iP4500
SIMPLIFIED SERVICE MANUAL

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QY8-13BI-000
Rev. 00

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Canon Inc.

1. PRODUCT LIST

1-1. Main Units

Product name	Product code		Destination	Production q'ty (for 3 months)	Accessories
Canon Inkjet Printer iP4500	Q30-4400-000	2171B001AA	JPN	180,000	Print head
	Q30-4401-000	2171B002AA	US	39,000	Ink tanks
	Q30-4400-000	2171B003AA	CA		(Japan / Non-Japan)
		2171B004AA	LAM		BCI-9BK / PGI-5BK
		---	EUM	58,000	BCI-7eBK / CLI-8BK
		---	EMB		BCI-7eC / CLI-8C
		2171B008AA	GB		BCI-7eM / CLI-8M
		2171B009AA	EUM / EMB		BCI-7eY / CLI-8Y
		2171B011AA	AU	18,000	CD / DVD tray[*1]
		2171B012AA	ASA		8cm CD / DVD adapter[*1]
		2171B013AA	HK		Power cord
		2171B014AA	CN		
		2171B015AA	TW		*1: US and KR
	Q30-4401-000	2171B016AA	KR		

1-2. Consumables

Product name	Product code	Destination	Remarks
Canon Ink Tank			
BCI-9BK	0372B001AA	JP	
BCI-7eBK	0364B001AA		
BCI-7eC	0365B001AA		
BCI-7eM	0366B001AA		
BCI-7eY	0367B001AA		
Canon Ink Tank			
PGI-5BK	0628B001AA to 0628B005AA	001: EUR / OCN	
CLI-8BK	0620B001AA to 0620B005AA	002: AMR	
CLI-8C	0621B001AA to 0621B005AA	003: ASA	
CLI-8M	0622B001AA to 0622B005AA	004: W/O BOX	
CLI-8Y	0623B001AA to 0623B005AA	005: AMR S	

1-3. Options

None

2. PRODUCT SPECIFICATIONS

2-1. Printer Main Unit Specifications

Type	Desktop serial color inkjet printer
Paper feeding method	Auto sheet feed (rear tray, cassette, automatic duplex printing, CD / DVD printing[*]) * Not supported in the US and KR models
Resolution	9,600 dpi x 2,400 dpi (Max.)

Throughput
(Target value)
	- Photo (4" x 6")[*1] PP-201 / Standard / Borderless: Approx. 21 sec.
	- Photo (L size)[*1] GL-101 / Standard / Borderless: Approx. 18 sec.
	- Camera Direct[*2] PP-101 / 4" x 6" / Borderless: Approx. 58 sec.
	- Camera Direct[*2] GL-101 / L size / Borderless: Approx. 50 sec.
	
	For reference:
	- Black text (plain paper / FINE pattern)
	    Max speed (Custom setting 5): 31 ppm
	    Standard: 14.9 ppm
	- Color (plain paper / FINE pattern)
	    Max speed (Custom setting 5): 24 ppm
	    Standard: 11.7 ppm
	
	*1: Based on Canon standard pattern. Print speed may vary depending on system configuration, interface, software, document complexity, print mode, page coverage, type of paper used and does not take into account data processing time on host computer.
	*2: When printing equivalent to the 7.1megapixel image taken by certain Canon digital camera from PictBridge with "Default" settings on Print Effect without border using Photo Paper Plus Glossy. Actual print speed may vary depending on image data, print mode, type of paper and camera that is connected to, etc.
	Note: Notations for the Americas should be confirmed with the related marketing section of each sales company in the Americas.

Printing direction	Bidirectional, uni-directional
Print width	Max. 203.2 mm (216 mm in borderless printing)
Interface	
Computer	USB 2.0 Hi-Speed
Camera Direct	PictBridge with a PictBridge-supported digital camera, digital video camera, or camera-equipped mobile phone
Paper feed	
Rear tray	
Stacking capacity	Max. 13 mm (Approx. 150 sheets of 64 g/m^2 plain paper)
Paper weight	64 to 105 g/m^2, Canon specialty paper 273 g/m^2 at the maximum
Paper specifications	Plain paper: A4, A5, B5, Letter, Legal, custom Super White Paper SW-201: A4, Letter High Resolution Paper HR-101N: A4, Letter Photo Paper Pro PR-101: A4, Letter, 4x6, 4x8, 8x10, Wide Photo Paper Plus Glossy PP-101: A4, Letter, 4x6, 5x7 Photo Paper Plus Glossy II PP-201: A4, Letter, 8x10, 4x6, 5x7 Photo Paper Plus Semi-gloss SG-201: A4, Letter, 4x6, 8x10 Glossy Photo Paper GP-401: A4, Letter, 4x6, Credit Card GP-501: A4, 4x6 GP-502: Letter, 4x6 Matte Photo Paper MP-101: A4, Letter, 4x6 Photo Paper Plus Double Sided PP-101D: A4, Letter, 5x7 Photo Stickers PS-101 T-shirt Transfer TR-301: A4 Envelope: DL-size, COM #10
Cassette	
Stacking capacity	Max. 13 mm (Approx. 150 sheets of 64 g/m^2 plain paper)
Paper weight	64 to 105 g/m^2, Canon specialty paper 273 g/m^2 at the maximum

Paper specifications	Same as the Rear tray, except that the Legal and Credit Card sizes and Photo Stickers cannot be used in the cassette.

DVD / CD print[*] Supported media	*Not supported in the US and KR models CD / DVD printable media
Media size	120 mm / 80 mm
Print operation	Front loading
Acoustic noise (Target value)	Approx. 34.5 dB (Highest print quality settings: Photo Paper Pro, Custom 1, paper feeding from the rear tray)

Environmental requirements	During operation Temperature 5C to 35C (41F to 95F)
	                        Humidity 10%RH to 90%RH (no condensation)
	 Non operation Temperature 0C to 40C (32F to 104F)
	                        Humidity 5%RH to 95%RH (no condensation)

Power supply (Power consumption)	Power supply voltage Frequency Printing Standby OFF -- AC 100 to 240 V 50/60 Hz Approx. 13 W Approx. 1.2 W Approx. 1.0 W
External dimensions	With the trays retracted: Approx. 445 (W) x 303 (D) x 160 (H) mm With the trays extended: Approx. 445 (W) x 582 (D) x 338 (H) mm
Weight	Approx. 6.9 kg, including the print head and the ink tanks

Related standards	Electromagnetic radiance:
	   VCCI, FCC, IC, CE Mark, Taiwan EMC, C-Tick, CCC (EMC), Korea MIC, Gost-R
	 Electrical safety:
	   Electrical Appliance and Material Safety Law (DENAN), UL, C-UL, CB Report, CE Mark,
	   GS, Gost-R, FT, SASO, CCC, SPRING, Korea EK, IRAM (Argentine)
	 Environmental regulations:
	   RoHS (EU), WEEE (EU), Korea Package Recycle Law, Green Point (Germany), Energy
	   Star, Eco Mark, Law on Promoting Green Purchasing

Serial number location	On the carriage flexible cable holder (visible when the access cover is opened)
Remaining ink amount detection	Available (detection by optical method and dot count, enabled at default)
Paper type detection	Not available
Print head alignment	Available (automatic or manual alignment via the printer driver Maintenance tab, automatic alignment at default)

2-2. Print Head Specifications

	Print head
Type	Single head with 5 removable ink tanks (each color)

Print head	Pigment-based BK: 512 nozzles (30 pl), 600 dpi
	 Dye-based BK / Y: 512 nozzles for each color (5 pl), 1,200 dpi
	 Dye-based C / M: 512 x 2 nozzles for each color (5 pl), 2,400 dpi
	                             512 x 2 nozzles for each color (2 pl), 2,400 dpi
	                             512 x 2 nozzles for each color (1 pl), 2,400 dpi

Ink color	Pigment-based black Dye-based black, cyan, magenta, yellow
Ink tank	Japan: BCI-9BK (pigment-based), BCI-7eBK / C / M / Y (dye-based) Others: PGI-5BK (pigment-based), CLI-8BK / C / M / Y (dye-based)
Weight (Net)	Print head: Approx. 58.4 g
Supply method	As a service part (not including ink tanks)
Part number	QY6-0067-000

2-3. Supported Ink Tanks

Model	Destination	Pigment-based ink		Dye-based ink							
		BCI-9BK	PGI-5BK	BIC-7eBK	BCI-7eC	BIC-7eM	BCI-7eY	CLI-8BK	CLI-8C	CLI-8M	CLI-8Y
iP4500	Japan	O	X	O	O	O	O	X	X	X	X
	Others	X	O	X	X	X	X	O	O	O	O

O: Usable
X: Not usable

Note: The ink tanks for the Japanese model are not compatible with those for the other models. Be sure to use the appropriate ink tanks in servicing.

3. ERROR DISPLAY

Errors are displayed by the LEDs, and ink low warnings are displayed by the Status Monitor.

3-1. Operator Call Error (Alarm LED Blinking in Orange)

Alarm LED blinking	Error	Corrective action	Remarks
2 times	No paper in the rear tray. [1000]	Set the paper in the rear tray, and press the Resume/Cancel button.	
	No CD / DVD tray. [1001]	Set the CD / DVD tray, and press the Resume/Cancel button.	
	No paper in the cassette. [1003]	Set the paper in the cassette, and press the Resume/Cancel button.	
	No CD or DVD. [1002]	Set a CD or DVD in the CD / DVD tray (which is ejected at error occurrence), and inset the CD / DVD tray in the proper position. Then, press the Resume/Cancel button.	
3 times	Paper jam. [1300]	Remove the jammed paper, and press the Resume/Cancel button.	Error during paper feeding from the rear tray
	Paper jam in the rear guide. [1303]		Error in the duplexing transport unit
	Paper jam in the under guide. [1304]		Error during paper feeding from the cassette
	Front door close error. [1250]	Open the paper output tray.	The error is indicated if the paper output tray is closed at start of a print job, or while a print job is being performed.
4 times	No ink. [1600]	Replace the applicable ink tank, or press the Resume/Cancel button to clear the error without ink tank replacement.	When the error is cleared by pressing the Resume/Cancel button, ink may run out during printing.
	Ink tank not installed. [1660]	Install the applicable ink tank(s) properly, and confirm that the LED's of all the ink tanks light red.	
5 times	- Print head not installed, or not properly installed. [1401] - Print head temperature sensor error. [1403] - Faulty EEPROM data of the print head. [1405]	Install the print head properly.	

6 times	Inner cover open before start of printing on paper. [1841] (At CD-R is not supported.)	Close the inner cover, and press the Resume/Cancel button. (At CD-R is not supported.)	
	Inner cover open during printing on paper. [1846] (At CD-R is not supported.)	Close the inner cover, and press the Resume/Cancel button. (At CD-R is not supported.)	
	Inner cover open before start of printing on paper (print continuable). [1856]	Close the inner cover, and press the Resume/Cancel button to clear the error. The paper being printed at error occurrence will be ejected without printing the remaining data for the ejected paper, then printing will resume from the next page.	
	Inner cover closed before start of CD / DVD printing (print continuable). [1850]	Open the inner cover which functions as the CD / DVD tray feeder, set the CD / DVD tray in the feeder, and press the Resume/Cancel button.	
	Inner cover open before start of CD / DVD printing (print continuable). [1851]	Close the inner cover, and press the Resume/Cancel button.	
	Inner cover closed during CD / DVD printing (print NOT continuable). [1855]	Open the inner cover, and press the Resume/Cancel button to clear the error. The CD or DVD being printed at error occurrence will be ejected without printing the remaining data for the ejected CD or DVD, then the next print job will be performed.	
7 times	Multiple ink tanks of the same color installed. [1681]	Replace the wrong ink tank(s) with the correct one(s).	Install the ink cartridge(s), and close the access cover.
	Ink tank in a wrong position. [1680]	Install the ink tank(s) in the correct position.	
8 times	Warning: The ink absorber becomes almost full. [1700]	Press the Resume/Cancel button.	The service call error, indicating the ink absorber is full, is likely to occur soon.
9 times	The connected digital camera or digital video camera does not support Camera Direct Printing. [2001]	Remove the cable between the camera and the printer.	
10 times	Automatic duplex printing cannot be performed. [1310]	Press the Resume/Cancel button to eject the paper being used at error occurrence. Printing will resume from on the front side of the next page.	Data which was to be printed on the back side of paper at error occurrence is skipped (not printed).

