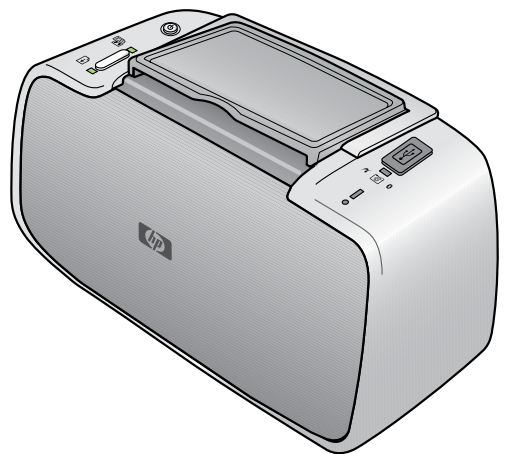


HP Photosmart A320 series



User Guide



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1 Welcome

Thank you for your HP Photosmart purchase! To get the maximum use out of your new printer, read this guide. Learn how to:

- Quickly and easily print beautiful photos directly from any **PictBridge** device—including digital cameras, camera phones, and video cameras.
- Print photos from any **Bluetooth** device—wirelessly!—with an optional Bluetooth adapter.
- Connect the printer to a **computer**, and take advantage of the photo editing, storing, sharing, and creative project capabilities of the included HP Photosmart software.
- Get higher quality photos with the help of the built-in **HP Real Life Technologies**, which correct red-eye, color, and contrast problems with the touch of a button.
- Take your **portable**, lightweight photo printer to social events to print and share photos instantly.

Find more information

Your new HP Photosmart A320 series printer comes with the following documentation:

- **Setup Guide:** The setup instructions that explain how to set up the printer. Read this document first.
- **Printer User Guide:** This is the book you are reading. This guide describes the basic features of the printer, explains how to use the printer without connecting it to a computer, explains how to install the HP Photosmart software, and contains hardware troubleshooting information.
- **Camera or camera phone documentation** (only if a camera or camera phone came in the box with your printer): The documentation that came with your camera explains how to use the camera to take pictures and includes troubleshooting and maintenance information. In addition, the camera image display provides information.
- **Electronic Help:** The electronic Help describes how to use the printer with a computer and contains software troubleshooting information.

After you have installed the HP Photosmart software on your computer (see “[Install the software](#)” on page 43), you can view the electronic Help on your computer. The Help displays on your computer screen and describes how to use the printer with a computer and how to troubleshoot software problems.

To access the electronic Help:

- **Windows:** From the **Start** menu, select **Programs** or **All Programs**, point to **HP, HP Photosmart A320 series**, and then click **Help**.
- **Mac:** Choose **Help, Mac Help** in the Finder, and then choose **Library, HP Photosmart Printer Help**.

Printer parts

This section gives an overview of the parts of your printer, and provides references to sections where the parts and functions are described in more detail.

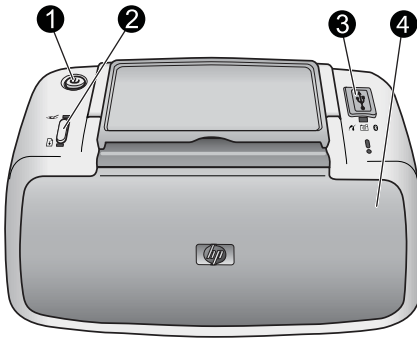


Figure 1-1 Front view (closed)

1	On: Press to turn the printer on or off, or to cancel a print job that is in progress.
2	OK: Press to turn the automatic photo enhancement feature on or off, or to resume a print job after an error. For more information, see “Improve the quality of your photos” on page 12.
3	<p>PictBridge port: Connect either a PictBridge-certified device (such as a PictBridge digital camera, camera phone, or video camera), or the optional HP Bluetooth wireless printer adapter to this port.</p> <p>For information on printing from a PictBridge device, see “Print from a PictBridge-certified camera” on page 11.</p> <p>For information on printing wirelessly using Bluetooth technology, see “Print from a Bluetooth device” on page 13.</p>
4	Output tray (closed): Open this to print or to access the print cartridge. The input tray opens automatically when you open the output tray.

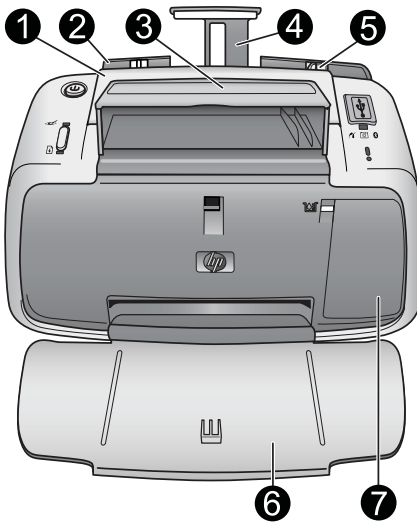


Figure 1-2 Front view (open)

1	Handle: Extend to carry the printer.
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2	Input tray: Load paper here. The input tray opens automatically when you open the output tray. To close the input tray, you must first close the output tray. For more information about loading paper, see “Choose and load paper” on page 9.
3	USB cable holder: Store the USB cable for your PictBridge camera in here for easy access.
4	Input tray extension: Pull out to support paper.
5	Paper-width guide: Move to the width of the current paper to position the paper properly.
6	Output tray (open): The printer deposits prints here. When you open the output tray, the input tray opens automatically.
7	Print cartridge door: Open to insert or remove the HP 110 Tri-color Inkjet print cartridge. Must be closed to print. For more information about replacing the print cartridge, see “Replace the print cartridge” on page 15.

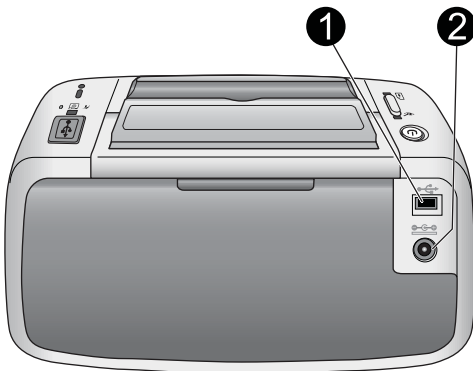


Figure 1-3 Rear of printer

1	USB port: Connect the printer to a computer here, using a USB cable. For more information on printing from a computer, see “Print from a computer” on page 13.
2	Power cord connection: Connect the power cord here.

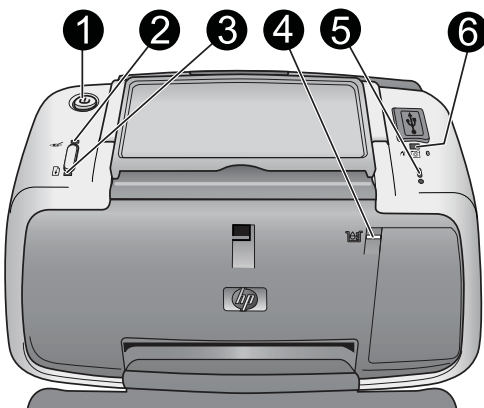



Figure 1-4 Indicator lights

1	On light: Solid green if the printer is on. Flashing green if the printer is busy.
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2	Red Eye light: Solid green if the automatic photo correction feature is turned on. For information about the feature, see “Improve the quality of your photos” on page 12.
3	Resume light: Flashing green if the printer is out of paper or if there is a paper jam. Indicates that the OK button should be pressed to resume printing after the error is cleared.
4	Print Cartridge light: Solid red if the print cartridge is low on ink. Flashing red if there is a print cartridge error, if the print cartridge is missing, or if the print cartridge door is open.
5	Attention light: Solid or flashing red if there is a printer error, such as a paper jam, that must be addressed before you can continue printing. For troubleshooting information, see “Troubleshooting” on page 27. For more information about the indicator lights, see “Indicator lights” on page 45.
6	PictBridge light: Solid green if a PictBridge camera is connected to the PictBridge port. Flashing green if the printer is printing a photo from your camera. Do not disconnect your camera if the light is flashing green.

 **TIP:** For more information about the indicator lights, see [“Indicator lights”](#) on page 45. For troubleshooting information, see [“Troubleshooting”](#) on page 27.

