

EPSON STYLUS™ SCAN 2000

All in One Product

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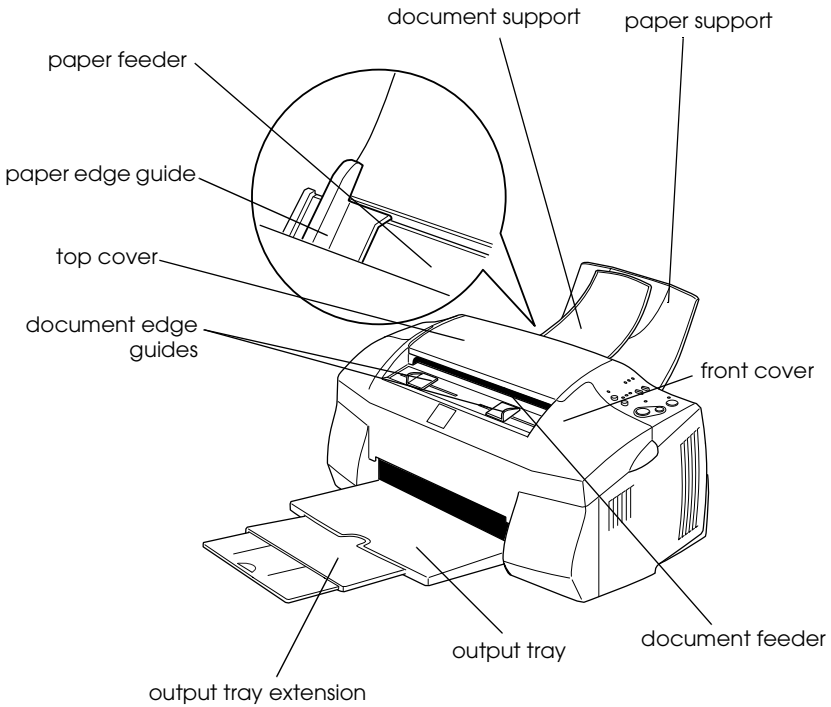
Glossary

Chapter 1

EPSON Stylus Scan Parts and Functions

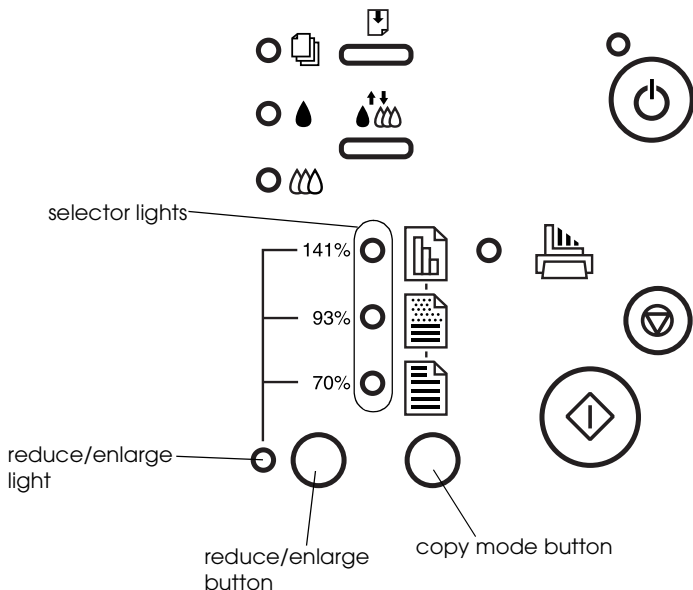
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Stylus Scan Parts and Control Panel Functions












Control Panel

The control panel consists of buttons and indicator lights, and gives you access to several features. Match the icons on the control panel with those in the chart below.









Buttons

Button	Function
 power	Turns the Stylus Scan on and off.

 load/eject	<p>Loads paper into or ejects paper from the paper feeder if pressed and released quickly. If the print head is in the ink cartridge change position, it returns to the home position.</p> <p>Moves the print head to the ink cartridge change position if pressed and held for three seconds.</p> <p>Prints a status and pattern sheet when pressed and held while turning the power on.</p>
 cleaning	<p>Returns the print head to its home position after ink cartridge replacement.</p> <p>Cleans the print head when pressed and held for three seconds when the  black or  color ink out light is off.</p> <p>Moves the print head to the ink cartridge replacement position if pressed for three seconds while the  black or  color ink out light is flashing or on, or if a cartridge is missing.</p>
 stop/clear	<p>Ejects the original document from the document feeder if pressed before copying.</p> <p> Cancels copying and ejects the original document if pressed while copying is in progress.</p>
 copy	<p>Starts copying.</p>
copy mode	<p>Enables copy mode selection if pressed while the reduce/enlarge light is on. The selector light for the currently selected copy mode comes on.</p> <p>Changes the copy setting if pressed while the reduce/enlarge light is off. You can choose between B/W, Grayscale, and Color copy settings.</p>
reduce/ enlarge	<p>Changes the copy magnification.</p> <p>Allows the selection of a magnification rate if pressed while the reduce/enlarge light is off. The reduce/enlarge light and the selector light for the currently selected magnification rate come on.</p> <p>Changes the magnification setting if pressed while the reduce/enlarge light is on. You can choose between the following magnification rates: 70%, 93%, 100%, and 141%.</p>

Lights

Light	Description
 power	<p>On when the Stylus Scan is on and ready to print, copy, or scan.</p> <p>Flashing when the Stylus Scan is receiving data, printing, scanning, copying, warming up, or in ink cartridge replacement mode.</p>
 paper out	<p>On when the Stylus Scan is out of paper for printing or copying. Load paper into the paper feeder, then press the  load/eject button to resume printing or copying.</p> <p>Flashing when the paper is jammed in the paper feeder. Remove all paper from the paper feeder, then reload the paper. If the light continues to flash, turn off the Stylus Scan and gently pull all of the paper out of the paper path.</p>
 black ink out	<p>Flashing when the black ink cartridge is nearly empty. Obtain a new black ink cartridge.</p> <p>On when the black ink cartridge is empty. Replace the black ink cartridge (S020189).</p>
 color ink out	<p>Flashing when the color ink cartridge is nearly empty. Obtain a new color ink cartridge.</p> <p>On when color ink cartridge is empty. Replace the color ink cartridge. (S020191).</p>
reduce/ enlarge	<p>On when the selector lights are indicating the currently selected magnification rate.</p> <p>Off when the Selector lights are indicating the currently selected copy mode.</p>

<p>selector lights</p>	<p>When the reduce/enlarge light is off, these lights indicate the current copy setting.</p> <p>Top: On when Color is the copy setting.</p> <p>Middle: On when Grayscale is the copy setting.</p> <p>Bottom: On when B/W is the copy setting.</p> <p>When the reduce/enlarge light is on, these lights indicate the current magnification setting.</p> <p>All: Off when 100% is the magnification setting.</p> <p>Top: On when 141% is the magnification setting.</p> <p>Middle: On when 93% is the magnification setting.</p> <p>Bottom: On when 70% is the magnification setting.</p>
 <p>Scan/Copy Error</p>	<p>On when there is paper is jammed in the document feeder, or when another scan or copy error has occurred.</p>

Chapter 2

Safety Instructions

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Important Safety Instructions

Read all of these instructions before using your EPSON Stylus Scan. Also be sure to follow all warnings and instructions marked on the Stylus Scan.

- ❑ Unplug the Stylus Scan before cleaning. Clean with a damp cloth only. Do not spill liquid on the Stylus Scan.
- ❑ Do not place the Stylus Scan on an unstable surface, or near a radiator or heat source.
- ❑ Do not block or cover the openings in the Stylus Scan's cabinet. Do not insert objects through the slots.
- ❑ Take care not to spill liquid on the Stylus Scan.
- ❑ Use only the type of power source indicated on the Stylus Scan's label.
- ❑ Connect all equipment to properly grounded power outlets. Avoid using outlets on the same circuit as air control systems, or other devices that consume large amounts of electricity and regularly switch on and off.
- ❑ Avoid electrical outlets controlled by wall switches or automatic timers.
- ❑ Keep the entire computer system away from potential sources of electromagnetic interference, such as loudspeakers and the base units of cordless telephones.
- ❑ Do not use a damaged or frayed power cord.
- ❑ If you use an extension cord with the Stylus Scan, make sure the total ampere rating of the devices plugged into the extension cord does not exceed the cord's ampere rating. Also, make sure the total ampere rating of all devices plugged into the wall outlet does not exceed the wall outlet's ampere rating.

- ❑ Do not attempt to service the EPSON Stylus Scan yourself.
- ❑ Unplug the Stylus Scan and refer servicing to qualified service personnel under the following conditions:

The power cord or plug is damaged; liquid has entered the Stylus Scan; the Stylus Scan has been dropped or the cabinet damaged; the Stylus Scan does not operate normally or exhibits a distinct change in performance.

A Few Precautions

When using the Stylus Scan

- ❑ Do not put your hand inside the Stylus Scan or touch the print head during operation.
- ❑ Do not move the print head by hand. Doing so may damage the EPSON Stylus Scan.
- ❑ Always turn of the Stylus Scan using the ⏻ power button. When this button is pressed, the ⏻ power light flashes briefly and then goes off. Do not unplug the Stylus Scan or turn off the power to the outlet until the ⏻ power light stops flashing.
- ❑ Before transporting the Stylus Scan, make sure the print head is in the home (far right) position and the ink cartridges are in place.

When handling the ink cartridges

- ❑ Keep ink cartridges out of the reach of children. Do not allow children to drink from or otherwise handle the cartridges.
- ❑ If ink gets on your skin, wash it off with soap and water. If it gets into your eyes, flush them immediately with water.

- ❑ Do not shake the ink cartridges; this can cause leakage.
- ❑ Install the ink cartridge immediately after you remove it from its package. Leaving the cartridge unpacked for a long time before use may result in reduced print quality.
- ❑ Once you install an ink cartridge, do not open the clamp or remove the cartridge except to replace it with a new one. Otherwise, the cartridge may become unusable.
- ❑ Do not use an ink cartridge beyond the date printed on the cartridge carton. For best results, use up the ink cartridges within six months of installing them.
- ❑ Do not dismantle the ink cartridges or try to refill them. Doing so may damage the print head.

When choosing a place for the Stylus Scan

- ❑ Place the EPSON Stylus Scan on a flat, stable surface that extends beyond the Stylus Scan base in all directions. The Stylus Scan will not operate properly if it is tilted or at an angle.
- ❑ Avoid places subject to rapid changes in temperature and humidity. Also, keep the Stylus Scan away from direct sunlight, strong light, and heat sources.
- ❑ Avoid places subject to shocks and vibrations.
- ❑ Leave enough room around the Stylus Scan to allow for sufficient ventilation.
- ❑ Place the Stylus Scan near a wall outlet where the plug can be easily unplugged.

ENERGY STAR Compliance



As an ENERGY STAR Partner, EPSON has determined that this product meets the ENERGY STAR guidelines for energy efficiency.

The International ENERGY STAR Office Equipment Program is a voluntary partnership with the computer and office equipment industry to promote the introduction of energy-efficient personal computers, monitors, printers, fax machines, and copiers in an effort to reduce air pollution caused by power generation.

Warnings, Cautions, and Notes



Warnings

must be followed carefully to avoid bodily injury.



Cautions

must be observed to avoid damage to your equipment.

Notes

contain important information and useful tips on the operation of your Stylus Scan.

Printer

Chapter 3

Loading the Paper

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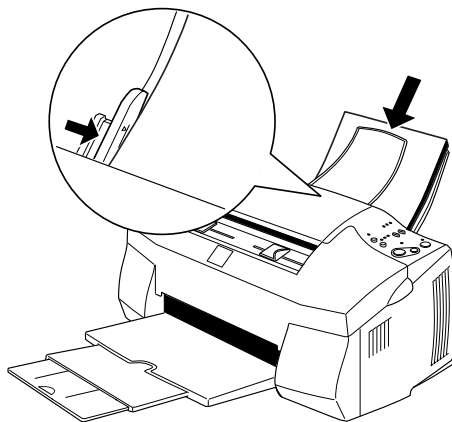
Loading Paper

This chapter explains how to load paper and other media into the paper feeder for printing and copying, and describes proper handling of these media. For information on feeding documents into the document feeder, see chapters 8 and 9.

Loading Plain Paper

Follow these steps to load plain paper into the Stylus Scan for printing or copying.

1. Lower the output tray and slide out the extension. Next, slide the left paper edge guide so that the distance between the edge guides is slightly wider than the width of your paper.
2. Fan a stack of paper; then tap it on a flat surface to even the edges.
3. Load the stack of paper with the printable side up and the right edge of the paper resting against the right edge guide of the paper feeder. Then slide the left edge guide against the left edge of the paper.



Note:

- ❑ *Always load plain paper into the paper feeder short edge first.*
- ❑ *Make sure the paper stack fits under the arrow mark inside the edge guide.*
- ❑ *Remove any documents from the document feeder before printing using the paper feeder.*

Loading Special Paper and Other Media

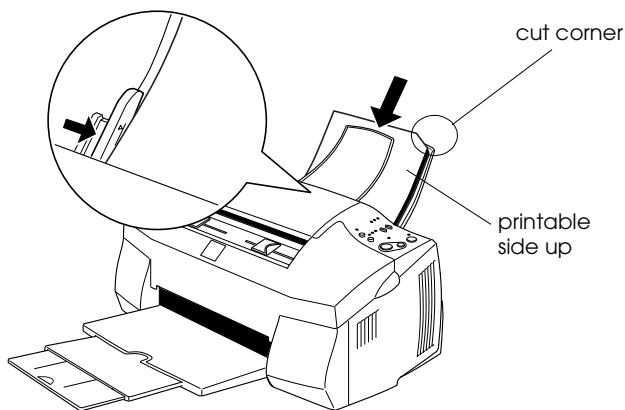
You can achieve good results with most plain bond paper. However, coated paper and glossy film result in higher quality printouts because these media absorb smaller amounts of ink.

You can print on a wide variety of special media, including ink jet paper, photo quality glossy film, photo paper, transparencies, index cards, and adhesive sheets.

EPSON distributes special media that are formulated for the ink used in EPSON ink jet devices. It is recommended that you use these media to ensure high-quality results. See “EPSON special media” on page 13-2 for a complete list of these products.

When loading special media distributed by EPSON, read the instructions included with the media and keep the following points in mind.

- ❑ Make sure the printable side of the paper is facing up when loading media into the paper feeder. See the instruction sheets packed with the media to determine which side is the printable surface. Some media have cut corners to help identify the correct loading direction, as shown in the illustration.



Note:

If you extend the printable area by selecting the Maximum setting in the printer driver, the cut corner on special paper may mar your printout.

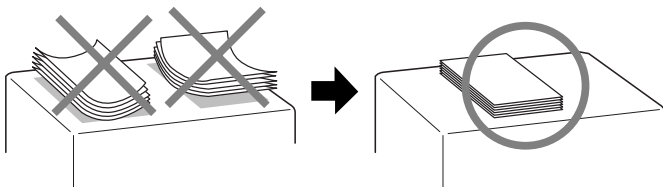
- ❑ Make sure the paper stack fits under the arrow mark located on the inside surface of the left edge guide.
- ❑ Remove any documents from the document feeder before printing using the paper feeder.

❑ The loading capacity for EPSON special media is explained below.

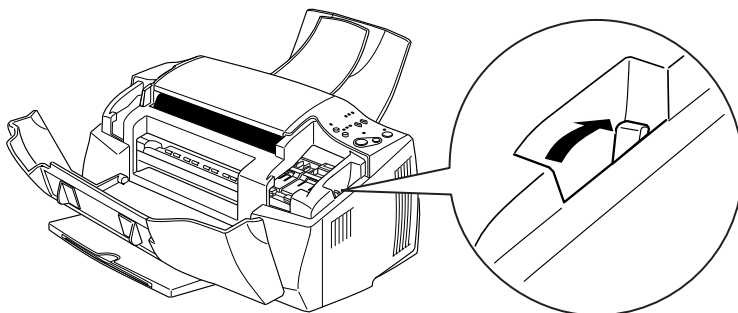
360 dpi Ink Jet Paper and Photo Quality Ink Jet Paper	Up to the arrow mark on the left edge guide.
Photo Quality Ink Jet Cards, Ink Jet Note Cards, and Ink Jet Greeting Cards	Up to 30 index cards. Always place the included support sheet* under the cards.
Ink Jet Transparencies	Up to 30 transparencies. Always put a sheet of plain paper under the stack of transparencies.
Photo Quality Self Adhesive Sheets	One sheet at a time.
Photo Paper	Up to 20 sheets of 4 × 6 inch Photo Paper. Always put a support sheet* under the stack of Photo Paper. For 200 × 300 mm Photo Paper, you can only load one sheet at a time.
Photo Stickers 16 and Photo Stickers 4	One sheet at a time. Always put the included Support Sheets* A and B under the stack of Photo Stickers.
Panoramic Photo Paper and Iron-On Cool Peel Transfer Paper	One sheet at a time.
Matte Paper-Heavyweight	Up to 20 sheets. Always put a support sheet* under the stack of Matte Paper-Heavyweight.

* Be careful not to print on support sheets loaded under special media.

- ❑ If the paper is curled, make sure to flatten it or curl it slightly toward the opposite side before loading. Printing on curled paper may smear your printout, especially when printing with Maximum selected as the Printable Area setting.



- ❑ If ink smears on your documents when printing on thick media, move the adjust lever to the “+” position. To change the setting, open the front cover and position the lever as shown in the illustration.



Note:

- ❑ Return the adjust lever to the “0” position before printing or copying using media of normal thickness. Leaving the lever in the “+” position may cause gaps in the printed image.
- ❑ When the adjust lever is in the “+” position, make sure the High Speed setting in the printer driver’s Advanced dialog box is off. To turn this option off, you may also need to change the Print Quality setting.

About special media cleaning sheets

Cleaning sheets packaged with EPSON special media should not be used with the Stylus Scan. The cleaning function performed by these sheets is not needed, and the sheets could jam in the Stylus Scan.

Loading Envelopes

When printing on envelopes, please note the following:

- You can load up to ten envelopes at a time into the paper feeder.

Note:

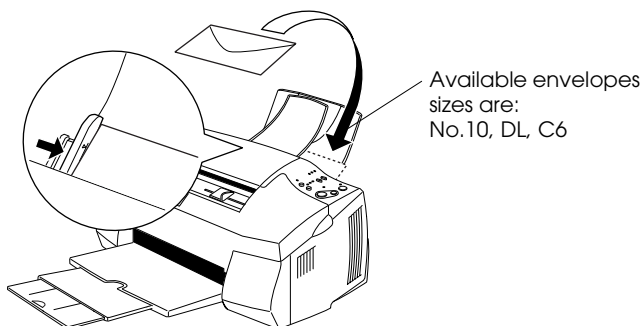
The folding quality and thickness of envelopes vary widely. If the total thickness of the stack of envelopes exceeds ten millimeters, press the stack flat before loading.

- Set the adjust lever to the “+” position. To do this, open the front cover and reposition the lever.

Note:

- Return the adjust lever to the “0” position before printing or copying using media of normal thickness. Leaving the lever in the “+” position may cause gaps in the printed image.*
- When the adjust lever is in the “+” position, make sure the High Speed setting in the printer driver’s Advanced dialog box is off. To turn this option off, you may also need to change the Print Quality setting.*

- ❑ Load envelopes flap edge first with the flap side down, as shown below.



- ❑ Do not use envelopes that are curled or folded. Make sure to flatten the envelope flaps before loading. Also avoid using envelopes that are too thin; they may curl during printing.
- ❑ Select Plain Paper as the Media Type setting on the printer driver.

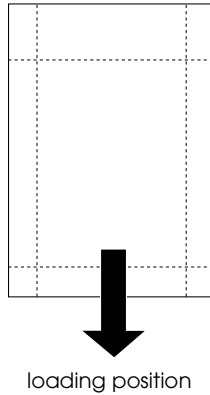
Using EPSON Photo Paper

EPSON Photo Paper (S041134, S041254) is perforated around the margins so you can trim your printed images to look like 4 × 6 inch (102 × 152 mm) or 200 × 300 mm photographs.

Loading Photo Paper

Note the following when loading EPSON Photo Paper:

- ❑ Load the paper printable side up with the perforated margins positioned as shown below.

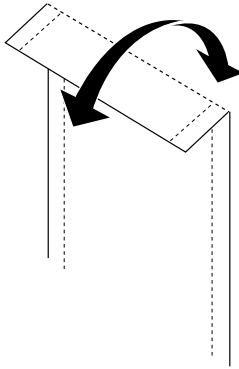


- ❑ Use flat, undamaged paper. If the paper or the support sheet is curled, flatten it before loading to avoid paper feeding problems.
- ❑ Always place the included support sheet under the stack of Photo Paper, but do not print on it.
- ❑ You can load up to 20 sheets of 4 × 6 inch Photo Paper or one sheet of 200 × 300 mm Photo Paper into the paper feeder.
- ❑ Cut or tear the paper at the perforation only after printing.
- ❑ Select Photo Paper as the Media Type setting, and Photo Paper 4 × 6 in or Photo Paper 200 × 300 mm as the Paper Size setting in your printer driver.

Removing the perforated margins

Note the following when removing the perforated margins:

- ❑ To remove the perforated margins, fold the paper back and forth a few times along the perforations, then carefully tear the margins off.

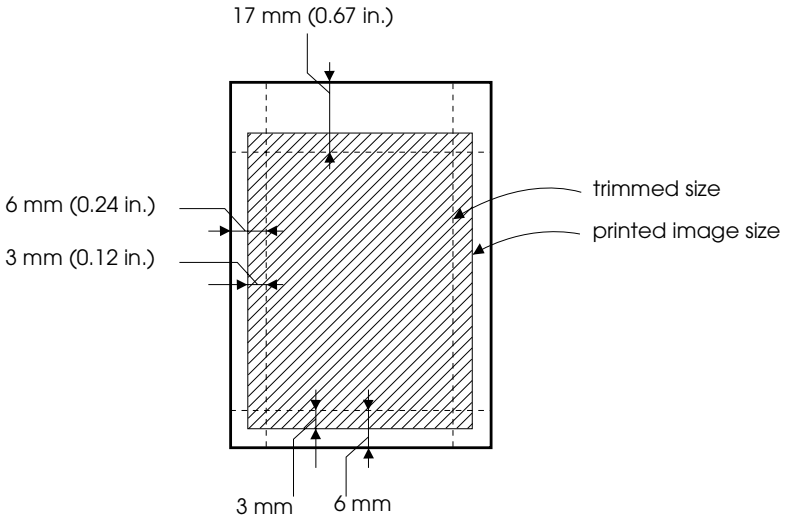


- ❑ You can also remove the margins by cutting along the perforations.

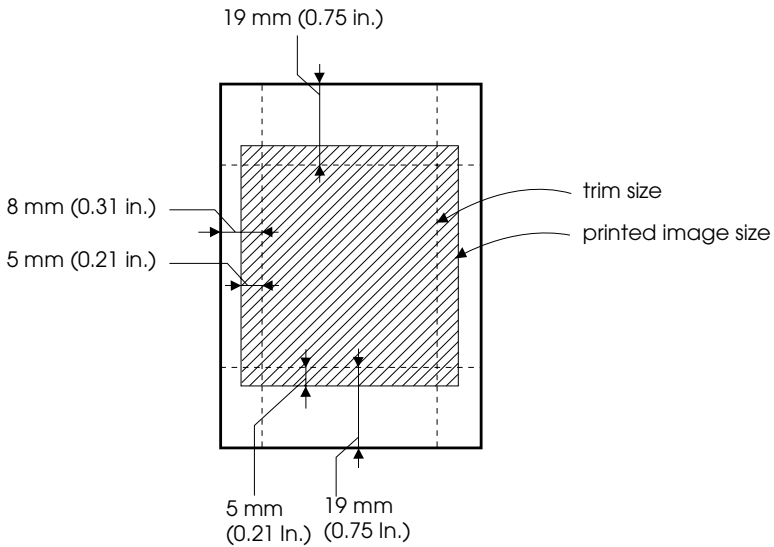
Note:

Keep in mind that the edges of your image might be cut off when you remove the perforated margins. See the illustration below.

4 x 6 inch



200 x 300 mm



Storing EPSON Photo Paper

Keep the following points in mind when storing Photo Paper.

- ❑ Return unused paper to the original package as soon as you finish printing, and avoid storing it in places exposed to high temperature, humidity, or direct sunlight.
- ❑ EPSON recommends storing your printouts in a resealable plastic bag and keeping them away from high temperatures, high humidity, and direct sunlight.

Chapter 4

Using the Printer Software for Windows

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Printer Software Introduction

The printer driver controls the Stylus Scan's print functions. This software lets you choose from a wide variety of settings to get the best results when printing. It also includes utilities that help you to check your Stylus Scan and to perform maintenance tasks.

Getting more information

For information on using the printer driver, see “Making Changes to Printer Driver Settings” on page 4-3.

For information on using the printer utilities, see “Using the Printer Utilities” on page 4-20.

Note:

The specific features available in the printer software vary depending on the version of Windows you are using.

Online help provides more information about the printer software. See “Getting Information Through Online Help” on page 4-26 for instructions on accessing help.

Accessing the printer software

You can access the printer software from most Windows applications, or from the Windows Start menu.

When you access the printer software from a Windows application, the settings you make apply only to the application you are using.

When you access the printer software from the Start menu, the settings you make apply to all of your Windows applications.

From Windows applications

Follow the directions below to access your printer software from your Windows application.

1. From the File menu, click Print or Page Setup.
2. In the dialog box that appears, click Printer, Setup, Options, or Properties. (Depending on your application, you may need to click a combination of these buttons.) The printer driver opens.

From the Windows Start menu

Follow the directions below to access your printer software from the Windows Start menu.

1. Click Start, point to Settings, then click Printers.
2. Select EPSON Stylus Scan 2000, then click Properties on the File menu. The printer driver opens.

