RIGOH

Technical Bulletin

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Model: Model C-C1 Date			e: 13-Apr-0)4	No.: RB173001	
Subject: Service Manual Correction				Prepared	by: A. Is	shiyama
From: 1st Technical Support sec. Service Support Dept.						
Classification:	Troubleshooting	☐ Part info	ormat	tion	Action	required
	☐ Mechanical	☐ Electrica	al		⊠ Servic	e manual revision
	☐ Paper path	☐ Transmi	it/rec	eive	☐ Retrof	fit information
	Other ()					

Please apply the following revisions to your Service Manuals. This bulletin contains the revised pages only, which has been posted to the RISSN server along with a separate full-manual version.

RISSN server files:

<File name>

- * Reference Pages: Model_C-C1_Manual_ReferencePage.pdf
- * Complete Version: Model_C-C1_Manual_Final2.pdf

<Revised Pages>

Section	Page	Correction
TABLE OF CONTENTS	iv	Some section numbers and page numbers have been corrected.
2. PREVENTIVE MAINTENANCE	2-1	The PM table has been corrected.
	3-17	3.10 MAIN PBA (MAIN BOARD): A note has been added.
3. REPLACEMENT AND ADJUSTMENT	3-20	3.13 FAN: A procedure has been corrected. A caution has been added.
	5-2	5.1 USER NODE: "Dial Mode" has been added in: 8. Machine Setup.
	5-3	Contents of "Clear All Memory" have been revised.
	5-5	Contents of "CLEAR ALL MEMORY" have been updated.
	5-5	Password in "CLEAR COUNT" has been corrected; 1394 -> 1934
5. SERVICE TABLES	5-8	5.2.6 NEW CARTRIDGE has been newly added.
	5-9	5.4 FIRMWARE DOWNLOAD section has been corrected.
	5-10	5.4.2 RE-PROGRAMMING PROCEDURE AFTER DOWNLOADED has been deleted.
	5-11 to 5.12	5.6 ENGINE TEST MODE Section number has been changed; 5.6 -> 5.5
6. DETAILED DESCRIPTIONS	6-13	6.6.4 FUSING: Description has been revised.



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Section	Page	Correction
	SPEC-1	GENERAL SPECIFICATIONS: "Operating System" and environmental conditions has been added.
SPECIFICATIONS	SPEC-2	2. PRINT SPECIFICATION: "Print Speed" has been corrected.
	SPEC-6	7. PAPER HANDLING: "Paper Weight" has been corrected.

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MODEM TEST	
DRAM TEST	5-6
ROM TEST	
PATTERN TEST	
SHADING TEST	
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PREVENTIVE MAINTENANCE

2. PREVENTIVE MAINTENANCE

The cycle period shown below is for maintenance.

Environmental conditions and use will change.

The cycle period shown is for reference only.

	Component	Replacement Cycle	Done by
	ADF Rubber	20,000 Pages	Service
Scanner	ADF Pick-up Ass'y	60,000 Pages	Service
	Friction Pad	60,000 pages	Service
-	Paper Feed Roller	60,000 Pages	Service
Printer	Transfer Roller	60,000 Pages	Service
	Fuser	60,000 Pages	Service

Preventive Maintenance

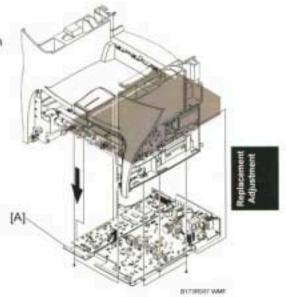
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MAIN PBA (MAIN BOARD)

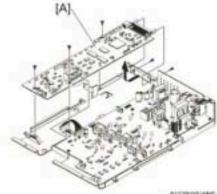
4. Remove the ten screws from the engine shield ass'y [A]. Then remove it. Then disconnect all connectors from the main PBA and SMPS.



3.10 MAIN PBA (MAIN BOARD)

NOTE: 1) Print out the system data list in Tech mode to keep programmed data before you do the replacement procedure. 2) Do the "Clear All Memory" in Tech mode (# 5.2.3) after you finish the replacement procedure.

- 1. Before you remove the main PBA, you must remove these:
 - · Rear cover (3.2)
 - Side covers (3.3)
 - Scanner Ass'y (3.5)
 - . Engine shield ass'y (3.9)
- 2. Disconnect one connector. Then remove the five screws from the main PBA. Then remove the main PBA [A].



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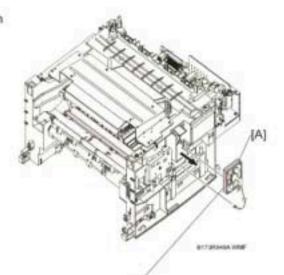
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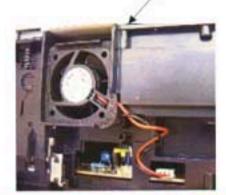
FAN

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3.13 FAN

- 1. Before you remove the fan, you must remove these:
 - Rear cover (3.2)
 - Side covers (3.3)
- Disconnect the connector from the SMPS. Then remove the fan [A].





CAUTION: Make sure to set the fan in the correct position.

The label on the fan must face outward.

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TECH MODE

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Function	Item	Contents
8. Machine Setup	Machine ID	Enter number
	Date & Time	Set date and time
	Clock Mode	12 Hour / 24 Hour
	Dial Mode*	Tone / Pulse
	Language	English / French / Spanish Portuguese / German / Italian / Dutch / Danish / Swedish / Finnish / Norwegian / Russian / Polish / Hungarian / Czech
	Power Save	5/10/15/30/45/Off
	CCD Power Save	1 / 4 / 8 / 12 Hours
	USB Mode	Fast / Slow
9. Maintenance	Clean Drum	
	Notify toner	On / Off
	Remote Test	On / Off
	Clear Memory	On / Off

^{*} This item can show only in some country code settings.

The table shows functions the user can set. Examine the user manual for instructions.

The service manual shows things that the user can set.

5.2 TECH MODE

5.2.1 HOW TO GO INTO TECH MODE

The technician can examine the machine and do different tests in service (tech) mode. This will help show the cause of a malfunction.

The machine operates correctly in Tech mode.