Optional accessories

There are several optional accessories available for the printer that enhance its ability to print anywhere, anytime. The appearance of the accessories may vary from what is shown. To purchase accessories, go to:

- www.hp.com/eur/hpoptions (Europe)
- www.hp.com, choose your country/region, and then click **Buy** or **Online Shopping** (All other countries/regions)

For camera accessories, see the documentation that came with your camera.

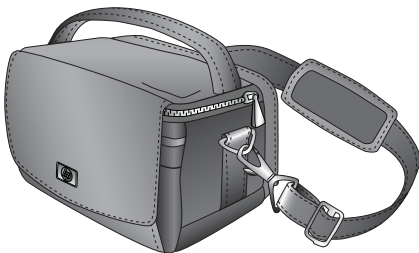



Figure 1-5 HP Photosmart Carrying Case

The lightweight, durable HP Photosmart Carrying Case holds and protects the printer and its accessories for hassle-free printing on the go.

 **NOTE:** You will need to transport your digital camera, camera phone, or video camera in a separate carrying case. See the documentation that came with your camera or other device for accessories information.

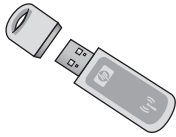


Figure 1-6 HP Bluetooth wireless printer adapter

The HP Bluetooth wireless printer adapter, model bt450, plugs into the PictBridge port on the top of the printer and lets you use Bluetooth wireless technology for printing. For more information about using Bluetooth wireless technology, see [“Print from a Bluetooth device”](#) on page 13.

2 Paper basics

Choose and load paper

Learn which is the recommended HP paper for use with the printer, and learn how to load it into the input tray for printing.

Use HP Advanced Photo Paper

Always use HP Advanced Photo Paper with the HP Photosmart A320 series printer. It is especially designed to work with the inks in your printer to create beautiful photos.

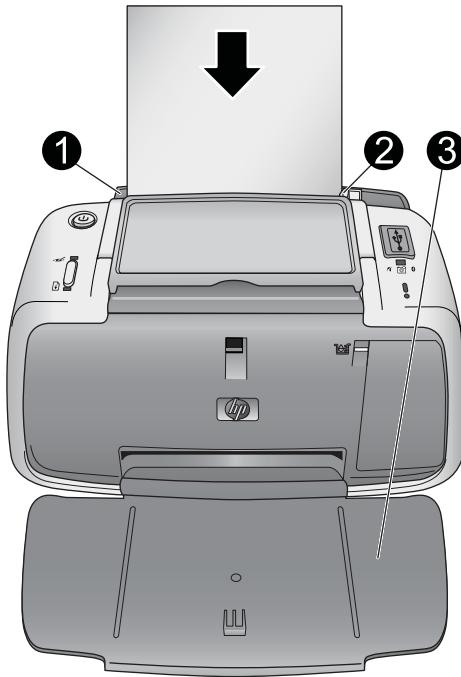
To purchase HP Advanced Photo Paper or other supplies, go to:

- www.hp.com/eur/hpoptions (Europe)
- www.hp.com, choose your country/region, and then click **Buy** or **Online Shopping** (All other countries/regions)

Load your paper

Paper loading tips:

- You can print on 10 x 15 cm (4 x 6 inch) photo paper, 10 x 15 cm (4 x 6 inch) or smaller index cards, L-size cards, A6 cards, or Hagaki cards 100 x 148 mm (3.9 x 5.8 inch).
- Before loading paper, slide out the paper-width guide to make room for the paper.
- Load only one type and size of paper at a time. Do not mix paper types or sizes in the input tray.
- Do not load more than **20** sheets of 10 x 15 cm (4 x 6 inch) photo paper.
- If you are using tabbed paper, load the paper so the tab feeds in last.
- In dry conditions photo paper can curl. To prevent curling, store photo paper in a plastic bag, not in the input tray of the printer.



1	Input tray
2	Paper-width guide
3	Output tray


To load paper

1. Open the output tray. The input tray opens automatically.
2. Load up to 20 sheets of photo paper with the print side or glossy side facing the front of the printer. If you are using tabbed paper, load the paper so tab feeds in last. When loading, slide the paper to the left side of the input tray and push the paper down firmly until it stops.
3. Adjust the paper-width guide to fit close to the edge of the paper without bending the paper.

3 Print basics

Printing photos directly from your camera is the easiest and fastest way to turn your digital photos into outstanding prints.


This section describes how to print from digital cameras using a direct USB connection and PictBridge technology, and how to improve the quality of your prints using the printer's built-in automatic photo correction feature.

 **NOTE:** Although this chapter describes the procedure for printing from a PictBridge digital camera, the procedure for printing from other PictBridge devices—such as camera phones and video phones—is very similar. Review the documentation that came with your PictBridge device for specific information.

Print from a PictBridge-certified camera


You can print photos by connecting a PictBridge-certified digital camera directly to the PictBridge port on the top of the printer with a USB cable. When you print from your digital camera, the printer uses the settings that you selected on the camera. For more information, see the documentation that came with your camera.

Make sure you have turned on the printer and inserted an HP 110 Tri-color Inkjet print cartridge before you try to print.

 **NOTE:** If you connect a non-HP camera and encounter problems while printing, see the documentation that came with your camera. HP is not able to provide technical support for non-HP cameras.

To print using a PictBridge-certified camera

1. Turn on your PictBridge digital camera. Make sure the USB configuration is set to Digital Camera, so that your camera is able to successfully connect to the printer and print photos.
2. Load photo paper into the printer.
The printer automatically prints using the best quality settings for HP Advanced Photo Paper. To change the paper type or quality settings, print your photos from a computer. For more information on printing from a computer, see the electronic Help.

 **NOTE:** With some digital cameras, you can print using Normal print quality for faster prints. The print quality may be noticeably lower, especially if you are not using HP Advanced Photo Paper. Print quality is best when Best print quality is selected. See your camera documentation for details.

3. Connect your camera to the PictBridge port on the **top** of the printer using the USB cable for the camera. The **PictBridge** light turns solid green when the connection is established.
4. Use the menu on your camera image display to select and print photos. Refer to your camera documentation for details. The **On** light and the **PictBridge** light flash while the photos are printing.

Important: Your photos are instantly dry, and can be handled immediately after they are printed. However, HP recommends that you leave the printed surface of your photos

exposed to the air for 3 minutes after printing to allow the colors to fully develop before you stack them with other photos or place them in albums.

Improve the quality of your photos

The printer includes an HP Real Life Technologies automatic photo enhancing feature that will:

- Sharpen blurred photos.
- Improve the dark areas of a photo without affecting the light areas of the photo.
- Reduce red-eye that can occur in photos taken with a flash.
- Improve the overall brightness, color, and contrast of photos.

The automatic photo enhancing feature is turned on by default when you turn on the printer. The **Red Eye** light is solid green when the feature is turned on. This feature affects your prints only, not the original photos.

HP recommends leaving the automatic photo enhancing feature on, but if your photos do not print correctly, or if you want to print a photo without the enhancements, turn it off.

To turn off the automatic photo enhancing feature, press **OK**. The **Red Eye** light turns off. The feature remains off until you press **OK** again.

4 Print from Bluetooth devices or your computer

Use the printer with your computer and other devices to share photos with friends and family.

Print from a Bluetooth device

You can print from devices with Bluetooth wireless technology such as digital cameras, PDAs, laptops, and mobile phones. For more information, see the electronic Help and the documentation that came with the device.

Make the Bluetooth connection

To use Bluetooth connectivity, all devices must have the necessary hardware and software installed. In addition, an HP Bluetooth wireless printer adapter, model bt450, must be connected to the PictBridge port on the top of the printer. Some printers include the Bluetooth adapter in the box; if a Bluetooth adapter did not come with your printer, you can purchase one separately. For ordering information, see [“Optional accessories” on page 6](#). For more information about the adapter, see the documentation that came with the adapter.

Print

The basic procedure for printing from any device with Bluetooth wireless technology is the same. For more detailed instructions, see the documentation that came with your Bluetooth device.

To print from a Bluetooth device


1. Connect the Bluetooth adapter to the PictBridge port on top of the printer.
2. Have the Bluetooth device you wish to print from search for available Bluetooth printers.
3. Select the HP Photosmart A320 series printer when it appears on the device.
4. Send the print job from the Bluetooth device to the printer. See the documentation for your Bluetooth device for specific instructions on starting a print job.