Making Changes to Printer Driver Settings

The printer driver provides the following menus and settings.

Main	Media Type, Ink, Mode
Paper	Paper Size, Copies, Orientation, Printable Area
Layout	Reduce/Enlarge, Multi-Page, Watermark

The Mode settings on the Main menu are arranged to give you four levels of control over the printer driver, as explained below.

Automatic	This mode provides the quickest and easiest way to start printing. See "Using the Automatic setting" on page 4-7.
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PhotoEnhance	This mode lets you choose from a variety of image-correction settings specially designed for photos. See "Using the Photo Enhance mode" on page 4-8.
Custom	This mode lets you choose from a list of ready-made or personalized settings suited to the kind of document you want to print. When Custom is selected, the Advanced button is enabled, allowing you to access the Advanced dialog box. See "Using the Custom mode" on page 4-8.
Advanced	This button opens the Advanced dialog box, where you can to make detailed settings to fit your individual needs. From the Advanced dialog box, you can add your personalized settings to the Custom Settings list. See "Using the Advanced settings" on page 4-9.

In addition to making comprehensive Mode settings that affect overall print quality, you can also modify individual aspects of your printout using the Paper and Layout menus. See "Modifying the printout style" on page 4-14.

Making the Media Type setting

The Media Type setting determines what other settings are available, so you should always make this setting first.

On the Main menu, select the Media Type setting that matches the paper you loaded into the paper feeder. To find out what Media Type you are using, find your paper in the list below, and refer to the corresponding Media Type setting (shown in bold). For some kinds of paper, there are several Media Type settings to choose from.

Plain Paper

Plain paper

Envelopes

EPSON Premium Ink Jet Plain Paper (A4) S041214

360 dpi Ink Jet Paper

EPSON 360 dpi Ink Jet Paper (A4) S041059

EPSON Iron-On Cool Peel Transfer Paper (A4) S041154

Photo Quality Ink Jet Paper

EPSON Photo Quality Ink Jet Paper (A4) S041061

EPSON Photo Quality Ink Jet Cards (A6) S041054

EPSON Photo Quality Ink Jet Cards (5 × 8") S041121

EPSON Photo Quality Ink Jet Cards (8 × 10") S041122

EPSON Photo Quality Self Adhesive Sheets (A4) S041106

EPSON Ink Jet Note Cards A6 (with envelopes) S041147

EPSON Ink Jet Greeting Cards 5 × 8" (with envelopes) S041148

EPSON Ink Jet Greeting Cards 8 × 10" (with envelopes) S041149

Photo Paper

EPSON Photo Paper (A4) S041140

EPSON Photo Paper (4 × 6") S041134

EPSON Panoramic Photo Paper (210 × 594 mm) S041145

EPSON Photo Paper Cards (A4) S041177

Photo Quality Glossy Film

EPSON Photo Quality Glossy Film (A4)	S041071
EPSON Photo Quality Glossy Film (A6)	S041107
EPSON Photo Stickers 16 (A6)	S041144
EPSON Photo Stickers 4 (A6)	S041176

Ink Jet Transparencies

EPSON Ink Jet Transparencies (A4)	S041063
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Matte Paper-Heavyweight

EPSON Matte Paper-Heavyweight (A4)	S041259
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Note:

The availability of special media varies by location.

Using the Automatic setting

When Automatic is selected as the Mode setting on the Main menu, the printer driver takes care of all of the detailed settings based on the current Media Type and Ink settings. To make the Ink setting, click **Color** to print in color, or **Black** to print in black-and-white or grayscale. To make the Media Type setting, see “Making the Media Type setting” on page 4-4.



Note:

- ❑ Depending on the media selected in the Media Type list (while Automatic is selected), a slider appears under the Custom radio button that lets you choose Quality or Speed. Select Quality when print quality is more important than speed.
- ❑ Most Windows applications feature paper size and page layout settings that override similar settings in the printer driver. However, if your application does not have these settings, verify the settings on the Paper menu of the printer driver.

Using the Photo Enhance mode

The PhotoEnhance mode provides a variety of image-correction settings that you can apply to your photo images before printing. PhotoEnhance does not affect your original data.

Note:

- This mode is only available when you are printing in color.*
- Printing with Photo Enhance selected may increase the time required for printing, depending on your computer system and the amount of data contained in your image.*

You can select from the settings in the table below.

Standard	This setting provides standard image correction for most photos. Try this first.
People	This setting is best for photos of people.
Nature	This setting is best for outdoor scenery such as mountains, sky, and oceans.
Soft Focus	This setting makes your photos look as if they were taken with a soft-focus lens.
Sepia	This setting applies a sepia tone to your photos.

Selecting PhotoEnhance also enables the Digital Camera Correction check box. Select this check box when you are printing photos taken with a digital camera to give your printed images the smooth, natural appearance of photographs taken with a film camera.

Using the Custom mode

The Custom mode offers ready-made settings designed for printing different types of data, such as text, graphs, charts, and digital camera images, and for applying a color-matching method. You can also create and save your own custom settings. See “Using the Advanced settings” on page 4-9 for details.

You can select from the following ready-made settings.

Text/Graph	This setting is good for printing presentation documents such as graphs and charts.
Economy	This setting is best for printing drafts of text
ICM	This setting automatically adjusts printout colors to match colors on your screen. ICM stands for Image Color Matching.
sRGB	This setting is best for color matching with other sRGB devices.

Follow the steps below to select a Custom setting.

1. Select Custom as the Mode setting on the Main menu.
2. Click anywhere in the list box to open it, then select the most appropriate setting for the type of document or image you wish to print.
3. When you select a Custom setting, other settings such as Print Quality, Halftoning, and Color Adjustment are made automatically. Changes to these settings are reflected in the display on the left side of the Main menu.
4. Before printing, be sure to verify the Media Type and Ink settings, as they may be affected by the Custom setting you select. See “Making the Media Type setting” on page 4-4.

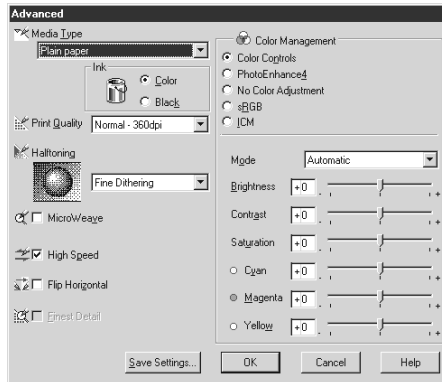
Using the Advanced settings

The settings in the Advanced dialog box give you complete control over your printing environment. Use these settings to experiment with new printing ideas, or to fine-tune a range of print settings to meet your individual needs. Once you are satisfied with your new settings, you can give them a name and add them to the Custom settings list on the Main menu.

Making Advanced settings

Follow the instructions below to make Advanced settings.

1. Select Custom as the Mode setting on the Main menu and then click Advanced. The following dialog box appears.



2. Select the Media Type you loaded in the Stylus Scan. For details, see “Making the Media Type setting” on page 4-4.
3. Choose Color or Black in the Ink setting.
4. Specify a Print Quality setting.
5. Make other settings as necessary. For details, see online help.

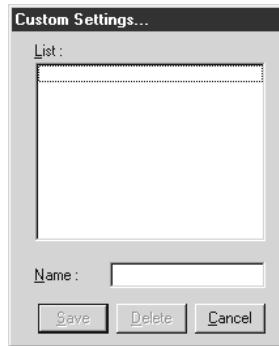
Note:

- ❑ *The PhotoEnhance feature under the Color Management only affects images, not text or graphs. For example, if Monochrome is selected from the Tone list (enabled when PhotoEnhance is selected), only the images in a document will be printed in monochrome. Any colored text or graphs in the same document will be printed in color.*
- ❑ *Some settings may be unavailable depending on the Media Type, Ink, and Print Quality settings you make.*

- Click OK to apply your settings and return to the Main menu. If you want to return to the Main menu without applying your settings, click Cancel. To save your Advanced settings, see the next section.

Saving and deleting your settings

To save your Advanced settings in the Custom Settings list, click Save Settings in the Advanced dialog box. The Custom Settings dialog box appears.



Type a unique name for your settings in the Name box, then click Save. Your Advanced settings will be added to the Custom Settings list.

Note:

- You cannot apply the names of settings provided by EPSON to your custom settings.
- You cannot delete the ready-made settings from the Custom Settings list.

To delete a setting from the Custom Settings list, select the setting name in the Custom Settings dialog box and click Delete.

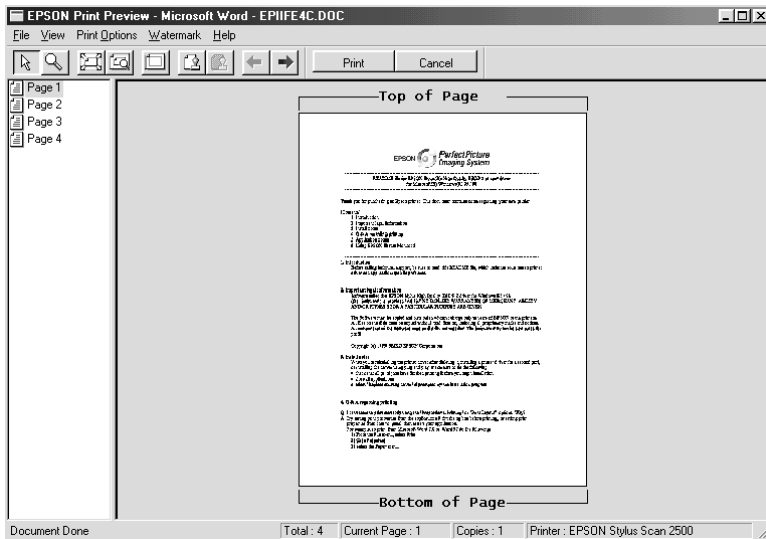
Using your saved settings

To select your settings, click the Custom button on the Main menu, then select your setting in the Custom Settings list, located to the right of the Custom button.









If you change the Media Type or Ink settings when one of your customized settings is selected in the Custom Settings list, the selection shown in the list returns to Custom Settings. The customized setting that was previously selected is not affected by the change. To return to your customized setting, simply reselect it in the list.

Previewing your printout

To see a preview of your document before printing it, select the Print Preview check box on the Main menu. When you print your document, the Print Preview window appears:





The Preview dialog box contains several icon buttons you can use to perform the following functions.

	Zoom	This option enlarges the size of the previewed page by a factor of 2.
	Fit-to-screen	This option scales the previewed page so that it fits the size of the page display window. Select this option if you want to see the entire page at one time.
	Maximum zoom	This option displays the previewed page at the maximum possible zoom ratio.
	Printable area on/off	Selecting this option will display a rectangle on the page being previewed. This rectangle is the printable area for the page. The Stylus Scan cannot print anything which exceeds this rectangle.
	Watermark	This option displays the watermark settings dialog. This dialog allows you to change any of the current watermark settings.
	Reset watermark settings	This option returns all watermark settings to what they were when the Preview was first opened. If nothing has been changed, this option appears grayed out.
	Previous page	This option displays the page previous to the page currently being previewed. (If there is no previous page then this option is grayed out)
	Next page	This option displays the next page in the document. (If there is no next page then this option is grayed out)

You can also manipulate the previewed document in the following ways:

- Select and preview individual pages.
- Reduce or enlarge the size of the preview.
- Select and print any or all pages.

- ❑ Apply watermarks. The watermark you select will appear in the previewed image. For detailed information on customizing watermarks, see “Printing a watermark on your document” on page 4-18.
- ❑ The Add and Remove options allow you to specify which pages in the document you wish to be printed. To add or remove page, you must first highlight the page in the list of page icons appearing on the left side of the preview window. Highlight the page by clicking once on the page icon. Then select or deselect from the Print Options menu.

	Add page	The highlighted pages will be added to the list of pages to be printed.
	Remove page	The highlighted pages will be removed from the list of pages to be printed.

After you have previewed the document, click **Print** to print the document, or click **Cancel** to cancel printing.

Modifying the printout style

You can modify your printout style using a variety of printer driver settings located on the Paper and Layout menus.

On the Paper menu, you can set the paper size, the number of copies, the orientation of your printout, and the printable area. On the Layout menu you can automatically match the document size to the paper size, print two or four pages on a single sheet of paper, print poster-size images by enlarging one page to cover several sheets, or place watermarks on documents.

Using the Paper menu settings

Use the settings on the Paper menu to change the paper size, set the number of copies and other copy parameters, specify the paper orientation, and adjust the printable area.



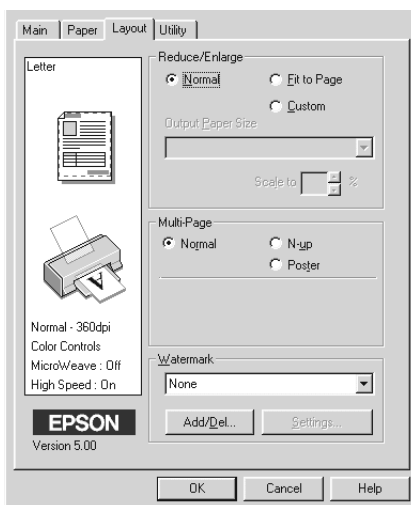
You can make the following settings on the Paper menu.

Paper Size	Select the paper size you want to use. You can also add a custom paper size.
Copies	Select the number of copies you wish to print. You can select Collate to print one set at a time or Reverse Order to determine the order in which you wish to print multiple copies of your document.
Orientation	Select Portrait (tall) or Landscape (wide) to change the orientation of your printout. If you need to print closer to the bottom of the page, select the Rotate by 180° check box.

<p>Printable Area</p>	<p>Select Center if you want to center the printout. Select Maximum if you need to increase the printable area.</p> <p>Note: When Maximum is selected, the print quality may decline at the edges of the printout. Before printing large jobs using this setting, print a single sheet to confirm quality. When Maximum is selected, make sure the paper loaded in the paper feeder is not curled.</p>
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Fitting your document to the paper size

Use the Reduce/Enlarge options on the Layout menu to fit your document to the paper size you will print on.



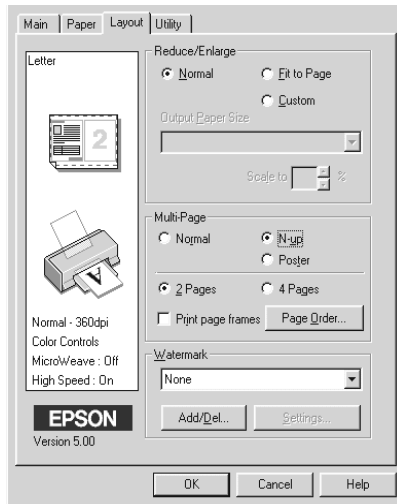
You can select from the following settings:

<p>Normal</p>	<p>Prints your document at its normal size.</p>
<p>Fit to Page</p>	<p>Proportionally enlarges or reduces the size of your document to make it fit the paper size you select in the Paper Size list on the Paper menu.</p>

Custom	Allows you to manually reduce or enlarge an image. Click the arrows next to the Scale to box to select a percentage between 10% and 400%.
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Printing two or four pages on one sheet

Select N-up as the Multi-Page setting on the Layout menu to print two or four pages of your document on one sheet of paper.

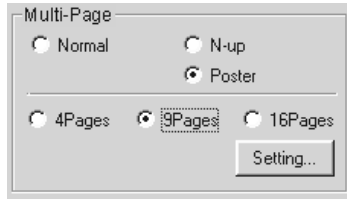


To print more than one page on the piece of paper, you should make the following settings:

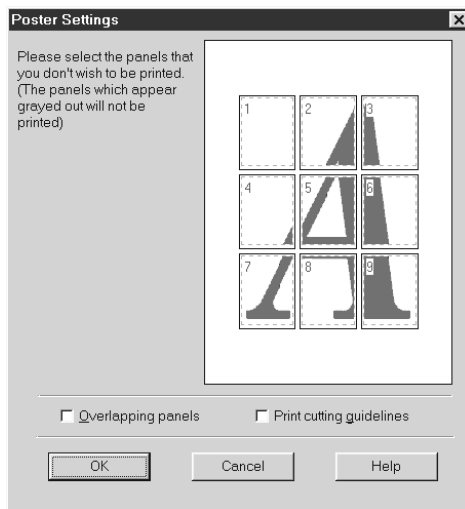
2 Pages 4 Pages	Prints two or four pages of your document on a single piece of paper.
Print page frames	Prints a frame around each page that is printed on the sheet of paper.
Page Order	Opens the Print Layout dialog box, where you can specify the order in which the pages will be printed on the sheet of paper. Some settings may be unavailable, depending upon your Orientation selection on the Paper menu.

Printing posters

A single document page can be enlarged to cover 4, 9, or 16 printed sheets of paper. Select Poster as the Multi-Page setting to print a poster-size image.



Click the Settings button to adjust the way your poster will print. The Poster Settings dialog box opens.

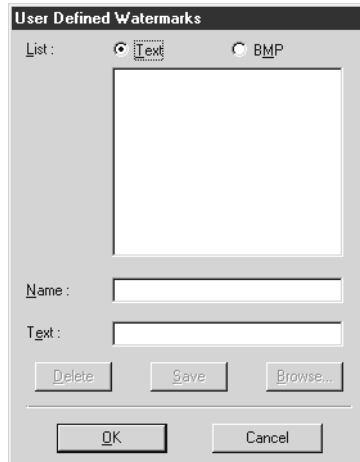


Printing a watermark on your document

To print a watermark on your document, click anywhere in the Watermark list box on the Layout menu, and select from the list of predefined watermarks.

You can also add your own text-based or image-based watermarks to the Watermark list.

To add a watermark, click the Add/Del button. The following dialog box appears.



Creating an image-based watermark:

1. Select BMP.
2. Click the Browse button to specify the bitmap file you want to use, then click OK.
3. Type a name for your watermark in the Name box, then click Save.
4. Click OK to return to the Layout menu.

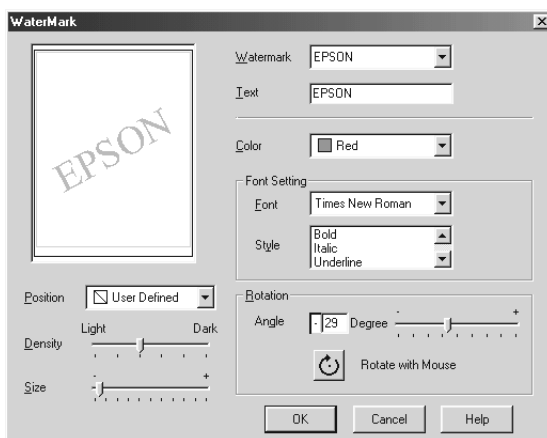
Creating a text-based watermark:

1. Select Text.
2. Type your text in the Text box. The text that you enter will also be assigned to the watermark as a watermark name.

3. If you want to change the watermark name, type a new name in the Name box, then click Save. Click OK to return to the Layout menu.

Making settings for your watermark:

1. Click the Settings button. The following dialog box appears.

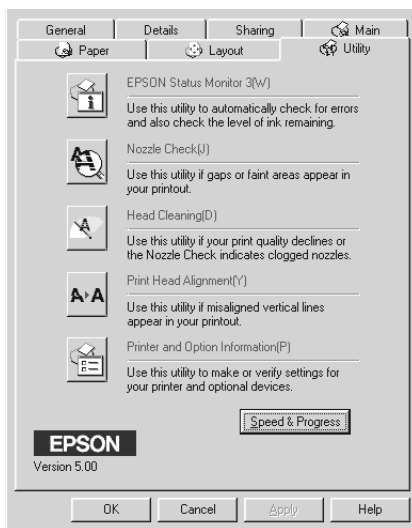


2. From the Watermark list box, select the watermark you want to make settings for, then make Color, Position, Density, Size, Font, Font Style and Angle settings. For details, please see the online help. Your settings are reflected in the display on the left side of the dialog box.
3. When you are finished making the settings, click OK.

Using the Printer Utilities

EPSON printer utilities allow you to check the Stylus Scan's current status and to perform maintenance functions from your computer screen.

To use the utilities, click the Utility tab in the printer software window, then click the button for the utility you wish to use. For information on how to access the printer software, see “Accessing the printer software” on page 4-2.



Note:

- ❑ *The letter in parentheses after the utility name indicates the shortcut key for that utility. Press Alt and the letter on the keyboard to open that utility.*
- ❑ *Do not use the Nozzle Check, Head Cleaning, or Print Head Alignment utility if your EPSON Stylus Scan is connected to your computer through a network.*
- ❑ *Do not use the Nozzle Check, Head Cleaning, and Print Head Alignment utilities while printing is in progress; otherwise, your printout may be marred.*

Status Monitor 3

Status Monitor 3 provides you with printer status information, such as the amount of ink remaining, and checks for printer errors.

This utility is only available when both of the following conditions are met:

- The EPSON Stylus Scan is connected directly to the host computer via the parallel port or USB port.
- Your system is configured to support bidirectional communication.

Nozzle Check

The Nozzle Check utility checks the print head nozzles for clogging. Check the nozzles if you notice print quality has declined and after cleaning to confirm that the print head nozzles have been cleared. If the nozzle check indicates the print head needs cleaning, you can access the Head Cleaning utility directly from the Nozzle Check utility. See “Checking the Print Head Nozzles” on page 11-2.

Head Cleaning

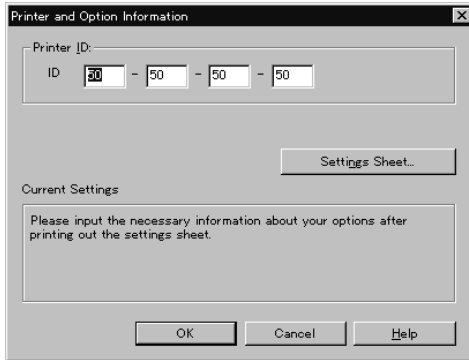
The Head Cleaning utility cleans the print head. You may need to clean the print head when you notice print quality has declined. Use the Nozzle Check utility first to confirm that the print head needs to be cleaned. You can access the Nozzle Check utility directly from the Head Cleaning utility. See “Cleaning the Print Head” on page 11-5.

Print Head Alignment

The Print Head Alignment utility aligns the print head. Use this utility if you notice a misalignment of vertical lines. Follow the on-screen instructions to use this utility.

Printer and Option Information

This utility allows the printer driver to confirm the EPSON Stylus Scan's printer configuration. It also provides information on certain Stylus Scan characteristics, such as its Printer ID.



Depending on the configuration of your system, the information displayed in the Printer and Option Information dialog box may be updated automatically, or may need to be entered manually.

If a message appears under Current Settings prompting you to input options information, or if you change the EPSON Stylus Scan configuration, follow the steps below to make the necessary settings.

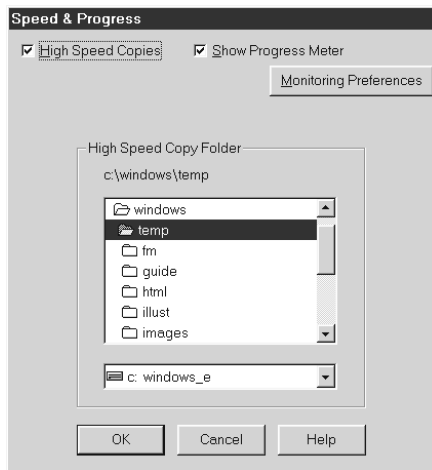
1. Click the Settings Sheet button in the Printer and Option Information dialog box to print the necessary information for the EPSON Stylus Scan and its options. This requires that A4 or Letter size paper is loaded in the paper feeder. The printout will be similar to the one below.

```
Printer ID
50- 50- 50- 50
```

2. Make sure the settings in the Printer and Option Information dialog box match the information on the Settings Sheet printout. If they do not match, adjust the settings on the screen appropriately.
3. Click OK to save your settings.

Speed & Progress

You can make settings related to print speed and progress in this dialog box.



The available settings are as follows.

High Speed Copies

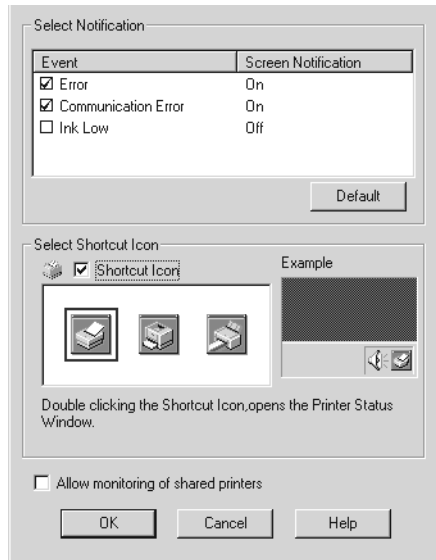
To print multiple copies of your document faster, select High Speed Copies.

Show Progress Meter

To monitor the progress of your print job, select Show Progress Meter.

Monitoring Preferences

Click this button to open the Monitoring Preferences dialog box where you can make settings for EPSON Status Monitor 3.



You can make the following settings:

Select Notification	Displays the current error item notification settings. In this area, you can designate whether to have general error messages, communication error messages, or ink status messages displayed during printing, scanning, or copying. Select the appropriate check box to specify the error types for which you wish to receive notification.
Shortcut Icon	Select the Shortcut Icon check box to have a shortcut icon placed in your Windows taskbar. Clicking the shortcut icon in the taskbar will open EPSON Status Monitor 3. To select which icon will be displayed, click the icon you prefer from the choices given; your selection will be shown at the right.
Allow monitoring of shared printer	Select this check box to allow monitoring of a shared Stylus Scan by other computers.

Note:

Click the *Default* button to revert all *Select Notification* settings to their defaults.

Getting Information Through Online Help

The EPSON Stylus Scan offers extensive online help. You can access help either from the application you are working in, or directly from the operating system.

Accessing help from your application

Each printer driver menu includes a **Help** button that provides information related to the settings on that menu. Simply go the appropriate menu (Main, Paper, Layout, or Utility), then click **Help**.

