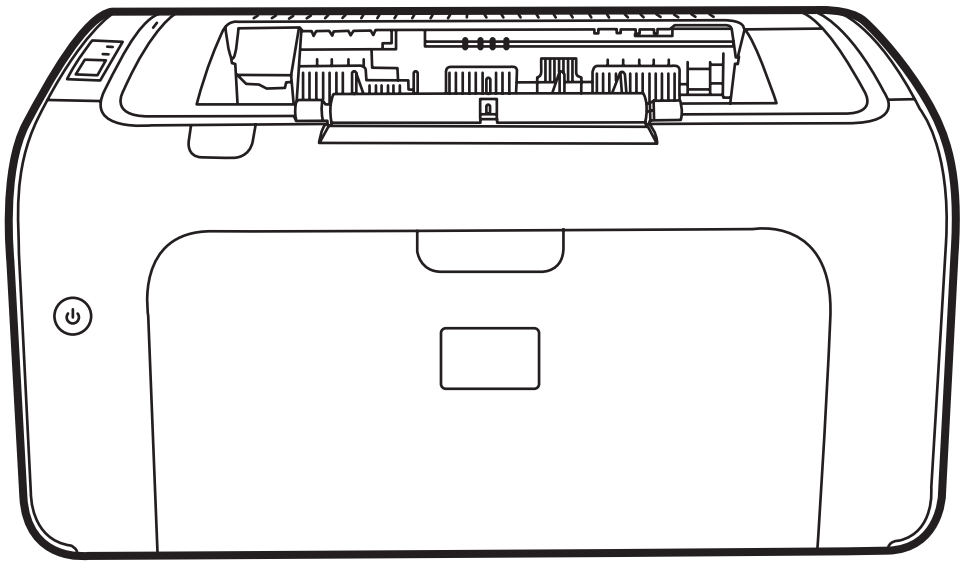
HP LaserJet P1000 Series
Service Manual



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HP LaserJet P1000 Series
Service Manual

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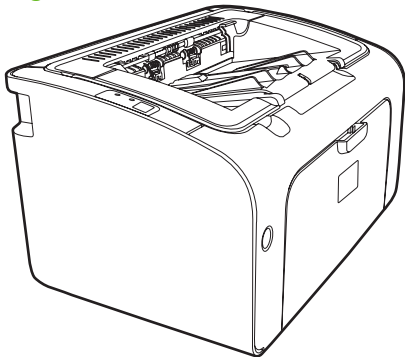
1 Product information

- Product configuration
- Product features
- Identify product parts

Product configuration

Figure 1-1 HP LaserJet P1000 Series



- **First Page Out**: < 8 seconds
- **Speed**: 14 A4 pages per minute (ppm), 15 Letter-size ppm.
- **Tray**: 150 sheet universal tray.
- **Connectivity**: Hi-Speed USB 2.0 port.

HP LaserJet P1006/P1008 only

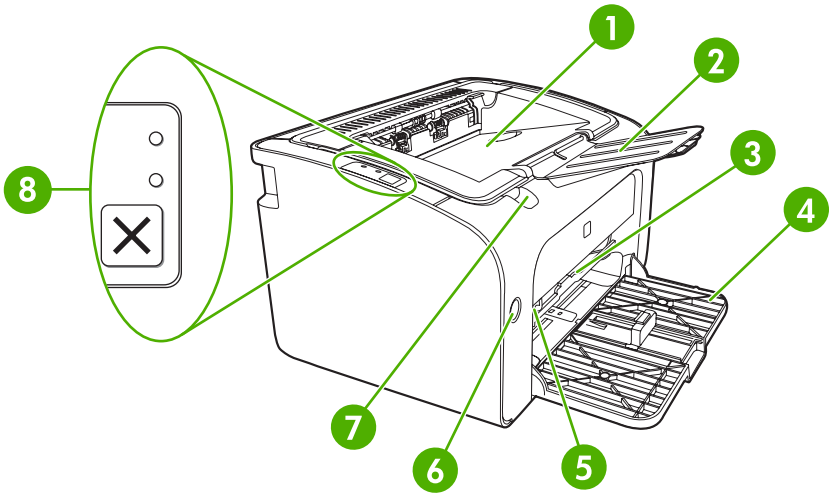
- **First Page Out**: < 8 seconds
- **Speed**: 22 A4 pages per minute (ppm), 17 Letter-size ppm.
- **Tray**: 10 sheet priority feed slot and a 150 sheet universal tray.
- **Connectivity**: Hi-Speed USB 2.0 port.

Product features

Benefit	Supporting features
Excellent print quality	• HP print cartridges. • True 600 by 600 dots per inch (dpi) text and graphics. • Adjustable settings to optimize print quality.
Ease of use	• The print cartridge is easy to install. • Convenient access to the print cartridge and to the paper path through the cartridge door. • Adjust paper tray with one hand.
Flexible paper handling	• Main tray for letterhead, envelopes, labels, transparencies, custom-sized media, postcards, and heavy paper. • Priority feed slot for letterhead, envelopes, labels, transparencies, custom-sized media, postcards, and heavy paper. • A 125-sheet top output bin. • Print on Both Sides (manually).
Interface connections	• Hi-Speed 2.0 USB port.
Energy savings	• The device automatically conserves electricity by substantially reducing power consumption when it is not printing.
Economical printing	• N-up printing (printing more than one page on a sheet) and Printing on Both Sides features save paper.
Archive printing	• When printing pages that are to be stored long-term, this option sets the device to a mode that reduces toner smearing and dusting. • Select **Archive** as the paper type.
Supplies	• A Supplies Status page with print cartridge gauges that estimate remaining supply level. Not available for non-HP supplies. • No-shake cartridge design. • Authentication for original HP print cartridges. • Easy ordering for replacement supplies.
Accessibility	• Online user guide compatible with text screen-readers. • All doors and covers can be opened with one hand.
Security	• Kensington lock receptacle on back of device.

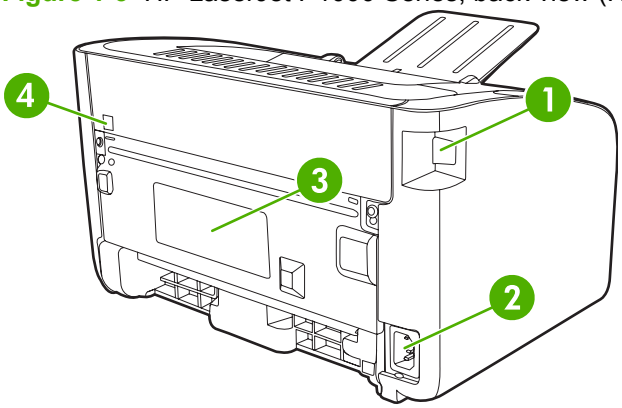
Identify product parts

Figure 1-2 HP LaserJet P1000 Series, front view (HP LaserJet P1006/P1008 shown)



1	Output bin
2	Foldable Output Tray Extension
3	Priority feed slot (HP LaserJet P1006/P1008 only)
4	Foldable Main Input tray
5	Short Media Extender (HP LaserJet P1005/P1007 only)
6	Power button
7	Cartridge door lift-tab (access to print cartridge)
8	Control panel (HP LaserJet P1006/P1008 control panel shown)

Figure 1-3 HP LaserJet P1000 Series, back view (HP LaserJet P1006/P1008 shown)



1	USB Port (2.0)
2	Power receptacle

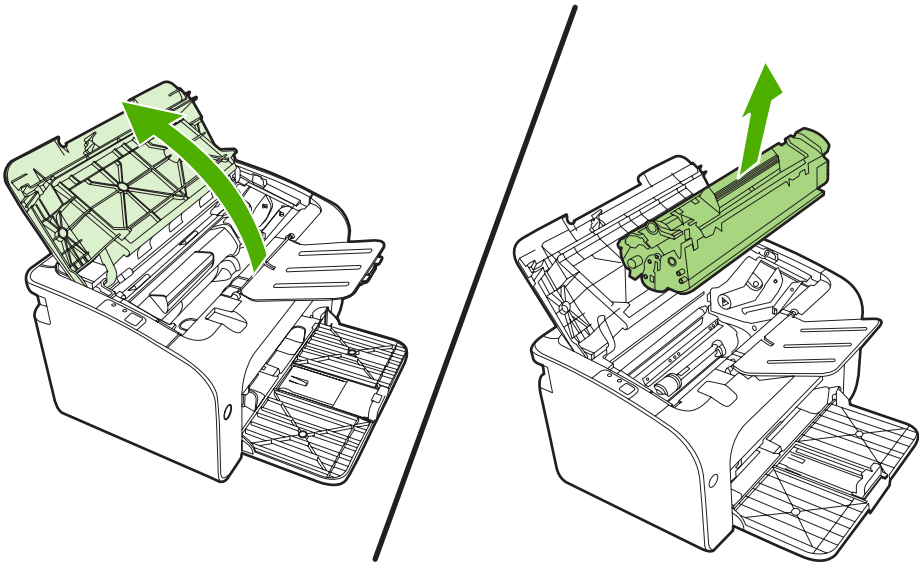
3	Serial number
4	Kensington lock receptacle

2 Managing and maintenance

- Replace the print cartridge
- Printer information pages
- Clean the device
- Change the pickup roller
- Clean the pickup roller
- Change the printer separation pad
- EconoMode

Replace the print cartridge

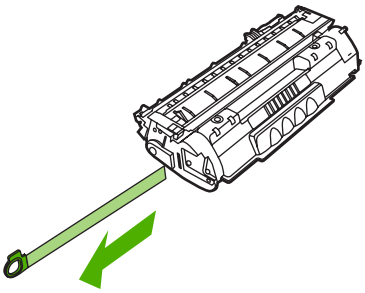
1. Open the print-cartridge door, and remove the old print cartridge. See the recycling information inside the print-cartridge box. To prevent damage to the print cartridge, minimize its exposure to direct light by covering it with a sheet of paper.



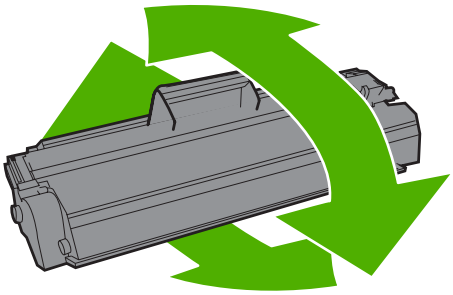
2. Remove the new print cartridge from the packaging.

△ **CAUTION:** To prevent damage to the print cartridge, hold the print cartridge at each end.

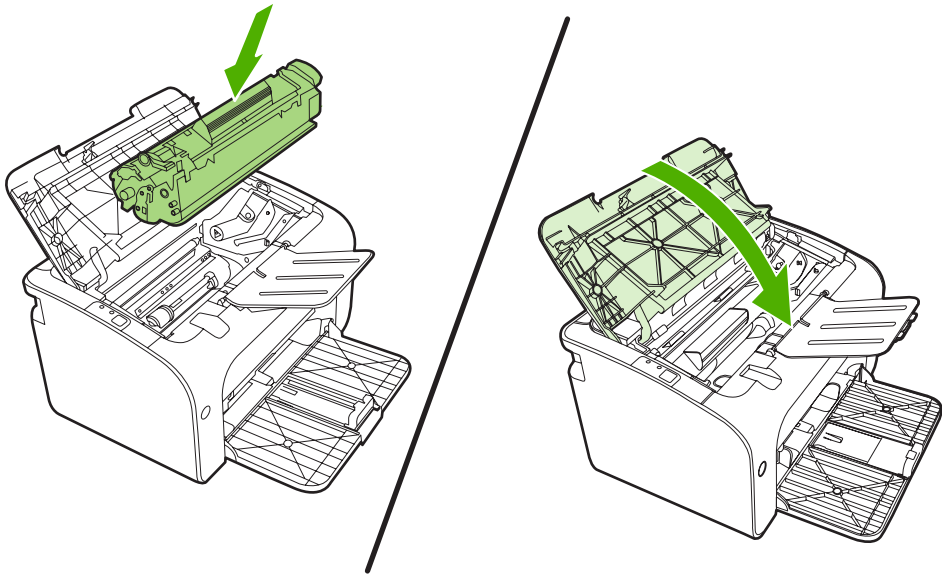
3. Pull the tab until all the tape is removed from the cartridge. Put the tab in the print-cartridge box to return for recycling.



4. Gently rock the toner cartridge from front to back to distribute the toner evenly inside the cartridge.



5. Insert the print cartridge in the device and close the print-cartridge door.



△ **CAUTION:** If toner gets on your clothing, wipe it off with a dry cloth and wash the clothing in cold water. *Hot water sets toner into the fabric*.

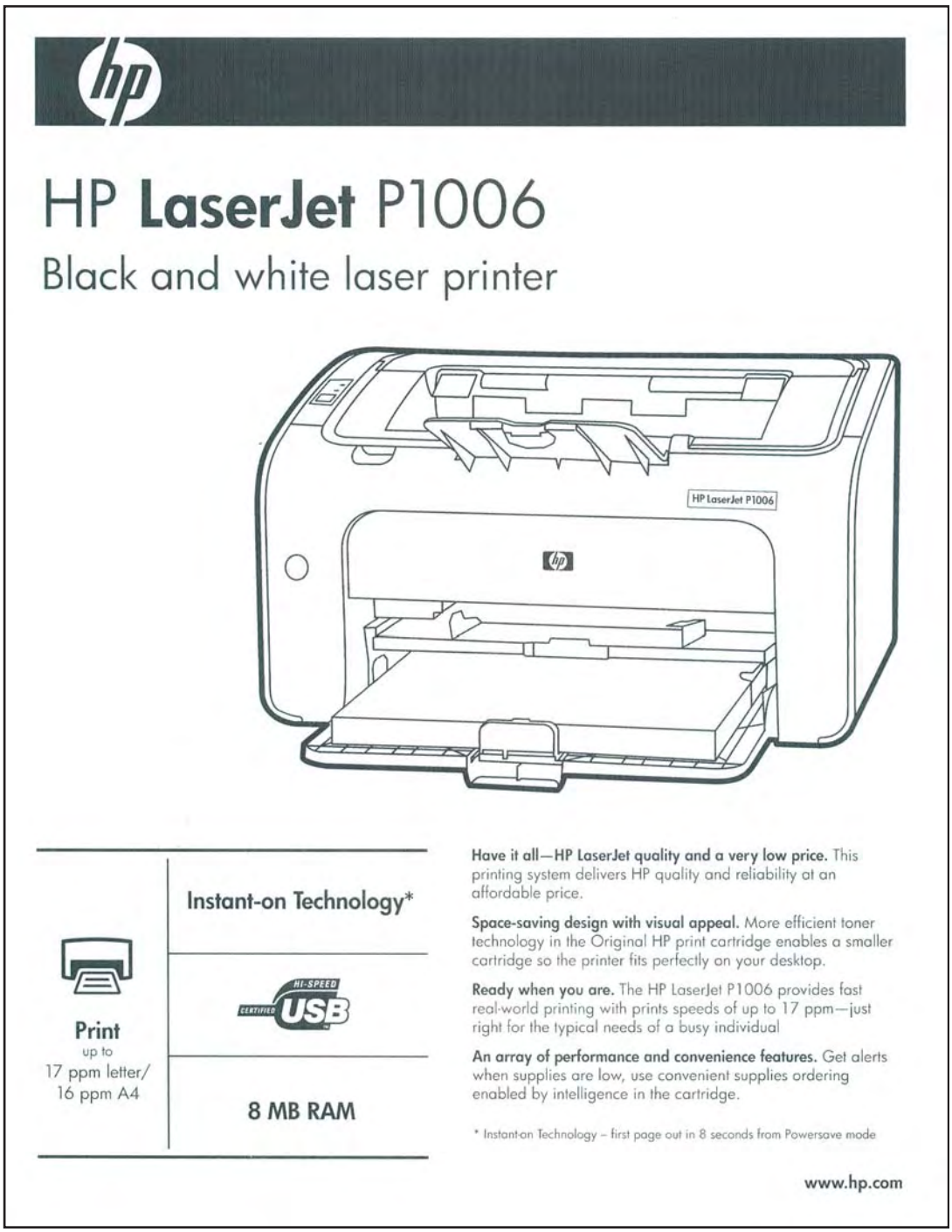
NOTE: When toner is low, faded or light areas appear on the printed page. You might be able to temporarily improve print quality by redistributing the toner. To redistribute the toner, remove the cartridge from the device and gently rock it from front to back.

Printer information pages

You can print the following information pages. To print an information page, select it from the **Print Information Pages** drop-down list on the **Services** tab in **Printer Preferences**.

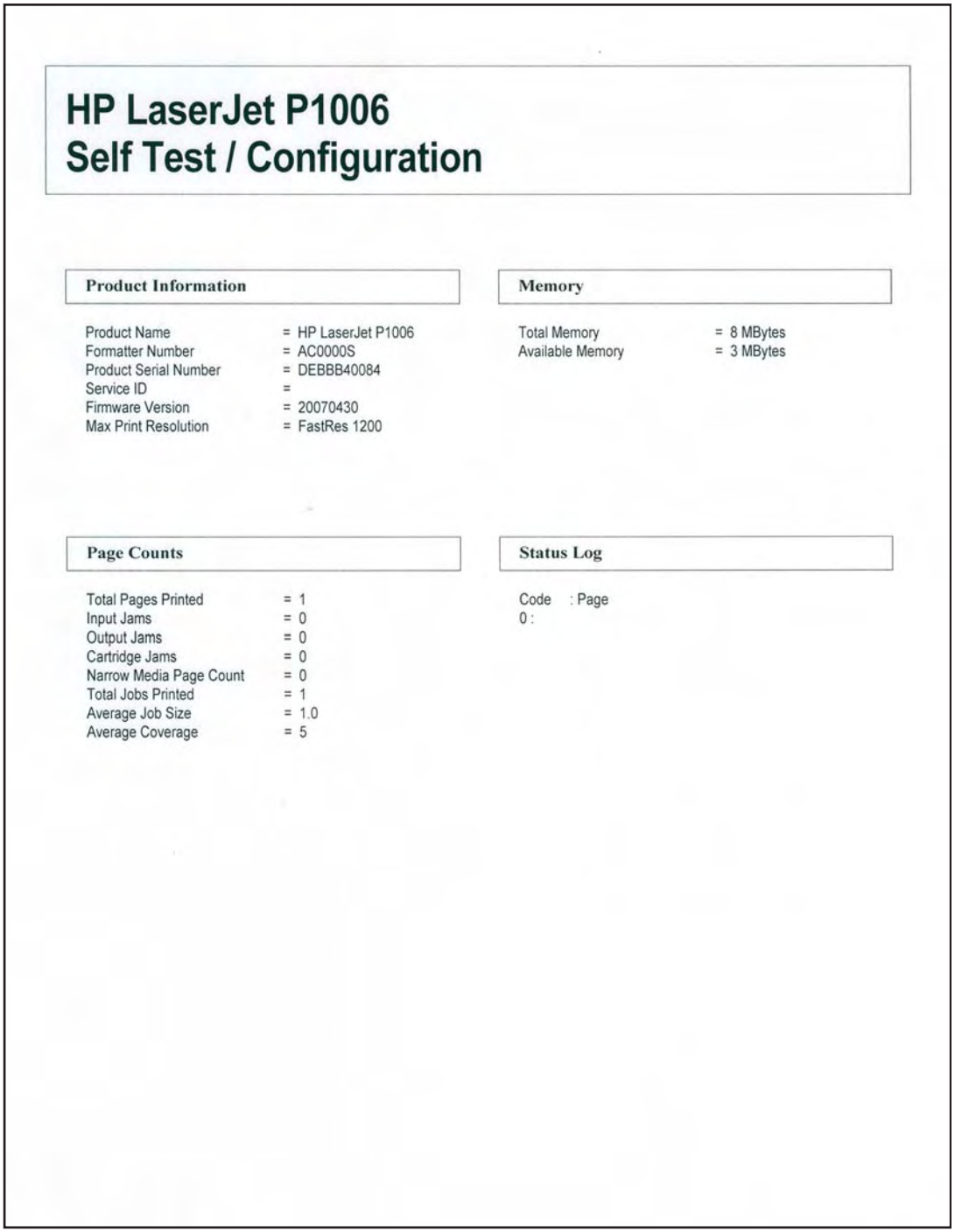
Demo page

The Demo page contains examples of text and graphics.



Configuration page

The Configuration page lists current settings and properties of the printer. It also contains a status log report.



HP LaserJet P1006
Self Test / Configuration

Product Information

Product Name	= HP LaserJet P1006
Formatter Number	= AC0000S
Product Serial Number	= DEBBB40084
Service ID	=
Firmware Version	= 20070430
Max Print Resolution	= FastRes 1200

Memory

Total Memory	= 8 MBytes
Available Memory	= 3 MBytes

Page Counts

Total Pages Printed	= 1
Input Jams	= 0
Output Jams	= 0
Cartridge Jams	= 0
Narrow Media Page Count	= 0
Total Jobs Printed	= 1
Average Job Size	= 1.0
Average Coverage	= 5

Status Log

Code : Page
0 :

Clean the device

Clean the outside of the device with a clean, damp cloth when necessary.

△ **CAUTION:** Do not use ammonia-based cleaners on or around the device.

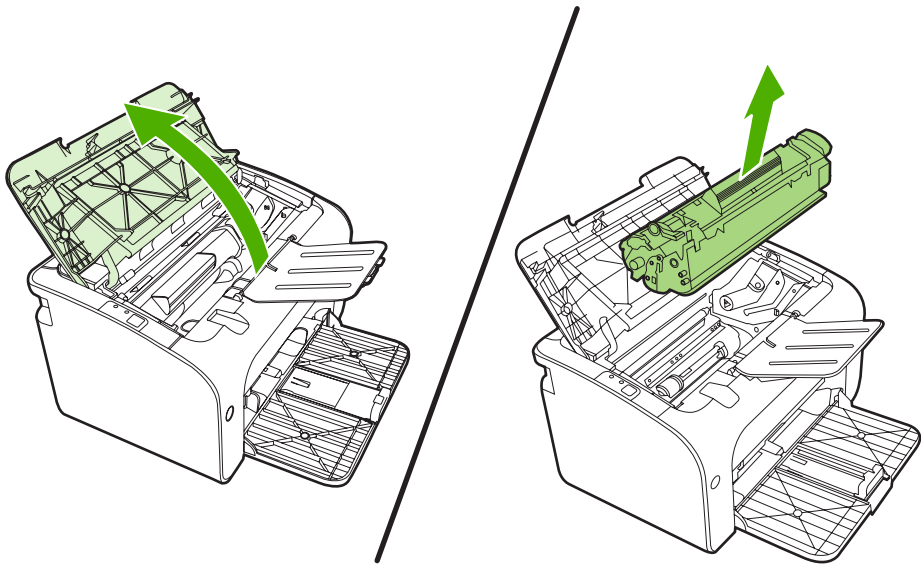
During the printing process, paper, toner, and dust particles can accumulate inside the device. Over time, this buildup can cause print quality problems, such as toner specks or smearing, and paper jams. To correct and prevent these types of problems, clean the print cartridge area and the device media path.

Clean the print-cartridge area

You do not need to clean the print-cartridge area often. However, cleaning this area can improve the quality of the printed sheets.

⚠ **WARNING!** Before cleaning the device, turn the device off by unplugging the power cord, and wait for the device to cool.

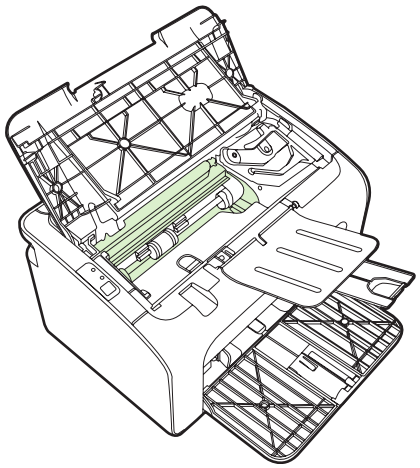
1. Unplug the power cord from the device. Open the print-cartridge door, and remove the print cartridge.



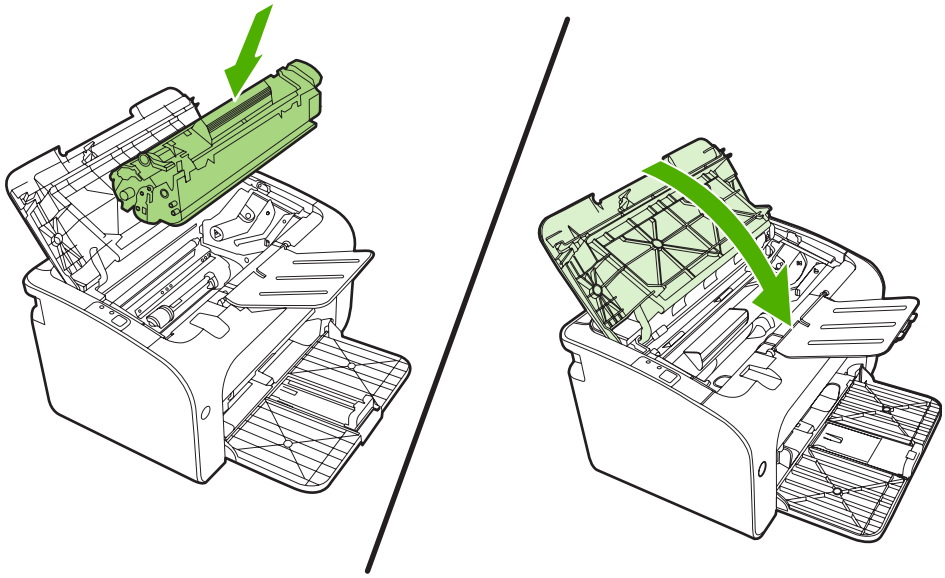
△ **CAUTION:** Do not touch the black-sponge transfer roller inside the device. Doing so can damage the device.

CAUTION: To prevent damage, do not expose the print cartridge to light. Cover it with a piece of paper.

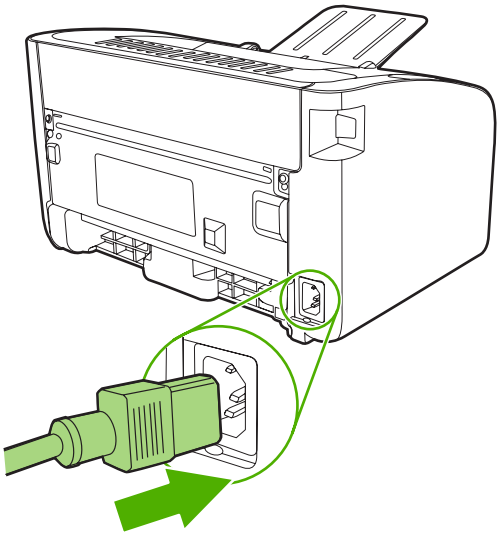
2. With a dry, lint-free cloth, wipe any residue from the paper-path area and the print-cartridge cavity.



3. Replace the print cartridge, and close the print-cartridge door.

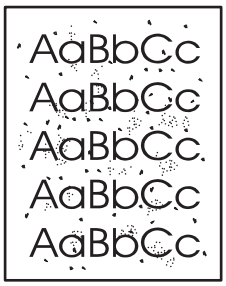


4. Plug the power cord into the device.



Clean the device paper path

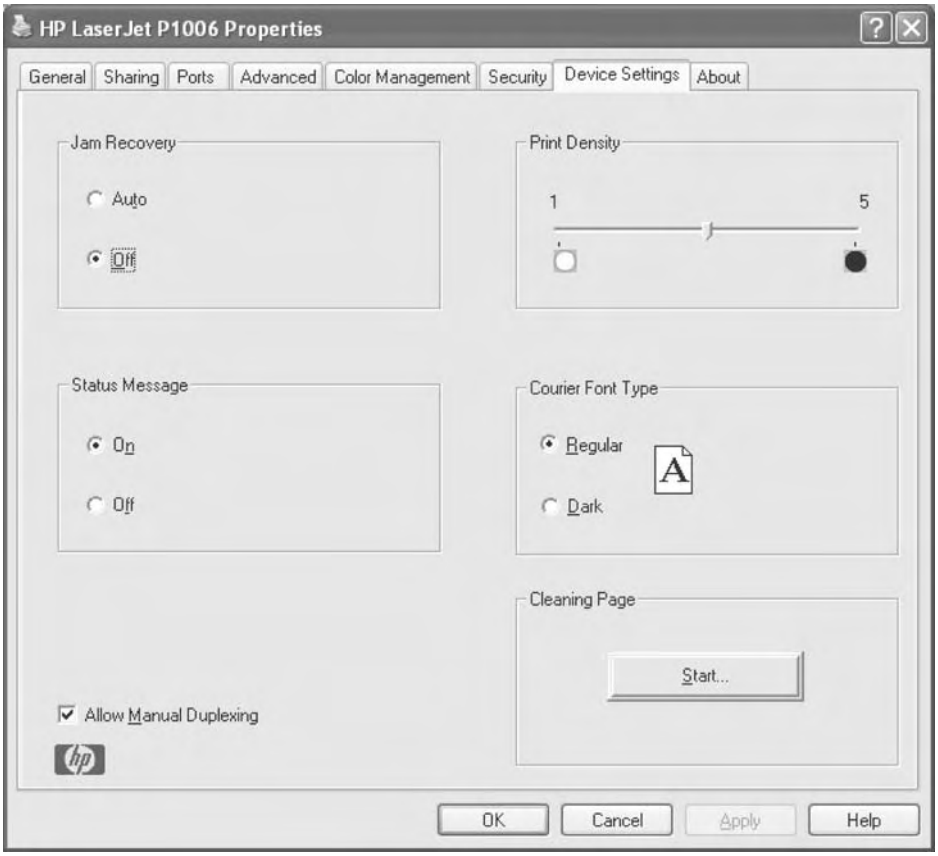
If you are experiencing toner specks or dots on the printouts, clean the paper path. This process uses a transparency to remove dust and toner from the paper path. Do not use bond or rough paper.



NOTE: For best results use a sheet of transparency. If you do not have any transparencies, you can use copier-grade media (70 to 90 g/m^2 (18 to 24 lb.)) that has a smooth surface.

1. Make sure that the device is idle and the Ready light is on.
2. Load the media in the input tray.

3. Print a cleaning page. Access the printer **Properties** (or **Printing Preferences** in Windows 2000 and XP) then click on the **Device Settings** tab.



NOTE: The cleaning process takes approximately 2 minutes. The cleaning page will stop periodically during the cleaning process. Do not turn the device off until the cleaning process has finished. You might need to repeat the cleaning process several times to thoroughly clean the device.