11 times	Failed in automatic print head alignment. [2500]	Press the Resume/Cancel button. - If paper is being fed at error occurrence, the error is indicated after the paper is ejected. - If the error occurs, the print head alignment values are not changed. - After exit from the error by the Resume/Cancel button, the automatic print head alignment will not be re-done.	The error will occur (a) when the print head alignment pattern is not printed due to no ink or non-ejection of ink, (b) when the sensor's AD value is incorrect, or (c) when the paper is shorter than the specified length.
13 times	The remaining ink amount unknown. [1683]	Replace the applicable ink tank with a new one, and close the scanning unit (printer cover). Printing with a once-empty ink tank can damage the printer. To continue printing without replacing the ink tank(s), press the Resume/Cancel button for 5 sec. or longer to disable the function to detect the remaining ink amount. After the operation, it is recorded in the printer EEPROM that the function to detect the remaining ink amount was disabled.	The error is indicated when raw ink is detected but the dot count number exceeds the threshold of complete exhaustion of ink
14 times	Ink tank not recognized. [1684]	A non-supported ink tank is installed (the ink tank LED is turned off). Install the supported ink tanks.	
15 times	Ink tank not recognized. [1410 to 1414]	An error occurred in an ink tank (the ink tank LED is turned off). Replace the ink tank(s). Each error code corresponds to each ink tank, from left (the opposite side of the home position) to right, respectively. Error code 1410 is for the leftmost ink tank (PGI-5BK).	Ink tank positioning (from left to right): BK, PigBK, Y, M, C
16 times	No ink. [1688]	Replace the empty ink tank(s), and close the top cover. Printing with an empty ink tank can damage the printer. To continue printing without replacing the ink tank(s), press the Resume/Cancel button for 5 sec. or longer to disable the function to detect the remaining ink amount. After the operation, it is recorded in the printer that the function to detect the remaining ink amount was disabled.	The error is indicated when "no raw ink" is detected and when the dot count number exceeds the threshold of complete exhaustion of ink.
19 times	Non-supported hub	An unsupported USB hub is connected. Remove the hub.	

3-2. Service Call Error (by Cyclic Blinking in Orange (Alarm LED) and Green (Power LED), or Alarm LED Lit in Orange)

Cycles of blinking in orange and green	Error	Corrective Action
2 times	Carriage error [5100]	- Carriage unit (QM3-2264) - Timing slit strip film (QC1-6526) - Logic board ass'y (QM3-2738)[*1] - Carriage motor (QK1-1500)
3 times	Line feed error [6000]	- Timing sensor unit (QM3-2464) - Timing slit disk film (QC2-4598) - Feed roller ass'y (QL2-1490) - Logic board ass'y (QM3-2738)[*1] - Paper feed motor (QK1-3849)
4 times	Purge cam sensor error [5C00]	- Purge unit (QM3-0007) - Logic board ass'y (QM3-2738)[*1]
5 times	Rear tray (cam) sensor error [5700]	- Sheet feed unit (QM3-2723)
6 times	Internal temperature error [5400]	- Logic board ass'y (QM3-2738)[*1] - Carriage unit (QM3-2264)
7 times	Ink absorber full [5B00/5B01]	- Ink absorber kit (QY5-0190)
8 times	Print head temperature rise error [5200]	- Print head (QY6-0067) - Logic board ass'y (QM3-2738)[*1]
9 times	EEPROM / NVRAM error [6800] NVRAM time out error [6801]	- Logic board ass'y (QM3-2738)[*1]
10 times	VH monitor error [B200]	- Logic board ass'y (QM3-2738)[*1] - Print head (QY6-0067)
11 times	Carriage lift mechanism error [5110]	- PR lift shaft ass'y (QL2-1450) - Sheet feed unit (QM3-2723) - Logic board ass'y (QM3-2738)[*1] - Carriage lift sensor unit (QM3-1273)
12 times	AP position error [6A00] PG position error [5C10]	- Sheet feed unit (QM3-2723) - Logic board ass'y (QM3-2738)[*1] - Purge unit (QM2-0007)
13 times	Paper feed position error [6B00]	- Sheet feed unit (QM3-2723) - Logic board ass'y (QM3-2738)[*1]
14 times	Paper feed cam sensor error [6B10]	- Sheet feed unit (QM3-2723) - Logic board ass'y (QM3-2738)[*1]
15 times	USB Host VBUS overcurrent [9000]	- Logic board ass'y (QM3-2738)[*1]
16 times	Pump roller sensor error [5C20]	- Logic board ass'y (QM3-2738)[*1] - Purge unit (QM3-0007)
17 times	Paper eject encoder error [6010]	- Timing sensor unit (QM3-2464) - Timing slit disk eject film (QC2-4599) - Logic board ass'y (QM3-2738)[*1] - Paper feed motor (QK1-3849) - Platen unit (QM3-2725)
19 times	Ink tank position sensor error [6502]	- Platen unit (QM3-0001) - Logic board ass'y (QM3-2738)[*1]
Power LED turned off, and Alarm LED lit	ROM / RAM error	- Logic board ass'y (QM3-2738)[*1]

[*1]: Before replacement of the logic board ass'y, check the ink absorber counter value (by service test print or EEPROM information print). If the counter value is 7% or more, also replace the Ink absorber kit (QY5-0190) when replacing the logic board ass'y.

3-3. Warnings

(1) Printer (No LED indication)

Displayed warning	Remarks
Ink low	Status indication only.
Print head temperature rise	If the print head temperature is high when the top cover is opened, the warning is displayed[1]. When the print head temperature falls, the warning is released.
Protection of excess rise of the print head temperature	If the print head temperature exceeds the specified limit, a Wait is inserted during printing,

*1: If the warning is displayed, the carriage does not move to the ink tank replacement position when the top cover is opened.

4. REPAIR

4-1. Notes on Service Part Replacement (and Disassembling / Reassembling)

Service part	Notes on replacement[*1]	Adjustment / settings	Operation check
Logic board ass'y QM3-2738	- Before removal of the logic board ass'y, remove the power cord, and allow for approx. 1 minute (for discharge of capacitor's accumulated charges), to prevent damages to the logic board ass'y. - Before replacement, check the ink absorber counter value (by service test print or EEPROM information print). If the value is 7% or more, also replace the ink absorber kit when replacing the logic board ass'y. See 5. SERVICE MODE.	**After replacement:** 1. Initialize the EEPROM. 2. Reset the ink absorber counter. 3. Set the destination in the EEPROM. 4. Correct the CD / DVD and automatic print head alignment sensors. 5. Check the ink system function. See 5. SERVICE MODE for details of 1 to 5. 6. Perform LF / Eject correction. 7. Perform the print head alignment in the user mode[*1].	- EEPROM information print - Service test print - Printing via USB connection - Direct printing from a digital camera
Ink absorber kit QY5-0190		**After replacement:** Reset the ink absorber counter. See 5. SERVICE MODE.	- Service test print - EEPROM information print
Carriage unit QM3-2264		**At replacement:** 1. Apply grease to the sliding portions. See 5. SERVICE MODE. **After replacement:** 1. Correct the CD / DVD and automatic print head alignment sensors. See 5. SERVICE MODE. 2. Check the ink system function. See 5. SERVICE MODE. 3. Perform the print head alignment in the user mode[*1].	- Service test print (Confirm CD / DVD and automatic print head alignment sensor correction, and ink system function.)
Paper feed motor QK1-3849	- The red screws securing the paper feed motor are allowed to be loosened. (DO NOT loosen any other red screws.)	**At replacement:** 1. Adjust the paper feed motor. See 4-3. Adjustment / Settings, (1) Paper Feed Motor Adjustment	
Platen unit QM3-2725		**After replacement:** Check the ink system function. See 5. SERVICE MODE.	- Service test print

PR lift shaft ass'y QL2-1450		**At replacement:** Apply grease to the sliding portions. See 4-2. Grease Application	- Service test print
Input carriage lift gear QC2-1873			
Timing slit strip film QC1-6526 Timing slit disk film QC2-0475 Timing slit disk eject film QC2-0476	- Wipe off any grease from the film with ethanol. - Confirm no grease is on the film. (Wipe off any grease thoroughly with ethanol.) - Do not bend the film	**After replacement:** 1. Perform the print head alignment in the user mode[1].	- Service test print
Print head QY6-0067		**After replacement:** 1. Perform the print head alignment in the user mode[1].	- Service test print

*1: For automatic print head alignment, use Matte Photo Paper (MP-101). For manual print head alignment, plain paper can be used.

General notes:
 - Make sure that the flexible cables and wires in the harness are in the proper position and connected correctly
 - Do not drop the ferrite core, which may cause damage.
 - Protect electrical parts from damage due to static electricity.
 - Before removing a unit, after removing the power cord, allow the printer to sit for approx. 1 minute (for capacitor discharging to protect the logic board ass'y from damages).
 - Do not touch the timing slit strip film, timing slit disk film, and timing slit disk eject film. No grease or abrasion is allowed.
 - Protect the units from soiled with ink.
 - Protect the housing from scratches.
 - Exercise caution with the red screws, as follows:
   i. The red screws of the paper feed motor may be loosened only at replacement of the paper feed motor unit (DO NOT loosen them in other cases).
   ii. DO NOT loosen the red screws on both sides of the main chassis, securing the carriage shaft positioning (they are not adjustable in servicing)

4-2. Grease Application

  (1)   Printer Unit

No	Part name	Where to apply grease / oil	Drawing No.	Grease / oil	Grease / oil amount (mg)	Number of drops* x locations
1	Chassis ass'y	Entire surface the carriage slider contacts	(1)	Floil KG107A	27 to 54	3 x 1
2	Adjust plate L	Carriage shaft cam L sliding portion	(2)	Floil KG107A	18 to 36	2 x 1
3	Chassis ass'y	Carriage shaft sliding portion on the left side of the chassis (1 location)	(3)	Floil KG107A	9 to 18	1 x 1
4	Adjust plate R	Carriage shaft cam R sliding portion	(4)	Floil KG107A	18 to 36	2 x 1
5	Chassis ass'y	Carriage shaft sliding portion on the right side of the chassis (1 location)	(5)	Floil KG107A	9 to 18	1 x 1
6	Chassis ass'y	PR lift shaft cam contact portion (3 locations)	(6)	Floil KG107A	18 to 27	1.5 x 3
7	Idler pulley	The shaft surface which contacts the idler pulley hole	(7)	Floil KG107A	9 to 18	1 x 1
8	Carriage shaft	Entire surface of the carriage shaft where the carriage unit slides	(8)	Floil KG107A	200 to 400	
9	Carriage shaft spring L	Carriage shaft sliding portion (to the end of the spring)	(9)	Floil KG107A	9 to 18	1 x 1
10	Carriage shaft	Carriage shaft surface where the carriage unit slides (and where the machine-application of the grease is not feasible)	(10)	Floil KG107A	9 to 18	1 x 1
11	CL gear base	Outer surface of the CL idle gear R cylinder	(11)	Floil KG107A	9 to 18	1 x 1
12	CL gear base	Outer surface of the CL output gear cylinder	(12)	Floil KG107A	9 to 18	1 x 1
13	CL input gear	Joint of the CL gear base	(13)	Floil KG107A	9 to 18	1 x 1
14	CL input gear	CL input gear teeth	(14)	Floil KG107A	9 to 18	1 x 1