To get help about a single item on any of the printer driver menus, right-click the item, then click **What's This?**

Accessing help from the Start menu

Click the **Start** button, point to **Programs and Epson Stylus Scan**, and then click **EPSON Stylus Scan 2000 Printer Help**. The **Help Contents** window opens.

Increasing the Print Speed

Follow the instructions in this section to increase the printing speed of your Stylus Scan.

General tips

Just as printing at a high resolution requires more processing time, printing in color takes longer than printing in black because the volume of data in a color document is much greater. For this reason, it is important to be selective in your use of color if you also require a fast print speed.

However, even if your document requires the highest resolution and extensive use of color, for example when you are printing a camera-ready composite that includes color photographs, it may still be possible to optimize the print speed by adjusting other printing conditions. Keep in mind that changing some conditions to increase the print speed may also lower print quality. See the tables in this section when making adjustments.

The following table shows the factors that inversely affect print speed and print quality (increasing one decreases the other).

	Lower Print Quality Faster Print Speed	Higher Print Quality Slower Print Speed
Printer driver settings		
Print Quality	Economy, Normal	Photo
High Speed	On	Off
Halftoning	No Halftoning	Error Diffusion
Finest Detail	Off	On
Data characteristics		
Image size	Small	Large
Image resolution	Low	High

The table below shows the factors related to print speed only.

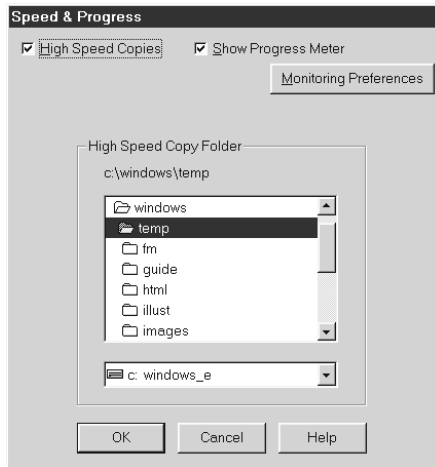
	Faster Print Speed	Slower Print Speed
Printer driver settings		
Ink	Black	Color
Collate*	Off	On
Reverse Order*	Off	On
Flip Horizontal*	Off	On
Data characteristics		
Variety of colors	Grayscale**	Full color
Hardware resources		
System speed	Fast	Slow
HDD free space	Large	Small
Memory free space	Large	Small
Software status		
Running applications	One	Many
Virtual memory	Not in use	In use

* Varies depending on the printer driver and application software you are using.

** Grayscale means using black ink only to print varying shades of gray, from pure black to pure white.

Using the High Speed Copies feature

To make this setting, click the Speed & Progress button on your printer driver's Utility menu. The following dialog box appears.



Select the High Speed Copies to turn on high-speed printing for multiple copies. This speeds up printing by using your hard disk space as a cache when printing multiple copies of your document.

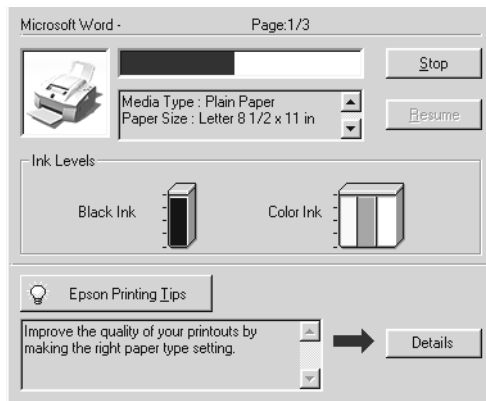
Chapter 5

Checking Printer Status and Managing Print Jobs for Windows

Using the Progress Meter	5-2
Using the EPSON Spool Manager	5-3
Using EPSON Status Monitor 3	5-4
Accessing EPSON Status Monitor 3	5-4
Viewing information in EPSON Status Monitor 3	5-5

Using the Progress Meter

When you send a print job to the Stylus Scan, the Progress Meter opens, as shown in the illustration below.



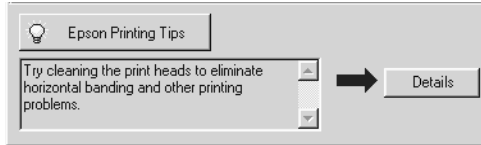
The Progress Meter indicates the progress of the current print job and provides status information when bidirectional communication between the Stylus Scan and computer is established. This meter also displays helpful tips for better printing, as explained below.

Note:

The Progress Meter will not appear when the Show Progress Meter check box is cleared in the Speed & Progress dialog box. See "Speed & Progress" on page 4-24 for more information.

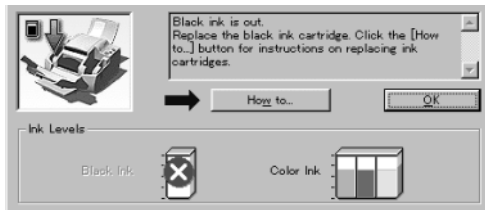
EPSON Printing Tips

Tips for getting the most out of your EPSON printer driver appear in the text box at the bottom of the Progress Meter window. A new tip appears every 30 seconds. For more details on a displayed tip, click the Details button.



Error messages

If a problem occurs while printing, an error message appears in the text box at the top of the Progress Meter window. When the ink runs low or out, a How to button appears below the text box. Click How To and EPSON Status Monitor will lead you step-by-step through the cartridge replacement procedure.



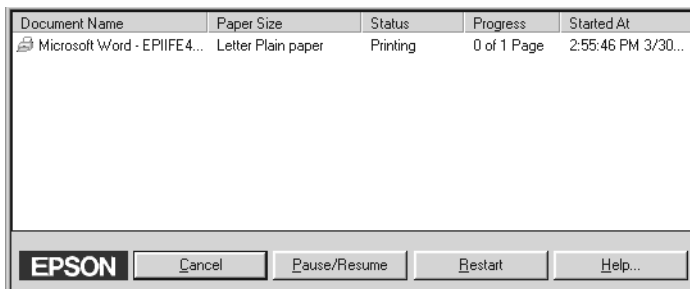
Using the EPSON Spool Manager

EPSON Spool Manager is similar to Windows Print Manager. If it receives two or more print jobs at one time, it holds them in the order that they were received (with printers on a network this may be called a print queue). When a print job reaches the top of the line, the EPSON Spool Manager sends the job to the Stylus Scan.

Note:

EPSON Spool Manager is not available for Windows NT.

After you send a print job, the EPSON Stylus Scan 2000 button appears on the taskbar. Click this button to open the EPSON Spool Manager. From the Spool Manager, you can view print status information about the print jobs which have been sent to the Stylus Scan. You can also cancel, pause and resume, or restart selected print jobs.



Using EPSON Status Monitor 3

EPSON Status Monitor 3 displays detailed information on the status of your Stylus Scan.

Note:

Before using EPSON Status Monitor 3, be sure to read its README file. To open this file, click Start, point to Programs and EPSON Stylus Scan, then click EPSON Stylus Scan 2000 Readme.

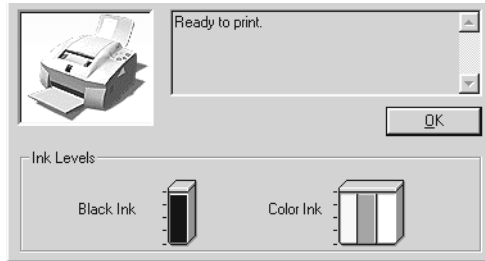
Accessing EPSON Status Monitor 3

There are two ways to access EPSON Status Monitor 3.

- ❑ Double-click the printer-shaped shortcut icon on the Windows taskbar. To add a shortcut icon to the taskbar, see “Monitoring Preferences” on page 4-25.

- ❑ Open the printer driver, click the Utility tab, then click EPSON Status Monitor 3.

When you access EPSON Status Monitor 3, the following window appears.



Viewing information in EPSON Status Monitor 3

EPSON Status Monitor 3 provides the following information:

- ❑ **Current Status:**
EPSON Status Monitor 3 provides you with detailed printer status information, a graphic display, and status messages. If the ink runs low or out, the **How to** button appears in the EPSON Status Monitor 3 window. Clicking **How to** displays cartridge replacement instructions and moves the print head to the cartridge replacement position.
- ❑ **Ink Levels:**
EPSON Status Monitor 3 provides a graphic display of the amount of ink remaining.

Chapter 6

Using the Printer Software for Macintosh

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Printer Software Introduction

The printer software which comes with your Stylus Scan includes a printer driver and printer utilities. The printer driver lets you choose from a wide variety of settings to get the best results from your Stylus Scan. The printer utilities help you check the printing functions of your Stylus Scan, and keep them in top condition.




For information on using the printer driver, see “Making Changes to Printer Driver Settings” on page 6-2.

For information on using the printer utilities, see “Using the Printer Software for Macintosh” on page 6-1.

You can get more information about the printer software by clicking the help icon button in any of the printer driver dialog boxes.

Making Changes to Printer Driver Settings

You will find the printer driver settings in the following dialog boxes.

- Print dialog box (click Print on the File menu of your application or click Options in the Page Setup dialog box)
- Page Setup dialog box (click Page Setup on the File menu of your application)
- Layout dialog box (click the  Layout icon button in the Print dialog box)
- Background Printing dialog box (click the  Background Printing icon button located in the Print dialog box)
- Preview dialog box (click the  Preview icon button and then click Preview in the Print dialog box)

Note:

Driver settings are not saved from one application to the next. Whenever you exit one application and open a new one, check that the printer settings are still appropriate. For example, if you specify a Media Type in one application, when you exit that application and open a new one you will have to specify that Media Type again. Settings made in the Page Setup dialog box are saved with each document and are restored when that document is reopened in the same application.

The Mode settings in the Print dialog box are arranged to give you four levels of control over the printer driver, as explained below.

Automatic	This mode provides the quickest and easiest way to start printing. See "Using the Automatic mode" on page 6-6.
PhotoEnhance	This mode lets you choose from a variety of image-correction settings specially designed for photos. See "Using the Photo Enhance mode" on page 6-7.
Custom	This mode lets you choose from a list of ready-made or personalized settings suited to the kind of document you want to print. When Custom is selected, the Advanced button is enabled, allowing you to access the Advanced dialog box. See "Using the Custom settings" on page 6-8.
Advanced	This button opens the Advanced dialog box, where you can make detailed settings to fit your individual needs. From the Advanced dialog box, you can add your personalized settings to the Custom Settings list. See "Using the Advanced settings" on page 6-9.

In addition to making comprehensive Mode settings that affect overall print quality, you can also modify individual aspects of your printout using the settings contained in the Page Setup and the Layout dialog boxes. For information on page setup options, see "Changing the page setup" on page 6-11. For information on page layout options, see "Modifying the Page Layout" on page 6-14.

Making the Media Type setting

The Media Type setting determines what other settings are available, so you should always make this setting first.

In the Print dialog box, select the Media Type setting that matches the paper you loaded in the Stylus Scan. To find out what media type you are using, find your media in the list below, and refer to the corresponding media type under which it is grouped (shown inbold). For some media, there are several Media Type settings to choose from.

Plain Paper

Plain paper

Envelopes

EPSON Premium Ink Jet Plain Paper (A4) S041214

360 dpi Ink Jet Paper

EPSON 360 dpi Ink Jet Paper (A4) S041059

EPSON Iron-On Cool Peel Transfer Paper (A4) S041154

Photo Quality Ink Jet Paper

EPSON Photo Quality Ink Jet Paper (A4) S041061

EPSON Photo Quality Ink Jet Cards (A6) S041054

EPSON Photo Quality Ink Jet Cards (5 × 8") S041121

EPSON Photo Quality Ink Jet Cards (8 × 10") S041122

EPSON Photo Quality Self Adhesive Sheets (A4) S041106

EPSON Ink Jet Note Cards A6 (with envelopes) S041147

EPSON Ink Jet Greeting Cards 5 × 8" (with envelopes) S041148

EPSON Ink Jet Greeting Cards 8 × 10" (with envelopes) S041149

Photo Paper

EPSON Photo Paper (A4) S041140

EPSON Photo Paper (4 × 6") S041134

EPSON Panoramic Photo Paper (210 × 594 mm) S041145

EPSON Photo Paper Cards (A4) S041177

Photo Quality Glossy Film

EPSON Photo Quality Glossy Film (A4)	S041071
EPSON Photo Quality Glossy Film (A6)	S041107
EPSON Photo Stickers 16 (A6)	S041144
EPSON Photo Stickers 4 (A6)	S041176

Ink Jet Transparencies

EPSON Ink Jet Transparencies (A4)	S041063
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Matte Paper-Heavyweight

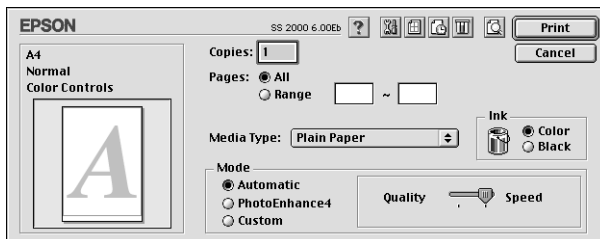
EPSON Matte Paper-Heavyweight (A4)	S041259
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Note:

The availability of special media varies by location.

Using the Automatic mode

When Automatic is selected as the Mode setting in the Print dialog box, the printer driver takes care of all detailed settings based on the current Media Type and Ink settings. To make the Ink setting, click **COLOR** to print in color, or **BLACK** to print in black-and-white or grayscale. To make the Media Type setting, see “Making the Media Type setting” on page 6-4.



Note:

Depending on the media you choose in the Media Type list (while Automatic is selected), a slider appears to the right of the Mode options that lets you choose Quality or Speed. Select Quality when print quality is more important than speed.

Using the Photo Enhance mode

The Photo Enhance mode provides a variety of image-correction settings that you can apply to your photo images before printing. PhotoEnhance does not affect your original data.

Note:

- This setting is only available when you are printing in color.
- Printing with PhotoEnhance selected may increase the time required for printing, depending on your computer system and the amount of data contained in your image.

You can select from the following settings.

Standard	This setting provides standard image correction for most photos. Try this first.
People	This setting is best for photos of people.
Nature	This setting is best for outdoor scenery such as mountains, sky, and oceans.
Soft Focus	This setting makes your photos look as if they were taken with a soft-focus lens.
Sepia	This setting applies a sepia tone to your photos.

If you are printing photos taken with a digital camera, you can also select the Digital Camera Correction check box to give your printed images the smooth, natural appearance of photographs taken with a film camera.

Using the Custom settings

The Custom mode offers ready-made settings designed for printing data such as text, graphs, charts, and digital camera images, and for applying a color-matching method. You can also create and save your own custom settings. See “Using the Advanced settings” on page 6-9.

You can select from the following ready-made settings.

Text/Graph	This setting is good for printing presentation documents such as graphs and charts.
Economy	This setting is best for printing drafts of text
ColorSync	This setting automatically adjusts printout colors to match colors on your screen.

Follow these steps to select a custom setting.

1. Verify the Media Type and Ink settings in the Print dialog box. For details, see “Making the Media Type setting” on page 6-4.
2. Select the Custom radio button in the Print dialog box. This enables the Custom Settings list, located to the right of the Custom radio button.
3. From the Custom Settings list, select the most appropriate setting for the type of document or image you will print.
4. When you choose a Custom setting, other settings such as Print Quality, Halftoning, and Color are made automatically. Changes to these settings are reflected in the display on the left side of the Print dialog box.

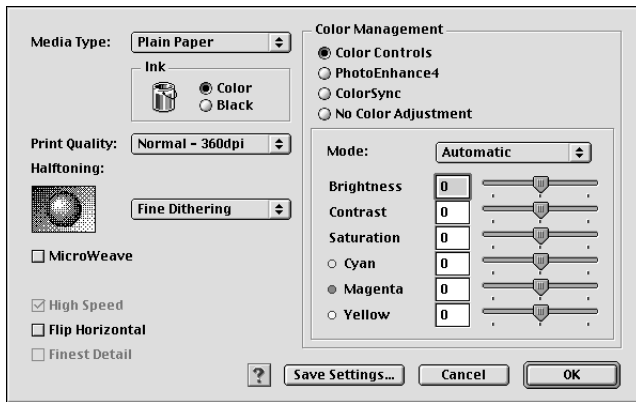
Using the Advanced settings

The settings in the Advanced dialog box give you complete control over your printing environment. Use these settings to experiment with new printing ideas, or to fine-tune a range of print settings to meet your individual needs. Once you are satisfied with your new settings, you can give them a name and add them to the Custom Settings list.

Making the Advanced settings

Follow the steps below to make the settings in the Advanced dialog box.

1. Click the Custom button in the Print dialog box, then click the Advanced button. The Advanced dialog box appears.



2. Select the Media Type that you loaded in the EPSON Stylus Scan. For details, see “Making the Media Type setting” on page 6-4.
3. Choose Color or Black as the Ink setting.
4. Select the Print Quality setting.
5. Make other settings as necessary. For details, see online help.

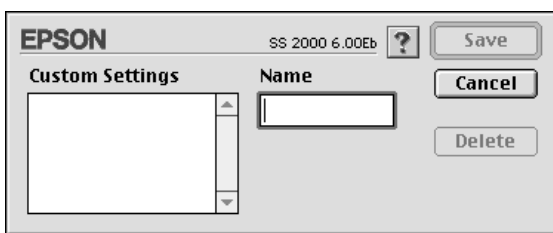
Note:

Some settings may be unavailable depending on the Print Quality, Media Type, and Ink settings you make.

6. Click OK to apply your settings and return to the Print dialog box. Click Cancel to return to the Print dialog box without applying your settings. To save your Advanced settings, see the next section.

Saving and deleting your settings

To save your Advanced settings, click Save Settings in the Advanced dialog box. The Custom Settings dialog box appears.



Type a unique name (up to 16 characters) for your settings in the Name box, then click **SAVE**. Your Advanced settings will be added to the Custom Settings list. You can save up to 10 different custom settings.

Note:

- ❑ *You cannot apply the names of settings provided by EPSON to your custom settings.*
- ❑ *You cannot delete the ready-made settings from the Custom Settings list.*

To delete a setting, select the setting in the Custom Settings dialog box and click **Delete**.

Using your saved settings

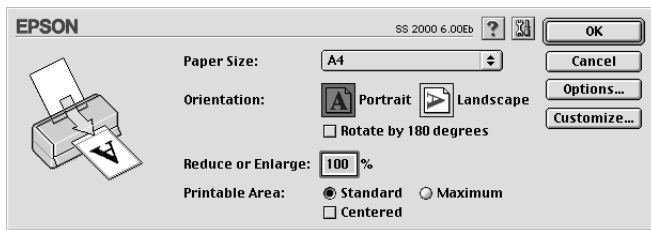
To select your settings, click the Custom button in the Print dialog box, then select your setting in the Custom Settings list, located to the right of the Custom button.

If you change the Media Type or Ink settings when one of your customized settings is selected in the Custom Settings list, the selection shown in the list returns to Custom Settings. The customized setting that was previously selected is not affected by the change. To return to your customized setting, simply reselect it in the list.

Changing the page setup

In the Page Setup dialog box, you can change the paper size, specify the paper orientation, reduce or enlarge your printout, and adjust the printable area.

Choose Page Setup on the File menu of your application. The Page Setup dialog box appears.



You can make the following settings in the Page Setup dialog box.

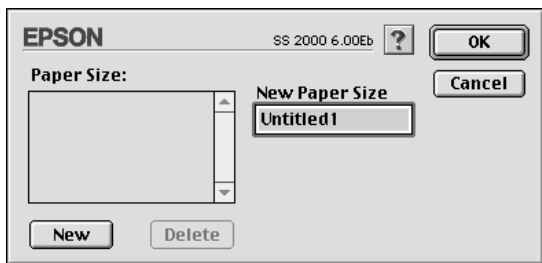
Paper Size	Select the paper size you want to use. If you want to define a custom paper size, see "Defining a custom paper size" on page 6-12.
Orientation	Select Portrait (tall) or Landscape (wide) to change the orientation of your printout. If you need to print close to the bottom of the page, select the Rotate by 180 degrees check box.

Reduce or Enlarge	Specify a ratio from 25% to 400% in order to reduce or enlarge the size of your image.
Printable Area	<p>Select the Maximum radio button to increase the printable area.</p> <p>Note: When Maximum is selected, the print quality may decline at the edges of the printout. Before printing large jobs using this setting, print a single sheet to confirm quality. Also, make sure the paper loaded in the paper feeder is not curled.</p> <p>Select the Centered check box to position your printout at equal distances from the edges of the paper.</p>

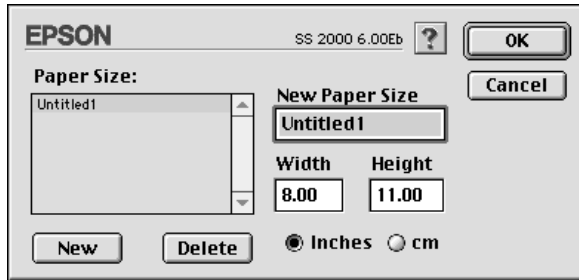
Defining a custom paper size

If the appropriate paper size is not included in the Paper Size list in the Page Setup dialog box, follow the steps below to define a custom paper size.

1. In the Page Setup dialog box, click Customize. The following dialog box appears.



2. To define a new paper size, click **New**. The dialog box updates to allow you to enter a name for the new size.




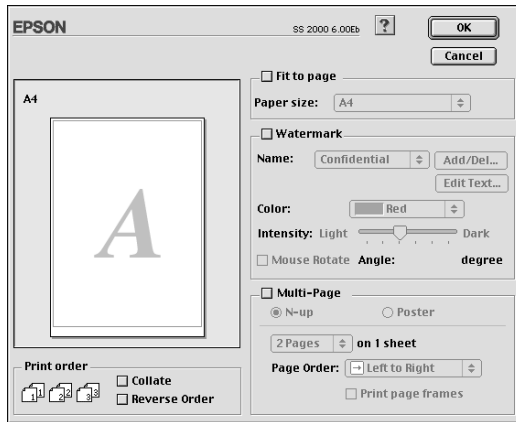
3. Type a unique name for the paper size in the New Paper Size box.
4. Specify the measurement unit as either Inches or cm.
5. Enter the width and the height of your paper.
6. Click **OK** to return to the Page Setup dialog box.

You can define up to 30 paper sizes. The paper size names you create will appear in the Paper Size list in the Page Setup dialog box.

To delete a custom paper size, click **Customize** in the Page Setup dialog box to open the Custom Paper dialog box, select the custom size you wish to delete from the list, and click **Delete**.

Modifying the Page Layout

You can modify the page layout of your document using the printer driver settings located in the Layout dialog box, shown below. To open this dialog box, click Print on the File menu of your application and click the  Layout icon button in the Print dialog box. The Layout dialog box appears.



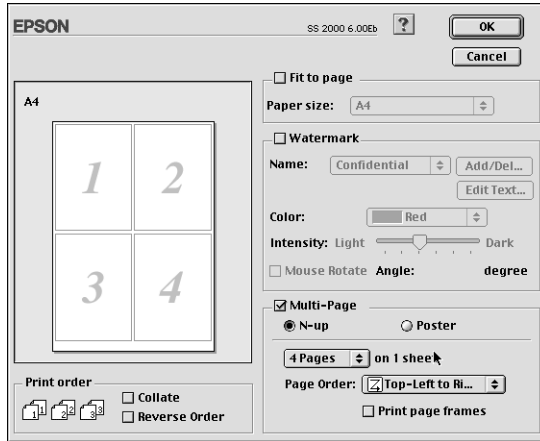
The Layout dialog box allows you to automatically match the document size to the paper size, place watermarks on documents, print two or four pages on a single sheet of paper, print poster-size images by enlarging one page to cover several sheets, or set the order in which you would like the pages of your document to print.

Fitting your document to the paper size

You can proportionally enlarge or reduce the size of the image to make it fit the paper size you select in the Paper Size list. To do this, select the Fit to Page check box, then specify the paper size you loaded in the Stylus Scan in the Paper Size list.

Printing two or four pages on one sheet

To print two or four pages of your document on one sheet of paper, select the Multi-Page check box in the Page Layout dialog box, then click N-up.

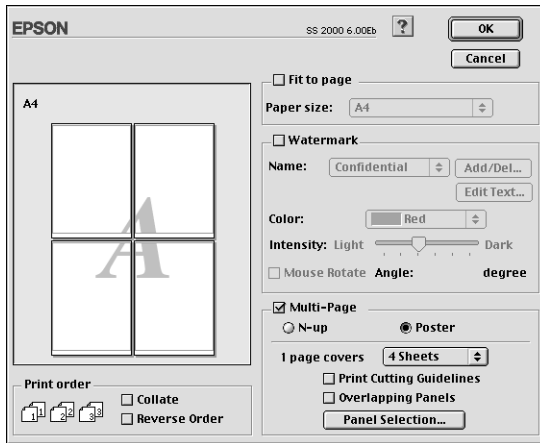


You can make the following settings.

2 Pages 4 Pages	Prints two or four pages of your document on a single piece of paper.
Page Order	Allows you to specify the order in which the pages will be printed on the sheet of paper.
Print page frames	Prints a frame around each page on the sheet of paper.

Printing posters

A single document page can be enlarged to cover 4, 9, or 16 printed sheets of paper. To print a poster-size image, select the Multi-Page check box in the Page Layout dialog box, then click Poster.



You can make the following settings.

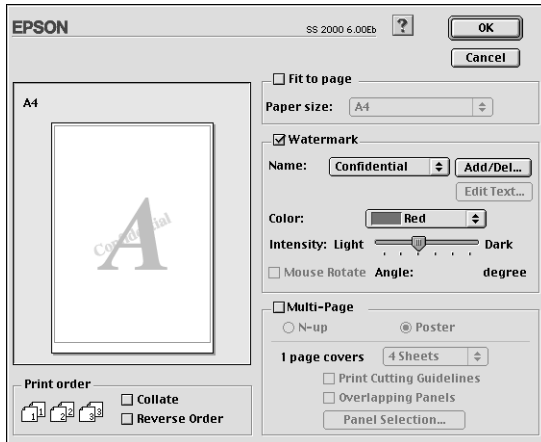
1 Page covers xx sheets	Specifies how many printed pages the enlarged document page is to cover. You can select 4, 9, or 16 pages.
Overlapping Panels	Slightly overlaps the images so that they can be aligned more precisely.
Print Cutting Guidelines	Prints border lines on the images to guide you when trimming the pages.