Print from a computer

Printing from a computer gives you more options than printing from a PictBridge or Bluetooth device. The printer software give you more print settings to choose from, and with the HP Photosmart software, you can edit your photos before printing. For example, you can select different paper types, and print photos with white borders. You can also print exceptional photos using 4800 x 1200-optimized dpi.

Before printing from your computer, you must install the HP Photosmart software and connect the USB cable from the printer (using the USB port on the back) to your computer. For instructions on installing the HP Photosmart software and connecting the USB cable,


see [“Install the software” on page 43](#). The HP Photosmart software includes the interface that is displayed whenever you print from a computer.

 **NOTE:** The USB cable required for printing from a computer might not be included in the box with the printer, so you might need to purchase it separately. The required USB 2.0 high speed cable has a mini Type B 5-pin male connector at one end and a Type A male connector at the other end. The mini Type B end connects to the back of the printer, and the Type A end connects to a computer. HP recommends using a USB cable less than 3 meters (10 feet) long to minimize injected noise due to potentially high electromagnetic fields.

Be sure to download the latest software update every couple of months to ensure you have the latest features and improvements.

You need to transfer your photos to the computer before you can use them with HP Photosmart software. For more information, see [“Transfer photos from your camera to a computer” on page 14](#).

To print from a computer, the computer needs to meet the minimum system requirements described in [“Specifications” on page 35](#).

 **NOTE:** The electronic Help provides more information on the many print settings available when you print from a computer. To learn how to open the electronic Help, see [“Find more information” on page 3](#).

Transfer photos from your camera to a computer

To transfer photos to a computer, connect the camera directly to your computer. Follow the instructions in the documentation that came with the camera.

About HP Photosmart Essential, HP Photosmart Mac, and HP Photosmart Share

HP Photosmart Essential and HP Photosmart Mac let you:

- Print passport photos
- Add a decorative border to a photo
- Use your photos for creative projects such as greeting cards and iron-on transfers
- Organize your photos and search through them by keyword and dates (Windows only)
- Edit and enhance your photos by adding text or doing color correction

For more information on the HP Photosmart software, explore the electronic Help.


Use HP Photosmart Share to share photos with friends and relatives. The printer must be connected through a USB cable to a computer with Internet access and have all the HP software installed. If you try to use HP Photosmart Share and do not have all the required software installed or configured, a message prompts you through the required steps. For more information on HP Photosmart Share, see the documentation that came with the camera.

5 Maintain and transport the printer

The printer requires very little maintenance. Follow the guidelines in this chapter to extend the life span of the printer and printing supplies, and to ensure that your prints are always of the highest quality.


For information on maintaining your camera, see the documentation that came with the camera.

Replace the print cartridge

 **NOTE:** Ink from the cartridges is used in the printing process in a number of different ways, including in the initialization process, which prepares the device and cartridges for printing, and in printhead servicing, which keeps print nozzles clear and ink flowing smoothly. In addition, some residual ink is left in the cartridge after it is used. For more information see www.hp.com/go/inkusage.

Use the HP 110 Tri-color Inkjet print cartridge to print black-and-white and color photos. HP Vivera Inks deliver true-to-life photo quality and exceptional fade resistance, resulting in vivid colors that last. HP Vivera Inks are specially formulated and scientifically tested for quality, purity, and fade resistance.

For optimal printing results, HP recommends using only HP print cartridges. Inserting an incorrect cartridge may invalidate the printer warranty.

 **CAUTION:** Check that you are using the correct print cartridge. Also, note that HP does not recommend modifying or refilling HP cartridges. Damage that results from modifying or refilling HP cartridges is not covered by the HP warranty.

For best print quality, HP recommends that you install all retail print cartridges before the date stamped on the box.

When the print cartridge is low on ink, the **Print Cartridge** light turns solid red.

To prepare the printer and cartridge

1. Make sure the power is on.
2. Load paper in the input tray so that the printer can print an alignment page when you insert the new print cartridge.
3. Open the print cartridge door of the printer. The **Print Cartridge** light flashes red.
4. Remove the pink tape from the cartridge. Do not touch the copper-colored contacts or the ink nozzles.

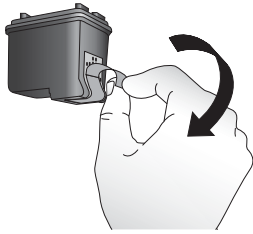


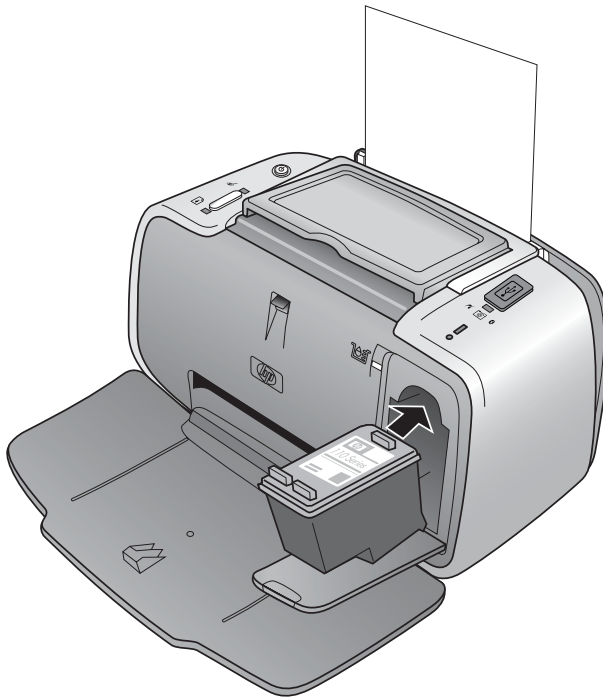
Figure 5-1 Remove the pink tape



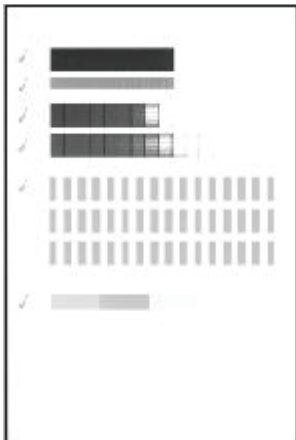
Figure 5-2 Do not touch here

To insert the cartridge

1. If you are replacing a cartridge, push down and pull outward on the cartridge in the cradle to remove it.
2. Hold the replacement cartridge with the label on top. Slide the cartridge at a slight upward angle into the cradle so the copper-colored contacts go in first. Push the cartridge until it snaps into place.



3. Close the print cartridge door.
4. If the print cartridge is new, the printer prints an alignment page to confirm that the alignment was successful. This may take a few minutes.




The check marks verify that the print cartridge is installed correctly and functioning properly.

If an "x" is displayed to the left of any of the bars, align the print cartridge again.

Remove ink from your skin and clothing

Follow these instructions to remove ink from your skin and clothing:

Surface	Remedy
Skin	Wash the area with an abrasive soap.
White fabric	Wash the fabric in <i>cold</i> water and use chlorine bleach.
Color fabric	Wash the fabric in <i>cold</i> water and use sudsy ammonia.

 **CAUTION:** Always use cold water to remove ink from fabric. Warm or hot water can set the ink into the fabric.


Clean and maintain the printer

Keep the printer and print cartridge clean and well maintained using the simple procedures in this section.

Clean the outside of the printer

To clean the outside of the printer

1. Turn off the printer, and then disconnect the power cord from the back of the printer.
2. Wipe the outside of the printer with a soft cloth that has been lightly moistened with water.


 **CAUTION:** Do not use any type of cleaning solution. Household cleaners and detergents may damage the printer finish.

CAUTION: Do not clean the interior of the printer. Keep all fluids away from the interior.

Automatically clean the print cartridge

If you notice white lines or single-color streaks on your prints, you may need to clean the print cartridge. Do not clean the cartridge more often than necessary, since cleaning uses up ink.

There are three ways to automatically clean the cartridge: from the control panel of the printer, from a connected PictBridge camera that has a Maintenance menu option for cleaning the cartridge, and from the software. If you have the HP Photosmart software installed, you can clean the print cartridge from the software. When cleaning the cartridge from the printer, you can clean the cartridge up to three times each time you use the procedure. Each successive cleaning is more thorough and uses more ink.