  * 1 drop = 9 to 18 mg

①

②

4mm 4mm

③

④

6mm 6mm

⑤

⑥

⑦

2~3mm

⑧

⑩

⑨

⑪

⑫

⑬

⑭
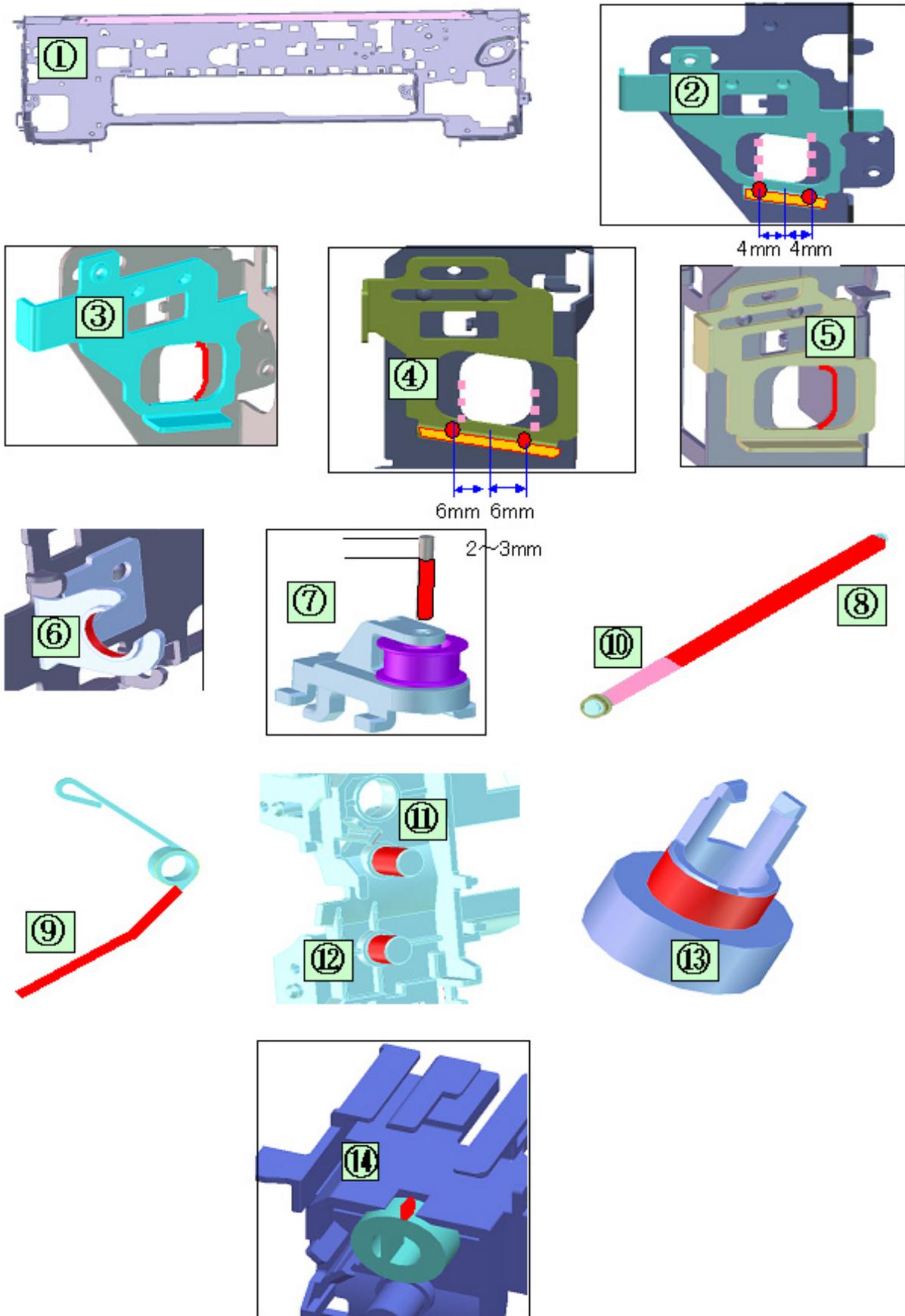
4-3. Adjustment / Settings

(1) Paper feed motor adjustment

Perform the following adjustments when the paper feed motor unit is replaced:

1) When attaching the motor, fasten the screws so that the belt is properly stretched (in the direction indicated by the blue arrow in the figure below).

2) After replacement, be sure to perform the service test print, and confirm that no strange noise or faulty print operation (due to dislocation of the belt or gear, or out-of-phase motor, etc.) occurs.

Caution: The red screws securing the paper feed motor may be loosened only at replacement of the paper feed motor unit. DO NOT loosen them in other cases.

5. SERVICE MODE

Function	Procedures	Remarks
Service test print - Model name - Destination - ROM version - USB serial number - Ink absorber counter value (ink amount in the ink absorber) - LF / Eject correction value - CD / DVD sensor correction value - Ink system function check result - CD / DVD sensor correction result	See "Service mode operation procedures" below.	Set a sheet of A4 or Letter size paper in the rear tray (cassette not usable).
EEPROM initialization	See "Service mode operation procedures" below.	The following items are NOT initialized, and the shipment arrival flag is not on: - USB serial number - Destination settings - Ink absorber counter value (ink amount in the ink absorber) - CD / DVD correction value - LF / Eject correction value - Left margin correction value - Record of disabling the function to detect the remaining ink amount
Ink absorber counter reset	See "Service mode operation procedures" below.	If the ink absorber counter value is 7% or more, replace the ink absorber kit.
LF / Eject correction	See "Service mode operation procedures" below.	
Left margin correction	See "Service mode operation procedures" below.	
Destination settings	See "Service mode operation procedures" below.	

Note: At the end of the service mode, press the Power button. The paper lifting plate of the sheet feed unit will be raised.

<Service mode operation procedures>
1)   With the printer power turned off, while pressing the Resume/Cancel button, press and hold the Power button. (DO NOT release the buttons). The Power LED lights in green to indicate that a function is selectable.
2)   While holding the Power button, release the Resume/Cancel button. (DO NOT release the Power button.)
3)   While holding the Power button, press the Resume/Cancel button 2 times, and then release both the Power and Resume/Cancel buttons. (Each time the Resume/Cancel button is pressed, the Alarm and Power LEDs light alternately, Alarm in orange and Power in green, starting with Alarm LED.)
4)   When the Power LED lights in green, press the Resume/Cancel button the specified number of

time(s) according to the function listed in the table below. (Each time the Resume/Cancel button is pressed, the Alarm and Power LEDs light alternately, Alarm in orange and Power in green, starting with Alarm LED.)

Time(s)	LED indication	Function	Remarks
0 times	Green (Power)	Power off	When the print head is not installed, the carriage returns and locks in the home position capped.
1 time	Orange (Alarm)	Service test print	
2 times	Green (Power)	EEPROM information print	
3 times	Orange (Alarm)	EEPROM initialization	
4 times	Green (Power)	Ink absorber counter resetting	Set a sheet of A4 or Letter sized plain paper in the rear tray or cassette, and reset the ink absorber counter. After the ink absorber counter is reset, the counter value is printed automatically. See "Ink absorber counter resetting" below.
5 times	Orange (Alarm)	Destination settings	Press the Resume/Cancel button the specified number of time(s) according to the destination.
6 times	Green (Power)	Print head deep cleaning	Cleaning of both Black and Color
7 times	Orange (Alarm)	CD / DVD check pattern print	Not used in servicing.
8 times	Green (Power)	CD / DVD print position correction (horizontal: X direction)	Not used in servicing.
9 times	Orange (Alarm)	CD / DVD print position correction (vertical: Y direction)	Not used in servicing.
10 times	Green (Power)	LF / Eject correction	
11 times	Orange (Alarm)	Left margin correction	
12 times	Green (Power)	Return to the menu selection	
13 times	Orange (Alarm)	Register the ink amount in the ink absorber	
14 to 16 times	Green (Power) / Orange (Alarm)	Return to the menu selection	

Note: If the Resume/Cancel button is pressed 16 or more times, the Alarm LED (orange) lights steadily without any changes.

<**Destination settings>**
In the destination settings mode, press the Resume/Cancel button the specified number of time(s) according to the destination listed in the table below, and press the Power button.

Time(s)	LED indication	Destination	CD / DVD print
0 times	Green (Power)	No change of the destination	
1 time	Orange (Alarm)	Japan	Supported
2 times	Green (Power)	Korea	Not supported
3 times	Orange (Alarm)	US	Not supported
4 times	Green (Power)	Europe	Supported
5 times	Orange (Alarm)	Australia	Supported

6 times	Green (Power)	Asia	Supported
7 times	Orange (Alarm)	China	Supported
8 times	Green (Power)	Taiwan	Supported
9 times	Orange (Alarm)	LAM	Supported
10 times	Green (Power)	Brazil	Not released
11 times	Orange (Alarm)	Canada	Supported
12 times or more	Green (Power)	Return to the menu selection	Supported

Note: After setting the destination, confirm the model name and destination in service test print or EEPROM information print.

<Ink absorber counter resetting>

Reset the ink absorber counter (to 0%) when the ink absorber is replaced, or when necessary after the logic board is replaced.

1) In the service mode, press the Resume/Cancel button 4 times, then press the Power button. The ink absorber counter value of the EEPROM is reset to 0%.
2) The flag for resetting of the ink absorber counter is set to ON, and the ink absorber counter value is automatically printed from the selected paper source. ("D=000.0" is printed at the top left of the paper.)

<Ink absorber counter setting>

Set the ink absorber counter value to a new EEPROM after the logic board is replaced in servicing.

1) Before replacement of the logic board, check the ink absorber counter value in EEPROM information print.
2) In the service mode, press the Resume/Cancel button 13 times, then press the Power button to enter the ink absorber counter setting mode.
3) In the ink absorber counter setting mode, press the Power button again to enter the main ink absorber counter setting mode. (Since the procedure for setting the ink absorber counter is common among all the models, this step is necessary to set the counter value for the main ink absorber.)
4) The ink absorber counter value can be set in 10% increments by pressing the Resume/Cancel button. Press the Resume/Cancel button the appropriate number of time(s) to select the value which is closest to the actual ink absorber counter value.

Time(s)	Ink absorber counter value to be set (%)
0 times	0%
1 time	10%
2 times	20%
3 times	30%
4 times	40%
5 times	50%
6 times	60%
7 times	70%
8 times	80%
9 times	90%
10 times or more	Not valid. Press the Power button to return to the ink absorber counter setting mode.

5) Press the Power button to set the selected value to the EEPROM. Print EEPROM information to confirm that the value is properly set to the EEPROM.

<LF / Eject correction>

After replacement of the LF / Eject roller, logic board, or platen unit in repair servicing or in refurbishment operation, perform the same level of adjustment as the one performed in the production site. In the production site, the correction method that the scanner automatically reads the printing pattern in order to enhance the correction accuracy (E-MIP correction) is used, however, in the service mode, perform the same LF / Eject correction as the one performed for the 2006 products.

Details: Print the LF / Eject correction pattern on a sheet of paper. Select the Pattern No. (0 to 2) in which streaks or lines are the least noticeable, press the Resume/Cancel button the same number of time(s) as the selected Pattern No., then press the Power button. (See the flowchart below.)

1) In the LF /Eject correction mode, press the Resume/Cancel button the specified number of time(s) according to the paper to be used in LF / Eject correction listed in the table below, then press the Resume/Cancel button. (Set a sheet of selected paper in the rear tray.)

Time(s) (L)	Paper
1 time	HR-101
2 times	GF-500, Office Planner
3 times	HP BrightWhite
4 times	Canon Extra, STEINBEIS

Note: - Each time the Resume/Cancel button is pressed, the Alarm and Power LEDs light alternately, Alarm in orange and Power in green.
   - If the Resume/Cancel button is NOT pressed, and only the Power button is pressed, the printer remains in the LF / Eject correction mode.
   - If the Resume/Cancel button is pressed 5 times or more, then the Power button is pressed, the printer returns to the service mode menu selection.

