

Pro C5100/C5110 series

Operating Instructions

Troubleshooting: TCRU/ORU

TABLE OF CONTENTS

Introduction	4
How to Read This Manual	
Symbols	
Disclaimer	5
Notes	5
1. Before You Begin	
About This Manual	7
Guide to Components	8
About the Display for Options	9
Before you change a setting	10
About Printing Surfaces	11
2. Troubleshooting Service Call Problems (SC Codes)	
What Are SC Codes?	13
If an SC code appears:	13
SC Code List	14
3. Troubleshooting Image Quality Problems	
Color Toner Spotting/Staining	17
Colored Spots	17
Colored Streaks (1)	19
Colored Streaks (2)	20
Colored Streaks (3)	21
Black Streaks	22
Two 13-mm Long Vertical Streaks	23
Two 24-mm Wide Streaks	24
Stained Paper Edges	26
Stained Background	26
Ghosting	28
Scratched Images and Stained Paper Edges	29
Toner Scatter	30
Toner Scatter (1)	30
Toner Scatter (2)	31
Toner Scatter (3)	33
Color Loss	3.5

Colorless Spots	35
White Dots/Lines	35
Vertical White Streaks	37
White Spots	37
Blister-like White Spots	39
Mottling	39
Density Problems	42
Uneven Image Density	42
Uneven Density from Top to Bottom	45
Fainter Leading Edge	46
Fainter Trailing Edge	48
Periodic Density Fluctuation	49
Color (1): Black Faint During Full Color Printing	50
Color (2): Entire Image Faint	52
Color (3): Faded Vertical Streaks During Full Color Printing	54
Color Is Too Dense	55
Broken Thin Lines	56
Blurred Images	58
Dropouts (Character Voids)	59
Gloss Problems	61
Glossy Lines	61
Vertical Glossy Lines	62
Insufficient Gloss	63
Fusing Problems	64
Insufficient Toner Fusing	64
4. Troubleshooting Paper Delivery Problems	
Frequent Paper Misfeeds	67
Messages Reporting Paper Misfeeds	69
If (J099) Appears	69
Paper Skew	70
Double Feeding	71
Paper Misfeeding	73
Paper Feed Problems Affecting Image Quality	75

The Image Is Positioned Incorrectly	75
Image Scaling Error on the Side 2 of Paper	76
Paper Edges Are Soiled (1)	77
Paper Edges Are Soiled (2)	77
Paper Edges Are Soiled (3)	79
Scratches, Streaks, or Vertical Creases Appear on the Image	80
The Leading/Trailing Edge Margin Is Long	81
Curling	82
Cleaning the Paper Feed Path	84
Cleaning the Paper Feed Path in the Wide LCT	84
Cleaning the Paper Feed Rollers and Paper Feed Belt in the Interposer	85
5. Post-Processing Option Troubleshooting	
Finisher SR4090/SR4100/SR4110	
Delivered Sheets Are Not Stacked Properly	87
Multi-Folding Unit	88
Inaccurate Folding (Folding Deviation)	88
Folding Deviation	89
Folds soiled by multi-sheet folding	93
Edges of letter fold bent	95
Folded Sheets Are Not Stacked Properly	97
6. Improving Throughput	
Reducing the Waiting Time Prior to Printing	
Improving Throughput When Printing on Paper with a Thickness Equivalent to Paper Weight 6 o	r 7100
Improving Throughput when Printing Black-and-White Jobs and Full-Color Jobs	102

Introduction

This manual contains detailed instructions and notes on the operation and use of this machine. For your safety and benefit, read this manual carefully before using the machine. Keep this manual in a handy place for quick reference.

How to Read This Manual

Symbols

This manual uses the following symbols:

Indicates points to pay attention to when using the machine, and explanations of likely causes of paper misfeeds, damage to originals, or loss of data. Be sure to read these explanations.

UNote

Indicates supplementary explanations of the machine's functions, and instructions on resolving user errors.

Reference

This symbol is located at the end of sections. It indicates where you can find further relevant information.

[]

Indicates the names of keys on the machine's display or control panels.

Disclaimer

Contents of this manual are subject to change without prior notice.

In no event will the company be liable for direct, indirect, special, incidental, or consequential damages as a result of handling or operating the machine.

Notes

The manufacturer shall not be responsible for any damage or expense that might result from the use of parts other than genuine parts from the manufacturer with your office products.

For good output quality, the manufacturer recommends that you use genuine toner from the manufacturer.

Some illustrations in this manual might be slightly different from the machine.

Certain options might not be available in some countries. For details, please contact your local dealer.

Depending on which country you are in, certain units may be optional. For details, please contact your local dealer.

Two kinds of size notation are employed in this manual. With this machine refer to the inch version.

1. Before You Begin

About This Manual

If the machine will not print, does not print as expected, or exhibits any other problem, find the problem in this manual and troubleshoot accordingly.

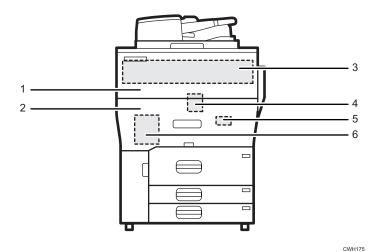
ACAUTION

- Before you replace any unit:
 - To prevent electrical shock, turn off the color controller on the machine control panel, switch off the operation power switch then the main power switch, and then disconnect the machine from the power supply.
 - Allow the machine to cool for at least 30 minutes before replacing a part.

Guide to Components

WARNING

- Do not remove any covers or screws other than those explicitly mentioned in this manual. Inside
 this machine are high voltage components that are an electric shock hazard and laser
 components that could cause blindness. Contact your sales or service representative if any of the
 machine's internal components require maintenance, adjustment, or repair.
- Do not attempt to disassemble or modify this machine. Doing so risks burns and electric shock. Note again that exposure to the laser components inside this machine risks blindness.



- 1. Toner Unit
- 2. Drawer
- 3. Photoconductor Unit
- 4. Cleaning Unit for Intermediate Transfer Belt
- 5. Transfer Unit
- 6. Fusing Unit

About the Display for Options

This machine displays all of the adjustment items in the Adjustment Settings for Skilled Operators menu and advanced settings for custom paper regardless of whether or not the items are for options. Note that any modifications to the option settings do not take effect unless the applicable options are installed on this machine.



 For details about the options available for this machine, see "Guide to Functions of the Machine's Options", Getting Started.

Before you change a setting

- If the problem persists despite the setting being changed, restore the value you made a note of.
- Operating the machine with the changed setting may cause problems such as reduced print quality.
- If the problem persists even though the setting has been changed, restore the value noted.
 Operating the machine with the changed setting may cause problems, such as inferior printed images.

.

About Printing Surfaces

Side 1 is the surface of the paper printed during one-sided printing, or the surface of the first print during duplex printing.

Side 2 is the surface of the paper printed after side 1 has been printed during duplex printing.

2. Troubleshooting Service Call Problems (SC Codes)

What Are SC Codes?

If an error occurs during operation, the machine displays an SC code ("SCnnn", where "nnn" is a three-digit number). The machine stops and cannot be used when an SC code is displayed.

If an SC code appears:

- 1. Write down the SC number.
- 2. Turn off the main power switch.
- Wait a few moments, then turn the machine on again.In most cases, cycling the machine off and on will restore it to full operation.
- If the SC code reappears, check it against the SC code table. For details, see page 14
 "SC Code List".

Check for the SC code in the table.

If the SC code is listed in the table, carry out the recommended procedure.

If the SC code is not listed in the table, contact your service representative.

SC Code List

This table contains a list of selected SC codes. If the SC code that is displayed on the control panel is listed in this table, carry out the recommended procedure. If the SC Code is not listed in this table, contact your service representative.



• If the error persists after replacing the unit, contact your service representative.

Code	Error	Procedure
332-01	Toner supply motor error (K): Bottle	Take out and reinsert the toner (black) or replace it.
332-02	Toner supply motor error (C): Bottle	Take out and reinsert the toner (cyan) or replace it.
332-03	Toner supply motor error (M): Bottle	Take out and reinsert the toner (magenta) or replace it.
332-04	Toner supply motor error (Y): Bottle	Take out and reinsert the toner (yellow) or replace it.
410-01	Remaining potential: Vr detection error (K)	Replace the photoconductor unit (black).
410-02	Remaining potential: Vr detection error (C)	Replace the photoconductor unit (cyan).
410-03	Remaining potential: Vr detection error (M)	Replace the photoconductor unit (magenta).
410-04	Remaining potential: Vr detection error (Y)	Replace the photoconductor unit (yellow).
411-01	Charge potential: Vd adjustment error (K)	Replace the charge roller unit (black).
411-02	Charge potential: Vd adjustment error (C)	Replace the charge roller unit (cyan).
411-03	Charge potential: Vd adjustment error (M)	Replace the charge roller unit (magenta).
411-04	Charge potential: Vd adjustment error (Y)	Replace the charge roller unit (yellow).
412-01	Exposure potential: Vpl adjustment error (K)	Replace the photoconductor unit (black) and the charge roller unit (black).
412-02	Exposure potential: Vpl adjustment error (C)	Replace the photoconductor unit (cyan) and the charge roller unit (cyan).

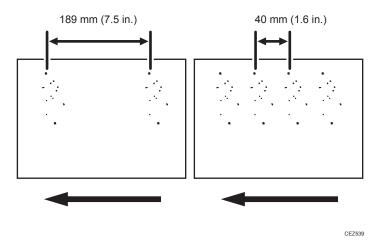
Code	Error	Procedure
412-03	Exposure potential: Vpl adjustment error (M)	Replace the photoconductor unit (magenta) and the charge roller unit (magenta).
412-04	Exposure potential: Vpl adjustment error (Y)	Replace the photoconductor unit (yellow) and the charge roller unit (yellow).

3. Troubleshooting Image Quality Problems

Color Toner Spotting/Staining

Colored Spots

Colored spots appear at 189 mm or 40 mm (7.5 inches or 1.6 inches) intervals.



Cause:

(a) Colored spots appear at 189 mm (7.5 inches) intervals

The drum is scratched or stained.

(b) Colored spots appear at 40 mm (1.6 inches) intervals

The charge roller is scratched or stained.

Solution:

The solution depends on the interval at which the colored spots appear. If they appear every 189 mm (7.5 inches), follow Procedure (a) on the following page; if they appear every 40 mm (1.6 inches), Procedure (b) on the following page.

- To identify the affected color, print three full-page, solid-fill A3 or DLT sheets for each of white and black, and three full-page, halftone A3 or DLT sheets for each of cyan, magenta, and yellow.
- 2. Detach the photoconductor unit of the affected color and check the drum surface. Is the surface scratched?

Yes	Replace the drum.
No	Contact your service representative.

3. If the problem persists, contact your service representative.



• For details about replacing the drum, see Replacement Guide.

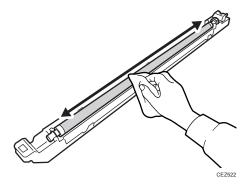
(b) Colored spots at 40 mm (1.6 inches) intervals

- To identify the affected color, print three full-page, solid-fill A3 or DLT sheets for each of white and black, and three full-page, halftone A3 or DLT sheets for each of cyan, magenta, and yellow.
- 2. Detach the charge roller of the affected color and check its surface. Is the surface scratched?

