 (28)。

20. 라벨 시트 (J) 내의 하기 라벨을 일러스트의 위치에 알코올청소 후 붙입니다: B, C.

21. 앞 상커버 (28) 를 닫습니다.

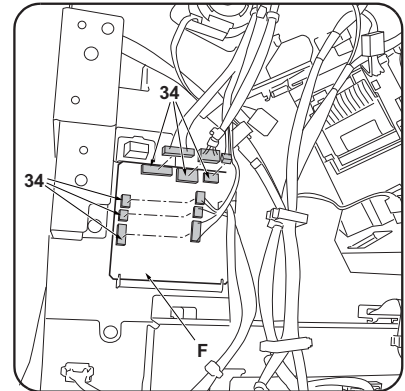
20. ラベルシート (J) 内の B、C をイラストの位置にアルコール清掃後貼り付ける。

21. 前上カバー (28) を閉じる。



Installing the punch PWB and waste hole into the punch box (DF-790/DF-791/DF-7110)

11. Fit the 2 hooks (29) in the punch PWB (F) into the cut (30) in the document finisher. At the same time, insert the projection (32) on the document finisher into the hole (31) in the punch PWB (F).
12. Using the screw (H), tighten the hole punch unit ground wire (33) and the punch PWB (F) together.



13. Plug the 6 hole punch unit wires into the connectors (34) on the punch PWB (F).

Installation de la PWB de la perforatrice et du bac de récupération de la perforatrice (DF-790/DF-791/DF-7110).

11. Insérer les 2 crochets (29) de la PWB de la perforatrice (F) dans la découpe (30) du retoucheur de document. Insérer en même temps la saillie (32) du retoucheur de document dans le trou (31) de la PWB de la perforatrice (F).
12. Fixer le câble de terre de la perforatrice (33) à la PWB de la perforatrice (F) à l'aide d'une vis (H).

13. Raccorder les 6 câbles de la perforatrice aux connecteurs (34) de la PWB de la perforatrice (F).

Instalación del PWB de perforación y la caja para desechos de la perforación (DF-790/DF-791/DF-7110)

11. Coloque los 2 ganchos (29) del PWB de perforación (F) en el corte (30) del finalizador de documentos. Al mismo tiempo, inserte el resalto (32) del finalizador de documentos en el orificio (31) del PWB de perforación (F).
12. Usando el tornillo (H), apriete juntos el cable de conexión a tierra de la perforadora (33) y el PWB de perforación (F).

13. Enchufe los 6 cables de la perforadora a los conectores (34) del PWB de perforación (F).

Installation der Locher-PWB und des Lochungsabfallbehälters (DF-790/DF-791/DF-7110)

11. Die 2 Haken (29) in der Locher-PWB (F) in die Aussparung (30) am Dokument-Finisher einsetzen. Dabei auch den Vorsprung (32) am Dokument-Finisher in die Öffnung (31) auf der Locher-PWB (F) einsetzen.
12. Mit der Schraube (H) das Massekabel (33) der Lochereinheit an der Locher-PWB (F) festziehen.

13. Die 6 Kabel der Lochereinheit an die Steckverbinder (34) der Locher-PWB (F) anschließen.

Installazione della scheda a circuiti stampati di perforazione e dello scarto perforazione (DF-790/DF-791/DF-7110)

11. Inserire i 2 ganci (29) della scheda a circuiti stampati di perforazione (F) nell'intaglio (30) della finitrice di documenti. Contemporaneamente, inserire la sporgenza (32) sulla finitrice di documenti nel foro (31) della scheda a circuiti stampati di perforazione (F).
12. Utilizzando la vite (H), stringere insieme il cavo di terra (33) dell'unità di perforazione e la scheda a circuiti stampati di perforazione (F).

13. Collegare i 6 cavi dell'unità di perforazione nei connettori (34) sulla scheda a circuiti stampati di perforazione (F).

安装电路板与打孔纸屑盒 (DF-790/DF-791/DF-7110 时)

11. 将打孔电路板 (F) 的 2 个卡扣 (29) 挂在装订器的缺口 (30) 上。同时, 将打孔电路板 (F) 的孔 (31) 卡入装订器的突出部 (32)。
12. 使用 1 颗螺丝 (H) 将打孔单元的接地线 (33) 与打孔电路板 (F) 一起固定。

13. 将打孔单元的 6 根电线与打孔电路板 (F) 的接插件 (34) 相连接。

기판과 펀치폐기박스의 부착 (DF-790/DF-791/DF-7110 의 경우)

11. 펀치기판 (F) 의 후크 (29) 2 곳을 문서 피니셔의 구멍 (30) 에 겁니다 . 동시에 펀치기판 (F) 구멍 (31) 을 문서 피니셔의 돌기 (32) 에 넣습니다 .
12. 나사 (H) 1 개로 펀치유니트의 접지선 (33) 과 펀치기판 (F) 을 함께 조입니다 .

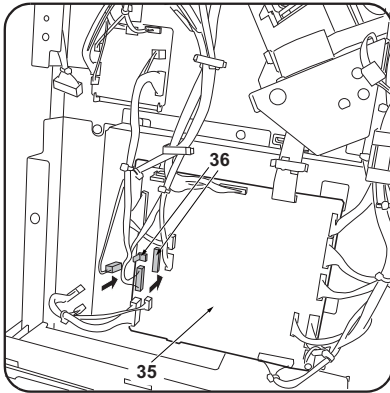
13. 펀치유니트의 전선 6 선을 펀치기판 (F) 커넥터 (34) 에 접속합니다 .

基板とパンチくずボックスの取り付け (DF-790/DF-791/DF-7110 の場合)

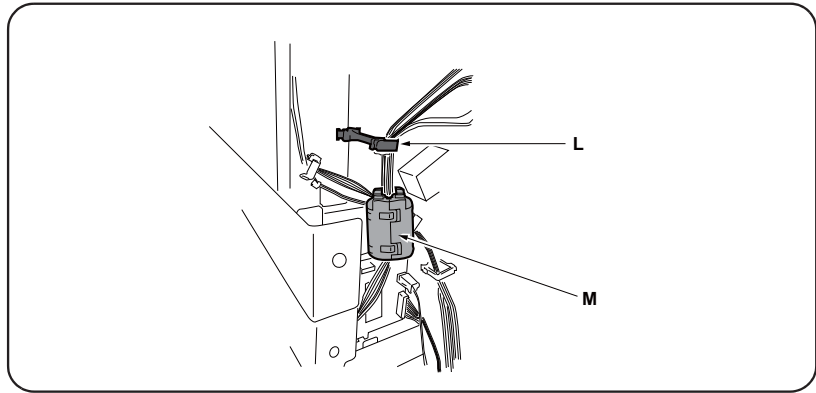
11. パンチ基板 (F) のフック (29) 2箇所をドキュメントフィニッシャーの切り欠き (30) に引っ掛ける。同時に、パンチ基板 (F) の穴 (31) をドキュメントフィニッシャーの突起 (32) に入れる。
12. ビス (H) 1本で、パンチユニットのアース線 (33) とパンチ基板 (F) を共締めする。

13. パンチユニットの電線 6本を、パンチ基板 (F) のコネクタ (34) に接続する。





14. Plug the 2 punch PWB wires into the connectors (36) on the DF main PWB (35).



15. Install the small clamp (L) on the finisher, then pass and fasten the wires from the motor unit and hole punch unit.  
16. Attach the ferrite core (M) to the wire.

14. Raccorder les 2 câbles de la PWB de la perforatrice aux connecteurs (36) de la PWB principale du DF (35).

15. Installer le grand collier (L) sur le retoucheur puis faire passer les câbles du moteur et de la perforatrice dans ce collier pour les fixer en place.  
16. Fixer le noyau en ferrite (M) au câble.

14. Enchufe los 2 cables del PWB de perforación a los conectores (36) del PWB principal del DF (35).

15. Instale el sujetador grande (L) en el finalizador, después tienda y ajuste los cables de la unidad motriz y la perforadora.  
16. Fije el núcleo de ferrita (M) al cable.

14. Die 2 Kabel der Locher-PWB an die Steckverbinder (36) der DF-Haupt-PWB (35) anschließen.

15. Die große Klemme (L) am Finisher anbringen, dann die Kabel von der Motoreinheit und der Lochereinheit hindurchführen und befestigen.  
16. Den Ferritkern (M) am Kabel befestigen.

14. Collegare i 2 cavi della scheda a circuiti stampati di perforazione nei connettori (36) sulla scheda principale PWB (35) della DF.

15. Installare il morsetto grande (L) sul finitore, e quindi passare e fissare i cavi dall'unità motore e dall'unità di perforazione.  
16. Applicare il nucleo in ferrite (M) al cavo.

14. 将打孔电路板的 2 根电线与 DF 主电路板 (35) 的接插件 (36) 连接。

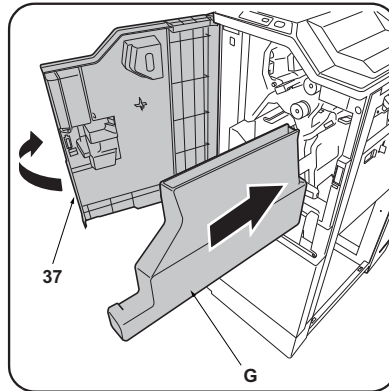
15. 把大固定夹 (L) 安装在装订器上, 从电机单元和打孔单元出来的导线穿过固定夹来固定。  
16. 用磁环 (M) 套住导线。

14. 펀치기판의 전선 2 선을 DF 주 회로기판 (35) 의 커넥터 (36) 에 접속합니다 .

15. 클램프 대 (L) 를 피니셔에 장착, 모터 유닛과 펀치 유닛에서부터 전선을 통과시키고 고정합니다 .  
16. 페라이트 코어 (M) 를 전선으로 장착합니다 .

14.パンチ基板の電線 2 本を DF 主回路基板 (35) のコネクタ (36) に接続する。

15. クランプ大 (L) をフィニッシャーに取り付け、モーターユニットとパンチユニットからの電線を通し、固定する。  
16. フェライトコア (M) を電線に取り付ける。



17. Replace the upper rear cover (8) and small rear cover (6).

18. Open the upper front cover (37) and insert the waste hole punch box (G).

17. Reposer le couvercle supérieur arrière (8) et le petit couvercle arrière (6).

18. Ouvrir le couvercle supérieur avant (37) et insérer le bac de récupération de la perforatrice (G).

17. Vuelva a colocar la cubierta trasera superior (8) y la cubierta trasera pequeña (6).

18. Abra la cubierta delantera superior (37) e inserte la caja para desechos de la perforación (G).

17. Die obere hintere Abdeckung (8) und die kleine hintere Abdeckung(6) wieder einsetzen.

18. Die obere vordere Abdeckung (37) öffnen und den Lochungsabfallbehälter (G) einsetzen.

17. Ricollocare il pannello superiore posteriore (8) e il pannello posteriore piccolo (6).

18. Aprire il pannello superiore anteriore (37) ed inserire lo scarto perforazione (G).

17. 按原样安装后上部盖板 (8) 与后部小盖板 (6)。

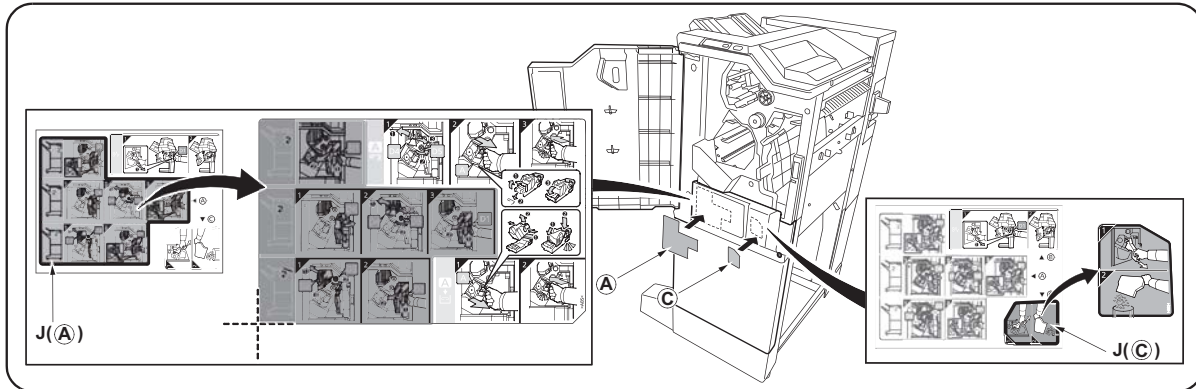
18. 打开前上部盖板 (37)，插入打孔纸屑盒 (G)。

17. 뒷 상커버 (8) 와 후 소커버 (6) 를 원래대로 부착합니다 .