2) The LF / Eject correction pattern for the selected paper is printed. (LF correction values from 0 to 2 on the right, Eject correction values from 0 to 2 on the left).
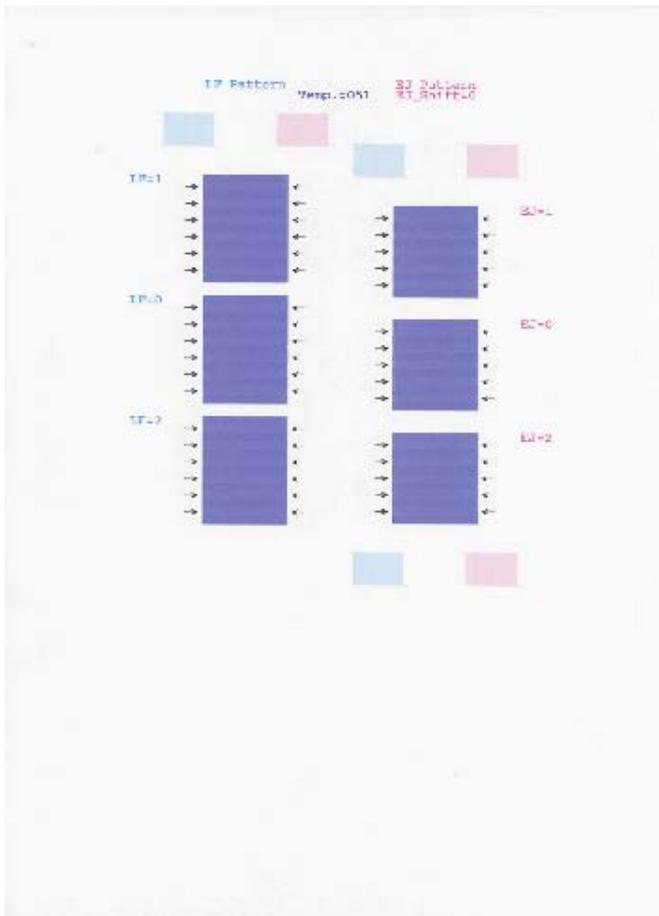
3) In the printout, select the Pattern No. in which streaks or lines are the least noticeable, press the Resume/Cancel button the same number of time(s) as the selected Pattern No., then press the Power button.
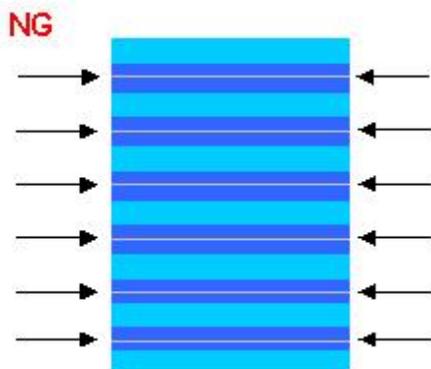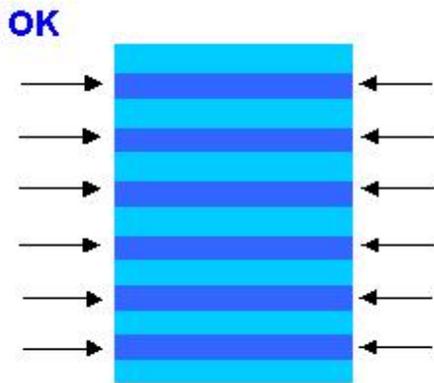
3-1) LF correction value

Selected pattern number	Number of times the Resume/Cancel button is pressed (M)
1 (A)	1 time
0 (B)	0 times
2 (C)	2 times

Note: - Each time the Resume/Cancel button is pressed, the Alarm and Power LEDs light alternately, Alarm in orange and Power in green.
- If the Resume/Cancel button is pressed 3 times or more, then the Power button is pressed, the printer returns to the service mode menu selection.

3-2) Eject correction value

Selected pattern number	Number of times the Resume/Cancel button is pressed (N)
1 (A)	1 time
0 (B)	0 times
2 (C)	2 times

Note: - Each time the Resume/Cancel button is pressed, the Alarm and Power LEDs light alternately, Alarm in orange and Power in green.
- If the Resume/Cancel button is pressed 3 times or more, then the Power button is pressed, the printer returns to the service mode menu selection.

4) The selected LF correction value or Eject correction value is written to the EEPROM, and the flag for the E-MIP correction value becomes OFF, enabling the LF / Eject correction values written to the EEPROM. Then, the flag for the fixed value of the endurance correction becomes ON, and the machine returns to the service mode menu selection.

LF / Eject correction flowchart:

```
                    ┌──────────────┐
                    │    START     │
                    └──────────────┘
                           │
                           ▼
                    ┌──────────────┐      Press the Resume/Cancel button
         ┌─────────▶│Paper selection│─────  "L" times, then press the Power
         │          └──────────────┘       button to fix the selection.
         │                 │
         │   Yes           ▼
         │        ◇ L = 0 ◇
         │           │ No
         │           ▼
         │        ◇ L = 1 ◇──Yes──▶┌──────────────┐
         │           │ No          │   HR-101      │───────┐
         │           ▼             └──────────────┘       │
         │        ◇ L = 2 ◇──Yes──▶┌──────────────┐       │
         │           │ No          │ GF-500 / Office│──────┤
         │           ▼             │  Planner      │       │
         │        ◇ L = 3 ◇──Yes──▶┌──────────────┐       │
         │           │ No          │ HP Bright White│──────┤
         │           ▼             └──────────────┘       │
         │        ◇ L = 4 ◇──Yes──▶┌──────────────┐       │
         │           │             │ Canon Extra,  │───────┤
         │      No L>=5            │ STEINBEIS     │       │
         │           │             └──────────────┘       │
```

Key entry (number of times the button is pressed):

0 times:
  The previous entry was wrong.
  Return to the previous step.
Specified number:
  Set the specified value.
Over the specified number:
  Exit the LF / Eject correction mode.

```
                    ┌──────────────────┐   1 sheet of paper is printed.
                    │ LF / Eject correction│  - LF correction pattern on the left
                    │  pattern printing │    - Eject correction pattern on the right
                    └──────────────────┘
                           │
                           ▼
                    ┌──────────────────┐   Press the Resume/Cancel
                    │ Selection of the LF│  button "M" times, then
                    │  correction value │   press the Power button to
                    └──────────────────┘   fix the selection.
                           │
                           ▼
                    ◇ 0=<M=<2 ◇──Yes*──▶  * Select the Pattern No. in which
                           │                streaks or lines are the least
                      No M>=3              noticeable.
```

No writing of the LF correction value to the EEPROM.

```
                    ┌──────────────────┐
                    │ Retention of the LF│
                    │  correction value │
                    └──────────────────┘
                           │
                           ▼
                    ┌──────────────────┐   Press the Resume/Cancel
                    │ Selection of the Eject│ button "N" times, then
                    │  correction value │   press the Power button to
                    └──────────────────┘   fix the selection.
                           │
                           ▼
                    ◇ 0=<N=<2 ◇──Yes*──▶  * Select the Pattern No. in which
                           │                streaks or lines are the least
                      No N>=3              noticeable.
```

No writing of the LF correction value to the EEPROM

No writing of the Eject correction value to the EEPROM

```
                    ┌──────────────────────┐
                    │ Writing of the Eject correction│
                    │  value to the EEPROM │
                    └──────────────────────┘
                           │
                           ▼
                    ┌──────────────────────┐
                    │ Writing of the LF correction value│
                    │  to the EEPROM       │
                    └──────────────────────┘
                           │
                           ▼
```

```
┌────────────────────┐   ┌────────────────────┐   ┌──────────────────────┐
│ Enabling the fixed value of│ │ Disabling of the E-MIP│ │ Writing of the LF correction value│
│ the endurance correction │◀│  correction value  │◀│  to the EEPROM       │
└────────────────────┘   └────────────────────┘   └──────────────────────┘
```

```
                    ┌──────────────┐
                    │     END      │   Return to the service mode menu selection.
                    └──────────────┘
```

\<Left margin correction\>

Adjust the left margin for duplex printing or printing from the cassette.

1) Duplex printing from the rear tray and cassette

   In the left margin correction mode, press the Resume/Cancel button 1 time, then press the Power button 1 time. Duplex printing is performed from the rear tray and cassette.

Number of times the Resume/Cancel button is pressed (L)	Operation
0 times	No operation
1 time	Duplex printing from the rear tray and cassette
2 times	Return to the service mode menu selection (no writing to the EEPROM)

   From each paper source (rear tray and cassette), 2 sheets of paper are ejected. The first sheet is blank, and the left margin correction pattern is printed on the second sheet.
   After this, set the correction value to the EEPROM in the steps below.

   \<Printing sequence\>
   For detail, see the flowcharts below.
   i)   A sheet of paper feeds from the rear tray, and ejected blank (single-sided printing).
   ii)   A sheet of paper feeds from the rear tray. Nothing is printed on the front side, and the pattern is printed on the back side (duplex printing).
   iii) A sheet of paper feeds from the cassette, and ejected blank (single-sided printing).
   iv)   A sheet of paper feeds from the cassette. The pattern is printed on both sides of paper (duplex printing).
   A total of 4 sheets are ejected.

2) Selection of the parameter mode for left margin correction

   Press the Resume/Cancel button the specified number of time(s) according to the parameter mode listed in the table below, then press the Power button.
   Each time the Resume/Cancel button is pressed, the Alarm and Power LEDs light alternately, Alarm in orange and Power in green.

Number of times the Resume/Cancel button is pressed (M)	Parameter mode
0 times	Duplex printing from the rear tray and cassette
1 time	Back side of paper fed from the rear tray
2 times	Front side of paper fed from the cassette
3 times	Back side of paper fed from the cassette
4 times or more	Return to the service mode menu selection (after writing to the EEPROM)

3) Setting of the left margin correction value ("+" means to increase the left margin)

   Press the Resume/Cancel button the specified number of time(s) according to the correction value listed in the table below, then press the Power button.

Number of times the Resume/Cancel button is pressed (N)	Left margin correction value
0 times	Return to the parameter mode selection for left margin correction
1 time	+1 pitch

2 times	+2 pitches
3 times	+3 pitches
4 times	-1 pitch
5 times	-2 pitches
6 times	-3 pitches
7 times or more	Return to the service mode menu selection (no writing to the EEPROM)

After the value is set, the machine returns to the parameter mode selection. Repeat steps 2) and 3) to adjust the left margin in each parameter mode: "back side of paper fed from the rear tray," "front side of paper fed from the cassette," and "back side of paper fed from the cassette."

4) After the left margin correction in all the parameter modes is completed, press the Resume/Cancel button 4 times or more in the parameter mode selection, then press the Power button to return to the service mode menu selection.

```
        ┌─────────────────────┐
        │ Left margin correction │
        │       START          │
        └─────────────────────┘
                  │
        ┌─────────────────────────────┐      Press the Resume/Cancel button "L"
        │ Start of duplex printing from the │──── times, then press the Power button to
        │ rear tray and cassette (key entry) │      fix the selection.
        └─────────────────────────────┘
                  │
      Yes    ◇ L = 0 ◇
                  │ No
No (N >=2)  ◇ L = 1 ◇
                  │ Yes
        ┌─────────────────────┐      Printing is performed according to
        │ Duplex printing from the │──── the current correction values in
        │ rear tray and cassette │      the EEPROM.
        └─────────────────────┘
                  │
        ┌─────────────────────┐
        │ Parameter mode        │      Press the Resume/Cancel button "M"
        │ selection (key entry) │──── times, then press the Power button to
        └─────────────────────┘      fix the selection.
                  │
      Yes  ◇ M = 0 ◇
                  │ No
           ◇ M = 1 ◇── Yes ┌──────────────────┐
                  │ No      │ Rear tray,        │
           ◇ M = 2 ◇── Yes │ back side of paper │
                  │ No      └──────────────────┘
           ◇ M = 3 ◇── Yes ┌──────────────────┐
                  │         │ Cassette,         │
      No  N >= 4) │         │ front side of paper │
                  │         └──────────────────┘
                            ┌──────────────────┐
                            │ Cassette,         │
                            │ back side of paper │
                            └──────────────────┘

                                Press the Resume/Cancel button "N"
                                times, then press the Power button to
                                fix the selection.

        ┌─────────────────────┐      ┌─────────────────────────┐
        │ Writing of the correction │      │ Selection of the left margin │
        │ value to the EEPROM │      │ correction value (key entry) │
        └─────────────────────┘      └─────────────────────────┘
                                              │
                                   ◇ N = 0 ◇── Yes
                                              │ No
                                   ◇ 1 <= N <= 6 ◇── Yes ┌──────────────────┐
                                              │            │ Setting of the selected left │
                                      No (N >= 7)          │ margin correction value │
                                                           └──────────────────┘

No writing to      ┌──────┐      No writing to the EEPROM.
the EEPROM.        │ END  │
                   └──────┘
```

Key entry (number of times the button is pressed):
  0 times:
    The previous entry was wrong.
    Return to the previous step.
  Specified number:
    Set the specified value.
  Over the specified number:
    Exit the left margin correction mode.
Before writing to the EEPROM, values in the RAM area
can be overwritten by using key entry.