 **NOTE:** If you have installed the HP Photosmart software, HP recommends performing the automatic print cartridge cleaning procedure from the software because it is easier. See the electronic Help for instructions.

To clean the print cartridge from the printer

1. Make sure the printer is turned on.
2. Load photo paper so the printer can print a test page after cleaning the cartridge. Use HP Advanced Photo Paper for the best results.
3. Hold down the **OK** button and press the **On** button **4 times** to begin cleaning the print cartridge.
4. When the printer finishes cleaning the cartridge, check the printed test page. If there are no more problems, you do not need to do anything else. If there are still problems, continue cleaning use the following procedure:
 - If the test page has white streaks or missing colors, the print cartridge needs to be cleaned again. Hold down the **OK** button and press the **On** button **5 times**.
 - If the print quality of the second test page looks good, you do not need to do anything else.
 - If the test page still has white streaks or missing colors, the print cartridge needs to be cleaned one more time. Hold down the **OK** and press the **On** button **6 times**.


If you complete all three levels of cleaning using this procedure and you still notice white streaks or missing colors on the test page, you may need to clean the print cartridge copper-colored contacts. For more information, see [“Manually clean the print cartridge contacts” on page 20](#).

To clean the print cartridge from the camera

 **NOTE:** Some cameras have a menu option that allows you to align the print cartridge from the camera. If your camera menu offers this choice when the camera is connected to the printer, you may prefer to use this method to align the print cartridge. For more information, see the documentation that came with your camera.

1. Make sure the printer is turned on.
2. Load photo paper so the printer can print a test page after cleaning the cartridge. Use HP Advanced Photo Paper for the best results.
3. Connect the PictBridge camera to the printer and make sure the camera is turned on.
4. On your camera image display, select the option to clean the print cartridge from the Maintenance menu. For more information, see the documentation that came with your camera.
5. When the printer finishes cleaning the cartridge, check the printed test page. If there are no more problems, you do not need to do anything else. If there are still problems, repeat the cleaning procedure.

If after repeating the cleaning procedure you still notice white streaks or missing colors on the test page, you may need to clean the print cartridge copper-colored contacts. For more information, see [“Manually clean the print cartridge contacts” on page 20](#).

 **NOTE:** If the cartridge or printer has been recently dropped, you may also see white streaks or missing colors in your prints. This problem is temporary and clears up within 24 hours.

Print a test page

You can print a test page to:

- Check the estimated ink level in the print cartridge
- Check the condition of the ink nozzles
- Check if the printer is communicating properly with a connected computer (if you are able to print a test page from the software)
- Obtain the printer's serial number, and other printer specifications

If you contact HP support for help, you may be asked to print the test page.


There are three ways to print the test page: from the control panel of the printer, from a connected PictBridge camera that has a Maintenance menu option for printing a test page, and from the software. If you have the HP Photosmart software installed, you can print the test page from the software. If you need to confirm the connection between the printer and your computer, print a test page from the software.

This section describes how to print the test page from the printer's control panel or from a camera. See the electronic Help for instructions on printing the test page from the software.

To print a test page from the printer

1. Make sure the printer is turned on.
2. Load paper in the input tray. Use plain paper or index cards to conserve photo paper.
3. Hold down the **OK** button and press the **On** button **2 times** to print a test page.

To print a test page from the camera

 **NOTE:** Some cameras have a menu option that allows you to align the print cartridge from the camera. If your camera menu offers this choice when the camera is connected to the printer, you may prefer to use this method to align the print cartridge. For more information, see the documentation that came with your camera.

1. Make sure the printer is turned on.
2. Load paper in the input tray. Use plain paper or index cards to conserve photo paper.
3. Connect the PictBridge camera to the printer and make sure the camera is turned on.
4. On your camera image display, select the option to print a test page from the Maintenance menu. For more information, see the documentation that came with your camera.

To check the estimated ink level on the printed test page, look at the three color bars about halfway down the page, between the "E" (empty) and "F" (full). Estimate how full the print cartridge is by determining what percentage of the brightly-colored bars is shown between "E" and "F."

Manually clean the print cartridge contacts

If you use the printer in a dusty environment, debris may accumulate on the copper-colored contacts and cause printing problems.

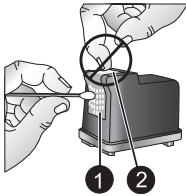
To clean the print cartridge contacts

1. Gather the following items to clean the contacts:
 - Distilled water (tap water may contain contaminants that can damage the print cartridge)
 - Cotton swabs or other soft, lint-free material that will not stick to the print cartridge
2. Open the print cartridge door.
3. Remove the print cartridge and place it on a piece of paper with the ink nozzle plate facing up. Be careful not to touch the copper-colored contacts or the ink nozzle plate with your fingers.

△ **CAUTION:** Do not leave the print cartridge outside the printer for more than 30 minutes. Ink nozzles exposed to the air longer than this may dry out and cause printing problems.

4. Lightly moisten a cotton swab with distilled water and squeeze any excess water from the swab.
5. Gently wipe the copper-colored contacts with the cotton swab.

△ **CAUTION:** Do not touch the ink nozzle plate. Touching the ink nozzle plate will result in clogs, ink failure, and bad electrical connections.




1	Clean copper colored contacts with swab
2	Ink nozzle plate

6. Repeat steps 4 and 5 until no ink residue or dust appears on a clean swab.
7. Insert the print cartridge in the printer, and then close the print cartridge door.

Align the print cartridge


The first time you insert a HP 110 Tri-color Inkjet print cartridge, the printer aligns it automatically. However, if colors in printouts are misaligned, or if the alignment page does not print correctly when you insert a new print cartridge, you can use the following procedures to align the print cartridge again.

 **NOTE:** If you have installed the HP Photosmart software, HP recommends aligning the print cartridge from the software because it is easier. See the electronic Help for instructions.

To align the print cartridge from the printer

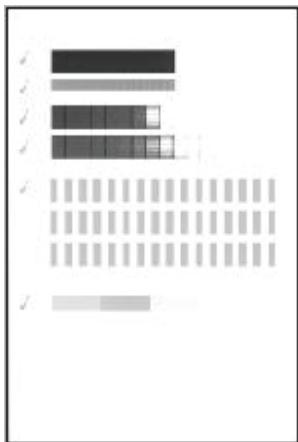
1. Make sure the printer is turned on.
2. Load paper in the input tray. HP recommends using HP Advanced Photo Paper for the alignment, for best results.
3. Hold down the **OK** button and press the **On** button **3 times** to print an alignment page.

To align the print cartridge from the camera

 **NOTE:** Some cameras have a menu option that allows you to align the print cartridge from the camera. If your camera menu offers this choice when the camera is connected to the printer, you may prefer to use this method to align the print cartridge. For more information, see the documentation that came with your camera.

1. Make sure the printer is turned on.
2. Load paper in the input tray. HP recommends using HP Advanced Photo Paper for the alignment, for best results.
3. Connect the PictBridge camera to the printer and make sure the camera is turned on.
4. On your camera image display, select the alignment option from the Maintenance menu and follow the prompts.


When the printer finishes aligning the cartridge, it prints an alignment page to confirm that the alignment was successful.



- The check marks verify that the print cartridge is installed correctly and functioning properly.
- If an “x” is displayed to the left of any of the bars, align the print cartridge again. If the “x” is still displayed, replace the print cartridge.

Update the HP Photosmart printer driver software

Download the latest software update for the printer driver every few months to ensure you have the latest features and improvements. You can download HP Photosmart software updates by going to www.hp.com/support or by using HP Software Update.

 **NOTE:** Using the procedures below to install the printer driver software update from the HP Web site does not update the other HP Photosmart software you might have installed on the computer. For information about updating the HP Photosmart software, see the HP Photosmart Help.

To download a printer driver software update (Windows)

1. Make sure you are connected to the Internet.
2. From the Windows **Start** menu, click **Programs** or **All Programs**, point to **HP**, and then click **HP Update**.
The HP Update window is displayed.
3. Click **Next**.
HP Update searches the HP Web site for printer driver software updates.
 - If the computer has the most recent version of the printer driver software installed, **No updates are available for your system at this time** is displayed in the HP Update window.
 - If the computer does not have the most recent version of the printer driver software installed, a software update is displayed in the HP Update window.
4. If a software update is available, select the check box beside the update name.
5. Click **Install**.
6. Follow the onscreen instructions.