Yes	Replace the charge roller.
No	Wipe the charge roller surface with a well-wrung-out damp cloth, wipe it with a dry rag until no moisture remains, and then reattach the roller.



• Do not use ethanol or any other organic solvent to clean the charge roller. Otherwise it may cause damage to the charge roller.



3. If the problem persists, contact your service representative.

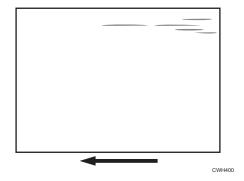




• For details about replacing the charge roller, see Replacement Guide.

Colored Streaks (1)

Colored streaks parallel to the paper feed direction appear.



Cause:

- The charge roller is stained.
- The cleaning unit for PCU has worn out.
- The drum surface is scratched.

Solution:

- To identify the affected color, print three full-page, solid-fill A3 or DLT sheets for each of white and black, and three full-page, halftone A3 or DLT sheets for each of cyan, magenta, and yellow.
- 2. Detach the charge roller of the affected color and check its surface. Is the surface stained?

Yes	Wipe the charge roller with a dry rag to remove the stain. If the stain cannot be removed, replace the charge roller. Go to the next step.
No	Go to the next step.

3. Detach the photoconductor unit of the affected color and check the drum surface. Is the surface stained or scratched?

Stained:	Replace the cleaning unit for PCU.
Scratched:	Replace the drum.

Neither:	Contact your service representative.
----------	--------------------------------------

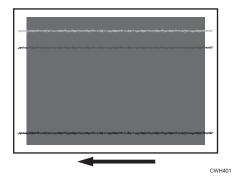
4. If the problem persists even if you replace the cleaning unit for PCU or drum, contact your service representative.



 For details about replacing the charge roller, cleaning unit for PCU and drum, see Replacement Guide.

Colored Streaks (2)

Extended, blurred colored streaks parallel to the paper feed direction appear. The streaks also appear randomly in the margins.



Cause:

If the temperature or humidity is low, remaining toner might be missed by the cleaning blade of the cleaning unit for intermediate transfer belt or transfer unit, causing streaks to appear sporadically.

Solution:

- 1. To identify the affected color, print three full-page, solid-fill A3 or DLT sheets for each of cyan, yellow, magenta, and black.
- 2. Is the printed side affected by the problem?

Yes	Proceed to Step 4.
No	Replace the transfer unit.

3. Print the image. Is the problem resolved?

Yes	Finished!
-----	-----------

No Go to the next step.

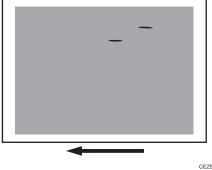
- 4. Replace the cleaning unit for intermediate transfer belt.
- 5. If the problem persists even if you replace the cleaning unit for intermediate transfer belt, contact your service representative.



• For details about replacing the transfer unit and cleaning unit for intermediate transfer belt, see Replacement Guide.

Colored Streaks (3)

Colored streaks appear in solid-filled areas.



CEZ542

Cause:

If the toner contains small clumps, they disintegrate in the development unit, producing colored streaks.

This problem may occur if the machine is left unattended for a long period or the toner bottle is kept out of its moisture-proof bag for a long period.

Solution:

- 1. To identify the affected color, print three full-page, solid-fill A3 or DLT sheets for each of cyan, yellow, magenta, and black. The color affected by the colored streaks is the cause of the problem.
- 2. Print 200 full-page, solid-fill A3 or DLT sheets in the affected color.
- 3. Print the image. Is the problem resolved?

Yes	Finished!	

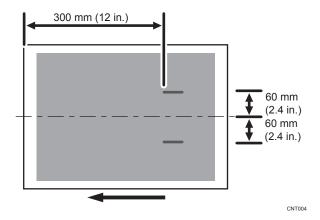
No

Replace the toner bottle for the affected color.

- 4. Print 200 full-page, solid-fill A3 or DLT sheets in the affected color.
- 5. If the problem persists, contact your service representative.

Black Streaks

Short black streaks appear on a black halftone image.



Cause:

A sheet is bent at the entrance to the fusing unit and comes into contact with the edge of the paper delivery tank, where static electricity builds up on the sheet through friction. This causes scattering of unfixed toner on the paper surface.

This may occur if:

- Printing is done at low temperature or humidity
- The thickness of the paper is equivalent to Paper Weight 2 or lower
- A black halftone image is printed



To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.

Solution:

 In [Advanced Settings] for the custom paper in use, select [Fusing Feed Speed Adjustment].

2. Check the present value. Is it higher than +1.5%?

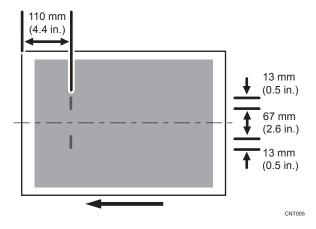
Yes	No further improvement is likely. Contact your service representative.
No	Increase the value by 0.5 percentage points.

3. Print the image. Is the problem resolved?

Yes	Finished!
No	Repeat Steps 1 to 3. If the problem persists even though you have increased the value to +1.5%, contact your service representative.

Two 13-mm Long Vertical Streaks

Two 13-mm long vertical streaks appear within 110 mm (4.4 inches) from the leading edge.



Cause:

The invert exit idle rollers in the drawer are soiled.

This may occur if:

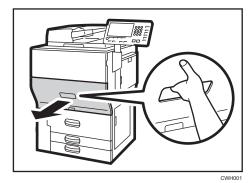
- Sheets are delivered face down after one-sided printing
- · Images are printed on a white or halftone yellow background

Solution:

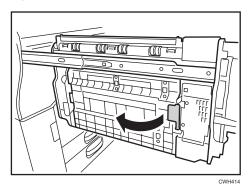
Clean the invert exit idle rollers in the drawer.

1. Make sure that the system is turned off and the machine power cord is disconnected from the power source.

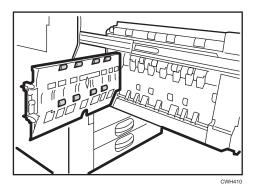
2. Pull the drawer.



3. Open the cover.



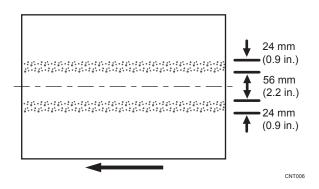
4. Turn the invert exit idle rollers to clean them using a slightly damp cloth.



5. After cleaning, restore the machine so that it resumes operation.

Two 24-mm Wide Streaks

Two 24-mm wide streaks parallel to the paper feed direction appear.



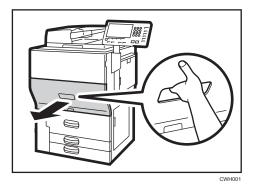
Cause:

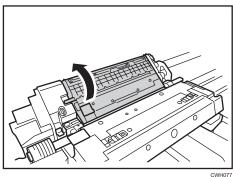
The exit drive rollers, exit idle rollers, exit relay drive rollers, or exit relay idle rollers in the drawer are soiled

Solution:

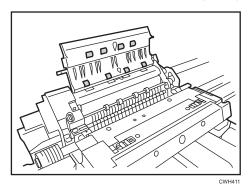
Clean the exit drive rollers, exit idle rollers, exit relay drive rollers, and exit relay idle rollers in the drawer.

- 1. Make sure that the system is turned off and the machine power cord is disconnected from the power source.
- 2. Pull the drawer.





4. Turn the rollers to clean them using a slightly damp cloth.



5. After cleaning, restore the machine so that it resumes operation.

Stained Paper Edges

Solution:

 If the paper edges are stained, carry out the procedure in page 64 "Insufficient Toner Fusing".

Stained Background

Random "powdered" dots appear, creating a dirty background.

The background may be partially or completely stained.

Completely stained background

The quick brown fox jumps over the lazy dog.

El veloz murciélago hindú comía feliz cardillo y kiwi.

Büvez de ce whisky que le patron juge fameux.

The quick brown fox jumps over the lazy dog.

El veloz murciélago hindú comía feliz cardillo y kiwi.

Partially stained background

The quick brown fox jumps over the lazy dog.

El veloz murciélago hindú comía feliz cardillo y kiwi.

Buvez de ce whisky que le patron juge fameux.

The quick brown fox jumps over the lazy dog.

El veloz murciélago hindú comía feliz cardillo y kiwi.

Cause:

This may occur because of wearing of the developer and drum unit or staining of the charge roller.

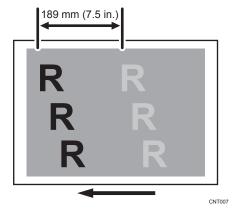
Solution:

- 1. If a message prompting replacement of a unit has appeared, replace the unit.
- 2. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute].
- 3. Print the image. Is the problem resolved?

Yes	Finished!
No	In the [Machine: Maintenance] group on the [Adjustment Settings for Skilled Operators] menu, execute [Execute Process Initial Setting].

4. If the problem persists, contact your service representative.

A ghost image of an image to be printed appears at a distance of 189 mm (7.5 inches) to the side of the intended image.



Cause:

The image transfer current is transmitted to the drum, where a potential difference occurs between a developed area and non-developed area and causes the intended image to be reproduced.

This may occur if:

- Solid filled images or bold characters are printed in black on a halftone background
- Printing is done at low temperature or humidity
- Many screening lines are used

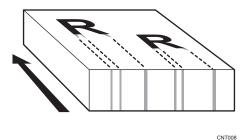
Solution:

- In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators]
 menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment:
 Manual Execute].
- 2. Print the image. Is the problem resolved?

Yes	Finished!	
No	Contact your service representative.	

Scratched Images and Stained Paper Edges

Scratched images or soiled paper edges appear.



Cause:

When a relatively stiff, thick paper is delivered, the entrance guide plate for the transfer unit is warped toward the intermediate transfer belt due to the stiffness of the paper. The edge of the entrance guide plate comes into contact with the toner on the belt to cause images to be scratched and paper edges to be soiled.

This may occur if:

- Paper with a thickness equivalent to Paper Weight 7 is used
- Paper with its grain parallel to the paper feed direction is used. For example, A3/DLT long grain
 paper is delivered, A4/LT short grain paper is delivered from its long edge, or A4/LT long grain
 paper is delivered from its short edge.
- Paper is stored at low temperature or humidity

Solution:

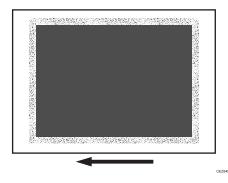
Change the direction of paper grain for paper delivery.



When storing paper at low humidity, wrap the paper in coated paper or a plastic sheet.

Toner Scatter

Toner is scattered around a solid-fill print.



Cause:

This may occur if printed at low temperature or humidity.



To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.