Change the pickup roller

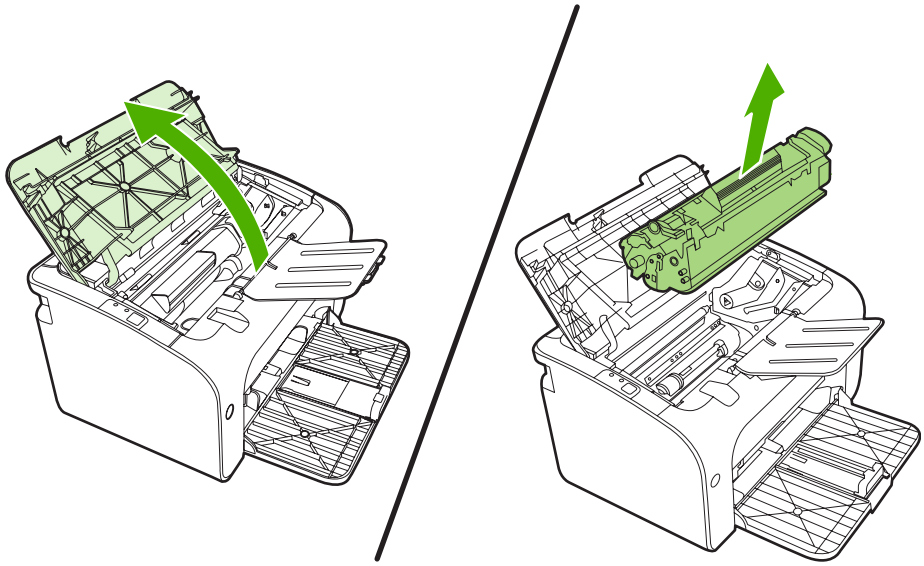
Normal use with good media causes wear. The use of poor media might require more frequent replacement of the pickup roller.

If the device regularly mispicks (no media feeds through), you might need to change or clean the pickup roller. See Clean the pickup roller on page 20 to order a new pickup roller.

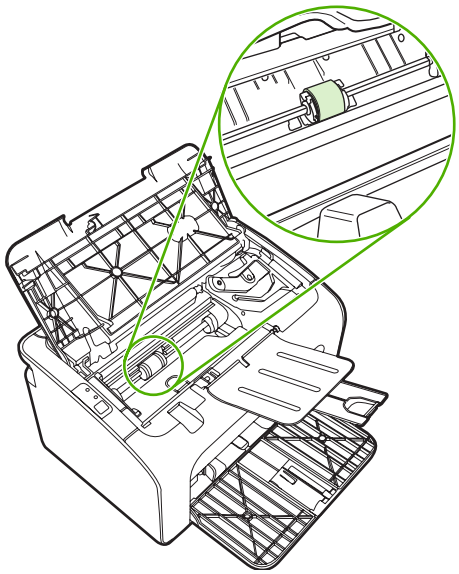
△ **CAUTION:** Failure to complete this procedure might damage the device.

1. Open the print-cartridge door, and remove the old print cartridge. See the recycling information inside the print-cartridge box.

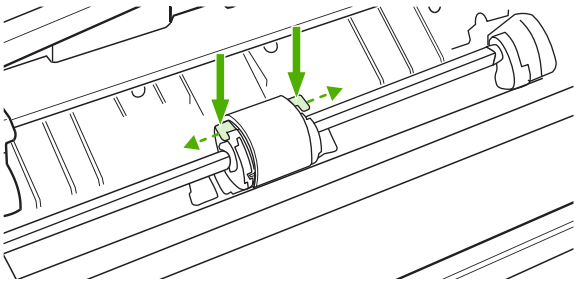
   △ **CAUTION:** To prevent damage to the print cartridge, minimize its exposure to direct light. Cover the print cartridge with a sheet of paper.



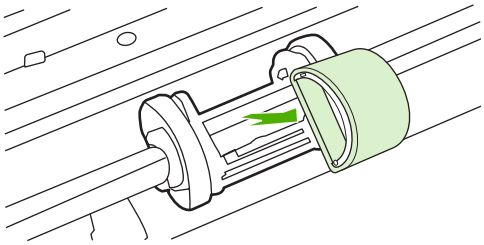
2. Find the pickup roller.



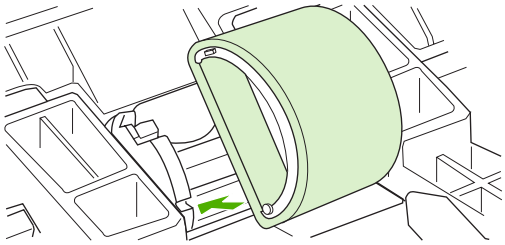
3. Release the small tabs on each side of the pickup roller, and rotate the pickup roller toward the front.



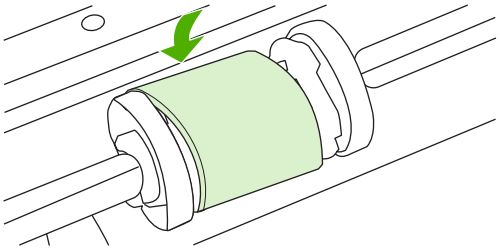
4. Gently pull the pickup roller up and out.



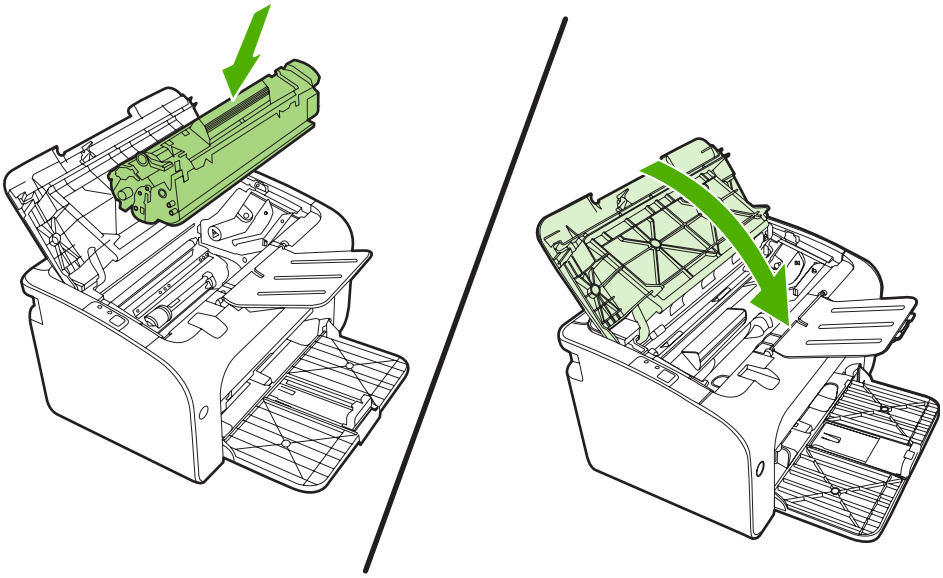
5. Position the new pickup roller in the slot. The circular and rectangular slots on each side prevents you from installing the roller incorrectly.



6. Rotate the top of the new pickup roller away from you until both sides snap into place.



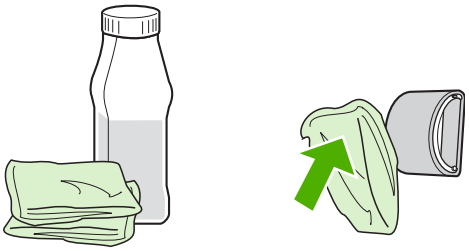
7. Insert the print cartridge in the device and close the print-cartridge door.



Clean the pickup roller

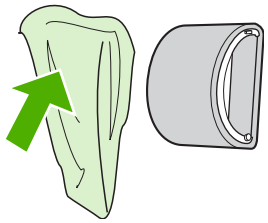
If you want to clean the pickup roller before deciding to replace it, follow these instructions:

1. Unplug the power cord from the device and remove the pickup roller as described in steps 1 through 5 of Change the pickup roller on page 17
2. Dab a lint-free cloth in isopropyl alcohol, and scrub the roller.

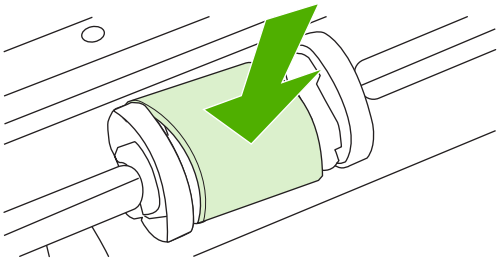


⚠ **WARNING!** Alcohol is flammable. Keep the alcohol and cloth away from an open flame. Before you close the device and plug in the power cord, allow the alcohol to dry completely.

3. Using a dry, lint-free cloth, wipe the pickup roller to remove loosened dirt.



4. Allow the pickup roller to dry completely before you reinstall it in the device.



5. Plug the power cord into the device.

Change the printer separation pad

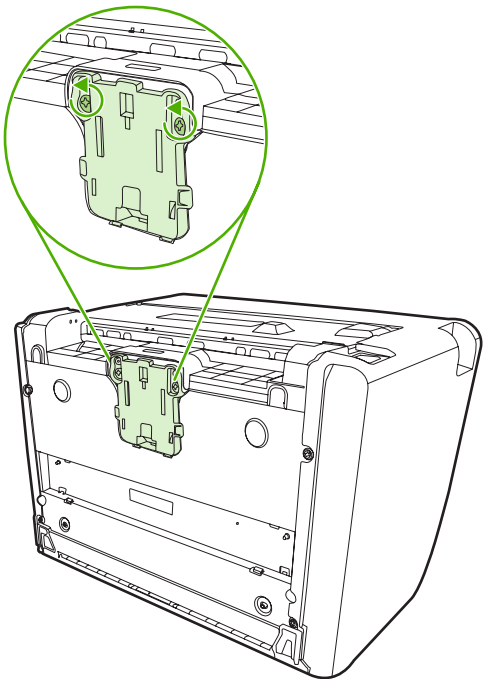
Normal use with good media causes wear. The use of poor media might require more frequent replacement of the separation pad.

If the device regularly pulls multiple sheets of media at a time, you might need to change the separation pad.

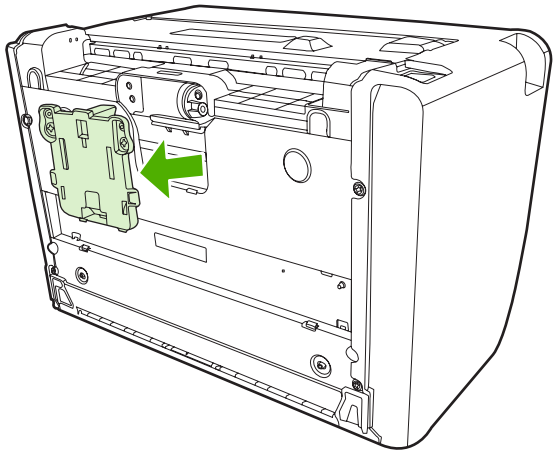
NOTE: Before you change the separation pad, clean the pickup roller. See Clean the pickup roller on page 20.

WARNING! Before changing the printer separation pad, turn the device off by unplugging the power cord, and wait for the device to cool.

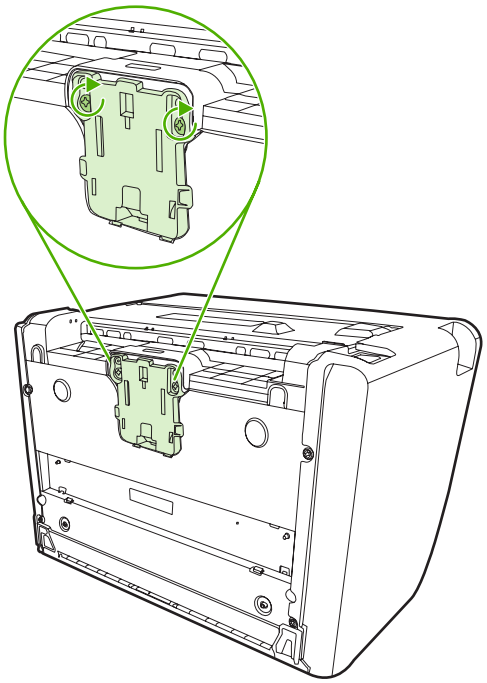
1. Unplug the device from the wall outlet.
2. Remove paper and close main input tray. Set device on its front.
3. At the bottom of the device, unscrew the two screws holding the separation pad in place.



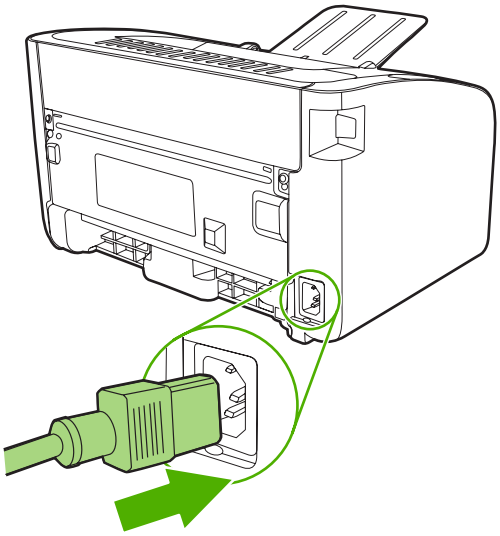
4. Remove the separation pad.



5. Insert the new separation pad, and screw it into place.



6. Plug the device into the wall outlet, and turn on the device.

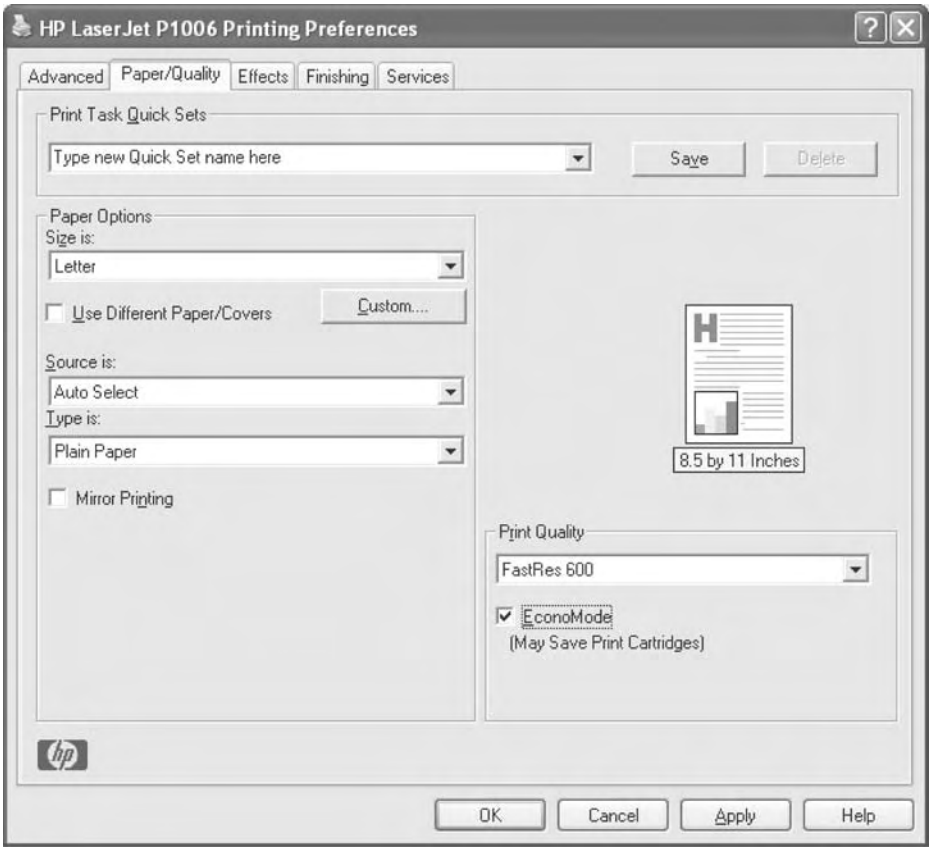


EconoMode

With EconoMode, the device uses less toner per page. Selecting this option can extend the life of the print cartridge and reduce your cost per page. However, it also reduces print quality. The printed image is lighter, but it is adequate for printing drafts or proofs.

HP does not recommend the full-time use of EconoMode. If EconoMode is used full-time, the toner supply might outlast the mechanical parts in the print cartridge. If print quality begins to degrade under these circumstances, you must install a new print cartridge even if toner remains in the cartridge.

1. To use EconoMode, open the printer **Properties** (or **Printing Preferences** in Windows 2000 and XP).
2. On the **Paper/Quality** tab or the **Finishing** tab (the **Paper Type/Quality** tab for some Mac drivers), select the **EconoMode** check box.



NOTE: Not all printer features are available in all drivers or operating systems. See the printer Properties (driver) online Help for information about availability of features for that driver.

3 Theory of operation

- Introduction
- Internal components
- Timing
- Engine control system
- Laser/scanner system
- Pickup/feed/delivery system
- Image-formation system

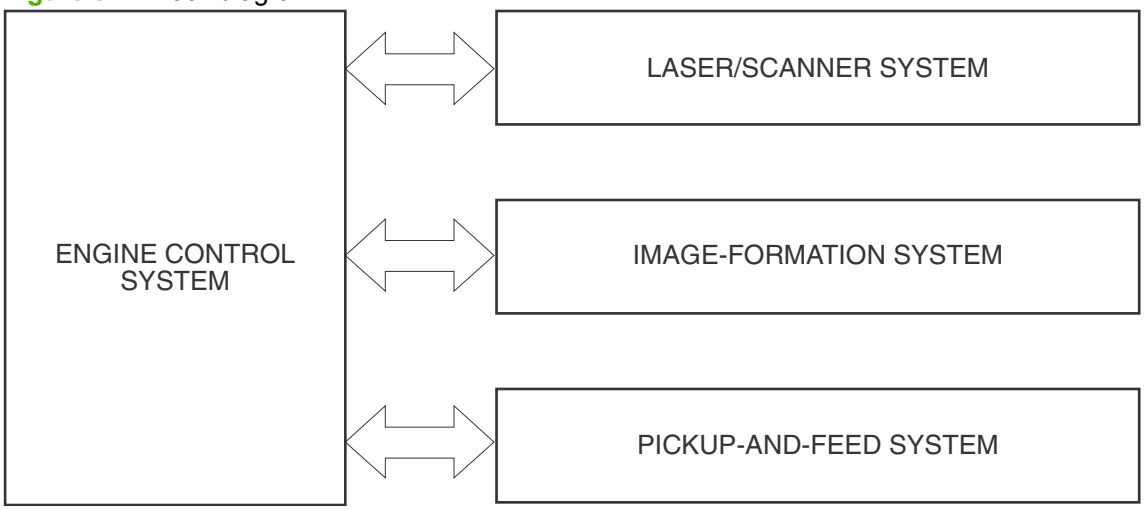
Introduction

This chapter presents an overview of the relationships between major components in the printer, and includes a detailed discussion of the image-formation system. The following systems are discussed:

- Engine control system
- Laser/scanner system
- Pickup/feed/delivery system
- Image-formation system

Figure 3-1 Block diagram on page 26 illustrates the relationships among the four systems.

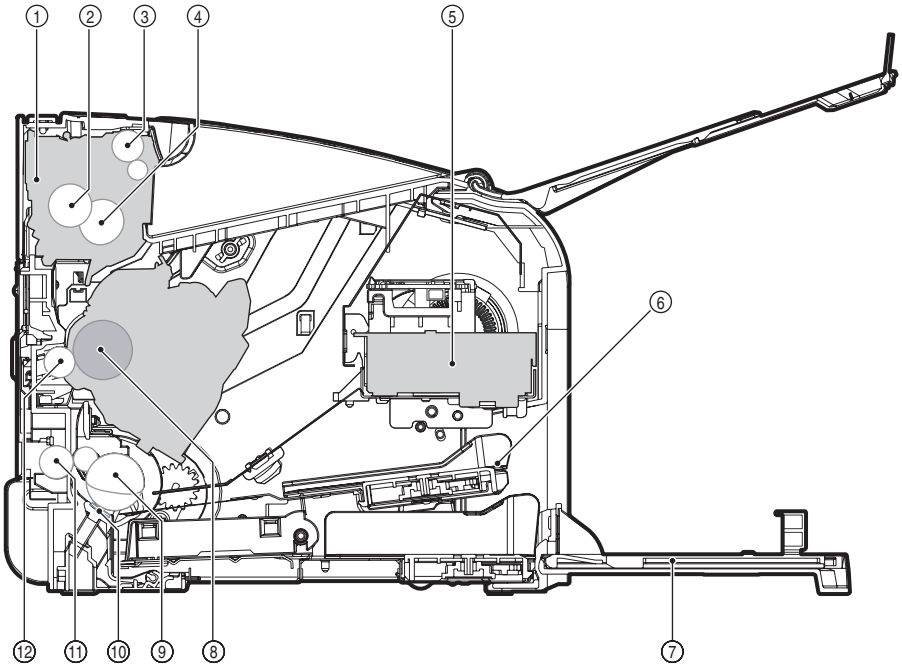
Figure 3-1 Block diagram



Internal components

Figure 3-2 Cross-section of printer on page 27 highlights the major internal components.

Figure 3-2 Cross-section of printer



1	Fusing unit
2	Pressure roller
3	Delivery roller
4	Fusing film
5	Laser/scanner unit
6	Single-sheet-feed slot (HP LaserJet P1006/P1008 only)
7	Multi-purpose tray
8	Photosensitive drum
9	Pickup roller
10	Separation pad
11	Feed roller
12	Transfer roller

Timing

Sequence of operation

Operation sequences are controlled by the microprocessor on the DC controller. Table 3-1 Sequence of operation on page 28 describes engine operations for each period of a print operation.

Table 3-1 Sequence of operation

Name	Timing	Purpose
WAIT	From power-on until the end of the main motor initial drive	Detects presence of a print cartridge. Clears potential from the drum surface and cleans the transfer roller.
STBY (standby)	From the end of the WAIT or LSTR period until either a print command is sent from the formatter or the power is turned off.	Prepares the printer to receive print commands
INTR (initial rotation)	From the time of the print command until the pickup solenoid is turned on.	Prepares the photosensitive drum for printing.
PRINT	From the end of the INTR period until the last page completes the fusing operation.	Forms the image on the photosensitive drum and transfers the toner image to the media.
LSTR (last rotation)	From the end of the PRINT period until the main motor stops rotating.	Delivers the last page of a print job. After LSTR, the printer either returns to STBY or, if another print command was sent from the formatter, enters INTR.

Engine control system

The engine control system coordinates all printer functions, according to commands sent from the formatter. It drives the laser/scanner system, the image-formation system, and the pickup/feed/delivery system.

The engine control system contains the following components:

- DC controller
- Low-voltage power supply
- High-voltage power supply
- Fusing control

Figure 3-3 Engine control system

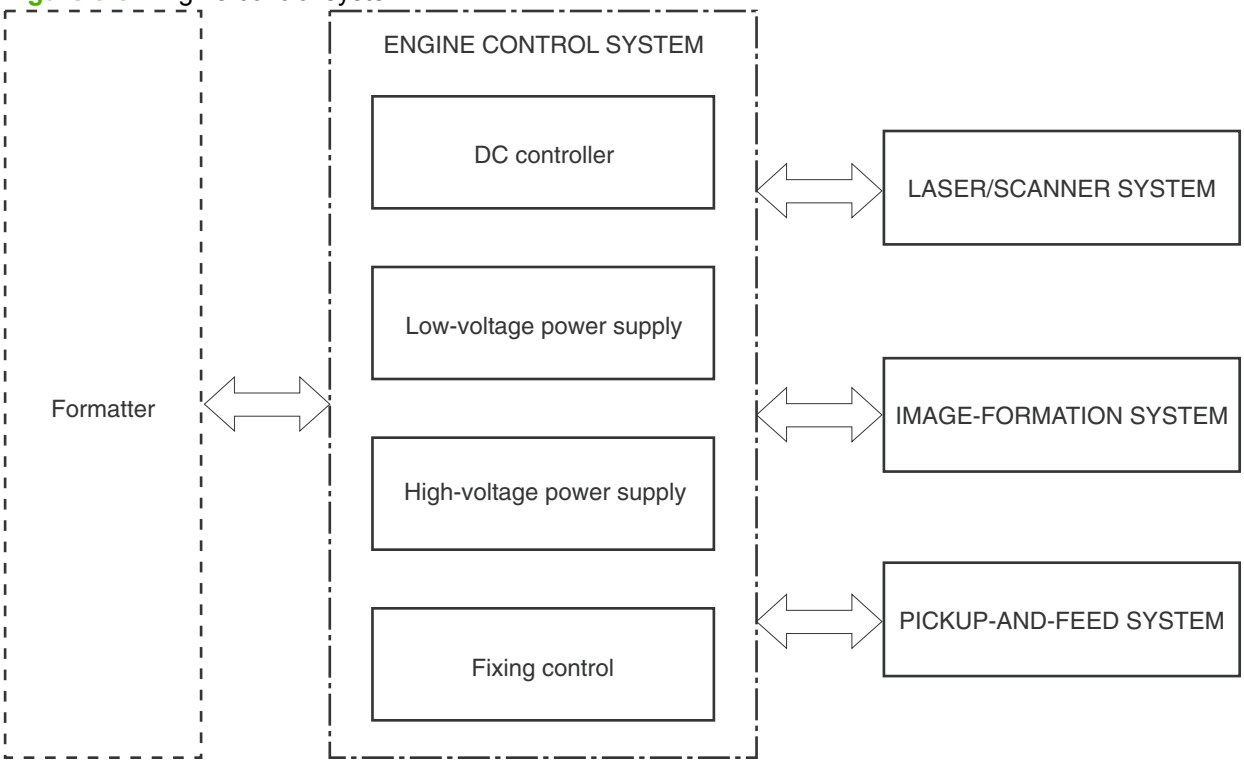
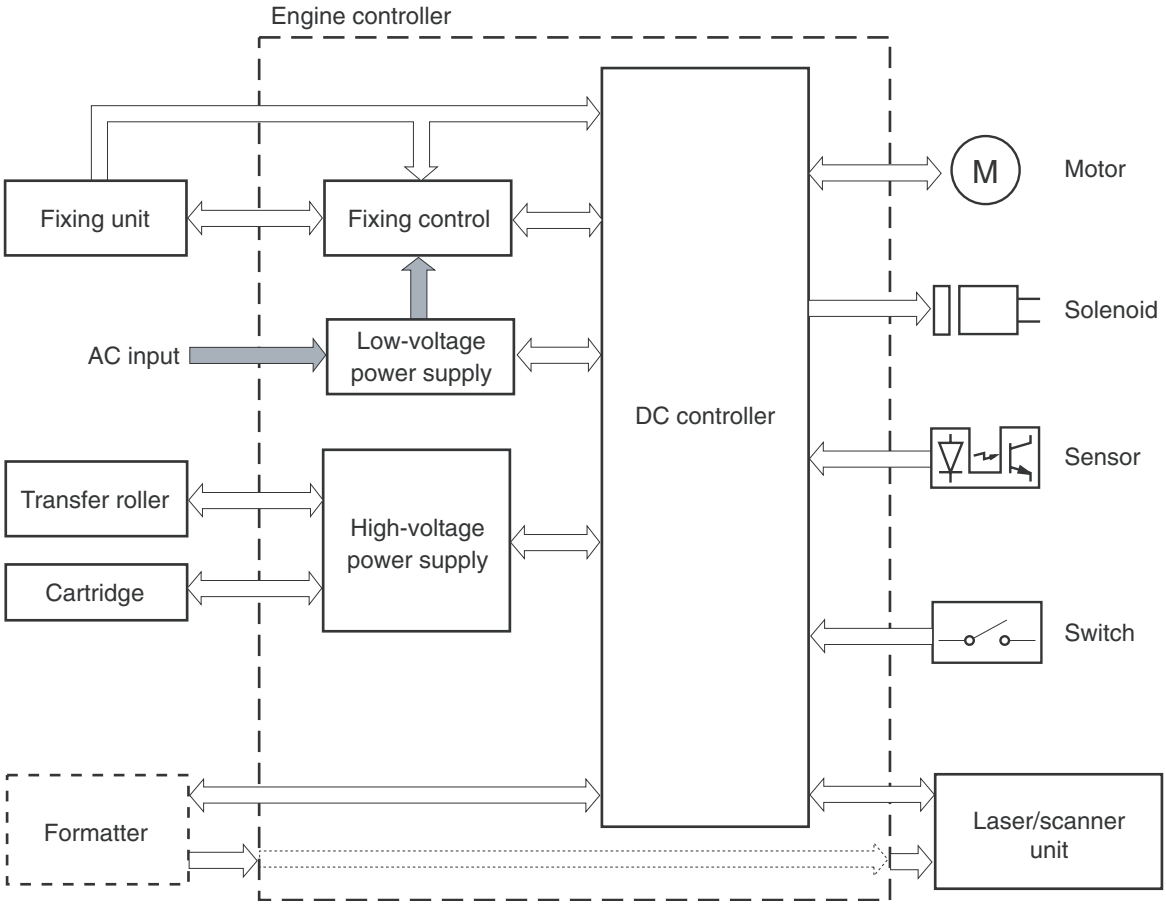


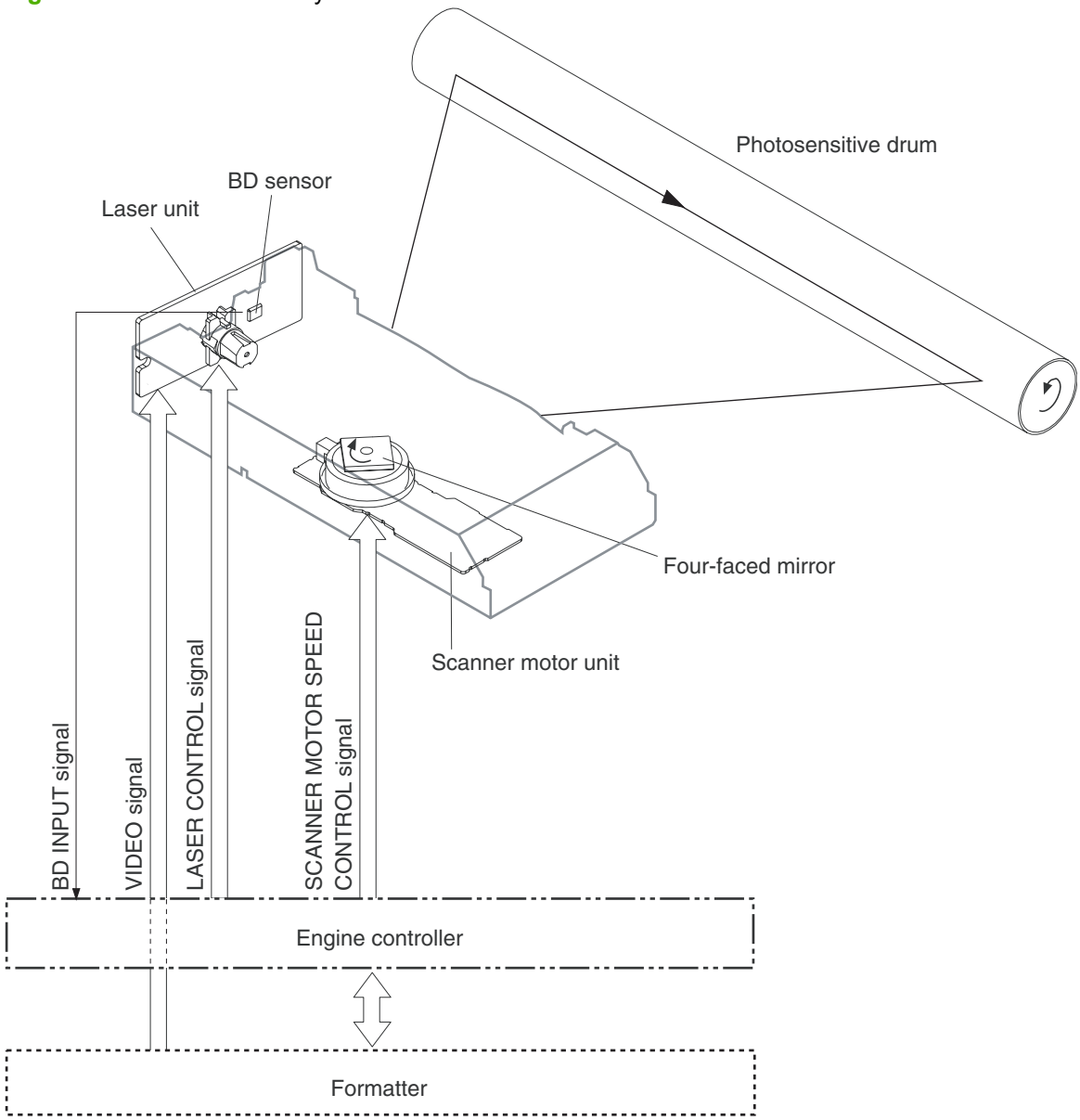
Figure 3-4 Engine control system circuit diagram



Laser/scanner system

The laser/scanner system receives video signals from the dc controller and the formatter and converts the signals into latent images on the photosensitive drum.