If you only want to print a few of the panels without printing the entire poster, click Panel Selection, then click the panels you don't wish to print, and then click OK. Only the panels that you did not click will be printed.

Printing a watermark on your document

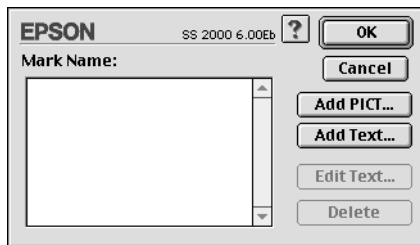
To print a watermark in the background of your printed documents or images, select the Watermark check box in the Page Layout dialog box.

Select the watermark you want to print from the Name list, then specify its position, size, color, and intensity. You can change the position and size of the watermark by dragging it with your mouse in the preview window on the left.



You can also add your own text-based or image-based watermarks to the Watermark Name list. Follow these steps.

1. Click the Add/Del button beside the Name list. The following dialog box appears.

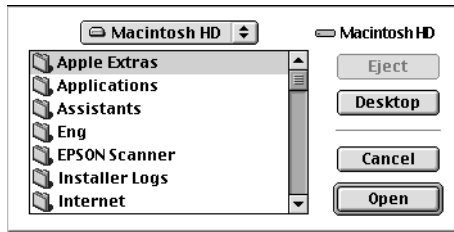


2. To use an image file as a watermark, click the Add PICT button.

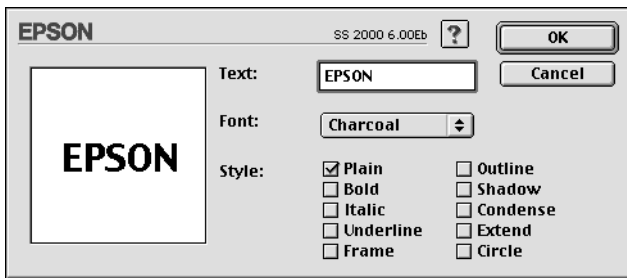
Note:

The Custom Watermark dialog box allows you to save PICT files as watermarks. If you have QuickTime 2.1 or higher installed, images in other formats can be used as watermarks because QuickTime automatically converts them to PICT files. A message is displayed if QuickTime encounters a graphics file that cannot be converted.

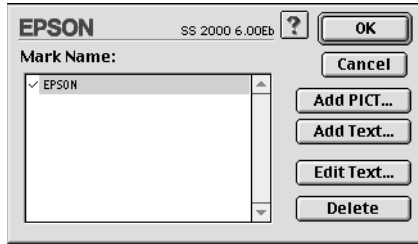
Select the desired image file, then click Open.



To create a text-based watermark, click the Add Text button. Type the text in the Text box, select a font and a text style, then click OK.



- The image file name or the watermark text appears in the Mark Name list in the Watermark dialog box. To change the name of an image watermark, click it in the list, then type a new name. When a text watermark is selected in the Name list, you can edit the text, and change the font and text style, by clicking the Edit Text button.

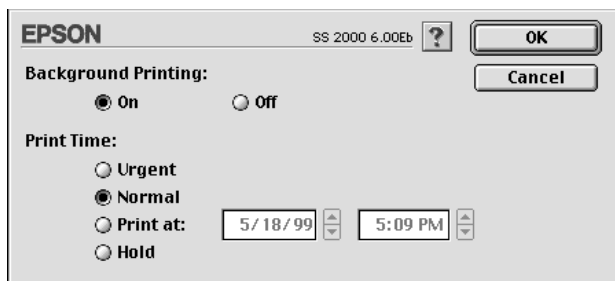


- Click OK to add your watermark to the Name list in the Page Layout dialog box.

Setting the Print Time

You can specify the time that you want the Stylus Scan to begin printing your document. Follow these steps.

- Click the  Background Printing icon button in the Print dialog box. The Background Printing dialog box appears.



2. Select On as the Background Printing option, if necessary.
3. Select Urgent, Normal, Print at, or Hold as the Print Time setting.

If you select Print at, use the arrows beside the date and time boxes to specify the date and time you want to print the document.

Note:

Make sure the computer and Stylus Scan will be turned on at the date and time you specify.


4. Click OK. The Background Printing dialog box closes.
5. In the Print dialog box, make sure your print settings are as you want them, then click Print.

Note:





You can check or change the priority of print jobs using the EPSON Monitor3 utility. See "Using EPSON Monitor3" on page 7-5 for details.

Previewing your Printout

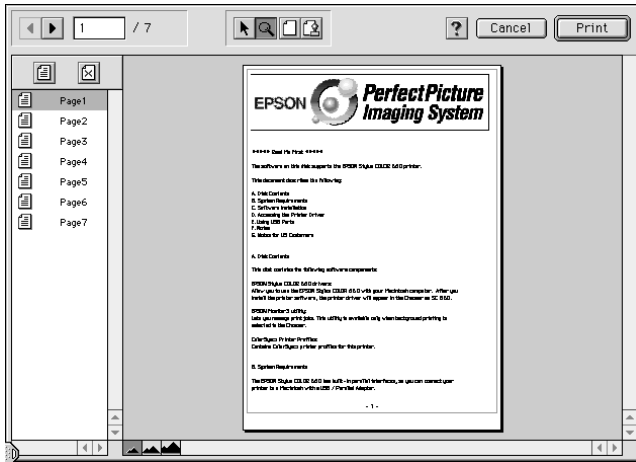
The Preview feature allows you to see how your document will look before actually printing it. Follow these steps to preview your document.

1. Make your printer driver settings.
2. Click the  Preview icon button in the Print dialog box. The Print button changes into a Preview button.

Note:

Use the  Preview icon button to switch between the  Print,  Preview, and  Save File modes. Click the icon to select the mode you want. For information on the Save File mode, see "Saving Print Data in Files" on page 6-22.

- Click the Preview button. The Preview dialog box appears and displays a preview of your document.




The Preview dialog box contains six icon buttons you can use to perform the following functions.


	Selection	This feature lets you select, move, and resize watermarks.
	Zoom	This feature enlarges the or reduces the size of the previewed page.
	Margin Display/ Non-Display	This feature displays or hides borderlines which indicate the printable area.
	Watermark Editing	This button opens the Watermark Edit box. This dialog box allows you to add watermarks to the document, and to change any of the current watermark settings.
	Add Page	These buttons let you select or deselect the pages you want to print from the list on the left side of the preview window.
	Remove Page	

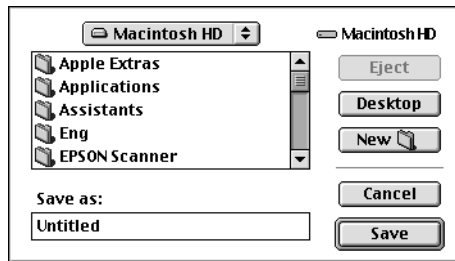
4. If you are satisfied with the previewed image, click Print.

If you are not satisfied with the appearance of the image, click Cancel. The Preview and Print dialog boxes close and the current print settings are saved. Open the Print dialog box again to make additional changes to the print settings.


Saving Print Data in Files

You can save a file's print settings by using the  Save File icon button in the Print dialog box. This feature lets you print the document using the saved print settings at a later time simply by double-clicking the saved file. Follow the steps below to save the print settings.


1. Make your printer driver settings.
2. Click the  Preview icon button in the Print dialog box repeatedly until the Print button changes into the Save File button.
3. Click Save File. The following dialog box appears.

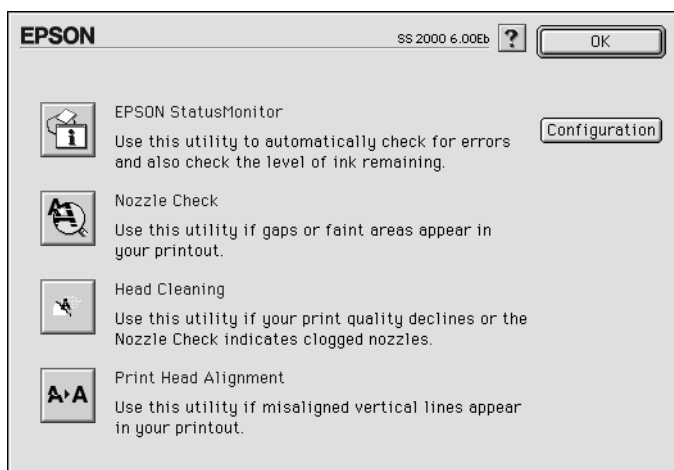


4. Select the location where you want to save the file, then type a file name in the Save As box and click Save.

When you want to print the document, double-click the file to open EPSON Monitor3. Click the  Resume button to send the data to the Stylus Scan.

Using the Printer Utilities for Macintosh

EPSON printer utilities allow you to check the Stylus Scan's current status and do some maintenance functions from your computer screen. To access the utilities, click the  Utility icon button in the Print or Page Setup dialog box, then click the button for the utility you want to use.



Note:

Do not use the Nozzle Check, Head Cleaning, or Print Head Alignment utilities while printing is in progress; otherwise, your printout may be marred.

EPSON StatusMonitor

The StatusMonitor utility monitors the status of the Stylus Scan's printing functions at regular intervals. If it detects a printer error, it will inform you with an error message.

You can also use this utility to check how much ink is remaining before printing.

To use the StatusMonitor, click the EPSON StatusMonitor button in the Utility dialog box. For details, see "Using the EPSON StatusMonitor" on page 7-2.

Nozzle Check

The Nozzle Check utility checks the print head nozzles for clogging. Check the nozzles if you notice print quality has declined and also after cleaning to confirm that the print head nozzles have been cleaned. If the nozzle check indicates the print head needs cleaning, you can access the Head Cleaning utility directly from the Nozzle Check utility. For details, see "Checking the Print Head Nozzles" on page 11-2.

Head Cleaning

This utility cleans the print head. You may need to clean the head when you notice print quality has declined. Use the Nozzle Check utility first to confirm that the print head needs to be cleaned. For details, see "Cleaning the Print Head" on page 11-5.

Print Head Alignment

This utility aligns the print head. Use this utility if you notice a misalignment of vertical or horizontal lines.

Configuration

Clicking this button opens the Configuration dialog box, where you can change the way the StatusMonitor utility notifies you when the Stylus Scan's status changes. For details, see "Making Configuration settings" on page 7-3.

Checking Printer Status and Managing the Print Jobs for Macintosh

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Using the EPSON StatusMonitor

EPSON StatusMonitor monitors the EPSON Stylus Scan's printing functions. If it detects a printer error, it informs you with an error message.

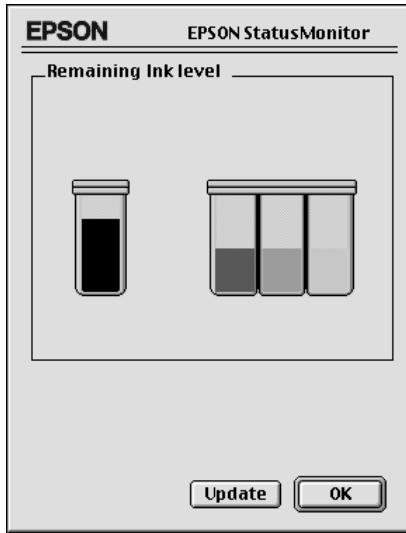
You can also use this utility to check ink levels before printing. When open, EPSON StatusMonitor displays the amount of ink remaining at the time it was opened. To update the ink level information, click the Update button.

Accessing EPSON StatusMonitor

To access the StatusMonitor, follow the steps below.


1. Click Print or Page Setup on the File menu of your application.
2. Click the  Utility icon button in the dialog box.

3. Click the EPSON StatusMonitor button in the Utility dialog box. The following dialog box appears.

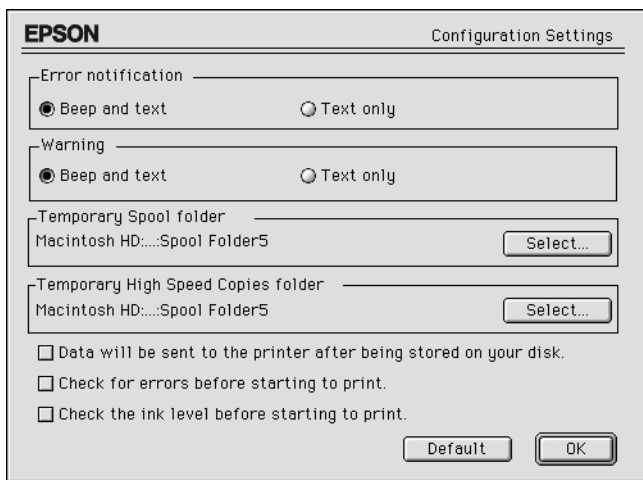


Making Configuration settings

If you want to change the way the StatusMonitor utility monitors the Stylus Scan's printing functions, follow the steps below.

1. Click Print or Page Setup on the File menu of your application.
2. Click the  Utility icon button in the dialog box.

- Click the Configuration button. The Configuration Settings dialog box appears.



This dialog box allow you to make the following settings.

Error notification	Choose how EPSON StatusMonitor notifies you in case of an error.
Warning	Choose how EPSON StatusMonitor notifies you if a warning message becomes necessary.
Temporary Spool folder	Choose the folder for temporary spooling of print data.
Temporary High Speed Copies folder	Choose the folders for multiple-copy print data storage.
Data will be sent to the printer after being stored on your disk	Select this check box to prevent banding in large images. When you select this check box, the computer saves the image data before sending it in one piece to the Stylus Scan.
Check for errors before starting to print.	Select this check box if you want to check for errors before starting to print.
Check the ink level before starting to print.	Select this check box if you want to check the ink levels before printing.

Using EPSON Monitor3

After you send a print job to the EPSON Stylus Scan, you can use the EPSON Monitor3 utility to check, cancel, or change the priority of the print jobs that are queued for printing. This utility also shows the status of the job currently being printed.

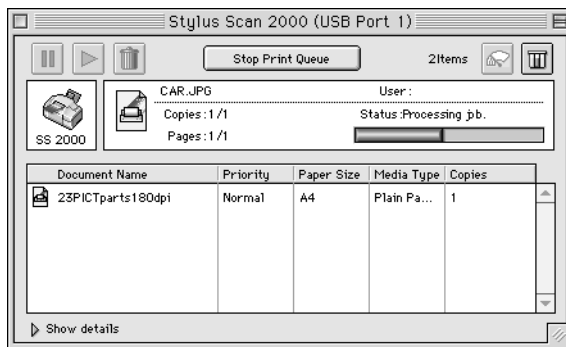
Note:

The installation of a new application may prevent you from using Background Printing, which must be turned on to use EPSON Monitor3. This is because some of the Extension files used by Background Printing have been overwritten by the application's installer. Re-install the Stylus Scan driver to correct this problem.

Accessing EPSON Monitor3

To use EPSON Monitor3, follow these steps.

1. First, turn on Background Printing in the Chooser or in the Background Printing dialog box.
2. Send a print job to the Stylus Scan.
3. Select EPSON Monitor3 from the Application menu at the right end of the menu bar. This opens a dialog box similar to the one below.



Note:

You can also open EPSON Monitor3 by double-clicking the EPSON Monitor3 icon in the Extensions folder.

Managing print jobs with EPSON Monitor3

With EPSON Monitor3, you can manage print jobs as follows:

- ❑ Use the buttons below to hold, resume, and delete print jobs for documents selected in the dialog box. First, select the appropriate print job, then click the applicable button.



Hold Stops printing and holds the current print job in the print queue



Resume Resumes printing



Delete Stops printing and deletes the current print job from the print queue

- ❑ Click Stop Print Queue to stop printing. Click Start Print Queue to resume printing.

- ❑ Use these buttons to start the printer utilities.



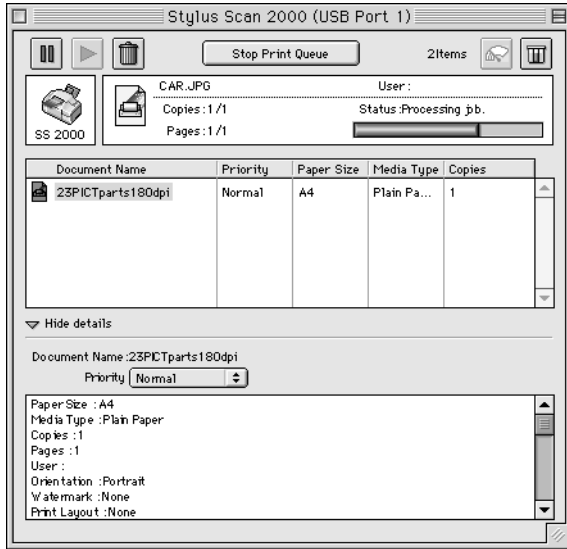
Print head cleaning Starts the Print Head Cleaning utility



Status Monitor Starts the EPSON StatusMonitor, which displays the amount of ink remaining

- ❑ Double-click a file in the list to preview it (this function is disabled when you are printing the ESC/P command file).
- ❑ Double-click Copies to change the number of copies to print out.

- ❑ Click the Show details arrow to open an extension at the bottom of the EPSON Monitor3 dialog box, similar to the one below. The extended dialog box displays detailed information on a selected document's printer driver settings.



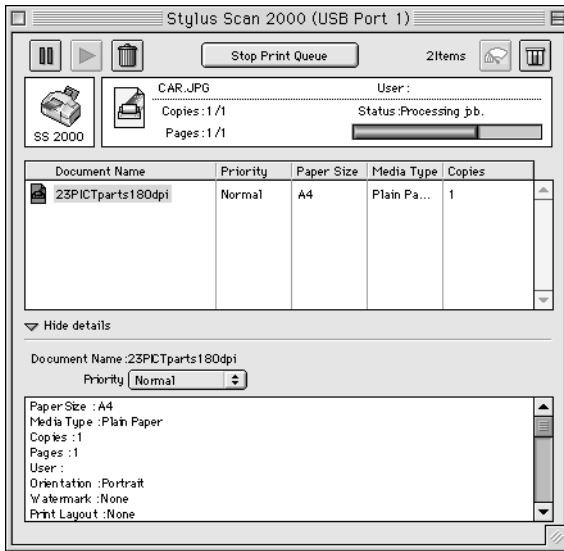
Changing the priority of print jobs

To change the priority of print jobs in a print queue, follow the steps below.

Note:

You can also change the priority of print jobs whose print times were previously set in the printer driver's Background Printing dialog box.

1. Click the Show details arrow at the bottom of the EPSON Monitor3 dialog box. The dialog box will expand as shown below.



2. Click the name of the document whose priority you wish to change in the Document Name column.
3. From the Priority list, select Urgent, Normal, Hold, or Print Time.

Note:

If you select Print Time, a dialog box appears where you can specify the date and time that the document will print. Make sure that your Stylus Scan and computer are turned on at the time you specify.

Chapter 8

Scanner

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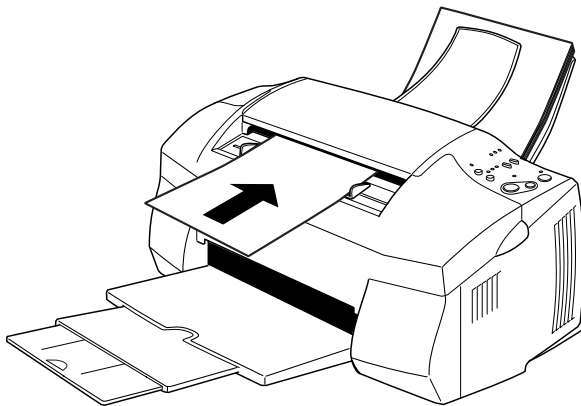
Loading the Document

Follow the directions in this section to load documents into the document feeder of your Stylus Scan. If you are scanning fragile or thin media, see “Loading thin or fragile media” on page 8-3.

Loading normal media

Follow the steps below to load a document into the document feeder.

1. Adjust the document edge guides so that distance between them is slightly wider than the width of the document.
2. Hold the document you want to scan face down, and place the top edge of the document between the document edge guides.



Note:

- ❑ *Be sure to place the top edge of the document into the document feeder first. If the document is too wide to fit into the feeder in this manner, try loading the document sideways. After scanning, you can rotate the image 90 degrees using the scanning software.*

- ❑ *If your document is fragile or very thin, place it in a protection sheet before loading. See “Loading thin or fragile media” on page 8-3 for details.*
3. Adjust the document edge guides so that they match the width of the document.
 4. Insert the top edge of the document into the document feeder until you feel a tug.
 5. The document feeder will draw the document into the Stylus Scan a short distance. Release the document.

You are now ready to scan the document using your scanning software. For details, see “Scanning Basics” on page 8-5.

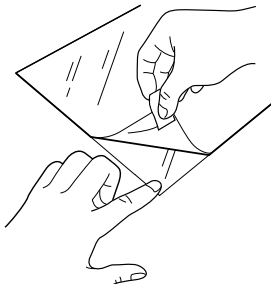
Loading thin or fragile media

Before you scan a photo or any other document that is very thin or fragile, insert it into the protection sheet packed with your Stylus Scan as described below. Then load the sheet into the document feeder.

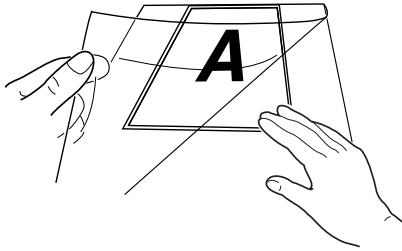
Note:

The protection sheet is reusable.

1. To use the protection sheet, peel back the top layer of film by pulling up the tab.



2. Place your document inside the film layers.



Note:

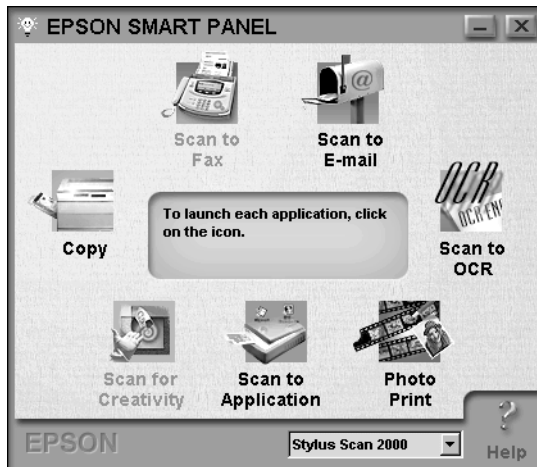
Align the top edge of the document with the closed top edge of the protection sheet to make sure that the document is straight.

3. Load the protection sheet, following the steps described in "Loading normal media" on page 8-2.

Scanning Basics

Using EPSON SMART PANEL

You can digitize your photos and documents quickly and easily using EPSON SMART PANEL. When you install the EPSON Stylus Scan drivers, EPSON SMART PANEL is installed as well. To run the program, first restart your computer. In Windows, click the SMART PANEL icon in your task bar. With Macintosh computers, select EPSON SMART PANEL from the Apple Menu. For details, see your SMART PANEL documentation.



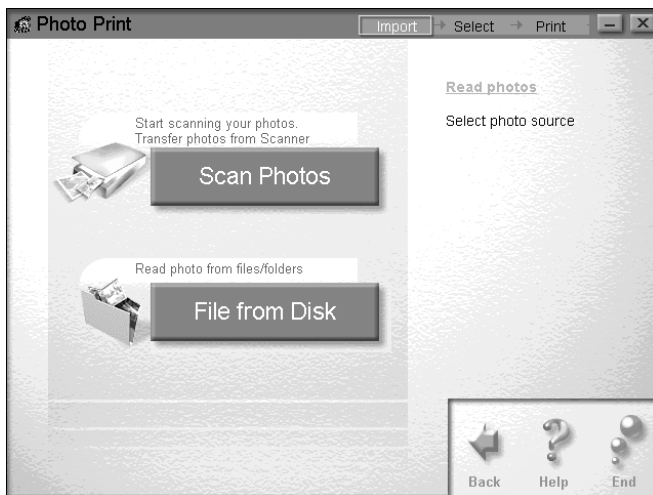
Note:
Picture shows the Windows version.

There are two modes available with EPSON SMART PANEL: Photo Scan Assistant and Document Scan Assistant. Photo Scan Assistant helps you to achieve the best results when acquiring colorful documents such as photos and magazines. This mode is used by various SMART PANEL applications including E-mail, Scan to Application, and Scan for Creativity. The other mode, Document Scan Assistant, helps you scan documents for processing by optical character recognition (OCR) software.

Each EPSON SMART PANEL application is briefly described in this section. For details, refer to your EPSON SMART PANEL documentation.

Photo Print (Windows) / PrintFun (Macintosh)

Photo! Print and PrintFun allow you to print images in various sizes, placing one or several on a page. You can create collages or print several versions of the same image quickly and easily using this utility.



FAX

Fax lets you send and receive faxes with your computer. This utility also helps you store and manage all your fax documents quickly and easily.



Note:

You must install WinFax (Windows) or FAXstf (Macintosh) to use this application.

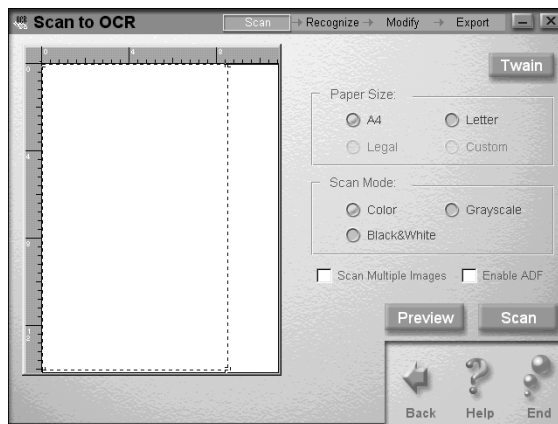
Copy

Copy turns your EPSON Stylus Scan into a digital copy machine. Its user interface looks like a real copy machine, yet its functions are more powerful and flexible than any copy machine available.