18. 앞 상커버 (37) 를 열고 펀치폐기박스 (G) 를 삽입합니다 .

17. 後上カバー (8) と後小カバー (6) を元通り取り付ける。

18. 前上カバー (37) を開き、パンチくずボックス (G) を挿入する。



19. After cleaning each area with alcohol, adhere the following labels from the label sheet(J) at the locations shown in the illustration: A, C.  
20. Close the upper front cover (37).

19. Après avoir nettoyé chaque zone à l'alcool, apposer les étiquettes suivantes du feuillet d'étiquettes (J) aux emplacements indiqués dans l'illustration : A, C.  
20. Fermer le couvercle supérieur avant (37).

19. Después de limpiar todas las zonas con alcohol, despegue de la hoja de etiquetas (J) las etiquetas siguientes, y péguelas en los sitios que se indican en la ilustración: A, C.  
20. Cierre la cubierta delantera superior (37).

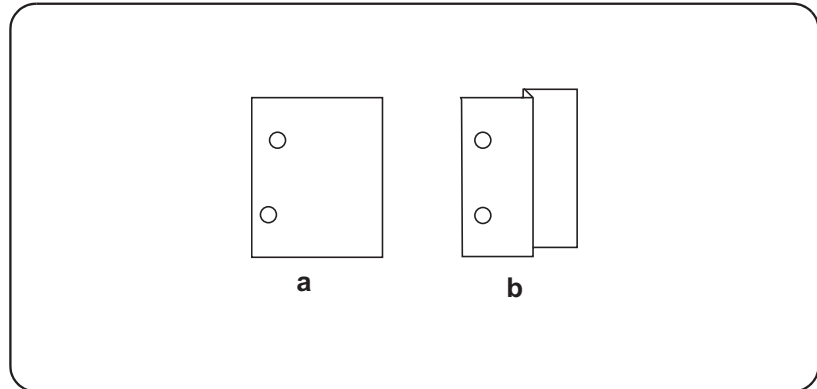
19. Nachdem Sie alle Flächen mit Alkohol gereinigt haben, kleben Sie bitte die folgenden Aufkleber vom Aufkleberbogen (J) an die in der Abbildung angegebenen Stellen: A, C.  
20. Die obere vordere Abdeckung (37) schließen.

19. Dopo aver pulito ciascuna zona con alcool, applicare le seguenti etichette del fogliodi etichette (J) sui punti mostrati nell'illustrazione: A, C.  
20. Chiudere il pannello superiore anteriore (37).

19. 用酒精清洁各区域后, 请在如图所示位置粘贴从标签纸上(J)撕下的下列标签 A、C。  
20. 关闭前上部盖板(37)。

19. 라벨 시트(J) 내의 하기 라벨을 일러스트의 위치에 알코올청소 후 붙입니다:A, C.  
20. 앞 상커버(37)를 닫습니다.

19. ラベルシート(J)内のA,Cをイラストの位置にアルコール清掃後貼り付ける。  
20. 前上カバー(37)を閉じる。

**[Adjusting the hole punch position]**

1. Connect the MFP power plug to the wall outlet and turn the MFP main power switch on.
2. Make a test copy in punch mode.
3. If any off-centering is observed, follow the procedure below to adjust the hole position.

**Adjusting the hole punch entry registration**

1. Enter the maintenance mode U246, select Finisher and Punch Regist.
2. Adjust the values.  
When the paper fed in skewed copy example (a): Increase the setting value.  
When the paper crimped copy example (b): Decrease the setting value.
3. Press the Start key to confirm the setting value.

**[Réglage de la position des perforations]**

1. Insérer la fiche d'alimentation du MFP dans la prise murale et mettre l'interrupteur principal du MFP sous tension.
2. Effectuer une copie d'essai en mode perforation.
3. Si les perforations sont décentrées, suivre la procédure ci-dessous pour ajuster la position de perforation.

**Réglage de l'enregistrement de l'entrée des perforations**

1. Passer en mode maintenance U246, sélectionner Finisher et Punch Regist.
2. Régler les valeurs.  
Si le papier est alimenté de travers exemple de copie (a): Augmentez la valeur de réglage.  
Si le papier est froissé exemple de copie (b): Diminuez la valeur de réglage.
3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

**[Ajuste de la posición de perforación]**

1. Conecte el enchufe del MFP en el receptáculo de pared y encienda el interruptor principal del MFP.
2. Haga una copia de prueba en el modo de perforación.
3. Si observa descentrado, siga el procedimiento de abajo para ajustar la posición del agujero.

**Ajuste del registro de entrada de perforación**

1. Entre en el modo de mantenimiento U246, seleccione Finisher y Punch Regist.
2. Ajuste los valores.  
Cuando el papel alimentado está torcido copia de muestra (a): Aumente el valor de configuración.  
Cuando el papel se dobló copia de muestra (b): Reduzca el valor de configuración.
3. Pulse la tecla de Start para confirmar el valor de configuración.

**[Einstellen der Lochungsposition]**

1. Stecken Sie den Netzstecker des MFP in die Wandsteckdose und schalten Sie den MFP am Hauptschalter ein.
2. Eine Testkopie im Lochungsmodus erstellen.
3. Falls eine außermittige Lochung erfolgte, ist die Lochungsposition wie fgdend nachzustellen.

**Einstellen der Lochungsregistrierung**

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Finisher und Punch Regist.
2. Die Werte einstellen.  
Wenn Papier verkantet eingezogen wird Kopiebeispiel (a): Den Einstellwert erhöhen.  
Wenn Papier verknittert wird Kopiebeispiel (b): Den Einstellwert verringern.
3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

**[Regolazione di posizione dei fori di perforazione]**

1. Collegare la spina del cavo di alimentazione dell'MFP alla presa a muro della rete elettrica e accendere l'interruttore principale di alimentazione.
2. Eseguire una copia di prova in modalità di perforazione.
3. Nel caso in cui non lo siano, eseguire la procedura indicata qui di seguito per regolarne la posizione.

**Regolazione del registro del foro di perforazione**

1. Entrare in modalità manutenzione U246, selezionare Finisher e Punch Regist.
2. Regolare i valori.  
Quando l'alimentazione della carta risulta obliqua esempio di copia (a): Aumentare il valore dell'impostazione.  
Quando la carta risulta increspata esempio di copia (b): Diminuire il valore dell'impostazione.
3. Premere il tasto di Start per confermare il valore dell'impostazione.

**[打孔位置的调节]**

1. 将 MFP 主机上的电源插头插入电源插座中，打开主电源开关。
2. 在打孔模式下进行测试复印。
3. 打孔位置有偏差时，按以下步骤进行调节。

**打孔装入定位调节**

1. 设置维护模式 U246，选择 Finisher、Punch Regist。
2. 调整设定值。  
纸张斜向搬运时的复印样本 (a)：调高设定值。  
纸张作 Z 字折时的复印样本 (b)：调低设定值。
3. 按 Start 键，以确定设定值。

**[펀치위치의 조정]**

1. MFP 본체 전원플러그를 콘센트에 꽂고 주 전원 스위치를 ON 으로 합니다.
2. 펀치모드에서 시험복사를 합니다.
3. 펀치위치가 벗어난 경우에는 다음 순서로 조정합니다.

**펀치반입 레지스트 조정**

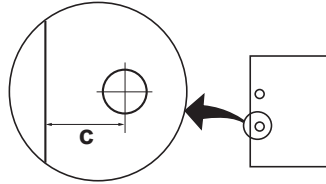
1. 메인テナンス 모드 U246 를 세트하고 Finisher, Punch Regist 를 선택합니다.
2. 설정치를 조정합니다.  
용지가 경사로 반송되는 경우의 복사샘플 (a): 설정치를 높입니다.  
용지가 Z 꺾임이 있는 경우의 복사샘플 (b): 설정치를 내립니다.
3. 시작키를 누르고 설정치를 확인합니다.

**[パンチ位置の調整]**

1. MFP 本体の電源プラグをコンセントに差し込み、主電源スイッチを ON にする。
2. パンチモードでテストコピーを行う。
3. パンチ位置がずれていた場合、次の手順で調整を行う。

**パンチ搬入レジスト調整**

1. メンテナンスモード U246 をセットし、Finisher、Punch Regist を選択する。
2. 設定値を調整する。  
用紙が斜めに搬送される場合コピーサンプル (a)：設定値を上げる。  
用紙が Z 折れする場合コピーサンプル (b)：設定値を下げる。
3. スタートキーを押し、設定値を確定する。



## Adjusting the hole punch position feed

1. Enter the maintenance mode U246, select Finisher and Punch Feed.
2. Adjust the values.  
If the punch hole position is closer to the edge than the reference value (c): Increase the setting value.  
If the punch hole position is further from the edge than the reference value (c): Decrease the setting value.

3. Press the Start key to confirm the setting value.

<Reference value (c)>  
Metric specification: 13 mm; Inch specification: 9.5 mm

## Réglage de la position du point de perforation

1. Passer en mode maintenance U246, sélectionner Finisher et Punch Feed.
2. Régler les valeurs.  
Si la perforation est plus proche du bord de la feuille que défini par la valeur de référence (c): Augmentez la valeur de réglage.  
Si la perforation est plus loin du bord de la feuille que défini par la valeur de référence (c): Diminuez la valeur de réglage.

3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

<Valeur de référence (c)>  
Spécifications métriques: 13 mm; Spécifications en pouces: 9,5 mm

## Ajuste de la alimentación de la posición de perforación

1. Entre en el modo de mantenimiento U246, seleccione Finisher y Punch Feed.
2. Ajuste los valores.  
Si la posición de perforación está más cerca del borde que el valor de referencia (c): Aumente el valor de configuración.  
Si la posición de perforación está más alejada del borde que el valor de referencia (c): Reduzca el valor de configuración.

3. Pulse la tecla de Start para confirmar el valor de configuración.

<Valor de referencia (c)>  
Sistema métrico: 13 mm; en pulgadas: 9,5 mm

## Einstellen des Transports der Lochungsposition

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Finisher und Punch Feed.
2. Die Werte einstellen.  
Falls die Lochungsposition näher an der Kante liegt als der Bezugswert (c) erlaubt: Den Einstellwert erhöhen.  
Falls die Lochungsposition ferner von der Kante liegt als der Bezugswert (c) erlaubt: Den Einstellwert verringern.