Solution:

- Check both sides of the paper for the problem. If this problem appears only on the side 2
 of the paper, skip to Step 3.
- 2. Adjust the setting for the side 1 of the paper. Configure the following settings in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

Increase the absolute value of the negative current by 5% in [Paper Transfer Current: B&W: Side 1].

Example: If the present current is $-40 \, \text{VA}$, change it to $-42 \, \text{VA}$.

<Printing in full color>

Increase the absolute value of the negative current by 5% in [Paper Transfer Current: FC: Side 1].

Example: If the present current is -70~PA, change it to -73~PA.

.3

3. Adjust the setting for the side 2 of the paper. Configure the following settings in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

Increase the scaling factor by 5 percentage points in [Paper Transfer Current: B&W: Side 2]. Example: If the present value is 100%, change it to 105%.

<Printing in full color>

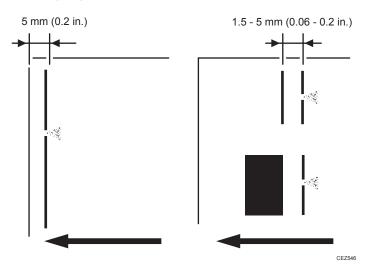
Increase the scaling factor by 5 percentage points in [Paper Transfer Current: FC: Side 2]. Example: If the present value is 100%, change it to 105%.

4. Print the image. Is the problem resolved?

Yes	Finished!
No	Repeat Steps 1 to 4. If the problem persists, contact your service representative.

Toner Scatter (2)

Parts of a line exhibit splatter. This may occur in a line that is 5 mm (0.2 inches) or less from the leading edge, or in a line that is 1.5 to 5 mm (0.06 to 0.2 inches) from an image on the side of the image facing the trailing edge.



Cause:

This may occur when printing lines on coated or other slippery paper.



To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.

Solution:

The solution depends on the area in which the line splatter occurs. If the splatter occurs 5 mm (0.2 inches) or less from the leading edge, follow Procedure (a) on the following page; otherwise, follow Procedure (b) on the following page.

a) Line splatter that is 5 mm (0.2 inches) or less from the leading edge

Increase the leading edge margin to more than 5 mm (0.2 inches) using one of the following procedures:

- 1. Adjusting the shift image
 - In [Advanced Settings] for the custom paper in use, specify [Adj Image Position of Side 1 With Feed] for the side 1 of the paper and [Adj Image Position of Side 2 With Feed] for the side 2.
- Adjusting the mask width at the leading edge
 In [Advanced Settings] for the custom paper in use, specify [Adjust Erase Margin of Leading Edge].
- Adjusting the file's leading edge margin
 Increase the leading edge margin in the print settings for the image to be printed.

For details about adjusting the shift image and adjusting the mask width at the leading edge, see "Adjustment Item Menu Guide".

If you cannot increase the leading edge margin to more than 5 mm (0.2 inches), contact your service representative.

b) Line splatter that is in an area more than 5 mm (0.2 inches) from the leading edge

1. Configure the following settings in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

Increase the absolute value of the current by 10 PA in [Image Transfer Current: B&W].

<Printing in full color>

Increase the absolute value of the current by 10 µA in [Image Transfer Current: FC: Black].

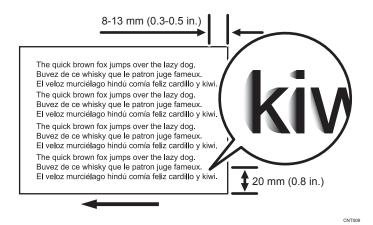
2. Print the image. Is the problem resolved?

Yes	Finished!
No	Increase the value by 10 PA.

3. Repeat Step 2. If the problem persists even though you have set the current to 70 µA (maximum), contact your service representative.

Toner Scatter (3)

Parts of a line or character exhibit splatter. This may occur in a line or character that is 8 to 13 mm (0.3 to 0.5 inches) from the trailing edge and 20 mm (0.8 inches) or less from the left edge facing the paper feed direction.



Cause:

A shock jitter occurs when the trailing edge of the paper leaves the paper guide during paper transfer and causes toner scattering.

This may occur if paper with a thickness equivalent to Paper Weight 4 or higher is used.



- To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
 about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.
- Changing the transfer current may produce either or both of the following side effects:
 - Reduction in toner yields
 - Occurrence of banding (streaks)

Solution:

<Printing in full color>

 In [Advanced Settings] for the custom paper in use, select [Image Transfer Current: FC: Black].

2. Check the present value. Is it lower than 50 PA?

Yes	Carry out all of the following:
	(1) Increase the value by 5 µA in [Image Transfer Current: FC: Black].
	(2) Set [Paper Transfer Current; Trail Edge: FC] to "200%".
	(3) Set [Ppr Transfer Current Trail Edg Dist: FC] to "30 mm".
No	No further improvement is likely. Contact your service representative.

3. Print the image. Is the problem resolved?

Yes	Finished!
No	Repeat Steps 1 to 3. If the problem persists even though you have increased the value to 50 PA, contact your service representative.

<Printing in black and white>

1. In [Advanced Settings] for the custom paper in use, select [Image Transfer Current: B&W].

2. Check the present value. Is it lower than 50 PA?

Yes	Carry out all of the following:
	(1) Increase the value by 5 PA in [Image Transfer Current: B&W].
	(2) Set [Paper Transfer Current; Trail Edge: B&W] to "200%".
	(3) Set [Ppr Transfer Current Trail Edg Dist: BW] to "30 mm".
No	No further improvement is likely. Contact your service representative.

3. Print the image. Is the problem resolved?

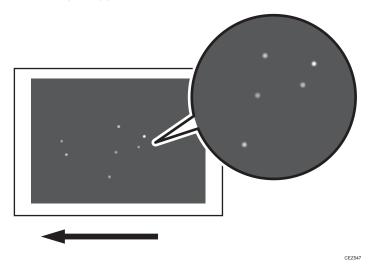
Yes	Finished!
No	Repeat Steps 1 to 3. If the problem persists even though you have increased the value to 50 PA, contact your service representative.

3

Color Loss

Colorless Spots

Colorless spots appear in solid-filled areas.



Cause:

If the toner contains small clots, they fail to be transferred, producing colorless spots.

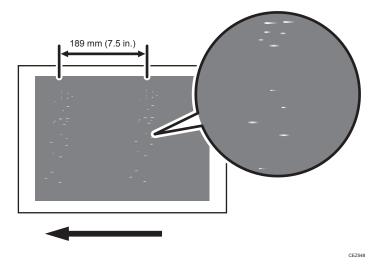
This problem may occur if the machine is left unattended for a long period or the toner bottle is taken out of its moisture-proof bag for a long period of time.

Solution:

If colorless spots appear in full-color printing, carry out the procedure in page 21 "Colored Streaks (3)".

White Dots/Lines

White dots or short lines appear, spaced at intervals of 189 mm (7.5 inches) in the direction of the paper feed.



Cause:

The photoconductor unit is stained.

Solution:

- 1. To identify the affected color, print three full-page, solid-fill A3 or DLT sheets for each of cyan, magenta, black, and green.
 - Because it is difficult to identify white spots on yellow, green is used instead of yellow.
- 2. Detach the photoconductor unit of the affected color and check the drum surface. Is the surface stained?

Yes	Wipe the drum surface with a clean dry cloth to remove the stain and set [Photoconductor Special Mode] to [Special Mode] in the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu.	
No	Replace the drum.	

3. Print the image. Is the problem resolved?

Yes	Finished!	
No	Replace the cleaning unit for PCU and drum.	

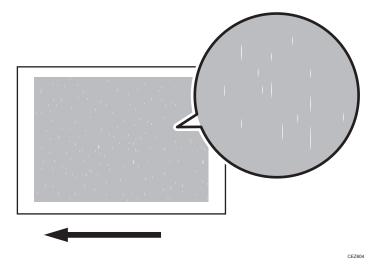
4. If the problem persists, contact your service representative.



• For details about replacing the cleaning unit for PCU and drum, see Replacement Guide.

Vertical White Streaks

White streaks of 1 to 8 mm (0.04 to 0.3 inches) long and perpendicular to the paper feed direction appear.



Cause:

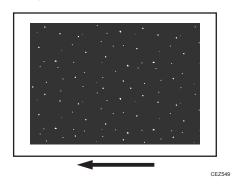
One of the charge rollers is soiled.



• If white streaks appear at 189 or 40 mm (7.5 or 1.6 inches) intervals, carry out the procedure in page 17 "Colored Spots".

White Spots

White spots of 0.2-0.3 mm (0.008-0.01 inches) in diameter appear.



This may occur if printed at low temperature or humidity.



- To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
 about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.
- If you reduce the paper transfer current to eliminate white spots, copies may become too faint.

Solution:

- 1. Check both sides of the paper for the problem. If this problem appears only on the side 2 of the paper, skip to Step 3.
- 2. Adjust the setting for the side 1 of the paper. Configure the following settings in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

Decrease the absolute value of the negative current by 5% in [Paper Transfer Current: B&W: Side 1].

Example: If the present current is -40 µA, change it to -38 µA.

<Printing in full color>

Decrease the absolute value of the negative current by 5% in [Paper Transfer Current: FC: Side 1].

Example: If the present current is -70 µA, change it to -67 µA.

3. Adjust the setting for the side 2 of the paper. Make the following settings in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

Decrease the scaling factor by 5 percentage points in [Paper Transfer Current: B&W: Side 2]. Example: If the present value is 100%, change it to 95%.

<Printing in full color>

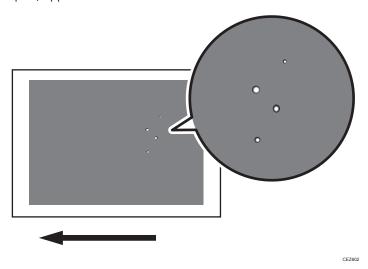
Decrease the scaling factor by 5 percentage points in [Paper Transfer Current: FC: Side 2]. Example: If the present value is 100%, change it to 95%.

4. Print the image. Is the problem resolved?

Yes	Finished!	
No	No Repeat Steps 1 to 4. If the problem persists, contact your service representative.	

Blister-like White Spots

White spots 0.3–0.5 mm (0.01–0.02 inches) in diameter surrounded by denser spots (blister-like white spots) appear.



Cause:

This may occur if a solid image is printed on coated paper, if a solid image is printed during duplex printing, or if printing is done at low temperature.

Solution:

If blister-like white spots appear, carry out the procedure in page 64 "Insufficient Toner Fusing".

Mottling

Mottling occurs in solid-filled areas.

Normal

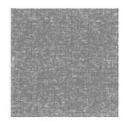






Mottled







3

Cause:

This may occur if:

- Using paper with a rough surface
- · Continuously printing solid fills covering small areas
- Printing in a low humidity environment
- Printing in a high humidity environment



 If the problem occurs only if black is used when printing in full-color mode, carry out the procedure in page 50 "Color (1): Black Faint During Full Color Printing".

Solution:

- To identify the affected color, print three full-page, solid-fill A3 or DLT sheets for each of cyan, yellow, magenta, and black.
- In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators]
 menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment:
 Manual Execute].
- 3. Print the image. Is the problem resolved?