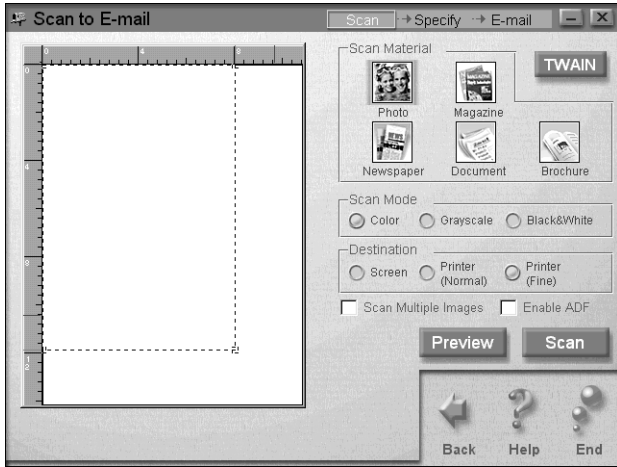
OCR

The OCR utility scans text and saves it as a text file, or sends it directly to an open word processor application.



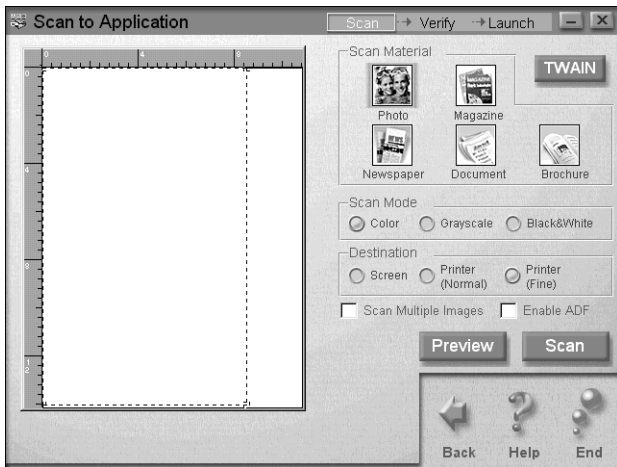
E-mail

E-mail will scan an image directly into an e-mail message.



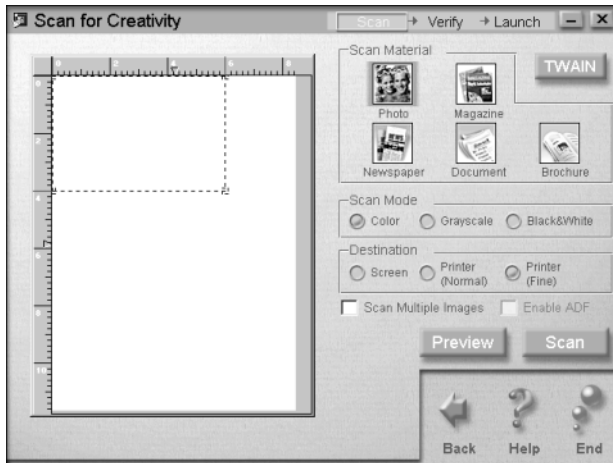
Scan to Application

Scan to Application will scan an image and send the image data to a specified application for further editing.



Scan for Creativity

Scan for Creativity scans the image and sends the image data to Photo Deluxe. This application is only available if Photo Deluxe is installed.



Scanning from software applications using EPSON TWAIN

You can scan images directly from any application that is compatible with TWAIN using EPSON Stylus Scan SF TWAIN. To determine whether an application is TWAIN-compatible, refer to that application's documentation.

Accessing EPSON TWAIN

The method used to access EPSON TWAIN varies depending on the application. The steps below show an example.

1. Open your application.
2. Click Select TWAIN_32 Source on the File menu, and then select EPSON Stylus Scan SF.

Note:

Normally, you only need to perform this step the first time you use the Stylus Scan with your application.

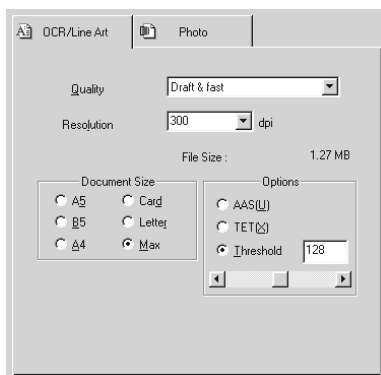
3. Click TWAIN_32 on the File menu to open EPSON Stylus Scan SF TWAIN.

Using EPSON TWAIN

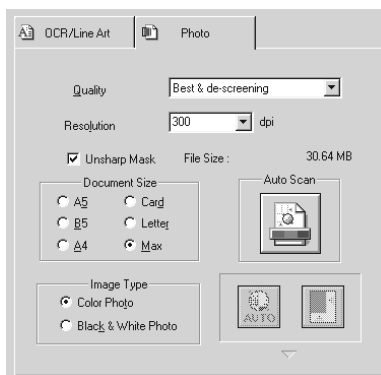
When using EPSON Stylus Scan SF TWAIN, you should access one of two menus, depending on the type of document being scanned.

OCR/Line Art: This is used when scanning documents for OCR, and line art.

Photo: This is used when scanning photographs.



OCR



Photo

Follow these steps to use your EPSON Stylus Scan SF TWAIN software.

1. Launch the EPSON Stylus Scan SF TWAIN software.
2. Click either the OCR/Line Art or Photo tab, depending on the type of document you wish to scan.

3. Specify your desired settings for Quality, Resolution and Document Size.
4. Make settings as necessary. For details, refer to the section below or your Online Help.
5. Click the Preview button to scan only a portion of the document. A document preview image is displayed, allowing you to specify the area of the document that you wish to scan.
6. When you are finished making settings, click the SCAN button to scan the image.

Making EPSON TWAIN settings

This section describes the various EPSON Stylus Scan SF TWAIN settings. Use the settings which are best for your particular document and application.

Quality

Best & de-screening

This setting eliminates moiré patterns and produces the highest quality scans.

Draft & Fast

This setting gives you a high-speed scan, but the scan quality decreases.

Resolution

This setting changes the scan resolution. Specify a resolution between 50 and 4800 dpi from the list box.

Document Size

This setting changes the size of the scanning area. Select the size of the document to be scanned. Only the area within the selected size will be scanned.

OCR/Line Art menu settings

AAS (Auto Area Segmentation)

This feature separates text from photographs on a page so that grayscale images are clearer and text recognition is more accurate.

The changes made by AAS are not shown by the preview image.

TET (Text Enhancement Technology)

This feature removes the background from the document and raises the recognition accuracy. It is suitable for OCR (Optical Character Recognition) scanning.

The changes made by TET are not shown by the preview image.

Threshold

This setting determines whether gray shades are scanned as black or white when scanning black-and-white images. Select a threshold value between 0 (lightest) and 255 (darkest).

Photo menu settings

Image Type

This setting controls whether the image is scanned in color or grayscale. Select either the Full Color or Grayscale radio button.

Auto Scan button

This button starts an automatic scan. Click to preview the full page, locate the image, set the exposure, and scan automatically.

Auto Exposure button

This button sets the exposure automatically for the image inside the marquee. Click to set the exposure for optimum enhancement.

Auto Locate button

This button automatically places the marquee around the image in the preview window. The white borders surrounding the image are identified and discarded. If a document contains more than one image, use your mouse to select the general area around the image you want, then click **Auto LOCate** to place the marquee more precisely.

Understanding the Configuration settings

From the EPSON TWAIN interface, you can click the Configuration button to open the Configuration dialog box, where you can make the following settings.

Save Preview Image and Settings

Select the Save Preview Image and Settings check box to save the previewed image and the image processing parameters when you perform a scan or close EPSON Stylus Scan SF TWAIN.

Automatic Preview

Select the Automatic Preview check box to automatically preview images captured by EPSON Stylus Scan SF TWAIN.

ICM, ICM/sRGB (For Windows 95/98)

Select the ICM check box for Windows 95, or the ICM/sRGB check box for Windows 98, to reproduce the colors in your image using ICM (Image Color Matching) with Windows.

If your operation system is Windows 98, color matching using sRGB devices achieves the best results.

ColorSync (Macintosh)

Select the ColorSync check box to reproduce the colors in your image using the ColorSync calibration method.

Chapter 9

Copier

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Loading the Paper

Follow the directions below to load a document into your document feeder for copying.

1. Adjust the document edge guides so that distance between them is slightly wider than the width of the document.
2. Hold the document you want to scan face down, and place the top edge of the document between the document edge guides.

Note:

If your document is fragile or very thin, place it in the protection sheet before loading. See "Loading thin or fragile media" on page 8-3.

3. Adjust the document edge guides so that they match the width of the document.
4. Insert the top edge of the document into the document feeder until you feel a tug.
5. The document feeder will draw the document into the Stylus Scan a short distance. Release the document.

You are now ready to make a copy, using either the control panel on your EPSON Stylus Scan or the Copy utility included in EPSON SMART PANEL.

Note:

- To eject the document from the document feeder without copying, press the ⏏ stop/clear button.*
- Remove all paper from the output tray before copying.*
- Remove any documents from the document feeder before printing.*

Using the EPSON SMART PANEL Copy Utility

Copy is application included with EPSON SMART PANEL. You must install the EPSON Stylus Scan Software and EPSON SMART PANEL before you can use it. Refer to the *Setup Guide* for details on installation.

Accessing the Copy utility

Follow these steps to access the Copy utility.

1. For Windows:

Click Start, point to Programs, then click EPSON SMART PANEL.

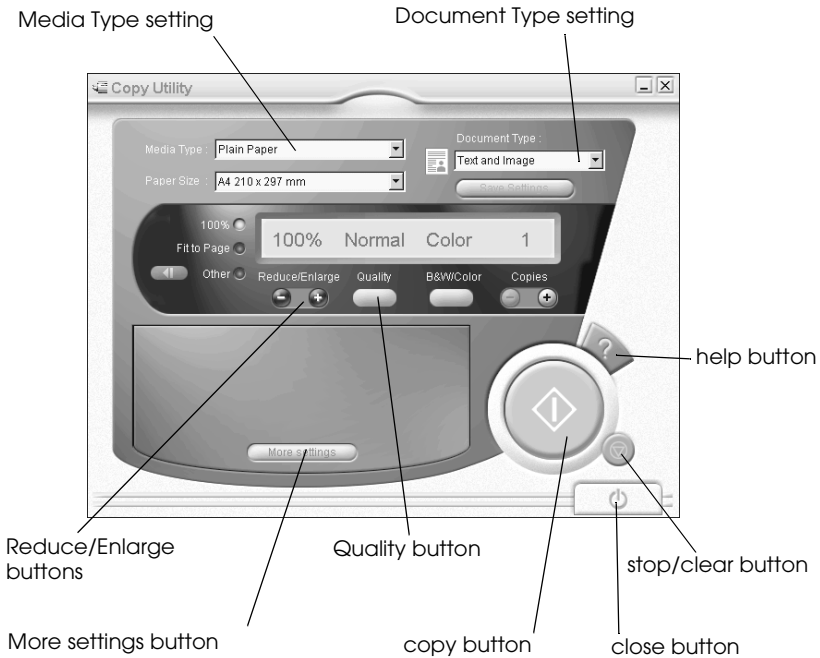
For Macintosh:


Click the Apple menu, then click EPSON SMART PANEL.

2. EPSON SMART PANEL opens. Click the copier icon to launch the Copy utility. The Copy utility dialog box appears.

Making copy settings in the Copy utility

You can make copy settings in the Copy utility dialog box.



Refer to the table below for settings information. Click the More settings button if you wish to make advanced and custom settings. After you finish making settings, click the  copy button to begin copying.

Help button	Click for online help.
Stop/clear button	Click to quit copying already in progress.
Copy button	Click to start copying.
Close button	Click to close the utility, or the menus for custom settings.
More settings button	Click to make custom settings.

Making paper and document settings

The paper and document settings are located at the top of the Copy utility dialog box.



Media Type

Select the type of paper that matches the paper which is loaded into the paper feeder.

Paper Size

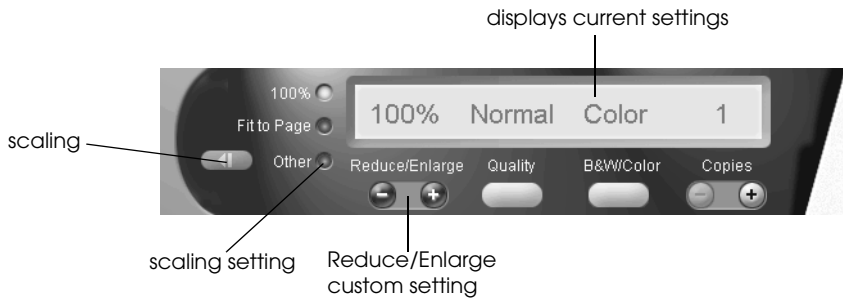
Select the paper size that matches the paper which is loaded into the paper feeder.

Document Type

Select the document type that matches the original document that you are copying. The available document types are as follows:


Text	Select this if your document contains text only.
Photo	Select this if you are copying from a photograph.
Text and Image	Select this if your document includes both text and illustrations.
Save Settings	Click this button to open a dialog box where you can save your settings.

Making other basic settings



Reduce/Enlarge

Make one of the following settings to adjust the size of the copy:

- Select 100% to make a copy that is the same size as your document.
- Select Fit to Page to automatically resize the image to match the size of your paper size setting.
- Select Other, then click the "+" or "-" button to adjust the setting to set an arbitrary size.
- Click the  scaling button to open a dialog box where you can adjust the size.

Quality

Click this button to specify the print quality for your copy.

Normal: Print quality is lower, but print speed is higher.

Fine: Provides a high quality printout, but print speed is lower.

B&W/Color

Click this button to toggle between the black-and-white and color copy options.

Copies

Use these buttons to select the number of copies you want to make. Press the "+" button to increase the number, or the "-" button to reduce it.

Using Stylus Scan's Control Panel

Follow the instructions in this section to copy documents directly using the control panel on EPSON Stylus Scan. When working from the control panel, begin by selecting the reduce/enlarge ratio and the copy mode.

Note:

EPSON recommends using the provided utilities for best results when copying photographs and similar documents.

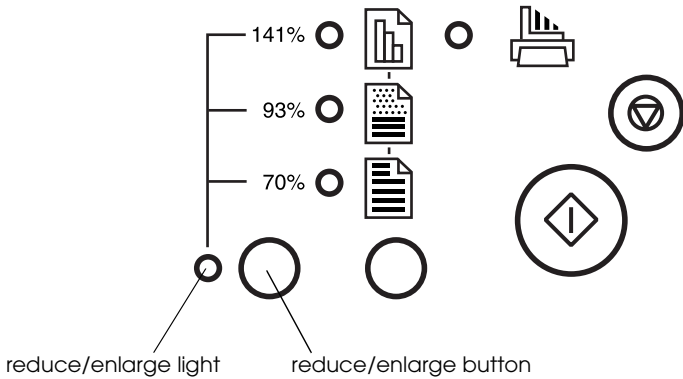
Making the magnification setting

Press the reduce/enlarge button as many times as necessary to specify your desired magnification or reduction ratio. The selector lights indicate the current ratio setting; the setting changes each time you press the button.

Note:

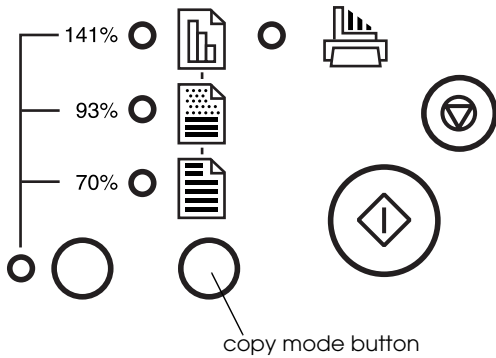
The selector lights are used to indicate both the magnification ratio and the copy mode. Press the reduce/enlarge button and the reduce/enlarge light comes on. The light of the currently selected magnification ratio also comes on. When you press the copy mode button, the lights change to indicate the currently selected mode setting.

You can choose from the following settings: 100%, 70%, 93%, or 141%.



Making the copy mode setting

Press the copy mode button as many times as necessary to select the mode you want. The setting changes each time you press the button; the selector lights indicate the current mode setting.



The available modes are as follows.



color Produces a color copy.



grayscale Produces a shaded black-and-white image. Use this setting when copying black-and-white or color images.



B&W Produces a copy that is pure black on pure white. Use this setting when copying text.



Note:

The selector lights are used to indicate both the magnification ratio and the copy mode. Press the reduce/enlarge button and the reduce/enlarge light comes on. The light of the currently selected magnification ratio also comes on. When you press the copy mode button, the lights change to indicate the currently selected mode setting.



Adjusting the paper size



The Stylus Scan can make copies on both A4 and Letter size paper. To check which paper size the Stylus Scan is currently set to copy on, you can print a page that indicates the current setting, or you can check the lights on the control panel. Once you know what is the current paper size selection, you can change the paper size accordingly.



Checking by printing a page

Make sure the Stylus Scan is off and paper is loaded into the paper feeder. While holding down the  copy button, press the  power button, then release both buttons. The Stylus Scan prints a page which includes the ROM version your Stylus Scan and the current paper size for copying.


Checking by using the lights on the control panel

Make sure the Stylus Scan is off. While holding down the  stop/clear button, press  the power button. Then release both buttons and check the lights on the control panel.


If the  and  are on, A4 is the current paper size setting for copying.

If the  and  lights are on, Letter is the current paper size setting for copying.

Changing the paper size for copying



After determining which paper size setting is currently selected, press the  stop/clear button to switch between the two settings.

Copying using the control panel

Once you have made all of the appropriate settings, press the  copy button to begin copying.

The document is drawn into the document feeder, then reverses direction and passes back out the document feeder slot. At the same time, the EPSON Stylus Scan feeds a blank sheet of paper from the paper feeder, prints the image onto the paper, and ejects the paper onto the output tray.

Note:

When copying a thin document that has images printed on both sides, unwanted parts of the image on the opposite side of the paper may appear in the copy. To avoid this, try selecting the  color or  grayscale copy mode.

Replacing Ink Cartridges



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Replacing Empty Ink Cartridges









Using the control panel



The Stylus Scan's indicator lights will inform you when it is time to obtain a replacement ink cartridge and when it is time to replace an empty cartridge.

Note:

If you need to replace an ink cartridge when the  black and  color lights are off, see "Replacing an Old or Damaged Ink Cartridge" on page 10-11.



This table describes the status of the lights on your Stylus Scan and the actions you need to take.

Lights	Action
 	Obtain a replacement black ink cartridge (S020189).
 	Replace the empty black ink cartridge.
 	Obtain a replacement color ink cartridge (S020191).
 	Replace the empty color ink cartridge.

 = on,  = flashing



Caution:

-  EPSON recommends the use of genuine EPSON ink cartridges. Other products not manufactured by EPSON may cause damage to your Stylus Scan not covered by EPSON's warranties.
-  Leave the old cartridge installed in the Stylus Scan until you have obtained a replacement. Otherwise, ink remaining in the print head nozzles may dry out.




Note:

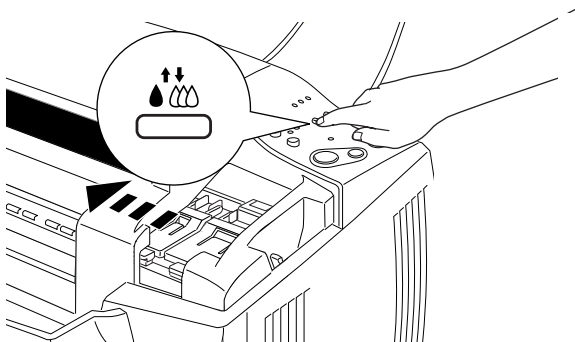
- ❑ *You cannot continue printing with one ink cartridge empty, even if the other cartridge still contains ink. Before printing, replace the empty cartridge.*

- ❑ *In addition to the ink used during document printing, ink is consumed during the print head cleaning operation and during the self-cleaning cycle which is performed when the Stylus Scan is turned on.*

Replacing a color ink cartridge

To replace an ink cartridge using the EPSON Stylus Scan's control panel, follow the steps below.

1. Make sure the Stylus Scan is on. The  power light should be on, but not flashing.
2. Lower the output tray at the front of the EPSON Stylus Scan, then open the front cover.
3. Hold down the  cleaning button for three seconds, then release it. The print head moves to the replacement position for the color ink cartridge and the  power light begins flashing.

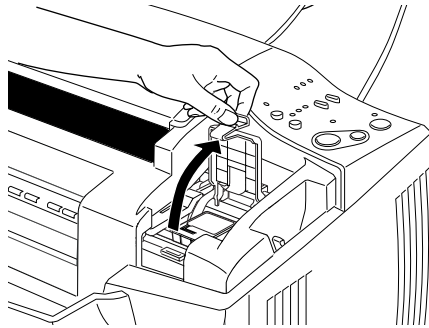




Caution:

Do not move the print head by hand, as this may damage the mechanism.

4. Push back the release tabs and lift up the clamp that holds the cartridge you want to replace as far as it will go. The cartridge rises partly out of the cartridge holder. Then lift the cartridge out of the Stylus Scan and dispose of it properly. Do not take the used cartridge apart or try to refill it.



Warning:

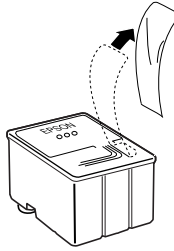
If ink gets on your hands, wash them thoroughly with soap and water. If ink gets into your eyes, flush them immediately with water.



Caution:

Once you open the ink cartridge clamp, the ink cartridge becomes unusable and cannot be reinstalled, even if ink remains.

- Remove your new color ink cartridge from its package. Then remove the yellow tape seal from the cartridge.

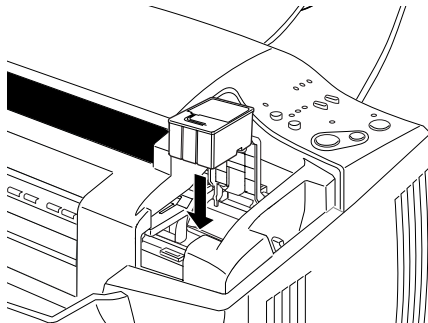


color ink cartridge (S020191)



Caution:

- You must remove the yellow tape seal from the cartridge before installing it. The cartridge will be permanently damaged if installed with the yellow tape attached.
 - Do not remove the blue portion of the tape seal from the top of the cartridge; otherwise, the print head may become clogged and will be unable to print.
 - Do not remove the tape seal from the bottom of the cartridge; otherwise, ink will leak.
- Place the ink cartridge gently into the cartridge holder with the label on the cartridge facing up. Then lower the ink cartridge clamp and press down until it locks in place. Do not press down on the cartridge itself.










Caution:

Once you install the ink cartridges, do not open their clamps again until you replace the cartridges. Otherwise, the cartridges may become unusable.

Note:

If you need to replace the black ink cartridge as well, you can do so now. Press and release the  cleaning button quickly. The print head automatically moves to the black ink cartridge replacement position. Refer to “Replacing a black ink cartridge” on page 10-6 for details.


7. Make sure the  black and  color lights are off, then press and release the  cleaning button quickly. The Stylus Scan moves the print head and begins charging the ink delivery system. This process takes about one minute to complete. When the ink charging process is finished, the Stylus Scan returns the print head to its home position and the  power light stops flashing.

Note:

If you replace the ink cartridge before a print job is finished, the Stylus Scan automatically prints the remaining pages of the print job once the ink cartridge is replaced.






Caution:

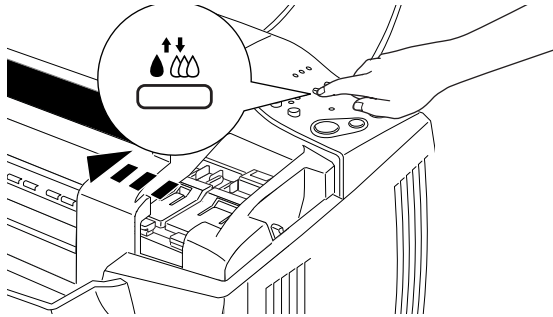
The  power light continues to flash while the Stylus Scan performs the ink charging operation. Never turn off the Stylus Scan while this light is flashing. Doing so can result in incomplete charging of ink.

8. Close the front cover.

Replacing a black ink cartridge

To replace a black ink cartridge using the Stylus Scan’s control panel, follow the steps below.

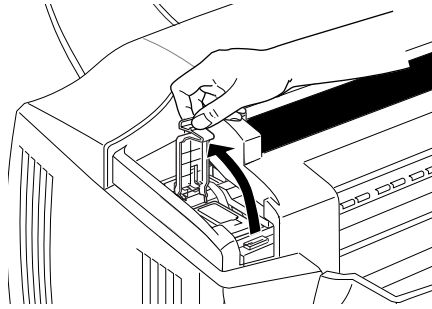
1. Make sure the Stylus Scan is on. The  power light should be on, but not flashing.
2. Lower the output tray at the front of the EPSON Stylus Scan, then open the front cover.
3. Hold down the  cleaning button for three seconds, then release it. The print head moves to the cartridge replacement position for the black ink cartridge. The  power light begins flashing.



Caution:

Do not move the print head by hand, as this may damage the mechanism.

4. Push back the release tabs and lift up the clamp that holds the cartridge you want to replace as far as it will go. The cartridge rises partly out of the cartridge holder. Then lift the cartridge out of the Stylus Scan and dispose of it properly. Do not take the used cartridge apart or try to refill it.