3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

<Bezugswert (c)>  
Metrischer Abstand: 13 mm; Abstand in Zoll: 9,5 mm

## Regolazione spostamento di posizione dei fori di perforazione

1. Entrare in modalità manutenzione U246, selezionare Finisher e Punch Feed.
2. Regolare i valori.  
Se la posizione dei fori di perforazione è più vicina al bordo rispetto al valore di riferimento (c): Aumentare il valore dell'impostazione.  
Se la posizione dei fori di perforazione è più lontana dal bordo rispetto al valore di riferimento (c): Diminuire il valore dell'impostazione.

3. Premere il tasto di Start per confermare il valore dell'impostazione.

<Valore di riferimento (c)>  
Specificazione in unità metrica: 13 mm; Specificazione in pollici: 9,5 mm

## 打孔位置搬运调节

1. 设置维护模式 U246, 选择 Finisher、Punch Feed.
2. 调整设定值。  
打孔位置比基准值 (c) 短时: 调高设定值。  
打孔位置比基准值 (c) 长时: 调低设定值。

3. 按 Start 键, 以确定设定值。

<基准值 (c)>  
公制规格: 13mm、英制规格: 9.5mm

## 펀치위치 반송조정

1. 메인テナンス 모드 U246 를 세트하고 Finisher, Punch Feed 를 선택합니다.
2. 설정치를 조정합니다.  
펀치구멍의 위치가 기준치 (c) 보다 짧은 경우: 설정치를 높입니다.  
펀치구멍의 위치가 기준치 (c) 보다 긴 경우: 설정치를 내립니다.

3. 시작키를 누르고 설정치를 확인합니다.

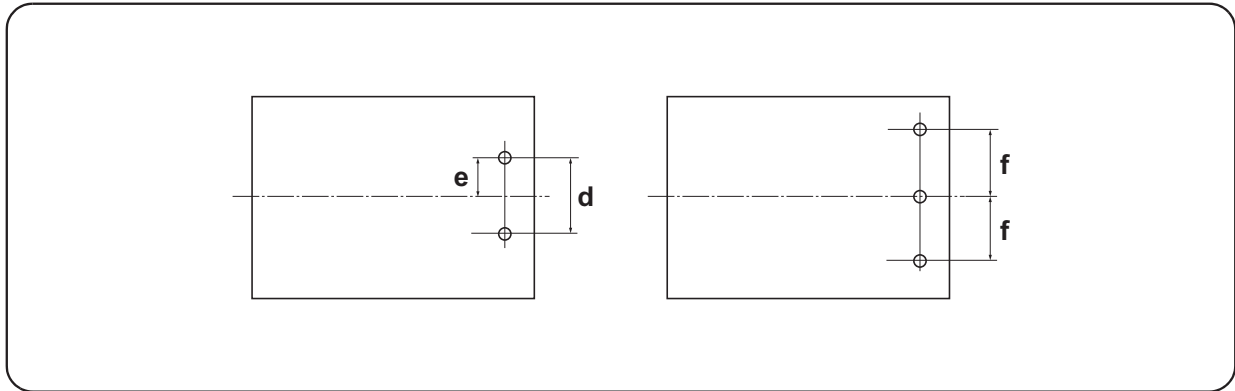
<기준치 (c)>  
센치사양: 13mm, 인치사양: 9.5mm

## パンチ位置搬送調整

1. メンテナンスモード U246 をセットし、Finisher、Punch Feed を選択する。
2. 設定値を調整する。  
パンチ穴の位置が基準値 (c) より短い場合: 設定値を上げる。  
パンチ穴の位置が基準値 (c) より長い場合: 設定値を下げる。

3. スタートキーを押し、設定値を確定する。

<基準値 (c)>  
センチ仕様: 13mm、インチ仕様: 9.5mm



## Centering the hole punch position

1. Enter the maintenance mode U246, select Finisher and Punch Width.
2. Adjust the values.  
If the punch hole is too close to the front of the machine: Decrease the setting value.  
If the punch hole is too close to the rear of the machine: Increase the setting value.

3. Press the Start key to confirm the setting value.

<Reference value>

Metric specification:  $d = 80 \text{ mm} \pm 0.5$ ,  $e = 40 \text{ mm} \pm 2$

Inch specification:  $d = 2.75 \text{ inch} \pm 0.5$ ,  $e = 1.375 \text{ inch} \pm 2$ ,  
 $f = 4.25 \text{ inch} \pm 0.5$

## Centrage de la position de perforation

1. Passer en mode maintenance U246, sélectionner Finisher et Punch Width.
2. Régler les valeurs.  
Si la perforation est trop proche de l'avant de la machine: Diminuez la valeur de réglage.  
Si la perforation est trop proche de l'arrière de la machine: Augmentez la valeur de réglage.

3. Appuyer sur la touche de Start pour confirmer la valeur de réglage.

<Valeur de référence>

Spécifications métriques:  $d = 80 \text{ mm} \pm 0.5$ ,  $e = 40 \text{ mm} \pm 2$

Spécifications en pouces:  $d = 2.75 \text{ pouces} \pm 0.5$ ,  $e = 1.375 \text{ pouces} \pm 2$ ,  
 $f = 4.25 \text{ pouces} \pm 0.5$

## Centrado de la posición de perforación

1. Entre en el modo de mantenimiento U246, seleccione Finisher y Punch Width.
2. Ajuste los valores.  
Si la perforación se encuentra demasiado cerca del frente de la máquina: Reduzca el valor de configuración.  
Si la perforación se encuentra demasiado cerca de la parte trasera de la máquina: Aumente el valor de configuración.

3. Pulse la tecla de Start para confirmar el valor de configuración.

<Valor de referencia>

Sistema métrico:  $d = 80 \text{ mm} \pm 0.5$ ,  $e = 40 \text{ mm} \pm 2$

En pulgadas:  $d = 2.75 \text{ pulgada} \pm 0.5$ ,  $e = 1.375 \text{ pulgada} \pm 2$ ,  
 $f = 4.25 \pm 0.5 \text{ pulgada}$

## Zentrieren der Stanzlochposition

1. Schalten Sie in den Wartungsmodus U246, wählen Sie Finisher und Punch Width.
2. Die Werte einstellen.  
Falls die Lochung zu nah an der Gerätefront liegt: Den Einstellwert verringern.  
Falls die Lochung zu weit weg von der Gerätefront liegt: Den Einstellwert erhöhen.

3. Den Einstellwert durch Drücken der Start-Taste bestätigen.

<Bezugswert>

Metrischer Abstand:  $d = 80 \text{ mm} \pm 0.5$ ;  $e = 40 \text{ mm} \pm 2$

Abstand in Zoll:  $d = 2.75 \text{ Zoll} \pm 0.5$ ,  $e = 1.375 \text{ Zoll} \pm 2$ ,  
 $f = 4.25 \text{ Zoll} \pm 0.5$

## Centratura della posizione dei fori di perforazione

1. Entrare in modalità manutenzione U246, selezionare Finisher e Punch Width.
2. Regolare i valori.  
Se la posizione dei fori di perforazione è troppo vicina alla parte anteriore della macchina: Diminuire il valore dell'impostazione.  
Se la posizione dei fori di perforazione è troppo vicina alla parte posteriore della macchina: Aumentare il valore dell'impostazione.

3. Premere il tasto di Start per confermare il valore dell'impostazione.

<Valore di riferimento>

Specificazione in unità metrica:  $d = 80 \text{ mm} \pm 0.5$ ,  $e = 40 \text{ mm} \pm 2$

Specificazione in pollici:  $d = 2.75 \text{ pollici} \pm 0.5$ ,  $e = 1.375 \text{ pollici} \pm 2$ ,  
 $f = 4.25 \text{ pollici} \pm 0.5$

## 打孔位置中心调节

1. 设置维护模式 U246, 选择 Finisher、Punch Width。
2. 调整设定值。  
打孔位置向机器前部偏移时: 调低设定值。  
打孔位置向机器后部偏移时: 调高设定值。

3. 按 Start 键, 以确定设定值。

<基准值>

公制规格:  $d=80\text{mm}\pm 0.5$ ,  $e=40\text{mm}\pm 2$

英制规格:  $d=2.75\text{inch}\pm 0.5$ ,  $e=1.375\text{inch}\pm 2$ ,  $f=4.25\text{inch}\pm 0.5$

## 펀치위치 센터조정

1. 메인テナンス 모드 U246 를 세트하고 Finisher, Punch Width 를 선택합니다.
2. 설정치를 조정합니다.  
펀치구멍이 기기 앞측으로 벗어난 경우: 설정치를 내립니다.  
펀치구멍의 위치가 기기 뒷측으로 벗어난 경우: 설정치를 높입니다.

3. 시작키를 누르고 설정치를 확인합니다.

<기준치>

센치 사양:  $d=80\text{mm}\pm 0.5$ ,  $e=40\text{mm}\pm 2$

인치 사양:  $d=2.75\text{inch}\pm 0.5$ ,  $e=1.375\text{inch}\pm 2$ ,  $f=4.25\text{inch}\pm 0.5$

## パンチ位置センター調整

1. メンテナンスモード U246 をセットし、Finisher、Punch Width を選択する。
2. 設定値を調整する。  
パンチ穴の位置が機械前側にずれている場合: 設定値を下げる。  
パンチ穴の位置が機械後側にずれている場合: 設定値を上げる。

3. スタートキーを押し、設定値を確定する。

<基準値>

センチ仕様:  $d=80\text{mm}\pm 0.5$ ,  $e=40\text{mm}\pm 2$

インチ仕様:  $d=2.75\text{inch}\pm 0.5$ ,  $e=1.375\text{inch}\pm 2$ ,  $f=4.25\text{inch}\pm 0.5$



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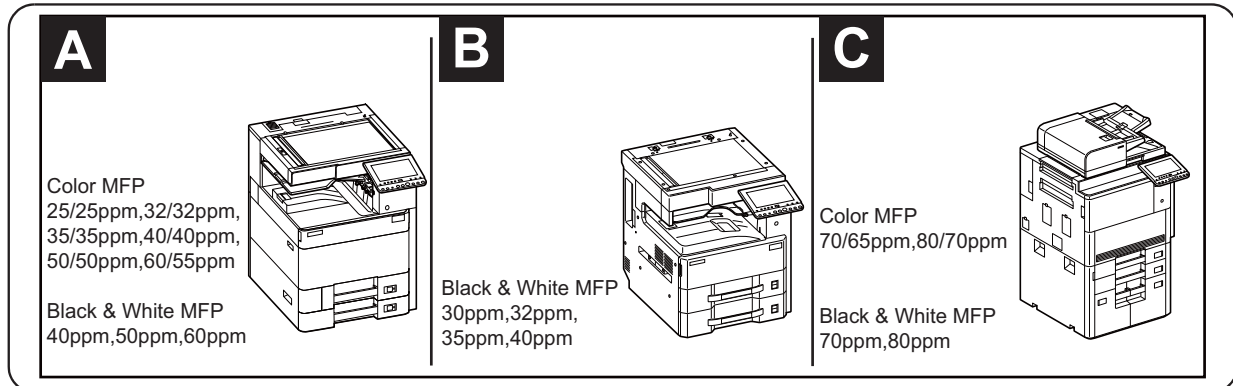
**(9)FAX System 12**

# **FAX System 12**

## **(FAX Kit)**

# **Installation Guide**



**English**

A different procedure is required depending on the product which is installed with this unit. Each procedure is described in the following pages.  
 For installation with a MFP(A), see Page 1 to Page 4.  
 For installation with a MFP(B), see Page 5 to Page 8.  
 For installation with a MFP(C), see Page 9 to Page 12.