Figure 3-5 Laser/scanner system



Pickup/feed/delivery system

The pickup/feed/delivery system consists of several types of feed rollers and sensors. The dc controller uses two motors and two solenoids to drive the rollers. Three media-detection sensors detect media as it passes through the printer. If media does not reach or pass each sensor within a specified time period, the dc controller determines that a jam has occurred and alerts the formatter.

The following components are identified in Figure 3-6 Pickup/feed/delivery system on page 32:

- M1, main motor
- SL1, pickup solenoid
- PS701, fuser delivery sensor
- PS702, media-width sensor
- PS751, top-of-page sensor

Figure 3-6 Pickup/feed/delivery system

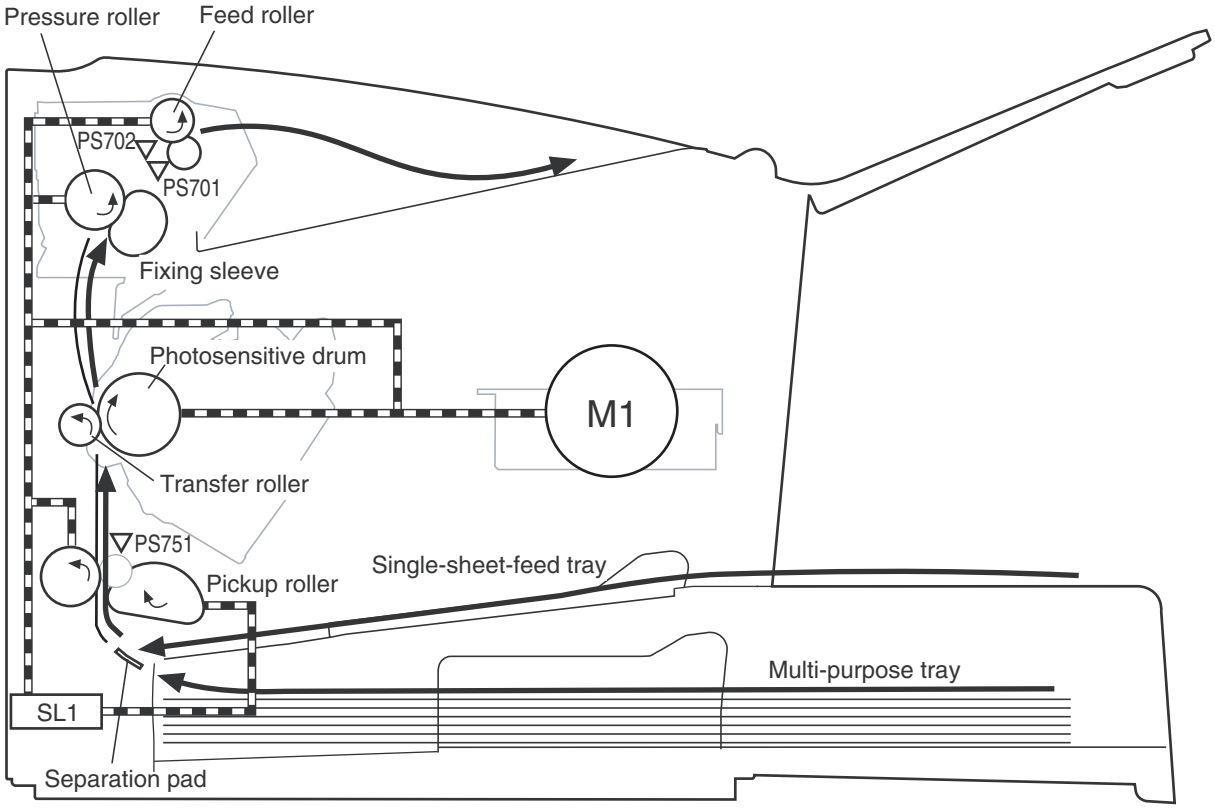


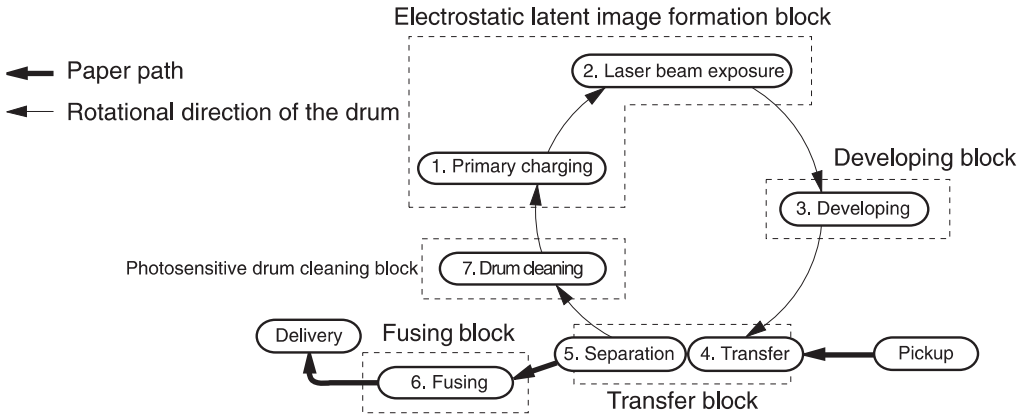
Image-formation system

Laser printing requires the interaction of several different technologies, including electronics, optics, and electrophotographics, to provide a printed page. Each process functions independently and must be coordinated with the other printer processes. Image formation consists of the following five processes:

- electrostatic latent-image formation
- developing
- transfer
- fusing
- drum cleaning

The five processes contain eight steps.

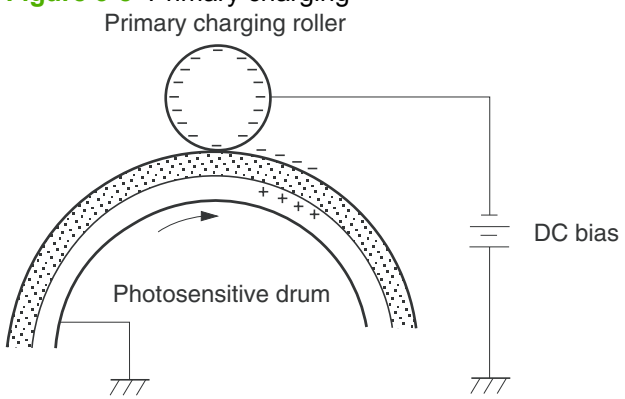
Figure 3-7 Image-formation system



Step 1: Primary charging

The DC bias is applied to the primary charging roller, which transfers a uniform negative potential to the photosensitive drum.

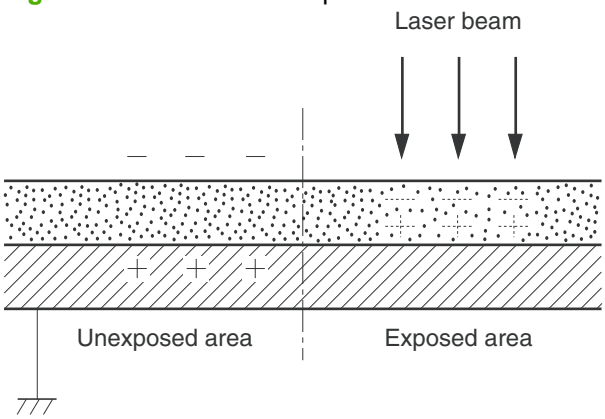
Figure 3-8 Primary charging



Step 2: Laser beam exposure

The laser beam scans the photosensitive drum to neutralize negative charges on parts of the drum. An electrostatic latent image is formed on the drum where negative charges were neutralized.

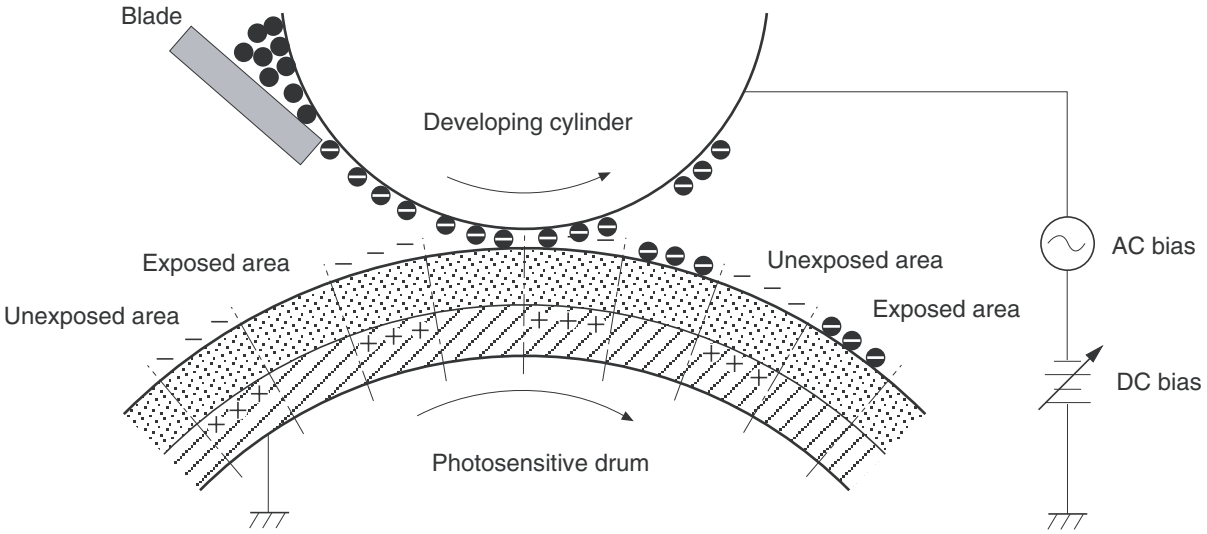
Figure 3-9 Laser beam exposure



Step 3: Developing

The toner acquires a negative charge from the friction that occurs when the developing cylinder rotates against the developing blade. When the negatively charged toner comes in contact with the drum, it adheres to the electrostatic latent image because the drum surface has a higher potential. The image on the drum becomes visible because of the toner. The AC bias that is superimposed over the develping negative DC bias is applied to the developing cylinder.

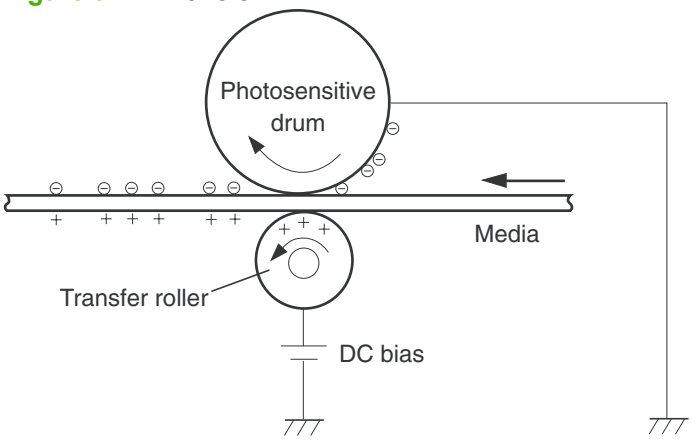
Figure 3-10 Developing



Step 4: Transfer

The positive DC bias is applied to the transfer roller. As the media passes between the transfer roller and the photosensitive drum, the transfer roller applies a positive DC bias to the media. The positively charged media attracts the negatively charged toner from the drum surface.

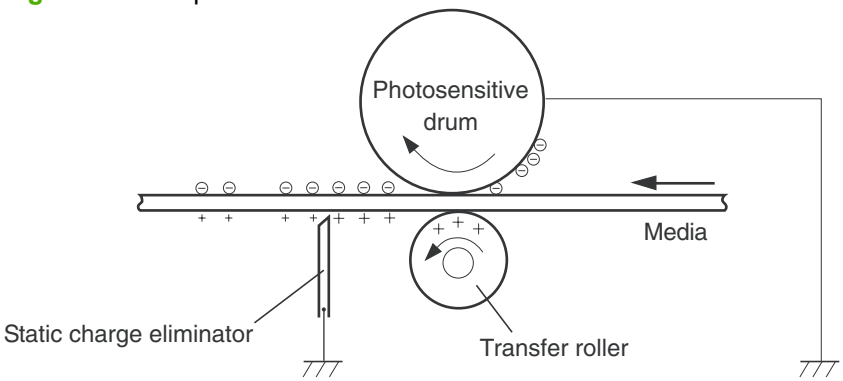
Figure 3-11 Transfer



Step 5: Separation

The elasticity of the print media causes its separation from the photosensitive drum. A static charge eliminator aids separation by weakening any electrostatic adhesion.

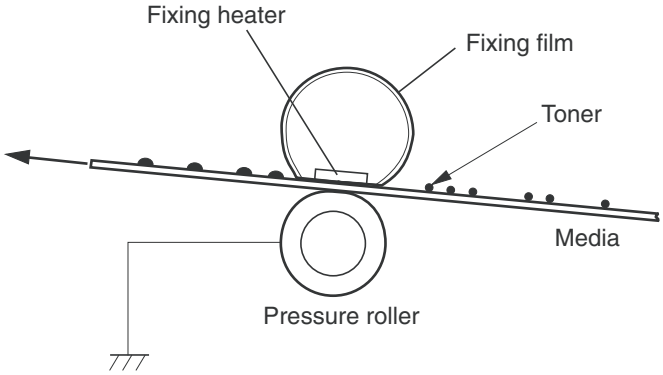
Figure 3-12 Separation



Step 6: Fusing

The printer uses the on-demand fusing method to permanently fuse the toner image to the media using heat and pressure.

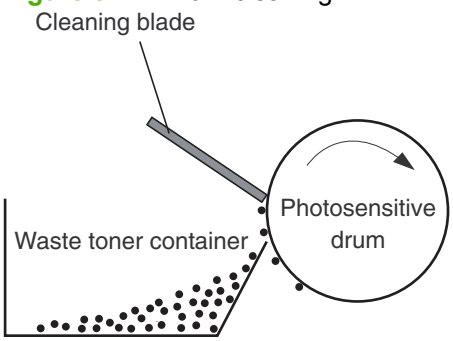
Figure 3-13 Fusing



Step 7: Drum cleaning

The cleaning blade scrapes the residual toner off the photosensitive drum and deposits it into the waste toner case.

Figure 3-14 Drum cleaning



4 Removal and replacement

- Introduction
- Before performing service
- Covers
- Formatter
- Fuser
- Laser/scanner
- DC controller
- Transfer roller
- Motor drive belt
- Rear paper-feed roller
- Main motor

Introduction

This chapter documents removal and replacement of field replaceable units (FRUs) only.

Removal and replacement strategy

Replace parts in the reverse order of their removal. Directions for difficult or critical replacement procedures are included.

⚠ **WARNING!** The sheet-metal edges of the product can be sharp. Use caution when working on the product.

NOTE: Note the length, diameter, color, type, and location of each screw. Be sure to return each screw to its original location during reassembly.

Incorrectly routed or loose wire harnesses can interfere with other internal components and can become damaged or broken. Frayed or pinched harness wires can be difficult to locate. When replacing wire harnesses, always use the provided wire loops, lance points, or wire-harness guides.

Electrostatic discharge

△ **CAUTION:** The product contains parts that are sensitive to electrostatic discharge (ESD). Always service the product at an ESD-protected workstation, or use an ESD mat.

Watch for the ESD symbol to identify the parts that are sensitive to ESD. Protect these parts by using an ESD wrist strap and by placing ESD-sensitive parts into protective ESD pouches.

Required tools

The following tools are needed to service this product:

- #2 Phillips screwdriver with magnetic tip
- Small flat-blade screwdriver
- Small needle-nose pliers
- ESD mat
- Penlight

△ **CAUTION:** A pozidrive screwdriver can damage the screw heads on the product. Use a #2 Phillips screwdriver.

If you use a multispeed screwdriver, use a torque limiter.

Before performing service

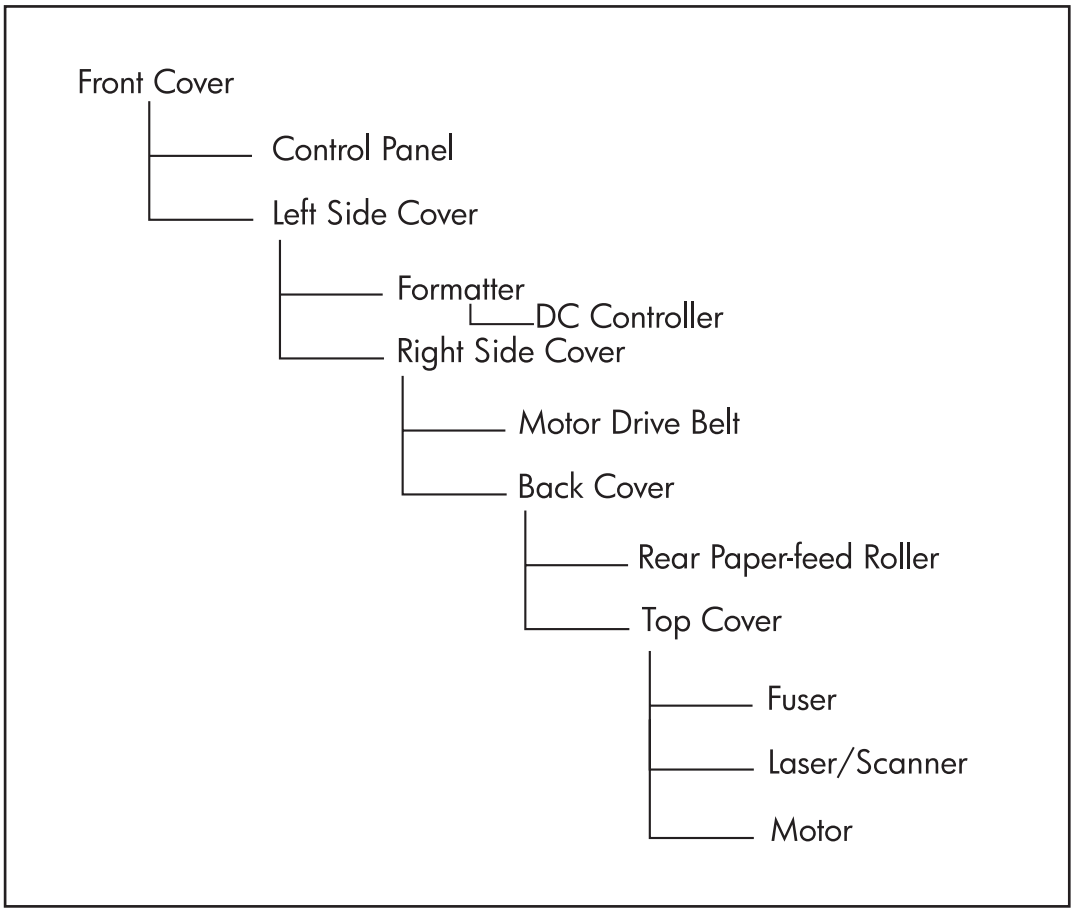
Follow the pre-service procedures before you perform service.

Pre-service procedures

1. Remove all media from the product.
2. Place the product on an ESD mat. If an ESD mat or an ESD-protected workstation is not available, discharge body static and ground the product chassis before servicing the product.
3. Remove the print cartridge.
4. Unplug the power cord and the interface cable.

Parts removal order

Use the following diagram to determine which parts must be removed before removing other parts.

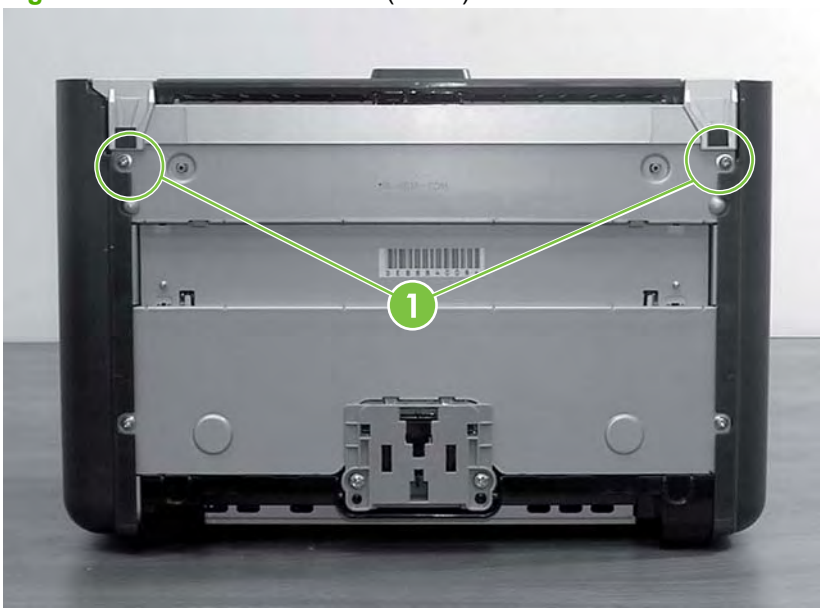


Covers

Front Cover

1. Turn the device over so that it is resting on its back.
2. Using a flat-blade screwdriver, lift the plastic edges of the front cover out of their sockets (callout 1) and rotate the cover back.

Figure 4-1 Remove front cover (1 of 1)



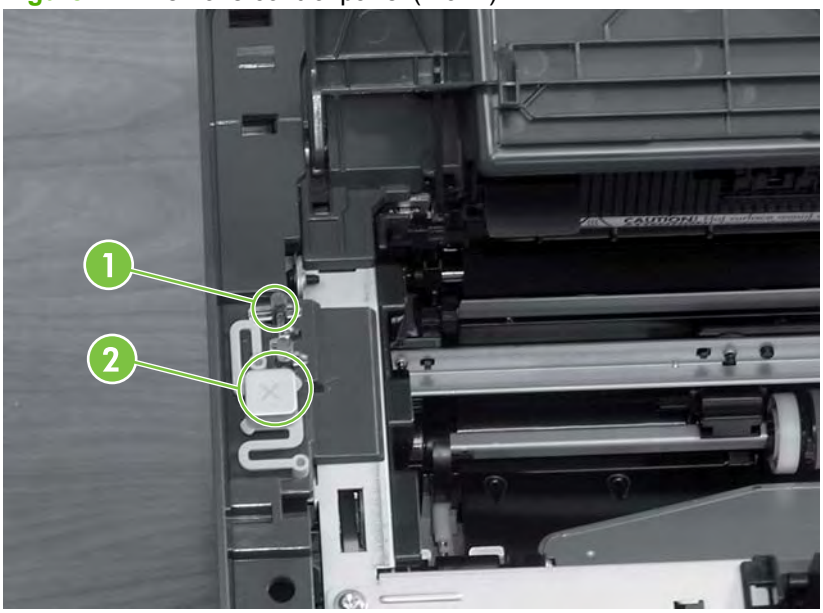
Control panel

1. Remove the front cover. See Front Cover on page 40.
2. Remove control panel cover by prying up the leading edge, then sliding it towards the front of the printer and lifting it out.

3. Remove light-pipe (callout 1) and button (callout 2).

NOTE: The button (callout 2) is only present on the HP LaserJet P1006/P1008 and does not need to be removed from the HP LaserJet P1005/P1007.

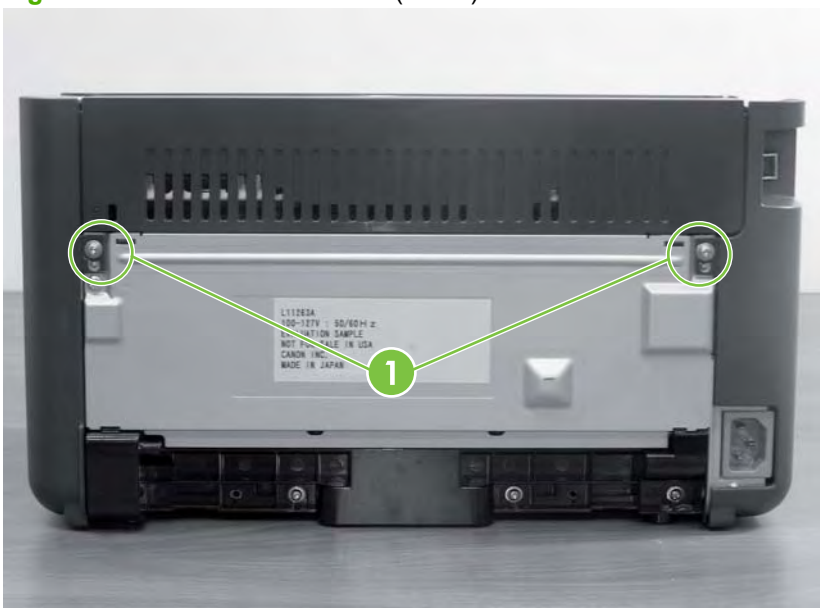
Figure 4-2 Remove control panel (1 of 1)



Side Covers

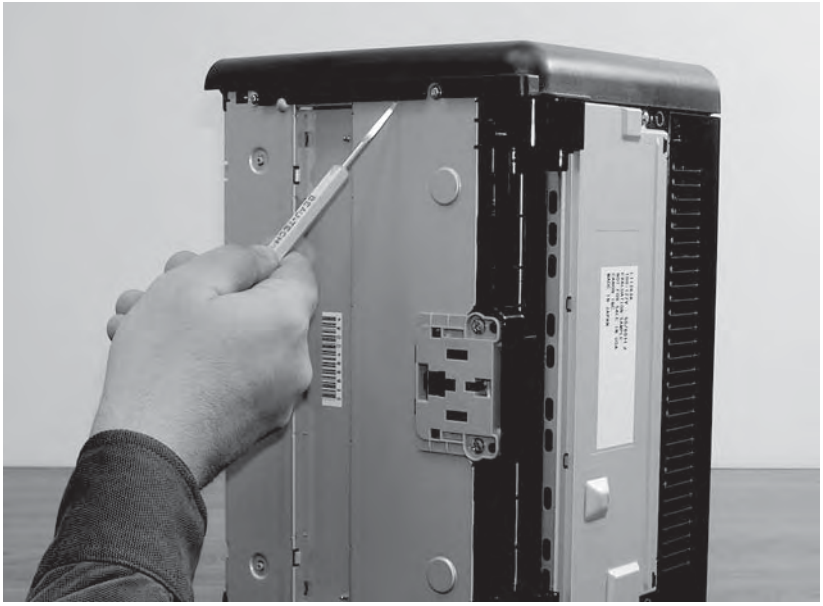
1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove two screws (callout 1).

Figure 4-3 Remove side covers (1 of 4)



4. Turn the device on its left side. Remove the right side cover by using a small flat blade screwdriver to lift it out of the socket. A small arrow in the plastic indicates where the leverage should be applied. Rotate the cover towards the front of the device and remove it.

Figure 4-4 Remove side covers (2 of 4)



5. Turn the device on its right side. There are three catches that must be released. Use a small flat blade screwdriver to release the catch on the back of the printer (callout 1) and the bottom of the printer (callout 2). Then open the top of the printer and release the catch on the inside (callout 3). Once all three catches are released, rotate the cover towards the front of the device and remove it.

Figure 4-5 Remove side covers (3 of 4)

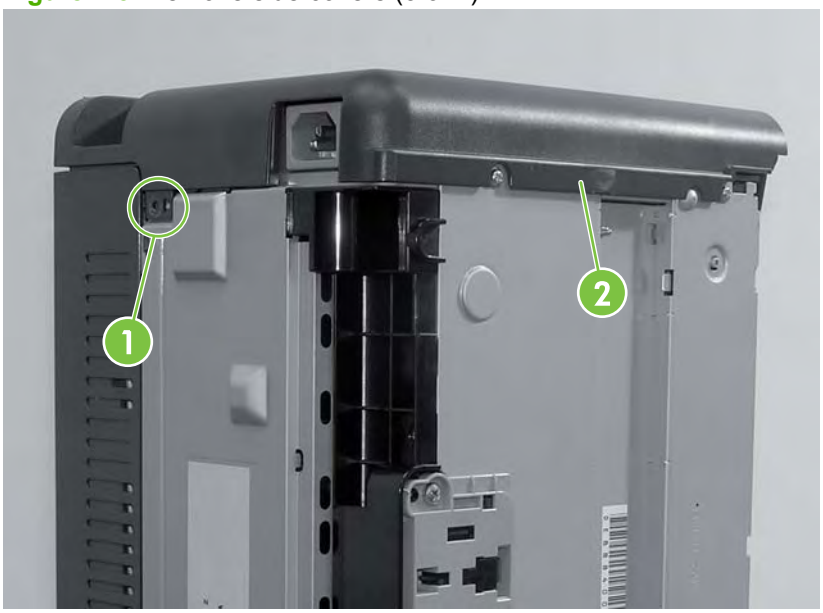
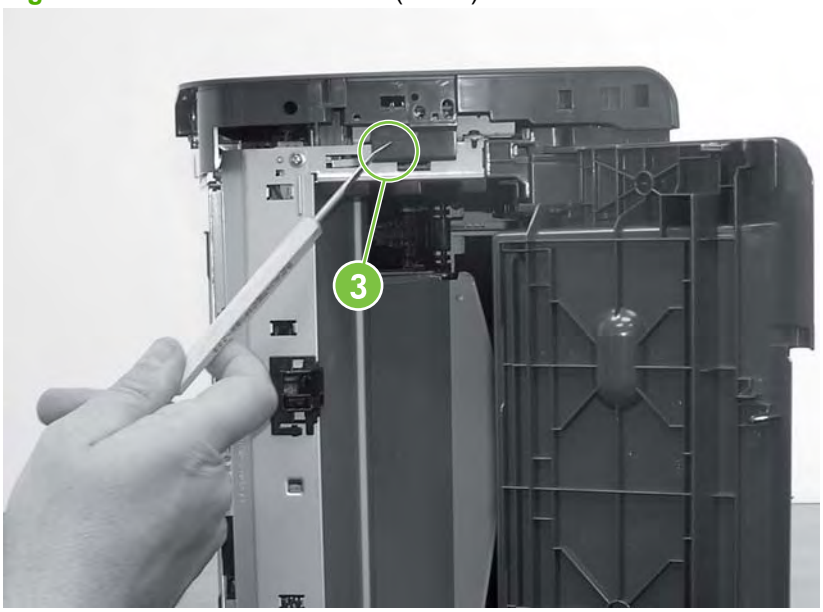


Figure 4-6 Remove side covers (4 of 4)

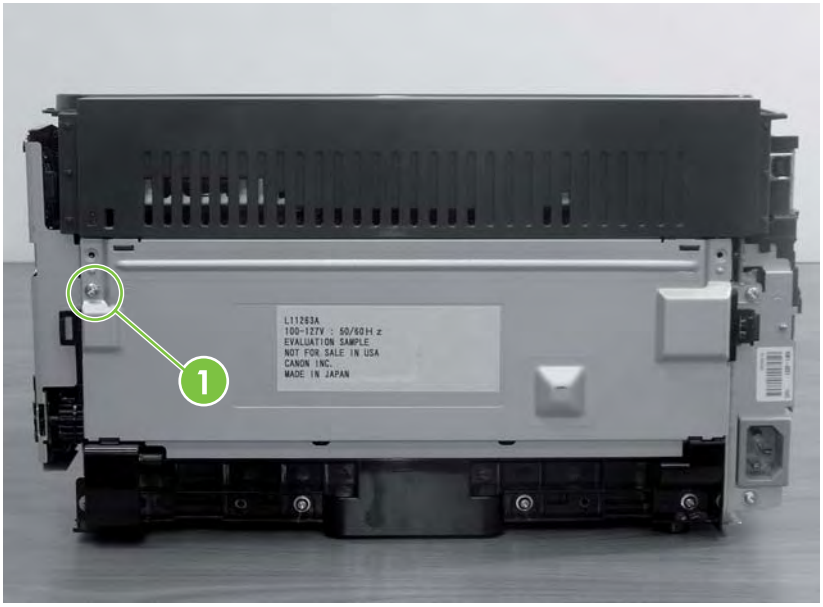


Back Cover

1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove both side covers. See Side Covers on page 41.