Yes	Finished!	
No	No Print 100 full-page, solid-fill A3 or DLT sheets in the affected color.	

4. Print the image. Is the problem resolved?

Yes	Finished!
No	Reload with new paper.

5. Print the image. Is the problem resolved?

,	Yes	Finished!	
	No	Replace the paper with smoother paper.	

6. If the problem persists, contact your service representative.

Density Problems

Uneven Image Density

The density is uneven.

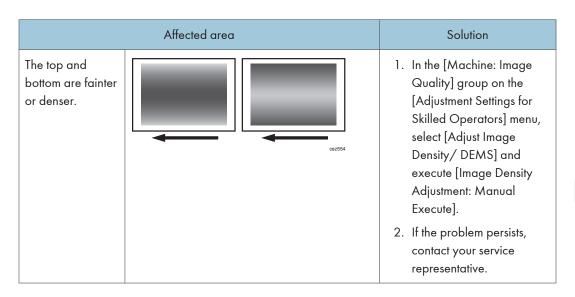
Solution:

The solution depends on the type of unevenness.

Carry out the appropriate procedure from those in the following table:

(A) The density is uneven across the entire image.

	Affected area	Solution
The density from top to bottom is uneven.	cez552	1. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute]. 2. If the problem persists, see page 45 "Uneven Density from Top to Bottom".
The sides are fainter or denser.		1. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute]. 2. If the problem persists, contact your service representative.



(B) The density is uneven in a part of the image.

	Affected area	Solution
The leading edge is fainter.	cez555	 In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute]. If the problem persists, see page 46 "Fainter Leading Edge".

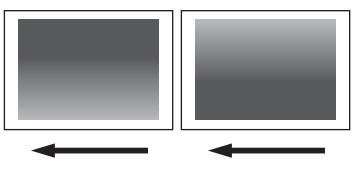
	Affected area	Solution
The trailing edge is fainter.	cez556	1. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute]. 2. If the problem persists, see page 48 "Fainter Trailing Edge".
The center is fainter or denser	C02558	1. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute]. 2. If the problem persists, contact your service representative.
Wavy unevenness	ce2559	1. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute]. 2. If the problem persists, contact your service representative.

(C) The density is uneven across the entire image.

	Affected area	Solution
Periodic vertical density fluctuation	CWH402	 In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute]. If the problem persists, see page 49 "Periodic Density Fluctuation".

Uneven Density from Top to Bottom

The density is uneven from top to bottom.



CEZ56

• You can adjust the density of halftone images, but not that of solid fills.

Cause:

This may occur at high temperature or humidity.

Solution:

- 1. To identify the affected color, print three full-page, halftone A3 or DLT sheets for each of cyan, yellow, magenta, and black.
- 2. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, select [Adjust Density Difference Across Feed Direction].

Decreasing the value for the affected color makes the area above the center denser and that below fainter.

Increasing the value for the affected color makes the area above the center fainter and that below denser.

3. Turn off the power and the main power switch, and then turn the main power switch back on.

The setting specified in step 2 will be in effect.

4. Print the image. Is the problem resolved?

Yes	Finished!
No	Replace the charge roller and photoconductor unit of the affected color.

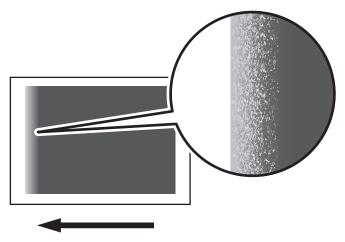
5. If unit replacement does not resolve the problem, contact your service representative.



For details about replacing the charge roller and photoconductor unit, see Replacement Guide.

Fainter Leading Edge

The leading edge is fainter.



CEZ562

Cause:

At low temperature or when using thin coated paper, this may occur if the paper transfer current is insufficient.

At high temperature, this may occur if the paper transfer current is excessive.



This solution only works when the thickness of the paper is equivalent to Paper Weight 4 or higher.
 Do not try this as a solution when using paper with a thickness equivalent to Paper Weight 3 or lower, as it may cause paper misfeeding.



To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.

Solution:

1. Make a note of the present value in the following setting in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

[Paper Transfer Current; Lead Edge: B&W]

<Printing in full color>

[Paper Transfer Current; Lead Edge: FC]

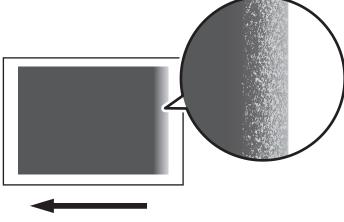
- 2. Increase the scaling factor in the above setting by 10 percentage points.
- 3. Print the image. Is the problem resolved?

Yes	Finished!	
No	No Increase the scaling factor by 10 percentage points.	

- 4. Repeat Step 3. If the problem persists even though you have increased the scaling factor by 50 percentage points, restore the value noted in Step 1 and go to the next step.
- 5. Decrease the scaling factor in the above setting by 10 percentage points.
- 6. Print the image. Is the problem resolved?

Yes	Finished!
No	Decrease the scaling factor by 10 percentage points.

7. Repeat Step 6. If the problem persists even though you have decreased the scaling factor by 50 percentage points, restore the value noted in Step 1 and contact your service representative. The trailing edge is fainter.



CEZ563

Cause:

This may occur because of insufficient or excessive paper transfer current when using paper weighing approximately 160 g/m^2 (60 lb. Cover) or heavier at low temperature.



• To adjust the following settings, pre-register the type of paper in use as a custom paper. For details about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.

Solution:

- 1. Measure in millimeters how far the fainter area extends from the trailing edge.
- 2. Configure the following settings in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

In [Ppr Transfer Current Trail Edg Dist: BW], enter the value you measured in Step 1 plus an additional 10 mm.

<Printing in full color>

In [Ppr Transfer Current Trail Edg Dist: FC], enter the value you measured in Step 1 plus an additional 10 mm.

Make a note of the present value in the following setting in [Advanced Settings] for the custom paper in use.

<Printing in black and white>

[Paper Transfer Current; Trail Edge: B&W]

<Printing in full color>

[Paper Transfer Current; Trail Edge: FC]

- 4. Increase the scaling factor in the above setting by 5 percentage points.
- 5. Print the image. Is the problem resolved?

Yes	Finished!
No	Increase the scaling factor by 5 percentage points.

- 6. Repeat Step 5. If the problem persists even though you have increased the scaling factor by 50 percentage points, restore the value noted in Step 3 and go to the next step.
- 7. Decrease the scaling factor in the above setting by 5 percentage points.
- 8. Print the image. Is the problem resolved?

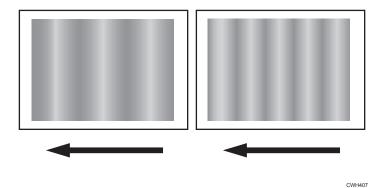
Yes	Finished!
No	Decrease the scaling factor by 5 percentage points.

9. Repeat Step 8. If the problem persists even though you have decreased the scaling factor by 50 percentage points, restore the value noted in Step 3 and contact your service representative.

Periodic Density Fluctuation

The vertical density fluctuates periodically.





Solution:

The solution depends on the interval.

Interval	Solution
Approximately 12-18 mm (0.5-0.7 inches)	Contact your service representative.
Approximately 50 mm (2 inches)	Replace the charge roller. If the problem persists, contact your service representative.
Approximately 60 mm (2.4 inches)	Replace the transfer unit. If the problem persists, contact your service representative.
Approximately 95 mm (3.7 inches)	Contact your service representative.
Approximately 190 mm (7.5 inches)	Replace the photoconductor unit. If the problem persists, contact your service representative.



• For details about replacing the charge roller, transfer unit, and photoconductor unit, see Replacement Guide.

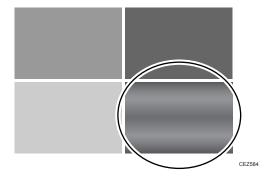
Color (1): Black Faint During Full Color Printing

Black is fainter than normal during full color printing.

Normal



Black is fainter



Cause:

If black is used when printing in full color mode with black toner only, the printing may become faint.



• To adjust the following settings, pre-register the type of paper in use as a custom paper. For details about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.

Solution:

Carry out the following sequence of procedures. Terminate the sequence as soon as the problem is resolved.

Procedure 1: Increasing the image transfer current for black in full color mode

- 1. In [Advanced Settings] for the custom paper in use, select [Image Transfer Current: FC: Black].
- 2. Increase the value by 10 PA.

3. Print the image. Is the problem resolved?

Yes	Finished!
No	Increase the value by 5 PA

4. Repeat Step 3. If doing this adversely affects colors other than black, reduce the value by 5 PA and carry out Procedure 2, "Executing image processing".

Procedure 2: Executing image processing

Do the following on the Command WorkStation (CWS).

- 1. Select "Properties..." for the image.
- 2. Click the "Color" tab.
- 3. In "Color mode", select "Expert Settings...".
- 4. If "CMYK/Grayscale" is set to "Colorwise OFF", change it to an appropriate image process.
- 5. If the problem persists even after an appropriate image process is selected, carry out Procedure 3, "Printing black using four colors (YMCK) in full-color mode".

Procedure 3: Printing black using four colors (YMCK) in full-color mode

Do the following on the Command WorkStation (CWS).

- 1. Select "Properties..." for the image.
- 2. Click the "Color" tab.
- 3. In "Color mode", select "Expert Settings...".
- 4. Click the "Gray & Black processing" tab.
- 5. Set "Black text and graphics:" to "Normal".

Black is printed with 4 colors (YMCK).



- If "Black text and graphics:" is set to "Pure Black On", black is printed with only black toner.
- 6. If the problem persists, contact your service representative.

Color (2): Entire Image Faint

The entire image is fainter than normal.

The quick brown fox jumps over the lazy dog.
Buvez de ce whisky que le patron juge fameux.
El veloz murciélago hindú comía feliz cardillo y kiwi.
The quick brown fox jumps over the lazy dog.
Buvez de ce whisky que le patron juge fameux.
El veloz murciélago hindú comía feliz cardillo y kiwi.
The quick brown fox jumps over the lazy dog.
Buvez de ce whisky que le patron juge fameux.
El veloz murciélago hindú comía feliz cardillo y kiwi.
The quick brown fox jumps over the lazy dog.
Buvez de ce whisky que le patron juge fameux.
El veloz murciélago hindú comía feliz cardillo y kiwi.

CEZ585

Cause:

This may occur if:

- Continuously printing an image that consumes little toner
- The machine has not been used for a long time
- The machine is located somewhere very humid and has not been used for a while

Solution:

- In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators]
 menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment:
 Manual Execute].
- 2. Print the image. Is the problem resolved?

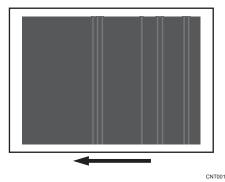
Yes	Finished!
No	Go to the next step.

- 3. Increase the value by 1 for all colors in [Adjust Maximum Image Density].
- Select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute].
- 5. Print the image. Is the problem resolved?