**Français**

Une procédure différente est requise selon le produit qui est installé avec cette unité. Chaque procédure est décrite dans les pages suivantes.  
 Pour l'installation avec une imprimante multifonction(A), voir Page 1 à Page 4.  
 Pour l'installation avec une imprimante multifonction(B), voir Page 5 à Page 8.  
 Pour l'installation avec une imprimante multifonction(C), voir Page 9 à Page 12.

**Español**

El procedimiento es diferente según el producto que se instale con esta unidad. En las siguientes páginas, se describe cada procedimiento.  
 Para la instalación con un MFP(A), consulte las páginas de la 1 a la 4.  
 Para la instalación con un MFP(B), consulte las páginas de la 5 a la 8.  
 Para la instalación con un MFP(C), consulte las páginas de la 9 a la 12.

**Deutsch**

Je nach verwendetem Modell ist eine andere Vorgehensweise zur Installation dieses Teils erforderlich. Die unterschiedlichen Vorgehensweisen werden auf den folgenden Seiten erläutert.  
 Bei Installation an einem MFP(A) siehe Seiten 1 bis 4.  
 Bei Installation an einem MFP(B) siehe Seiten 5 bis 8.  
 Bei Installation an einem MFP(C) siehe Seiten 9 bis 12.

**Italiano**

Si richiede una procedura diversa in funzione del prodotto su cui è installata l'unità. Le singole procedure sono descritte nelle pagine seguenti.  
 Per l'installazione con un MFP(A), vedere le pagine da 1 a 4.  
 Per l'installazione con un MFP(B), vedere le pagine da 5 a 8.  
 Per l'installazione con un MFP(C), vedere le pagine da 9 a 12.

**简体中文**

根据安装对象，安装步骤略有不同。各个步骤记载在下面的页面。  
 安装到 MFP(A) 上时，请参见 P1-P4。  
 安装到 MFP(B) 上时，请参见 P5-P8。  
 安装到 MFP(C) 上时，请参见 P9-P12。

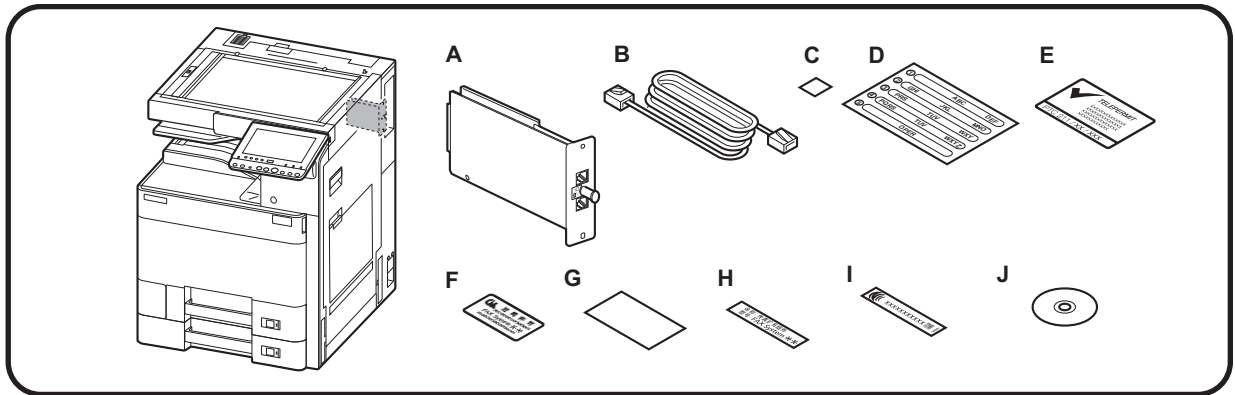
**한국어**

이 장치에 설치되는 제품에 따라 절차가 다릅니다. 다음 페이지에서 각 절차를 설명합니다.  
 MFP(A)에 설치하는 경우 1페이지 ~4페이지를 참조하십시오.  
 MFP(B)에 설치하는 경우 5페이지 ~8페이지를 참조하십시오.  
 MFP(C)에 설치하는 경우 9페이지 ~12페이지를 참조하십시오.

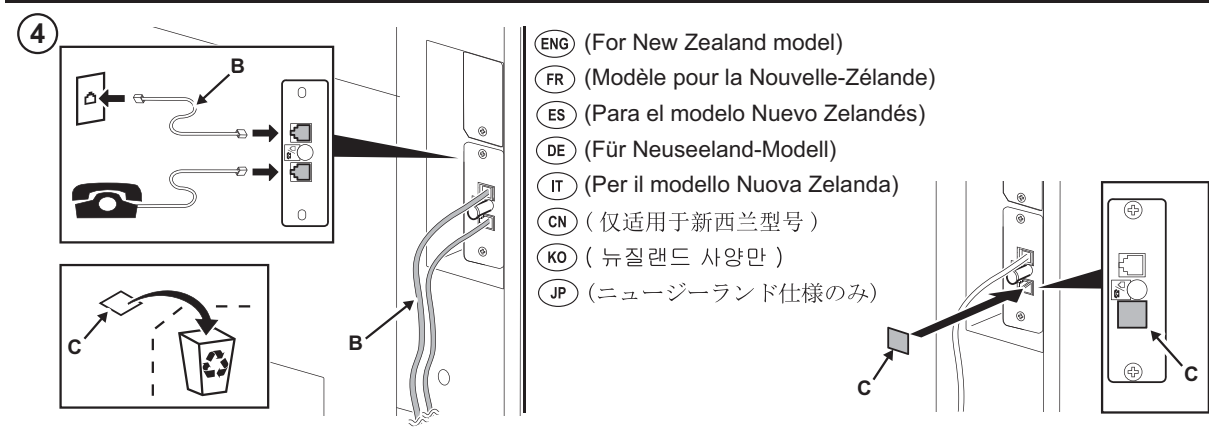
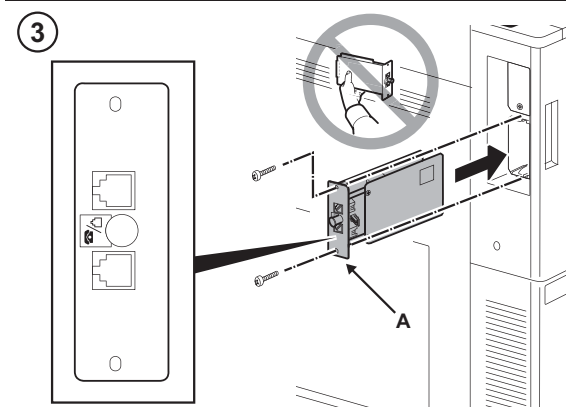
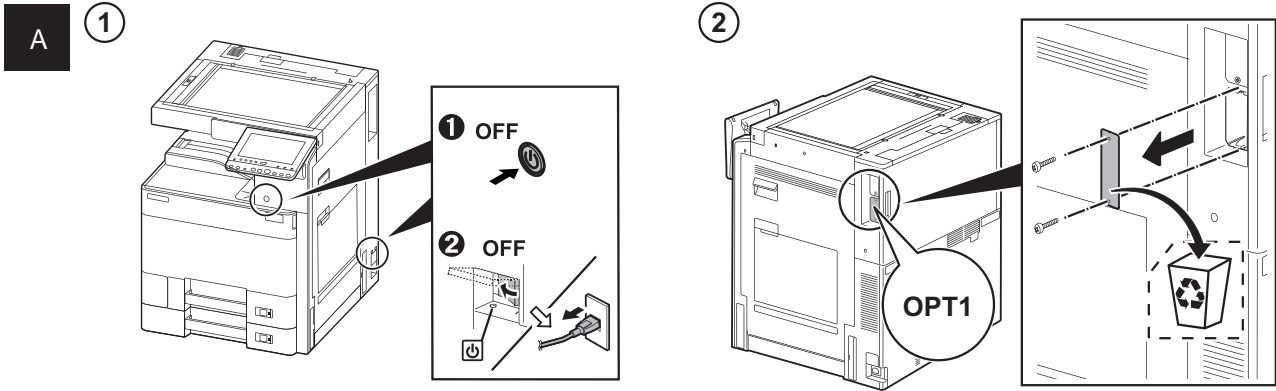
**日本語**

装着する対象によって、取付手順は異なります。それぞれ、以下のページに記載しています。  
 MFP(A)に設置する場合;1ページ~4ページ  
 MFP(B)に設置する場合;5ページ~8ページ  
 MFP(C)に設置する場合;9ページ~12ページ

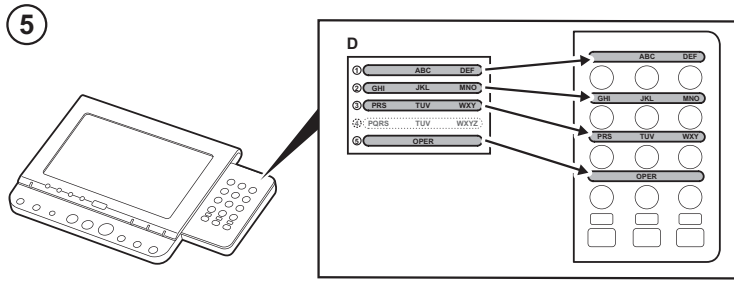
A



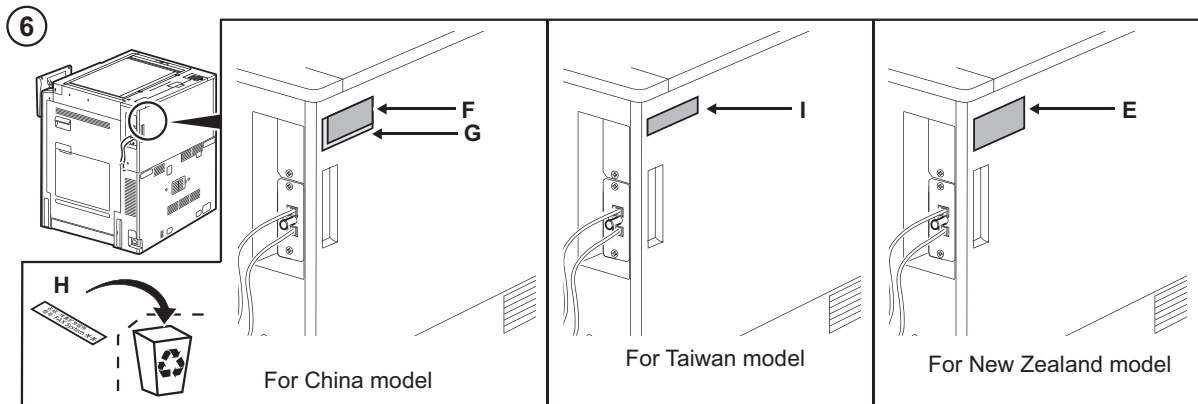
	100V	120V	230V	240V	110V	220V	220-240V
	Japan	North America/ Latin America	Europe	Australia/ New Zealand	Taiwan	China	Asia/ Korea
A	1	1	1	1	1	1	1
B	1	1	-	1	-	1	-
C	1	1	1	1	1	1	1
D	-	1	1	1	1	1	1
E	-	-	-	1	-	-	-
F	-	-	-	-	-	1	-
G	-	-	-	-	-	1	-
H	-	-	-	-	-	1	-
I	-	-	-	-	1	-	-
J	-	-	-	-	-	1	-