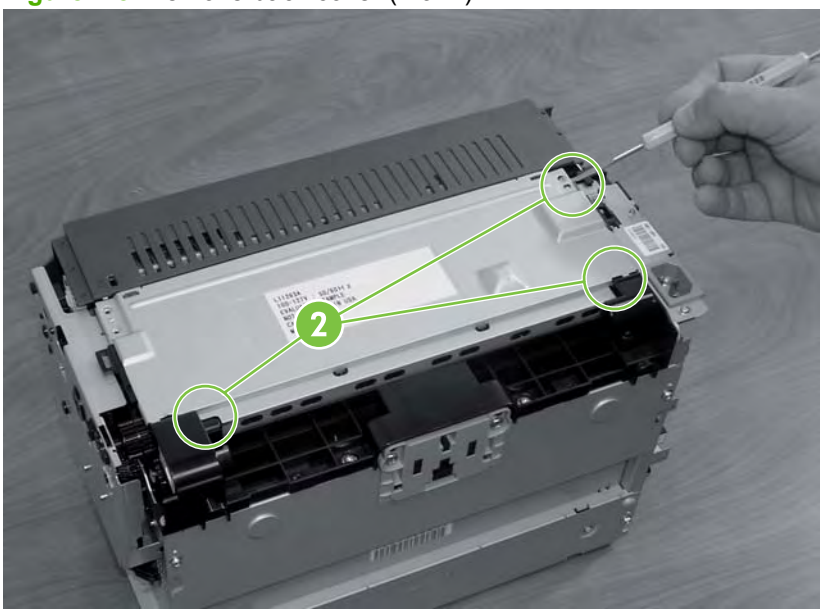
4. Remove one grounding screw (callout 1).

Figure 4-7 Remove back cover (1 of 2)



5. Lift plate in three of the four corners (callout 2) to pop the plate off. Use a small flat blade screwdriver to get leverage on each of the corners.

Figure 4-8 Remove back cover (2 of 2)

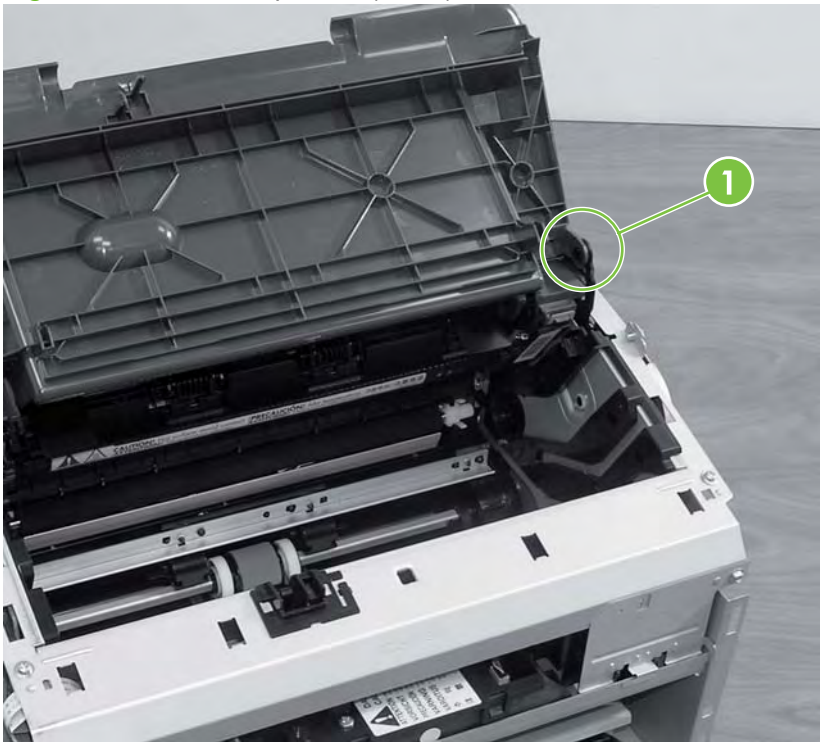


Top Cover

1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove both side covers. See Side Covers on page 41.
4. Remove the back cover. See Back Cover on page 43.

5. Separate the tabs (callout 1) and lift the top cover off of the device.

Figure 4-9 Remove top cover (1 of 1)

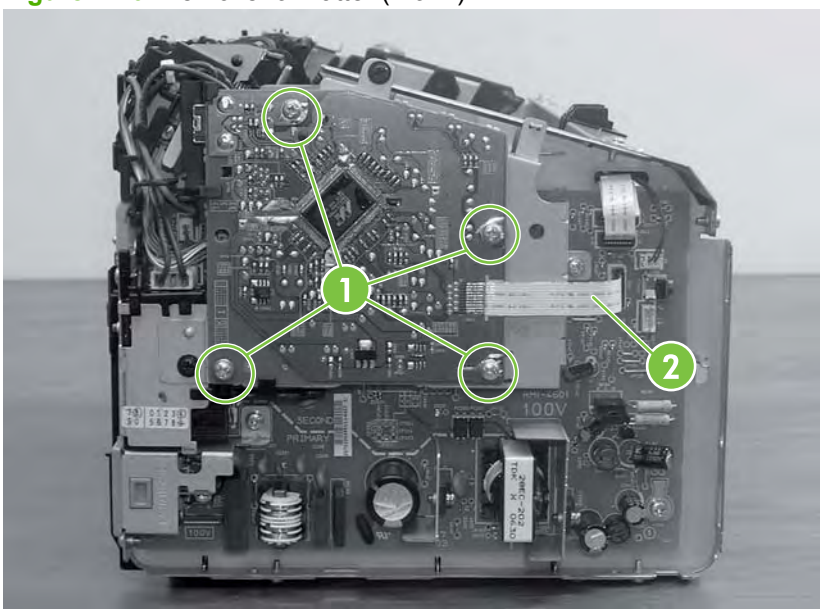


NOTE: There are two link arms that slide through slots in the top cover. They are disengaged when the cover is removed. Be sure to feed the link arms back through the slots when reinstalling the top cover.

Formatter

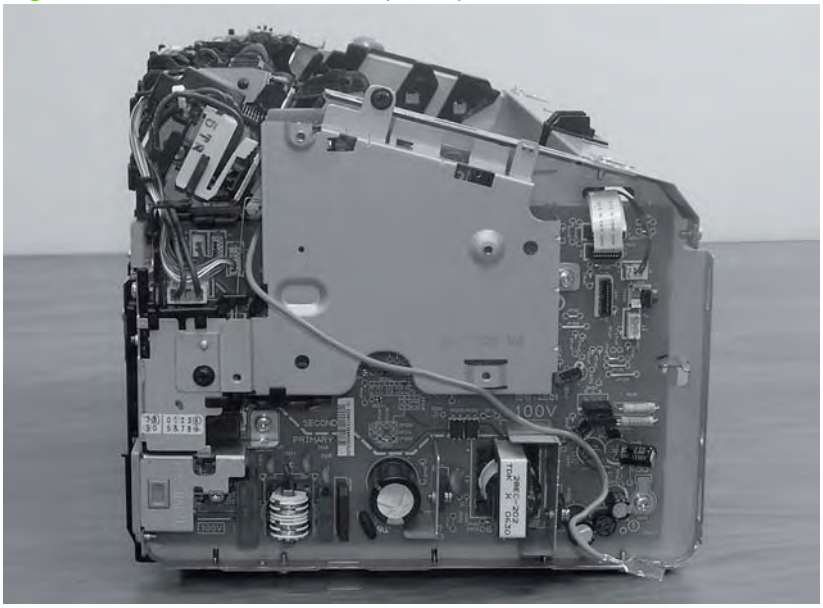
1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove the left side cover. See Side Covers on page 41.
4. Remove four screws (callout 1) and unplug the cable (callout 2).

Figure 4-10 Remove formatter (1 of 2)



5. Remove the formatter board.

Figure 4-11 Remove formatter (2 of 2)

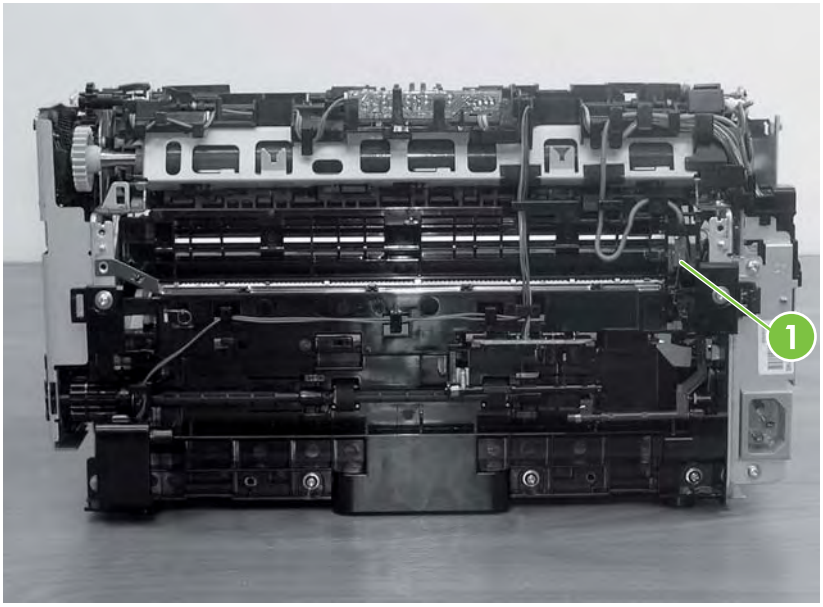


NOTE: When reinstalling the formatter board, place the board on the support bracket first and align holes before attaching it with the screws.

Fuser

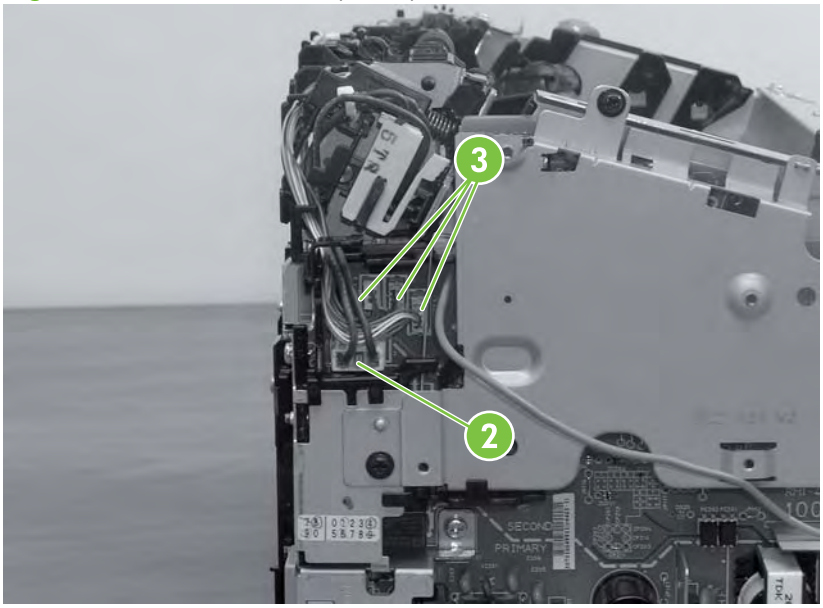
1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove both side covers. See Side Covers on page 41.
4. Remove the back cover. See Back Cover on page 43.
5. Remove the top cover. See Top Cover on page 44.
6. Unplug and unthread the red wire from the retaining clips (callout 1).

Figure 4-12 Remove fuser (1 of 6)



7. Unplug the power connector (callout 2). Unplug the remaining three connectors (callout 3).

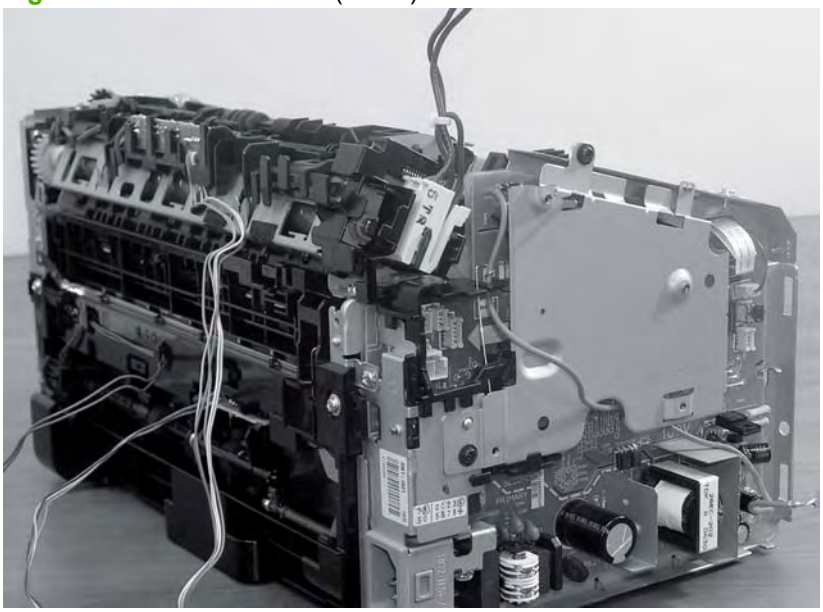
Figure 4-13 Remove fuser (2 of 6)



NOTE: When removing the thin two-wire connector on the left, use a small flat-blade screwdriver to flex out the left side of the cable socket so that the cable comes free without damaging the cable or the socket.

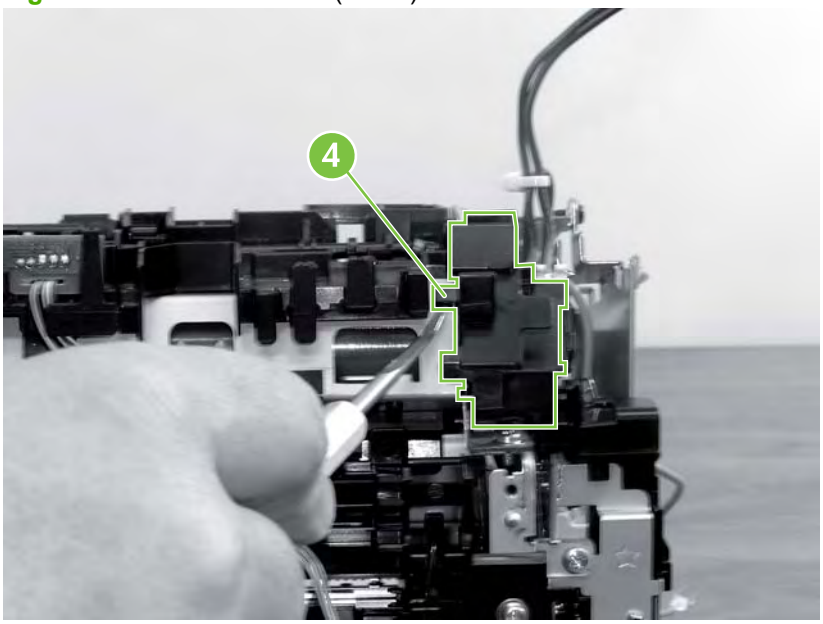
8. Unthread the wires from the retaining clips in the rear of the device.

Figure 4-14 Remove fuser (3 of 6)



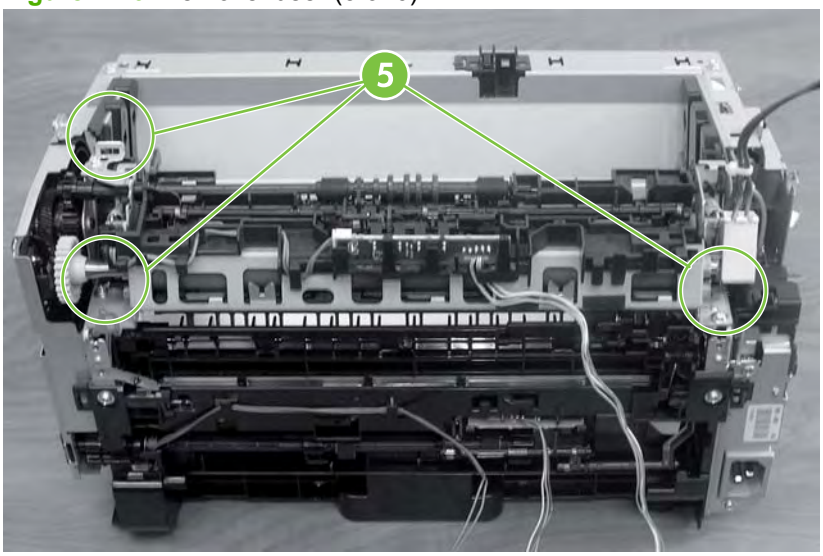
9. Remove the black plastic cable guide from the rear of the device (callout 4). Use a tool to push on the tab from the left as indicated.

Figure 4-15 Remove fuser (4 of 6)



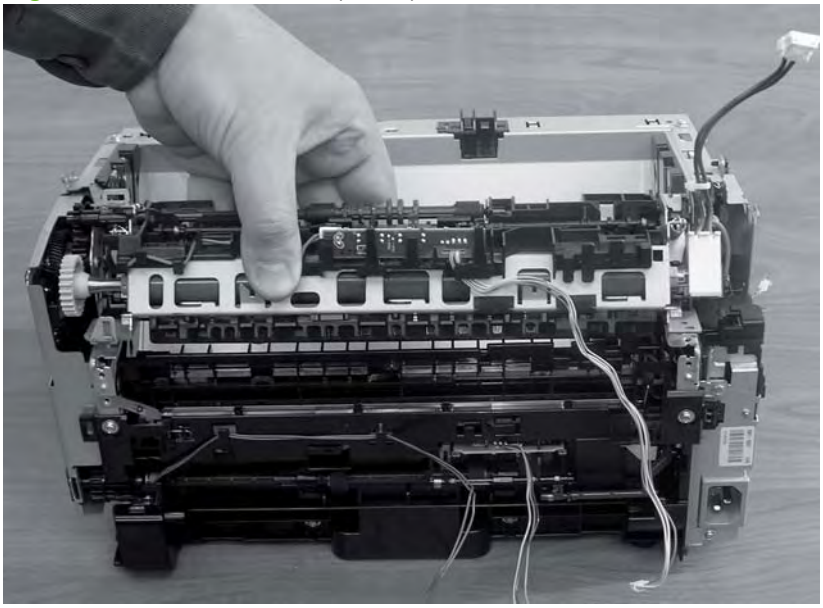
10. Remove three screws from top of device (callout 5).

Figure 4-16 Remove fuser (5 of 6)



11. Remove the fuser assembly.

Figure 4-17 Remove fuser (6 of 6)

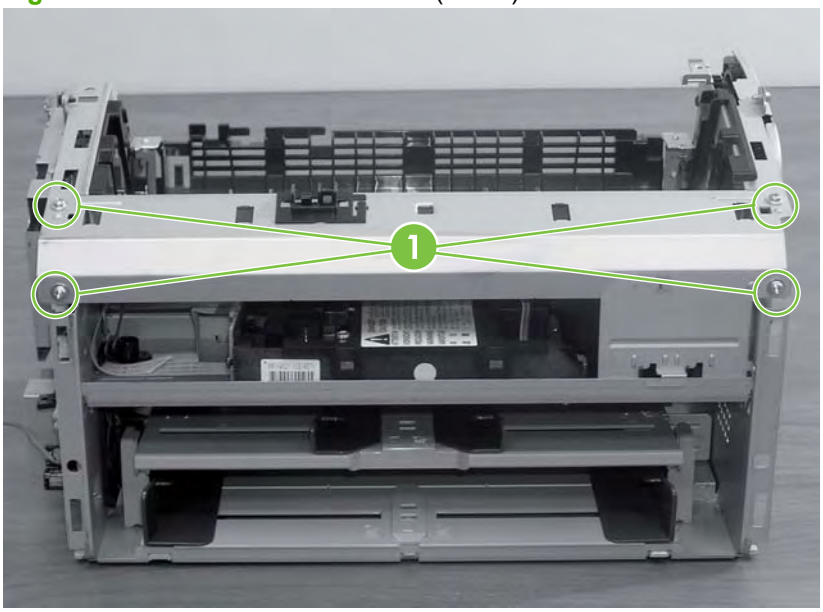


NOTE: To reinstall the fuser, the notches on either side of the fuser must slide into the groves on the inside of the cartridge bay.

Laser/scanner

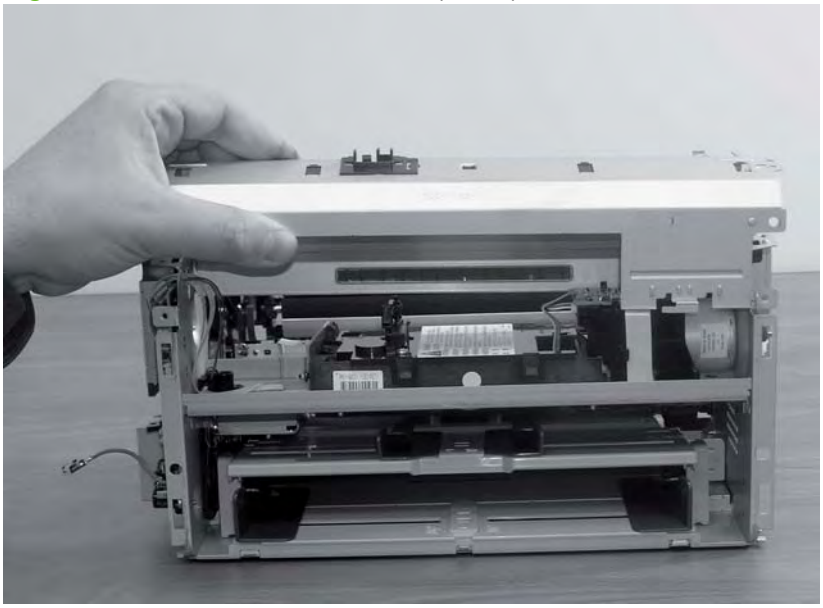
1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove both side covers. See Side Covers on page 41.
4. Remove the top cover. See Top Cover on page 44.
5. Remove four screws (callout 1).

Figure 4-18 Remove laser/scanner (1 of 4)



6. Remove the scanner cover from the device.

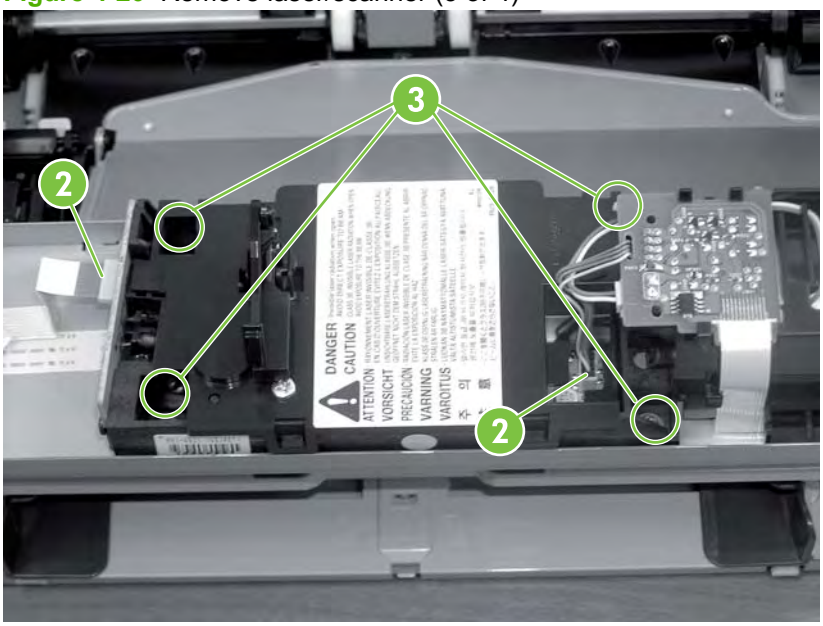
Figure 4-19 Remove laser/scanner (2 of 4)



NOTE: When reinstalling the cover, feed the lever through the plastic slot in the top of the cover.

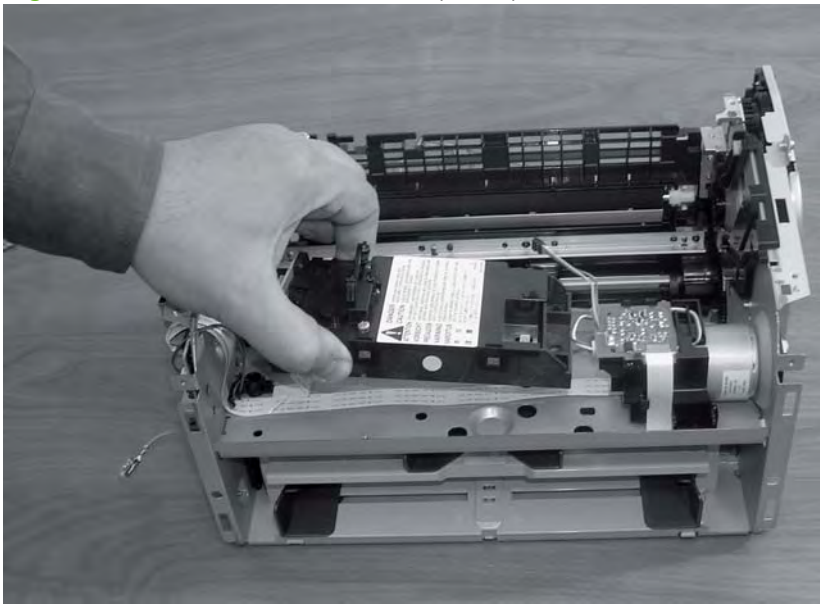
7. Unplug two cables (callout 2) and remove four screws (callout 3).

Figure 4-20 Remove laser/scanner (3 of 4)



8. Remove the laser/scanner

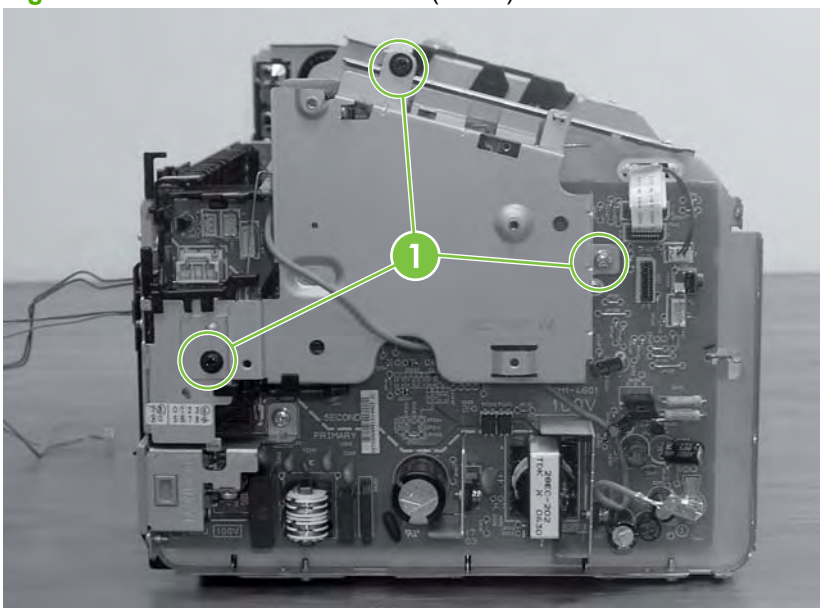
Figure 4-21 Remove laser/scanner (4 of 4)



DC controller

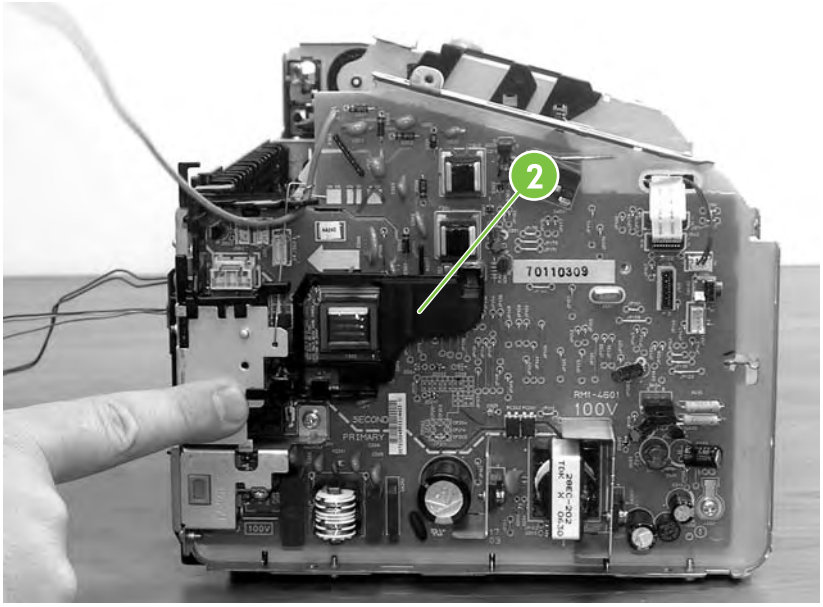
1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove the left side cover. See Side Covers on page 41.
4. Remove the fuser. See Fuser on page 47.
5. Remove three screws from the metal plate (callout 1). Remove the metal plate.

Figure 4-22 Remove DC controller (1 of 4)



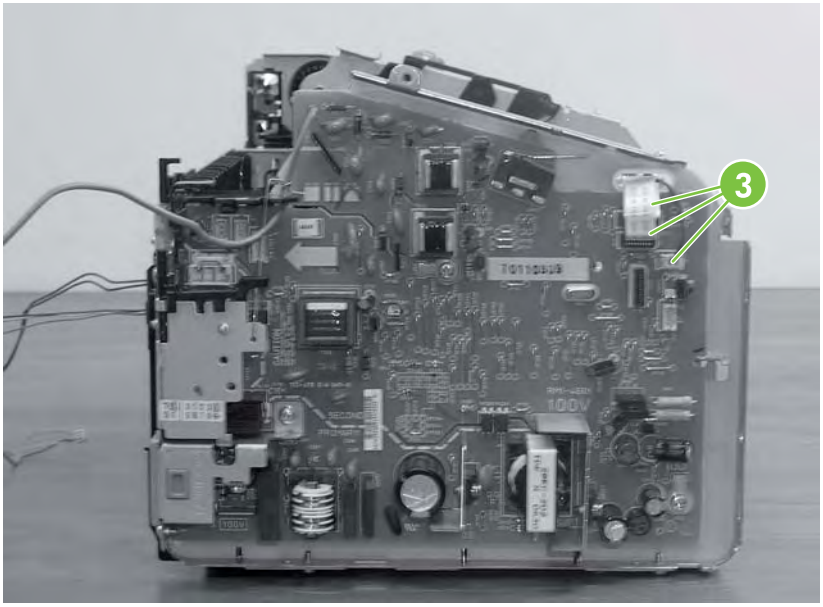
6. Remove the black plastic crossmember (callout 2) by lifting up on the left tab.