Yes	Finished!
No	Repeat Steps 3 to 5. If the problem persists even if you increase the value to 5, contact your service representative.

Color (3): Faded Vertical Streaks During Full Color Printing

Faded vertical streaks may appear during full color printing.



Cause:

This may occur if:

- Printing is done at low temperature or humidity
- Coated paper or paper that produces high paper-to-paper friction is used
- Printing is done in full color mode



To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.

Solution:

Carry out the following sequence of procedures. Terminate the sequence as soon as the problem is resolved.

Procedure 1: Increasing the paper transfer current in full color mode

- In [Advanced Settings] for the custom paper in use, select [Paper Transfer Current: FC: Side 1]
- 2. Increase the value by 5 PA.
- 3. Print the image. Is the problem resolved?

Yes	Go to the next step.
No	Increase the value by 5 PA

4. Repeat Step 3. If the problem persists, contact your service representative.

Q

5. Is the density uneven?

	Carry out Procedure 2, "Increasing the paper transfer current applied to the side 2 of the paper in full color mode".
No	Finished!

Procedure 2: Increasing the paper transfer current applied to the side 2 of the paper in full color mode

1. Is the side 1 density uneven?

Yes	No further improvement is likely. Contact your service representative.	
No	Go to the next step.	

- 2. In [Advanced Settings] for the custom paper in use, select [Paper Transfer Current: FC: Side 2].
- 3. Increase the scaling factor by 10 percentage points.

Example: If the present value is 100%, change it to 110%.

4. Print the image. Is the problem resolved?

Yes	Finished!
No	Increase the value by 10 percentage points.

5. Repeat Step 4. If the problem persists, contact your service representative.

Color Is Too Dense

The entire image is denser than normal.

The quick brown fox jumps over the lazy dog. Buvez de ce whiely que le petron juge femeux. El veloz murcifiejo hindi comfe feltz cerdillo y ldwi. The quick brown fox jumps over the lazy dog. Buvez de ce whiely que le petron juge femeux. El veloz murcifiego hindi comfe feltz cerdillo y ldwi. The quick brown fox jumpe over the lazy dog. Buvez de ce whiely que le petron juge femeux. El veloz murcifiego hindi comfe feltz cerdillo y ldwi. The quick brown fox jumpe over the lazy dog. Buvez de ce whiely que le petron juge femeux. El veloz murcifiego hindi comfe feltz cerdillo y kiwi.

CEZ568

Cause:

This may occur if:

- Continuously printing an image that consumes much toner
- The machine has not been used for a long time
- The machine is located somewhere very humid and has not been used for a while

Solution:

- In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators]
 menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment:
 Manual Execute].
- 2. Print the image. Is the problem resolved?

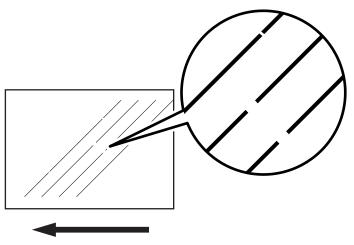
Yes	Finished!
No	Go to the next step.

- 3. Decrease the value by 1 for all colors in [Adjust Maximum Image Density].
- Select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute].
- 5. Print the image. Is the problem resolved?

Yes	Finished!
No	Repeat Steps 3 to 5. If the problem persists even if you decrease the value to -5, contact your service representative.

Broken Thin Lines

Thin lines (1 dot lines in 1200 dpi images) break.



CF7569

Cause:

Oblique (approximately 45°) thin lines or thin lines printed in faint colors are likely to contain breaks.

Solution:

- In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators]
 menu, select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment:
 Manual Execute].
- 2. Print the image. Is the problem resolved?

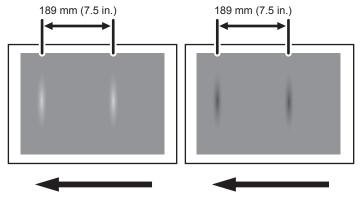
Yes	Finished!
No	Go to the next step.

- 3. Increase the value by 1 for all colors in [Adjust Line Width].
- 4. Select [Adjust Image Density/ DEMS] and execute [Image Density Adjustment: Manual Execute].
- 5. Print the image. Is the problem resolved?

Yes	Finished!
No	Repeat Steps 3 to 5. If the problem persists even if you increase the value to 5, contact your service representative.

Blurred Images

Lens-shaped blurred images appear at 189 mm (7.5 inches) intervals.



CNT002

Cause:

If the machine is left unattended for a long period in an environment where temperature and humidity are high, corona products on the drum absorb moisture to prevent a buildup or removal of static electricity on the drum.

Solution:

Carry out either of the following procedures:

Procedure 1: Printing multiple sheets

1. Print multiple sheets. Is the problem resolved?

Yes	Finished!
No	Go to the next step.

Repeat Step 1. If the problem persists even though you have repeated Step 1 five times or more, contact your service representative.

Procedure 2: Executing the process initial setting

1. In the [Machine: Maintenance] group on the [Adjustment Settings for Skilled Operators] menu, execute [Execute Process Initial Setting].

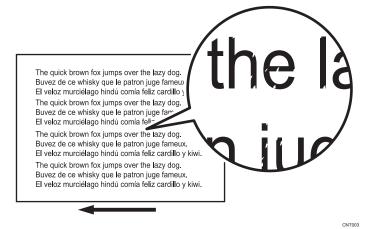
2. Print the image. Is the problem resolved?

Yes	Finished!
No	Execute [Execute Process Initial Setting].

3. Repeat Step 2. If the problem persists even though you have repeated Step 2 five times or more, contact your service representative.

Dropouts (Character Voids)

Dropouts (character voids) occur when characters or lines are printed in black-and-white mode.



U Note

- To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
 about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.
- Dropouts (character voids) do not occur on the first sheet.
- Decreasing the process speed may produce either or both of the following side effects:
 - Reduction in yields
 - Occurrence of fusing blisters

Solution:

Carry out either of the following procedures:

Procedure 1: Changing the process speed

1. In [Advanced Settings] for the custom paper in use, select [Process Speed Setting].

2. Decrease the value by one level.

If the present value is [High], select [Middle]. If it is [Middle], select [Low].

3. Print the image. Is the problem resolved?

Yes	Finished!
No	Contact your service representative.

Procedure 2: Printing black using four colors (YMCK) in full-color mode

Do the following on the Command WorkStation (CWS).

- 1. Select "Properties..." for the image.
- 2. Click the "Color" tab.
- 3. In "Color mode", select "Expert Settings...".
- 4. Click the "Gray & Black Processing" tab.
- 5. Set "Black text and graphics:" to "Normal".
- 6. Set "CMYK" to "Off".

Black is printed with 4 colors (YMCK).



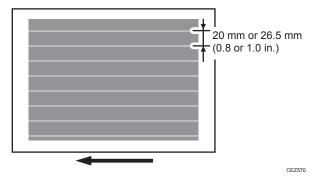
- If "Black text and graphics:" is set to "Rich Black On", black can also be printed in fullcolor mode.
- 7. If the problem persists, contact your service representative.

3

Gloss Problems

Glossy Lines

Glossy lines appear every 20 or 26.5 mm (0.8 or 1.0 inches).



Cause:

This may occur if coated or thin paper is used.



- To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
 about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.
- If the glossy lines appear at irregular intervals, you cannot resolve the problem with this procedure. Contact your service representative.
- Decreasing the fusing temperature may produce one or more of the following side effects:
 - Insufficient toner fusing
 - Insufficient gloss
 - Halftone images on uncoated paper are soiled

Solution:

1. Print the image on twenty sheets. Do glossy lines appear on the tenth sheet and later sheets?

Yes	Go to the next step.
No	You cannot resolve the problem with this procedure. Contact your service representative.

- 2. In [Advanced Settings] for the custom paper in use, select [Fusing Heat Roller Temperature Adj] and decrease the value by 5 °C.
- 3. Print the image on twenty sheets. Do glossy lines appear on the tenth sheet and later sheets?

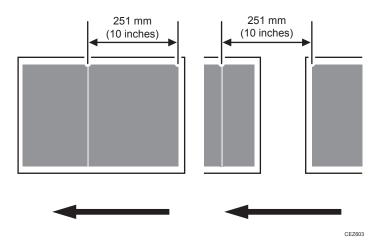
Yes	Repeat Step 2 and 3. If the problem persists even though the setting has reached its minimum value, contact your service representative. If the problem is resolved, go to the next step.
No	Go to the next step.

4. Check the toner fusion. Is it satisfactory?

Yes	Finished!
No	Restore the previous setting and contact your service representative.

Vertical Glossy Lines

Glossy lines perpendicular to the paper feed direction appear.



Cause:

Glossy lines perpendicular to the paper feed direction may appear 251 mm (10 inches) from the boundary of the margin and the solid image (in the direction opposite to the paper feed direction).

3

Solution:

If vertical glossy lines appear, carry out the procedure in page 61 "Glossy Lines".

Insufficient Gloss

The image is not glossy enough.

Solution:

If the gloss of the image is not glossy enough, carry out the procedures in Procedure 1, "Changing the fusing temperature" and Procedure 4, "Changing the process speed" of page 64 "Insufficient Toner Fusing".

Fusing Problems

Insufficient Toner Fusing

This section explains how to resolve the problem of insufficient toner fusing on printed copies.



- To adjust the following settings, pre-register the type of paper in use as a custom paper. For details
 about registering custom papers, see "Registering a Custom Paper", Paper Settings Reference.
- Changing the fusing temperature or changing the process speed may produce one or more of the following side effects:
 - · Paper curling
 - · Paper misfeeding
 - Blisters
 - Glossy lines
 - · Change of gloss
- If one or more of the above side effects occurs, adjust the fusing temperature and process speed by decreasing the fusing temperature and increasing the process speed.

Solution:

Carry out the following sequence of procedures. Terminate the sequence as soon as the problem is resolved.

Procedure 1: Changing the fusing temperature

- Increase the temperature by 5 °C in [Fusing Heat Roller Temperature Adj] in [Advanced Settings].
- 2. Print the image and check toner fusion. Is the problem resolved?

Yes	Finished!
No	Increase the temperature an additional 5 °C.

3. Repeat Step 2.

If the problem persists even if you increase the temperature to 180 °C, perform Procedure 2, "Image processing 1".

Procedure 2: Image processing 1

Do the following on the Command WorkStation (CWS).

- 1. Select "Properties..." for the image.
- 2. Click the "Color" tab.
- 3. In "Color mode", select "Expert Settings...".
- 4. If "CMYK/Grayscale" is set to "Colorwise OFF", change it to an appropriate image process.
- 5. If the problem persists even after an appropriate image process is selected, carry out Procedure 3, "Image processing 2".

Procedure 3: Image processing 2

1. Are the images printed in one or two colors?

Yes	Carry out Procedure 4, "Changing the process speed".
No	(three-color printing or unknown): In the printer driver setting, select toner reduction mode.

2. Print the image and check toner fusion. Is the problem resolved?

Yes	Finished!
No	Carry out Procedure 4, "Changing the process speed".