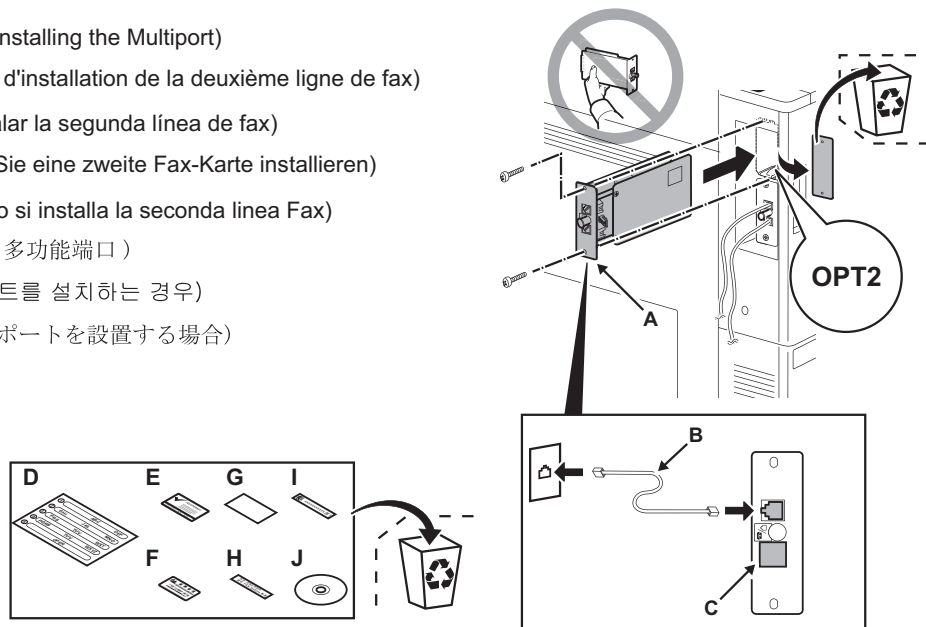
A

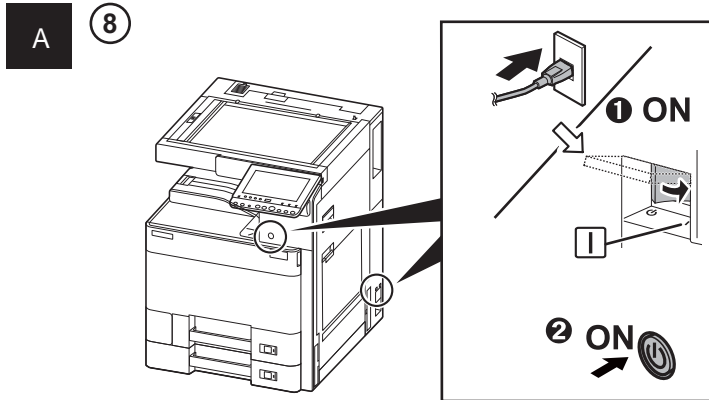


- ENG (Only when NK-7110/NK-7100 is installed) (Excluding 100 V models)
- FR (Uniquement lors de l'installation de NK-7110/NK-7100) (Sauf sur les modèles 100 V)
- ES (Solo si está instalada la unidad NK-7110/NK-7100) (A excepción de los modelos de 100 V)
- DE (Nur wenn NK-7110/NK-7100 installiert ist) (Ausgenommen 100-V-Modelle)
- IT (Solo quando è installato NK-7110/NK-7100) (Esclusi i modelli da 100 V)
- CN (当设置 NK-7110/NK-7100 时) (100V 规格以外)
- KO (NK-7110/NK-7100 이 설치된 경우만) (100V 사양 이외)
- JP (NK-7110/NK-7100 を設置している場合のみ) (100V仕様以外)



- 7 ENG (When installing the Multiport)
- FR (En cas d'installation de la deuxième ligne de fax)
- ES (Al instalar la segunda línea de fax)
- DE (Wenn Sie eine zweite Fax-Karte installieren)
- IT (Quando si installa la seconda linea Fax)
- CN (安装了多功能端口)
- KO (멀티포트를 설치하는 경우)
- JP (マルチポートを設置する場合)





9

ENG

**Initialize the FAX circuit board.**

- 1.If the FAX PWBs were installed simultaneously to OPT1 and OPT2 (all Fax PWBs are initialized), perform the maintenance mode U600 to initialize the FAX PWBs.
- 2.If the FAX circuit board has been added to OPT2 (to initialize the FAX circuit board in OPT2)  
Initialize OPT2 by pressing [PORT2], and the [Start] key in this order in the maintenance mode U698 and executing the maintenance mode U600. If [ALL] is selected in U698, both OPT1 and OPT2 are initialized.  
For details, see the service manual.

FR

**Initialiser la carte à circuits FAX.**

- 1.Si les cartes de circuit imprimé du fax ont été installées en même temps que OPT1 et OPT2 (toutes les cartes de circuit imprimé du fax sont initialisées), exécuter le mode maintenance U600 pour initialiser les cartes de circuit imprimé du fax.
- 2.Si la carte à circuits FAX a été ajoutée à l'OPT2 (pour initialiser la carte à circuits FAX dans l'OPT2)  
Initialiser l'OPT2 en appuyant sur [PORT2] et la touche [Départ] dans cet ordre en mode de maintenance U698, et exécuter le mode de maintenance U600. Si [ALL] est sélectionné dans U698, l'OPT1 et l'OPT2 de détails, se reporter au manuel d'entretien.

ES

**Inicialice la tarjeta de circuitos FAX.**

- 1.Si se instalaron FAX PWB simultáneamente a OPT1 y OPT2 (se inicializan todos los FAX PWB), ejecute el modo de mantenimiento U600 para inicializar los FAX PWB.
- 2.Si la tarjeta de circuitos de FAX se agregó a OPT2 (para inicializar la tarjeta de circuitos de FAX en OPT2)  
Inicialice el OPT2 presionando [PORT2] y la tecla de [Inicio] en ese orden en el modo de mantenimiento U698 y ejecutando el modo de mantenimiento U600. Si se selecciona [ALL] en U698, se inicializan ambos OPT1 y OPT2. Para más detalles, lea el manual de servicio.

DE

**Initialisieren der FAX-Leiterplatte.**

- 1.Falls die FAX-Karten gleichzeitig in OPT1 und OPT2 installiert werden (alle FAX-Karten werden initialisiert), führen Sie den Wartungsmodus U600 aus, um die FAX-Karten zu initialisieren.
- 2.Wenn die FAX-Leiterplatte zu OPT2 hinzugefügt worden ist (um die FAX-Leiterplatte in OPT2 zu initialisieren)  
OPT2 initialisieren. Dazu [PORT2] und die [Start]-Taste im Wartungsmodus U698 in dieser Reihenfolge drücken und den Wartungsmodus U600 ausführen. Wenn [ALL] in U698 gewählt wird, werden OPT1 und OPT2 initialisiert. Weitere Einzelheiten siehe Wartungsanleitung.

IT

**Inizializzare la scheda a circuiti FAX.**

- 1.Se sono state installate simultaneamente le schede FAX PWB su OPT1 e OPT2 (tutte le schede FAX PWB sono inizializzate), eseguire il modo manutenzione U600 per inizializzare le schede FAX PWB.
- 2.Se la scheda a circuiti è stata aggiunta all'OPT2 (per inizializzare la scheda a circuiti FAX nell'OPT2)  
Inizializzare OPT2 premendo [PORT2] e il tasto [Avvio] in questo ordine nel modo di manutenzione U698 ed eseguendo il modo di manutenzione U600. Se viene selezionato [ALL] nel modo U698, entrambi OPT1 e OPT2 sono inizializzati. Per ulteriori dettagli leggere il manuale d'istruzioni.

CN

**传真电路板的初始化**

- 1.当把传真电路板同时安装到 OPT1 和 OPT2 时 (全部的传真电路板初始化), 执行维修保养模式 U600, 初始化传真电路板。
- 2.在 OPT2 上增设时  
(OPT2 的传真电路板初始化)  
只进行 OPT2 初始化时, 在维修保养模式 U698 状态下, 按顺序按下 [PORT2]、[开始]键, 执行维修保养模式 U600。在 U698 状态下设定 [ALL]时, 会使 OPT1 和 OPT2 均初始化。有关详细信息, 请参见维修手册。

KO

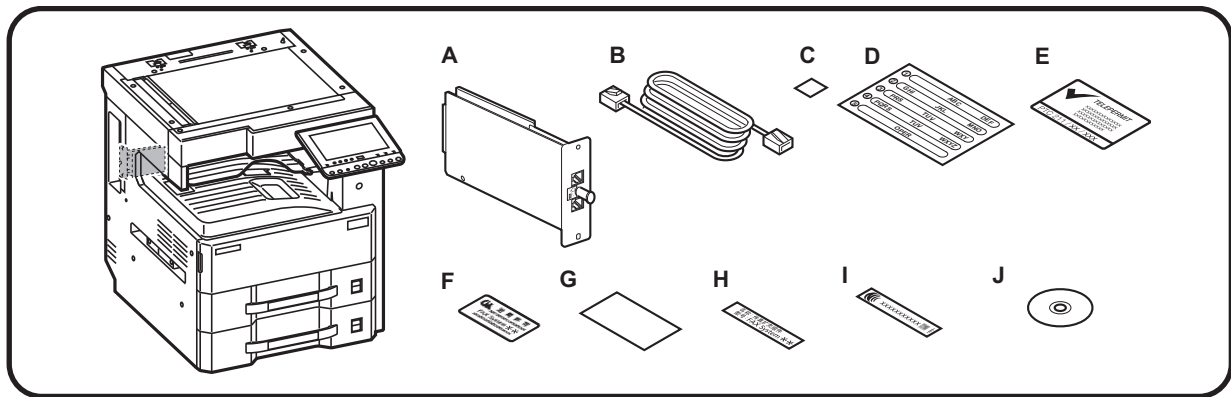
**FAX 회로기판의 초기화**

- 1.OPT1 과 OPT2 에 FAX 회로기판을 동시에 설치한 경우 (모든 FAX 회로기판이 초기화됨), 메인テナンス 모드 U600 을 수행하여 FAX 회로기판을 초기화합니다.
- 2.OPT2 에 증설한 경우 (OPT2 의 FAX 기판을 초기화)  
메인テナンス모드 U698 에서 [PORT2], [시작]키 순으로 누릅니다 .  
메인テナンス 모드 U600 을 실행하고 FAX 회로기판을 초기화합니다 .U698 에서 [ALL]을 설정하면 OPT1 과 OPT2 양쪽을 초기화하기 때문에 주의할 것 .  
상세는 서비스 매뉴얼을 참조할 것 .