Warning:

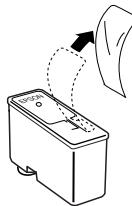
If ink gets on your hands, wash them thoroughly with soap and water. If ink gets into your eyes, flush them immediately with water.



Caution:

Once you open the ink cartridge clamp, the ink cartridge becomes unusable and cannot be reinstalled, even if ink remains.

5. Remove your new black ink cartridge from its protective bag. Then remove the yellow tape seal from the cartridge.

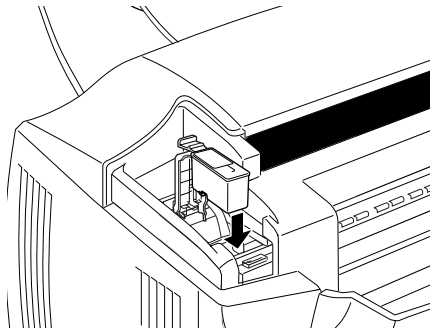


black ink cartridge (S020189)







Caution:

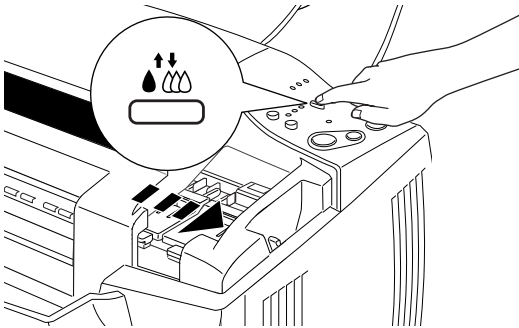
- ❑ *You must remove the yellow tape seal from the cartridge before installing it. The cartridge will be permanently damaged if installed with the yellow tape attached.*
 - ❑ *Do not remove the blue portion of the tape seal from the top of the cartridge; otherwise, the print head may become clogged and will be unable to print.*
 - ❑ *Do not remove the tape seal from the bottom of the cartridge; otherwise, ink will leak.*
6. Place the ink cartridge gently into the cartridge holder with the label on the cartridge facing up. Then lower the ink cartridge clamp and press down until it locks in place. Do not press down on the cartridge itself.



Caution:

Once you install the ink cartridges, do not open their clamps again until you replace the cartridges. Otherwise, the cartridges may become unusable.

7. Make sure the  black and  color lights are off, then press the  cleaning button and release quickly. The Stylus Scan moves the print head and begins charging the ink delivery system. This process takes about one minute to complete. When the ink charging process is finished, the Stylus Scan returns the print head to its home position and the  power light stops flashing




Note:

If you replace the ink cartridge before a print job is finished, the Stylus Scan automatically prints the remaining pages of the print job once the ink cartridge is replaced.



Caution:

The  power light continues to flash while the Stylus Scan performs the ink charging operation. Never turn off the Stylus Scan while this light is flashing. Doing so can result in incomplete charging of ink.

8. Close the front cover.



Using Status Monitor 3



You can monitor the remaining ink level from your computer and view on-screen instructions for replacing a low or empty ink cartridge.

When an ink cartridge is low or empty and you are ready to replace it, click the HOW TO button in the Status Monitor's Printer Status window. The print head moves to the ink cartridge replacement position. Follow the on-screen instructions to replace the cartridge.

Replacing an Old or Damaged Ink Cartridge


In some circumstances you may need to replace an ink cartridge before it is empty. For example, if the quality of your printouts and copies remains poor even after repeatedly cleaning and aligning the print head, one or both of the ink cartridges may be old or damaged and should be replaced.

To replace an ink cartridge before the  color or  black ink out light flashes, follow the steps in this section.

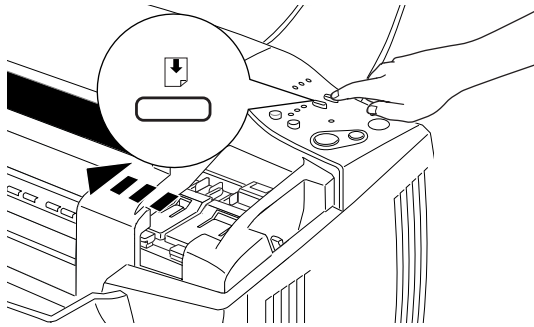
If the  color or  black ink out light is flashing or is on, replace the empty ink cartridge as described in "Replacing Empty Ink Cartridges" on page 10-2.




Caution:

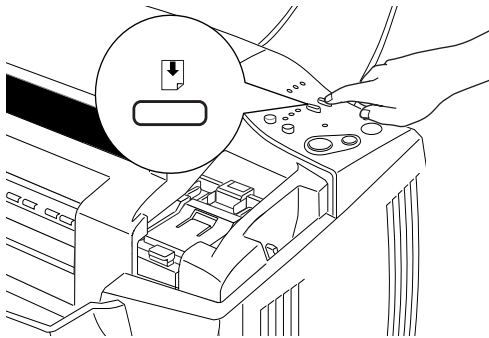
- Once you remove an ink cartridge, it becomes unusable and cannot be reinstalled even if ink remains.*
 - Leave the old cartridge installed in the EPSON Stylus Scan until you are ready to replace it with a new one.*
1. Make sure the Stylus Scan is on. The  power light should be on, but not flashing.
 2. Lower the output tray, then open the front cover.

3. Hold down the  load/eject button for three seconds; the print head moves to the color cartridge replacement position. The  power light begins flashing.

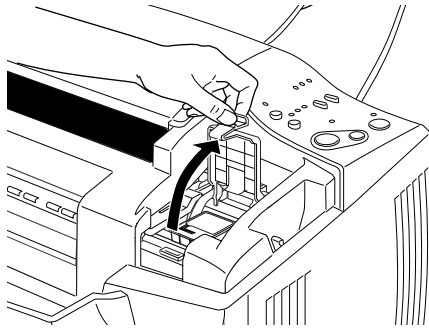


Note:

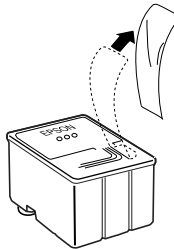
If you need to replace only the black ink cartridge, press and release the  load/eject button quickly to move the print head to the black ink cartridge replacement position.



4. Lift the ink cartridge clamp. Then lift the cartridge out of the Stylus Scan and dispose of it properly.

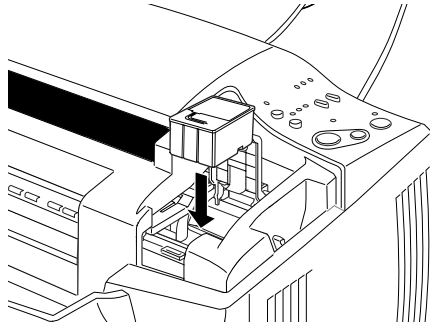


5. Remove the yellow tape seal from the new cartridge.




color ink cartridge (S020191)

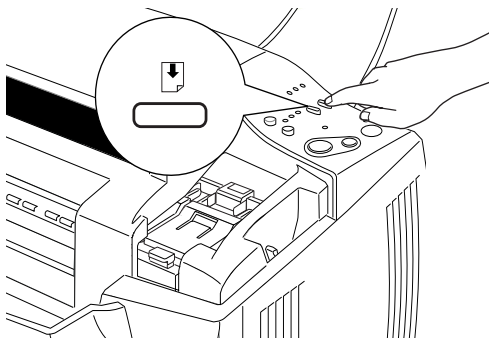
6. Place the cartridge gently into the cartridge holder. Do not press down on the cartridge. Then lower the ink cartridge clamp and press down until it locks into place.




Caution:

Once you install the cartridges, do not open their clamps again until you replace the ink cartridges. Otherwise, the cartridges may become unusable.

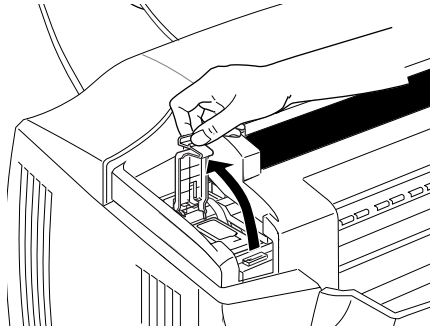
7. Press the  load/eject button again. The print head moves to the replacement position for the black cartridge.



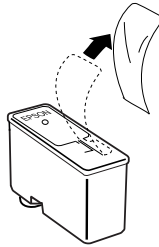
Note:

If you do not need to replace the black cartridge, press the  load/eject button and release it quickly. The print head returns to the home position, and ink charging begins.

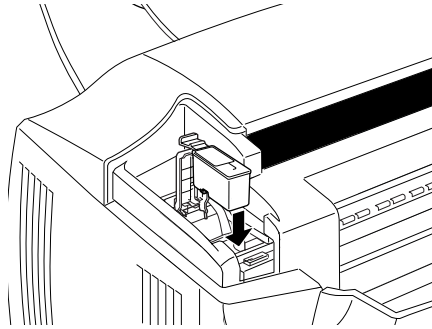
8. Lift the ink cartridge clamp. Then lift the cartridge out of the Stylus Scan and dispose of it properly.




9. Remove the yellow tape seal from the new cartridge.





10. Place the cartridge gently into the cartridge holder. Do not press down on the cartridge. Then lower the ink cartridge clamp and press down until it locks into place.



11. Press and release the  load/eject button quickly again. The Stylus Scan moves the print head back to its home position and charges ink in the system.



Caution:

The  power light continues to flash while the Stylus Scan performs the ink charging operation. Never turn off the Stylus Scan while the  power light is flashing. Doing so can result in incomplete charging of ink.

12. Close the front cover.

Chapter 11

Maintenance

Checking the Print Head Nozzles	11-2
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Checking the Print Head Nozzles

If you find that printouts and copies are unexpectedly faint or that there are gaps (missing dots) in the printed image, you may be able to identify the problem by checking the print head nozzles.

You can check the print head nozzles from your computer using the Nozzle Check utility, or using the Stylus Scan's control panel.

Using the Nozzle Check utility

Follow the steps below to use the Nozzle Check utility.


Note:

Do not use the Nozzle Check utility while printing is in progress; otherwise, your printout may be marred.

For Windows users

1. Make sure A4 or Letter size paper is loaded in the paper feeder.
2. Access the printer software. If you need instructions, see "Accessing the printer software" on page 4-2.
3. Click the Utility tab in the printer software, then click the Nozzle Check button.
4. Follow the on-screen instructions.




For Macintosh users

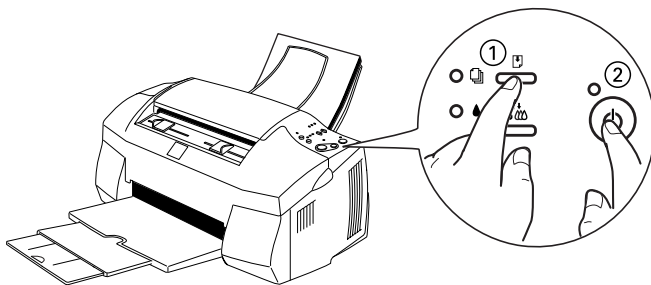
1. Make sure A4 or Letter size paper is loaded in the paper feeder.
2. Access the Print or Page Setup dialog box.
3. Click the  Utility icon button in the Print or Page Setup dialog box, then click the Nozzle Check button.

4. Follow the on-screen instructions.

Using the control panel buttons

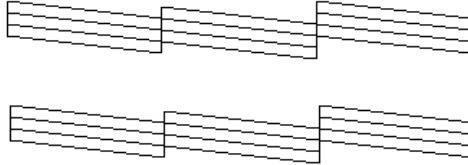
Follow the steps below to check the print head nozzles using the control panel buttons.

1. Make sure that A4 or Letter size paper is loaded in the paper feeder.
2. If the EPSON Stylus Scan is on, press the  power button once to turn it off.
3. Hold down the  load/eject button and press the  power button to turn on the Stylus Scan. Then release both buttons.

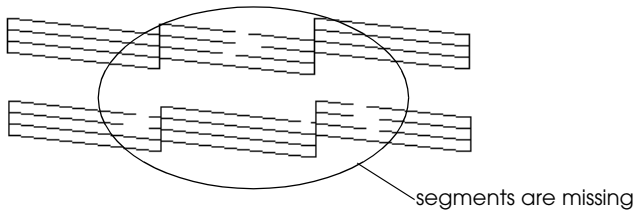


The Stylus Scan prints an operation check page including its ROM version information, the ink counter code, and a nozzle check pattern. Below are sample printouts.

Good sample



Print head needs to be cleaned



The above sample is in black and white, but the actual test prints in color (CMYK).



If the nozzle check page does not print satisfactorily (for example, if any segment of the printed lines is missing) there is a problem with the Stylus Scan's printer function. This could be a clogged ink nozzle or a misaligned print head. See the next section for details on cleaning the print head. For information on aligning the print head, see "Aligning the Print Head" on page 11-10.

Cleaning the Print Head

If you find that printouts and copies are unexpectedly faint or that there are gaps (missing dots) in the printed image, you may be able to solve the problem by cleaning the print head. Cleaning the print head ensures that the nozzles are delivering the ink properly.

You can clean the print head from your computer using the Head Cleaning utility in the printer software, or from the Stylus Scan itself by using the control panel buttons.



Note:

- Print head cleaning uses both color and black ink. To avoid wasting ink, clean the print head only if print quality declines.*
- Use the Nozzle Check utility first to confirm that the print head needs to be cleaned. This saves ink.*
- When the  black or  color ink out light is flashing or on, you cannot clean the print head. Replace the appropriate ink cartridge first.*
- Do not start the Head Cleaning or Nozzle Check utility while printing is in progress; otherwise, your printout may be marred.*



Using the Head Cleaning utility

Follow the steps below to use the Head Cleaning utility.


For Windows users

1. Make sure that the Stylus Scan is on and both the  black and  color ink out lights are off.

Note:


If the  black or  color ink out light is flashing, you can not clean the print head. Replace the appropriate ink cartridge first.


2. Access the printer software. If you need instructions, see “Accessing the printer software” on page 4-2.
3. Click the Utility tab in the printer software, then click the Head Cleaning button.
4. Follow the on-screen instructions.

The  power light flashes while the EPSON Stylus Scan performs the cleaning cycle. The cycle takes about one minute to complete.



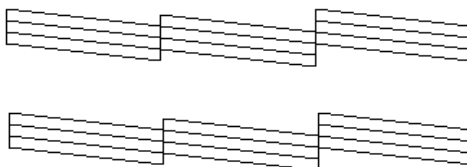
Caution:

Never turn off the EPSON Stylus Scan while the  power light is flashing. Doing so may damage the Stylus Scan.

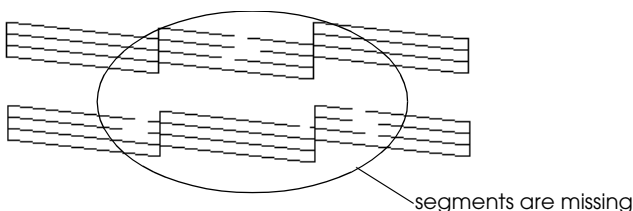
5. When the  power light stops flashing, click Print nozzle check pattern in the Head Cleaning dialog box to confirm that the head is clean and to reset the cleaning cycle.

Below are sample printouts:

Good sample



Print head needs to be cleaned



The above sample is in black and white, but the actual test prints in color (CMYK)

In the check pattern, if you find that any segments are missing from the test lines, you may need to repeat the head cleaning and print the nozzle check pattern again.

If print quality does not improve after repeating this procedure four or five times, turn the Stylus Scan off and leave it off overnight. Then do the head cleaning again.




If the print quality still has not improve, one or both of your ink cartridges may be old or damaged and may need to be replaced. To replace an ink cartridge before it is empty, see "Replacing an Old or Damaged Ink Cartridge" on page 10-11.


If print quality remains a problem after replacing the ink cartridges, contact your dealer.

Note:

To maintain print quality, we recommend turning on the EPSON Stylus Scan for at least one minute every month.


For Macintosh users


1. Make sure that the EPSON Stylus Scan is on, and the  black and  color ink out lights are off.
2. Click the  Utility icon button in the Print or Page Setup dialog box, then click the Head Cleaning button.
3. Follow the on-screen instructions.

The  power light flashes while the Stylus Scan performs the cleaning cycle. The cycle takes about one minute to complete.



Caution:

Never turn off the Stylus Scan while the  power light is flashing. Doing so may damage the Stylus Scan.

4. When the  power light stops flashing, click the Confirmation button in the Head Cleaning dialog box to print a nozzle check pattern and to reset the cleaning cycle. Use the check pattern to confirm that the head is clean.

If print quality has not improved after repeating this procedure four or five times, turn the Stylus Scan off and leave it alone overnight. Then try the head cleaning again.

If the print quality still has not improved, one or both of your ink cartridges may be old or damaged and may need to be replaced. To replace an ink cartridge before it is empty, see “Replacing an Old or Damaged Ink Cartridge” on page 10-11.





If print quality remains a problem after replacing the ink cartridges, contact your dealer.

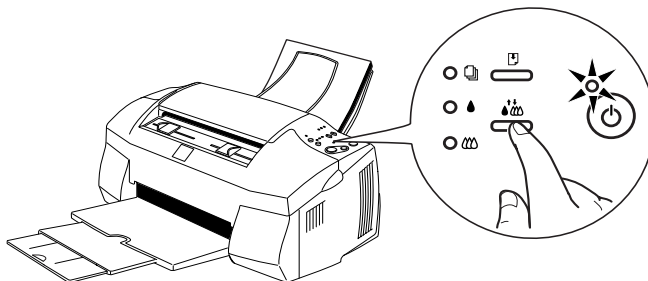
Note:


To maintain print quality, EPSON recommends turning on the Stylus Scan for at least one minute every month.

Using the control panel buttons

Follow the steps below to clean the print head using the control panel buttons.


1. Make sure that the  power light is on and that both the  black and  color ink out lights are off.
2. Hold down the  cleaning button for three seconds, then release it.







The EPSON Stylus Scan starts cleaning the print head and the  power light begins flashing. Print head cleaning takes about one minute to complete.




Caution:

Never turn off the Stylus Scan while the  power light is flashing. Doing so may damage the mechanism.

Note:

If the  black or  color ink out light is flashing or on, pressing the  cleaning button starts the ink cartridge replacement procedure. If you do not want to replace an ink cartridge at this moment, press and release the  cleaning button again to return the print head to its home position.

3. When the  power light stops flashing, print a few lines from a document to confirm that the head is clean and to reset the cleaning cycle.

If print quality has not improved after repeating this procedure four or five times, turn the Stylus Scan off and leave it alone overnight. Then try cleaning the head again.

If the print quality still has not improved, one or both of your ink cartridges may be old or damaged and may need to be replaced. To replace an ink cartridge before it is empty, see “Replacing an Old or Damaged Ink Cartridge” on page 10-11.

If print quality remains a problem after replacing the ink cartridges, contact your dealer.

Note:

To maintain print quality, EPSON recommends turning on the Stylus Scan for at least one minute every month.

Aligning the Print Head

If you notice a misalignment of vertical lines, you may be able to solve this problem from your computer using the Print Head Alignment utility.


Note:

Do not start the Print Head Alignment utility while printing is in progress; otherwise, your printout may be marred.

For Windows users

1. Make sure A4 or Letter size plain paper is loaded in the paper feeder.
2. Access the printer software. If you need instructions, see “Accessing the printer software” on page 4-2.
3. Click the Utility tab in the printer software, then click the Print Head Alignment button.
4. Follow the messages on your screen to align the print head.

For Macintosh users

1. Make sure A4 or Letter size plain paper is loaded in the paper feeder.
2. Access the Print or Page Setup dialog box.
3. Click the  Utility icon button in the Print or Page Setup dialog box, then click the Print Head Alignment button.
4. Follow the messages on your screen to align the print head.

Calibrating Your Screen

When you install EPSON Stylus Scan Software, the EPSON Screen Calibration utility is automatically installed.

This utility calibrates your monitor to ensure the tone and contrast of the image on your screen closely match the original image. Be sure to calibrate your screen before using your scanner.

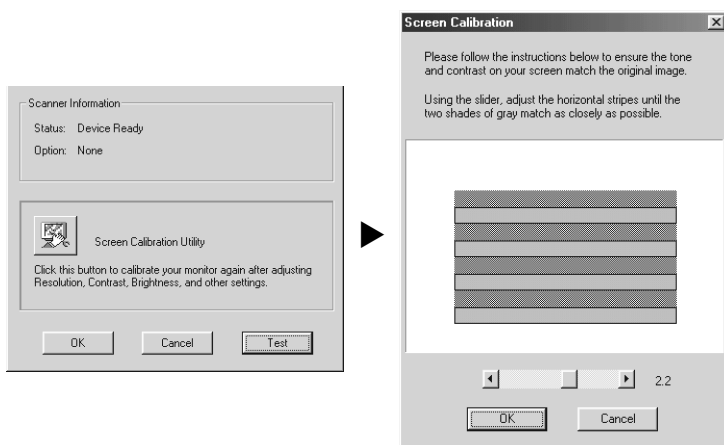
For information regarding color and output device calibration, see the *Color Guide*.

You need to calibrate your screen when you first install the scanner software, and anytime you switch to a different monitor.

Follow the steps below to calibrate your screen.

For Windows Users

1. Double-click the EPSON Stylus Scan SF icon in the Control Panel. The EPSON Stylus Scan SF dialog box appears.
2. Click the Screen Calibration Utility button. The Screen Calibration dialog box appears.



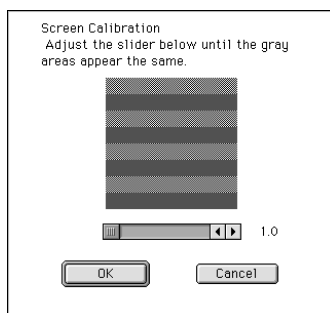
3. Adjust the slider until the shades of the gray horizontal stripes match.
4. Click OK to finish calibrating your scanner and monitor.

The gray stripes will not blend perfectly; however, try to make the different tones match as closely as possible.

The screen profile contains calibration information for the previewed image as well as the scanned image.

For Macintosh Users

1. Click the EPSON Screen Calibration icon in the EPSON Scanner folder. The following dialog box appears.



2. Adjust the slider until the shades of the gray horizontal stripes match.
3. Click OK to finish calibrating your scanner and monitor.

The gray stripes will not blend perfectly; however, try to make the different tones match as closely as possible.

The screen profile contains calibration information for the previewed image as well as the scanned image.

Cleaning the EPSON Stylus Scan

To keep your Stylus Scan operating at its best, clean it thoroughly several times a year as follows.

1. Make sure the Stylus Scan is turned off and all of its lights are off. Then unplug the power cord.
2. Remove any paper from the paper feeder.
3. Use a soft brush to carefully clean away all dust and dirt from the paper feeder and document feeder.

4. If the outer case or the inside of the paper feeder is dirty, clean it with a soft, clean cloth dampened with mild detergent. Keep the front cover and the top cover closed to prevent water from getting inside.
5. If the scanner glass is dirty, open the top cover. Then clean the glass with a soft, clean and dry cloth, or with a blower brush.
6. If the inside of the Stylus Scan accidentally gets soiled with ink, wipe the ink away with a damp cloth.



Caution:

- ❑ *Never use alcohols or thinners to clean the Stylus Scan; these chemicals can damage the components as well as the case.*
- ❑ *Be careful to keep water away from the printing and scanning mechanisms and electronic components.*
- ❑ *Do not use a hard or abrasive brush.*
- ❑ *Do not spray the inside of the Stylus Scan with lubricants; unsuitable oils can damage the mechanisms. Contact your dealer or a qualified service person if lubrication is needed.*

Transporting the EPSON Stylus Scan

If you need to transport your EPSON Stylus Scan, carefully repack it as described below using the original box and packing materials.

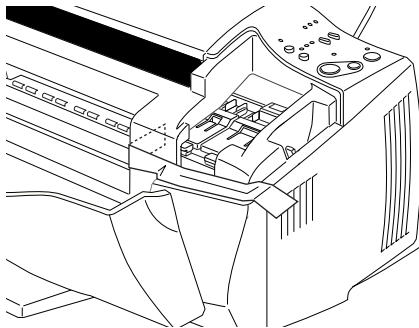
1. Open the front cover and make sure that the print head is in the home (far right) position. If not, turn on the Stylus Scan and wait until the print head returns to the home position. Then turn off the Stylus Scan and close the front cover.



Caution:

Leave the ink cartridges installed during transport. Removing the cartridges for transport may damage the Stylus Scan and make the cartridges unusable.

2. Make sure that the top and front covers are closed.
3. Unplug the power cord from the electrical outlet; then disconnect the interface cable from the Stylus Scan.
4. Remove the paper from the paper feeder and remove the paper supports.
5. Push in the output extension tray, and then raise the output tray.
6. Open the front cover again. Secure the ink cartridge holders to the body of the Stylus Scan with tape as shown below. Then close the cover.



7. Attach the protective materials to both sides of the Stylus Scan.
8. Repack the Stylus Scan and power cord in the original box.
9. Keep the Stylus Scan level during transport.

Chapter 12

Troubleshooting

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Diagnosing the Problem







Troubleshooting problems is best handled in two easy steps: first diagnose the problem, then apply likely solutions until the problem is fixed. The information that you need to diagnose the most common problems is provided by the Stylus Scan's control panel lights and by the Status Monitor utility.

Use the information presented in this chapter to pinpoint the source of your problem, then apply the recommended solutions until the problem is solved.

Error indicators

You can identify many common problems by using the lights on the Stylus Scan's control panel. If the EPSON Stylus Scan stops working and the lights are on or flashing, use the following table of panel light patterns to diagnose the problem, then follow the recommended corrective measures.