Procedure 4: Changing the process speed

This will slow down the printing to give the toner more time to fuse. However, because of this, throughput will be reduced.

Example when printing on A4/LT paper:

<Pro C5100S>

If the process speed is changed from [High] to [Middle]: 65 cpm \rightarrow 50 cpm

If the process speed is changed from [Middle] to [Low]: 50 cpm \rightarrow 32 cpm

<Pre><Pre>C5110S>

If the process speed is changed from [High] to [Middle]: 80 cpm → 55.8 cpm

If the process speed is changed from [Middle] to [Low]: 55.8 cpm → 35.7 cpm

- 1. In [Advanced Settings] for the custom paper in use, select [Process Speed Setting].
- 2. Decrease the value by one level.

If the present value is [High], select [Middle]. If it is [Middle], select [Low].

3. Print the image and check toner fusion. Is the problem resolved?

Yes	Finished!
-----	-----------

No

If the problem persists, the machine may be faulty or the paper unsupported. Contact your service representative.

4. Troubleshooting Paper Delivery Problems

Frequent Paper Misfeeds

Depending on the cause of the problem, do one of the following:

Coated or another type of unsupported paper is loaded in the machine's tray.

Load paper not supported by the machine's paper tray (Trays 1-3) in the wide LCT or another paper tray supporting the paper.

For details about the size and type of paper that can be loaded in the paper trays, see "Recommended Paper Sizes and Types", Paper Specifications and Adding Paper.

The side fences in the paper tray are too close together.

If the distance between the side fences is less than the paper width, it may interfere with paper transfer and so cause paper misfeeds.

Adjust the side fences to match the paper width.

When you close the paper tray, the side fences may become misaligned due to the weight of the paper. To prevent this, close the paper tray slowly.

For details about loading paper, see "Loading Paper", Paper Specifications and Adding Paper.

The side fences in the paper tray are too far apart.

If the side fences are too far apart, paper misfeeds may occur due to wrong paper size detection.

Adjust the side fences to match the paper width.

For details about loading paper, see "Loading Paper", Paper Specifications and Adding Paper.

The paper size/orientation is not specified correctly.

In tray paper settings, specify the size and orientation of the paper in use.

For details about tray paper settings, see "Changing Tray Paper Settings", Paper Settings Reference.

Too many sheets of paper are loaded in the paper tray.

When loading paper, do not exceed the limit.

For details about how many sheets can be loaded in the paper trays, see "Recommended Paper Sizes and Types", Paper Specifications and Adding Paper.

The edges of the sheets are rough.

Turn the sheets the other way up or smooth the edges before loading.

4

Sheets are curled or wavy.

- Flatten curls and waviness before loading paper.
- Turn the sheets the other way up or smooth the edges before loading.
- Stacking too many sheets may cause the sheets on top to curl greatly. If this happens, reduce the number of stacked sheets.

Sheets absorbed moisture and became limp.

Sheets that will not be used for a long time should be protected from moisture by, for example, storing them in a sealed bag.

When using thick paper or slippery paper.

Enable the Pickup Assist setting.

<If custom paper is used>

1. In [Advanced Settings] for the custom paper in use, set [Pickup Assist Setting] to [On].

<If custom paper is not used>

1. In the [Preprocessing: LCT] group on the [Adjustment Settings for Skilled Operators] menu, set [Pickup Assist Setting] to [On].

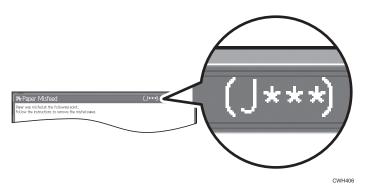
4

Messages Reporting Paper Misfeeds

Paper misfeeds are reported by messages prefixed with problem codes.

Resolve the problem according to the code.

This section only lists the codes for problems that can be resolved by the user. If a problem code not listed in this section appears, contact your service representative.



If (J099) Appears

Cause:

Double feeding has occurred.

Solution:

Depending on the cause of the problem, do one of the following:

Coated or another type of unsupported paper is loaded in the machine's tray.

Load paper not supported by the machine's paper tray (Trays 1-3) in the wide LCT or another paper tray that supports the paper.

For details about the size and type of paper that can be loaded in the paper trays, see "Recommended Paper Sizes and Types", Paper Specifications and Adding Paper.

Sheets are stuck to each other.

Fan the paper before loading it to loosen the sheets.

For details about fanning the paper, see "Fanning the Paper", Paper Specifications and Adding Paper.

The edges of the sheets are rough.

Turn the sheets the other way up or smooth the edges before loading the paper.

Depending on the cause of the problem, do one of the following:

The side fences in the paper tray are too far apart.

If the side fences are too far apart, the paper may misfeed.

Adjust the side fences to match the paper width.

When you close the paper tray, the side fences may become misaligned due to the weight of the paper. To prevent this, close the paper tray slowly.

For details about loading paper, see "Loading Paper", Paper Specifications and Adding Paper.

A scrap of paper or some other small fragment is jammed in the paper feed path.

Remove the fragment.

For details about cleaning the paper feed path, see page 84 "Cleaning the Paper Feed Path".

The correct degree of paper arching has not been specified.

Adjust the degree of paper arching at the registration gate.

<If using paper of Paper Weight 1 to 4>

1. In the [Machine: Paper Feed/ Output] group on the [Adjustment Settings for Skilled Operators] menu, change the value in [Adjust Registration Paper Buckle].

<If using paper of Paper Weight 5 to 7>

1. In the [Machine: Paper Feed/ Output] group on the [Adjustment Settings for Skilled Operators] menu, change the value in [Adjust Registration Paper Buckle (Thick Paper)].

Increase the value for the paper tray in use, and then print the image. If the problem persists even though the setting has reached its maximum value, try decreasing the setting.

If the problem persists even though you have tried the complete range of settings from minimum to maximum, contact your service representative.

Double Feeding

Depending on the cause of the problem, do one of the following:

Is the paper feed roller covered with paper dust?

Paper dust may decrease the traction of the paper feed roller and result in double feeding due to paper slippage or insufficient separation.

Cleaning the paper feed roller will restore traction and so prevent double feeding.

For details about cleaning the paper feed roller, see page 84 "Cleaning the Paper Feed Path".

For details about removing the paper feed roller, see the Replacement Guide.

Have you ruffled the paper sufficiently?

Double feeding may result if the paper is not ruffled properly.

Remove the paper, ruffle it, and reload it.

For details about ruffling the paper, see "Fanning the Paper", Paper Specifications and Adding Paper.

Is the Pickup Assist setting enabled?

If the Pickup Assist function operates too much, it may cause double feeding with coated paper.

By disabling the Pickup Assist setting, you can prevent double feeding.

<If custom paper is used>

1. In [Advanced Settings] for the custom paper in use, set [Pickup Assist Setting] to [Off].

<If custom paper is not used>

1. In the [Preprocessing: LCT] group on the [Adjustment Settings for Skilled Operators] menu, set [Pickup Assist Setting] to [Off].

Special or coated paper is used.

Is the airflow strong enough?

The factory-set airflow of the wide LCT may not be strong enough to separate the sheets. Increase the airflow.

<If custom paper is used>

1. In [Advanced Settings] for the custom paper in use, increase the value in [Adjust Wide LCT Fan Level].

<If custom paper is not used>

- 1. In the [Preprocessing: LCT] group on the [Adjustment Settings for Skilled Operators] menu, increase the value in [Adjust Wide LCT Fan Level].
- Is the tab sheet holder attached?

By attaching the tab sheet holder, you can prevent air from leaking at the trailing edge of the paper and improve separation.

For details about attaching the tab sheet holder, see "Paper Specifications and Adding Paper" supplied with the machine.

Paper Misfeeding

Depending on the cause of the problem, do one of the following:

Have you ruffled the paper properly?

Not ruffling the paper properly may cause paper misfeeding.

Remove the paper, ruffle it, and reload it.

For details about ruffling paper, see "Fanning the Paper", Paper Specifications and Adding Paper.

The side fences in the paper tray are too close together.

If the distance between the side fences is less than the paper width, it may interfere with paper transfer and so cause paper misfeeds.

Adjust the paper guides to match the paper width.

When you close the paper tray, the side fences may become misaligned due to the weight of the paper. To prevent this, close the paper tray slowly.

For details about loading paper, see "Loading Paper", Paper Specifications and Adding Paper.

Special or coated paper is used.

Is the airflow powerful enough?

The factory-set airflow of the wide LCT may not be strong enough to separate the sheets. Increase the airflow.

<If custom paper is used>

1. In [Advanced Settings] for the custom paper in use, increase the value in [Adjust Wide LCT Fan Level].

<If custom paper is not used>

- 1. In the [Preprocessing: LCT] group on the [Adjustment Settings for Skilled Operators] menu, increase the value in [Adjust Wide LCT Fan Level].
- Is the tab sheet holder attached?

By attaching the tab sheet holder, you can prevent air from escaping at the trailing edge of the paper and so improve separation.

For details about attaching the tab sheet holder, see "Paper Specifications and Adding Paper" supplied with the machine.

• Is the paper feed roller covered with paper dust?

Paper dust on the surface of coated paper may reduce the traction of the paper feed roller and cause paper misfeeding due to paper slippage or insufficient separation.

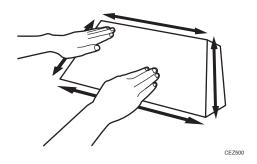
By cleaning the paper feed roller, the frictional force can be restored so that paper mesfeeding will not occur.

For details about cleaning the paper feed roller of the wide LCT, see page 84 "Cleaning the Paper Feed Path in the Wide LCT".

An envelope is used.

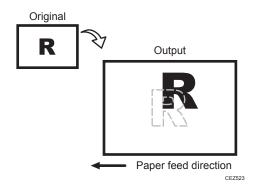
Depending on the type of envelope, air trapped inside may be squeezed out when the paper feed roller picks up the envelope and cause slippage leading to a misfeed.

- Is the wide LCT fan disabled?
 In [Advanced Settings] for the custom paper in use, set [Wide LCT Fan Setting] to [Off].
- Have you flattened the envelope?
 Flatten the envelope and all its edges to eliminate air before loading. If the envelope is curled, decurl it before loading.



Paper Feed Problems Affecting Image Quality

The Image Is Positioned Incorrectly



Cause:

Depending on the paper thickness, floppiness, edge roughness, and curl, the image may become mispositioned.

Solution:

Adjust the image position.

<If custom paper is used>

- 1. In [Advanced Settings] for the custom paper in use, adjust the image position.
 - Side 1
 - To adjust the position horizontally, change the value in [Adj Image Position of Side 1 With Feed].
 - To adjust the position vertically, change the value in [Adj Image Position of Side 1 Across Feed].
 - Side 2
 - To adjust the position horizontally, change the value in [Adj Image Position of Side2 With Feed].
 - To adjust the position vertically, change the value in [Adj Image Position of Side2 Across Feed].