To download a printer driver software update (Mac)

1. Make sure you are connected to the Internet.
2. Click the **HP Device Manager** in the Dock.
3. Choose **Check for updates** from the Information and Settings pop-up menu.
The HP Update window is displayed.
4. Click the **Update Software** tab, and then follow the onscreen instructions to check for software updates.

Store the printer and print cartridge

Protect the printer and print cartridge by storing them properly when you are not using them.

Store the printer

The printer is built to withstand long or short periods of inactivity.

- Close the input and output trays when the printer is not in use.
- Store the printer indoors out of direct sunlight in a place without temperature extremes.
- If the printer and print cartridge have not been used for one month or more, clean the print cartridge before printing. For more information, see "[Automatically clean the print cartridge](#)" on page 18.

Store the print cartridge

When you store or transport the printer, always leave the active print cartridge inside the printer. The printer stores the print cartridge in a protective cap during the power-down cycle.

△ **CAUTION:** Make sure the printer completes its power-down cycle before you unplug the power cord. This allows the printer to store the print cartridge properly.

Follow these tips to help maintain HP print cartridges and ensure consistent print quality:

- Keep all unused print cartridges in their original sealed packages until they are needed. Store print cartridges at room temperature (15–35° C or 59–95° F).
- Do not remove the plastic tape covering the ink nozzles until you are ready to install the print cartridge in the printer. If the plastic tape has been removed from the print cartridge, do not attempt to reattach it. Reattaching the tape damages the print cartridge.

Maintain the quality of photo paper

For best results with photo paper, follow the guidelines in this section.

To store photo paper

- Store the photo paper in its original packaging or in a resealable plastic bag.
- Store the packaged photo paper on a flat, cool, and dry surface.
- Return unused photo paper to the plastic bag. Paper left in the printer or exposed to the elements may curl.

To handle photo paper

- Always hold photo paper by the edges to avoid fingerprints.
- If the photo paper has curled edges, place it in its plastic storage bag and gently bend it in the opposite direction of the curl until the paper lies flat.


Transport the printer

It is easy to transport and set up the HP Photosmart A320 series printer almost anywhere. Take it with you on vacations and to family gatherings and social events to instantly print and share photos with family and friends.


To make it even easier to print on the go, you can transport the printer and printing supplies together in the convenient HP Photosmart Carrying Case. You can purchase the carrying case from the HP Web site or your HP dealer. For ordering information, see [“Choose and load paper”](#) on page 9:


To transport the HP Photosmart A320 series

1. Turn off the printer.

 **NOTE:** Make sure the printer completes its power-down cycle before you unplug the power cord. This allows the printer to store the print cartridge properly.

2. If a camera or Bluetooth adapter is connected to the PictBridge port on the top of the printer, disconnect it.
3. Remove all paper from the input and output trays, close the output tray, and then close the input tray.
4. Unplug the power cord.
5. If the printer is connected to a computer, disconnect the USB cable from the computer.
6. Always carry the printer upright.

 **NOTE:** Do not remove the print cartridge when transporting the printer. The printer stores the print cartridge in a protective cap during the power-down cycle

 **TIP:** The printer has a convenient built-in handle you can use to make it easy to carry. Extend the handle by lifting it up from above the camera dock door. Do not shake or swing the printer while carrying it by the handle.

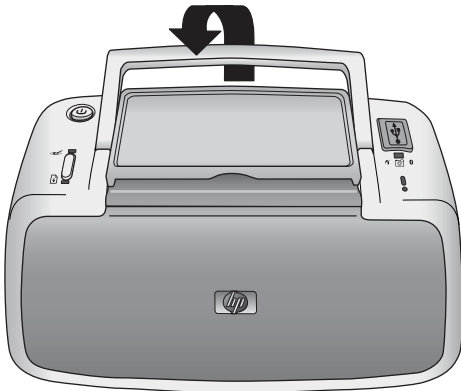


Figure 5-3 Extend the handle

Make sure to bring the following items with you:

- Paper
- Power cord
- A PictBridge-certified camera
- Extra print cartridges (if you plan to print a lot)
- Optional printer accessories you plan to use, such as the HP Bluetooth wireless printer adapter
- If you are going to connect the printer to a computer, bring the USB cable and HP Photosmart software CD



NOTE: If you do not take the documentation with you, be sure to write down the correct print cartridge number or purchase enough HP 110 Tri-color Inkjet print cartridges before you go.

6 Troubleshooting


The HP Photosmart A320 series printer is designed to be reliable and easy to use. This section answers frequently asked questions about using the printer and printing without a computer.

For troubleshooting information about using the HP Photosmart software and printing from a computer, see the electronic Help. For information about viewing the electronic Help, see "[Find more information](#)" on page 3.

For information about troubleshooting issues involving your camera, see the documentation that came with the camera.

Printer hardware problems

Before contacting HP support, read this section for troubleshooting tips or go to the online support services at www.hp.com/support.

 **NOTE:** If you want to connect the printer to a computer, HP recommends using a USB cable of less than 3 meters (10 feet) in length to minimize injected noise due to potentially high electromagnetic fields.

The Attention light is flashing red.

Cause: The printer requires attention. Try the following solutions.

Solution:

- If the printer is connected to your camera, check the camera image display for instructions.
 - If the printer is connected to a computer, check the computer monitor for instructions.
 - Turn off the printer, and then unplug the printer power cord. Wait about 30 seconds, and then plug the power cord back in. Turn on the printer.
 - For more information about what the **Attention** light could indicate, see "[Indicator lights](#)" on page 45.
 - If the light continues to flash after trying all of the above solutions, go to www.hp.com/support or contact HP support.
-

The On light flashed briefly after I turned the printer off.

Solution: This is a normal part of the power-down process. It does not indicate a problem with the printer.

The buttons on the control panel do not respond.

Cause: A printer error has occurred. Try the following solutions.

Solution:

- Wait for about a minute to see if the printer resets.
 - Turn off the printer. Unplug the printer power cord. Wait about 30 seconds, and then plug the power cord back in. Turn on the printer.
 - If the printer does not reset, and the control panel buttons still do not respond, go to www.hp.com/support or contact HP support.
-

The printer is plugged in, but it will not turn on.

Solution:

- The printer may have drawn too much power. Unplug the printer power cord from the electrical outlet. Wait about 30 seconds, and then plug the power cord back in. Turn on the printer.
 - The printer may be plugged into a power strip that is turned off. Turn on the power strip, and then turn on the printer.
 - The printer may be plugged into an incompatible power source. If you are traveling abroad, make sure the power source in the country/region you are visiting complies with the power requirements and power cord of the printer.
-

The printer makes noises when I turn it on, or starts making noises on its own after it has been sitting unused for a while.

Solution: The printer may make noises after long periods of inactivity (approximately 2 weeks), or when its power supply has been interrupted and then restored. This is normal operation—the printer is performing an automatic maintenance procedure to ensure that it produces the best quality output.

Printing problems

Before contacting HP support, read this section for troubleshooting tips or go to the online support services at www.hp.com/support.

Paper does not feed into the printer correctly.

Solution:

- Make sure that the paper-width guide fits close to the edge of the paper without bending the paper.
- There may be too much paper loaded in the input tray. Remove some paper and try printing again.
- If sheets of photo paper stick together, try loading one sheet at a time.
- If you are using the printer in an extremely high- or low- humidity environment, insert the paper as far as it will go into the input tray, and load one sheet of photo paper at a time.

- If you are using photo paper that is curled, place the paper in a plastic bag and gently bend it in the opposite direction of the curl until the paper lies flat. If the problem persists, use paper that is not curled.
For information about proper storage and handling of photo paper, see [“Maintain the quality of photo paper” on page 24](#).
 - The paper may be too thin or too thick. Try using HP-designed photo paper. For more information, see [“Choose and load paper” on page 9](#).
-

The image printed at an angle or is off-center.