Figure 4-23 Remove DC controller (2 of 4)



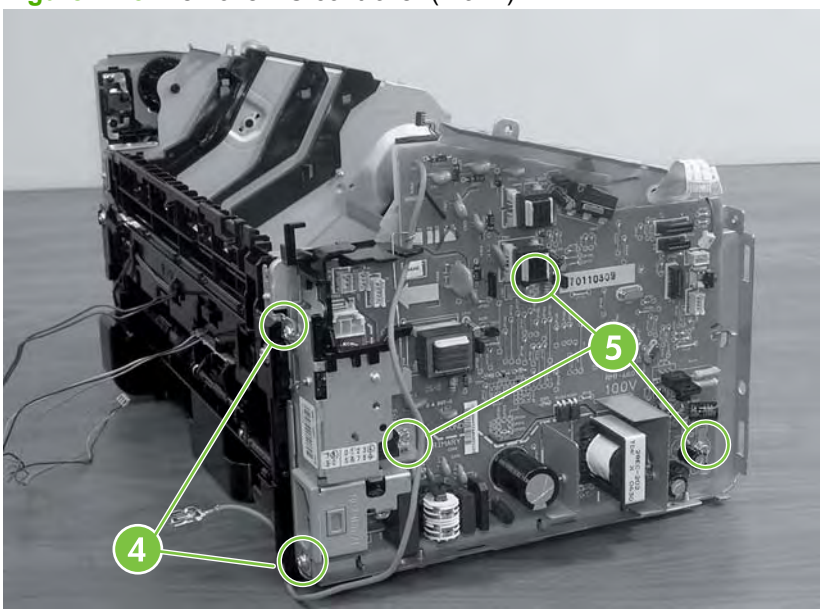
7. Unplug three cables (callout 3).

Figure 4-24 Remove DC controller (3 of 4)



8. Remove two screws from the rear of the device (callout 4) and remove three screws from the DC controller board (callout 5).

Figure 4-25 Remove DC controller (4 of 4)



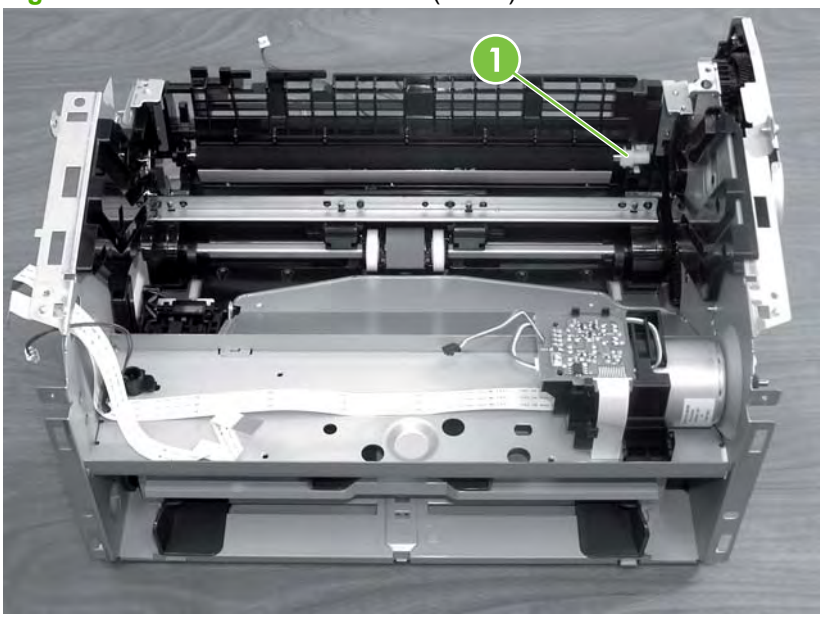
9. Remove the DC Controller board.

Transfer roller

1. Open the top cover and remove the print cartridge.
2. Pinch the white plastic clip on the right side of the transfer roller to release the roller (callout 1). Slide the roller to the right and remove it.

NOTE: Do not touch the pad on the transfer roller.

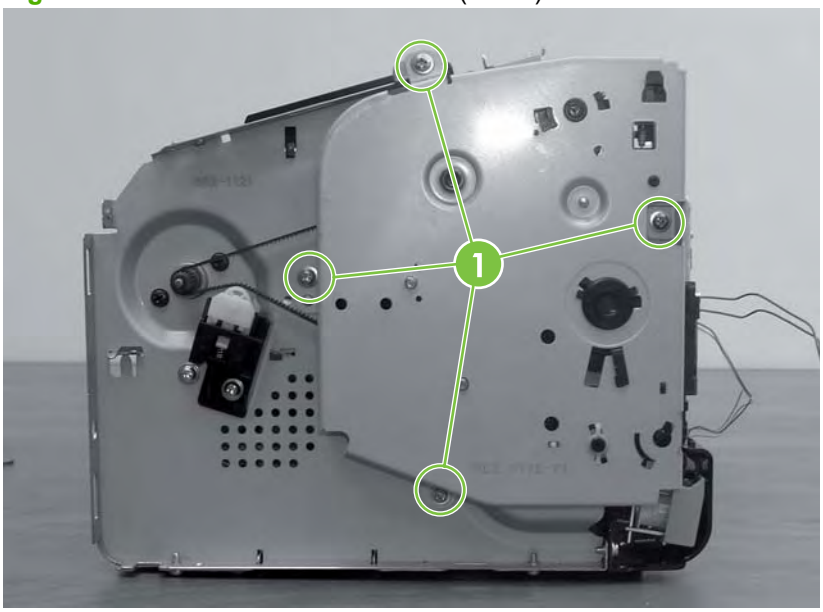
Figure 4-26 Remove transfer roller (1 of 1)



Motor drive belt

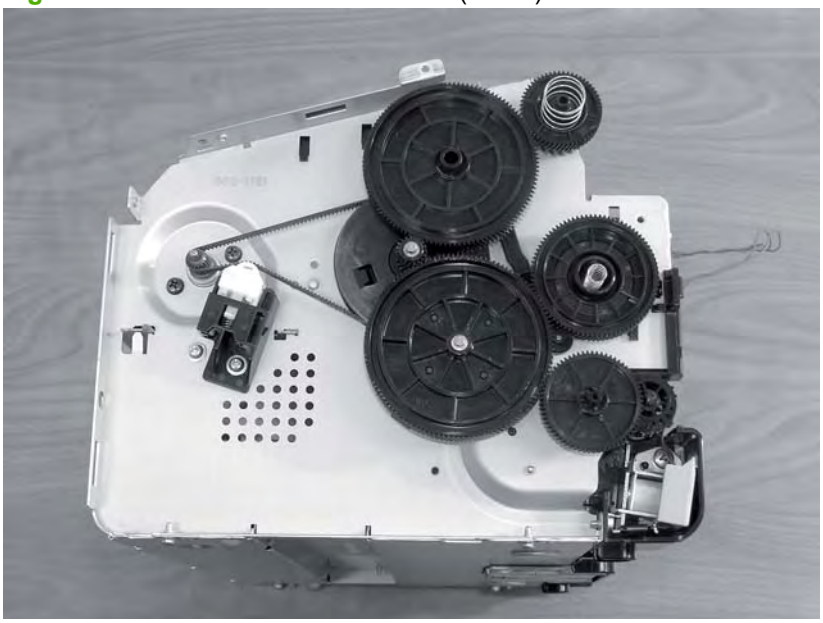
1. Remove the front cover. See Front Cover on page 40.
2. Remove the right side cover. See Side Covers on page 41.
3. Turn the device up on its left side and remove four screws (callout 1).

Figure 4-27 Remove motor drive belt (1 of 4)



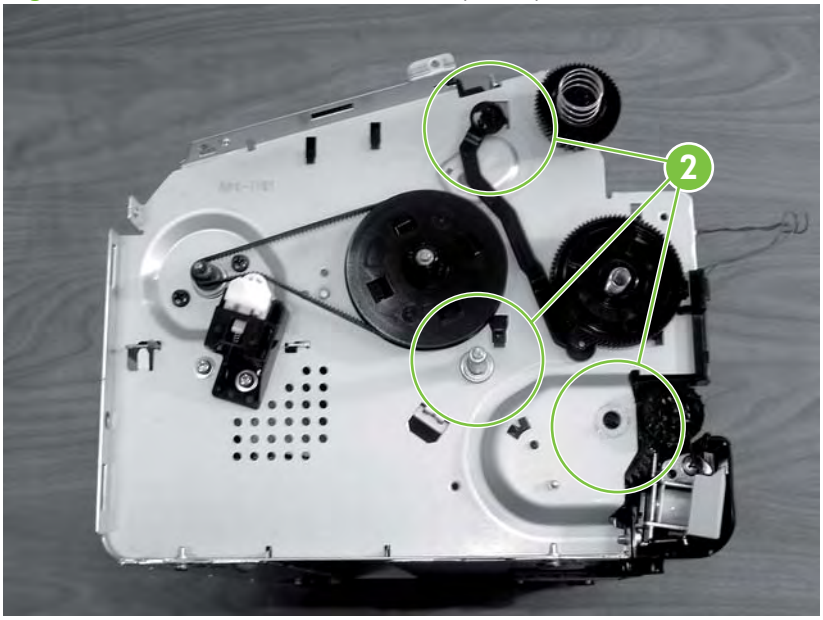
4. Remove the gear cover plate.

Figure 4-28 Remove motor drive belt (2 of 4)



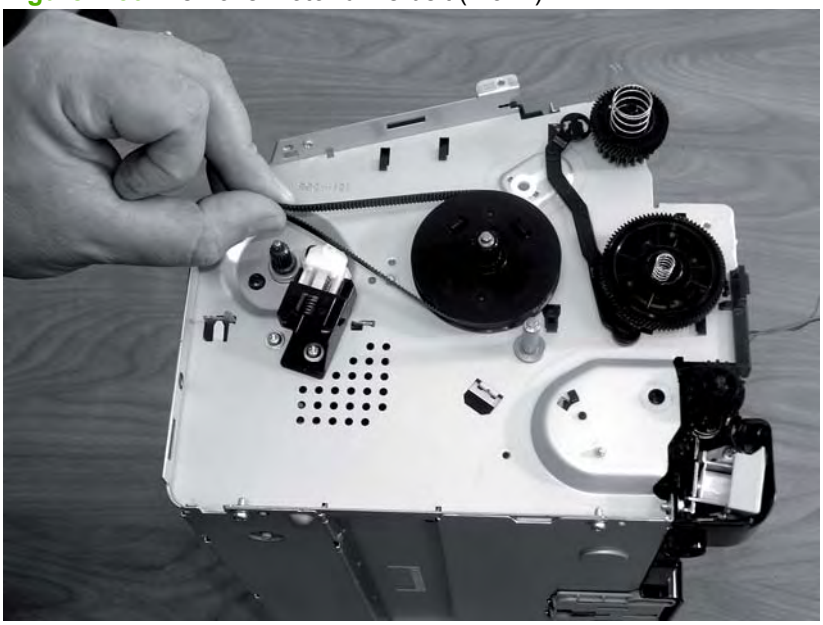
5. Remove three loose gears (callout 2).

Figure 4-29 Remove motor drive belt (3 of 4)



6. Pinch the drive belt and carefully slide it off the drive gear.

Figure 4-30 Remove motor drive belt (4 of 4)



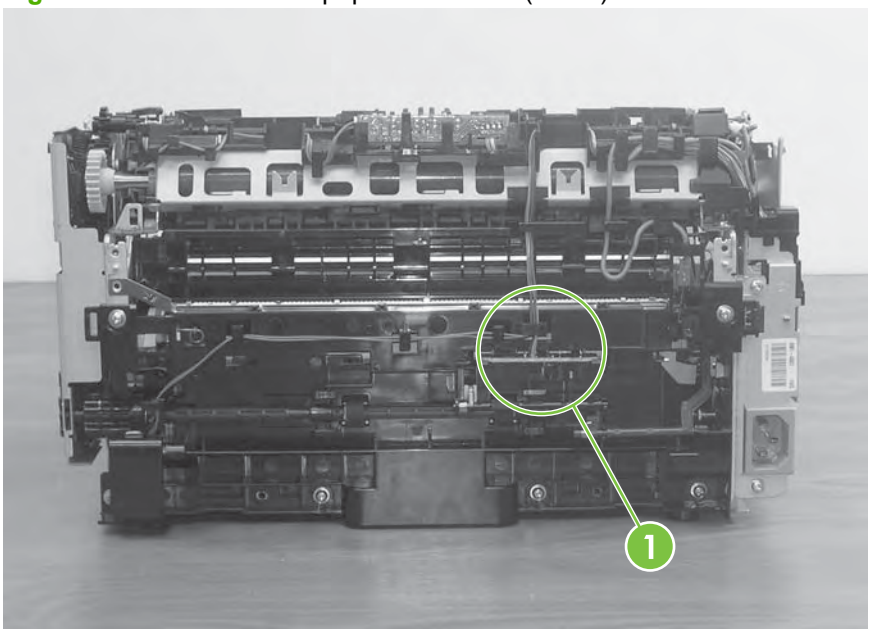
Rear paper-feed roller

1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove both side covers. See Side Covers on page 41.
4. Remove the back cover. See Back Cover on page 43.

NOTE: While it is possible to remove the rear paper feed roller without removing the gear plate on the right side of the printer, the process is easier if the plate has been removed. Follow steps 1 through 4 for removing the motor drive belt to remove the gear plate. See Motor drive belt on page 57.

5. Remove black cartridge sensor rod by detaching the right side of the rod from the clip and sliding it to the right (callout 1). Be careful not to lose attached spring

Figure 4-31 Remove rear paper feed roller (1 of 3)

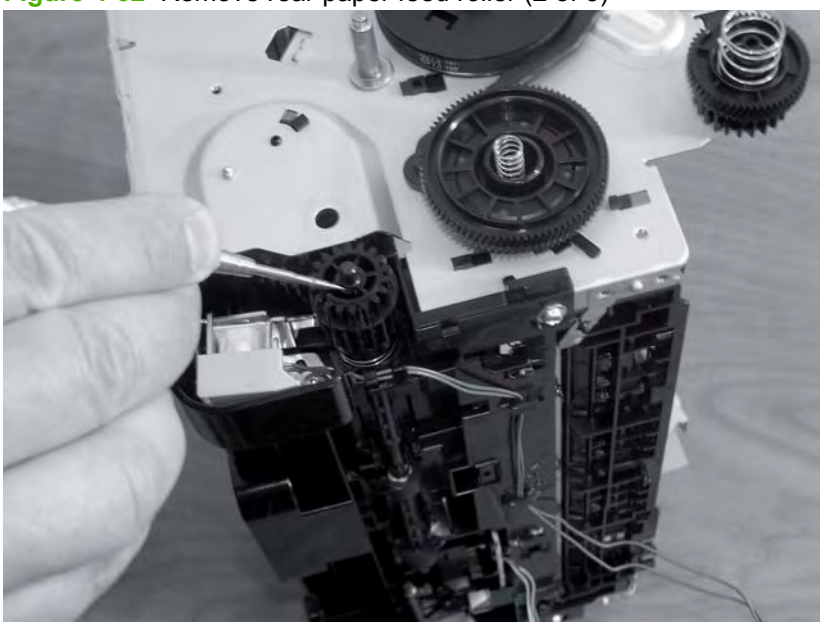


NOTE: When reinserting the sensor rod, make sure the left tab feeds into the slot in the rear of the device. Wind the spring an extra revolution before attaching to ensure proper tension.

6. There are two roller catches on either side of the roller pads that are locked in place with tabs. Lift up the inside tabs of the two roller catches and slide them away from the roller pads. Remove them from the device.

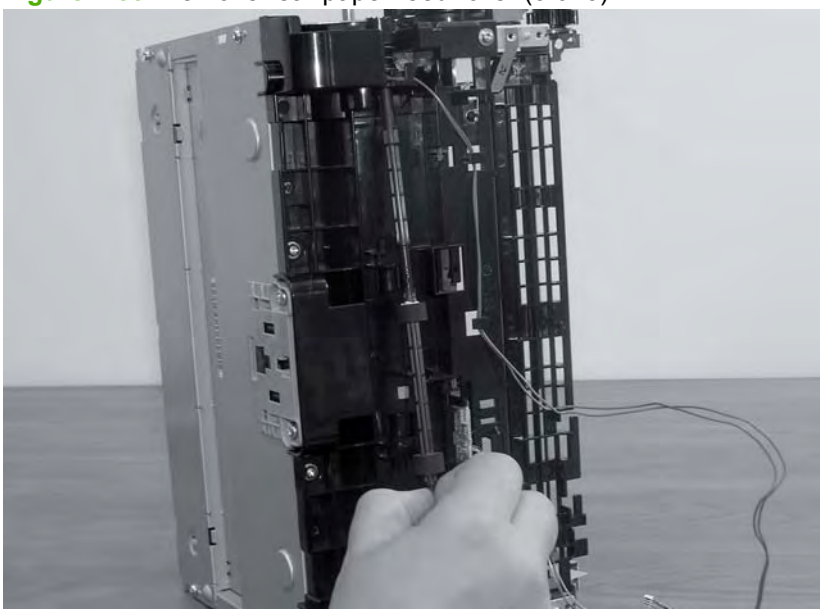
7. Release the gear at the left end of the roller by pinching the tab inside the gear housing. Slide the gear away from the roller.

Figure 4-32 Remove rear paper feed roller (2 of 3)



8. Slide the roller away from the drive gear and out of the back of the device.

Figure 4-33 Remove rear paper feed roller (3 of 3)



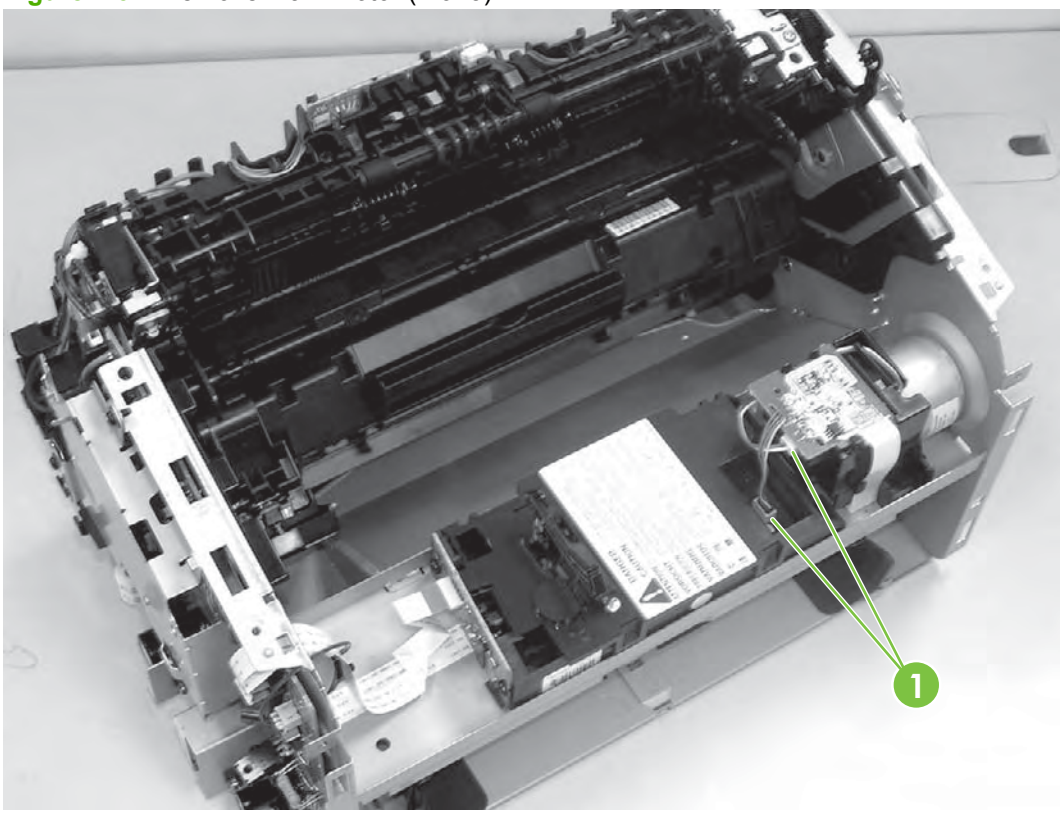
Main motor

1. Remove the front cover. See Front Cover on page 40.
2. Remove the control panel. See Control panel on page 40.
3. Remove both side covers. See Side Covers on page 41.
4. Remove the back cover. See Back Cover on page 43.
5. Remove the top cover. See Top Cover on page 44.
6. Remove the laser/scanner. See Laser/scanner on page 51.

NOTE: You only need to follow the steps in the Laser/scanner section until the scanner cover is removed (step six). It is not necessary to remove the entire laser/scanner assembly in order to access the main motor.

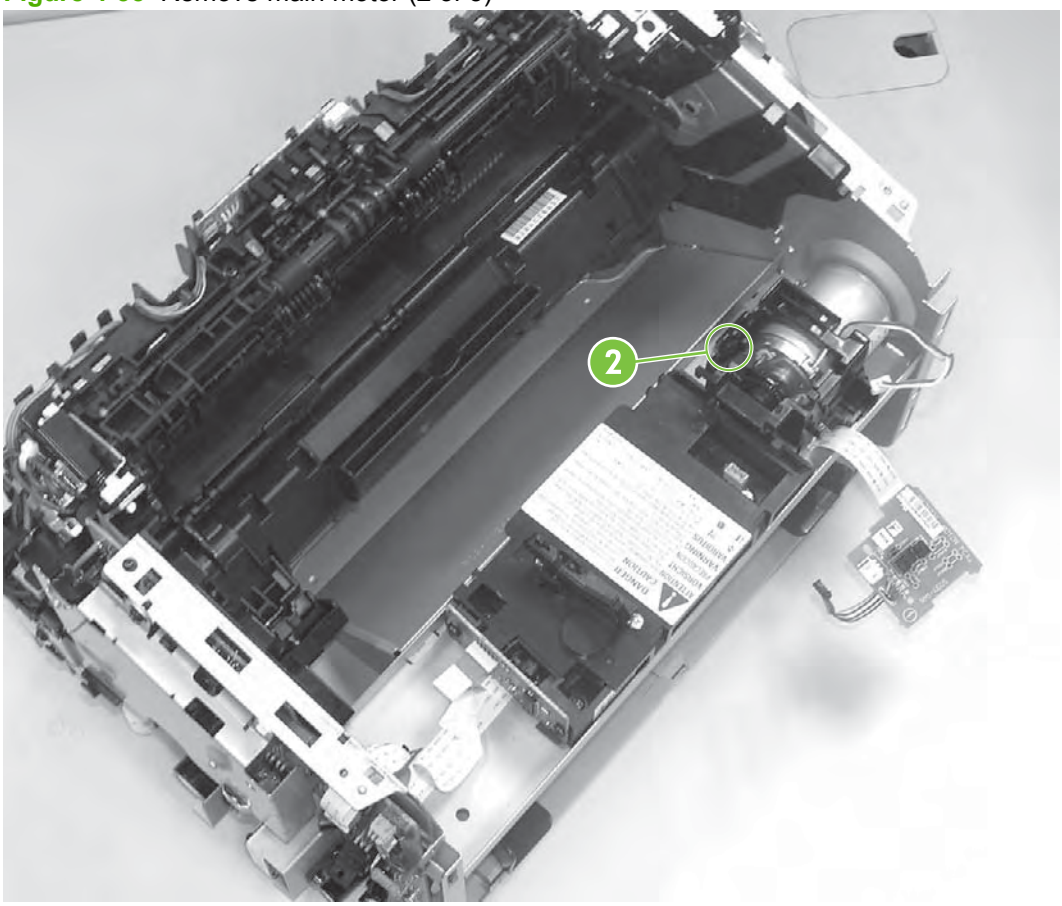
7. Unplug two cables (callout 1).

Figure 4-34 Remove main motor (1 of 5)



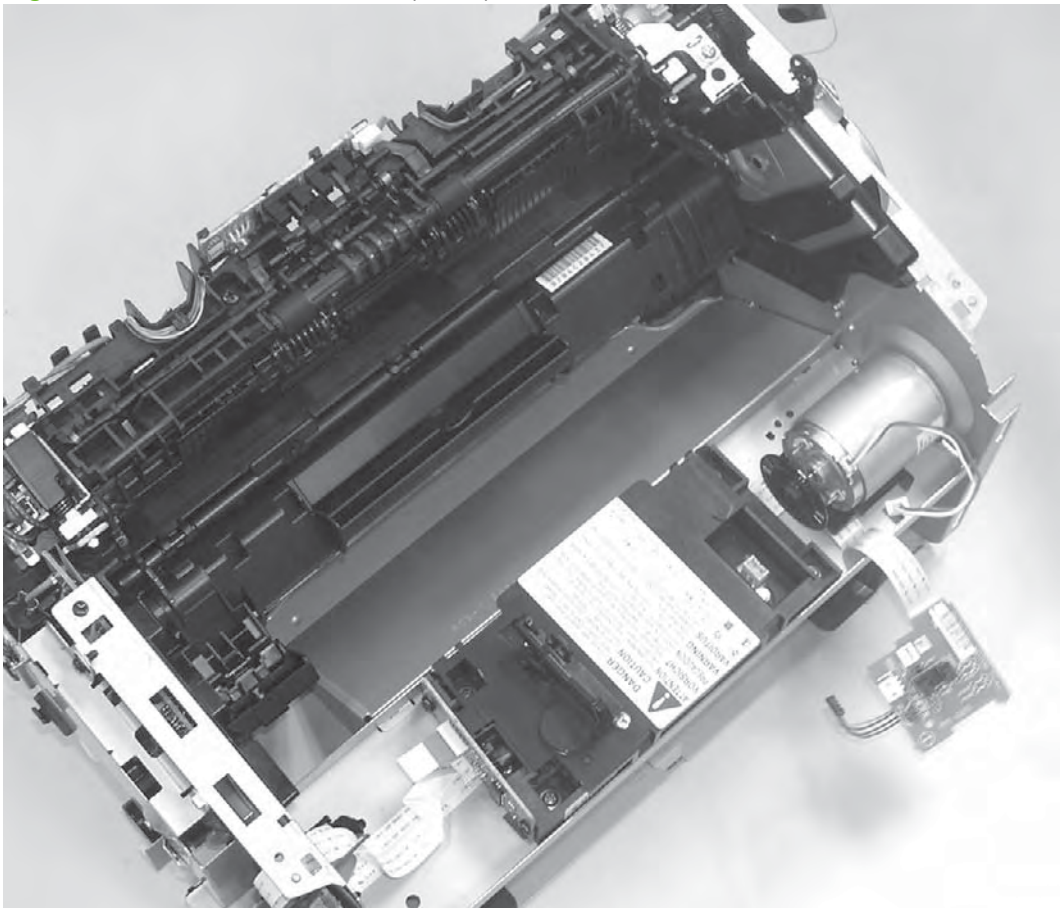
8. Pinch and remove motor-control card (it will hang by a soldered ribbon cable). Unthread the wire from the plastic bracket and remove one screw (callout 2).

Figure 4-35 Remove main motor (2 of 5)



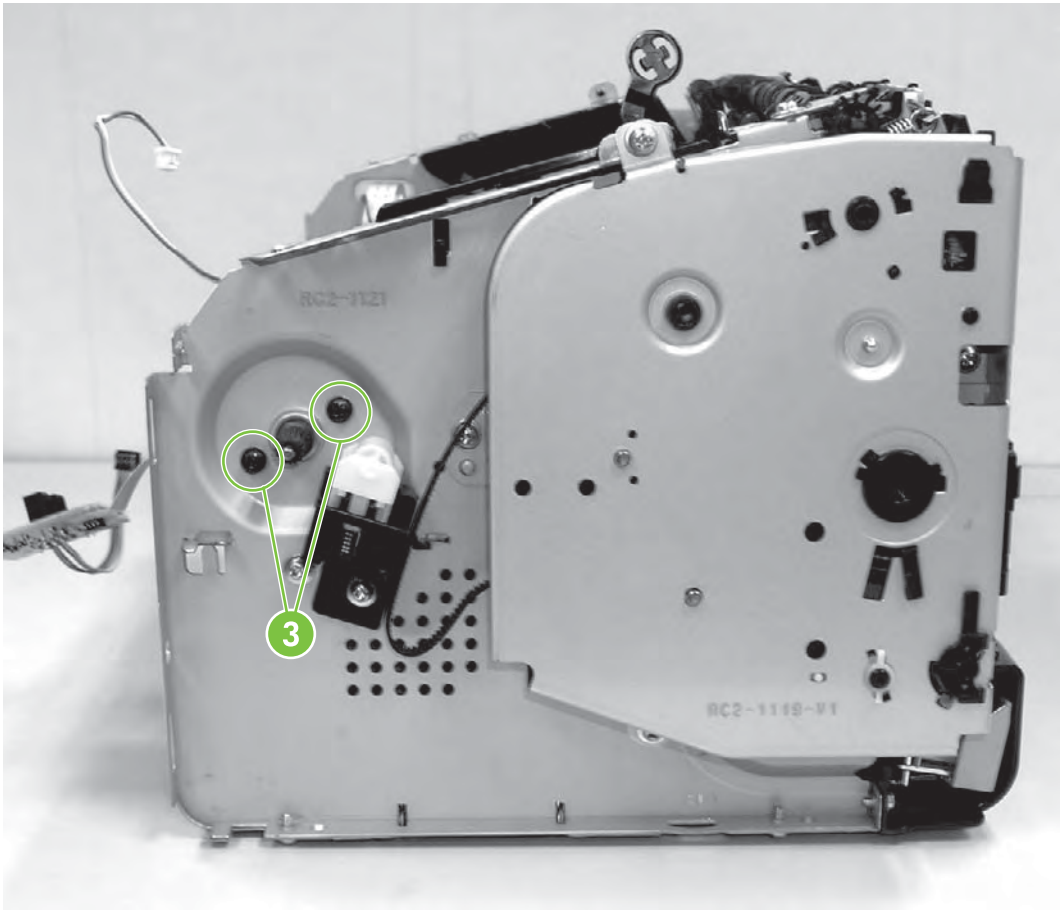
9. Remove the plastic bracket.