Duplex printing from the
rear tray and cassette

START

Paper source: Rear tray
Paper type: Plain paper
Print quality: Standard (Custom 3)
Single-sided printing
Print data: No data (blank)
Print quantity: 1 sheet (1 page)

Paper source: Rear tray
Paper type: Plain paper
Print quality: Standard (Custom 3)
Single-sided printing
Print data: - No data (blank) on the front side
                     - Shipment inspection pattern 2 on the back side
Print quantity: 1 sheet (1 page)

Paper source: Cassette
Paper type: Plain paper
Print quality: Standard (Custom 3)
Single-sided printing
Print data: No data (blank)
Print quantity: 1 sheet (1 page)

Paper source: Cassette
Paper type: Plain paper
Print quality: Standard (Custom 3)
Single-sided printing
Print data: Shipment inspection pattern 2 on both sides of paper
Print quantity: 1 sheet (2 pages)

END

6. SERVICE POLICY

Service Plan	Product Repair	<Japan> By unit replacement of major units (including print heads) <Others> By product exchange with the same or successive model, or by replacement of major units or external components if Product Exchange servicing is not feasible
	Major Unit Repair	By the local sales companies
	IWS	[ ] Applicable [V] Not applicable
	Service Method	Should be determined by each sales company according to this Service Plan.
Service Parts	Available Parts	<Japan> Parts specified in this Service Plan, Parts Catalog, and Service Information bulletins Electrical custom parts listed in this Service Plan are available only in 2 order windows. <Others> Parts specified in this Service Plan and in the Simplified Service Manual
	Supply Period	<Japan> During production, and for 5 years after discontinuance of production. <Others> During production, and for 2 years after discontinuance of production (except the printer head, whose supply period is 5 years after discontinuance).
	Final Order	<Japan> YFI in the 5th year after discontinuance of production <Others> YFI in the 2nd year after discontinuance of production (For the print head, YFI in the 5th year after discontinuance of production)
	Stock Date	SENSO Parts, Starter Parts: From August 15, 2007 Other parts: From November 15, 2007
	Repair by Canon Inc.	Not available. (No repair is conducted by Canon Inc.)
Parts for Refurbishment	Available Parts	<CMJ, CUSA> All parts <Others> Parts specified in the Parts Catalog
	Supply Period	During production
	Final Order	3 months prior to discontinuance of production
Service Materials		Service Manual and Parts Catalog (Japan), Service Information (others)
Special Tools		See Chapter 4-4, Special Tools.
Service Training		[V] Applicable [ ] Not applicable
Remarks		Disclosure of this plan to any outside parties including OEM customers is strictly prohibited.

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FIGURE 1   PRINTER & PRINT HEAD

LIST OF FIGURE1

FIGURE & KEY	No.	PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
1-	1	QM3-2720-000		1	CASSETTE UNIT	
	2	QC2-1925-000		1	COVER, CASSETTE	
	3	QA4-1117-000		1	TRAY, CD SUB	W/ CDR PRINTING
	4	QL2-1449-000		1	CDR TRAY ASS'Y	W/ CDR PRINTING
	5	QY6-0067-000		1	PRINT HEAD	
	6	QH2-2716-000		1	CORD, POWER	220V-240V(EUM, EMB, ASA, MY)
	6	QH2-2719-000		1	CORD, POWER	100V-120V
	6	QK1-0776-000		1	CORD, POWER	220V-240V(AU)
	6	QK1-2017-000		1	CORD, POWER	100V-120V(TW)
	6	QK1-3048-000		1	CORD, POWER	120V-240V(LAM, CHN)
	6	QK1-3761-000		1	CORD, POWER	100V(JP)
	6	WT3-5156-000		1	CORD, POWER	220V-240V(GB, HK)
	6	WT3-5160-000		1	CORD, POWER	220V-240V(KR)

FIGURE 2   AC ADAPTER

LIST OF FIGURE2

FIGURE & KEY No.		PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
2-	1	QK1-3691-000		1	AC ADAPTER: 100V-240V 50/60HZ	

FIGURE 3   OPERATION PANEL UNIT & MAIN CASE UNIT

S1

4mm

Metal
M3
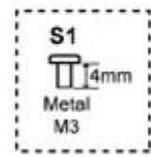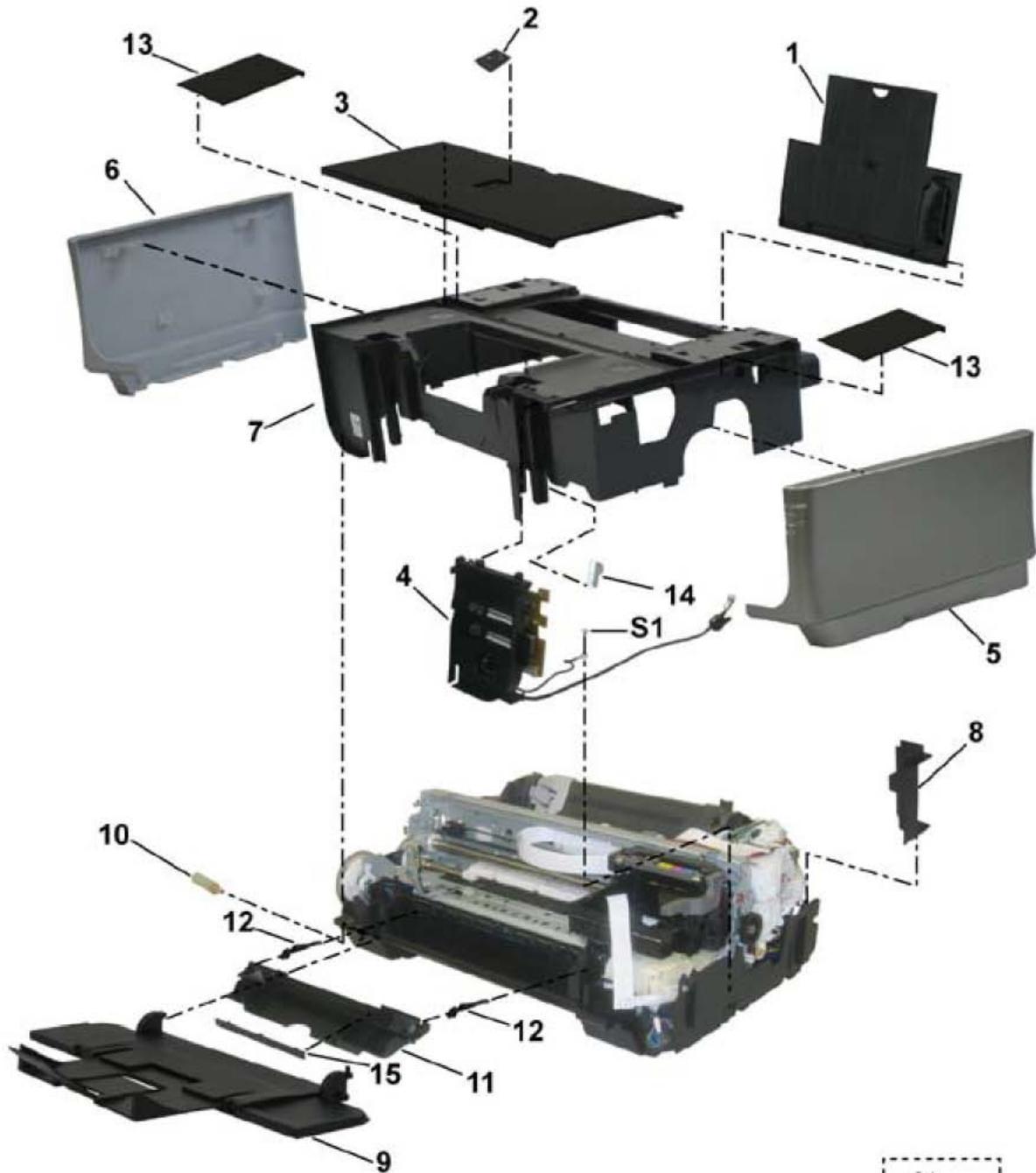
LIST OF FIGURE3

FIGURE & KEY	No.	PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
3-	1	QM3-2193-000		1	PAPER SUPPORT UNIT	
	2	QC1-9023-000		1	EMBLEM	FOR JAPAN
	2	QC1-9024-000		1	EMBLEM	FOR OTHER REGIONS
	2	QC2-4900-000		1	EMBLEM	FOR FRANCE
	3	QM3-2190-000		1	ACCESS COVER UNIT	
	4	QM3-2192-000		1	FRONT COVER UNIT	
	5	QM3-2191-000		1	SIDE COVER R UNIT	
	6	QC2-4418-000		1	COVER, LEFT	
	7	QC2-4419-000		1	MAIN CASE	
	8	QC2-4420-000		1	COVER, I/F	
	9	QM3-2189-000		1	FRONT DOOR UNIT	
	10	QC1-6573-000		1	DAMPER, DOOR	
	11	QM3-2721-000		1	INNER COVER UNIT	
	12	QC2-0424-000		2	ARM, RELEASE	
	13	QC2-5980-000		2	COVER, MAIN CASE	
	14	QC2-1877-000		1	COVER, INK MIST	
	15	QC1-9987-000		1	COVER, GAP	W/O CDR PRINTING

FIGURE 4   BOTTOM CASE UNIT & INK ABSORBER
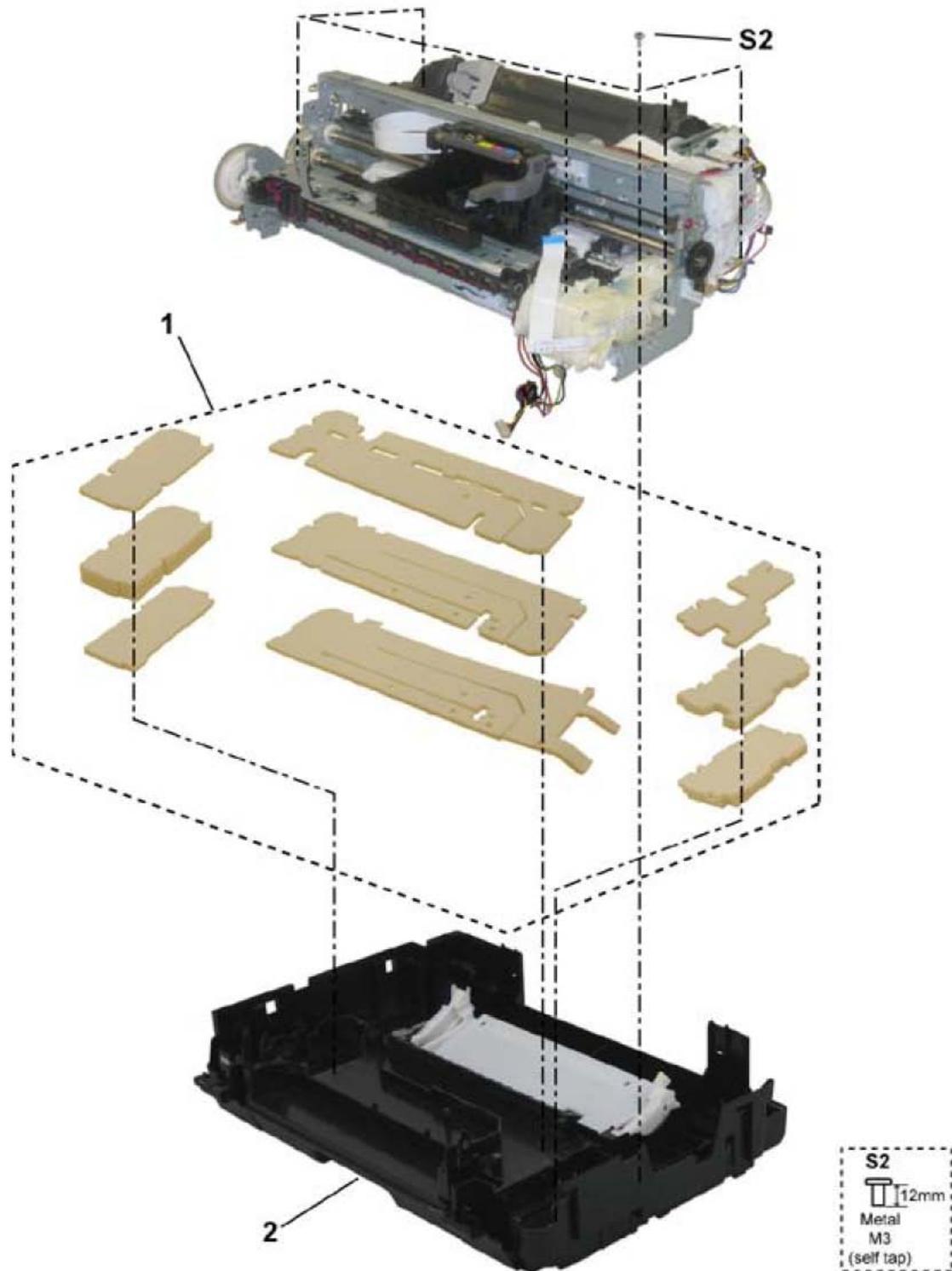
LIST OF FIGURE4