Solution:

- The paper may not be loaded correctly. Reload the paper, making sure that the paper is correctly oriented in the input tray and that the paper-width guide fits close to the edge of the paper. For paper-loading instructions, see [“Choose and load paper” on page 9](#).
 - The print cartridge may need to be aligned.
For more information, see [“Align the print cartridge” on page 21](#).
-

My photo did not print.


Solution:

- The power may be off or there may be a loose connection. Make sure that the power is on and the power cord is securely connected.
 - You may not have any paper in the input tray. Check that paper is loaded correctly in the input tray. For paper-loading instructions, see [“Choose and load paper” on page 9](#).
 - The paper may have jammed while printing. See the following section for instructions on clearing a paper jam.
-

The paper jammed while printing.

Solution:

- If the paper came part way through the front of the printer, gently pull the paper towards you to remove it.
- If the paper did not come part way through the front of the printer, try removing it from the back of the printer:
 - Remove the paper from the input tray.
 - Gently pull the jammed paper to remove it from the back of the printer.
- If you cannot grasp the edge of the jammed paper to remove it, try the following:
 - Turn off the printer. Unplug the printer power cord from the electrical outlet. Wait about 10 seconds, and then plug the power cord back in.
 - Turn on the printer. The printer checks for paper in the paper path and will automatically eject the jammed paper.
 - Press **OK** to continue.

 **TIP:** If you experience paper jams while printing, try loading one sheet of photo paper at a time. Insert the paper as far as it will go into the input tray.

A blank page came out of the printer.

Solution:

- Check the **Print Cartridge** light. If it is solid red, it means that the HP 110 Tri-color Inkjet print cartridge is low on ink and will need to be replaced soon. For print cartridge replacement instructions, see [“Replace the print cartridge” on page 15](#).
For information about indicator lights, see [“Indicator lights” on page 45](#).
- You may have begun printing and then cancelled the process. If you cancelled the process before the photo started printing, the printer may have already loaded paper in preparation for printing. The next time you print, the printer ejects the blank page before starting the new printing project.

The printer ejects the paper when preparing to print.

Solution: Direct sunlight could be interfering with the operation of the automatic paper sensor. Move the printer out of direct sunlight. The printer also ejects paper if it detects that the paper has already been printed on.

My photo printed on top of the tabbed end of the paper.

Solution: When using tabbed paper, load it so that the tab feeds in last.

Print quality is poor.

Solution:

- The print cartridge may be running out of ink. Check the **Print Cartridge** light. If it is solid red, it means that the print cartridge is low on ink and will need to be replaced soon. For print cartridge replacement instructions, see [“Replace the print cartridge” on page 15](#).
For more information about the indicator lights, see [“Indicator lights” on page 45](#).
 - You may have selected a low-resolution setting on the digital camera when you took the picture. For better results in the future, set the digital camera to a higher resolution.
 - Make sure you are using HP Advanced Photo Paper for best results. For more information, see [“Choose and load paper” on page 9](#).
 - You may be printing on the wrong side of the paper. Make sure the paper is loaded with the side to be printed facing toward the front of the printer.
 - Try turning the HP Real Life Technologies feature on or off by pressing the **OK** button, to see if the results are better.
 - You may have let photos stack in the output tray or placed them in an album before the colors fully developed. HP recommends exposing the printed surface to the air for 3 minutes after printing.
 - The print cartridge may need to be cleaned. For more information, see [“Automatically clean the print cartridge” on page 18](#).
 - The print cartridge may need to be aligned.
For more information, see [“Align the print cartridge” on page 21](#).
-

When I print photos I see unexpected results.

Cause: The automatic photo enhancing feature is on and is adjusting for red-eye, brightening, focus, and contrast.

Solution: Turn off the feature by pressing the **OK** button. See [“Improve the quality of your photos” on page 12](#).

Bluetooth printing problems

Before contacting HP support, read this section for troubleshooting tips or go to the online support services at www.hp.com/support. Be sure to also read the documentation that came with your HP Bluetooth wireless printer adapter and your device with Bluetooth wireless technology.

My Bluetooth device cannot find the printer.

Solution:

- Make sure the HP Bluetooth wireless printer adapter is plugged into the PictBridge port on the **top** of the printer. The light on the adapter is on solid when the adapter is ready to receive data, and flashes when communicating with a device.
 - The Bluetooth device may be too far from the printer. Move the device closer to the printer. The maximum recommended distance between the device with Bluetooth wireless technology and the printer is 10 meters (30 feet).
-

My photo did not print.

Solution: The printer may not recognize the type of file sent by the device with Bluetooth wireless technology. For a list of the file formats that the printer supports, see "[Printer specifications](#)" on page 36.

Print quality is poor.

Solution: The photo you printed may be low resolution. For better results in the future, set the device to a higher resolution, if possible. Be aware that pictures taken with VGA-resolution cameras, such as those found in wireless phones, may not have high enough resolution to produce a high-quality print.


The photo printed with borders.

Solution: The printing application installed on your device with Bluetooth wireless technology may not support borderless printing. Contact the vendor of the device or go to their support Web site to obtain the latest updates for the printing application.

PictBridge camera error messages

Before contacting HP support, read this section for troubleshooting tips or go to the online support services at www.hp.com/support.

The following error messages may appear on your camera image display when the camera is connected to the PictBridge port on the top of the printer. Follow the instructions to resolve the problem.

 **NOTE:** The messages that appear on your camera image display may be worded differently than the ones shown here.

"Connected to computer." (Print Setup menu does not appear.)

Cause: The USB configuration on your digital camera may be set to the wrong mode, so that the printer cannot recognize the camera.

Solution: Disconnect your camera from the printer. Change the USB configuration in the camera menu to "Digital Camera," and then reconnect the camera to the printer.

"Cover open," "Printer top cover is open," or "Ink cover open."

Cause: The print cartridge door may be open or ajar.

Solution: Close the print cartridge door to continue printing.

"Hardware error" or "Fatal error."

Cause: A serious error has occurred.

Solution: Turn the printer off and then on again, and then try printing your photo again.

"Ink-related error," "Incorrect or missing print cartridge," "Ink low," or "Ink empty."

Cause: There may be no print cartridge in the printer, the print cartridge may be incompatible, or the print cartridge may be empty or low on ink.

Solution: Make sure that an HP 110 Tri-color Inkjet print cartridge is correctly loaded in the printer. If the print cartridge is empty, replace it. For more information about loading or replacing print cartridges, see ["Replace the print cartridge" on page 15](#).

"Paper-related error," "Printer is out of paper," or "Printer has a paper jam."

Cause: The paper is not loaded correctly, the paper is jammed, or the printer is out of paper.

Solution: Check to make sure that paper is correctly loaded in the input tray. For information about how to load paper, see ["Choose and load paper" on page 9](#).

If paper is jammed in the printer, try the following solutions:

- If the paper came part way through the front of the printer, gently pull the paper towards you to remove it.
- If the paper did not come part way through the front of the printer, try the following solutions:
 - Remove the paper from the input tray.
 - Gently pull the jammed paper to remove it from the back of the printer.
- If you cannot grasp the edge of the jammed paper to remove it, try the following:
 - Turn off the printer.
 - Unplug the printer power cord. Wait about 30 seconds, and then plug the power cord back in.
 - Turn on the printer. The printer checks for paper in the paper path and will automatically eject the jammed paper.

When you fix the problem, press **OK** to continue printing.

"Printing cancelled" or "Unable to communicate with printer."

Cause: The printer may have lost power or been turned off, or the USB cable connecting the printer to a PictBridge device or to a computer may have come loose.

Solution: Make sure that the printer is turned on and that the camera USB cable is firmly connected to the PictBridge port on the top of the printer. You might need to resend your print job.

7 Specifications

This section lists the minimum system requirements for installing the HP Photosmart software, and provides selected printer specifications.