Lights	Problem and Solution	
	Paper out	
	No paper is loaded in the paper feeder.	Load paper into the paper feeder, then press the  load/eject button. The Stylus Scan resumes printing or copying.
	Paper jam (paper feeder path)	
	Paper is jammed in the paper feeder path.	Press the  load/eject button. The Stylus Scan should eject the jammed paper and resume printing. If not, open the front cover and remove the jammed paper. Then reload paper in the paper feeder and press the  load/eject button to resume printing or copying.
	Document jam (document feeder path)	
	Original document is jammed in the document feeder path.	Turn off the Stylus Scan and close any open applications. Open the Stylus Scan's top cover and remove the jammed document. Then close the top cover and turn on the Stylus Scan.
	Ink low (black ink cartridge)	
	The black ink cartridge is nearly empty.	Obtain a replacement black ink cartridge.

	Ink out (black ink cartridge)	
	The black ink cartridge is empty.	Replace the black ink cartridge with a new one. See "Replacing Empty Ink Cartridges" on page 10-2 for details.
	Ink low (color ink cartridge)	
	The color ink cartridge is nearly empty.	Obtain a replacement color ink cartridge.
	Ink out (color ink cartridge)	
	The color ink cartridge is empty.	Replace the color ink cartridge with a new one. See "Replacing Empty Ink Cartridges" on page 10-2 for details.
	Carriage Error	
	The print head carriage is obstructed by jammed paper or other foreign material and cannot return to the home position.	Press the  power button to turn off the power. Open the front cover and remove any paper from the paper path by hand. Then turn the power back on. If the error does not clear, contact your dealer.
	Unknown printer error	
	An unknown printer error has occurred.	Turn off the Stylus Scan and contact your dealer.

■ = on, □ = off,  = flashing

Status Monitor 3

The Status Monitor 3 utility provides status messages and a graphic display showing the current state of the Stylus Scan.

If a problem occurs while printing, an error message appears in the Progress Meter window.

When the ink is out, click the HOW TO button in the Status Monitor or Progress Meter window and EPSON Status Monitor 3 will lead you step-by-step through the cartridge replacement procedure.

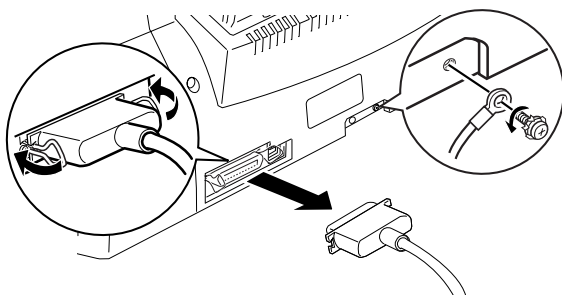
Running a printer operation check

Performing a printer operation check can help you determine whether the problem comes from the EPSON Stylus Scan or your computer.



To print a printer operation check page, follow these steps.

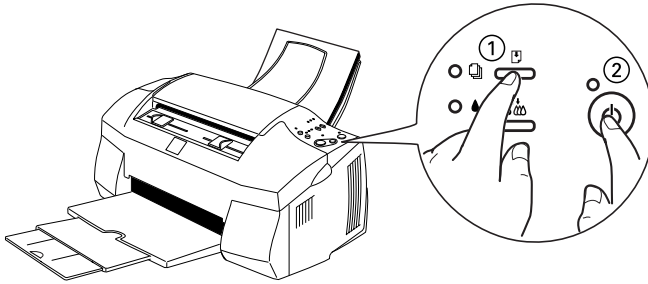
1. Make sure both the Stylus Scan and the computer are turned off.
2. Disconnect the cable from the Stylus Scan's interface connector.

If you use the parallel interface, unlock the wire clips on both sides of the interface connector and remove the ground connector, if necessary. Then disconnect the cable from the Stylus Scan's interface connector.



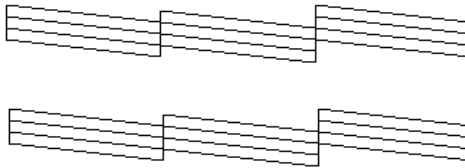
3. Make sure that A4 or Letter size paper is loaded in the paper feeder.

4. Hold down the  load/eject button and press the  power button to turn on the Stylus Scan. Then release both buttons.



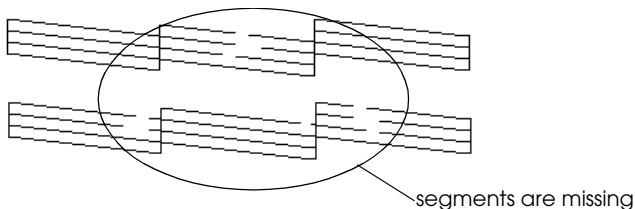
The Stylus Scan prints an operation check page that includes the Stylus Scan's ROM version number, the ink counter code, and a nozzle check pattern.

Compare the quality of the printed check page with the sample shown below. If there are no print quality problems, such as gaps or missing segments in the test lines, the EPSON Stylus Scan itself is all right and the problem probably lies in the software settings, application settings, the interface cable (be sure to use a shielded cable), or the computer itself.



The above sample is in black and white, but the actual check page prints in color (CMYK).

If the check page does not print satisfactorily as shown below, there is a problem with the EPSON Stylus Scan. For example, if any segment of the printed lines is missing, there could be a clogged ink nozzle or a misaligned print head.



The above sample is in black and white, but the actual check pattern prints in color.

Printing and Copying Problems

Refer to the appropriate section for solutions to printing and copying problems.



Print and copy quality could be better

If you are having print quality problems, try the solutions offered in this section.

Horizontal banding

Try one or more of these solutions:

- Make sure the printable side of the paper is face up in the paper feeder.
- Run the Head Cleaning utility to clear any clogged ink nozzles.

- ❑ Select the Automatic as the Mode setting on your printer driver's Main menu (Windows) or in the Print dialog box (Macintosh).
- ❑ Check the  black and  color ink out lights. If a light is flashing, replace the appropriate ink cartridge. See "Replacing Empty Ink Cartridges" on page 10-2.
- ❑ Make sure that Standard, rather than Maximum, is selected as the Printable Area setting in your printer driver. When Maximum is selected, banding may occur in the expanded area.

Vertical misalignment or banding

Try one or more of these solutions:

- ❑ Make sure the printable side of the paper is face up in the paper feeder.
- ❑ Run the Print Head Alignment utility.
- ❑ Turn off the High Speed setting in your printer driver. For instructions, see "Using the Advanced settings" on page 4-9 for Windows or "Using the Advanced settings" on page 6-9 for Macintosh.
- ❑ Run the Head Cleaning utility to clear any clogged ink nozzles.

Incorrect or missing colors



Try one or more of these solutions:

- ❑ Change the ink setting in your printer driver to Color. For instructions, see "Using the Automatic setting" on page 4-7 for Windows or "Using the Automatic mode" on page 6-6 for Macintosh.

- ❑ Adjust the color settings in your application software or your printer driver. For instructions, see “Using the Advanced settings” on page 4-9 for Windows or “Using the Advanced settings” on page 6-9 for Macintosh.
- ❑ Run the Head Cleaning utility. If colors are still incorrect or missing, replace the color ink cartridge. If the problem persists, replace the black ink cartridge. See “Replacing an Old or Damaged Ink Cartridge” on page 10-11.

Color gaps

Try one or more of these solutions:

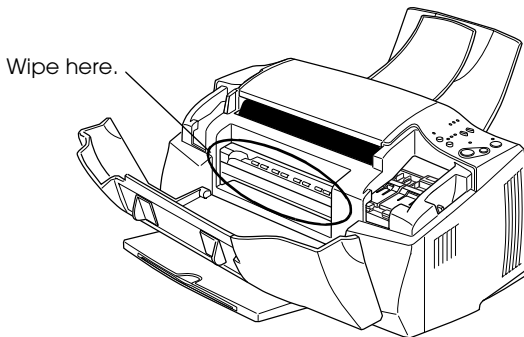
- ❑ Make sure your paper is not damaged, dirty, or too old. Also, make sure the printable side of the paper is face up in the paper feeder.
- ❑ Run the Head Cleaning utility to clear any clogged ink nozzles.
- ❑ Check the  black and  color ink out lights. If one of the lights is flashing, replace the appropriate ink cartridge. See “Replacing Empty Ink Cartridges” on page 10-2.
- ❑ Adjust the color settings in your application software or your printer driver. For instructions, see “Using the Advanced settings” on page 4-9 for Windows or “Using the Advanced settings” on page 6-9 for Macintosh.
- ❑ Select Automatic as the Mode setting on your printer driver’s Main menu (Windows) or in the Print dialog box (Macintosh).

Blurry or smeared printout

Try one or more of these solutions.



- ❑ Make sure your paper is dry and the printable side is facing up. Also, make sure you are using an acceptable paper type. See “Paper” on page B-2 for specifications.

- ❑ Select Automatic as the Mode setting on your printer driver's Main menu (Windows) or in the Print dialog box (Macintosh).
- ❑ Move the adjust lever to the "+" position, and make sure the Media Type setting selected in the printer driver is appropriate for the type of media loaded in the printer.
- ❑ If the paper is curled toward the printable side, flatten it or curl it slightly toward the opposite side.
- ❑ Remove each sheet from the output tray as it is printed, especially if you are using transparencies.
- ❑ If you're printing on glossy media or transparencies, place a support sheet (or a sheet of plain paper) beneath the stack. Or, load one sheet at a time.
- ❑ Run the Head Cleaning utility.
- ❑ Run the Print Head Alignment utility.
- ❑ Ink may have leaked inside the EPSON Stylus Scan. Wipe the inside of the Stylus Scan with a soft, clean cloth.




The Stylus Scan does not print or copy

If one of the following error indications is displayed, try the solutions listed.

- All lights are off
- Lights came on and then went out
- Only the  power light is on
- The  paper out light is flashing or on.
- One of the ink out lights is flashing or on.
- All lights are flashing.

All lights are off

Try one or more of these solutions:

- Press the  power button and make sure the EPSON Stylus Scan is on.
- Turn off the Stylus Scan and make sure the power cord is securely plugged in.
- Make sure your outlet works and is not controlled by a wall switch or timer.

Lights came on and then went out

The Stylus Scan's voltage may not match the outlet rating. Turn off the Stylus Scan and unplug it immediately. Then check the label on the Stylus Scan to determine the required voltage.

If the voltage does not match, **DO NOT PLUG THE EPSON STYLUS SCAN BACK IN.** Contact your dealer.

Only the operate light is on

Try one or more of these solutions:

- Turn off the Stylus Scan and the computer. Make sure the interface cable is securely plugged in at both ends.

- ❑ Make sure there is no packing material remaining inside the Stylus Scan.
- ❑ Turn off the Stylus Scan and the computer and disconnect the interface cable. Then print an operation check page. See “Running a printer operation check” on page 12-5.

If the check page prints, make sure the Stylus Scan software and your application software are installed correctly.

Note:

If you are trying to print a large image, your computer may not have enough memory to print.

- ❑ Clear any stalled print jobs from the Spool Manager.
- ❑ If the Stylus Scan sounds like it is trying to print, but is unable to, run the Head Cleaning utility.



If this doesn't work, replace the ink cartridges. See “Replacing a black ink cartridge” on page 10-6 and “Replacing a color ink cartridge” on page 10-3 for instructions.

Paper out lights are flashing or on

If the paper out light is flashing, remove any paper that may be jammed in the Stylus Scan.

If the paper out light is on, load more paper into the paper feeder.

One of the ink out lights is flashing or on

If the  black or  color ink out light is flashing, ink is low. Prepare a replacement cartridge.

If the  black or  color ink out light is on, ink is out. Replace the appropriate cartridge. See “Replacing Empty Ink Cartridges” on page 10-2.

All lights are flashing

Follow these steps.

1. Remove all paper from the Stylus Scan.
2. Turn the Stylus Scan off. Check for and remove any foreign objects or pieces of paper from inside the device. Also, make sure that there is sufficient space around the rear vent to allow for proper ventilation. Remove any objects blocking the vent, then turn the power back on.
3. If the error is not cleared, contact your dealer.

Paper does not feed correctly

If one of the following problems has occurred, try the solutions listed for that problem.

- Paper doesn't feed
- Multiple pages feed
- The paper jams
- Paper is not ejected fully or is wrinkled

Paper doesn't feed

Check that the loaded paper stack does not extend above the arrow mark on the left edge guide.

Remove the stack of paper and check that:

- The paper isn't curled or creased.
- The paper isn't too old. See the instructions that came with the paper for more information.
- The paper isn't loaded above the arrow on the left edge guide.

- ❑ Paper isn't jammed inside. If it is, remove the jammed paper.


Then load paper again. Make sure you follow any special loading instructions that came with your paper. See also "Loading Special Paper and Other Media" on page 3-3.

Multiple pages feed

Remove the stack of paper and make sure the paper is not too thin. See "Paper" on page B-2 for specifications. Fan the edges of the stack to separate the sheets, then reload the paper.

If too many copies of a document are being printed, check the Copies settings in both the printer driver and your application. For instructions, see "Modifying the printout style" on page 4-14 for Windows or "Modifying the Page Layout" on page 6-14 for Macintosh.


The paper jams

Press the  load/eject button to eject the jammed paper. If the error message does not clear, turn the Stylus Scan off and remove all the paper from the paper feeder. Then open the front cover and remove all the paper inside, including any torn pieces. Then turn on the Stylus Scan and reload the paper.

If your paper jams frequently, make sure of the following:

- ❑ The paper is of high-quality, loaded with the printable side up.
- ❑ The paper stack was fanned before loading.
- ❑ The paper isn't loaded above the arrow on the left edge guide.
- ❑ The left edge guide is adjusted to fit your paper.

Paper is not ejected fully or is wrinkled

If the paper doesn't eject fully, press the  load/eject button. Also check the Paper Size setting in your application or printer driver.

If the paper is wrinkled when it comes out, it may be damp or too thin. Load a new stack.

Note:

Store any unused paper in its original packaging in a dry area. See "Paper" on page B-2 for specifications.

Try selecting Automatic as the Mode setting in your printer driver's Main menu (Windows) or Print dialog box (Macintosh).

Printout is not what you expected

If one of the following problems has occurred, try the solutions listed for the problem.

- Characters are incorrect or garbled
- Margins are incorrect
- Image is inverted
- Blank pages print
- Bottom edge of printout is smeared
- Printing is too slow

Characters are incorrect or garbled

Try one or more of these solutions:

- If you are using Windows, select EPSON Stylus Scan 2000 as the default printer.
- Clear any stalled print jobs from the Spool Manager. For instructions, see "Using the EPSON Spool Manager" on page 5-3.
- Turn off the Stylus Scan and the computer. Make sure the Stylus Scan's interface cable is securely plugged in.

Margins are incorrect

Try one or more of these solutions:

- ❑ Check the margin settings in your application software. Make sure the margins are within the printable area of the page. See “Paper” on page B-2 for specifications.
- ❑ For Windows, check the settings in the Paper menu. Make sure the settings are appropriate for the paper size you are using.

For Macintosh, check the settings in the Page Setup dialog box. Make sure the settings are appropriate for the paper size you are using.

Image is inverted

Turn off the Flip Horizontal setting in the printer driver, or the “Mirror” setting in your application software. For instructions, see the online help for the printer driver or for your application.

For Macintosh, see also “Using the Advanced settings” on page 6-9.

Blank pages print

Try one or more of these solutions.

- ❑ If you are using Windows, select the EPSON Stylus Scan 2000 as the default printer.
- ❑ For Windows, check the settings in the Paper dialog box. Make sure they are appropriate for the paper size you are using.

For Macintosh, check the settings in the Page Setup dialog box. Make sure they are appropriate for the paper size you are using.

- ❑ Run the Head Cleaning utility to clear any clogged nozzles.

After trying one or more of these solutions, run a printer operation check to see whether the problem has been corrected. See “Running a printer operation check” on page 12-5 for details.

Printing is too slow

Try one or more of these solutions:

- Make sure the Media Type setting in your printer driver is correct. For instructions, see “Making the Media Type setting” on page 4-4 for Windows, or “Making the Media Type setting” on page 6-4 for Macintosh.
- Select Automatic as the Mode setting on your printer driver’s Main menu (Windows) or in the Print dialog box (Macintosh) and then move the slider to Speed. For instructions, see “Using the Automatic setting” on page 4-7 for Windows or “Using the Automatic mode” on page 6-6 for Macintosh.
- Close any applications you are not using at the moment.
- Delete unnecessary files to make room on your hard disk drive.

Note:

Your computer may not have enough memory. For further tips, See “Increasing the Print Speed” on page 4-26.

- If you upgraded from Windows 95 to Windows 98, uninstall the EPSON Stylus Scan driver, then reinstall it. See the Setup Guide for instructions on uninstalling and reinstalling the driver.

Banding appears at the top of the printout when you copy a letter-size document using the control panel

Make sure the paper size is set to A4. See “Adjusting the paper size” on page 9-9 for instructions on changing the paper size setting.

Scanning Problems

Refer to the appropriate section for solutions to scanning problems.

Scanner does not work properly

Try the solutions listed below for each problem.

Scanning does not begin

Try one or more of these solutions:

Nothing happens when I try to scan

If your situation is listed, try the suggested solution.

You are scanning several pages or documents

Wait until the Stylus Scan completes the current scan before starting a new scan.

The Stylus Scan is busy

Some documents take a long time to scan, especially when the scan is optimized for photos.

The document has jammed

Turn off the Stylus Scan and close any open applications on your computer. Remove all jammed documents from the Stylus Scan, then turn the Stylus Scan back on.

The scanned image is blank

Make sure that the image you want to scan is inserted face down into the document feeder.

Something is missing or incorrect in the scanned image

Try the solutions listed for the following image correction problems.

Text is missing or is incorrectly recognized by OCR

Try adjusting the scan threshold on the OCR Line/ Art menu in the EPSON Stylus Scan SF TWAIN setup dialog box. Select the threshold radio button and adjust the slider to change the scan threshold.

Dotted lines (no text) appear on scanned document

If you are scanning a document with a lot of graphics or artwork, the text may not be recognized properly by the OCR software. As a result, not all of the characters in the image may have been converted to text. When you opened the scanned image in your word processing application.

The image is getting cropped incorrectly

Try one of the following solutions:

Use a protection sheet

If the protection sheet is dirty, or has been used a lot, you may need to use a different sheet. Get a new sheet. Also, if the photo or document is very thick, the Stylus Scan may have trouble recognizing the borders.

Check your Quality setting

Select Best & de-screening as the Quality setting on EPSON TWAIN's Photo menu.

The image is crooked

Try one of the following solutions:

Check your Quality setting

Select Best & de-screening as the Quality setting on EPSON TWAIN's Photo menu.

Adjust the document edge guides

The paper guides may not be adjusted correctly. Verify that the document edge guides fit snugly against the document you are scanning.

A corner of the image is missing

Try using a protection sheet. If you are already using a protection sheet, make sure your photo or document is placed as straight as possible in the protection sheet and that the sheet is loaded straight in the document feeder.

Scanned quality is poor

Try the solutions listed for the following problems.

Scanned images look faded when printed

If you are scanning a photograph, make sure you have selected Photo! Print when you are using EPSON TWAIN.

Check the Quality and Resolution settings in EPSON TWAIN.

Scanned or copied photographs are too dark or have no detail

If you are scanning a photograph, make sure you have selected Photo! Print when you are using EPSON TWAIN.

Vertical lines are missing from the scanned image or copy

Try one of the following solutions:

Clean the scanner glass

Correcting fluid, dust particles, paper, or tape may be stuck to the scanner glass, causing a vertical white streak through the image. For details on cleaning the scanner glass, see “Cleaning the EPSON Stylus Scan” on page 11-13.

Use a protective sheet

If the protective sheet is dirty or worn, replace it with a new sheet.

Edit your original document

If lines are too thin on your original document, they may not scan well. If possible, make the lines thicker in your original document.

Flatten the original document

If your original is heavier than 90 g/m² (24 lb) and is wrinkled, some lines could be missed during scanning. Try flattening the original document and scan it again.

Scanned image is of much poorer quality than the original

Make sure that the Scan settings in EPSON SMART PANEL match the document you are scanning. To ensure the best results when scanning, make the Scan mode setting properly.

Paper does not feed into or eject from the Stylus Scan properly

Follow the procedures outlined below to prevent problems when feeding and ejecting paper from the document feeder.

A document is stuck in the Stylus Scan's document feeder***Note:***

These procedures do not apply to paper jammed in the Stylus Scan's paper feeder. The paper feeder is not used when scanning.

Preventing document jams

Make sure the Stylus Scan is placed far enough from walls and equipment so that the document support is seated properly and not pushed forward. Also make sure that there is no paper in the document support to obstruct the movement of the original. Check that the document support is installed correctly and that the original can move freely on and off it.

Clearing a document jam

Turn off your Stylus Scan. Open the top cover and remove the jammed paper. If any applications are still running, turn them off before turning off the Stylus Scan.

Scanning is slow

The best way to improve the speed of your scans is to make sure that ECP mode is enabled on your system. This is a system-level setting, so if you want to change it, contact the manufacturer of your computer.

Always use the lowest resolution (dpi) possible, while still obtaining acceptable image quality. A higher resolution may not always increase the quality of a scan, but will significantly slow down your computer and require more disk space to save the image.

Where to Get Help

If your EPSON Stylus Scan is not operating properly and you cannot solve the problem using the troubleshooting information provided in the EPSON Stylus Scan documentation, contact customer support services for assistance.

Customer support will be able to help you much more quickly if you give them the following information.

- ❑ Serial number of your EPSON Stylus Scan
(The serial number label is on the back of the EPSON Stylus Scan.)
- ❑ EPSON Stylus Scan model
- ❑ Brand and model of your computer
- ❑ EPSON Stylus Scan software version
(Click About in your printer driver)
- ❑ The Windows version you are using
- ❑ Software application(s) you normally use with your EPSON Stylus Scan, and their version number(s)

Chapter 13

Consumable Products

Consumable products13-2

Consumable products

The following ink cartridges and EPSON special media are available for your EPSON Stylus Scan.

Ink cartridges

You can use the following cartridges with your Stylus Scan.

Black ink cartridge S020189

Color ink cartridge S020191

Note:

The product numbers of ink cartridges vary by location.

EPSON special media

EPSON offers specifically designed media for ink jet printers to meet most high-quality printing needs.

EPSON 360 dpi Ink Jet Paper (A4) S041059
S041025

EPSON 360 dpi Ink Jet Paper (Letter) S041060
S041028

EPSON Premium Ink Jet Plain Paper (A4) S041214

EPSON Photo Quality Ink Jet Paper (A4) S041061
S041026

EPSON Photo Quality Ink Jet Paper (Letter) S041062
S041029

EPSON Photo Quality Ink Jet Paper (Legal) S041067
S041048

EPSON Photo Quality Ink Jet Cards (A6) S041054

EPSON Photo Quality Ink Jet Cards (5 × 8") S041121

EPSON Photo Quality Ink Jet Cards (8 × 10") S041122

EPSON Photo Quality Self Adhesive Sheets (A4) S041106

EPSON Ink Jet Note Cards A6
(with envelopes) S041147

EPSON Ink Jet Greeting Cards 5 × 8" (with envelopes)	S041148
EPSON Ink Jet Greeting Cards 8 × 10" (with envelopes)	S041149
EPSON Photo Quality Glossy Film (A4)	S041071
EPSON Photo Quality Glossy Film (Letter)	S041072
EPSON Photo Quality Glossy Film (A6)	S041107
EPSON Ink Jet Transparencies (A4)	S041063
EPSON Ink Jet Transparencies (Letter)	S041064
EPSON Photo Paper (A4)	S041140
EPSON Photo Paper (Letter)	S041141
EPSON Photo Paper (4 × 6")	S041134
EPSON Photo Paper (100 × 150 mm)	S041255
EPSON Photo Paper (200 × 300 mm)	S041254
EPSON Photo Paper Cards (A4)	S041177
EPSON Photo Stickers 16 (A6)	S041144
EPSON Photo Stickers 4 (A6)	S041176
EPSON Panoramic Photo Paper (210 × 594 mm)	S041145
EPSON Iron-On Cool Peel Transfer Paper (A4)	S041154
EPSON Iron-On Cool Peel Transfer Paper (Letter)	S041153 S041155
EPSON Matte Paper-Heavyweight (A4)	S041256 S041258 S041259
EPSON Matte Paper-Heavyweight (Letter)	S041257

Note:

The availability of special media varies by location.

Appendix A

Tips for Color Printing

Basics of ColorA-2
Image Resolution and Image SizeA-5
Guidelines for Using ColorA-7

Basics of Color

This section describes the basic properties of color, the relationships between colors, and how to use color to improve the quality of your printed documents.

Properties of color

Color is composed of three properties: hue, saturation, and brightness.

Hue

The name of the color, such as red, blue, or violet. The circle that represents the relationship between all hues is called the hue circle.

Saturation

The vividness of the color. This represents the amount of gray in proportion to the hue.

Brightness

The relative lightness or darkness of the color.

The method for representing these properties is called the Munsell renotation color system. The hue circle and the Munsell renotation color system are useful to understand the properties of color. See also the *Color Guide*.

Synchronizing monitor colors and printer colors

Your Stylus Scan produces images by printing tiny patterns of ink dots on paper. It uses the colors cyan (C), magenta (M), yellow (Y), and black (K) to create a blending effect that makes you think you are seeing millions of colors. This type of color, produced by pigments that absorb some colors of light and reflect others, is called subtractive.

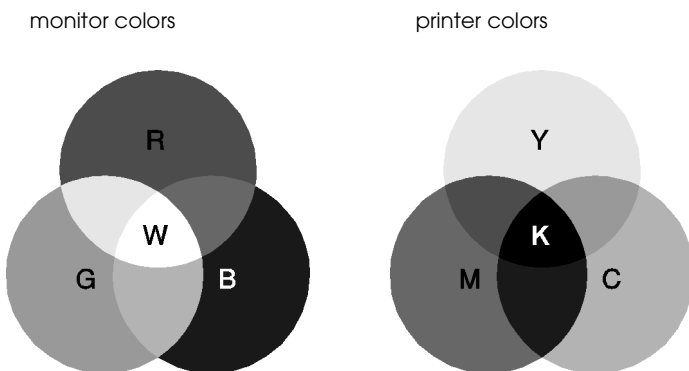
Note:

In theory, pure cyan, magenta, and yellow should produce black, but actually they produce a muddy brown and must be combined with black ink to produce a true black (K).