Figure 4-36 Remove main motor (3 of 5)



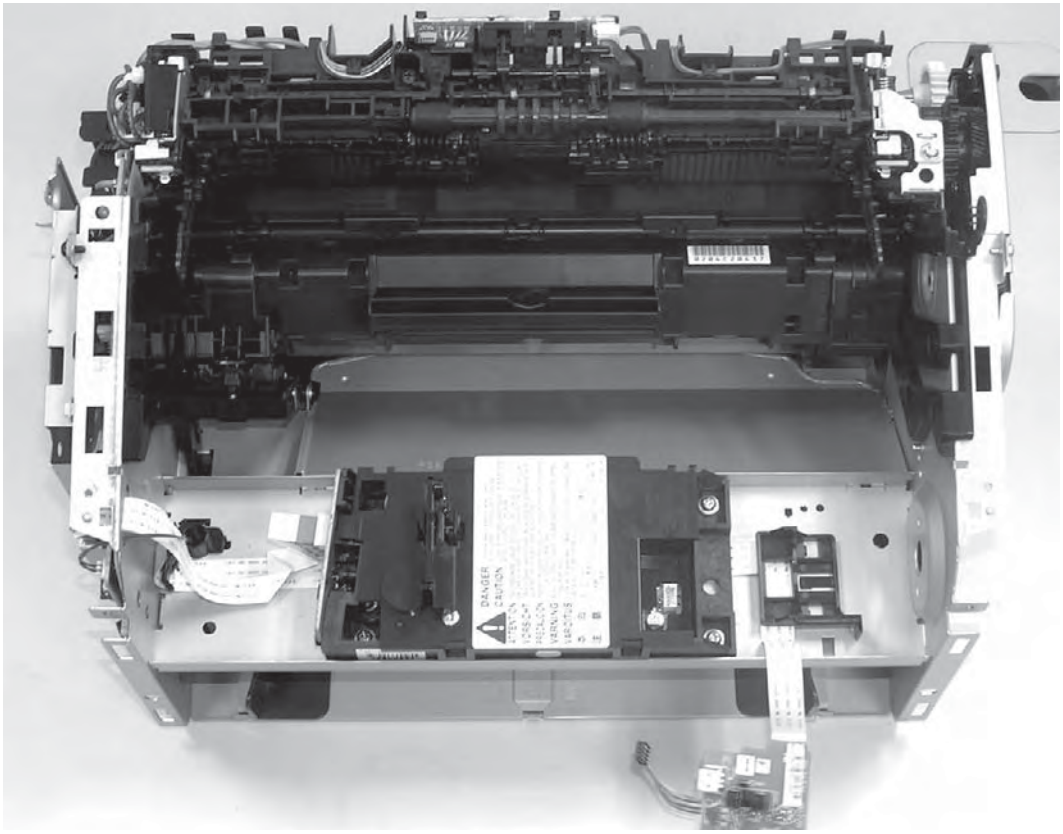
10. Remove two screws (callout 3).

Figure 4-37 Remove main motor (4 of 5)



11. Remove the main motor.

Figure 4-38 Remove main motor (5 of 5)



5 Problem solving

- Problem-solving checklist
- Contact HP support
- Status-light patterns
- Clearing jams
- Improve print quality
- Media problem-solving
- Printed page is different from what appeared on screen
- Printer software problems
- Common Macintosh problems
- Network-setup problem-solving

Problem-solving checklist

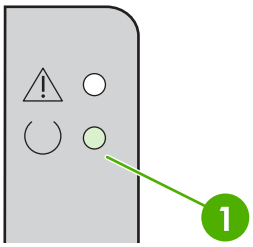
Step 1: Is the device set up correctly?

- Is the device plugged into a power outlet that is known to work?
- Is the on/off switch in the on position?
- Is the print cartridge properly installed? See Replace the print cartridge on page 8.
- Is paper properly loaded in the input tray?

Yes	If you answered yes to the questions above, go to Step 2: Is the Ready light on? on page 68
No	If the device will not turn on, Contact HP support on page 70.

Step 2: Is the Ready light on?

Verify that the Ready light (1) is illuminated on the control panel.



Yes	Go to Step 3: Can you print an engine test page? on page 68
No	If the control panel lights do not look like the picture above, see Status-light patterns on page 71. If you are unable to resolve the problem, Contact HP support on page 70.

Step 3: Can you print an engine test page?

To print an engine test page, open and close the cartridge door five times while the printer is in ready mode. The printer should print one page with multiple horizontal lines.

Yes	If the engine test page printed, go to Step 4: Is the device communicating with the computer? on page 69
No	If no paper came out, see Media problem-solving on page 80. If you are unable to resolve the problem, Contact HP support on page 70.

Step 4: Is the device communicating with the computer?

Try printing a document from a software application.

Yes	If the document prints, go to Step 5: Does the printed page look like you expected? on page 69
No	If the document does not print, see Printer software problems on page 83. If you are using a Macintosh computer, see Common Macintosh problems on page 84. If you are unable to resolve the problem, Contact HP support on page 70.

Step 5: Does the printed page look like you expected?

Yes	The problem should be resolved. If it is not resolved, Printed page is different from what appeared on screen on page 81.
No	If the print quality is poor, see Improve print quality on page 76. Verify that the print settings are correct for the media you are using. If you are unable to resolve the problem, Contact HP support on page 70.

Contact HP support

- In the United States, see http://www.hp.com/support/ljp1000 for the HP LaserJet P1000 Series
- In other locations, see http://www.hp.com/.

Status-light patterns

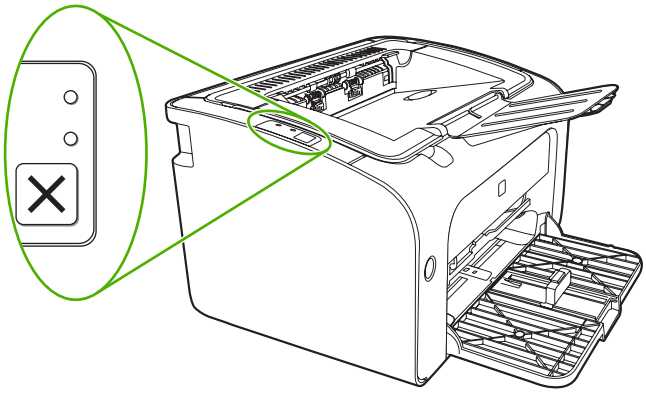


Table 5-1 Status-light legend

○	Symbol for "light off"
●	Symbol for "light on"
☼	Symbol for "light blinking"

Table 5-2 Control-panel light messages

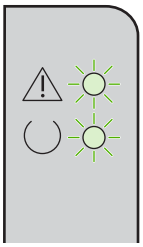
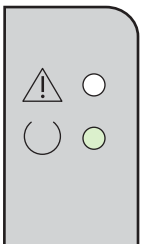
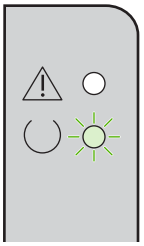
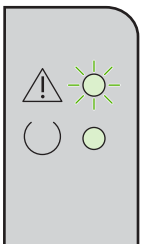
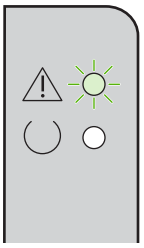
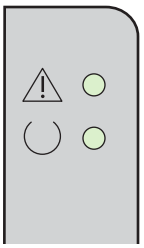
HP LaserJet P1000 Series light status	State of the device	Action
	**Initialization/Startup** **HP LaserJet P1000 Series**: During Startup, the Go and Ready lights cycle (at the rate of 500 ms) one after another. **HP LaserJet P1500 Series**: While in the Startup state, the Go, Ready, and Attention lights cycle (at the rate of 500 ms) one after another. **Reconfiguration Initialization**: During the device start up, you can request special initialization sequences that reconfigure the device. The lights then cycle as in the Initialization Startup state. **Job Cancel** After the cancellation process is complete, the device returns to the Ready state.	During the Initialization and Job Cancel processes, pressing buttons has no effect.

Table 5-2 Control-panel light messages (continued)

HP LaserJet P1000 Series light status	State of the device	Action
	**Ready** The device is ready with no job activity.	To print a Configuration page, press and release the Go button (HP LaserJet P1500 network models only).
	**Processing Data** The device is processing or receiving data.	To cancel the current job, press the Cancel button (HP LaserJet P1006/ P1008/P1500 Series only).
	**Manual Feed** or **Continuable Error** This state occurs in the following circumstances: • Manual feed • General continuable error	To recover from the error and print the available data, press the Go button (HP LaserJet P1500 Series only). If the recovery is successful, the device continues to the Processing Data state and completes the job. If the recovery is unsuccessful, the device continues to the Continuable Error state. Try removing any media from the media path and cycling the device power.
	**Attention** • Print-cartridge door is open • Paper jam • No cartridge installed • Paper out	Close the print-cartridge door, remove the paper jam, install the cartridge, or add paper.
	**Fatal Error** The device has encountered a non-recoverable error.	• Turn off the device, wait 10 seconds, and turn on the device. • If you cannot resolve the problem, see Contact HP support on page 70.

Clearing jams

Occasionally, media becomes jammed during a print job. You are notified through the control panel lights.

The following are some of the causes of jams:

- The input trays are loaded incorrectly or are too full.

  NOTE: When you add new media, always remove all of the media from the input tray and straighten the entire stack. This helps prevent multiple feeds and reduces media jams.

- The media does not meet HP specifications.
- The device might need to be cleaned to remove paper dust and other particles from the paper path.

Loose toner might remain in the device after a media jam. This toner clears up after a few sheets print.

CAUTION: If you get any toner on your clothes, wash them in cold water. *Hot water will permanently set the toner into the fabric*.

Typical media jam locations

- **Print cartridge area**: See Removing a jammed page on page 73.
- **Input tray areas**: If the page is still sticking out of the input tray, gently try to remove it from the input tray without tearing the page. If you feel resistance, see Removing a jammed page on page 73.
- **Output path**: If the page is sticking out of the output bin, see Removing a jammed page on page 73.

NOTE: Loose toner might remain in the device after a media jam. This toner clears up after a few sheets are printed.

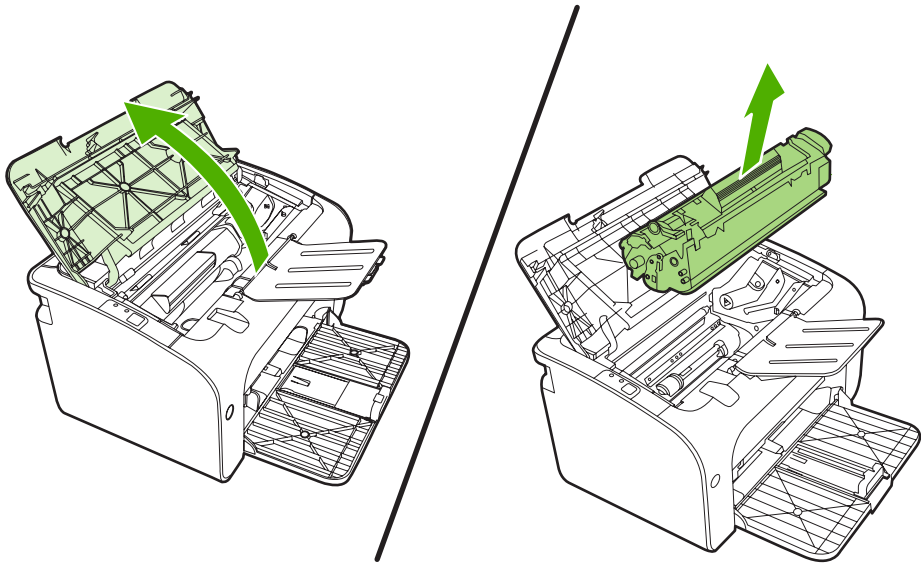
Removing a jammed page

CAUTION: Media jams might result in loose toner on the page. If you get any toner on your clothes, wash them in cold water. *Hot water will permanently set the toner into the fabric*.

To clear a jam in the print-cartridge area

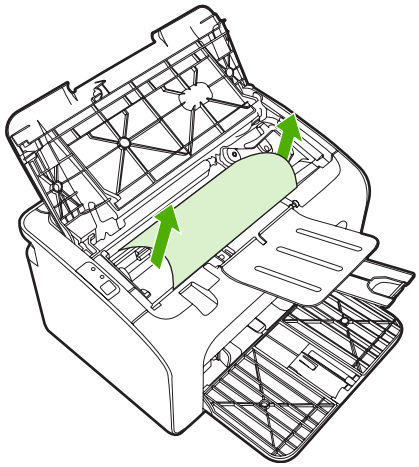
△ **CAUTION:** Do not use sharp objects, such as tweezers or needle-nose pliers, to remove jams. Damage they cause is not covered by the warranty.

1. Open the print-cartridge door, and then remove the print cartridge from the device.

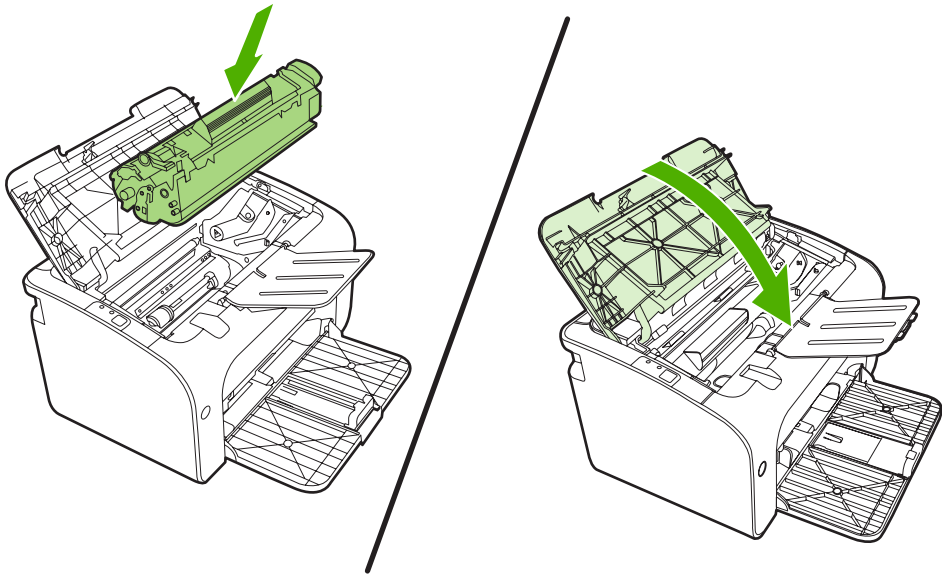


△ **CAUTION:** To prevent damage to the print cartridge, minimize its exposure to direct light.

2. With both hands, grasp the side of the media that is most visible (this includes the middle), and carefully pull it free from the device.



3. Replace the print cartridge, and close the print-cartridge door.



NOTE: When you add new media, remove all the media from the input tray and straighten the entire stack.

Improve print quality

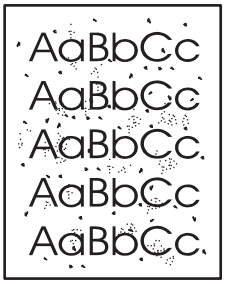
This section provides information about identifying and correcting print defects.

NOTE: If these steps do not correct the problem, contact an HP-authorized dealer or service representative.

Light print or faded

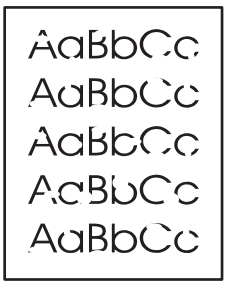
- The print cartridge is nearing end of life.
- The media might not meet Hewlett-Packard's media specifications (for example, the media is too moist or too rough).
- If the whole page is light, the print density adjustment is too light or EconoMode might be turned on. Adjust the print density, and disable EconoMode in the printer Properties.

Toner specks



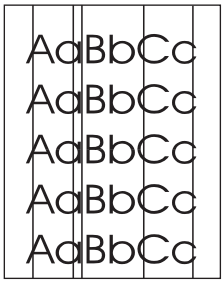
- The media might not meet Hewlett-Packard's media specifications (for example, the media is too moist or too rough).
- The device might need to be cleaned. See Clean the device on page 13

Dropouts



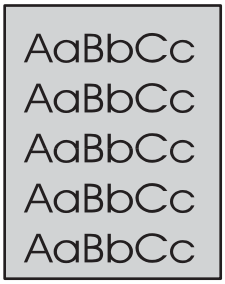
- A single sheet of media might be defective. Try reprinting the job.
- The media moisture content is uneven or the media has moist spots on its surface. Try printing with new media.
- The media lot is bad. The manufacturing processes can cause some areas to reject toner. Try a different type or brand of media.
- The print cartridge might be defective.

Vertical lines



The photosensitive drum inside the print cartridge has probably been scratched. Install a new HP print cartridge. See Replace the print cartridge on page 8.

Gray background

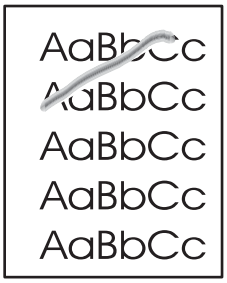


- Make sure that tray 1 is in place.
- Decrease the print density setting through the embedded Web server. This decreases the amount of background shading.
- Change the media to a lighter basis weight.
- Check the device environment. Very dry (low humidity) conditions can increase the amount of background shading.
- Install a new HP print cartridge. See Replace the print cartridge on page 8.

Toner smear

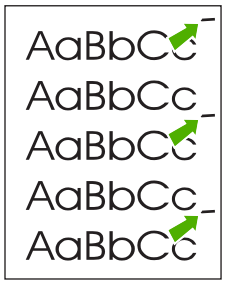
- If toner smears appear on the leading edge of the media, the media guides might be dirty. Wipe the media guides with a dry, lint-free cloth
- Check the media type and quality.
- Try installing a new HP print cartridge. See Replace the print cartridge on page 8.
- The fuser temperature might be too low. In your printer driver, make sure the appropriate media type is selected.

Loose toner



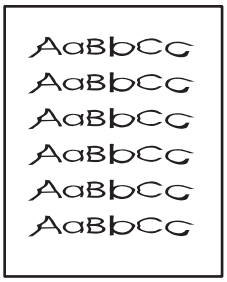
- Clean the inside of the device. See Clean the device on page 13.
- Check the media type and quality.
- Try installing a new HP print cartridge. See Replace the print cartridge on page 8].
- In your printer driver, make sure the appropriate media type is selected.
- Plug the device directly into an AC outlet instead of into a power strip or surge protector.

Vertical repetitive defects



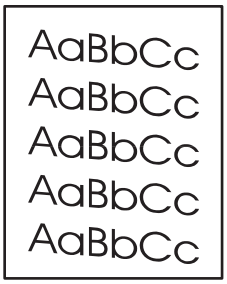
- The print cartridge might be damaged. If a repetitive mark occurs at the same spot on the page, install a new HP print cartridge. See Replace the print cartridge on page 8.
- The internal parts might have toner on them. If the defects occur on the back of the page, the problem will probably correct itself after a few more printed pages.
- In your printer driver, make sure the appropriate media type is selected.

Misformed characters



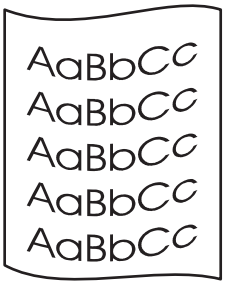
- If characters are improperly formed, producing hollow images, the media stock might be too slick. Try a different media.
- If characters are improperly formed, producing a wavy effect, the device might need service. Print a configuration page. If the characters are improperly formed, contact an HP-authorized dealer or service representative. See Contact HP support on page 70.

Page skew



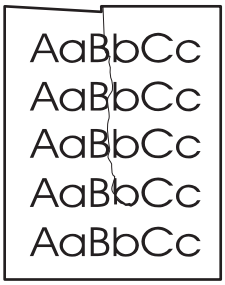
- Make sure that the media is loaded correctly and the media guides are not too tight or too loose against the media stack.
- The input bin might be too full.
- Check the media type and quality.

Curl or wave



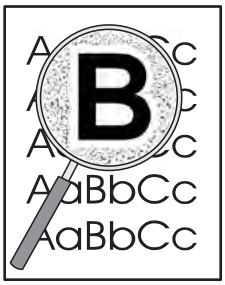
- Check the media type and quality. Both high temperature and humidity cause media to curl.
- The media might have been in the input tray too long. Turn over the stack of media in the tray. Also, try rotating the media 180° in the input tray.
- The fuser temperature might be too high. In your printer driver, make sure the appropriate media type is selected. If the problem persists, select a media type that uses a lower fuser temperature, such as transparencies or light media.

Wrinkles or creases



- Make sure that media is loaded properly.
- Check the media type and quality.
- Turn over the stack of media in the tray. Also, try rotating the media 180° in the input tray.
- For envelopes, this can be caused by air pockets inside the envelope. Remove the envelope, flatten the envelope, and try printing again.

Toner-scatter outline



- If large amounts of toner have scattered around the characters, the media might be resisting the toner. (A small amount of toner scatter is normal for laser printing.) Try a different media type.
- Turn over the stack of media in the tray.
- Use media designed for laser printers.

Media problem-solving

The following problems with media cause print-quality deviations, jamming, or damage to the device.

Problem	Cause	Solution
Poor print quality or toner adhesion	The paper is too moist, too rough, too heavy or too smooth, or it is embossed or from a faulty paper lot.	Try another kind of paper, between 100 and 250 Sheffield, with 4% to 6% moisture content.
Dropouts, jamming, or curl	The paper has been stored incorrectly.	Store paper flat in its moisture-proof wrapping.
	The paper has variability from one side to the other.	Turn the paper over.
Excessive curl	The paper is too moist, has the wrong grain direction, or is of short-grain construction	Use long-grain paper.
	The paper varies from side-to-side.	Turn the paper over.
Jamming, damage to device	The paper has cutouts or perforations.	Use paper that is free of cutouts or perforations.
Problems with feeding	The paper has ragged edges.	Use high-quality paper that is made for laser printers.
	The paper varies from side-to-side.	Turn the paper over.
	The paper is too moist, too rough, too heavy or too smooth, has the wrong grain direction, or is of short-grain construction or it is embossed or from a faulty paper lot.	Try another kind of paper, between 100 and 250 Sheffield, 4% to 6% moisture content.
		Use long-grain paper.
Print is skewed (crooked).	The media guides might be incorrectly adjusted.	Remove all media from the input tray, straighten the stack, and then load the media in the input tray again. Adjust the media guides to the width and length of the media that you are using and try printing again.
More than one sheet feeds at one time.	The media tray might be overloaded.	Remove some of the media from the tray.
	The media might be wrinkled, folded, or damaged.	Verify that the media is not wrinkled, folded, or damaged. Try printing on media from a new or different package.
The device does not pull media from the media input tray.	The device might be in manual-feed mode.	Verify that the device is not in manual feed mode and print your job again.
	The pickup roller might be dirty or damaged.	Contact HP Customer Care. See Contact HP support on page 70or the support flyer that came in the box.
	The paper-length adjustment control in main tray is set at a length that is greater than the media size.	Adjust the paper-length adjustment control to the correct length.

Printed page is different from what appeared on screen

Garbled, incorrect, or incomplete text

- The wrong printer driver might have been selected when the software was installed. Make sure that the correct printer driver is selected in the printer **Properties**.
- If a specific file prints garbled text, a problem might exist with that specific file. If a specific application prints garbled text, a problem might exist with that application. Make sure that the appropriate printer driver is selected.
- A problem might exist with your software application. Try printing from another software application.
- The USB cable might be loose or defective.
    - Disconnect the cable and reconnect it at both ends.
    - Try printing a job that you know works.
    - If possible, attach the cable and device to another computer, and try printing a job that you know works.
    - Try using a new USB 2.0 cable that is 3 m (10 ft) or less in length.
    - Turn off the device and the computer. Remove the USB cable, and inspect both ends of the cable for damage. Reconnect the cable, making sure that the connections are tight. Make sure that the device is directly connected to the computer. Remove any switchboxes, tape backup drives, security keys, or any other devices that are attached between the USB port on the computer and the device. These devices can sometimes interfere with communication between the computer and the device. Restart the device and the computer.

Missing graphics or text, or blank pages

- Make sure that your file does not contain blank pages.
- The sealing tape might still be in the print cartridge. Remove the print cartridge, and pull the tab on the end of the cartridge until the entire length of the tape is removed. Reinstall the print cartridge. See Replace the print cartridge on page 8 for instructions. To check the device, print a configuration page. See Configuration page on page 12 for instructions on how to print a configuration page.
- The graphic settings in the printer **Properties** might not be correct for the type of job that you are printing. Try a different graphic setting in the printer Properties.
- Clean the device, particularly the contacts between the print cartridge and the power supply.

Page format is different than on another HP LaserJet printer

If you used an older or different HP LaserJet printer driver (printer software) to create the document, or if the printer **Properties** settings in the software are different, the page format might change when you try to print using your new printer driver or settings. To help eliminate this problem, try the following:

- Create documents and print them using the same printer driver (printer software) and printer **Properties** settings regardless of which HP LaserJet printer you use to print them.
- Change the resolution, paper size, font settings, and other settings.

Graphics quality

The graphics settings might be unsuitable for your print job. Check the graphic settings, such as resolution, in the printer **Properties** and adjust them as necessary

NOTE: You might lose some resolution when converting from one graphics format to another.

Printer software problems

Table 5-3 Printer software problems

Problem	Solution
The printer icon is not visible in the **Printer** folder	• Reinstall the printer software. In the Windows task bar, click **Start**, click **Programs**, click **HP**, click your printer, and click **Uninstall**. Install the printer software from the CD-ROM. **NOTE:** Close any applications that are running. To close an application that has an icon in the system tray, right-click the icon, and select **Close** or **Disable**. • Try plugging the USB cable into a different USB port on the PC.
An error message was displayed during the software installation	• Reinstall the printer software. In the Windows task bar, click **Start**, click **Programs**, click **HP**, click your printer, and click **Uninstall**. Install the printer software from the CD-ROM. **NOTE:** Close any applications that are running. To close an application that has an icon in the task bar, right-click the icon, and select **Close** or **Disable**. • Check the amount of free space on the drive where you are installing the printer software. If necessary, free up as much space as you can, and reinstall the printer software. • If necessary, run the Disk Defragmenter, and reinstall the printer software.
The printer is in Ready mode, but nothing prints	• Print a Configuration page from the control panel of the printer, and verify the printer functionality. • Verify that all of the cables are properly seated and within specifications. This includes the USB, network, and power cables. Try a new cable.

Common Macintosh problems

Table 5-4 Problems with Mac OS X

The printer driver is not listed in the Print Center or Printer Setup Utility.

Cause	Solution
The software might not have been installed or was installed incorrectly.	Make sure that the PM and PE plug-ins are in the following hard-drive folder: `Library/Printers/hp/laserjet/<product_name>`. If necessary, reinstall the software. See the *Getting Started Guide*.

The device name, IP address, or Rendezvous or Bonjour host name does not appear in the printer list in the Print Center or Printer Setup Utility.

Cause	Solution
The device might not be ready.	Make sure that the cables are connected correctly, the device is on, and the ready light is on. If you are connecting through a USB or Ethernet hub, try connecting directly to the computer or use a different port.
The wrong connection type might be selected.	Make sure that USB, IP Printing, or Rendezvous or Bonjour is selected, depending on the type of connection that exists between the device and the computer.
The wrong device name, IP address, or Rendezvous or Bonjour host name is being used.	Print a configuration page to check the device name, IP address, or Rendezvous or Bonjour host name. Verify that the name, IP address, or Rendezvous or Bonjour host name on the configuration page matches the device name, IP address, or Rendezvous or Bonjour host name in the Print Center or Printer Setup Utility.
The interface cable might be defective or of poor quality.	Replace the interface cable. Make sure to use a high-quality cable.

The printer driver does not automatically set up your selected device in the Print Center or Printer Setup Utility.

Cause	Solution
The device might not be ready.	Make sure that the cables are connected correctly, the device is on, and the ready light is on. If you are connecting through a USB or Ethernet hub, try connecting directly to the computer or use a different port.
The software might not have been installed or was installed incorrectly.	Make sure that the printer PPD is in the following hard-drive folder: `Library/Printers/PPDs/Contents/Resources/<lang>.lproj`, where <lang> is the two-letter language code for the language that you are using. If necessary, reinstall the software. See the *Getting Started Guide*.
The PostScript Printer Description (PPD) file is corrupt.	Delete the PPD file from the following hard-drive folder: `Library/Printers/PPDs/Contents/Resources/<lang>.lproj`, where <lang> is the two-letter language code for the language that you are using. Reinstall the software. See the *Getting Started Guide*.
The device might not be ready.	Make sure that the cables are connected correctly, the device is on, and the ready light is on. If you are connecting through a USB or Ethernet hub, try connecting directly to the computer or use a different port.
The interface cable might be defective or of poor quality.	Replace the interface cable. Make sure to use a high-quality cable.

Table 5-4 Problems with Mac OS X (continued)

A print job was not sent to the device that you wanted.

Cause	Solution
The print queue might be stopped.	Restart the print queue. Open **print monitor** and select **Start Jobs**.
The wrong device name or IP address is being used. Another device with the same or similar name, IP address, or Rendezvous or Bonjour host name might have received your print job.	Print a configuration page to check the device name, IP address, or Rendezvous or Bonjour host name. Verify that the name, IP address, or Rendezvous or Bonjour host name on the configuration page matches the device name, IP address, or Rendezvous or Bonjour host name in the Print Center or Printer Setup Utility.

You are unable to print from a third-party USB card.

Cause	Solution
This error occurs when the software for USB printers is not installed.	When adding a third-party USB card, you might need the Apple USB Adapter Card Support software. The most current version of this software is available from the Apple Web site.

When connected with a USB cable, the device does not appear in the Print Center or Printer Setup Utility after the driver is selected.

Cause	Solution
This problem is caused by either a software or a hardware component.	**Software troubleshooting** • Check that your Macintosh supports USB. • Verify that your Macintosh operating system is Mac OS X V10.2 or later. • Ensure that your Macintosh has the appropriate USB software from Apple. **Hardware troubleshooting** • Check that the device is turned on. • Verify that the USB cable is connected correctly. • Check that you are using the appropriate high-speed USB cable. • Ensure that you do not have too many USB devices drawing power from the chain. Disconnect all of the devices from the chain, and connect the cable directly to the USB port on the host computer. • Check to see if more than two nonpowered USB hubs are connected in a row on the chain. Disconnect all of the devices from the chain and connect the cable directly to the USB port on the host computer. **NOTE:** The iMac keyboard is a nonpowered USB hub.

Network-setup problem-solving

If the computer cannot discover the networked device, perform the following steps:

1. Check the cables to ensure that they are properly connected. Check all of the following connections:
   - Power cables
   - Cables between the device and the hub or switch
   - Cables between the hub or switch and the computer
   - Cables to and from the modem or Internet connection, if applicable
2. Verify that the computer's network connections are working properly (Windows only):
   - On the Windows desktop, double-click **My Network Places** or **Network Neighborhood**.
   - Click the **Entire Network** link.
   - Click the **Entire Contents** link.
   - Double-click one of the network icons, and make sure that some devices are listed.
3. Verify that the network connection is active:
   - Check the network light on the network (RJ-45) connector on the back of the device.
   - If one of the lights is on solid, the device is connected to the network.
   - If both network lights are off, check the cable connections from the device to the gateway, switch, or hub to ensure that the connections are secure.
   - If the connections are secure, turn off the power to the device for at least 10 seconds, and then turn on the power to the device.
4. Print a Network Configuration page. See Configuration page on page 12.
   - On the Network Configuration page, see if a non-zero IP address is assigned to the device.
   - If the Network Configuration page does not have a valid, non-zero IP address, reset the HP internal network port to the factory defaults by pressing the Go and Cancel buttons at the same time.

     After the Attention, Ready, and Go lights finish cycling, the device returns to a Ready state and the reset is complete.
   - Two minutes after the device reaches the Ready state, print another Network Configuration page, and check to see if a valid IP address is assigned to the device.
   - If the IP address is still zeros, contact HP support. See Contact HP support on page 70.