System requirements

Component	Windows Minimum	Mac Minimum
Operating System	Microsoft® Windows Vista, XP Home, XP Professional, or x64 Edition	Mac OS X v10.3.9 or greater
Processor	<ul style="list-style-type: none">• Microsoft Windows Vista: A modern 800 MHz 32-bit (x86) or 64-bit (x64) processor (1 GHz or higher recommended)• Microsoft Windows XP Home & XP Professional: Any Intel® Pentium® II, Celeron®, or compatible processor, 233 MHz (Pentium III, 300 MHz or higher recommended)• x64 Edition: AMD® Athlon 64, AMD Opteron, Intel Xeon with Intel EM64T support, or Pentium 4 with Intel EM64T support	G3 or greater or Intel Core processor
RAM	<ul style="list-style-type: none">• Microsoft Windows Vista: 512 MB (1 GB or higher recommended)• Microsoft Windows XP Home & XP Professional: 128 MB (256 MB or higher recommended)• x64 Edition: 256 MB (512 MB or higher recommended)	128 MB (256 MB or higher recommended)
Free Disk Space	400 MB	150 MB
Video Display	SVGA 800 x 600, 16-bit color (32-bit color recommended)	800 x 600, 16-bit or higher
Optical Drive	CD-ROM or DVD-ROM	CD-ROM or DVD-ROM
Browser	Microsoft Internet Explorer® 5.01 Service Pack 2 or higher	Any
Connectivity	<ul style="list-style-type: none">• Available USB port and USB cable• Internet access recommended	<ul style="list-style-type: none">• Available USB port and USB cable• Internet access recommended

Printer specifications

Category	Specifications
Connectivity	<p>USB 2.0 high-speed: Using the port on the back of the printer to connect the required cable, a USB Type A male to Type B 5-pin male, that is no more than 10 feet long</p> <p>PictBridge: Using the top PictBridge port to connect the required cable, a USB Type A male to Type B 5-pin male, that is no more than 10 feet long</p> <p>Bluetooth: Using the optional Bluetooth wireless printer adapter, model bt450</p>
Image File Formats	JPEG Baseline
Margins	Borderless printing: Top 0.0 mm (0.0 inch); Bottom 0.0 mm (0.0 inch); Left/right 0.0 mm (0.0 inch)
Media Sizes	<p>Photo paper 10 x 15 cm (4 x 6 inches)</p> <p>Photo paper with tab 10 x 15 cm with 1.25 cm tab (4 x 6 inches with 0.5 inch tab)</p> <p>Index cards 10 x 15 cm (4 x 6 inches)</p> <p>A6 cards 105 x 148 mm (4.1 x 5.8 inches)</p> <p>L-size cards 90 x 127 mm (3.5 x 5 inches)</p> <p>L-size cards with tab 90 x 127 mm with 12.5 mm tab (3.5 x 5 inches with 0.5 inch tab)</p> <p>Hagaki cards 100 x 148 mm (3.9 x 5.8 inches)</p>
Media Types	<p>HP Advanced Photo Paper (recommended)</p> <p>Cards (index, A6, L-size, Hagaki)</p>
Environmental Specifications	<p>Maximum range during operation: 5–40 °C (41–104 °F), 5–90% RH</p> <p>Recommended range during operation: 15–35 °C (59–95 °F), 20–80% RH</p>
Paper Tray	One 10 x 15 cm (4 x 6 inches) photo paper tray
Paper Tray Capacity	20 sheets of photo paper, maximum thickness 292 µm (11.5 mil) per sheet
Power Consumption (Average)	<p>U.S.</p> <p>Printing: 11.5 W</p> <p>Idle, no camera connected: 3.7 W</p> <p>Idle, camera connected: 3.6 W</p> <p>Off: 3.6 W</p> <p>International</p> <p>Printing: 12.5 W</p> <p>Idle, no camera connected: 3.6 W</p> <p>Idle, camera connected: 3.5 W</p> <p>Off: 3.5 W</p>

(continued)

Category	Specifications
Power Supply Model Number	HP Part # 0957–2121 (North America), 100-240 Vac ($\pm 10\%$) 50/60 Hz (± 3 Hz) HP Part# 0957–2120 (Rest of world), 100-240 Vac ($\pm 10\%$) 50/60 Hz (± 3 Hz)
Print Cartridge	HP 110 Tri-color Inkjet print cartridge
USB 2.0 High-speed Support	Microsoft® Windows XP Home, XP Professional, or x64 Edition Mac OS X 10.3.9 or greater HP recommends that the USB cable be less than 3 meters (10 feet) in length For connection to PC: USB 2.0 high speed cable Type A male to Type B 5-pin male For connection to PictBridge device: USB 2.0 high speed cable Type A male to Type B 5-pin male

8 HP support

- [Check the HP support Web site first](#)
- [HP support by phone](#)
- [Warranty](#)
- [Additional warranty options](#)
- [Regulatory model identification number VCVRA-0707](#)
- [Environmental statements](#)

Check the HP support Web site first

Check the documentation that came with the printer. If you do not find the information you need, check out the HP support Web site.

To check for online support

1. Visit the HP online support Web site at www.hp.com/support. HP online support is available to all HP customers. It is the fastest source for up-to-date device information and expert assistance and includes the following features:
 - Fast access to qualified online support specialists
 - Software and driver updates for the HP Photosmart
 - Valuable HP Photosmart and troubleshooting information for common problems
 - Proactive device updates, support alerts, and HP newsgrams that are available when you register the HP Photosmart
2. For Europe only: Contact your local point of purchase. If the HP Photosmart has a hardware failure, you will be asked to bring it back to your local point of purchase. (Service is provided at no charge during the device limited warranty period. After the warranty period, you will be quoted a service charge.)
3. If you do not find the information you need online, call HP support. Support options and availability vary by device, country/region, language, and phone support period.

HP support by phone

For a list of support phone numbers, see the phone number list on the inside of the back cover.

Phone support period

One year of phone support is available in North America, Asia Pacific, and Latin America (including Mexico). To determine the duration of phone support in Europe, the Middle East, and Africa, go to www.hp.com/support. Standard phone company charges apply.

Placing a call

Call HP support while you are in front of the computer and the HP Photosmart. Be prepared to provide the following information:

- Device model number (located on the label on the front of the device)
- Device serial number (located on the back or bottom of the device)
- Messages that appear when the situation occurs
- Answers to these questions:
 - Has this situation happened before?
 - Can you re-create it?
 - Did you add any new hardware or software to your computer at about the time that this situation began?
 - Did anything else occur prior to this situation (such as a thunderstorm, device was moved, etc.)?

After the phone support period

After the phone support period, help is available from HP at an additional cost. Help may also be available at the HP online support Web site: www.hp.com/support. Contact your HP dealer or call the support phone number for your country/region to learn more about support options.

Warranty

HP product	Duration of limited warranty
Software Media	90 days
Printer	1 year
Print or Ink cartridges	Until the HP ink is depleted or the "end of warranty" date printed on the cartridge has been reached, whichever occurs first. This warranty does not cover HP ink products that have been refilled, remanufactured, refurbished, misused, or tampered with.
Accessories	1 year unless otherwise stated

A. Extent of limited warranty

- Hewlett-Packard (HP) warrants to the end-user customer that the HP products specified above will be free from defects in materials and workmanship for the duration specified above, which duration begins on the date of purchase by the customer.
- For software products, HP's limited warranty applies only to a failure to execute programming instructions. HP does not warrant that the operation of any product will be interrupted or error free.
- HP's limited warranty covers only those defects that arise as a result of normal use of the product, and does not cover any other problems, including those that arise as a result of:
 - Improper maintenance or modification;
 - Software, media, parts, or supplies not provided or supported by HP;
 - Operation outside the product's specifications;
 - Unauthorized modification or misuse.
- For HP printer products, the use of a non-HP cartridge or a refilled cartridge does not affect either the warranty to the customer or any HP support contract with the customer. However, if printer failure or damage is attributable to the use of a non-HP or refilled cartridge or an expired ink cartridge, HP will charge its standard time and materials charges to service the printer for the particular failure or damage.
- If HP receives, during the applicable warranty period, notice of a defect in any product which is covered by HP's warranty, HP shall either repair or replace the product, at HP's option.
- If HP is unable to repair or replace, as applicable, a defective product which is covered by HP's warranty, HP shall, within a reasonable time after being notified of the defect, refund the purchase price for the product.
- HP shall have no obligation to repair, replace, or refund until the customer returns the defective product to HP.
- Any replacement product may be either new or like-new, provided that it has functionality at least equal to that of the product being replaced.
- HP products may contain remanufactured parts, components, or materials equivalent to new in performance.
- HP's Limited Warranty Statement is valid in any country where the covered HP product is distributed by HP. Contracts for additional warranty services, such as on-site service, may be available from any authorized HP service facility in countries where the product is distributed by HP or by an authorized importer.