Do this procedure to go into the Tech mode:

Press Menu \rightarrow # \rightarrow 1 \rightarrow 9 \rightarrow 3 \rightarrow 4 in sequence. The LCD shows TECH'. Then the machine goes into service (tech) mode.

Do this procedure to go back to user mode:

Menu
$$\rightarrow \# \rightarrow 1 \rightarrow 9 \rightarrow 3 \rightarrow 4$$



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TECH MODE

5.2.2 SETTING-UP SYSTEM IN TECH MODE

Function	Item	Co	intents	
Data Setup	Send Level	9-15		
	Dial Mode	Tone / Pulse		
	Modem Speed	33.6 / 28.8 / 14.4 / 12.0 / 9.6 / 4.8 (K bps)		
	Error Rate	5% / 10%		
	Notify Toner	Customer No.		
	14.50 9.0000	Customer Name		
		Service No.		
	1000	Serial No.	L.	
	Clear All Memory	Select country co	de	
	Clear Count Enter Password (1934 enter)	Enter Password	Total Page CNT	
		(1934 enter)	CRU Print CNT	
			FLT Scan CNT	
			ADF Scan CNT	
			Used Toner CNT	
		Edit Toner Dot		
	Flash Upgrade	Local / Remote	The Charles Control of the	
	Silence Time	12 Sec / Unlimit /	Off	
Machine Test	Switch Test			
	Modern Test	STANSET L		
	Dram Test	OK / NG		
	Rom Test	Flash / Engine versions		
	Pattern Test	₹5.2.4		
	Shading Test	1707001		
Report	Protocol	Protocol List		
A Company of the Comp	System Data	System Data List		
New Cartridge	The Part of the Control of the Contr	Yes / No		

Service

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TECH MODE

CLEAR ALL MEMORY

Use this function to reset the system to the default set at the factory.

This function resets the system to the initial value when the machine does not work correctly. Values are set to the default values. The machine will not keep data set by the user. This procedure does not clear the counter data values.

<Procedure>

- 1. Set the [MEMORY CLEAR] in tech mode.
- 2. Push the ENTER button.
- The country name will show. You can see all available countries when you scroll by pressing "◄" or "▶"
 - · EU default (UK)
 - North America default (USA/Canada)
 - · Asia default (Singapore)
 - · China default (China)

Note: You cannot change the default country values.

 Push the ENTER button. This clears the memory. Then it changes it to the country code that you set.

Note: Do this procedure after you replace the main board. If you do not do this procedure, the system will not operate correctly.

Service Tables

CLEAR COUNT

This function erases the counters stored in system memory. Type password "1934" to enter the menu.

FLASH UPGRADE

The firmware upgrade has these functions:

Local and remote.

Examine the firmware upgrade section (5.4.4).

SILENCE TIME

In ANS/FAX mode, after a call is picked up by the answering machine, the machine monitors the line. If a period of silence is detected on the line at any time, the call will be treated as a fax message and the machine begins receiving. Silence detection time is selectable between limited (about 12 seconds) and unlimited time.

When "12 sec" is selected, the machine switches to receiving mode as soon as it detects a period of silence. When "unlimited" is selected, the machine waits until the answering operation is concluded even though a period of silence is detected. After the answering operation is concluded, the machine switches to receiving mode.



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DATE OF SALE

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5.2.5 REPORT

PROTOCOL LIST

Use this list to examine for send and receive errors. The protocol list automatically prints if a communication error occurs when the machine is in tech mode.

SYSTEM DATA

This gives a list of the system data set by the user and those in tech mode.

5.2.6 NEW CARTRIDGE

The machine usually detects when a new AIO (CRU) cartridge has been put in. However there may be the case when the machine does not detect the new AIO automatically. In cases like this you can manually let the machine detect a new AIO. The manual procedure and the automatic detect procedure have the same effect on the machine when the AIO is replaced. (New AIO Detection: # 6.3.1).

If this is set to "Yes", the machine will clear "TOTAL TONER COUNT" and "Cru Prints". Then the machine increments the counter "Replaced Toner Counts".

5.3 DATE OF SALE

This function shows the date that the customer used the machine for the first time.

When the customer first operates the machine, the machine starts a scan and page count.

The machine will keep the time of first operation.

The machine will keep this data even if you erase the memory (Clear All Memory).

Procedure

Press MENU, #, 1, 9, 3, # in sequence. Firmware version is shown on LCD.

Press 1 (in the number keypad): The LCD display shows "Firmware Updated date"

Press 2 (in the number keypad): The LCD display shows "product first use date"

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FIRMWARE DOWNLOAD

5.4 FIRMWARE DOWNLOAD

You can use the remote control panel to upgrade the machine firmware. Connect the machine to a PC through parallel or USB cable before you do the firmware upgrade procedure.

It is very rare to lose data and settings after the program has downloaded. However you should print out the system data list in tech mode before you start the download procedure. This will let you re-program settings that may get lost.

5.4.1 DOWNLOAD PROCEDURE

RCP (Remote Control Panel) mode

This procedure is used when the machine is connected with a parallel port or USB port to a PC. The machine uses the RCP (Remote Control Panel) software to upgrade the firmware.

- Connect PC and printer with parallel cable or USB cable.
- 2. Do RCP and set the Firmware update tab. Current firmware version and emulation version are shown.
- Keep the firmware file on the PC, in a path near to the root of C:, ie C:\TEMP. Use the "Browse" button to get the firmware file to update the machine.
- 4. Push the update button. The firmware file automatically goes to the printer. The printer is initialized when the update is finished. Make sure that these show on the LCD display when you download the new firmware:
 - DATA RECEIVING (USB) / COPY/B FILE LPT1 (PARALELL)
 - PC TO DRAM IS OK
 - 3) FLASH IS ERASING
 - 4) FLASH PROGRAMMING
 - 5) CHECKSUMMING
 - 6) DOWNLOAD OK
 - Warming up Please wait...
- Push the refresh icon. Then make sure that the version number shown agrees with the new firmware.

Note: Country code

The country code will not change after you download the new firmware.

To get the system data list

Use this procedure to make sure that the firmware was correctly upgraded.