FIGURE & KEY	No.	PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
4-	1	QY5-0190-000		1	ABSORBER KIT	
	2	QM3-2718-000		1	BOTTOM CASE UNIT	

FIGURE 5   LOGIC BOARD ASS'Y

S1

1

S1

4mm

Metal
M3
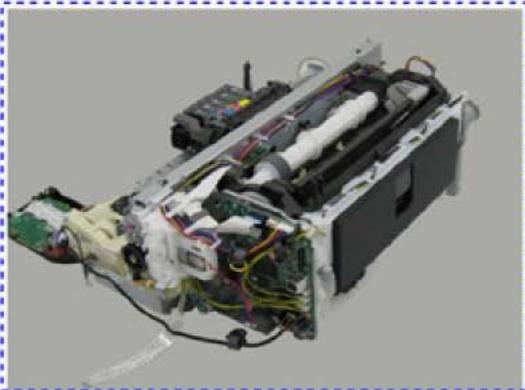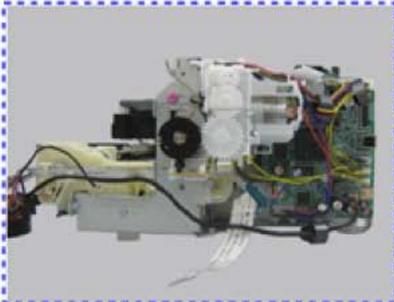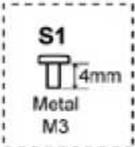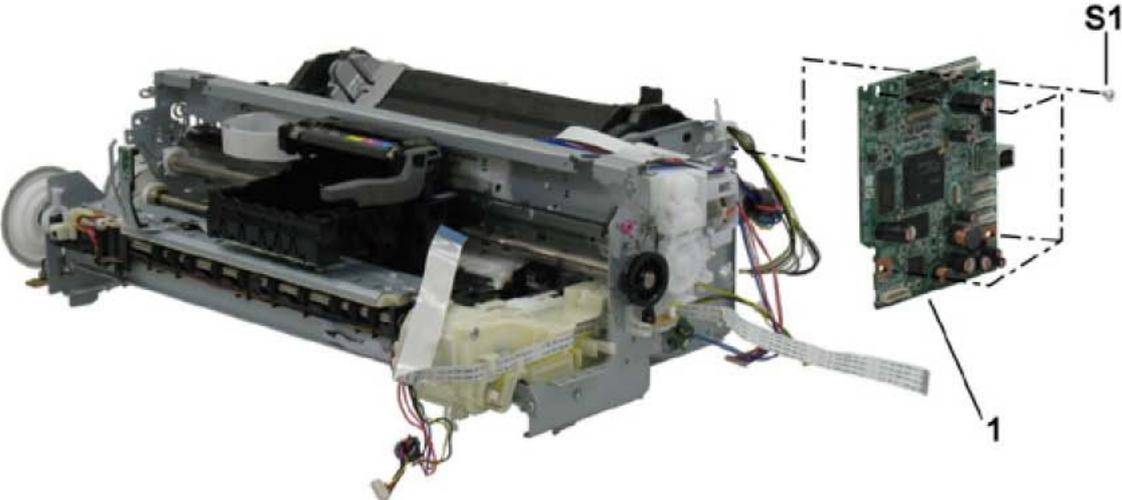
LIST OF FIGURE5

FIGURE & KEY No.		PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
5-	1	QM3-2738-000		1	LOGIC BOARD ASS'Y	

FIGURE 6   SHEET FEED UNIT

1

To : Logic Board
CN401[5pin]

To : AC ADAPTER
[5pin]

2

To : CR MOTOR[2pin]

To : Logic Board
CN701[8pin]

To :LF MOTOR[2pin]

To :PF MOTOR[2pin]

To : APCL MOTOR[2pin]

To :PE SENSOR UNIT[3pin]

To :TIMING SENSOR UNIT[6pin]

To : Logic Board
CN501[9pin]

3

S1

4mm

Metal
M3

S1

5

4

LF

EJ
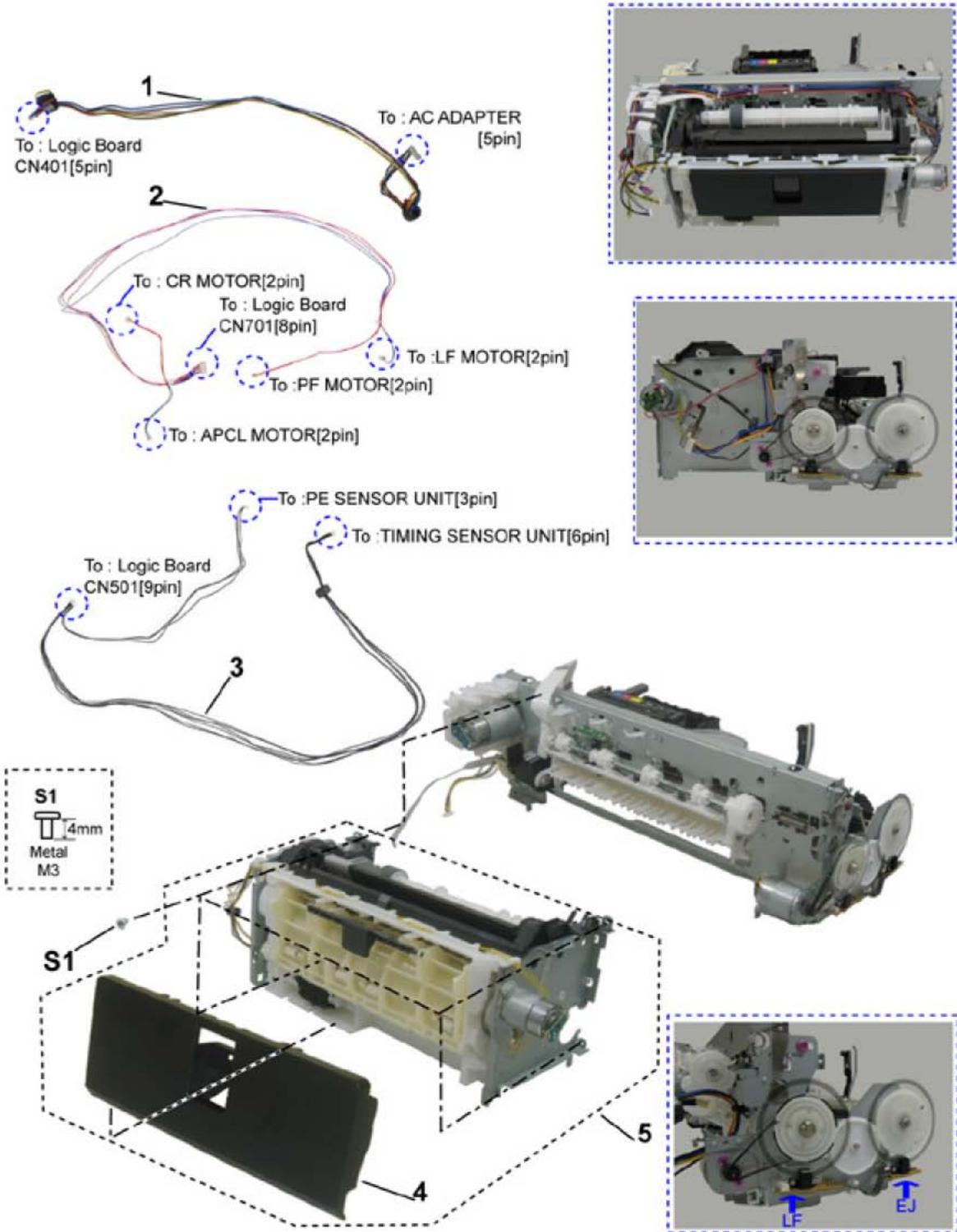
LIST OF FIGURE6

FIGURE & KEY No.		PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
6-	1	QM3-2746-000		1	DC CONNECTOR ASS'Y	
	2	QM3-2749-000		1	MOTOR MULTI HARNESS ASS'Y	
	3	QM3-2740-000		1	ENCORDER MULTI HARNESS ASS'Y	
	4	QC2-5978-000		1	COVER, PAPER FEED GUIDE	
	5	QM3-2723-000		1	SHEET FEEDER UNIT	

FIGURE 7   CARRIAGE UNIT
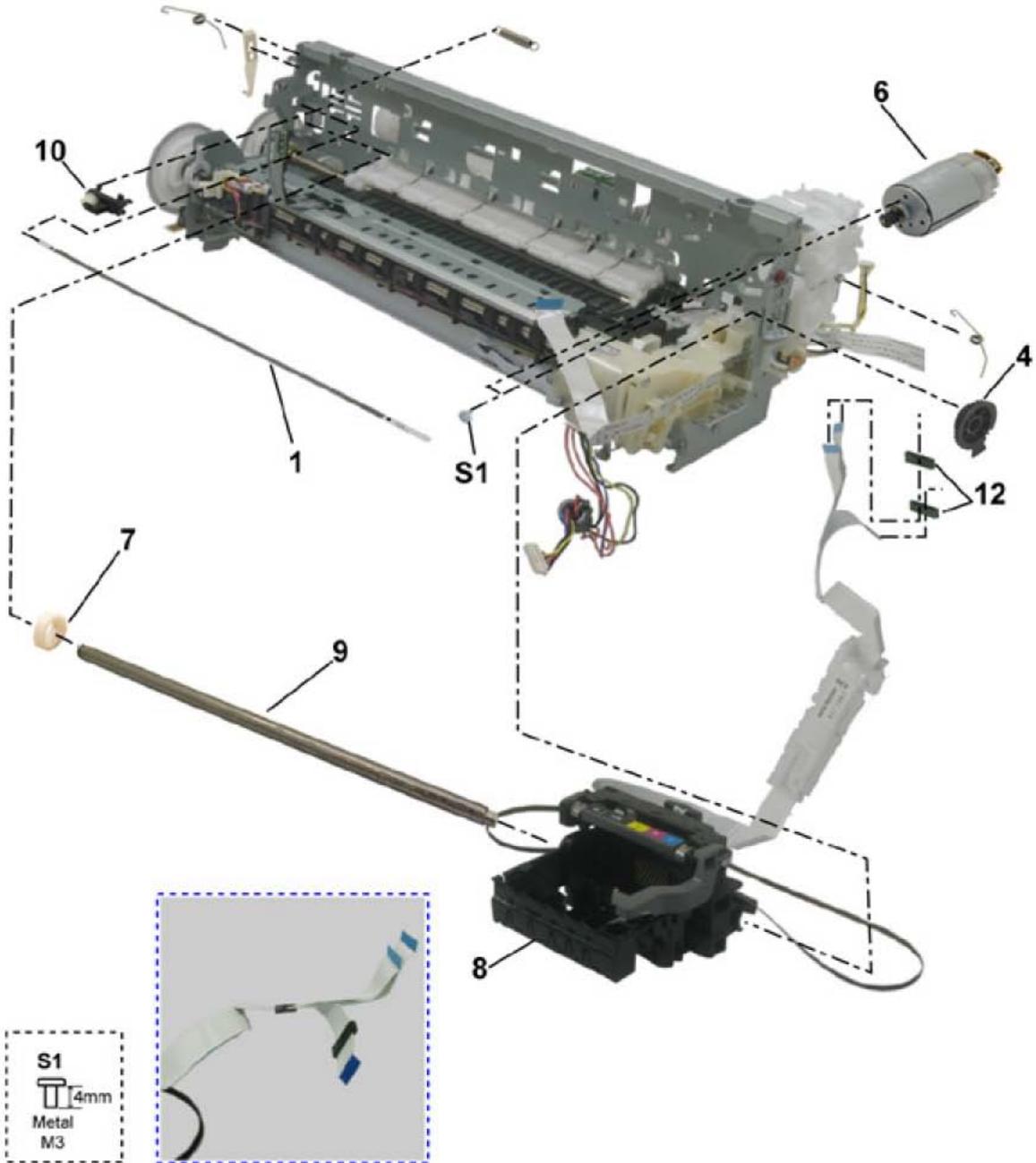
LIST OF FIGURE7