B. Limitations of warranty

TO THE EXTENT ALLOWED BY LOCAL LAW, NEITHER HP NOR ITS THIRD PARTY SUPPLIERS MAKES ANY OTHER WARRANTY OR CONDITION OF ANY KIND, WHETHER EXPRESS OR IMPLIED WARRANTIES OR CONDITIONS OF MERCHANTABILITY, SATISFACTORY QUALITY, AND FITNESS FOR A PARTICULAR PURPOSE.

C. Limitations of liability

- To the extent allowed by local law, the remedies provided in this Warranty Statement are the customer's sole and exclusive remedies.
- TO THE EXTENT ALLOWED BY LOCAL LAW, EXCEPT FOR THE OBLIGATIONS SPECIFICALLY SET FORTH IN THIS WARRANTY STATEMENT, IN NO EVENT SHALL HP OR ITS THIRD PARTY SUPPLIERS BE LIABLE FOR DIRECT, INDIRECT, SPECIAL, INCIDENTAL, OR CONSEQUENTIAL DAMAGES, WHETHER BASED ON CONTRACT, TORT, OR ANY OTHER LEGAL THEORY AND WHETHER ADVISED OF THE POSSIBILITY OF SUCH DAMAGES.

D. Local law

- This Warranty Statement gives the customer specific legal rights. The customer may also have other rights which vary from state to state in the United States, from province to province in Canada, and from country to country elsewhere in the world.
- To the extent that this Warranty Statement is inconsistent with local law, this Warranty Statement shall be deemed modified to be consistent with such local law. Under such local law, certain disclaimers and limitations of this Warranty Statement may not apply to the customer. For example, some states in the United States, as well as some governments outside the United States (including provinces in Canada), may:
 - Preclude the disclaimers and limitations in this Warranty Statement from limiting the statutory rights of a consumer (e.g., the United Kingdom);
 - Otherwise restrict the ability of a manufacturer to enforce such disclaimers or limitations; or
 - Grant the customer additional warranty rights, specify the duration of implied warranties which the manufacturer cannot disclaim, or allow limitations on the duration of implied warranties.
- THE TERMS IN THIS WARRANTY STATEMENT, EXCEPT TO THE EXTENT LAWFULLY PERMITTED, DO NOT EXCLUDE, RESTRICT, OR MODIFY, AND ARE IN ADDITION TO, THE MANDATORY STATUTORY RIGHTS APPLICABLE TO THE SALE OF THE HP PRODUCTS TO SUCH CUSTOMERS.

HP Limited Warranty

Dear Customer,

You will find below the name and address of the HP entity responsible for the performance of the HP Limited Warranty in your country.

You may have additional statutory rights against the seller based on your purchase agreement. Those rights are not in any way affected by this HP Limited Warranty.

Ireland: Hewlett-Packard Ireland Ltd. 30 Herbert Street IRL-Dublin 2

United Kingdom: Hewlett-Packard Ltd, Cain Road, Bracknell, GB-Berks RG12 1HN

Additional warranty options

Extended service plans are available for the printer at additional costs. Go to www.hp.com/support, select your country/region and language, then explore the services and warranty area for information about the extended service plans.

Regulatory model identification number VCVRA-0707

For regulatory identification purposes, the product is assigned a Regulatory Model Number. The Regulatory Model Number for the product is VCVRA-0707. This regulatory number should not be confused with the marketing name (HP Photosmart A320 series) or product number (Q8516A).

Environmental statements

For Environmental Stewardship information, see the electronic Help.

A Install the software

The printer comes with optional software you can install on a computer.

After using the setup instructions that came in the box with the printer to set up the printer hardware, use the instructions in this section to install the software.

The USB cable required for printing from a computer might not be included in the box with the printer, so you might need to purchase it separately. See ["Print from a computer"](#) on page 13 for more information about this cable.

Windows users	Mac users
<p>Important: Do not connect a USB cable until you are prompted.</p> <ol style="list-style-type: none">1. Insert the HP Photosmart CD into your computer CD-ROM drive. If the Install Wizard does not appear, locate the setup.exe file on the CD-ROM drive and double-click it. Wait several minutes while the files load.2. Click Next and follow the onscreen instructions.3. When prompted, connect one end of the USB cable to the USB port on the back of the printer, and connect the other end to the USB port on your computer.4. Follow the onscreen instructions until the installation is finished.	<ol style="list-style-type: none">1. Connect one end of the USB cable to the USB port on the back of the printer, and connect the other end to the USB port on your computer.2. Insert the HP Photosmart CD into your computer's CD-ROM drive.3. On your desktop, double-click the HP Photosmart CD icon.4. Double-click the HP Installer icon, and follow the instructions on each installation screen to install the printer software.5. When the Congratulations screen appears, click OK.

B Indicator lights

The indicator lights on the HP Photosmart A320 series printer tell you about the state of the printer. The tables in this section explain some of the most common and important patterns, as follows:

- The **On** light tells you about the printer's power state.
- The **Resume** light tells you about the current print job. It indicates that you need to press the OK button after clearing an error condition.
- The **Print Cartridge** light tells you about the print cartridge.
- The **PictBridge** light tells you about the connected PictBridge camera.
- The **Attention** light usually acts in combination with the other lights. It indicates that you need to correct a problem before printing can resume.

The **Red Eye** light is not listed here, because its only function is to tell you whether or not the automatic photo enhancing feature is turned on.

If the printer is connected to a computer, check the computer screen for information about the error condition and how to resolve it.




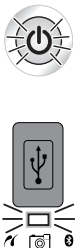
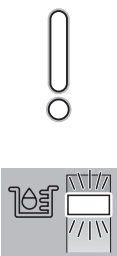



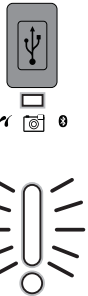
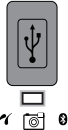
 **NOTE:** If something new occurs, lights that are turned on to indicate one thing may change to indicate the new event. For example, the **On** light is normally a solid green whenever the printer is turned on. However, if you print a photo, the **On** light flashes until the printer is finished printing.

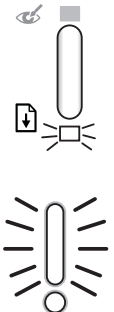
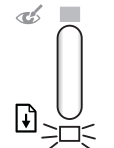
Table B-1 Indicator lights

Lights	Status	Meaning
	The On light is solid green.	The printer is on and ready to print.
	The On light is flashing green.	The printer is starting up or busy.
	The On light and the PictBridge light are both flashing green.	The printer is printing photos from a connected PictBridge camera.
	The Attention light is solid red, and the Print Cartridge light is flashing red.	The print cartridge door is open, and printing cannot begin or resume until this door is closed.

Indicator lights (continued)

Lights	Status	Meaning
	<p>The Attention light is flashing red, and the Print Cartridge light is flashing red.</p>	<p>The print cartridge is missing, damaged, incompatible, or incorrectly inserted.</p>
	<p>The Print Cartridge light is solid red.</p>	<p>The print cartridge is low on ink. When this light comes on solid red, about 20% of the ink remains in the print cartridge. The ink will need to be replaced soon. If you have the HP Photosmart software installed, you can obtain more precise ink level information; see the electronic Help for instructions.</p>
	<p>The PictBridge light is solid green. The Attention light is solid red.</p>	<p>The PictBridge camera connected to the PictBridge port on the top of the printer is using the wrong connection mode. Make sure the USB configuration is set to Digital Camera.</p> <p>OR</p> <p>An unrecognized (non-PictBridge) device is connected to the PictBridge port.</p>
	<p>The PictBridge light is solid green and the Attention light is flashing red.</p>	<p>The connected PictBridge camera lost power.</p>
	<p>The PictBridge light is solid green.</p>	<p>A PictBridge camera is connected to the printer, and the printer is ready to print.</p>

Indicator lights (continued)

Lights	Status	Meaning
	<p>The Resume light is flashing green and the Attention light is flashing red.</p>	<p>There is a paper jam or other error condition.</p> <p>OR</p> <p>The printer is cancelling the print job because the sending device (camera, computer, or other device) lost power, or the connection to the sending device was lost.</p>
	<p>The Resume light is flashing green.</p>	<p>The printer is out of paper.</p>

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