- 1. Go into TECH mode. Then get the system data list.
- Make sure that the correct firmware version is shown on the system data list.
 - Example: Firmware/Engine/Emulation Version: 6.04 V1.0.8



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FIRMWARE DOWNLOAD

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5.4.2 RECOVERY PROCEDURE

The machine will not operate if the update procedure did not work correctly. At this time, do these steps:

- 1. Set the power off and then on.
- Do the steps in the download procedure from step 4 again.

The machine will start the upgrade procedure again.

5.4.3 REMOTE MACHINE UPDATE

This function uses one fax machine installed with the most recent firmware. It upgrades one or more other remote machines of the same type with the telephone network.

How to update firmware by remote fax

- Operate a fax with the most recent firmware to prepare it to send the upgrade.
- Put in the telephone number of the fax machine to upgrade. (You can upgrade several faxes at the same time). At this time, put in the telephone number for each machine.)
- Then push the enter button. This will send the firmware file to each of the set fax machines. (It will be 10 or 15 minutes to send the file to each machine.)

CAUTION: 1) The sending and receiving fax machines must be the same model.

A sending fax must be set up as ECM mode. The receiving machine memory must be set to 100%. If not the upgrade will fail.

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ENGINE TEST MODE

5.5 ENGINE TEST MODE

The engine test mode gives functions to examine the engine condition. It examines the condition of each device and shows the result of the test on the LCD. It is in 6. items (0~5). The functions of items are shown below.

5.5.1 TO ENTER THE ENGINE TEST MODE

Press MENU, #, 1, 9, 3, 1 in sequence, and the LCD briefly displays 'Engine Test Mode', the machine has entered service (tech) mode.

NOTE: It may cause any damage on the machine if a test is done for long time.

5.5.2 DIAGNOSTIC

No.	Test Name	Engine Test	Remarks	
		Motor Test	1 : On, 2 : Off	
0	MTR FAN SOL ETC	PickUp Test	1 : On, 2 : Off	
		Fan Test	1 : On, 2 : Off	
		Manual Cit Test	1 : On, 2 : Off	
		PTL Test	1 : On, 2 : Off	
	THE RESERVE AND	LSU Motor Test	1 : On, 2 : Off	
1	LSU TEST	LSU Hsync Test	1 : On, 2 : Off	
		LD Test	1 : On, 2 : Off	
		Feed Sensor Test	Check : Check Sensor status	
		A CONTRACTOR OF STREET	Next : Next Sensor Check	
		Exit Sensor Test	Check : Check Sensor status	
			Next : Next Sensor Check	
	SENSOR	Cover Sensor Test	Check : Check Sensor status	
2	TEST		Next : Next Sensor Check	
		Empty Sen Test (Paper End Sensor)	Check : Check Sensor status	
			Next : Next Sensor Check	
		MP Empty Sen Test	Check : Check Sensor status	
		(Bypass paper sensor)	Next : Next Sensor Check	
3	HEAT TEST	THERM ADC 220-85	1 : On, 2 : Off (maintain the fusing temp.)	
		MHV Test	1 : On, 2 : Off (-1550V ± 50V)	
	1	Dev Bias Test	1 : On, 2 : Off (-430V ± 20V)	
	100000000000000000000000000000000000000	THV EN/NEG Test	1 : On, 2 : Off (-1000V +300V/-150V)	
4	4	HVPS TEST	THV On (1300V)	1 : On, 2 : Off (+1300V ± 20V)
		1 3	THV ADC 1300V	1 : On, 2 : Off (ADC Value : 101 ± 5)
		THV ADC 600V~3550V	1 : On, 2 : Off (Compare each ADC Value)	
	Heat Error Nun	n		
5	Low Heat Num			
	Heat Buffer 1~10			

Service Tables



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ENGINE TEST MODE

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5.5.3 STATUS PRINT

When the function is enabled a group of parameters are printed at the bottom of each page. This shows the print engine condition. This is not necessary for service

This setting stays on when you get out of Engine Mode. Make sure to set it off.

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ENGINE F/W

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6.6.4 FUSING

The resistance of the thermistor varies inversely with the temperature of the hot roller. The control circuit monitors the temperature through the thermistor and turns the fusing lamp on and off. This keeps the hot roller at the operating temperature.

Error Type

Error	Description
Open heat error	Goes lower than 68°C for 28 seconds at the time of warm up
	Standby: Goes lower than 80°C over 10 seconds Print mode:
Lower heat error	 Goes lower than 145°C for 4 seconds for consecutive pages.
	Sets at 25°C or lower than the fixed fusing temperature over 4 seconds for consecutive pages.
Over heat error	Goes higher than 220°C for 3 seconds

6.6.5 LSU

The LSU consists of the LD (Laser Diode) and the polygon motor. The LD turns and drives the polygon motor when it gets a print signal. Hsync occurs when the light part gets the beam. LReady occurs when the polygon motor speed gets to a correct condition. The LSU controller gets to 1 when the LSU is ready. If not, an error is shown.

Error Type

Error	Description
Polygon motor error	When the polygon motor's speed is not correct
Hsync error	The polygon motor's speed is correct, but the Haync signal is not shown.

Detailed Descriptions



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SPECIFICATIONS

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SPECIFICATIONS

1. GENERAL SPECIFICATIONS

Configuration	Desktop		
Major Features:	Copier, Print, Scan, Fax (with ADF)		
Operation System	Win95/98/Win-	Me/NT4.0/2000/XP	
LCD:	16 characters	x 2 lines	
I/O Interface:	USB1.1 & IEE	E1284	
Power Consumption:	Print Mode	350 W	
	Sleep Mode	20 W	
Power Switch:	Yes	14 H 1 H 1 H 1 H 1 H 1 H 1 H 1 H 1 H 1 H	
Noise:	Operating	55 dBA	
	Standby	39 dBA	
Warm Up:	Less than 42 seconds		
Approval:	Class B		
Device Memory:	16 MB		
Size (W*D*H) w/o Hand Set:	474 x 436 x 41	17 mm (18.7" x 17.2" x 16.4")	
Weight:	13 Kg (28.8 lb	s.); With toner Cartridge	
Absolute Storage Condition:	Temperature:	-20°C - 40°C	
TO-10 Vago White the male wall when	Humidity:	10% RH ~ 95% RH	
Operating Condition:		10°C - 32°C	
		20% RH ~ 80% RH	
Recommended Operating		16°C - 30°C	
Condition	Humidity	30% RH ~ 70% RH	

apple Spire

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SPECIFICATIONS

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2. PRINT SPECIFICATION

Config	guration	Desktop	
Print Speed:		A4 - 16 ppm, Letter - 17 ppm (5%, Character Pattern)	
Print Method:		Laser Scanning Unit + Electro Photography	
Print Languag	je:	GDI	
Power Save:		Yes (5/10/15/30/45 min.)	
Resolution:	Normal	600 *600 dpi	
	RET	No	
Toner Save:		Yes	
Memory:		8MB	
FPOT:	Stand by	Approx. 12 seconds	
Power Save		Less than 54 seconds	
Duplex Print:		Manual (driver support provided)	
Printable Area	a:	207.6 x 270.6 mm (Letter)	