<If custom paper is not used>

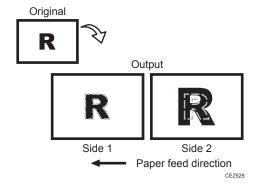
- 1. In the [Machine: Image Position] group on the [Adjustment Settings for Skilled Operators] menu, adjust the image position.
 - To adjust the position horizontally, change the value in [Adjust Image Position With Feed Direction].
 - To adjust the position vertically, change the value in [Adjust Image Position Across Feed Direction].

If the problem persists even though you have adjusted the setting to its maximum and minimum values, contact your service representative.



 For details about specifying settings in the [Adjustment Settings for Skilled Operators] menu, see the Adjustment Item Menu Guide.

Image Scaling Error on the Side 2 of Paper



Cause:

An image scaling error on the side 2 of the paper may occur because the paper expands or contracts after the image on the side 1 of the paper has been fused.

Solution:

Adjust the scaling for the side 2 of the paper and minimize the difference in print size between the side 1 and the side 2.

- 1. In [Advanced Settings] for the custom paper in use, adjust the image scaling.
 - To adjust the horizontal scaling, change the value in [Adj Magnification of Side2 Across Feed].

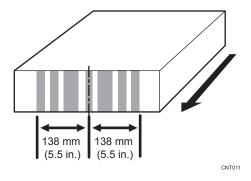
• To adjust the vertical scaling, change the value in [Adj Magnification of Side2 With Feed].

Press [+] to increase and [-] to decrease the scaling.

2. Print the image. Is the problem resolved?

Yes	Finished!
No	Contact your service representative.

Paper Edges Are Soiled (1)



Cause:

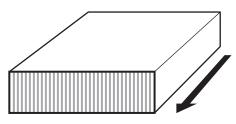
The exit rollers in the drawer are soiled.

Solution:

Clean the exit rollers in the drawer.

For details about cleaning the exit rollers, see page 24 "Two 24-mm Wide Streaks".

Paper Edges Are Soiled (2)



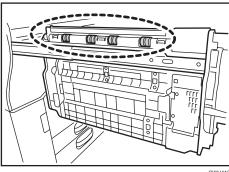
CNT012

The antistatic brushes in the exit transport and invert transport of the drawer are soiled or the anti-static brushes in Finisher SR4090/SR4100/SR4110 are soiled.

Solution:

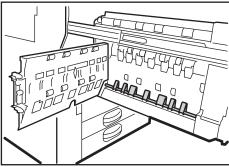
Clean the antistatic brushes in the exit transport and inverter transport of the drawer with a blower brush.

• The antistatic brush in the exit transport



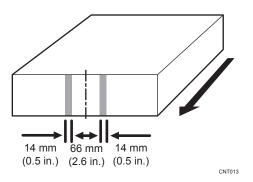
CWH41

• The antistatic brush in the inverter transport



CWH413

Paper Edges Are Soiled (3)



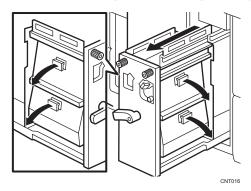
Cause:

The paper transport rollers or guide plates in the buffer pass unit are soiled.

Solution:

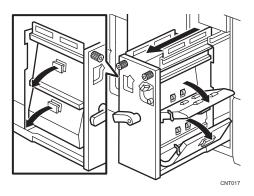
Clean the paper transport rollers and guide plates in the buffer pass unit.

1. Pull out the buffer pass unit and open the guide plates.

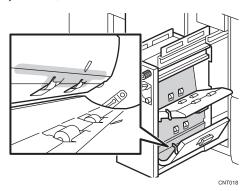


2. Wipe the rubber rollers for the transport rollers with a slightly damp cloth.

There are twenty-four rubber rollers for the twelve transport rollers.



3. Wipe the guide plates (especially the ridgelines of the bends and the cut-and-bent portions) with a cloth moistened with alcohol.



4. Close the guide plates and push the buffer pass unit back into the machine.

Scratches, Streaks, or Vertical Creases Appear on the Image

Cause:

The paper feed speed of the exit motor, switchback entrance, or switchback exit is too high or too low.

Solution:

<If scratches or streaks appear on the side 2 of the paper>

You can lessen the problem by decreasing the paper feed speed.

- In [Advanced Settings] for the custom paper in use, adjust the paper feed speed for delivery.
 Depending on the type of printing, specify one of the following:
 - For one-sided printing, reduce the value in [Exit Motor Feed Speed Adjustment] by 0.1%.
 - For duplex printing, reduce the value in [Switchback Entrance Feed Speed Adj] by 0.1%.

- For one-sided printing (delivery of inverted paper), reduce the value in [Switchback Exit Feed Speed Adj: CCW] by 0.1%.
- 2. Print the image. Is the problem resolved?

Yes	Finished!					
No	Keep decreasing the value by 0.1% until the problem is resolved.					
	If the problem persists even though you have decreased the value by 1.0%, contact your service representative.					

<If scratches or streaks appear on the side 1 of the paper>

You can lessen the problem by increasing the paper feed speed.

- In [Advanced Settings] for the custom paper in use, adjust the paper feed speed for delivery.
 Depending on the type of printing, specify one of the following:
 - For one-sided printing, increase the value in [Exit Motor Feed Speed Adjustment] by 0.1%.
 - For duplex printing, increase the value in [Switchback Entrance Feed Speed Adj] by 0.1%.
 - For one-sided printing (delivery of inverted paper), decrease the value in [Switchback Exit Feed Speed Adj: CCW] by 0.1%.
- 2. Print the image. Is the problem resolved?

Yes	Finished!
No	Keep increasing the value by 0.1% until the problem is resolved.
	If the problem persists even though you have increased the value by 1.0%, contact your service representative.

The Leading/Trailing Edge Margin Is Long

Cause:

In some custom paper presets, the leading/trailing edge margins are wide enough to prevent paper jams.

Solution:

Adjust the leading/trailing edge margins.

- In [Advanced Settings] for the custom paper in use, reduce the value by 0.5 mm in [Adjust Erase Margin of Leading Edge].
- 2. Reduce the value by 0.5 mm in [Adjust Erase Margin of Trailing Edge].
- 3. Print the image. Is the problem resolved?

Yes	Finished!
No	If this results in a paper jam during duplex printing, restore the previous setting.

UNote

- The adjusted margin cannot be applied to masked images that are solid-filled or contain ruled lines at the leading/trailing edges.
- Reducing the leading/trailing edge margin may result in a paper jam on the fusing belt stripper plate.

Curling

To eliminate curling without using the decurler unit, lower the heat roller temperature.

Lowering the temperature may result in:

- Unsatisfactory fusing
- Reduced glossiness
- Smeared for halftone images on uncoated paper
- In [Advanced Settings] for the custom paper in use, select [Fusing Heat Roller Temperature Adj] and reduce the value by 5 °C.

2. Print a full-page solid-fill image. Is the problem resolved?

Yes	Finished!			
No	Further reduce the value by 5 °C. until the problem is resolved.			
	If the problem persists, contact your service representative.			

Cleaning the Paper Feed Path

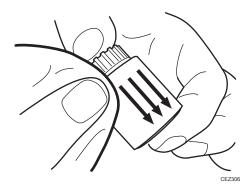
Clean the paper feed path if white spots appear due to paper dust sticking to the paper, or if paper misfeeding or double feeding occurs.

Guide Board

Wipe the guide board with a well-wrung-out damp cloth. To clean the innermost recesses, use a cloth that is as large as your palm.

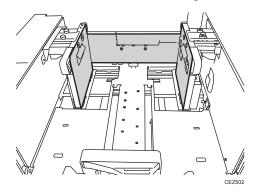
Paper Feed Roller

Wipe the entire surface of the paper feed roller lengthwise with a well-wrung-out damp cloth, and then wipe with a dry, unused, lint-free cloth until no moisture remains.



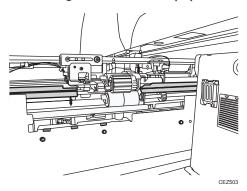
Cleaning the Paper Feed Path in the Wide LCT

1. Clean the side fences and front guide.



2. Clean the paper feed rollers.

3. Clean the guide board of the paper feed unit.



4. After cleaning, restore the machine so that it resumes operation.



• For details about detaching and reattaching the parts, see the Replacement Guide

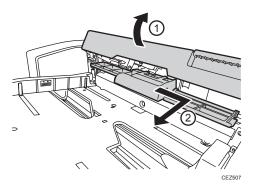
Cleaning the Paper Feed Rollers and Paper Feed Belt in the Interposer

Clean the paper feed belt and paper feed rollers in the interposer.

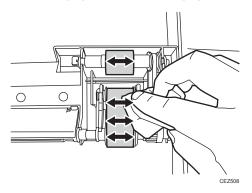
The procedure is explained using the interposer upper tray. The procedure is the same for the lower tray.

- 1. Remove the loaded paper.
- 2. Open the upper cover, and then detach the paper feed unit.

Pull it out slightly, release the metal shaft, and then detach it.



3. Clean the paper feed belt and paper feed rollers in the detached paper feed unit.



4. After cleaning, restore the machine so that it resumes operation.

5. Post-Processing Option Troubleshooting

Finisher SR4090/SR4100/SR4110

Delivered Sheets Are Not Stacked Properly

Solution:

Depending on the cause of the problem, do one of the following:

There is airflow in the room.

Minimize the airflow. For instance, turn the air conditioner off.

Printed sheets are curled.

Load the sheets the other way up.

There are too many stacked sheets.

Reduce the number of the stacked sheets. To do this, suspend printing and remove the stacked sheets, and then resume printing.

To suspend printing, press the [Suspend] key on the finisher.

To resume printing, press the [Resume] key on the finisher.

Multi-Folding Unit

Inaccurate Folding (Folding Deviation)

Cause:

Depending on paper hardness, inaccurate folds may result. This is referred to as folding deviation.

Solution:

Change the folding position by adjusting the position of the paper edge stopper for folding.

• For multi-sheet folding, change the folding position using the following settings:

Half Fold Position (Multi-sheet Fold)

Letter Fold-out Position 1 (Multi-sheet Fold)

Letter Fold-out Position 2 (Multi-sheet Fold)

Letter Fold-in Position 1 (Multi-sheet Fold)

Letter Fold-in Position 2 (Multi-sheet Fold)

• For single-sheet folding, change the folding position using the following settings:

Adjust Z-fold Position 1

Adjust Z-fold Position 2

Half Fold Position: Single-sheet Fold

Letter Fold-out Posn 1: Single-sheet Fld

Letter Fold-out Posn 2: Single-sheet Fld

Letter Fold-in Posn 1: Single-sheet Fold

Letter Fold-in Posn 2: Single-sheet Fold

Double Parallel Fold Position 1

Double Parallel Fold Position 2

Adjust Gate Fold Position 1

Adjust Gate Fold Position 2

Adjust Gate Fold Position 3



 For details about specifying settings in the [Adjustment Settings for Skilled Operators] menu, see the Adjustment Item Menu Guide.

Folding Deviation

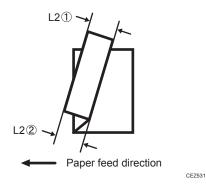
Cause:

Depending on paper hardness, folding deviations (skewed folding) may appear.