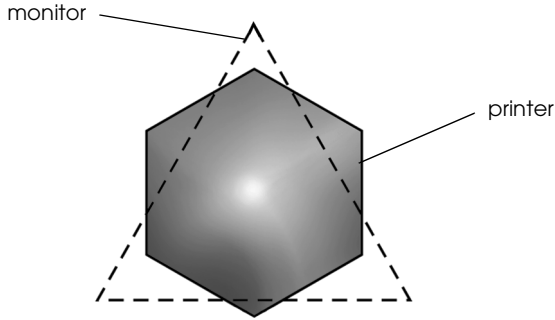
A cathode-ray tube (CRT) monitor produces images by illuminating color phosphors on the screen with an electron gun. (A phosphor is a substance that gives off light when irradiated.) Each screen point (pixel) has three colored phosphors: red (R), green (G), and blue (B).

Since the Stylus Scan and monitor produce color images differently, and the available range of color produced by the monitor and Stylus Scan are different, the image on the screen does not exactly match your printed output all of the time. If you want to adjust, or calibrate, the printed color to more closely match the on-screen color, you may have to experiment with the printer driver settings.

Additionally, color management software is available from a variety of software and monitor companies to help you match colors produced by your monitor and Stylus Scan. See your image-editing software documentation for information on color matching.



The range of colors that can be displayed:

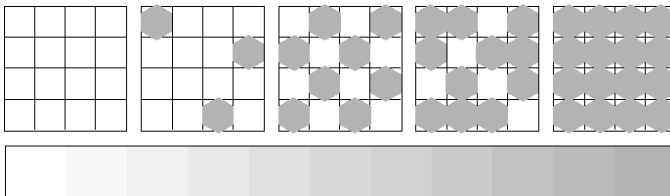


Note:

When printing a scanned image, you may find it more difficult to match colors. Because scanners create the original image data using CMYK, the data format of your image will be changed twice.

Process of color printing

A printer produces color images by printing tiny patterns of ink dots using CMYK colors as mentioned in the previous section. Because most ink jet printers are not able to print different gradations of the three primary colors, they must use a halftoning method in order to represent millions of colors or the gradation of colors. This method is shown in the image below.



Dithering and error diffusion are the most commonly used halftoning methods.

Dithering

Dithering uniformly aligns individual dots of different colored inks to create the appearance of natural colors. This method is suitable for printing documents that contain large areas of solid color, such as bar charts and graphs.

Error diffusion

Error diffusion blends individual colored dots with the colors of the surrounding dots to create the appearance of natural colors. By blending colored dots, the printer can achieve excellent colors and subtle color gradation. This method is best suited for printing documents that contain detailed graphics or photographic images.

Image Resolution and Image Size

The resolution of your original image affects the quality of your printouts. Generally, the higher the resolution, the better the print quality. However, keep in mind that the higher the resolution, the longer the wait for processing and printing a document.

Generally, the printed image size is in inverse proportion to the image resolution, as shown below. The larger the image size, the lower the image resolution. Conversely, the smaller the image size, the higher the image resolution.

Note:

Some applications have a function that can correct this relationship.

300 pixel



Print
225 pixel →



300 dpi

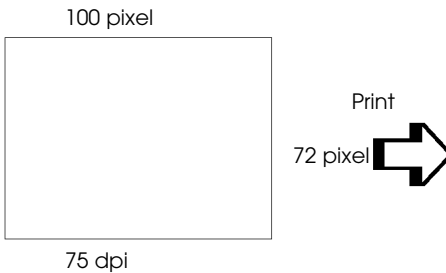
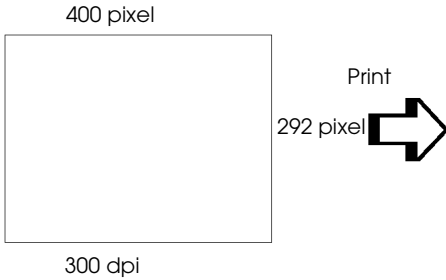
300 pixel



Print
225 pixel →



150 dpi



Since increasing the image size means decreasing the image resolution, you must take care that print quality or color tone is not degraded when working with images pasted into documents created with word processing software. To avoid print quality and color tone problems, change the size and the resolution of the image in your graphics application before pasting it into your document.

Guidelines for Using Color

To help you use color to maximize your document's impact on its readers, determine the who, what, when, where, why, and how of color printing.

Know WHO your readers are and WHAT your purpose is

Your documents are intended to communicate information, opinions, or feelings to one or more people and also to get results. Therefore, first you need to think about who is going to see your work—will it be a customer, a co-worker, or some other person? Also, you should consider what your purpose is—do you wish to advise, sell, or propose, or do you have some other purpose.

For example:

A marketing proposal with generous quantities of bright, fluorescent colors might fail to impress a conservative accounting firm, yet win over a music video company.

Know WHEN to use color

While color can enhance any document, you need to decide when color helps expand the reader's understanding of your message and when it distracts the reader. Sometimes a serious business message is best delivered without additional colors. (Remember that white and black are colors, too.)

For example:

A job offer letter to a prospective employee works best in black and white, while a list of safety rules benefits from attention-getting color.

Decide WHERE color will most benefit your document

If you use color on every page or all over a page, you may lose not only the impact of color, but also the clarity and readability of your work. When used consistently and strategically, color breaks up the monotony of black-and-white text reading.

Note:

- Avoid placing too many color pictures, tables, or icons on a page.*
- Size your color images so that they do not overpower text or graphics.*

- ❑ *Avoid using too much colored text. It is more difficult to read than black-on-white or white-on-black text.*

Know WHY you are using color

Color adds interest and clarity, and makes documents appear easier to understand. Just as you use fonts and graphics to create appeal and capture attention, color provides an additional visual interpretation of a document that influences the reader.

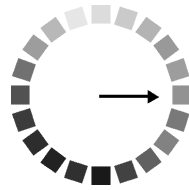
For example:

An overhead presentation of sales results by territory is far more interesting and memorable if you show the figures with colored charts and graphs.

Know HOW to select colors

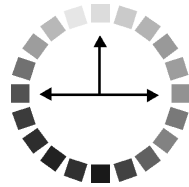
Determine a rule for using color throughout the document. Follow the rules below to make your document more appealing and effective.

- ❑ Use just one hue in the hue circle to make your document unified. Modify saturation or brightness to add interest.

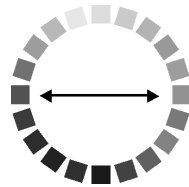


or

Use contrasting hues to make your work more eye-catching.



- ❑ Do not use complementary colors in documents.



Note:

See the Color Guide for details on the hue circle.

Appendix B

Product Specifications

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Printing

Printing method	On-demand ink jet
Nozzle configuration	Monochrome (black) 144 nozzles Color (cyan, magenta, yellow) 144 nozzles (48 (each color) × 3)
Resolution	Maximum 1440 dpi × 720 dpi
Print direction	Bidirectional with logic seeking
Control code	ESC/P raster EPSON Remote
Input buffer	64 KB

Paper

Note:

Since the quality of any particular brand or type of paper may be changed by the manufacturer at any time, EPSON cannot attest to the quality of any non-EPSON brand or type of paper. Always test samples of paper stock before purchasing large quantities or printing large jobs.

Paper specifications

Single sheets:

Size	A4 (210 mm × 297 mm) A5 (148 mm × 210 mm) B5 (182 mm × 257 mm) Letter (216 mm × 279 mm) Half letter (139.7 mm × 215.9 mm) Legal (216 mm × 356 mm) Executive (184.2 mm × 266.7 mm)
Paper types	Plain bond paper, special papers distributed by EPSON
Thickness (for plain bond paper)	0.08 mm to 0.11 mm (0.003 to 0.004 inch)
Weight (for plain bond paper)	64 g/m ² (17 lb) to 90 g/m ² (24 lb)

Envelopes:

Size	No. 10 (104 mm × 240 mm) DL (110 mm × 220 mm) C6 (114 mm × 162 mm) 132 mm × 220 mm
Paper types	Plain bond paper, air mail
Thickness	0.16 mm to 0.52 mm (0.006 to 0.02 inch)
Weight	45 g/m ² (12 lb) to 75 g/m ² (20 lb)

Index cards:

Size	A6 (105 mm × 148 mm) 5 × 8" (127 mm × 203 mm) 10 × 8" (254 mm × 203 mm)
Paper types	Special papers distributed by EPSON

Transparencies, glossy film:

Size	A4 (210 mm × 297 mm) Letter (216 mm × 279 mm) A6 (105 mm × 148 mm)* * for glossy film
Paper types	Special papers distributed by EPSON

Self adhesive sheets:

Size	A4 (210 mm × 297 mm)
Paper types	Special papers distributed by EPSON

Photo paper:

Size	A4 (210 mm × 297 mm) Letter (216 mm × 279 mm) 4 × 6" (102 mm × 152 mm) Panoramic (210 mm × 594 mm) 100 mm × 150 mm 200 mm × 300 mm
Paper types	Special papers distributed by EPSON

Photo Stickers:

Size	A6 (105 mm × 148 mm) with 4 or 16 frames
Paper types	Special paper distributed by EPSON

Matte Paper-Heavyweight:

Size	A4 (210 mm × 297 mm) Letter (216 mm × 279 mm)
Paper types	Special papers distributed by EPSON

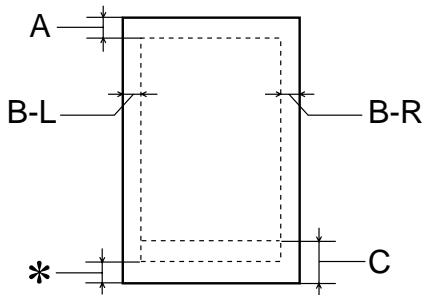
Note:

- ❑ *Poor quality paper may reduce print quality and cause paper jams or other problems. If you encounter problems, switch to a higher grade of paper.*

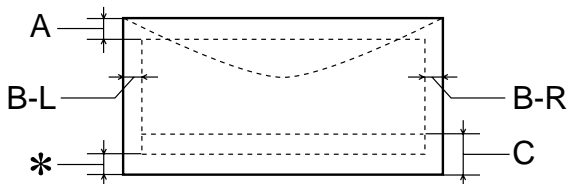
- ❑ *Do not load curled or folded paper.*
- ❑ *Use paper under normal conditions:*
 Temperature 15 to 25°C (59 to 77°F)
 Humidity 40 to 60% RH
- ❑ *EPSON Photo Quality Glossy Film and Self Adhesive Sheets should be stored under the following conditions:*
 Temperature 15 to 30°C (59 to 86°F)
 Humidity 20 to 60% RH

Printable area

Single sheets (including panoramic size) and index cards



Envelopes



- A: The minimum top margin is 3.0 mm (0.12").
When loading multiple sheets of EPSON Photo Quality Glossy Film, the minimum top margin is 30.0 mm (1.2").
- B-L: The minimum left margin is 3.0 mm (0.12").
- B-R: The minimum right margin is as follows:
3.0 mm (0.12") for single sheets and C6 envelopes.
7.0 mm (0.28") for DL envelopes.
28.0 mm (1.10") for No. 10 envelopes.
- C: The minimum bottom margin is 14.0 mm (0.55").
- *: You can extend the minimum bottom margin to 3 mm by selecting Maximum as the Printable Area setting on the printer driver's Paper menu (for Windows) or in the Page Setup dialog box (for Macintosh). However, print quality may decline in the expanded area. Before printing large jobs using this setting, print a single sheet to confirm printout quality.

Note:

Always load paper into the paper feeder short edge first. Load envelopes flap edge first with the flap side down.

Mechanical

Paper feed method	Friction
Paper path	paper feeder, rear entry
paper feeder capacity	About 100 sheets at 64 g/m ² (17 lb) paper
Dimensions	Storage Width: 437 mm (17.2 inches) Depth: 383 mm (15.1 inches) Height: 300 mm (11.8 inches) Printing Width: 437 mm (17.2 inches) Depth: 618 mm (24.3 inches) Height: 300 mm (11.8 inches)
Weight	7.5 kg (16.5 lb) without the ink cartridges

Ink Cartridges

Black ink cartridge (S020189)

Color	Black
Print capacity*	900 pages (A4, text at 360 dpi)
Cartridge life	2 years from production date (within 6 months after opening package, at 25°C (77°F))
Temperature	Storage: -20 to 40°C (-4 to 104°F) 1 month at 40°C (104°F) Transit: -30 to 60°C (-22 to 140°F) 1 month at 40°C (104°F) 120 hours at 60°C (140°F) Freezing:** -16°C (3.2°F)
Dimensions	27.8 mm (W) × 52.7 mm (D) × 38.5 mm (H)

Color ink cartridge (020191)

Color	Cyan, Magenta, and Yellow
Print capacity*	300 pages (A4, 360 dpi, 5% duty each color)
Cartridge life	2 years from production date (within 6 months of opening the package at 25°C (77°F))
Temperature	Storage: -20 to 40°C (-4 to 104°F) 1 month at 40°C (104°F) Transit: -30 to 60°C (-22 to 140°F) 1 month at 40°C (104°F) 120 hours at 60°C (140°F) Freezing:** -18°C (-0.4°F)
Dimensions	42.9 mm (W) × 52.7 mm (D) × 38.5 mm (H)

* The print capacity may vary, depending on how often you use the print head cleaning function and how often you use the Stylus Scan.

** Ink thaws and is usable after approximately 3 hours at 25°C (77°F).



Caution:

- ❑ *EPSON recommends the use of original EPSON ink cartridges only. Other products not manufactured by EPSON may cause damage to your Stylus Scan not covered by EPSON's warranties.*
- ❑ *Do not use an ink cartridge if the date on the package has expired.*

Scanning

Scanner type:	Sheet Feed color image scanner (without ADF)
Photoelectric device:	Color CCD line sensor
Effective pixels:	2550 × 4200 pixels (300 dpi)
Document size:	8.5 × 14" (216 × 355.6 mm) (The reading area can be specified from your software.)
Scanning resolution:	300 dpi (main) 600 dpi (sub)
Output resolution:	50 to 4800 dpi
Color separation:	RGB color filters on CCD
Image data:	12 bits per pixel per color internal 8 bits per pixel per color external
Brightness:	7 levels
Line Art settings:	Fixed threshold Text Enhancement Technology
Halftoning process:	AAS (Auto Area Segmentation)
Gamma correction:	Printer 3 level (A, B, C) User defined 1 level
Interface:	USB 1.0 + IEEE1284.4
Light source:	White cold cathode fluorescent lamp
Reliability:	Main unit: Life 10,000 page Lamp: Life 10,000 hour

Electrical

	120V Model	220–240V Model
Input voltage range	99 to 132V	198 to 264V

Rated frequency range	50 to 60 Hz	
Input frequency range	49.5 to 60.5 Hz	
Rated current	0.6 A	0.4 A
Power consumption	Approx. 29 W (ISO10561 Letter Pattern)	

Note:

Check the label on the back of the EPSON Stylus Scan for the voltage information.

Environmental

Temperature	Operation: 10 to 35°C (50 to 95°F) Storage: -20 to 40°C (-4 to 104°F) 1 month at 40°C (104°F) Transit: *-20 to 60°C (-4 to 140°F) 120 hours at 60°C (140°F)
Humidity	Operation: 20 to 80% RH Storage: *,** 5 to 85% RH

* Stored in shipping container

** Without condensation

Initialization Methods

The scanner can be initialized (returned to a fixed set of conditions) in the following ways:

- Hardware initialization: This scanner is initialized when turning the Stylus Scan power on. When scanner is initialized, the following actions are performed.
- a) Initializes scanner mechanism.
 - b) Clears input/output data buffer.
 - c) Sets default values.
- Software initialization: The ESC @ command also initializes the Stylus Scan. When Stylus Scan is initialized, the following actions are performed.
- a) Clears input/output data buffer.
 - b) Sets default values.
- Operator initialization: This scanner is recognized the INIT (negative pulse) of parallel interface. When Stylus Scan is initialized, the following actions are performed.
- a) Clears input/output data buffer.
 - b) Sets default values.

Safety Approvals

Safety standards:

U.S. model	UL 1950 with D3 CSA C22.2 No.950
European model	EN60950 (VDE)

EMC:

U.S. model	FCC part 15 subpart B class B
European model	EN 55022 (CISPR Pub. 22) class B EN 50082-1 IEC 801-2 IEC 801-3 IEC 801-4 EN 61000-3-2 EN 61000-3-3
Australian model	AS/NZS 3548 class B

Interface Specifications

Your Stylus Scan is equipped with an 8-bit parallel interface and a USB interface.

Parallel interface

The built-in parallel interface has the following characteristics.

Forward channel

Data format	8-bit parallel, IEEE-1284 compatibility mode, IEEE-1284 ECP mode
Synchronization	See the IEEE-1284 specification
Handshake timing	See the IEEE-1284 specification
Signal level	IEEE-1284 Level 1 device
Connector	57-30360 Amphenol connector or equivalent

Reverse channel

Transmission mode	IEEE-1284 Nibble mode, IEEE-1284 ECP mode
Adaptable connector	57-30360 Amphenol connector or equivalent
Synchronization	See the IEEE-1284 specification
Handshaking	See the IEEE-1284 specification
Signal level	IEEE-1284 Level 1 device
Data transmission timing	See the IEEE-1284 specification

USB interface

The EPSON Stylus Scan's built-in USB interface is based on the standards specified in the Universal Serial Bus Specifications Revision 1.0 and the Universal Serial Bus Device Class Definition for Printing Devices Version 1.0. This interface has the following characteristics.

Standard	Based on Universal Serial Bus Specifications Revision 1.0, Universal Serial Bus Device Class Definition for Printing Devices Version 1.0
Bit rate	12 Mbps (full speed device)
Data encoding	NRZI
Adaptable connector	USB Series B
Recommended cable length	2 meters

Optional USB Cable

The specifications below apply to the optional USB cable (C83623*).

USB Series A (4-pin) Plug Connector

USB Series B (4-pin) Plug Connector

1.8 meters long

System Requirements

For PCs

To use your EPSON Stylus Scan, you need Microsoft® Windows® 95, or Windows® 98, a CD-ROM drive, and a shielded, twisted-pair parallel cable. If you want to connect your Stylus Scan to a USB port, you need a Windows 98 pre-installed PC equipped with a USB port; and a shielded USB cable.

Your computer should also meet the following system requirements.

Minimum System Requirements	Recommended System
i486/25 MHz for Windows 95 i486/66 MHz for Windows 98	Pentium or higher processor
32 MB RAM	32 MB RAM or more for Windows 95 and 98
50 MB hard disk space for Windows 95, and 98	50 MB or more free disk space for Windows 95, and 98
VGA size, 16 bit color	SVGA or better 24 bit color

Your computer dealer can help you update your system if it does not meet these requirements.

For Macintosh computers

To connect the Stylus Scan to Apple® Macintosh® computers, you must use a shielded USB cable.

Applicable computer models

Macintosh with USB interface provided standard.

Your Macintosh must also meet the following system requirements.

Note:

Macintosh can be connected to the Stylus Scan by using a USB cable only.

Minimum System Requirements	Recommended System
System 8.1 + iMac update	System 8.5.1 or later
7 MB of available memory 12 MB of available memory when background printing is turned on.	14 MB or more of available memory 23 MB of available memory when background printing is turned on.

Note:

- ❑ *The included software cannot be used with the Multiple Users function in MacOS 9, if you have logged in from a “Limited” or “Panels” user account.*
- ❑ *The amount of available memory varies according to the number and kind of applications that are open. To see how much memory is available, choose About This Computer from the Apple menu and refer to the memory size (listed in kilobytes) under “Largest Unused Block” (1,024K=1 MB).*
- ❑ *The memory requirements above are for printing on Letter size paper. These requirements may vary depending on the size of the paper, the type of application you are using, and the complexity of the document you want to print.*

In addition to these system and memory requirements, you need 10 MB of free hard disk space to install your printer software. To print, you also need extra hard disk space amounting to about twice the size of the file you want to print.

Glossary

The following definitions apply specifically to printers.

application

A software program that helps you carry out a particular task, such as word processing or financial planning.

ASCII

American Standard Code for Information Interchange. A standardized coding system for assigning numerical codes to letters and symbols.

banding

The horizontal lines that sometimes appear when printing graphics. This occurs when the print head is misaligned. See also *MicroWeave*.

bit

A binary digit (0 or 1), which is the smallest unit of information used by a printer or computer.

brightness

The lightness or darkness of an image.

buffer

The portion of the printer's memory used to store data before printing it.

byte

A unit of information consisting of eight bits.

characters per inch (cpi)

A measure of the size of text characters, sometimes referred to as pitch.

CMYK

Cyan (blue-green), magenta, yellow, and black. These colored inks are used to create the subtractive system array of printed colors.

color matching

A method of processing color data so that colors displayed on a computer screen closely match colors in printouts. A variety of color-matching software is available. See also *ColorSync*.

ColorSync

Macintosh software that is designed to help you get WYSIWIG (what you see is what you get) color output. This software prints colors as you see them on your screen.

cpi

See *characters per inch*.

default

A value or setting that takes effect when the equipment is turned on, reset, or initialized.

dithering

A halftoning method in which dots are arranged in an orderly pattern. Dithering works best for printing images with solid colors, such as charts and graphs. See also *halftoning*.

DMA

Direct Memory Access. A data transfer feature that bypasses a computer's CPU and allows direct communication between a computer and peripheral devices (like printers), and between one peripheral device and another.

dpi

Dots per inch. The dpi measures the resolution. See also *resolution*.

drive

A memory device, such as CD-ROM, hard disk, or floppy disk. In Windows, a letter is assigned to each drive for easy management.

driver

A software program that sends instructions to a computer peripheral to tell it what to do. For example, your printer driver accepts print data from your word processor application and sends instructions to the printer on how to print this data.

economy printing

Printing in which images are printed with fewer dots to save ink.

error diffusion

Error diffusion blends individual colored dots with the colors of the surrounding dots to create the appearance of natural colors. By blending colored dots, the printer can achieve excellent colors and subtle color gradation. This method is best suited for printing documents that contain detailed graphics or photographic images.

ESC/P

Abbreviation for EPSON Standard Code for Printers, the system of commands your computer uses to control your printer. It is standard for all EPSON printers and supported by most application software for personal computers.

Finest detail

This printer driver setting automatically makes your printout sharper and clearer, especially for text. Be aware that this may increase the time required for printing.

font

A style of type designated by a family name.

grayscale

A scale of shades of gray from black to white. Grayscale is used to represent colors when printing with black ink only.

halftones

Patterns of black or colored dots used to reproduce an image.

halftoning

Method of using dot patterns to represent an image. Halftoning makes it possible to produce varying shades of gray using only black dots, or a nearly infinite array of colors using only a few colors of dots. See also *halftones*.

high speed printing

Printing in which images are printed in both directions. This provides faster printing.

initialization

Returns the printer to its defaults (fixed set of conditions). This happens every time you turn on the printer or reset the printer.

ink cartridge

Contains the ink your printer uses when printing.

ink jet

A method of printing in which each letter or symbol is formed by precisely spraying ink onto paper.

interface

The connection between the computer and the printer. A parallel interface transmits data one character or code at a time. A serial interface transmits data one bit at a time.

interface cable

The cable that connects the computer and the printer.

local printer

The printer connected to the computer's port directly by interface cable.

media

Materials upon which data is printed, such as envelopes, plain paper, special paper, and transparency film.

memory

The part of the printer's electronic system that is used to store information (data). Some information is fixed and is used to control how the printer operates. Information that is sent to the printer from the computer is stored in memory temporarily. See also *RAM* and *ROM*.

MicroWeave

Printing in which images are printed in finer increments to reduce the possibility of banding and to produce laser-like images. See also *banding*.

monochrome

This means printing with only one color of ink, which is generally black ink.

nozzle

Fine tubes in the print head through which ink is sprayed on the page. Print quality may decline if the print head nozzles are clogged.

operation check

A method for checking the operation of the printer. When you perform a printer operation check, the printer prints the ROM version, code page, ink counter code, and a nozzle check pattern.

parallel interface

See *interface*.

port

An interface channel through which data is transmitted between devices.

printable area

The area of a page on which the printer can print. It is smaller than the physical size of the page due to margins.

printer driver

A software program that sends commands for using the features of a particular printer. Often shortened to "driver".

print queue

If your printer is connected to a network, print jobs that are sent to the printer while it is busy are stored in a waiting line, or print queue, until they can be printed.

RAM

Random Access Memory. The portion of the printer's memory used as a buffer and for storing user-defined characters. All data stored in RAM is lost when the printer is turned off.

reset

To return a printer to its defaults by turning the printer off and then back on.

resolution

The number of dots per inch used to represent an image.

ROM

Read Only Memory. A portion of memory that can only be read and cannot be used for data storage. ROM retains its contents when you turn off the printer.

RGB

Red, green, and blue. These colors, in phosphors irradiated by the computer monitor's electron gun, are used to create the additive array of screen colors.

spool

The first step in printing, in which the printer driver converts the print data into codes that your printer understands. This data is then sent to the printer directly or to the print server.

spool manager

The software program that converts print data into codes that your printer understands. See also *spool*.

StatusMonitor

The software program that allows you to check the printer's status.

subtractive colors

Colors produced by pigments that absorb some colors of light and reflect others. See also *CMYK*.

USB interface

Universal Serial Bus interface. Enables the user to connect up to 127 peripheral devices (such as keyboards, mice, and printers) to the computer through a single, general purpose port. The use of USB hubs allows you to add additional ports. See also *interface*.

WYSIWIG

What-you-see-is-what-you-get. This term is used to describe printout that looks exactly like it appears on screen.