FIGURE & KEY No.		PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
7-	1	QC1-6526-000		1	FILM, TIMING SLIT STRIP	
	2	QC1-6201-000		1	SPRING, LEAF	
	3	QC2-0080-000		1	CLIP, SHAFT R	
	4	QC2-4426-000		1	CAM, CARRIAGE SHAFT R	
	5	QC2-0083-000		1	CLIP, SHAFT L	
	6	QK1-1500-000		1	MOTOR, CARRIAGE	
	7	QC2-4425-000		1	CAM, CARRIAGE SHAFT L	
	8	QM3-2264-000		1	CARRIAGE UNIT	
	9	QC2-0414-000	N	1	SHAFT, CARRIAGE	
	10	QL2-0938-000		1	IDLER PULLEY ASS'Y	
	11	QC1-6202-000		1	SPRING, COIL	
	12	QK1-3852-000		2	CORE, RING	

FIGURE 8   PLATEN UNIT
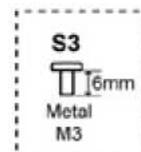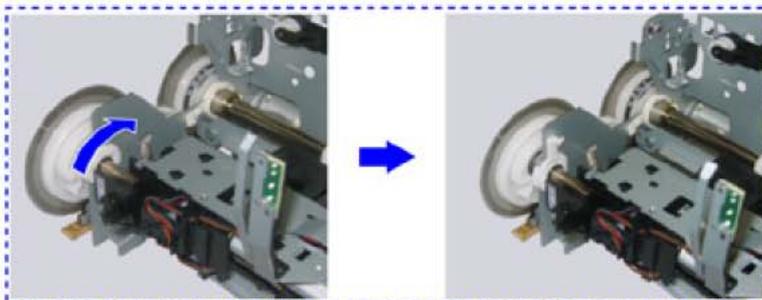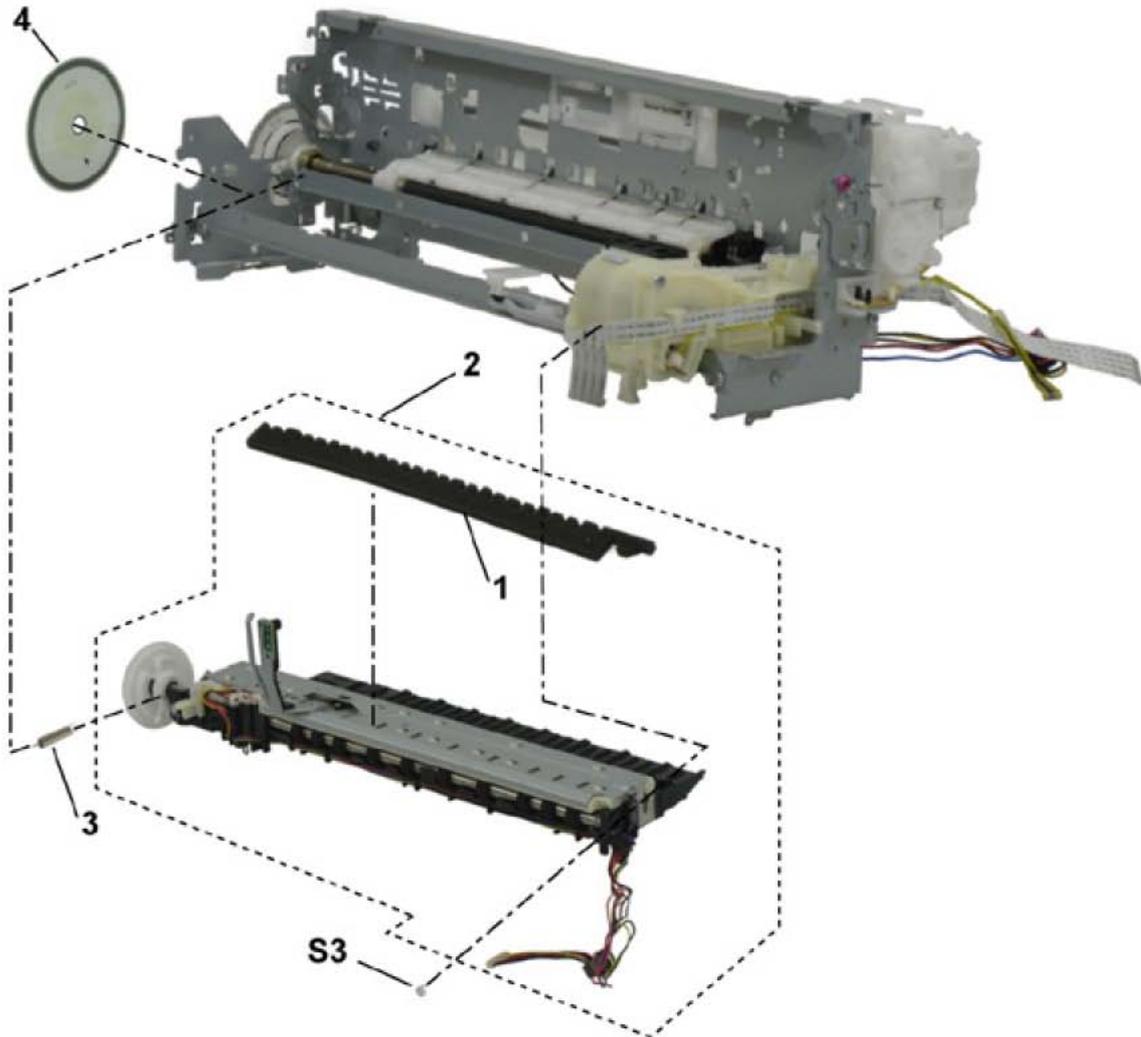
LIST OF FIGURE8

FIGURE & KEY	No.	PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
8-	1	QC2-4888-000		1	ABSORBER, INK	
	2	QM3-2725-000		1	PLATEN UNIT	
	3	QC1-6619-000		1	SPRING, TENSION	
	4	QC2-4881-000		1	FILM, TIMING SLIT DISK EJECT	

FIGURE 9   PURGE UNIT

5

4

3

2

To : CARRIAGE LIFT
SENSORT UNIT[3pin]

To : Logic Board
CN602[9pin]

To : Logic Board
CN601[15pin]

S4

1

To : PANEL COVER R UNIT[15pin]

S4
8mm
Metal
M3
(self tap)
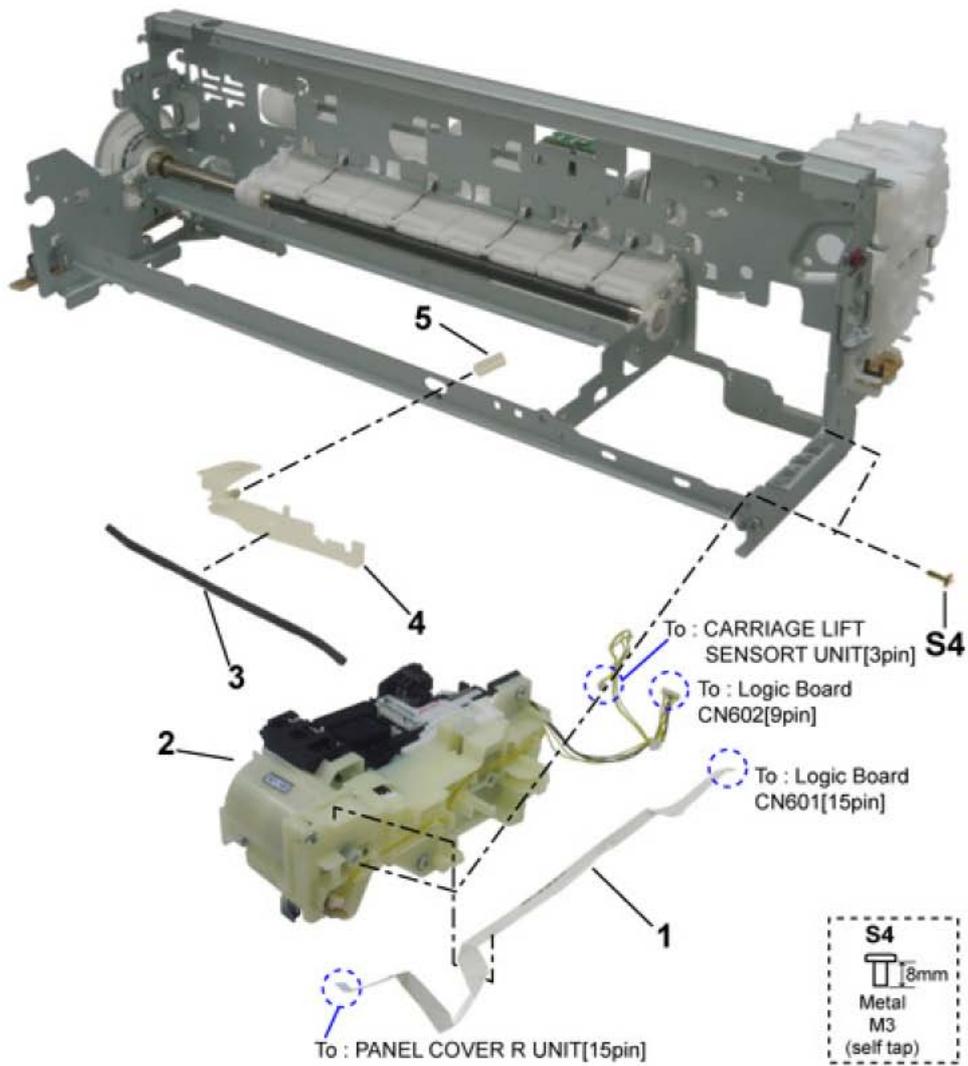
LIST OF FIGURE9

FIGURE & KEY	No.	PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
9-	1	QK1-2830-000		1	CABLE, PANEL	
	2	QM3-0007-010		1	PURGE UNIT	
	3	QC2-0089-000		1	TUBE, INK	
	4	QC2-0030-000		1	COVER, INK TUBE	
	5	QC2-0085-000		1	TUBE, INK JOINT	