A deviation may appear if the edge dimensions of the parts between folds are different.

For example, in the following illustration, the dimensional difference between the top (L2[2]) and bottom (L2[1]) edges is a deviation.

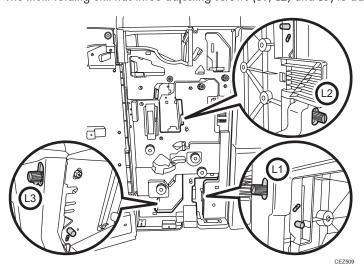
<Folding deviation sample of L2 for Z-fold>



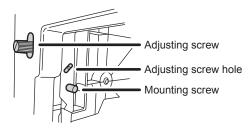
Solution:

Adjust the deviation.

The multi-folding unit has three adjusting screws (L1, L2, and L3) to adjust deviation.

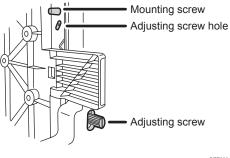


L1



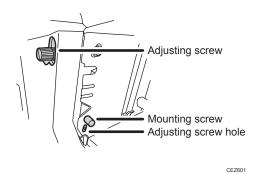
CEZ599

L2



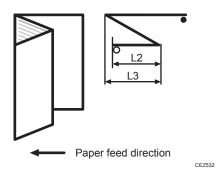
CEZ600

L3

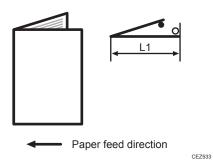


The screws adjust the folding deviations of the following parts:

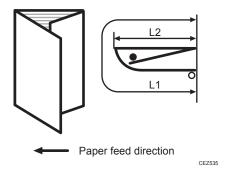
Z-fold



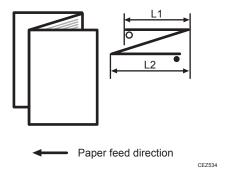
Half Fold



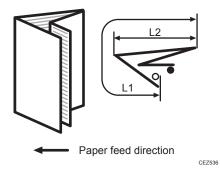
Letter Fold-in



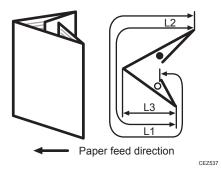
Letter Fold-out



Double Parallel



Gate Fold



The O mark indicates the leading edge (relative to the paper feed direction), and the • mark indicates the trailing edge.

<How to adjust the folding deviation>

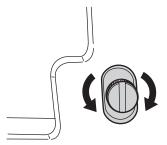
This procedure is the same for L1, L2, and L3.

1. Open the front cover of the multi-folding unit.

2. Remove the mounting screw.

If the mounting screw is attached to the adjusting screw hole, unfasten it.

- 3. Turn the adjusting screw to adjust the deviation.
 - To increase the length at the bottom part of paper, turn the screw clockwise.
 - To decrease the length at the bottom part of paper, turn the screw counterclockwise.



CEZ51

4. Attach the mounting screw to fasten the adjusting screw.

If the mounting screw is attached to the adjusting screw hole, fasten it.

5. Close the front cover of the multi-folding unit.

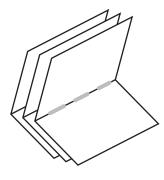


- For multi-sheet folding, the folding deviation that appears in the center of paper will be adjusted.
- If the deviation is large, the paper may be skewed. For further information, see page 70 "Paper Skew".

Folds soiled by multi-sheet folding

Cause:

If multi-sheet folding is performed after a large number of Z-folds have been performed, the tip of the blade used for the multi-sheet folding may be soiled, resulting in soiled paper.



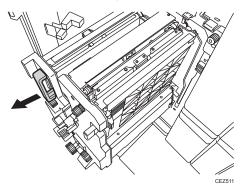
This will produce paper soil of 1-3 cm (0.4-1.2 inches) in width (equal to the width of the blade) in the fold in the center of paper.

CEZ571

Solution:

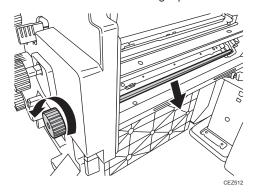
Clean the blade.

- 1. Open the front cover of the multi-folding unit.
- 2. Pull the multi-folding unit out.



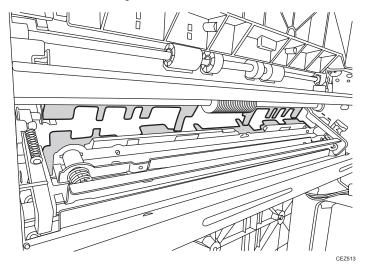
3. Turn the N11 dial counterclockwise until the blade appears.

The blade is located in the right part of the multi-folding unit.



4. Wipe the tip and top of the blade with a soft dry cloth.

Be careful not to damage the blade.

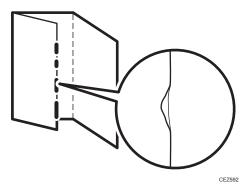


5. After cleaning, restore the machine so that it resumes operation.

Apply multi-sheet folding and print 3-5 copies. The paper soil will disappear.

Edges of letter fold bent

When letter folding is applied, the edge of the inner flap may become bent.



Solution:

The solution depends on whether letter folding is applied to multiple sheets or a single sheet.

<When letter folding is applied to multiple sheets>

1. Load the paper the other side up.

2. Print the image. Is the problem resolved?

Yes	Finished!
No	Go to the next step.

- 3. In the [Finishing: Fold] group on the [Adjustment Settings for Skilled Operators] menu, set [Letter Fold-in Position 1 (Multi-sheet Fold)] to "0.0 mm".
- 4. In [General Features] in [System Settings], set [Letter Fold-in Position] for multiple sheets to "7 mm".
- 5. Print the image. Is the problem resolved?

Yes	Finished!	
No	Contact your service representative.	

<When letter folding is applied to a single sheet>



- This procedure is applied especially to coated paper.
- To adjust the following settings, pre-register the type of paper in use as a custom paper. For
 details about registering custom papers, see "Registering a Custom Paper", Paper Settings
 Reference.
- In [General Features] in [System Settings], set [Letter Fold-in Position] for a single sheet to "7 mm".
- 2. In [Advanced Settings] for the custom paper in use, select [Letter Fold-in Posn 1: Single-sheet Fold].
- 3. Increase the value by 0.2 mm.
- 4. Print the image. Is the problem resolved?

Y	es	Finished!
N	olo	Repeat Step 2 to 4. If the problem persists even though the setting value is 4 mm larger than the maximum value, contact your service representative.

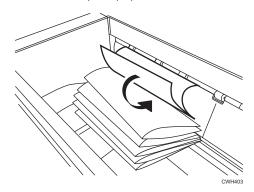
Folded Sheets Are Not Stacked Properly

Cause:

If a large number of half-folded multi-sheet is delivered, the edge of the sheets may bulge and some part of the edge will be swollen. If this happens, other sheets loaded on the bulged paper may turn over in the output tray.

This is likely to occur if:

• Thick, relatively stiff paper is used.

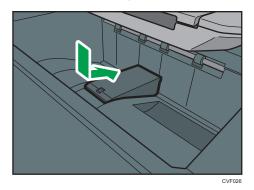


As a bundle is delivered, its folded edge may droop and catch on the stacked bundles, causing the delivered bundle to flip over.

Solution:

Use the Z-fold support tray for multi-folding unit.

This will reduce the angle of stacked bundles and prevent bundles flipping over as they are delivered.



For details about attaching the Z-fold support tray for multi-folding unit, see "Copy/ Document Server" supplied with the machine.



• If the Z-fold support tray for the multi-folding unit is attached, folded paper such as letter-folded paper or gate-folded paper will not turn over in the output tray when delivered.

6. Improving Throughput

Reducing the Waiting Time Prior to Printing

After receiving a print job, the machine usually stops to let the fusing temperature reach an appropriate level for printing.

The waiting time for the fusing unit to cool down may be quite long, especially before printing on thin paper. By decreasing the fusing temperature during standby, you can reduce the waiting time.

In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, decrease the temperature by 10°C in [Adjust Fusing Temperature on Standby].
 Decrease the value in [Temperature on Standby Mode] and [Temperature Before Performing a Process] by 10°C.



 When printing on paper other than thin paper, we recommend leaving the above settings unchanged.

Improving Throughput When Printing on Paper with a Thickness Equivalent to Paper Weight 6 or 7

When printing on paper with a thickness equivalent to Paper Weight 6 or 7, the machine's copy/print speed must be reduced to 70% of full speed (for A4 paper) so that the degree of toner fixation can be enhanced.

However, depending on the type of paper in use and printed image, you can have the machine print at full copy/print speed.

The following are requirements for improving throughput when using paper with a thickness equivalent to Paper Weight 6 or 7:

- Uncoated paper
- Printing in black-and-white mode
- Room temperature
- 1. In [Advanced Settings] for the custom paper in use, increase the value in [Process Speed Setting] by one step.
 - If it is presently set to [Low], change it to [Middle].
 - If it is presently set to [Middle], change it to [High].
- 2. Set [Fusing Heat Roller Temperature Adj] to "180°C".
- 3. Print the image. Does it exhibit any fusing problem?

Yes	You cannot improve throughput under the present condition. Restore the previous setting		
No	You can operate the machine using this setting.		



- The following list shows the copy/print speed for each item in [Process Speed Setting]:
 - High (Pro C5100S)
 - 65 cpm (full speed)
 - Middle (Pro C5100S)
 - 50 cpm (77% of full speed)
 - Low (Pro C5100S)
 - 32 cpm (50% of full speed)
 - High (Pro C5110S)
 - 80 cpm (full speed)

- Middle (Pro C5110S)
 55.8 cpm (70% of full speed)
- Low (Pro C5110S) 35.7 cpm (45% of full speed)

Improving Throughput when Printing Blackand-White Jobs and Full-Color Jobs

When printing intermixed black-and-white and full-color print jobs, switching from full-color mode to black-and-white mode takes time, causing loss of throughput each time the mode is switched.

When the machine prints a full-color print job followed by a black-and-white job, you can improve throughput by adjusting the number of black-and-white sheets the machine prints in full-color mode before switching to black-and-white mode.

1. In the [Machine: Image Quality] group on the [Adjustment Settings for Skilled Operators] menu, change the value in [Auto Color Selection Setting].

Specify the appropriate number of sheets for your operating environment.

Value	Machine operation
1 (Minimum)	The machine will switch to the black-and-white mode for all black-and-white printing.
	This does not improve throughput, but prevents the cyan, magenta, and yellow development units from working when printing black-and-white sheets.
10 (Maximum)	When the machine prints a full-color print job followed by a black-and-white job, it will switch from full-color to black-and-white mode after printing 10 black-and-white sheets.



- If you print black-and-white sheets in full-color mode, the cyan, magenta, and yellow development units will work during the black-and-white printing, resulting in a shorter replacement cycle for the photoconductor unit.
- When the machine prints a black-and-white print job followed by a full-color job, it will always switch to full-color mode, as full-color printing is impossible in black-and-white mode.

MEMO

MEMO