6 Parts and diagrams

- Assembly locations
- Covers
- Internal assemblies
- Alphabetical parts list
- Numerical parts list

Assembly locations

Figure 6-1 Assembly locations (1 of 1)

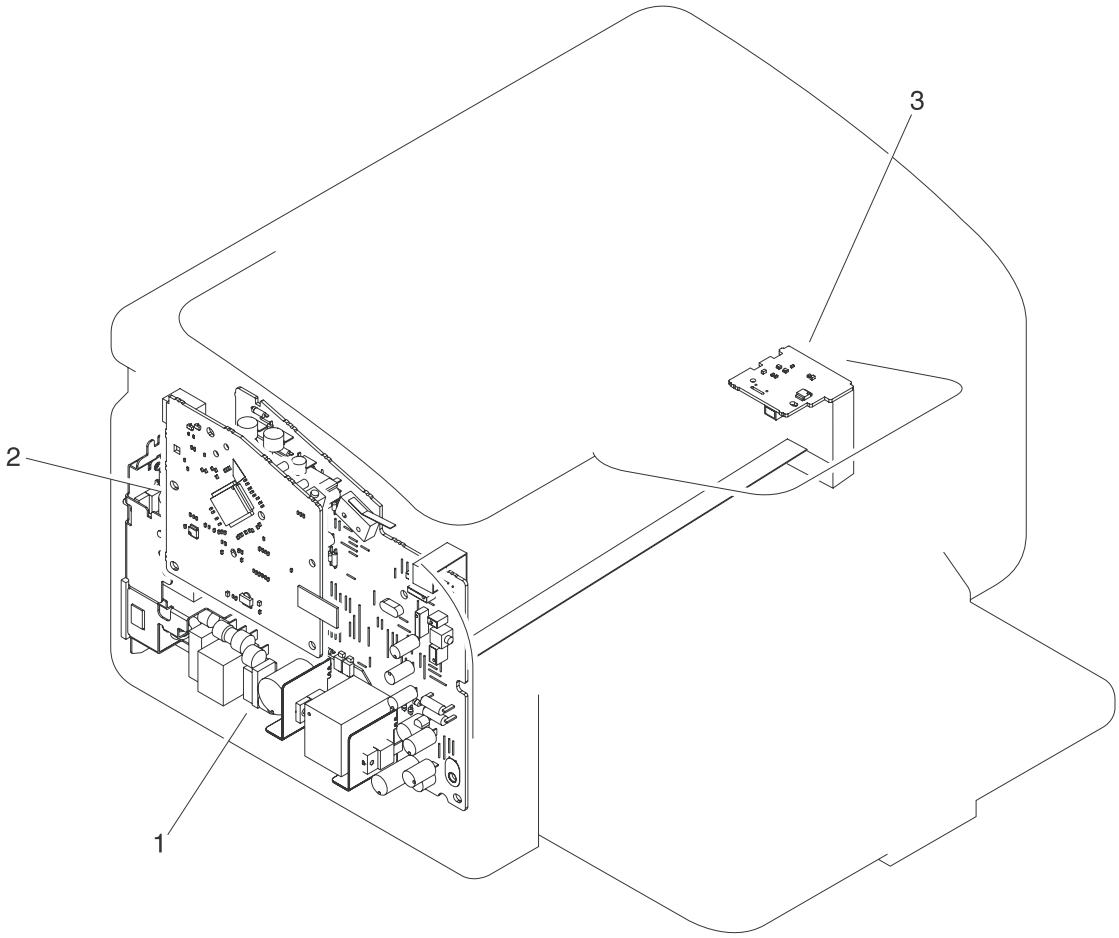


Table 6-1 Assembly locations (1 of 1)

Ref	Description	Part number	Qty
1	engine control PCB assembly	RM1-4601-000	1
1	engine control PCB assembly	RM1-4602-000	1
2	formatter PCB assembly	RM1-4607-000	1
2	formatter PCB assembly	RM1-4608-000	1
3	motor PCB assembly	RM1-4605-000	1

Covers

Figure 6-2 HP LaserJet P1006/P1008 covers

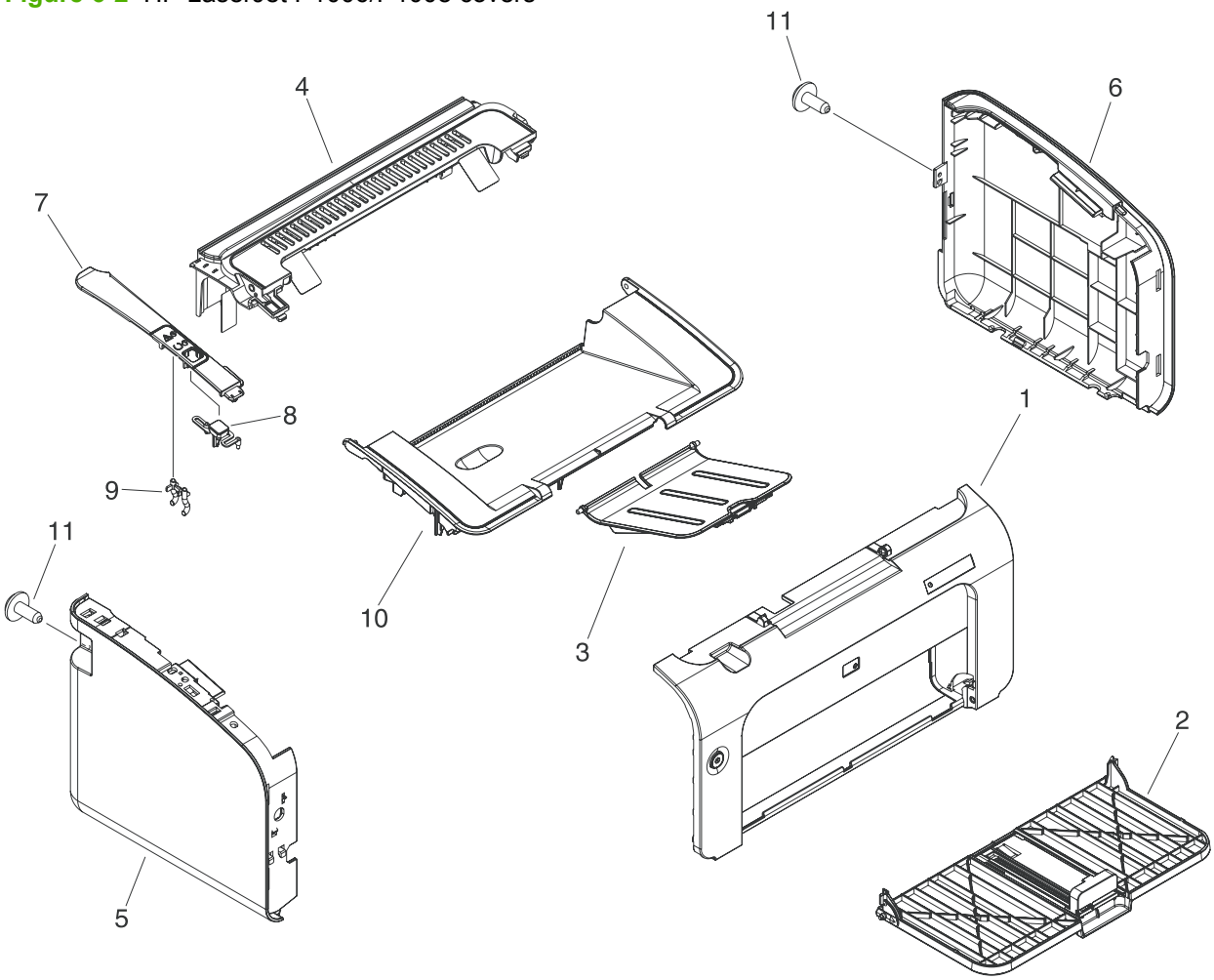


Table 6-2 HP LaserJet P1006/P1008 covers

Ref	Description	Part number	Qty
1	front cover assembly	RM1-3977-000	1
2	paper pick-up tray assembly	RM1-3979-000	1
3	paper delivery tray assembly	RM1-3981-000	1
4	face-down cover assembly	RM1-3983-000	1
5	left cover assembly	RM1-3985-000	1
6	right cover assembly	RM1-3987-000	1
7	plate, left	RC2-1097-000	1
8	button, cancel	RC2-1106-000	1
9	pipe, light	RC2-1108-000	1
10	door, cartridge	RC2-1206-000	1
11	screw, D, M3X8	XA9-1671-000	2

Figure 6-3 HP LaserJet P1005 covers

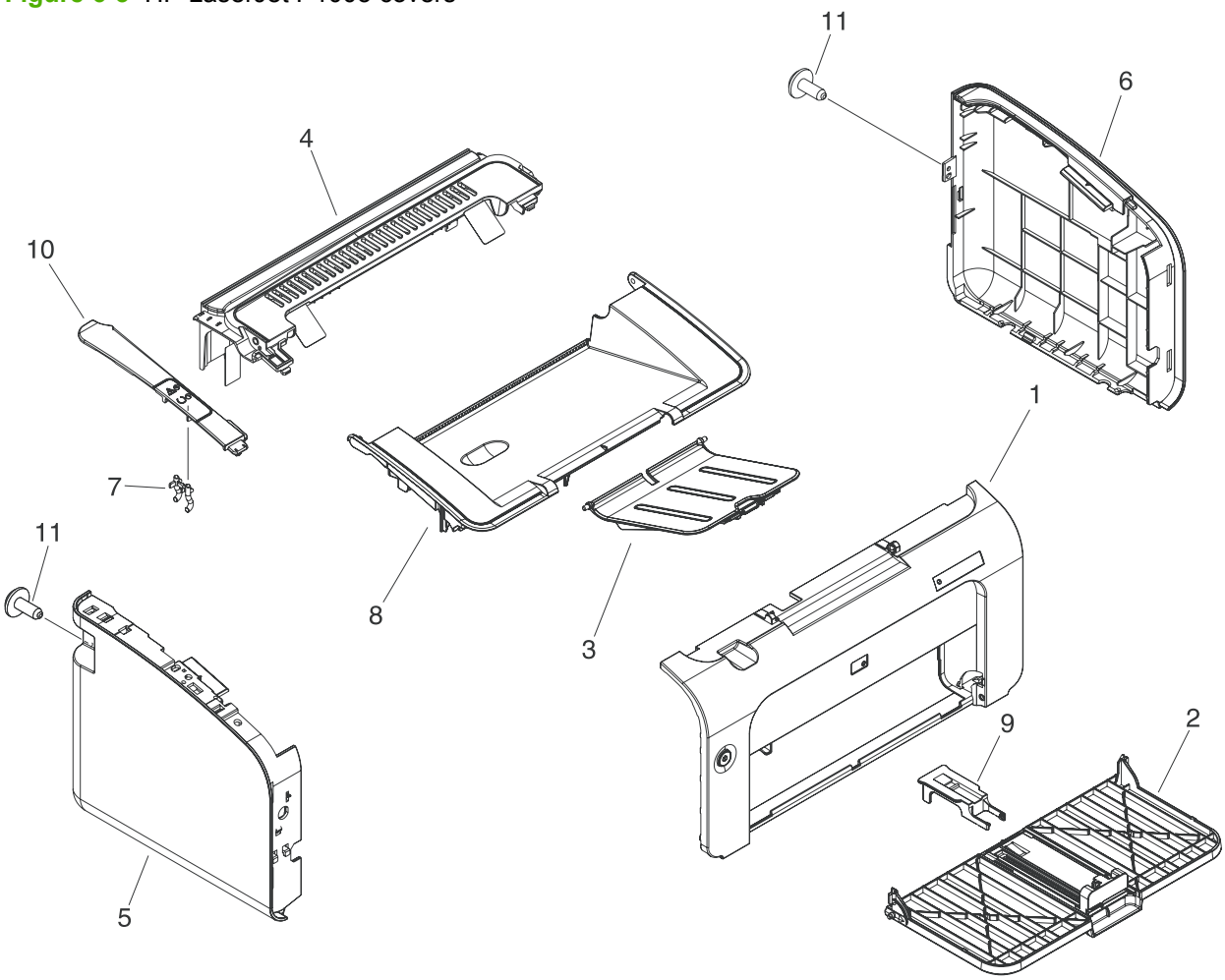


Table 6-3 HP LaserJet P1005 covers

Ref	Description	Part number	Qty
1	front cover assembly	RM1-3978-000	1
2	paper pick-up tray assembly	RM1-3980-000	1
3	paper delivery tray assembly	RM1-3982-000	1
4	face-down cover assembly	RM1-3984-000	1
5	left cover assembly	RM1-3986-000	1
6	right cover assembly	RM1-3988-000	1
7	pipe, light	RC2-1108-000	1
8	door, cartridge	RC2-1090-000	1
9	stopper, paper	RC2-1100-000	1
10	plate, left	RC2-1213-000	1
11	screw, D, M3X8	XA9-1671-000	2

Figure 6-4 HP LaserJet P1007 covers

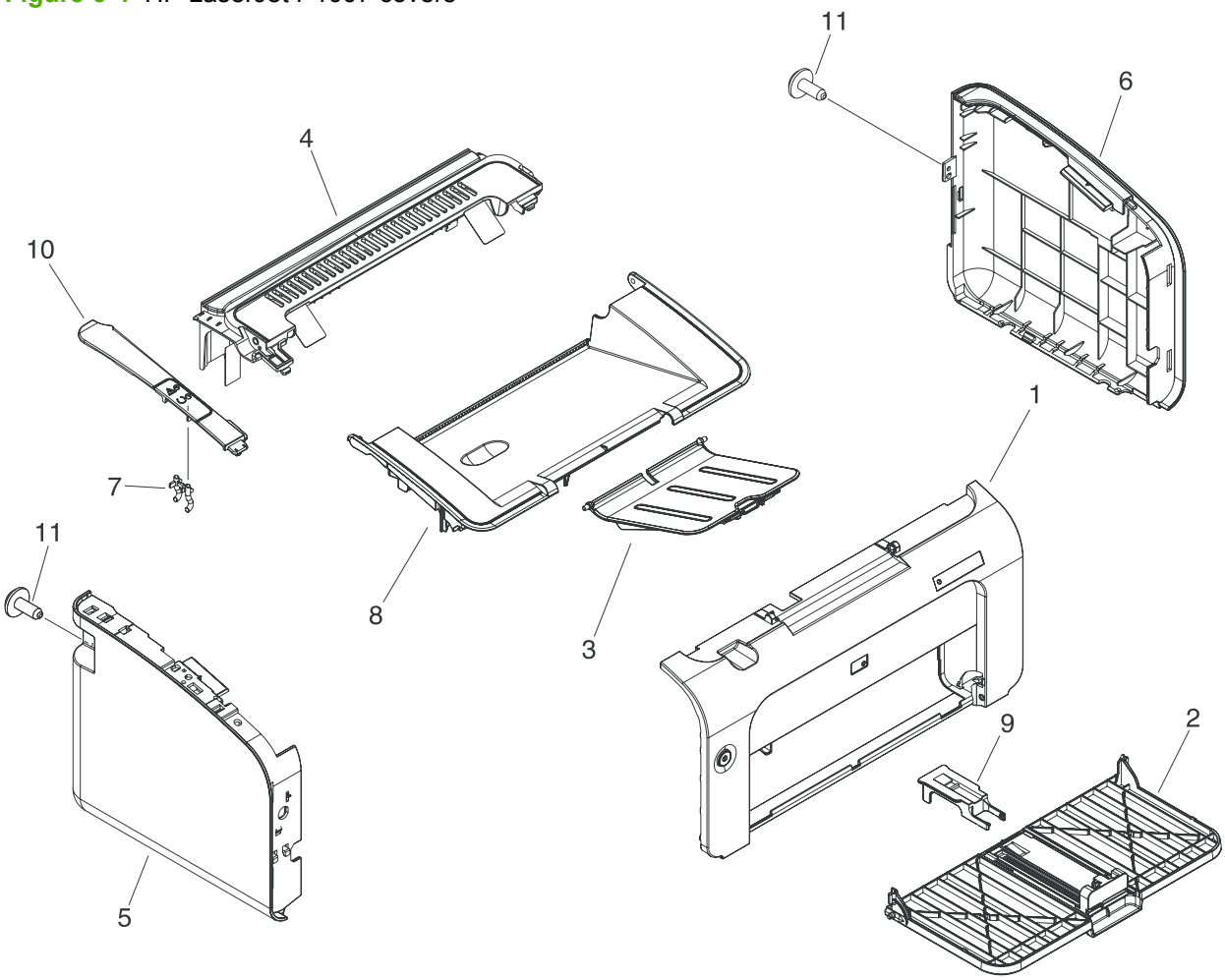


Table 6-4 HP LaserJet P1007 covers

Ref	Description	Part number	Qty
1	front cover assembly	RM1-4018-000	1
2	paper pick-up tray assembly	RM1-4019-000	1
3	paper delivery tray assembly	RM1-3981-000	1
4	face-down cover assembly	RM1-4020-000	1
5	left cover assembly	RM1-3985-000	1
6	right cover assembly	RM1-4021-000	1
7	pipe, light	RC2-1108-000	1
8	door, cartridge	RC2-1206-000	1
9	stopper, paper	RC2-1100-000	1
10	plate, left	RC2-1235-000	1
11	screw, D, M3X8	XA9-1671-000	2

Internal assemblies

Figure 6-5 Internal components (1 of 3)

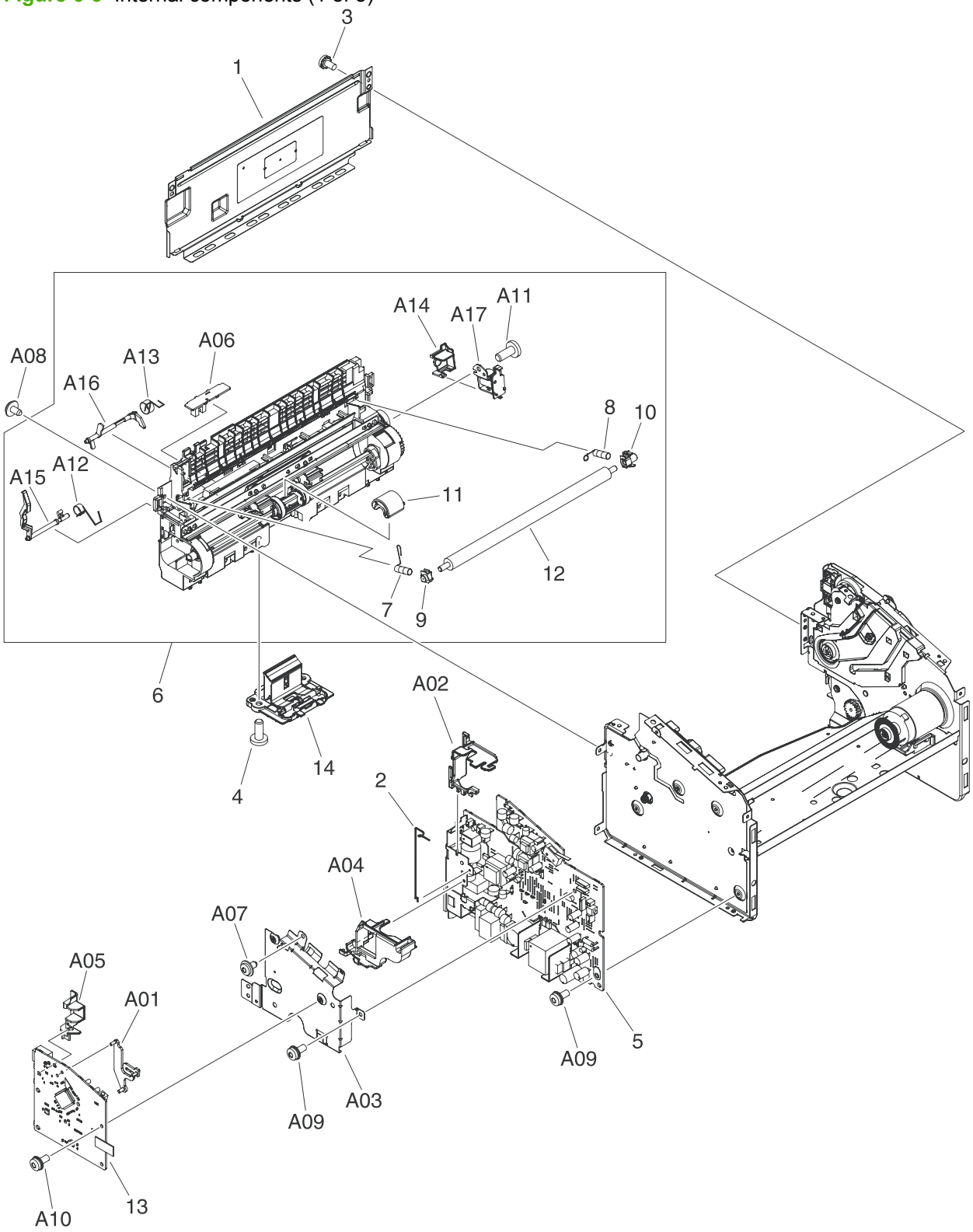


Table 6-5 Internal components (1 of 3)

Ref	Description	Part number	Qty
1	panel, rear	RC2-1123-000	1
2	contact, cable	RU5-2953-000	1
3	screw,W/washer,M3X6	XB2-7300-605	2
4	screw, P, M4X10	XB4-5401-005	2
5	engine control PCB assembly	RM1-4601-000	1
5	engine control PCB assembly	RM1-4602-000	1
6	pick-up transfer frame assembly	RM1-4001-000	1
7	spring, compression	RU5-2942-000	1
8	spring, compression	RU5-2941-000	1
9	bushing	RC2-1067-000	1
10	bushing	RC2-1066-000	1
11	roller, paper pick-up	RL1-1442-000	1
12	roller, transfer	RM1-4023-000	1
13	formatter PCB assembly	RM1-4607-000	1
13	formatter PCB assembly	RM1-4608-000	1
14	Separation pad assembly	RM1-4006-000	1
A01	spacer, formatter	RC2-1228-000	1
A02	guide, cable	RC2-1103-000	1
A03	crossmember, formatter	RC2-1127-000	1
A04	crossmember, ECU	RC2-1229-000	1
A05	cover, USB	RC2-1204-000	1
A06	sensor PCA assembly	RM1-4604-000	1
A07	screw, tap, M3X6	XA9-1503-000	2
A08	screw, D, M3X6	XA9-1670-000	21
A09	screw, W/washer, M3X8	XA9-1420-000	4
A10	screw, W/washer, M3X8	XA9-1420-000	4
A11	screw, P, M4X10	XB4-5401-005	1
A12	spring, torsion	RU5-2940-000	1
A13	spring, torsion	RU5-2939-000	1
A14	cover, solenoid	RC2-1194-000	1
A15	flag, cartridge detect sensor	RC2-1065-000	1
A16	flag, registration sensor	RC2-1064-000	1
A17	solenoid	RM1-4618-000	1

Figure 6-6 Internal components (2 of 3)

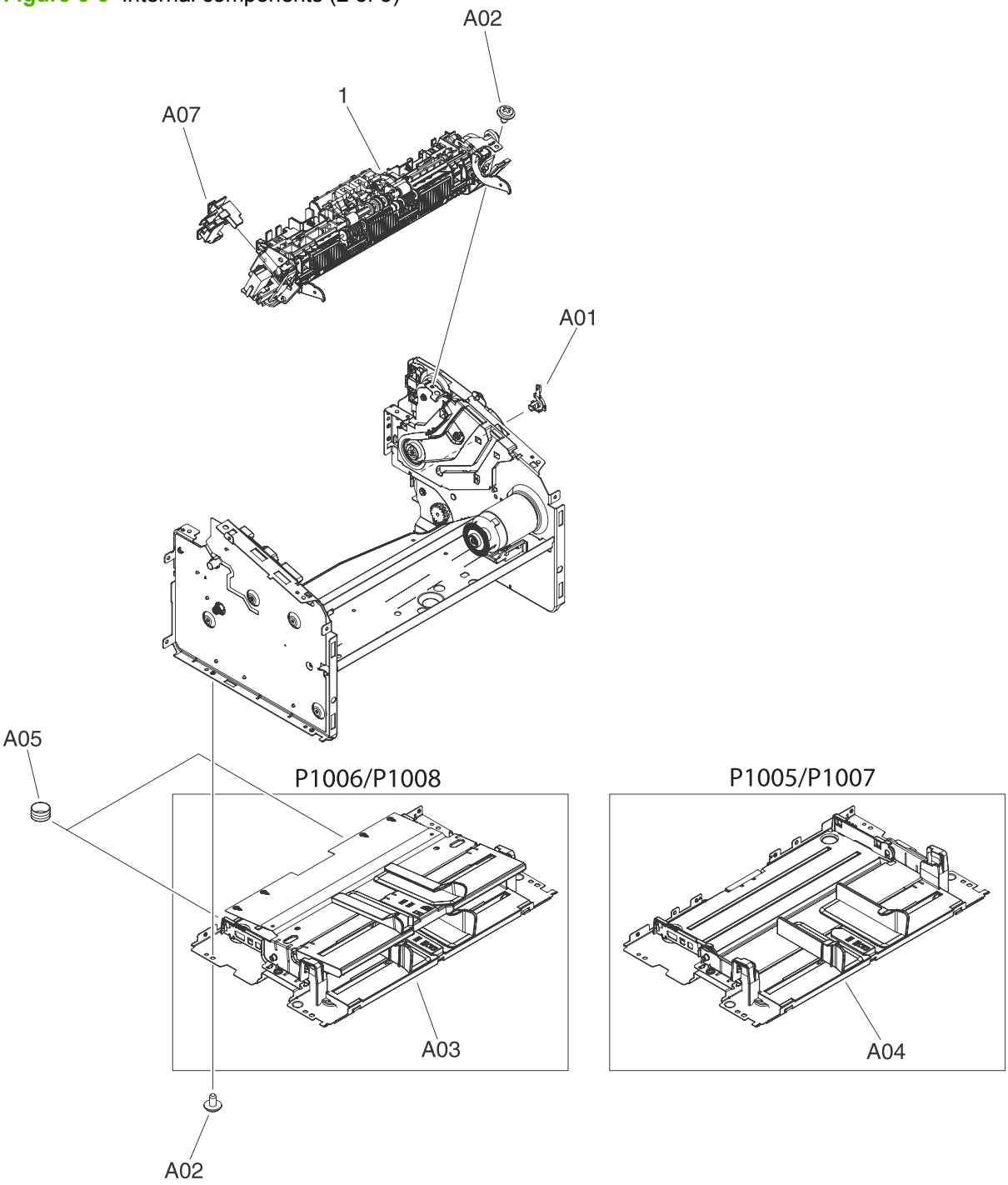


Table 6-6 Internal components (2 of 3)

Ref	Description	Part number	Qty
1	fixing paper delivery assembly	RM1-4007-000	1
1	fixing paper delivery assembly	RM1-4008-000	1
A01	SupPORT, SHAFT	RC2-1236-000	1
A02	screw, D, M3X6	XA9-1670-000	21
A03	base plate assembly	RM1-3995-000	1
A04	base plate assembly	RM1-4000-000	1
A05	spring, compression	RU5-2959-000	2
A06	guide, cable	RC2-1191-000	1

Figure 6-7 Internal components (3 of 3)

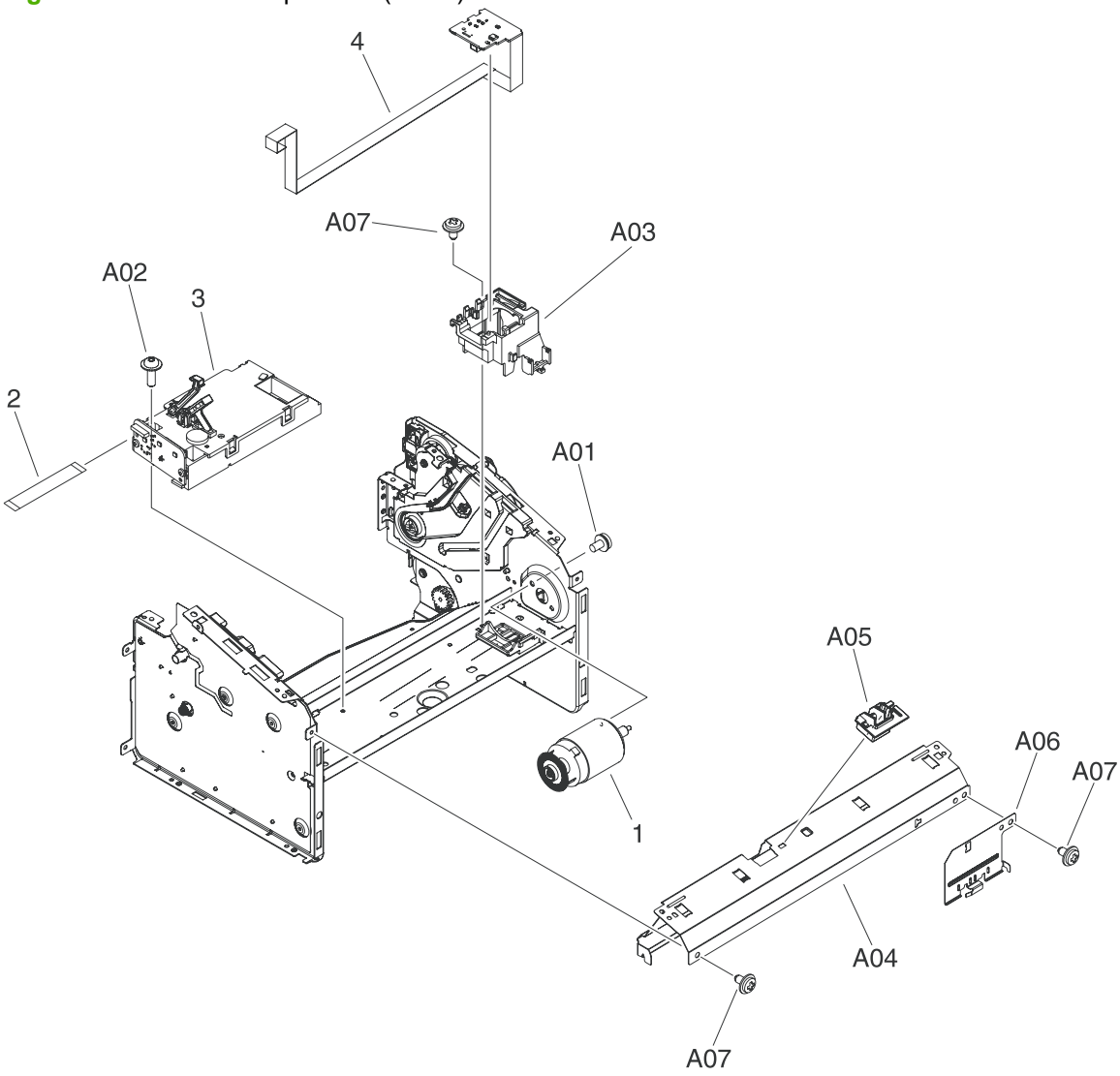


Table 6-7 Internal components (3 of 3)

Ref	Description	Part number	Qty
1	motor, DC24V	RL1-1450-000	1
2	FFC, laser	RK2-1697-000	1
3	laser scanner assembly	RM1-4030-000	1
4	motor PCB assembly	RM1-4605-000	1
A01	screw, RS, M3X6	XB2-8300-609	2
A02	screw, RS, M3X10	XA9-1501-000	4
A03	crossmember, motor	RC2-1109-000	1
A04	cover, scanner	RC2-1125-000	1
A05	hook, door	RC2-1102-000	1
A06	plate, motor shield	RC2-1179-000	1
A07	screw, D, M3X6	XA9-1670-000	21