3. SCAN SPECIFICATION

Configuration	Desktop		
Halftone (Gray Scale):	256 level		
Scan Method:	Color CCD (ITU-T#1 Chart)		
Scan Speed	ADF	25 seconds: Text/Mixed Mode, B/W Letter and 300dpi. (USB)	
		72 sec	
		Photo Mode: Gray	
		Letter & 300dpi. (USB)	
	Platen	23 sec	
Resolution:	Optical	600 x 600 dpi	
Scan Width:	Width	Max.216mm (8.5")	
	Length (ADF)	Max. 356mm (14.0")	
	Length (Platen)	Max. 297mm (11.7")	
Scan-to:	E-mail, Image, OCR, FAX, WEB		



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SPECIFICATIONS

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7. PAPER HANDLING

Co	nfiguration	Desktop	
Capacity	Main Tray	250 sheets	
(20lbs):	Bypass	Single sheet	
Optional Cassette:		No	
Output Capacity:		150Sheets/20 lb	
Output Control:		Face down	
Paper Size:	Main tray	CST: A4, Letter, Legal	
		Folio, Executive, B5	
	Bypass	Bypass: Envelope 6 3/4,	
	100000000000000000000000000000000000000	7 3/4, #9, #10, DL, C5, B5	
Paper Weight:	Main tray	60 ~ 90g/m ² (16 ~ 24 lb)	
	Bypass	60 ~ 163g/m ² (16 ~ 43 lb)	
Paper Path:	Standard output	Bottom to Middle Front	
	Straight through	Face up, Single Sheet	
Paper Size:	Max	216 x 356mm (8.5" x 14")	
	Min	76 x 127mm (3"x 5 ")	
Output Stacker:	Paper	Extension	
TO STATE OF THE PARTY OF T	Document	Fixed	
Input Guide:	Bypass tray	Adjustable	
	Main tray	Universal	
	Document	Adjustable	
ADF:	Paper Weight	47 ~ 105g/m ² (12.5~28lb)	
	Capacity	30 sheets (75g/m²/20 lb)	
	Document size width	148mm - 216 mm (5.8" - 8.5")	
	Document size length	127 mm - 356 mm (5" - 14.0")	

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Model: Model C-C1 Dat		e: 2-Jul-04	No.: RB173002		
Subject: Machine Firmware History			Prepared by: A. I	shiyama	
From: 1st Techni	cal Support Sec. Service Support	ort Dept.			
Classification:	☐ Troubleshooting	☐ Part info	ormat	tion 🖂 Action	n required
	☐ Mechanical	☐ Electric	al	☐ Servi	ce manual revision
	☐ Paper path	Transm	it/rec	eive 🗌 Retro	fit information
	Other ()				

The following is the machine firmware history for the Model C-C1 (B173 model).

Part Number	Version	Production
B173612	6.12	May '04 production
B173609	6.09	First mass production

Note: The above firmware is being used for USA, Europe, Asia and China models.

Symptom Corrected, Other Changes	Version
Symptoms corrected:	
1. Cannot use the Menu key once the number of pages is programmed for the job.	ir
2. The operator was able to set the "End Time" for a Forward Job to an earlier value than the "Start Time".	
3. "Warming up" remains displayed after the machine is woken up by a print job set for plain paper feed from the Bypass Tray. (Printing is normal).	
Other changes:	
 Optimized the Toner Low/Empty timing by adjusting the threshold for the toner dot counter based on the temperature/humidity data from the environmental sensor. 	;
2. Modified software so that the display does not allow the operator to access the Copier function during fax communication.	6.12
Note: With previous versions, the machine prohibited Copier operation in accordance with specification, but the display allowed the operator input the number of copies.	
3. Modified software so that the operator can print from the Bypass Tray after clearing a Jam 0 at this tray. (Previously, it was necessary to refeed from a paper tray).	
4. Modified software so that a Speed Dial cannot be deleted if it is currently programmed in a Forward Job. (Deletion causes this feature	
to operate incorrectly). 5. Reduce/Enlarge default changed from Custom to Original.	
6. The following setting has been applied for the China model.	
Note: This is effective when the country code is set to China.	
Redial count:	
- Setting range: 0-2 - Default: 2	
Regular upgrade: Improved management of energy saver function.	6.09
The second secon	0.00

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Reissued: 16-Sep-04

Model: Model C-C1	Date: 2-July-04	No.: RB173002a

RTB Reissue

The items in bold italics have been added.

Subject: Machine	e Firmware History		Prepare	d by: A.Ishiyama
From: 1st Tech. S	Support Sec. Service Support [Dept.		
Classification:	Troubleshooting	☐ Part informat	tion	
	☐ Mechanical	☐ Electrical		☐ Service manual revision
	☐ Paper path	☐ Transmit/rec	eive	☐ Retrofit information
	Other ()			

The following is the machine firmware history for the Model C-C1 (B173 model).

Part Number	Version	Production
B173613	6.13	July '04 production
B173612	6.12	May '04 production
B173609	6.09	First mass production

Note: The above firmware is being used for USA, Europe, Asia and China models.

Symptom Corrected, Other Changes	Version
Other changes: 1. DTMF levels for Russia changed to meet local regulations. 2. Optimized the transfer voltage and fusing temperature for "Colored" paper to ensure good drum cleaning.	6.13
3. Optimized the timing for the "Toner Low" and "Toner Empty" conditions (the threshold for the toner dot counter was changed).	