JP

**FAX 基板の初期化**

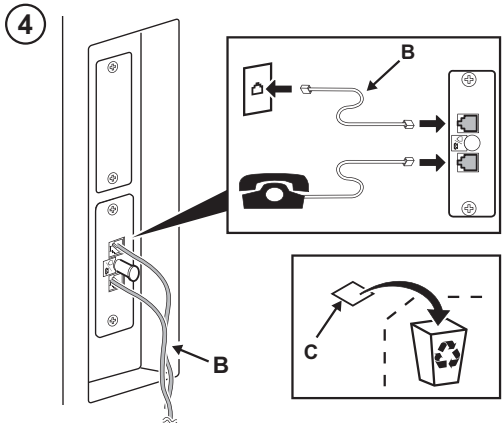
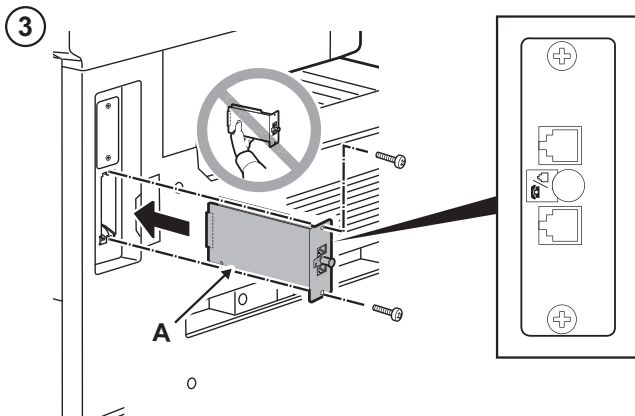
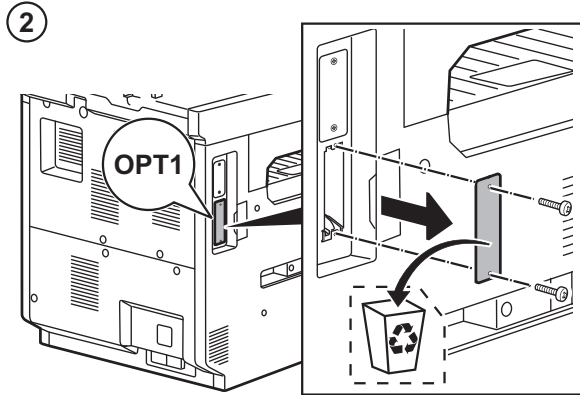
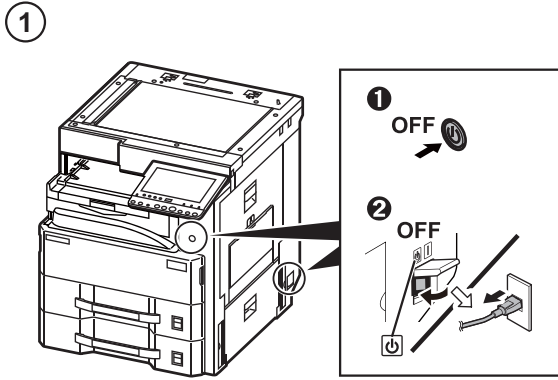
- 1.OPT1 と OPT2 に FAX 基板を同時に設置した場合 (すべての FAX 基板を初期化)  
メンテナンスモード U600 を実行し、FAX 基板を初期化する。
- 2.OPT2 に増設した場合 (OPT2 の FAX 基板を初期化)  
メンテナンスモード U698 で [PORT2]、[スタート]キーの順に押す。メンテナンスモード U600 を実行し、FAX 基板を初期化する。U698 で [ALL] を設定すると OPT1 と OPT2 両方を初期化するので注意すること。詳細はサービスマニュアルを参照のこと。



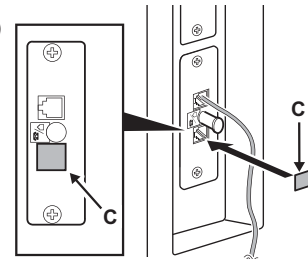
B

	100V	120V	230V	240V	110V	220V	220-240V
	Japan	North America/ Latin America	Europe	Australia/ New Zealand	Taiwan	China	Asia/ Korea
A	1	1	1	1	1	1	1
B	1	1	-	1	-	1	-
C	1	1	1	1	1	1	1
D	-	1	1	1	1	1	1
E	-	-	-	1	-	-	-
F	-	-	-	-	-	1	-
G	-	-	-	-	-	1	-
H	-	-	-	-	-	1	-
I	-	-	-	-	1	-	-
J	-	-	-	-	-	1	-

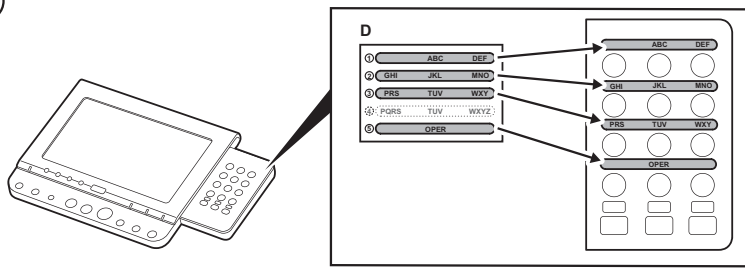
B



- ENG (For New Zealand model)
- FR (Modèle pour la Nouvelle-Zélande)
- ES (Para el modelo Nuevo Zelandés)
- DE (Für Neuseeland-Modell)
- IT (Per il modello Nuova Zelanda)
- CN (仅适用于新西兰型号)
- KO (뉴질랜드 사양만)
- JP (ニュージーランド仕様のみ)



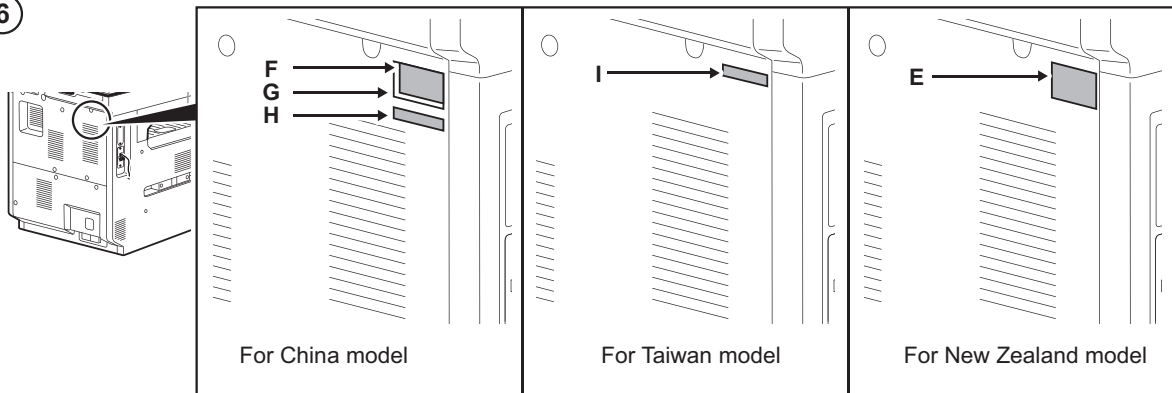
5



B

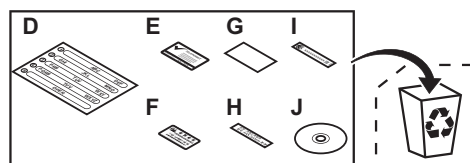
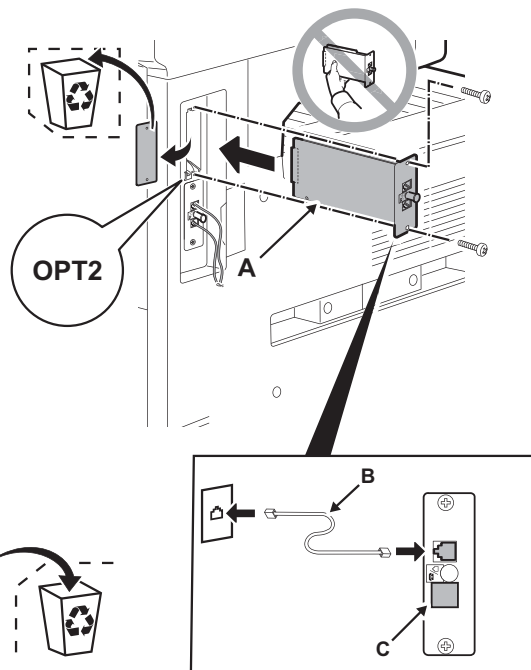
- ENG (Only when NK-7110/NK-7100 is installed) (Excluding 100 V models)
- FR (Uniquement lors de l'installation de NK-7110/NK-7100) (Sauf sur les modèles 100 V)
- ES (Solo si está instalada la unidad NK-7110/NK-7100) (A excepción de los modelos de 100 V)
- DE (Nur wenn NK-7110/NK-7100 installiert ist) (Ausgenommen 100-V-Modelle)
- IT (Solo quando è installato NK-7110/NK-7100) (Esclusi i modelli da 100 V)
- CN (当设置 NK-7110/NK-7100 时) (100V 规格以外)
- KO (NK-7110/NK-7100 이 설치된 경우만) (100V 사양 이외)
- JP (NK-7110/NK-7100 を設置している場合のみ) (100V仕様以外)

6



7

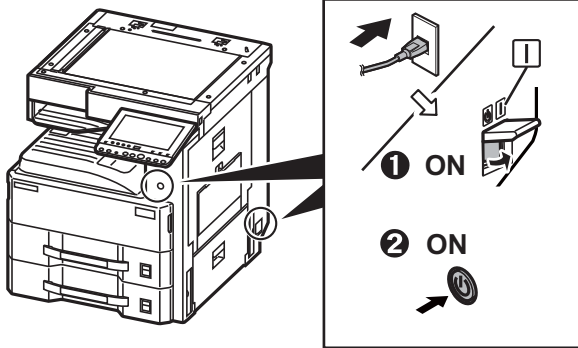
- ENG (When installing the Multiport)
- FR (En cas d'installation de la deuxième ligne de fax)
- ES (Al instalar la segunda línea de fax)
- DE (Wenn Sie eine zweite Fax-Karte installieren)
- IT (Quando si installa la seconda linea Fax)
- CN (安装了多功能端口)
- KO (멀티포트를 설치하는 경우)
- JP (マルチポートを設置する場合)





8

B



9

ENG

**Initialize the FAX circuit board.**

- 1.If the FAX PWBs were installed simultaneously to OPT1 and OPT2 (all Fax PWBs are initialized), perform the maintenance mode U600 to initialize the FAX PWBs.
- 2.If the FAX circuit board has been added to OPT2 (to initialize the FAX circuit board in OPT2)  
Initialize OPT2 by pressing [PORT2], and the [Start] key in this order in the maintenance mode U698 and executing the maintenance mode U600. If [ALL] is selected in U698, both OPT1 and OPT2 are initialized. For details, see the service manual.

FR

**Initialiser la carte à circuits FAX.**

- 1.Si les cartes de circuit imprimé du fax ont été installées en même temps que OPT1 et OPT2 (toutes les cartes de circuit imprimé du fax sont initialisées), exécuter le mode maintenance U600 pour initialiser les cartes de circuit imprimé du fax.
- 2.Si la carte à circuits FAX a été ajoutée à l'OPT2 (pour initialiser la carte à circuits FAX dans l'OPT2)  
Initialiser l'OPT2 en appuyant sur [PORT2] et la touche [Départ] dans cet ordre en mode de maintenance U698, et exécuter le mode de maintenance U600. Si [ALL] est sélectionné dans U698, l'OPT1 et l'OPT2 de détails, se reporter au manuel d'entretien.

ES

**Inicialice la tarjeta de circuitos FAX.**

- 1.Si se instalaron FAX PWB simultáneamente a OPT1 y OPT2 (se inicializan todos los FAX PWB), ejecute el modo de mantenimiento U600 para inicializar los FAX PWB.
- 2.Si la tarjeta de circuitos de FAX se agregó a OPT2 (para inicializar la tarjeta de circuitos de FAX en OPT2)  
Inicialice el OPT2 presionando [PORT2] y la tecla de [Inicio] en ese orden en el modo de mantenimiento U698 y ejecutando el modo de mantenimiento U600. Si se selecciona [ALL] en U698, se inicializan ambos OPT1 y OPT2. Para más detalles, lea el manual de servicio.

DE

**Initialisieren der FAX-Leiterplatte.**

- 1.Falls die FAX-Karten gleichzeitig in OPT1 und OPT2 installiert werden (alle FAX-Karten werden initialisiert), führen Sie den Wartungsmodus U600 aus, um die FAX-Karten zu initialisieren.
- 2.Wenn die FAX-Leiterplatte zu OPT2 hinzugefügt worden ist (um die FAX-Leiterplatte in OPT2 zu initialisieren)  
OPT2 initialisieren. Dazu [PORT2] und die [Start]-Taste im Wartungsmodus U698 in dieser Reihenfolge drücken und den Wartungsmodus U600 ausführen. Wenn [ALL] in U698 gewählt wird, werden OPT1 und OPT2 initialisiert. Weitere Einzelheiten siehe Wartungsanleitung.