Alphabetical parts list

Table 6-8 Alphabetical parts list

Description	Part number	Table and page
base plate assembly	RM1-3995-000	Internal components (2 of 3) on page 99
base plate assembly	RM1-4000-000	Internal components (2 of 3) on page 99
bushing	RC2-1067-000	Internal components (1 of 3) on page 97
bushing	RC2-1066-000	Internal components (1 of 3) on page 97
button, cancel	RC2-1106-000	HP LaserJet P1006/P1008 covers on page 91
contact, cable	RU5-2953-000	Internal components (1 of 3) on page 97
cover, scanner	RC2-1125-000	Internal components (3 of 3) on page 101
cover, solenoid	RC2-1194-000	Internal components (1 of 3) on page 97
cover, USB	RC2-1204-000	Internal components (1 of 3) on page 97
crossmember, ECU	RC2-1229-000	Internal components (1 of 3) on page 97
crossmember, formatter	RC2-1127-000	Internal components (1 of 3) on page 97
crossmember, motor	RC2-1109-000	Internal components (3 of 3) on page 101
door, cartridge	RC2-1206-000	HP LaserJet P1006/P1008 covers on page 91
door, cartridge	RC2-1090-000	HP LaserJet P1005 covers on page 93
door, cartridge	RC2-1206-000	HP LaserJet P1007 covers on page 95
engine control PCB assembly	RM1-4601-000	Assembly locations (1 of 1) on page 89
engine control PCB assembly	RM1-4602-000	Assembly locations (1 of 1) on page 89
engine control PCB assembly	RM1-4601-000	Internal components (1 of 3) on page 97
engine control PCB assembly	RM1-4602-000	Internal components (1 of 3) on page 97
face-down cover assembly	RM1-3983-000	HP LaserJet P1006/P1008 covers on page 91
face-down cover assembly	RM1-3984-000	HP LaserJet P1005 covers on page 93

Table 6-8 Alphabetical parts list (continued)

Description	Part number	Table and page
face-down cover assembly	RM1-4020-000	HP LaserJet P1007 covers on page 95
FFC, laser	RK2-1697-000	Internal components (3 of 3) on page 101
fixing paper delivery assembly	RM1-4007-000	Internal components (2 of 3) on page 99
fixing paper delivery assembly	RM1-4008-000	Internal components (2 of 3) on page 99
flag, cartridge detect sensor	RC2-1065-000	Internal components (1 of 3) on page 97
flag, registration sensor	RC2-1064-000	Internal components (1 of 3) on page 97
formatter PCB assembly	RM1-4607-000	Assembly locations (1 of 1) on page 89
formatter PCB assembly	RM1-4608-000	Assembly locations (1 of 1) on page 89
formatter PCB assembly	RM1-4607-000	Internal components (1 of 3) on page 97
formatter PCB assembly	RM1-4608-000	Internal components (1 of 3) on page 97
front cover assembly	RM1-3977-000	HP LaserJet P1006/P1008 covers on page 91
front cover assembly	RM1-3978-000	HP LaserJet P1005 covers on page 93
front cover assembly	RM1-4018-000	HP LaserJet P1007 covers on page 95
guide, cable	RC2-1103-000	Internal components (1 of 3) on page 97
guide, cable	RC2-1191-000	Internal components (2 of 3) on page 99
hook, door	RC2-1102-000	Internal components (3 of 3) on page 101
laser scanner assembly	RM1-4030-000	Internal components (3 of 3) on page 101
left cover assembly	RM1-3985-000	HP LaserJet P1006/P1008 covers on page 91
left cover assembly	RM1-3986-000	HP LaserJet P1005 covers on page 93
left cover assembly	RM1-3985-000	HP LaserJet P1007 covers on page 95
motor PCB assembly	RM1-4605-000	Assembly locations (1 of 1) on page 89
motor PCB assembly	RM1-4605-000	Internal components (3 of 3) on page 101

Table 6-8 Alphabetical parts list (continued)

Description	Part number	Table and page
motor, DC24V	RL1-1450-000	Internal components (3 of 3) on page 101
panel, rear	RC2-1123-000	Internal components (1 of 3) on page 97
paper delivery tray assembly	RM1-3981-000	HP LaserJet P1006/P1008 covers on page 91
paper delivery tray assembly	RM1-3982-000	HP LaserJet P1005 covers on page 93
paper delivery tray assembly	RM1-3981-000	HP LaserJet P1007 covers on page 95
paper pick-up tray assembly	RM1-3979-000	HP LaserJet P1006/P1008 covers on page 91
paper pick-up tray assembly	RM1-3980-000	HP LaserJet P1005 covers on page 93
paper pick-up tray assembly	RM1-4019-000	HP LaserJet P1007 covers on page 95
pick-up transfer frame assembly	RM1-4001-000	Internal components (1 of 3) on page 97
pipe, light	RC2-1108-000	HP LaserJet P1006/P1008 covers on page 91
pipe, light	RC2-1108-000	HP LaserJet P1005 covers on page 93
pipe, light	RC2-1108-000	HP LaserJet P1007 covers on page 95
plate, left	RC2-1097-000	HP LaserJet P1006/P1008 covers on page 91
plate, left	RC2-1213-000	HP LaserJet P1005 covers on page 93
plate, left	RC2-1235-000	HP LaserJet P1007 covers on page 95
plate, motor shield	RC2-1179-000	Internal components (3 of 3) on page 101
right cover assembly	RM1-3987-000	HP LaserJet P1006/P1008 covers on page 91
right cover assembly	RM1-3988-000	HP LaserJet P1005 covers on page 93
right cover assembly	RM1-4021-000	HP LaserJet P1007 covers on page 95
roller, paper pick-up	RL1-1442-000	Internal components (1 of 3) on page 97
roller, transfer	RM1-4023-000	Internal components (1 of 3) on page 97
screw, D, M3X6	XA9-1670-000	Internal components (1 of 3) on page 97

Table 6-8 Alphabetical parts list (continued)

Description	Part number	Table and page
screw, D, M3X6	XA9-1670-000	Internal components (2 of 3) on page 99
screw, D, M3X6	XA9-1670-000	Internal components (3 of 3) on page 101
screw, D, M3X8	XA9-1671-000	HP LaserJet P1006/P1008 covers on page 91
screw, D, M3X8	XA9-1671-000	HP LaserJet P1005 covers on page 93
screw, D, M3X8	XA9-1671-000	HP LaserJet P1007 covers on page 95
screw, P, M4X10	XB4-5401-005	Internal components (1 of 3) on page 97
screw, P, M4X10	XB4-5401-005	Internal components (1 of 3) on page 97
screw, RS, M3X10	XA9-1501-000	Internal components (3 of 3) on page 101
screw, RS, M3X6	XB2-8300-609	Internal components (3 of 3) on page 101
screw, tap, M3X6	XA9-1503-000	Internal components (1 of 3) on page 97
screw, W/washer, M3X8	XA9-1420-000	Internal components (1 of 3) on page 97
screw, W/washer, M3X8	XA9-1420-000	Internal components (1 of 3) on page 97
screw,W/washer,M3X6	XB2-7300-605	Internal components (1 of 3) on page 97
sensor PCA assembly	RM1-4604-000	Internal components (1 of 3) on page 97
Separation pad assembly	RM1-4006-000	Internal components (1 of 3) on page 97
solenoid	RM1-4618-000	Internal components (1 of 3) on page 97
spacer, formatter	RC2-1228-000	Internal components (1 of 3) on page 97
spring, compression	RU5-2942-000	Internal components (1 of 3) on page 97
spring, compression	RU5-2941-000	Internal components (1 of 3) on page 97
spring, compression	RU5-2959-000	Internal components (2 of 3) on page 99
spring, torsion	RU5-2940-000	Internal components (1 of 3) on page 97
spring, torsion	RU5-2939-000	Internal components (1 of 3) on page 97

Table 6-8 Alphabetical parts list (continued)

Description	Part number	Table and page
stopper, paper	RC2-1100-000	HP LaserJet P1005 covers on page 93
stopper, paper	RC2-1100-000	HP LaserJet P1007 covers on page 95
SupPORT, SHAFT	RC2-1236-000	Internal components (2 of 3) on page 99

Numerical parts list

Table 6-9 Numerical parts list

Part number	Description	Table and page
RC2-1064-000	flag, registration sensor	Internal components (1 of 3) on page 97
RC2-1065-000	flag, cartridge detect sensor	Internal components (1 of 3) on page 97
RC2-1066-000	bushing	Internal components (1 of 3) on page 97
RC2-1067-000	bushing	Internal components (1 of 3) on page 97
RC2-1090-000	door, cartridge	HP LaserJet P1005 covers on page 93
RC2-1097-000	plate, left	HP LaserJet P1006/P1008 covers on page 91
RC2-1100-000	stopper, paper	HP LaserJet P1005 covers on page 93
RC2-1100-000	stopper, paper	HP LaserJet P1007 covers on page 95
RC2-1102-000	hook, door	Internal components (3 of 3) on page 101
RC2-1103-000	guide, cable	Internal components (1 of 3) on page 97
RC2-1106-000	button, cancel	HP LaserJet P1006/P1008 covers on page 91
RC2-1108-000	pipe, light	HP LaserJet P1006/P1008 covers on page 91
RC2-1108-000	pipe, light	HP LaserJet P1005 covers on page 93
RC2-1108-000	pipe, light	HP LaserJet P1007 covers on page 95
RC2-1109-000	crossmember, motor	Internal components (3 of 3) on page 101
RC2-1123-000	panel, rear	Internal components (1 of 3) on page 97
RC2-1125-000	cover, scanner	Internal components (3 of 3) on page 101
RC2-1127-000	crossmember, formatter	Internal components (1 of 3) on page 97
RC2-1179-000	plate, motor shield	Internal components (3 of 3) on page 101
RC2-1191-000	guide, cable	Internal components (2 of 3) on page 99
RC2-1194-000	cover, solenoid	Internal components (1 of 3) on page 97

Table 6-9 Numerical parts list (continued)

Part number	Description	Table and page
RC2-1204-000	cover, USB	Internal components (1 of 3) on page 97
RC2-1206-000	door, cartridge	HP LaserJet P1006/P1008 covers on page 91
RC2-1206-000	door, cartridge	HP LaserJet P1007 covers on page 95
RC2-1213-000	plate, left	HP LaserJet P1005 covers on page 93
RC2-1228-000	spacer, formatter	Internal components (1 of 3) on page 97
RC2-1229-000	crossmember, ECU	Internal components (1 of 3) on page 97
RC2-1235-000	plate, left	HP LaserJet P1007 covers on page 95
RC2-1236-000	SupPORT, SHAFT	Internal components (2 of 3) on page 99
RK2-1697-000	FFC, laser	Internal components (3 of 3) on page 101
RL1-1442-000	roller, paper pick-up	Internal components (1 of 3) on page 97
RL1-1450-000	motor, DC24V	Internal components (3 of 3) on page 101
RM1-3977-000	front cover assembly	HP LaserJet P1006/P1008 covers on page 91
RM1-3978-000	front cover assembly	HP LaserJet P1005 covers on page 93
RM1-3979-000	paper pick-up tray assembly	HP LaserJet P1006/P1008 covers on page 91
RM1-3980-000	paper pick-up tray assembly	HP LaserJet P1005 covers on page 93
RM1-3981-000	paper delivery tray assembly	HP LaserJet P1006/P1008 covers on page 91
RM1-3981-000	paper delivery tray assembly	HP LaserJet P1007 covers on page 95
RM1-3982-000	paper delivery tray assembly	HP LaserJet P1005 covers on page 93
RM1-3983-000	face-down cover assembly	HP LaserJet P1006/P1008 covers on page 91
RM1-3984-000	face-down cover assembly	HP LaserJet P1005 covers on page 93
RM1-3985-000	left cover assembly	HP LaserJet P1006/P1008 covers on page 91
RM1-3985-000	left cover assembly	HP LaserJet P1007 covers on page 95

Table 6-9 Numerical parts list (continued)

Part number	Description	Table and page
RM1-3986-000	left cover assembly	HP LaserJet P1005 covers on page 93
RM1-3987-000	right cover assembly	HP LaserJet P1006/P1008 covers on page 91
RM1-3988-000	right cover assembly	HP LaserJet P1005 covers on page 93
RM1-3995-000	base plate assembly	Internal components (2 of 3) on page 99
RM1-4000-000	base plate assembly	Internal components (2 of 3) on page 99
RM1-4001-000	pick-up transfer frame assembly	Internal components (1 of 3) on page 97
RM1-4006-000	Separation pad assembly	Internal components (1 of 3) on page 97
RM1-4007-000	fixing paper delivery assembly	Internal components (2 of 3) on page 99
RM1-4008-000	fixing paper delivery assembly	Internal components (2 of 3) on page 99
RM1-4018-000	front cover assembly	HP LaserJet P1007 covers on page 95
RM1-4019-000	paper pick-up tray assembly	HP LaserJet P1007 covers on page 95
RM1-4020-000	face-down cover assembly	HP LaserJet P1007 covers on page 95
RM1-4021-000	right cover assembly	HP LaserJet P1007 covers on page 95
RM1-4023-000	roller, transfer	Internal components (1 of 3) on page 97
RM1-4030-000	laser scanner assembly	Internal components (3 of 3) on page 101
RM1-4601-000	engine control PCB assembly	Assembly locations (1 of 1) on page 89
RM1-4601-000	engine control PCB assembly	Internal components (1 of 3) on page 97
RM1-4602-000	engine control PCB assembly	Assembly locations (1 of 1) on page 89
RM1-4602-000	engine control PCB assembly	Internal components (1 of 3) on page 97
RM1-4604-000	sensor PCA assembly	Internal components (1 of 3) on page 97
RM1-4605-000	motor PCB assembly	Assembly locations (1 of 1) on page 89
RM1-4605-000	motor PCB assembly	Internal components (3 of 3) on page 101

Table 6-9 Numerical parts list (continued)

Part number	Description	Table and page
RM1-4607-000	formatter PCB assembly	Assembly locations (1 of 1) on page 89
RM1-4607-000	formatter PCB assembly	Internal components (1 of 3) on page 97
RM1-4608-000	formatter PCB assembly	Assembly locations (1 of 1) on page 89
RM1-4608-000	formatter PCB assembly	Internal components (1 of 3) on page 97
RM1-4618-000	solenoid	Internal components (1 of 3) on page 97
RU5-2939-000	spring, torsion	Internal components (1 of 3) on page 97
RU5-2940-000	spring, torsion	Internal components (1 of 3) on page 97
RU5-2941-000	spring, compression	Internal components (1 of 3) on page 97
RU5-2942-000	spring, compression	Internal components (1 of 3) on page 97
RU5-2953-000	contact, cable	Internal components (1 of 3) on page 97
RU5-2959-000	spring, compression	Internal components (2 of 3) on page 99
XA9-1420-000	screw, W/washer, M3X8	Internal components (1 of 3) on page 97
XA9-1420-000	screw, W/washer, M3X8	Internal components (1 of 3) on page 97
XA9-1501-000	screw, RS, M3X10	Internal components (3 of 3) on page 101
XA9-1503-000	screw, tap, M3X6	Internal components (1 of 3) on page 97
XA9-1670-000	screw, D, M3X6	Internal components (1 of 3) on page 97
XA9-1670-000	screw, D, M3X6	Internal components (2 of 3) on page 99
XA9-1670-000	screw, D, M3X6	Internal components (3 of 3) on page 101
XA9-1671-000	screw, D, M3X8	HP LaserJet P1006/P1008 covers on page 91
XA9-1671-000	screw, D, M3X8	HP LaserJet P1005 covers on page 93
XA9-1671-000	screw, D, M3X8	HP LaserJet P1007 covers on page 95
XB2-7300-605	screw,W/washer,M3X6	Internal components (1 of 3) on page 97

Table 6-9 Numerical parts list (continued)

Part number	Description	Table and page
XB2-8300-609	screw, RS, M3X6	Internal components (3 of 3) on page 101
XB4-5401-005	screw, P, M4X10	Internal components (1 of 3) on page 97
XB4-5401-005	screw, P, M4X10	Internal components (1 of 3) on page 97

A Service and support

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Limited warranty for print cartridges and image drums

This HP Print Cartridge is warranted to be free from defects in materials and workmanship.

This warranty does not apply to print cartridges that (a) have been refilled, refurbished, remanufactured or tampered with in any way, (b) experience problems resulting from misuse, improper storage, or operation outside of the published environmental specifications for the printer product or (c) exhibit wear from ordinary use.

To obtain warranty service, please return the product to place of purchase (with a written description of the problem and print samples) or contact HP customer support. At HP's option, HP will either replace products that prove to be defective or refund your purchase price.

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B Device specifications

Table B-1 Physical specifications[1]

Specification	HP LaserJet P1000 Series
Device weight (without cartridge)	4.7 kg (10.4 lbs)
Device weight, including cartridge	5.2 kg (11.5)
Device height	195 mm (7.7 inches)
Device depth, with paper tray closed	238 mm (9.4 inches)
Device depth, with paper tray extended for letter size paper	344 mm (13.5 inches)
Device depth, with paper tray extended for A4 size paper	353 mm (13.9 inches)
Device depth, with paper tray full extended for legal size paper	411 mm (16.2 inches)
Device width	349 mm (13.7 inches)

1 Values are based on preliminary data. See http://www.hp.com/support/ljp1000 for current information.

⚠ **WARNING!** Power requirements are based on the country/region where the device is sold. Do not convert operating voltages. Doing so might damage the device and void the product warranty.

Table B-2 Electrical specifications[1]

Item	110 Volt models	220 Volt models
Power requirements	100-127V (+/-10%), 50/60 Hz (+/- 2 Hz)	220-240V (+/-10%), 50/60 Hz (+/- 2 Hz)
Rated current for the HP LaserJet P1000 Series	4.9 amps	2.9 amps

1 Values are based on preliminary data. See http://www.hp.com/support/ljp1000 for current information.

Table B-3 Power consumption (average, in Watts)[1]

Product model	Printing[2]	Ready[2]	PowerSave	Off
HP LaserJet P1000 Series	285 Watts	4 Watts	4 Watts	0.8 Watt

1 Values are based on preliminary data. See http://www.hp.com/support/ljp1000 for current information.

2 Power reported is highest values measured for monochrome printing using all standard voltages.

3 Recovery time from Power Save to start of printing: < 8 seconds

4 Maximum heat dissipation for all models in Ready Mode = 62 BTU/Hour

Table B-4 Acoustic emissions[1]

Sound Power Level for the HP LaserJet P1000 Series	Declared Per ISO 9296[1]
Printing (14 PPM)[2]	L_{WAd} = 6.29 Bels (A) [62.9 dB (A)]
Ready	Inaudible
Sound Pressure Level (SPL)-Bystander Position for the HP LaserJet P1000 Series	**Declared Per ISO 9296[1]**
Printing (14 PPM)[2]	L_{pAm} = 50 dB(A)
Ready	Inaudible

1 Values are based on preliminary data. See http://www.hp.com/support/ljp1000 for current information.

2 Configuration tested: HP LaserJet P1000 Series, continuous monochrome printing on A4 paper at 14 PPM.

Table B-5 Environmental specifications

	Recommended[1]	Operating[1]	Storage[1]
Temperature	17.5°C to 25°C (63.5°F to 77° F)	10°C to 32.5°C (50°F to 90.5° F)	0°C to 40°C (32°F to 104°F)
Relative Humidity	30% to 70% (no condensation)	10% to 90% (no condensation)	10% to 90% (no condensation)

1 Values are based on preliminary data. See http://www.hp.com/support/ljp1000 for current information.

C Regulatory information

- FCC compliance
- Declaration of Conformity statements for HP LaserJet P1000 Series
- Regulatory statements
- Environmental product stewardship program

FCC compliance

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy. If it is not installed and used in accordance with the instructions, it may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase separation between equipment and receiver.
- Connect equipment to an outlet on a circuit different from that to which the receiver is located.
- Consult your dealer or an experienced radio/TV technician.

NOTE: Any changes or modifications to the printer that are not expressly approved by Hewlett-Packard could void the user's authority to operate this equipment.

Use of a shielded interface cable is required to comply with the Class B limits of Part 15 of FCC rules.

Declaration of Conformity statements for HP LaserJet P1000 Series

Declaration of Conformity

according to ISO/IEC Guide 17050-1 and EN 17050-1

Manufacturer's Name:	Hewlett-Packard Company
Manufacturer's Address:	11311 Chinden Boulevard, Boise, Idaho 83714-1021, USA

declares that the product

Product Name:	HP LaserJet P1005/P1006/P1007/P1008 Series
Regulatory Model [3]:	BOISB-0605-00
Product Options:	ALL
	Toner Cartridge: CB435A

conforms to the following Product Specifications:

Safety:	IEC 60950-1:2001 / EN 60950-1:2001 +A11 IEC 60825-1:1993 +A1 +A2/EN 60825-1:1994 +A1 +A2 (Class 1 Laser/LED Product) GB4943-2001
EMC:	CISPR 22:2005 / EN 55022:2006 Class B[1] EN 61000-3-2:2000 + A2 EN 61000-3-3:1995 + A1 EN 55024:1998 +A1 +A2 FCC Title 47 CFR, Part 15 Class B[2] / ICES-003, Issue 4 GB9254-1998, GB17625.1-2003

Supplementary Information:

The product herewith complies with the requirements of the EMC Directive 2004/108/EC and the Low Voltage Directive 2006/95/EC, and carries the CE-marking accordingly.

1) The product was tested in a typical configuration with Hewlett-Packard Personal Computer Systems.

2) This Device complies with Part 15 of the FCC Rules. Operation is subject to the following two Conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

3) For regulatory purposes, this product is assigned a Regulatory model number. This number should not be confused with the product name or the product number(s).

Boise, Idaho 83714, USA

June 14, 2006

For Regulatory Topics ONLY, contact:

Australia Contact:	Product Regulations Manager, Hewlett-Packard Australia Ltd., 31-41 Joseph Street, Blackburn, Victoria 3130, Australia
European Contact:	Your Local Hewlett-Packard Sales and Service Office or Hewlett-Packard GmbH, Department HQ-TRE / Standards Europe, Herrenberger Straße 140, D-71034 Böblingen, Germany, (FAX: +49-7031-14-3143)
USA Contact:	Product Regulations Manager, Hewlett-Packard Company, PO Box 15, Mail Stop 160, Boise, Idaho 83707-0015, USA, (Phone: 208-396-6000)

Regulatory statements

Laser safety statement

The Center for Devices and Radiological Health (CDRH) of the U.S. Food and Drug Administration has implemented regulations for laser products manufactured since August 1, 1976. Compliance is mandatory for products marketed in the United States. The printer is certified as a "Class 1" laser product under the U.S. Department of Health and Human Services (DHHS) Radiation Performance Standard according to the Radiation Control for Health and Safety Act of 1968.

Since radiation emitted inside the printer is completely confined within protective housings and external covers, the laser beam cannot escape during any phase of normal user operation.

⚠ **WARNING!** Using controls, making adjustments, or performing procedures other than those specified in this user guide could result in exposure to hazardous radiation.

Canadian DOC regulations

Complies with Canadian EMC Class B requirements.

« Conforme à la classe B des normes canadiennes de compatibilité électromagnétiques (CEM). »

Korean EMI statement

B급 기기 (가정용 정보통신기기)

이 기기는 가정용으로 전자파적합등록을 한 기기로서
주거지역에서는 물론 모든지역에서 사용할 수 있습니다.

Laser statement for Finland

LASERTURVALLISUUS

LUOKAN 1 LASERLAITE

KLASS 1 LASER APPARAT

HP LaserJet P1000- ja P1500-sarjat -laserkirjoitin on käyttäjän kannalta turvallinen luokan 1 laserlaite. Normaalissa käytössä kirjoittimen suojakotelointi estää lasersäteen pääsyn laitteen ulkopuolelle.

Laitteen turvallisuusluokka on määritetty standardin EN 60825-1 (1994) mukaisesti.

VAROITUS!

Laitteen käyttäminen muulla kuin käyttöohjeessa mainitulla tavalla saattaa altistaa käyttäjän turvallisuusluokan 1 ylittävälle näkymättömälle lasersäteilylle.

VARNING!

Om apparaten används på annat sätt än i bruksanvisning specificerats, kan användaren utsättas för osynlig laserstrålning, som överskrider gränsen för laserklass 1.

HUOLTO

HP LaserJet P1000- ja P1500-sarjat -kirjoittimen sisällä ei ole käyttäjän huollettavissa olevia kohteita. Laitteen saa avata ja huoltaa ainoastaan sen huoltamiseen koulutettu henkilö. Tällaiseksi huoltotoimenpiteeksi ei katsota väriainekasetin vaihtamista, paperiradan puhdistusta tai muita käyttäjän käsikirjassa lueteltuja, käyttäjän tehtäväksi tarkoitettuja ylläpitotoimia, jotka voidaan suorittaa ilman erikoistyökaluja.

VARO!

Mikäli kirjoittimen suojakotelo avataan, olet alttiina näkymättömälle lasersäteilylle laitteen ollessa toiminnassa. Älä katso säteeseen.

VARNING!

Om laserprinterns skyddshölje öppnas då apparaten är i funktion, utsättas användaren för osynlig laserstrålning. Betrakta ej strålen.

Tiedot laitteessa käytettävän laserdiodin säteilyominaisuuksista:

Aallonpituus 785-800 nm

Teho 5 mW

Luokan 3B laser

Substances Table (China)

根据中国电子信息产品污染控制管理办法的要求而出台

Table C-1 有毒有害物质表

部件名称	有毒有害物质和元素					
	铅 (Pb)	汞 (Hg)	镉 (Cd)	六价铬 (Cr(VI))	多溴联苯 (PBB)	多溴二苯醚 (PBDE)
打印引擎	X	O	X	X	O	O
控制面板	O	O	O	O	O	O
塑料外壳	O	O	O	O	O	O
格式化板组件	X	O	O	O	O	O
碳粉盒	X	O	O	O	O	O

O:表示在此部件所用的所有同类材料中，所含的此有毒或有害物质均低于 SJ/T11363-2006 的限制要求。

X:表示在此部件所用的所有同类材料中，至少一种所含的此有毒或有害物质高于 SJ/T11363-2006 的限制要求。

NOTE: 引用的“环保使用期限”是根据在正常温度和湿度条件下操作使用产品而确定的。

Environmental product stewardship program

Protecting the environment

Hewlett-Packard Company is committed to providing quality products in an environmentally sound manner. This product has been designed with several attributes to minimize impacts on our environment.

Ozone production

This product generates no appreciable ozone gas (O_3).

Power consumption

Power usage drops significantly while in Ready/Sleep mode, which saves natural resources and saves money without affecting the high performance of this product. To determine the ENERGY STAR® qualification status for this product see the Product Data Sheet or Specifications Sheet. Qualified products are also listed at:

http://www.hp.com/hpinfo/globalcitizenship/environment/productdesign/ecolabels.html

Toner consumption

Economode uses significantly less toner, which might extend the life of the print cartridge.

Paper use

This product's manual/optional automatic duplex feature (two-sided printing) and N-up printing (multiple pages printed on one page) capability can reduce paper usage and the resulting demands on natural resources.

Plastics

Plastic parts over 25 grams are marked according to international standards that enhance the ability to identify plastics for recycling purposes at the end of the product's life.

HP LaserJet print supplies

It's easy to return and recycle your empty HP LaserJet print cartridges—free of charge—with HP Planet Partners. Multilingual program information and instructions are included in every new HP LaserJet print cartridge and supplies package. You help reduce the toll on the environment further when you return multiple cartridges together rather than separately.

HP is committed to providing inventive, high-quality products and services that are environmentally sound, from product design and manufacturing to distribution, customer use and recycling. When you participate in the HP Planet Partners program, we ensure your HP LaserJet print cartridges are recycled properly, processing them to recover plastics and metals for new products and diverting millions of tons of waste from landfills. Since this cartridge is being recycled and used in new materials, it will not be returned to you. Thank you for being environmentally responsible!

NOTE: Use the return label to return original HP LaserJet print cartridges only. Please do not use this label for HP inkjet cartridges, non-HP cartridges, refilled or remanufactured cartridges or warranty returns. For information about recycling your HP inkjet cartridges please go to http://www.hp.com/recycle.

Return and recycling instructions

United States and Puerto Rico

The enclosed label in the HP LaserJet toner cartridge box is for the return and recycling of one or more HP LaserJet print cartridges after use. Please follow the applicable instructions below.

Multiple returns (two to eight cartridges)

1. Package each HP LaserJet print cartridge in its original box and bag.
2. Tape up to eight single boxes together using strapping or packaging tape (up to 70 lbs).
3. Use a single pre-paid shipping label.

OR

1. Use your own suitable box, or request a free bulk collection box from the http://www.hp.com/recycle or 1-800-340-2445 (holds up to eight HP LaserJet print cartridges).
2. Use a single pre-paid shipping label.

Single returns

1. Package the HP LaserJet print cartridge in its original bag and box.
2. Place the shipping label on the front of the box.

Shipping

For all HP LaserJet print cartridge recycling returns, give the package to UPS during your next delivery or pickup, or take it to an authorized UPS drop-off center. For the location of your local UPS drop-off center, call 1-800-PICKUPS or visit http://www.ups.com. If you are returning via USPS label, give the package to a U.S. Postal Service carrier or drop off at a U.S.Postal Service Office. For more information, or to order additional labels or boxes for bulk returns, visit http://www.hp.com/recycle or call 1-800-340-2445. Requested UPS pickup will be charged normal pickup rates. Information subject to change without notice.

Non-US returns

To participate in HP Planet Partners return and recycling program, just follow the simple directions in the recycling guide (found inside the packaging of your new printer supply item) or visit http://www.hp.com/recycle. Select your country/region for information on how to return your HP LaserJet printing supplies.

Paper

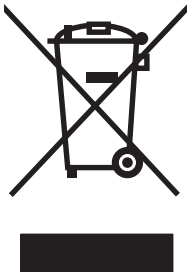
This product is capable of using recycled papers when the paper meets the guidelines outlined in the *HP LaserJet Printer Family Print Media Guide*. This product is suitable for the use of recycled paper according to EN12281:2002.

Material restrictions

This HP product does not contain added mercury.

This HP product does not contain a battery.

Disposal of waste equipment by users in private households in the European Union



This symbol on the product or on its packaging indicates that this product must not be disposed of with your other household waste. Instead, it is your responsibility to dispose of your waste equipment by handing it over to a designated collection point for the recycling of waste electrical and electronic equipment. The separate collection and recycling of your waste equipment at the time of disposal will help to conserve natural resources and ensure that it is recycled in a manner that protects human health and the environment. For more information about where you can drop off your waste equipment for recycling, please contact your local city office, your household waste disposal service or the shop where you purchased the product.

Material Safety Data Sheet (MSDS)

Material Safety Data Sheets (MSDS) for supplies containing chemical substances (for example, toner) can be obtained by contacting the HP Web site at www.hp.com/go/msds or www.hp.com/hpinfo/community/environment/productinfo/safety.

For more information

To obtain information about these environmental topics:

- Product environmental profile sheet for this and many related HP products
- HP's commitment to the environment
- HP's environmental management system
- HP's end-of-life product return and recycling program
- Material Safety Data Sheets

Visit www.hp.com/go/environment or www.hp.com/hpinfo/globalcitizenship/environment.

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