RIGOH

Technical Bulletin

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Reissued: 18-Nov-04

Model: Model C-C1	Date: 2-July-04	No.: RB173002b
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RTB Reissue

The items in bold italics have been added.

Subject: Machine Firmware History			Prepared by: A.Ishiyama	
From: 1st Tech. Support Sec. Service Support Dept.				
Classification:	☐ Troubleshooting	☐ Part informat	tion	□ Action required
	☐ Mechanical	Electrical		☐ Service manual revision
	☐ Paper path	☐ Transmit/rec	eive	☐ Retrofit information
	Other ()			

The following is the machine firmware history for the Model C-C1 (B173 model).

Part Number	Version	Production
B173614	6.14	October '04 production
B173613	6.13	July '04 production
B173612	6.12	May '04 production
B173609	6.09	First mass production

Note: The above firmware is being used for USA, Europe, Asia and China models.

	Symptom Corrected, Other Changes	Version
<i>1. 2.</i>	"LUI Select" setting was added: Tech Mode >> Data Setup >> LUI Select. Reason: The NCU (LIU) was changed so that the EU model can be used in South Africa (new regulations). This setting tells the machine if the NCU is the old one or the new one. When you install this firmware, make sure the setting is correct: - New NCU (B1739677): Select "EU&SA LIU" - Old NCU (B1739515): Select: "EU LIU" Note: For details, see MB B173004 and RTB B173003.	6.14
Ot	her changes:	
1.	DTMF levels for Russia changed to meet local regulations.	
2.	Optimized the transfer voltage and fusing temperature for "Colored" paper to ensure good drum cleaning.	6.13
3.	Optimized the timing for the "Toner Low" and "Toner Empty" conditions (threshold for toner dot counter was changed).	



PAGE: 2/2

Reissued: 18-Nov-04

Model: Model C-C1	Model: Model C-C1 Date: 2-July-04 No.:			
Symptom Corrected, Other Changes			on	
 Symptoms corrected: Cannot use the Menu key once the number of pagiob. The operator was able to set the "End Time" for Forvalue than the "Start Time". "Warming up" remains displayed after the machine set for plain paper feed from the Bypass Tray. (Prince Changes: 	ges is programmed for the progra	he		
 Optimized the Toner Low/Empty timing by adjusting the threshold for the toner dot counter based on the temperature/humidity data from the environmental sensor. Modified software so that the display does not allow the operator to access the Copier function during fax communication. Note: With previous versions, the machine prohibited Copier operations in accordance with specification, but the display allowed the operator to input the number of copies. 			2	
3. Modified software so that the operator can print from the Bypass Tray after clearing a Jam 0 at this tray. (Previously, it was necessary to re-feed from a paper tray).				
Modified software so that a Speed Dial cannot be deleted if it is currently programmed in Forward Job. (Deletion causes this feature to operate incorrectly).				
 5. Reduce/Enlarge default changed from Custom to 6. 6. The following setting has been applied for the Chill Note: This is effective when the country code is se Redial count: Setting range: 0-2 Default: 2 	na model.			
Regular upgrade: Improved management of energy sa	aver function.	6.09	9	



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М.	А	G	ᆮ	:		/ I

Model: Model C-C1 EU Model D		Date: 18-Nov-04			No.: RB173003	
Subject: Machine firmware updated for NCU change			Prepared by:	۹. Is	shiyama	
From: 1st Technical Support Sec. Service Support Dept.						
Classification:	☐ Troubleshooting	☐ Part informa		ion 🖂 Action required		required
		☐ Electric	al	☐ Se	rvic	e manual revision
	☐ Paper path	☐ Transmit/red		eive 🗌 Re	trof	it information
	Other ()					

Important Note on NCU / Firmware / Machine Interchangeability

As announced in MB B173004 and RTB B173002b, the NCU (LUI) for the Europe model was changed from October 2004 so that it can be used in South Africa:

P/N B1739515 → P/N B1739677

Note: There is a round, green seal on the new NCU.

When you install the new NCU (LUI), you also need to update the firmware and check the "LUI Select" setting (details below).

Action in the Field

- 1) If you install the **new** NCU (B1739677), make sure to install firmware **v6.14 or later.**
- 2) When you install v6.14, make sure that the "LIU Select" setting is correct. (Tech Mode >> Data Setup >> LUI Setting):
 - > v6.14 + **New** NCU: Select "**EU&SA LIU**"
 - > v6.14 + Old NCU: Select: "EU LIU"

Example: v6.14 + New LCU:

Silence Time	[12 Sec/Unlimit/Off]	off
LIU Select (EU only)	[EU&SA LIU/EU LIU]	EUSSA LIU
Firmware/Engine/Emulation Version	: 6.14	V7-1-1 QPDL 1-22 12-02-2003

[System Data List]

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Reissued: 30-Jan-06

Model: Model C-C1	Date: 24-Jan-05	No.: RB173002c
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RTB Reissue

The items in **bold italics** have been added.

Subject: Machine Firmware History			Prepared by: T. Shintani	
Support Sec. Service Support [Dept.			
☐ Troubleshooting ☐ Mechanical ☐ Paper path ☐ Other ()	Electrical		Action required Service manual revision Retrofit information	
	upport Sec. Service Support [Troubleshooting Mechanical Paper path	upport Sec. Service Support Dept. Troubleshooting Part information Electrical Paper path Transmit/rec	upport Sec. Service Support Dept. Troubleshooting Part information Mechanical Electrical Paper path Transmit/receive	

The following is the machine firmware history for the Model C-C1 (B173 model).

Part Number	Version	Production
B173615	6.15	Feburary '05 production
B173614	6.14	October '04 production
B173613	6.13	July '04 production
B173612	6.12	May '04 production
B173609	6.09	First mass production

Note: The above firmware is being used for USA, Europe, Asia and China models.

	Version	
II	her changes: e volume of the beeping sound for Fax reception was reduced.	6.15
1.	"LUI Select" setting was added: Tech Mode >> Data Setup >> LUI Select. Reason: The NCU (LIU) was changed so that the EU model can be used in South Africa (new regulations). This setting tells the machine if the NCU is the old one or the new one. When you install this firmware, make sure the setting is correct: - New NCU (B1739677): Select "EU&SA LIU" - Old NCU (B1739515): Select: "EU LIU" Note: For details, see MB B173004 and RTB B173003.	6.14
2.	The On/Off display for the Message Confirmation Report is wrong when the report is selected from the RCP (Remote Control Panel).	
Otl		
1.	DTMF levels for Russia changed to meet local regulations.	
2.	Optimized the transfer voltage and fusing temperature for "Colored" paper to ensure good drum cleaning.	6.13
3.	Optimized the timing for the "Toner Low" and "Toner Empty" conditions (threshold for toner dot counter was changed).	