IT

**Inizializzare la scheda a circuiti FAX.**

- 1.Se sono state installate simultaneamente le schede FAX PWB su OPT1 e OPT2 (tutte le schede FAX PWB sono inizializzate), eseguire il modo manutenzione U600 per inizializzare le schede FAX PWB.
- 2.Se la scheda a circuiti è stata aggiunta all'OPT2 (per inizializzare la scheda a circuiti FAX nell'OPT2)  
Inizializzare OPT2 premendo [PORT2] e il tasto [Avvio] in questo ordine nel modo di manutenzione U698 ed eseguendo il modo di manutenzione U600. Se viene selezionato [ALL] nel modo U698, entrambi OPT1 e OPT2 sono inizializzati. Per ulteriori dettagli leggere il manuale d'istruzioni.

CN

**传真电路板的初始化**

- 1.当把传真电路板同时安装到 OPT1 和 OPT2 时 (全部的传真电路板初始化), 执行维修保养模式 U600, 初始化传真电路板。
- 2.在 OPT2 上增设时  
(OPT2 的传真电路板初始化)  
只进行 OPT2 初始化时, 在维修保养模式 U698 状态下, 按顺序按下 [PORT2]、[开始]键, 执行维修保养模式 U600。在 U698 状态下设定 [ALL]时, 会使 OPT1 和 OPT2 均初始化。有关详细信息, 请参见维修手册。

KO

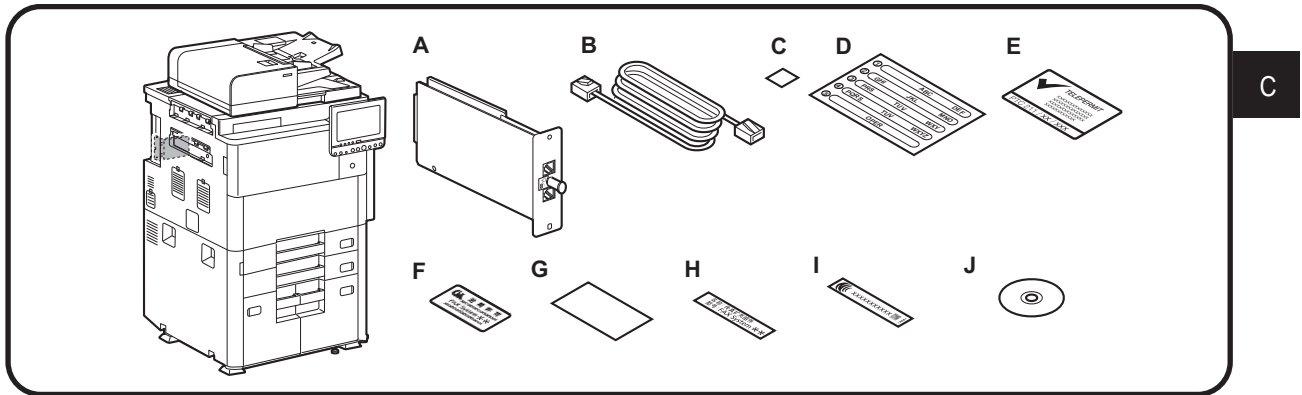
**FAX 회로기판의 초기화**

- 1.OPT1 과 OPT2 에 FAX 회로기판을 동시에 설치한 경우 ( 모든 FAX 회로기판이 초기화됨 ), 메인テナンス 모드 U600 을 수행하여 FAX 회로기판을 초기화합니다 .
- 2.OPT2 에 증설한 경우 (OPT2 의 FAX 기판을 초기화 )  
메인テナンス모드 U698 에서 [PORT2], [시작]키 순으로 누릅니다 .  
메인テナンス 모드 U600 을 실행하고 FAX 회로기판을 초기화합니다 .U698 에서 [ALL]을 설정하면 OPT1 과 OPT2 양쪽을 초기화하기 때문에 주의할 것 .  
상세는 서비스 매뉴얼을 참조할 것 .

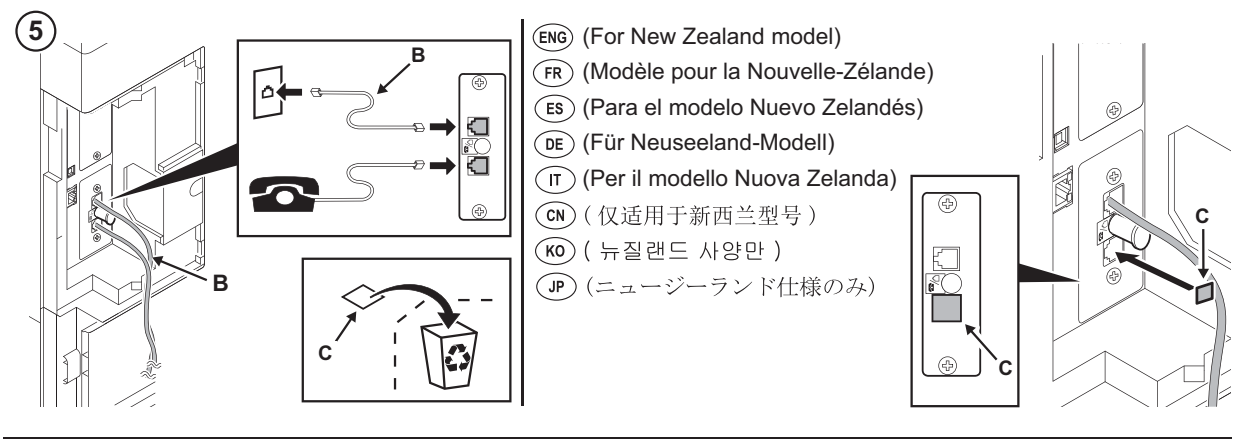
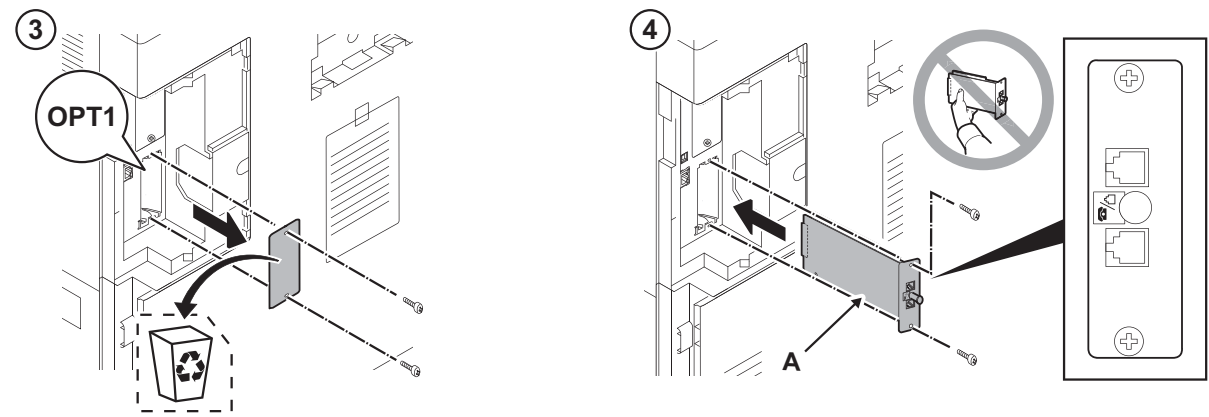
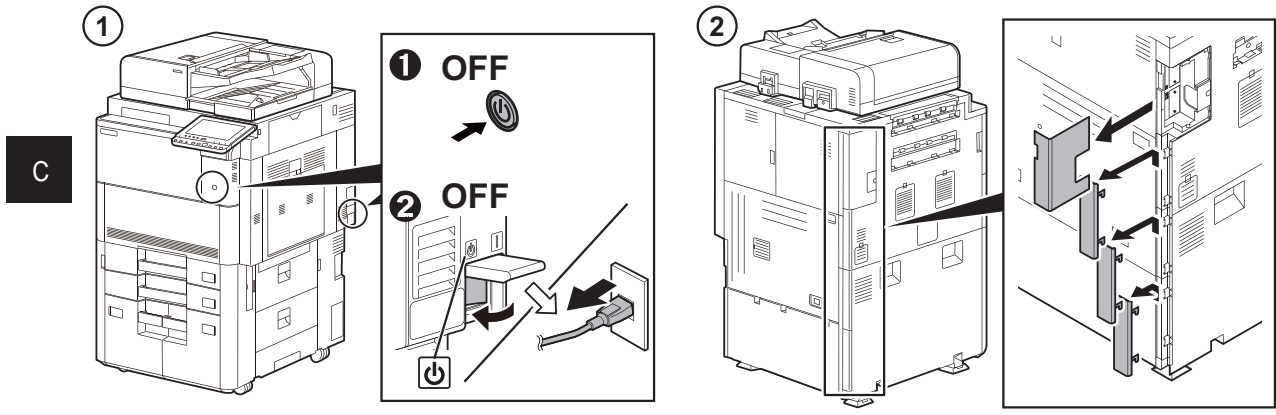
JP

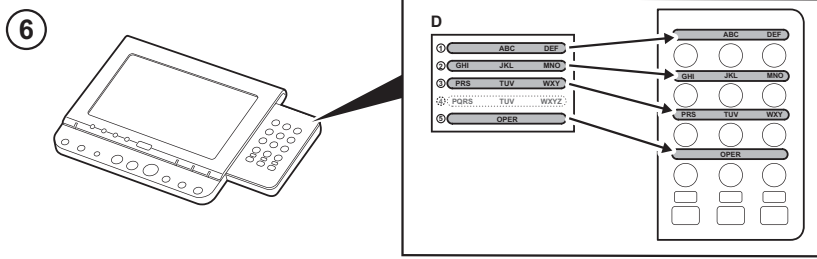
**FAX 基板の初期化**

- 1.OPT1 と OPT2 に FAX 基板を同時に設置した場合 (すべての FAX 基板を初期化) メンテナンスモード U600 を実行し、FAX 基板を初期化する。
- 2.OPT2 に増設した場合 (OPT2 の FAX 基板を初期化)  
メンテナンスモード U698 で [PORT2]、[スタート]キーの順に押す。メンテナンスモード U600 を実行し、FAX 基板を初期化する。U698 で [ALL] を設定すると OPT1 と OPT2 両方を初期化するので注意すること。詳細はサービスマニュアルを参照のこと。