FIGURE 10   PAPER FEED & CARRIAGE LIFT PART
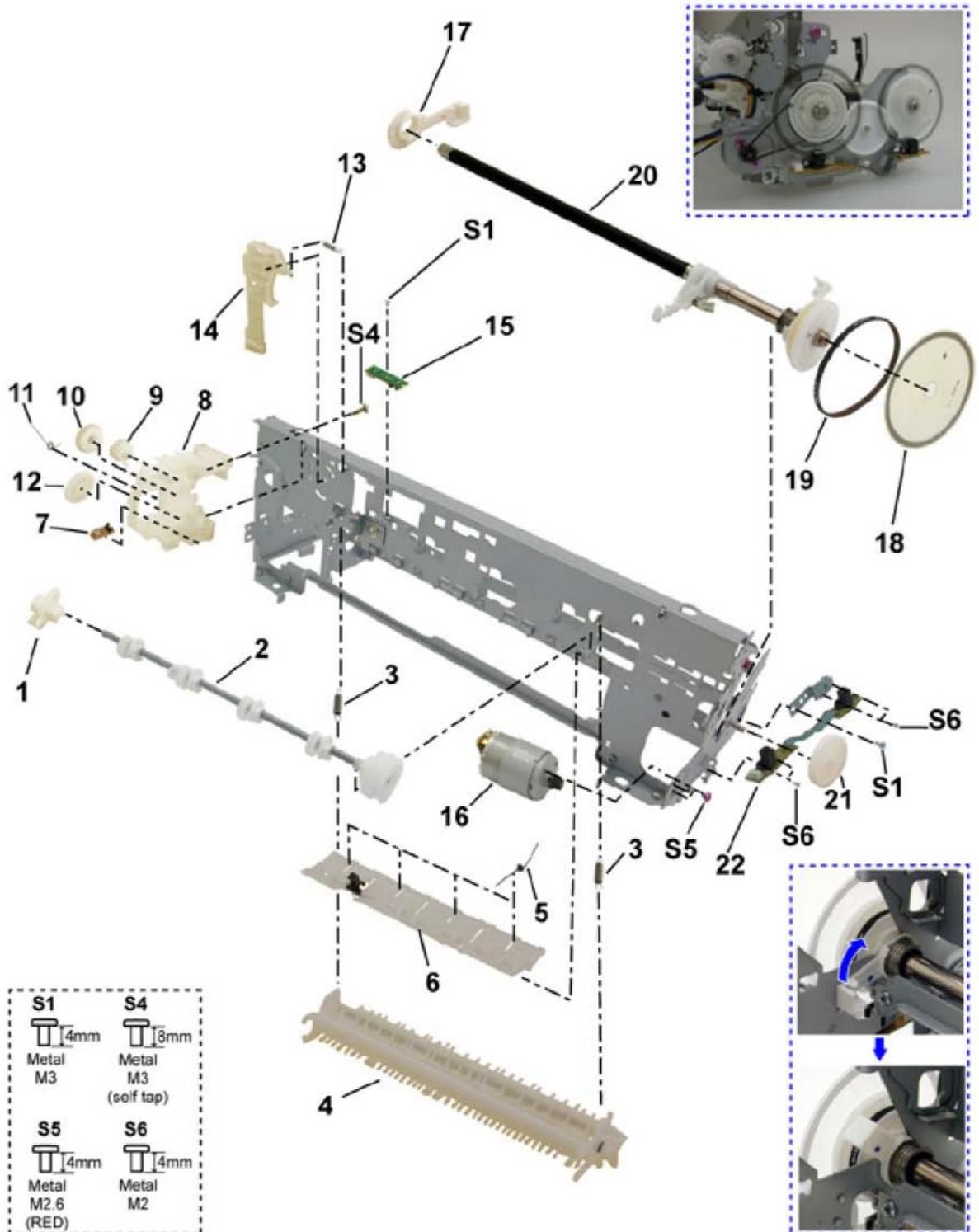
LIST OF FIGURE10

FIGURE & KEY	No.	PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
10-	1	QC1-9941-000		1	CAM, SWING ARM LOCK	
	2	QL2-1450-000		1	PR LIFT SHAFT ASS'Y	
	3	QC1-6232-000		2	SPRING, TENSION	
	4	QM2-3890-000		1	PAPER GUIDE UNIT	
	5	QC1-9937-000		4	SPRING, TORSION	
	6	QM2-3886-010		1	PRESSURE ROLLER ASS'Y	
	7	QM3-1273-000		1	CARRIAGE LIFT SENSOR UNIT	
	8	QC2-4433-000		1	CARRIAGE LIFT GEAR BASE UNIT	
	9	QC2-1873-000		1	GEAR, INPUT CARRIAGE LIFT	
	10	QC1-6212-000		1	GEAR, IDLER CARRIAGE LIFT	
	11	QC2-0039-000		1	SPRING, TORSION	
	12	QC2-0038-000		1	GEAR, OUTPUT CARRIAGE LIFT	
	13	QC2-0052-000		1	SPRING, TENSION	
	14	QC2-0040-000		1	LEVER, SWING ARM LOCK	
	15	QM3-1274-000		1	PE SENSOR UNIT	
	16	QK1-3849-000		1	MOTOR, PAPER FEED	
	17	QC1-9939-000		1	BUSHING	
	18	QC2-4880-000		1	FILM, TIMING SLIT DISK	
	19	QC1-6230-000		1	BELT, PAPER FEED	
	20	QL2-1490-000		1	FEED ROLLER ASS'Y	
	21	QC1-6225-000		1	GEAR, EJECT	
	22	QM3-2464-000		1	TIMING SENSOR UNIT	

FIGURE 11   OPTION & CONSUMABLES

LIST OF FIGURE11

FIGURE & KEY No.		PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
11 -	1	NPN		1	BLACK INK TANK BCI-9BK	CONSUMABLES
		NPN		1	BLACK INK TANK BCI-7eBK	CONSUMABLES
		NPN		1	YELLOW INK TANK BCI7eY	CONSUMABLES
		NPN		1	MAGENTA INK TANK BCI-7eM	CONSUMABLES
		NPN		1	CYAN INK TANK BCI-7eC	CONSUMABLES
	2	NPN		1	BLACK INK TANK PGI-5BK	CONSUMABLES
		NPN		1	BLACK INK TANK CLI-8BK	CONSUMABLES
		NPN		1	YELLOW INK TANK CLI-8Y	CONSUMABLES
		NPN		1	MAGENTA INK TANK CLI-8M	CONSUMABLES
		NPN		1	CYAN INK TANK CLI-8C	CONSUMABLES

FIGURE 12   TOOL

T1

FLOIL

LIST OF TOOL

FIGURE & KEY No.		PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
T -	1	QY9-0057-000		1	LUBE, FLOIL KG107A, OIL	

SCREW & WASHER LIST

FIGURE & KEY	No.	PART NUMBER	RANK	QTY	DESCRIPTION	REMARKS
S -	1	XB1-2300-405			SCREW, MACH.BH, M3X4	
	2	XA9-1752-000			SCREW, TAP, WASHER HEAD, M3X12	
	3	XB2-4300-605			SCREW, W/WASHER, M3X6	
	4	XB4-7300-805			SCREW, TP, BH3X8	
	5	XA9-1754-000			SCREW, BIND, M2.6X4(RED)	
	6	XB1-2200-405			SCREW, M2X4	

NUMERICAL INDEX

PART NUMBER	FIGURE & KEY No.		DESCRIPTION	PART NUMBER	FIGURE & KEY No.		DESCRIPTION
QA4-1117-000	1-	3	TRAY, CD SUB	QM3-0007-010	9-	2	PURGE UNIT
QC1-6201-000	7-	2	SPRING, LEAF	QM3-1273-000	10-	7	CARRIAGE LIFT SENSOR UNIT
QC1-6202-000	7-	11	SPRING, COIL	QM3-1274-000	10-	15	PE SENSOR UNIT
QC1-6212-000	10-	10	GEAR, IDLER CARRIAGE LIFT	QM3-2189-000	3-	9	FRONT DOOR UNIT
QC1-6225-000	10-	21	GEAR, EJECT	QM3-2190-000	3-	3	ACCESS COVER UNIT
QC1-6230-000	10-	19	BELT, PAPER FEED	QM3-2191-000	3-	5	SIDE COVER R UNIT
QC1-6232-000	10-	3	SPRING, TENSION	QM3-2192-000	3-	4	FRONT COVER UNIT
QC1-6526-000	7-	1	FILM, TIMING SLIT STRIP	QM3-2193-000	3-	1	PAPER SUPPORT UNIT
QC1-6573-000	3-	10	DAMPER, DOOR	QM3-2264-000	7-	8	CARRIAGE UNIT
QC1-6619-000	8-	3	SPRING, TENSION	QM3-2464-000	10-	22	TIMING SENSOR UNIT
QC1-9023-000	3-	2	EMBLEM	QM3-2718-000	4-	2	BOTTOM CASE UNIT
QC1-9024-000	3-	2	EMBLEM	QM3-2720-000	1-	1	CASSETTE UNIT
QC1-9937-000	10-	5	SPRING, TORSION	QM3-2721-000	3-	11	INNER COVER UNIT
QC1-9939-000	10-	17	BUSHING	QM3-2723-000	6-	5	SHEET FEEDER UNIT
QC1-9941-000	10-	1	CAM, SWING ARM LOCK	QM3-2725-000	8-	2	PLATEN UNIT
QC1-9987-000	3-	15	COVER, GAP	QM3-2738-000	5-	1	LOGIC BOARD ASS'Y
QC2-0030-000	9-	4	COVER, INK TUBE	QM3-2740-000	6-	3	ENCORDER MULTI HARNESS ASS'Y
QC2-0038-000	10-	12	GEAR, OUTPUT CARRIAGE LIFT	QM3-2746-000	6-	1	DC CONNECTOR ASS'Y
QC2-0039-000	10-	11	SPRING, TORSION	QM3-2749-000	6-	2	MOTOR MULTI HARNESS ASS'Y
QC2-0040-000	10-	14	LEVER, SWING ARM LOCK	QY5-0190-000	4-	1	ABSORBER KIT
QC2-0052-000	10-	13	SPRING, TENSION	QY6-0067-000	1-	5	PRINT HEAD
QC2-0080-000	7-	3	CLIP, SHAFT R	QY9-0057-000	T-	1	LUBE, FLOIL KG107A, OIL
QC2-0083-000	7-	5	CLIP, SHAFT L	WT3-5156-000	1-	6	CORD, POWER
QC2-0085-000	9-	5	TUBE, INK JOINT	WT3-5160-000	1-	6	CORD, POWER
QC2-0089-000	9-	3	TUBE, INK	XA9-1752-000	S-	2	SCREW, TAP, WASHER HEAD, M3X12
QC2-0414-000	7-	9	SHAFT, CARRIAGE	XA9-1754-000	S-	5	SCREW, BIND, M2.6X4(RED)
QC2-0424-000	3-	12	ARM, RELEASE	XB1-2200-405	S-	6	SCREW, M2X4
QC2-1873-000	10-	9	GEAR, INPUT CARRIAGE LIFT	XB1-2300-405	S-	1	SCREW, MACH.BH, M3X4
QC2-1877-000	3-	14	COVER, INK MIST	XB2-4300-605	S-	3	SCREW, W/WASHER, M3X6
QC2-1925-000	1-	2	COVER, CASSETTE	XB4-7300-805	S-	4	SCREW, TP, BH3X8
QC2-4418-000	3-	6	COVER, LEFT				
QC2-4419-000	3-	7	MAIN CASE				
QC2-4420-000	3-	8	COVER, I/F				
QC2-4425-000	7-	7	CAM, CARRIAGE SHAFT L				
QC2-4426-000	7-	4	CAM, CARRIAGE SHAFT R				
QC2-4433-000	10-	8	CARRIAGE LIFT GEAR BASE UNIT				
QC2-4880-000	10-	18	FILM, TIMING SLIT DISK				
QC2-4881-000	8-	4	FILM, TIMING SLIT DISK EJECT				
QC2-4888-000	8-	1	ABSORBER, INK				
QC2-4900-000	3-	2	EMBLEM				
QC2-5978-000	6-	4	COVER, PAPER FEED GUIDE				
QC2-5980-000	3-	13	COVER, MAIN CASE				
QH2-2716-000	1-	6	CORD, POWER				
QH2-2719-000	1-	6	CORD, POWER				
QK1-0776-000	1-	6	CORD, POWER				
QK1-1500-000	7-	6	MOTOR, CARRIAGE				
QK1-2017-000	1-	6	CORD, POWER				
QK1-2830-000	9-	1	CABLE, PANEL				
QK1-3048-000	1-	6	CORD, POWER				
QK1-3691-000	2-	1	AC ADAPTER: 100V-240V 50/60HZ				
QK1-3761-000	1-	6	CORD, POWER				
QK1-3849-000	10-	16	MOTOR, PAPER FEED				
QK1-3852-000	7-	12	CORE, RING				
QL2-0938-000	7-	10	IDLER PULLEY ASS'Y				
QL2-1449-000	1-	4	CDR TRAY ASS'Y				
QL2-1450-000	10-	2	PR LIFT SHAFT ASS'Y				
QL2-1490-000	10-	20	FEED ROLLER ASS'Y				
QM2-3886-010	10-	6	PRESSURE ROLLER ASS'Y				
QM2-3890-000	10-	4	PAPER GUIDE UNIT				