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Reissued: 30-Jan-06

Mode	Model: Model C-C1 Date: 24-Jan-05 No.:				
	Symptom Corrected, Other Changes				
1. C jc 2. T va 3. "V	ptoms corrected: Cannot use the Menu key once the number of pagob. The operator was able to set the "End Time" for Foralue than the "Start Time". Warming up" remains displayed after the machine et for plain paper feed from the Bypass Tray. (Pri	orward Job to an earlier e is woken up by a print			
1. October 2. Months and the second of the s	optimized the Toner Low/Empty timing by adjusting oner dot counter based on the temperature/humid environmental sensor. Modified software so that the display does not allow the Copier function during fax communication. Note: With previous versions, the machine prohibiting the coordance with specification, but the display allow the number of copies. Modified software so that the operator can print from the learing a Jam 0 at this tray. (Previously, it was new the programmed in Forward Job. (Deletion causes this incorrectly). Reduce/Enlarge default changed from Custom to the following setting has been applied for the Chiralote: This is effective when the country code is setting range: 0-2	lity data from the w the operator to acces ted Copier operations in wed the operator to input om the Bypass Tray afte ecessary to re-feed from deleted if it is currently a feature to operate Original. ha model.	n it er	6.12	
	- Default: 2 Regular upgrade: Improved management of energy saver function.				

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Reissued: 14-Apr-06

Model: Model C-C1	Date: 24-Jan-05	No.: RB173002d
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RTB Reissue

The items in **bold italics** have been added.

Subject: Machine Firmware History			Prepared by: T. Shintani		
From: 1st Tech. Support Sec. Service Support Dept.					
Classification:	Troubleshooting	☐ Part informat	tion	□ Action required	
	☐ Mechanical	☐ Electrical		☐ Service manual revision	
	☐ Paper path	☐ Transmit/rec	eive	☐ Retrofit information	
	Other ()				

The following is the machine firmware history for the Model C-C1 (B173 model).

Part Number	Version	Production
B173617	6.17	February '06 production
B173615	6.15	February '05 production
B173614	6.14	October '04 production
B173613	6.13	July '04 production
B173612	6.12	May '04 production
B173609	6.09	First mass production

Note: The above firmware is being used for USA, Europe, Asia and China models.

Symptom Corrected, Other Changes	Version
 "Receiving" is displayed when the operator sends a fax. Conditions: The fax is sent using an external phone connected to the MFP. The MFP is turned ON, a copy is made, and then the fax is sent. The LCD language changes to English after the Shading Test is done and the technician returns to UP Mode (even if the language before the Shading Test was not English). After a Memory Clear is done, only the number of copies, reduction/enlargement, darkness and original type settings return to default. (Other settings do not return to default). When the paper in the machine runs out, garbled characters are displayed or the "PC print pending" message is not displayed. 	6.17
Modified to reduce the beep sound level during receiving a fax.	6.15



ical **B**ulletin PAGE: 2/2

Model: Model C-C1 Date: 24-Jan-05 No.: RB173002d

Model. Model C-C1 Date. 24-Jan-05) NO.	. RB1730020
Symptom Corrected, Other Changes		Version
1. "LUI Select" setting was added: Tech Mode >> Data Setup >> LUI	7 01 01 01	
Reason: The NCU (LIU) was changed so that the EU model can be South Africa (new regulations). This setting tells the machine if the old one or the new one.	used in	
When you install this firmware, make sure the setting is correct: - New NCU (B1739677): Select "EU&SA LIU" - Old NCU (B1739515): Select: "EU LIU"		6.14
Note: For details, see MB B173004 and RTB B173003. 2. The On/Off display for the Message Confirmation Report is wrong was a second content.	when the	
report is selected from the RCP (Remote Control Panel).		
Other changes:		
 DTMF levels for Russia changed to meet local regulations. Optimized the transfer voltage and fusing temperature for "Colored ensure good drum cleaning. 		6.13
3. Optimized the timing for the "Toner Low" and "Toner Empty" condit	tions	
(threshold for toner dot counter was changed). Symptoms corrected:		
Cannot use the Menu key once the number of pages is programme job.	ed for the	
2. The operator was able to set the "End Time" for Forward Job to an value than the "Start Time".	earlier	
"Warming up" remains displayed after the machine is woken up by set for plain paper feed from the Bypass Tray. (Printing is normal).	a print job	
Other changes:		
Optimized the Toner Low/Empty timing by adjusting the threshold f toner dot counter based on the temperature/humidity data from the environmental sensor.		
Modified software so that the display does not allow the operator to the Copier function during fax communication.	access	
Note: With previous versions, the machine prohibited Copier opera accordance with specification, but the display allowed the operator the number of copies.		6.12
 Modified software so that the operator can print from the Bypass Tr clearing a Jam 0 at this tray. (Previously, it was necessary to re-fee 		
 paper tray). 4. Modified software so that a Speed Dial cannot be deleted if it is cur programmed in Forward Job. (Deletion causes this feature to operation). 		
 incorrectly). 5. Reduce/Enlarge default changed from Custom to Original. 6. The following setting has been applied for the China model. Note: This is effective when the country code is set to China. Redial count: 		
- Setting range: 0-2		
- Default: 2		
Regular upgrade: Improved management of energy saver function.		6.09

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Technical Bulletin

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Reissued: 25-Jun-07

Model: Model C-C1	Date: 24-Jan-05	No.: RB173002e
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RTB Reissue

The items in *bold italics* have been added.

Subject: Machine Firmware History			Prepare	d by: T. Shintani	
From: 1st Tech. Support Sec. Service Support Dept.					
Classification:	☐ Troubleshooting	☐ Part information	tion		
	☐ Mechanical	Electrical		☐ Service manual revision	
	☐ Paper path	☐ Transmit/rec	eive	☐ Retrofit information	
	☐ Other ()				

The following is the machine firmware history for the Model C-C1 (B173 model).