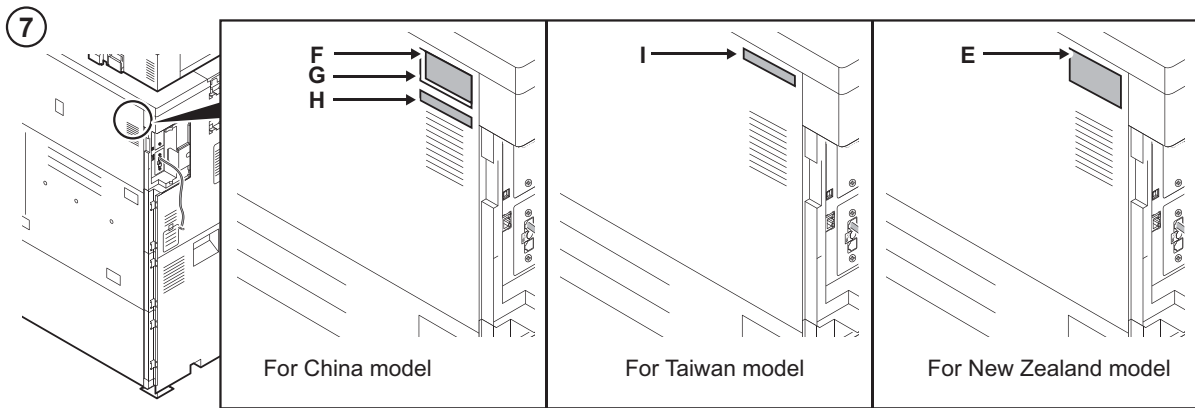
	100V	120V	230V	240V	110V	220V	220-240V
	Japan	North America/ Latin America	Europe	Australia/ New Zealand	Taiwan	China	Asia/ Korea
A	1	1	1	1	1	1	1
B	1	1	-	1	-	1	-
C	1	1	1	1	1	1	1
D	-	1	1	1	1	1	1
E	-	-	-	1	-	-	-
F	-	-	-	-	-	1	-
G	-	-	-	-	-	1	-
H	-	-	-	-	-	1	-
I	-	-	-	-	1	-	-
J	-	-	-	-	-	1	-



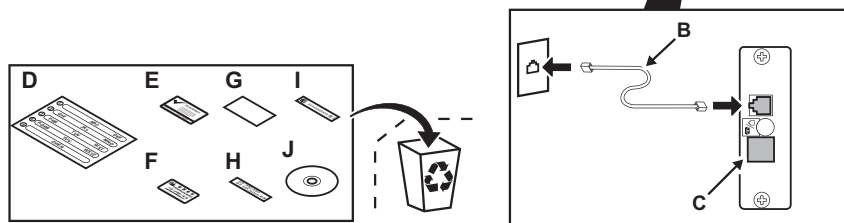
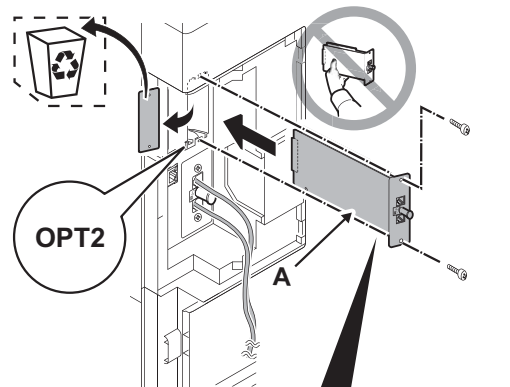


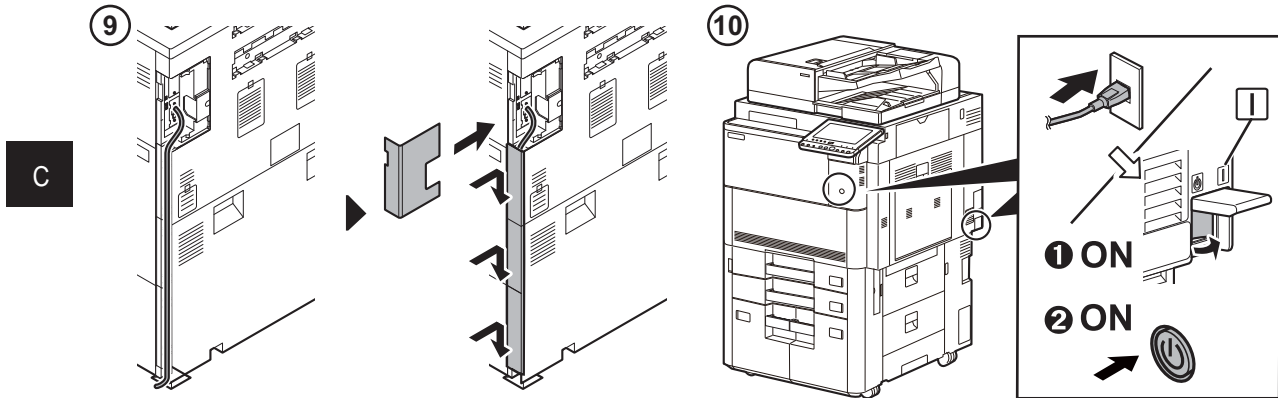
C

- ENG (Only when NK-7110/NK-7100 is installed) (Excluding 100 V models)
- FR (Uniquement lors de l'installation de NK-7110/NK-7100) (Sauf sur les modèles 100 V)
- ES (Solo si está instalada la unidad NK-7110/NK-7100) (A excepción de los modelos de 100 V)
- DE (Nur wenn NK-7110/NK-7100 installiert ist) (Ausgenommen 100-V-Modelle)
- IT (Solo quando è installato NK-7110/NK-7100) (Esclusi i modelli da 100 V)
- CN (当设置 NK-7110/NK-7100 时) (100V 规格以外)
- KO (NK-7110/NK-7100 이 설치된 경우만) (100V 사양 이외)
- JP (NK-7110/NK-7100 を設置している場合のみ) (100V仕様以外)



- 8 ENG (When installing the Multiport)
- FR (En cas d'installation de la deuxième ligne de fax)
- ES (Al instalar la segunda línea de fax)
- DE (Wenn Sie eine zweite Fax-Karte installieren)
- IT (Quando si installa la seconda linea Fax)
- CN (安装了多功能端口)
- KO (멀티포트를 설치하는 경우)
- JP (マルチポートを設置する場合)





11

ENG

**Initialize the FAX circuit board.**

- 1.If the FAX PWBs were installed simultaneously to OPT1 and OPT2 (all Fax PWBs are initialized), perform the maintenance mode U600 to initialize the FAX PWBs.
- 2.If the FAX circuit board has been added to OPT2 (to initialize the FAX circuit board in OPT2)  
Initialize OPT2 by pressing [PORT2], and the [Start] key in this order in the maintenance mode U698 and executing the maintenance mode U600. If [ALL] is selected in U698, both OPT1 and OPT2 are initialized. For details, see the service manual.

FR

**Initialiser la carte à circuits FAX.**

- 1.Si les cartes de circuit imprimé du fax ont été installées en même temps que OPT1 et OPT2 (toutes les cartes de circuit imprimé du fax sont initialisées), exécuter le mode maintenance U600 pour initialiser les cartes de circuit imprimé du fax.
- 2.Si la carte à circuits FAX a été ajoutée à l'OPT2 (pour initialiser la carte à circuits FAX dans l'OPT2)  
Initialiser l'OPT2 en appuyant sur [PORT2] et la touche [Départ] dans cet ordre en mode de maintenance U698, et exécuter le mode de maintenance U600. Si [ALL] est sélectionné dans U698, l'OPT1 et l'OPT2 de détails, se reporter au manuel d'entretien.

ES

**Inicialice la tarjeta de circuitos FAX.**

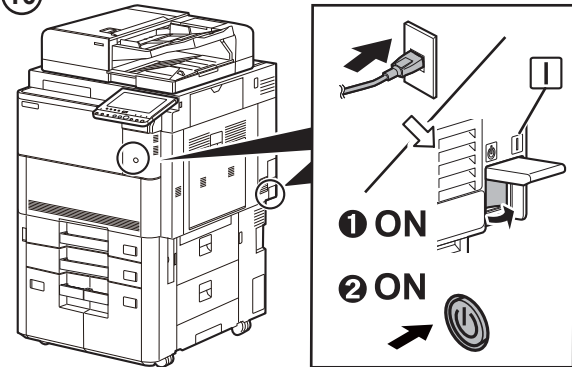
- 1.Si se instalaron FAX PWB simultáneamente a OPT1 y OPT2 (se inicializan todos los FAX PWB), ejecute el modo de mantenimiento U600 para inicializar los FAX PWB.
- 2.Si la tarjeta de circuitos de FAX se agregó a OPT2 (para inicializar la tarjeta de circuitos de FAX en OPT2)  
Inicialice el OPT2 presionando [PORT2] y la tecla de [Inicio] en ese orden en el modo de mantenimiento U698 y ejecutando el modo de mantenimiento U600. Si se selecciona [ALL] en U698, se inicializan ambos OPT1 y OPT2. Para más detalles, lea el manual de servicio.

DE

**Initialisieren der FAX-Leiterplatte.**

- 1.Falls die FAX-Karten gleichzeitig in OPT1 und OPT2 installiert werden (alle FAX-Karten werden initialisiert), führen Sie den Wartungsmodus U600 aus, um die FAX-Karten zu initialisieren.
- 2.Wenn die FAX-Leiterplatte zu OPT2 hinzugefügt worden ist (um die FAX-Leiterplatte in OPT2 zu initialisieren)  
OPT2 initialisieren. Dazu [PORT2] und die [Start]-Taste im Wartungsmodus U698 in dieser Reihenfolge drücken und den Wartungsmodus U600 ausführen. Wenn [ALL] in U698 gewählt wird, werden OPT1 und OPT2 initialisiert. Weitere Einzelheiten siehe Wartungsanleitung.

10



IT

**Inizializzare la scheda a circuiti FAX.**

- 1.Se sono state installate simultaneamente le schede FAX PWB su OPT1 e OPT2 (tutte le schede FAX PWB sono inizializzate), eseguire il modo manutenzione U600 per inizializzare le schede FAX PWB.
- 2.Se la scheda a circuiti è stata aggiunta all'OPT2 (per inizializzare la scheda a circuiti FAX nell'OPT2)  
Inizializzare OPT2 premendo [PORT2] e il tasto [Avvio] in questo ordine nel modo di manutenzione U698 ed eseguendo il modo di manutenzione U600. Se viene selezionato [ALL] nel modo U698, entrambi OPT1 e OPT2 sono inizializzati. Per ulteriori dettagli leggere il manuale d'istruzioni.

CN

**传真电路板的初始化**

- 1.当把传真电路板同时安装到 OPT1 和 OPT2 时 (全部的传真电路板初始化), 执行维修保养模式 U600, 初始化传真电路板。
- 2.在 OPT2 上增设时  
(OPT2 的传真电路板初始化)  
只进行 OPT2 初始化时, 在维修保养模式 U698 状态下, 按顺序按下 [PORT2]、[开始]键, 执行维修保养模式 U600。在 U698 状态下设定 [ALL]时, 会使 OPT1 和 OPT2 均初始化。有关详细信息, 请参见维修手册。

KO

**FAX 회로기판의 초기화**

- 1.OPT1 과 OPT2 에 FAX 회로기판을 동시에 설치한 경우 (모든 FAX 회로기판이 초기화됨), 메인テナンス 모드 U600 을 수행하여 FAX 회로기판을 초기화합니다.
- 2.OPT2 에 증설한 경우 (OPT2 의 FAX 기판을 초기화)  
메인テナンス모드 U698 에서 [PORT2], [시작]키 순으로 누릅니다 . 메인テナンス 모드 U600 을 실행하고 FAX 회로기판을 초기화합니다 .U698 에서 [ALL]을 설정하면 OPT1 과 OPT2 양쪽을 초기화하기 때문에 주의할 것 . 상세는 서비스 매뉴얼을 참조할 것 .

JP

**FAX 基板の初期化**

- 1.OPT1 と OPT2 に FAX 基板を同時に設置した場合 (すべての FAX 基板を初期化) メンテナンスモード U600 を実行し、FAX 基板を初期化する。
- 2.OPT2 に増設した場合 (OPT2 の FAX 基板を初期化)  
メンテナンスモード U698 で [PORT2]、[スタート]キーの順に押す。メンテナンスモード U600 を実行し、FAX 基板を初期化する。U698 で [ALL] を設定すると OPT1 と OPT2 両方を初期化するので注意すること。詳細はサービスマニュアルを参照のこと。



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2017.10  
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