Part Number	Version	Production
B173618	6.18	April '07 production
B173617	6.17	February '06 production
B173615	6.15	February '05 production
B173614	6.14	October '04 production
B173613	6.13	July '04 production
B173612	6.12	May '04 production
B173609	6.09	First mass production

Note: The above firmware is being used for USA, Europe, Asia and China models.

	Version	
Sy	mptom corrected:	
1.	The families of the column to	6.18
	Data List when printing out this list from inside User Mode.	
1.	"Receiving" is displayed when the operator sends a FAX.	
	Conditions:	
	- The FAX is sent using an external phone connected to the MFP.	
	- The MFP is turned ON, a copy is made, and then the FAX is sent.	
2.	The LCD language changes to English after the Shading Test is done and	
	the technician returns to UP Mode (even if the language before the Shading	6.17
	Test was not English).	0.17
3.	After a Memory Clear is done, only the number of copies,	
	reduction/enlargement, darkness and original type settings return to default.	
	(Other settings do not return to default).	
4.	When the paper in the machine runs out, garbled characters are displayed or	
	the "PC print pending" message is not displayed.	
Мо	dified to reduce the beep sound level during receiving a fax.	6.15

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Reissued: 25-Jun-07

Model: Model C-C1	Date: 24-Jan-05	No.: RB173002e
Symptom Corrected, Other (Changes	Version
1. "LUI Select" setting was added: Tech Mode >> I	Data Setup >> LUI Select	
Reason: The NCU (LIU) was changed so that the South Africa (new regulations). This setting tells old one or the new one. When you install this firmware, make sure the second of the New NCU (B1739677): Select "EU&SA LIU"	the machine if the NCU is	
- Old NCU (B1739515): Select: "EU LIU" Note: For details, see MB B173004 and RTB B1	73003.	
The On/Off display for the Message Confirmation report is selected from the RCP (Remote Control of the North		ne
 Other changes: DTMF levels for Russia changed to meet local in the control of the control of the control of the change of the chan	erature for "Colored" pape	er to 6.13
 Symptoms corrected: Cannot use the Menu key once the number of p job. The operator was able to set the "End Time" for value than the "Start Time". "Warming up" remains displayed after the mach set for plain paper feed from the Bypass Tray. (In the context of the set of the context of the set of the	Forward Job to an earlier ine is woken up by a print	
 Other changes: Optimized the Toner Low/Empty timing by adjust toner dot counter based on the temperature/humenvironmental sensor. Modified software so that the display does not at the Copier function during fax communication. Note: With previous versions, the machine prohaccordance with specification, but the display althe number of copies. Modified software so that the operator can print clearing a Jam 0 at this tray. (Previously, it was paper tray). Modified software so that a Speed Dial cannot be programmed in Forward Job. (Deletion causes to incorrectly). Reduce/Enlarge default changed from Custom to Note: This is effective when the country code is Redial count: Setting range: 0-2 Patents 0 Patents 0	midity data from the allow the operator to accessibited Copier operations in lowed the operator to input from the Bypass Tray after necessary to re-feed from the deleted if it is currently this feature to operate to Original.	n 6.12 ut
- Default: 2 Regular upgrade: Improved management of energy	saver function.	6.09

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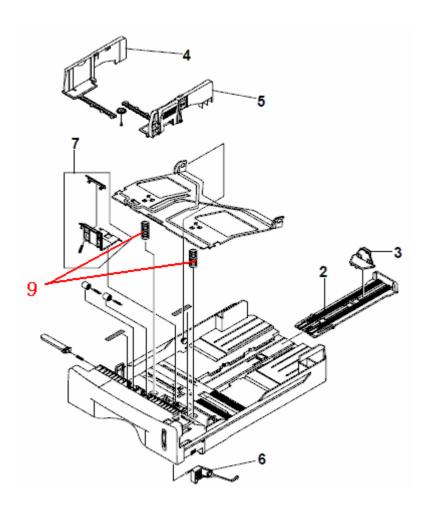
Technical Bulletin

PA	G	E:	1	/1
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Model: Model C-C1			Dat	e: 12-Jun-	09	No.: RB173004
Subject: Spring Cassette (Cassette Assembly)				Prepared by: Y. Gaman		
From: 1st Tech. Support Sec. Service Support Dept.						
Classification:	Troubleshooting	⊠ Part info	orma	tion		required
	☐ Mechanical	☐ Electric	al		☐ Service	e manual revision
	☐ Paper path	☐ Transm	it/rec	eive	Retrof	fit information
	☐ Product Safety	Other ()	☐ Tier 2	

Change: This part was added.
Reason: Requests from the field.

NEW Part	Description	Q'ty	Int	Page	Index	Note
G9601016	SPRING - CASSETTE	2	-	15	9	



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Model: Model C-C1

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Date: 02-Jul-09		No.: RB173005
	Prepared by: Y. 0	Gaman

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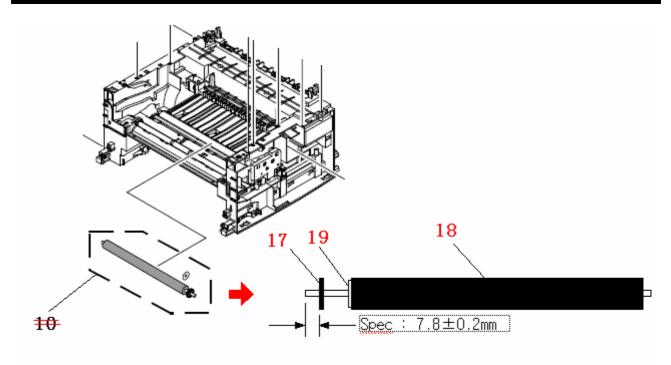
Subject: Transfer Roller (MAIN ASSEMBLY)			Prepared by: Y. Gaman		
From: 1st Tech.	Support Sec. Service Support I	Dept.			
Classification:	☐ Troubleshooting	□ Part information	tion	Action required	
		☐ Electrical		☐ Service manual revision	
	☐ Paper path	☐ Transmit/rec	eive	☐ Retrofit information	
	☐ Product Safety	Other ()	☐ Tier 2	

Change: P/N B1739513 was divided into three separate parts.

Reason: The parts vendor stopped supplying P/N B1739513 as an assembly.

< B173>

Old Part Number	New Part Number	Description	Q'ty	Int	Page	Index	Note
	B1739801	GEAR - TRANSFER	1			10→17	
B1739513	B1739802	ROLLER - TRANSFER	1	O/O	3	10→18	
	B1739803	SPACER - TRANSFER	1			10→19	



K	JH

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Model: C-C1			Dat	e: 20-May-10	No.: RB173006	
Subject: New service part is added.				Prepared by: K. Nakano		
From: 2nd Overseas Tech Support Sec. 2nd PQM Dept						
Classification:	Troubleshooting	⊠ Part inf	orma	tion	n required	
	☐ Mechanical	☐ Electrical		☐ Servi	ce manual revision	
	☐ Paper path ☐ Transmit/re		☐ Transmit/receive ☐ Ret		fit information	
	☐ Other ()			☐ Tier2		

Change:

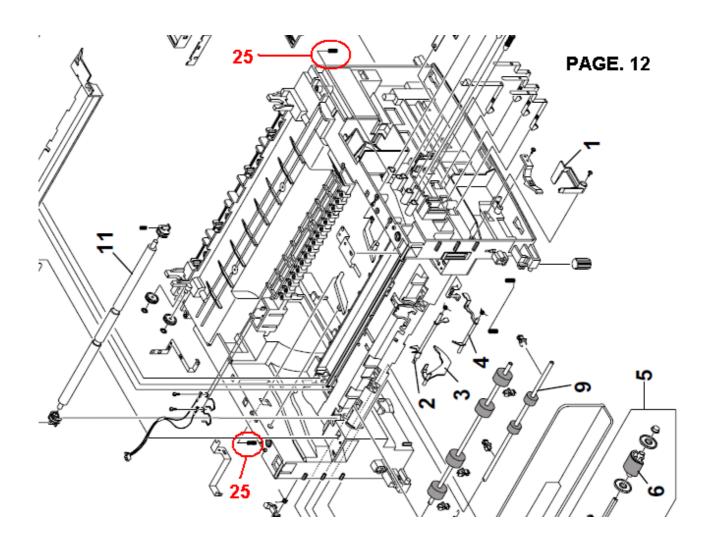
New service part is added.

Reason:

Request from the field.

<H914/H915>

New Part #	Description	Q'ty	Int.	Page	Index	Note
G1861203	SPRING - GUIDE	2	1	13	25	



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Model: C-C1			Dat	e: 23-Jun-10	No.: RB173007	
Subject: New service parts are added				Prepared by: K. Nakano		
From: 2nd Overs	eas Tech Support Sec. 2nd Po	QM Dept				
Classification:	Troubleshooting	⊠ Part info	ormat	tion	on required	
	☐ Mechanical	☐ Electric	al	☐ Serv	ice manual revision	
	☐ Paper path	☐ Transm	it/rec	eive	ofit information	
	Other ()			☐ Tier2	2	

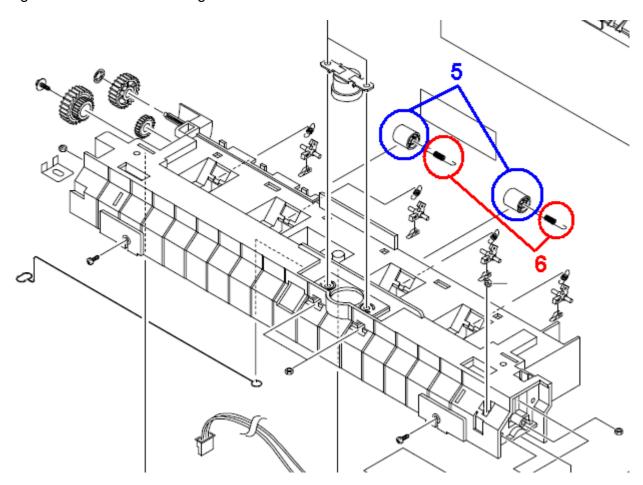
Change: Two service parts are newly added.

Reason:

Request from the field.

Part Number	Description	Q'ty	Page	Index	Note
B1739805	ROLLER EXIT	2	14	5	
B1739806	SPRING FUSER EXIT	2	14	6	

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Model: C-C1			Date: 24-Aug-10		-10	No.: RB173008	
Subject: Parts Catalog Correction				Prepared by: K. Nakano			
From: 2nd Overseas Tech Support Sec. 2nd PQM Dept							
Classification:	☐ Troubleshooting	□ Part informa		tion	Action	required	
	☐ Mechanical	☐ Electrical		☐ Servic		ce manual revision	
	☐ Paper path	☐ Transmit/red		smit/receive ☐ Re		rofit information	
	Other ()				☐ Tier2		

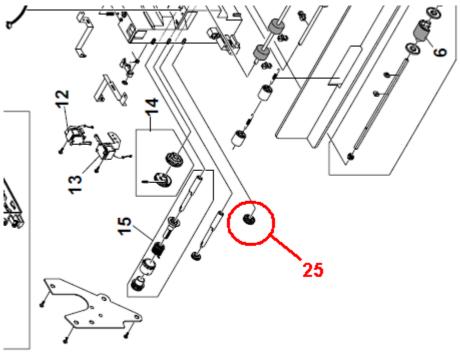
Change: The following part is added.

Reason:

Request from the field.

New Part #	Description	Q'ty	Page	Index	Note
G9601101	IDEAL GEAR MA ASS'Y (RoHs)	1	13	25	

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B173C907.WMF

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Model: C-C1			Date: 15-Mar-11		No.: RB173009	
Subject: Parts Catalog Correction				Prepared by: K. Nakano		
From: 2nd Overseas Tech Support Sec. 2nd PQM Dept						
Classification:	Troubleshooting	□ Part informa		tion	Action	required
!	☐ Mechanical	☐ Electrical			Service manual revision	
!	☐ Paper path	☐ Transmit/receive		eive	Retrof	it information
	Other ()				Tier2	

Change:
The following part is added.

Reason:

Request from the field.

New Part #	Description	Q'ty	Page	Index	Note
G9601107	Feed Roller	1	13	26	

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