




Paintbrush Concepts






Click a folder or topic title. Or to read in the recommended order click the >> button.

-  [What Is Paintbrush?](#)
-  [The Paintbrush Window](#)
-  [Drawing](#)
-  [Paintbrush Files](#)

Paintbrush Concepts



Click a folder or topic title. Or to read in the recommended order click the >> button.

-  What Is Paintbrush?
-  The Paintbrush Window
-  Drawing

[Drawing Size](#)

[Simple Drawings](#)

[Text](#)

[How to Edit a Drawing](#)

[Cutouts](#)

[Detail Work](#)





[Custom Colors](#)

-  Paintbrush Files

Paintbrush Concepts



Click a folder or topic title. Or to read in the recommended order click the >> button.

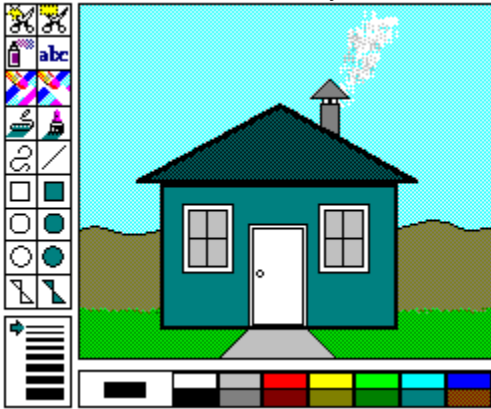
-  [What Is Paintbrush?](#)
-  [The Paintbrush Window](#)
-  [Drawing](#)
-  [Paintbrush Files](#)

[How Paintbrush Prints](#)

[File Formats](#)

What Is Paintbrush?

With Windows Paintbrush you can create simple or elaborate color drawings like the following:

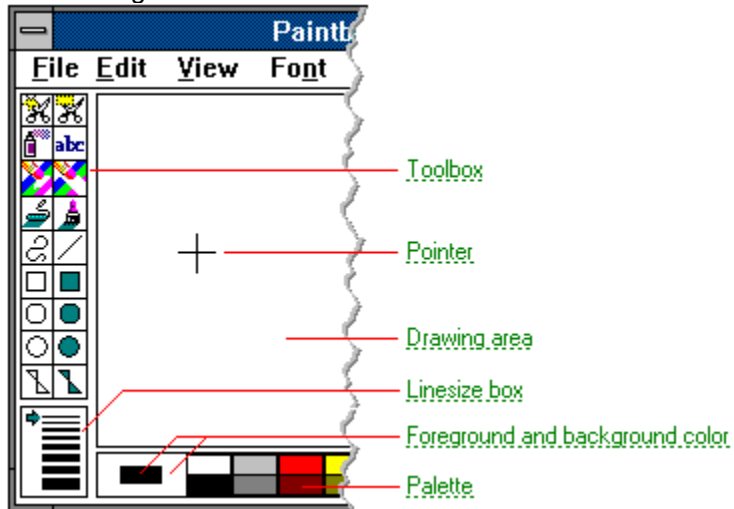


Before you begin drawing, take time to learn the parts of the [Paintbrush window](#). Then, try creating a [simple drawing](#). When you are ready, experiment with the drawing tools and the special features for [cutouts](#) and detail work.

The Paintbrush Window

You create, edit, and view your drawings in the Paintbrush window.

Click the green text below to read more about the Paintbrush window.



toolbox

Contains the tools you use to create your drawing. With the tools, you can draw, fill objects, paint, erase, and rearrange items in the drawing area. You can also enter text.

drawing area

The area in which you create your drawings. The standard size of your drawing area depends on your video display and the amount of free memory you have. You can change the size of the drawing area. If parts of your drawing are off the screen, you can enlarge the drawing area or use the scroll bars to bring them into view.

pointer

The object on the screen that follows the mouse's movement and indicates which area of the screen will be affected when you click the mouse button. Outside the drawing, the pointer is usually arrow-shaped. In the drawing, the pointer is usually cross-shaped. However, if you select the text tool, the pointer changes to an I-beam; if you select the Paint Roller, the pointer changes to a Paint Roller.

linesize box

Indicates the available line widths. The arrow points to the current width.

palette

Contains the colors and patterns available for the background of the drawing area and for drawing in the foreground.

foreground and background color

Colors used in a drawing's foreground and background. In this example, the foreground color (black) sits on top of the background color (white). The foreground color is the color you draw with. The background color is the color you draw on.

Drawing Size

The first time you start Paintbrush, it establishes a standard size for the drawing area. The size is based on your type of video display and the amount of memory available. You can change the standard drawing size.

For example, your standard drawing size may be 640 pels wide by 480 pels high. This is about 6.6 by 5 inches. You can change this to your paper size, probably about 8 inches wide and 10.5 inches high.

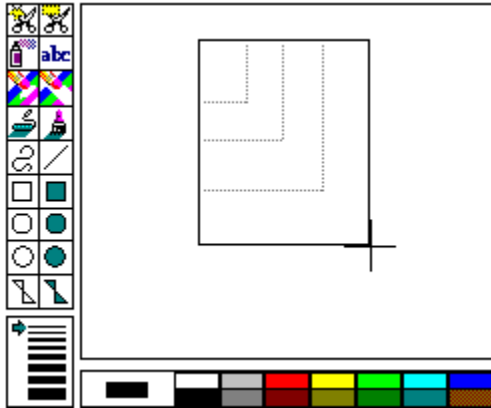
Large drawings use more memory, both RAM and disk space. If your picture will be smaller than the standard drawing size, it is best to reduce the drawing area size.



Related Procedure

Simple Drawings

The easiest way to begin a drawing is to select a drawing tool and then draw with it. For example, to draw a house, you might select the Box tool and drag the pointer through the drawing area to create a rectangle.



When you start Paintbrush, you draw with black on a white background. You can change the color you draw on (background color) and the color you draw with (foreground color).

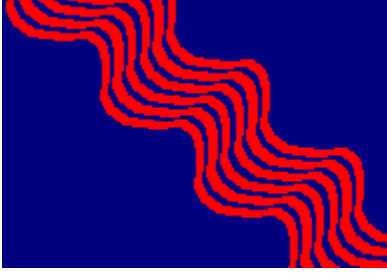
Related Procedures

Procedures

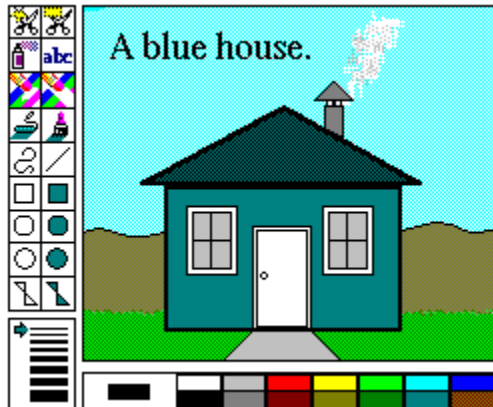
[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting and Using a Drawing Tool](#)




Text



You can add text to any drawing. The text can be any color, font, size, or style that Paintbrush supports. You can change these options or edit your text until you paste down the text.

When you type, Paintbrush does not automatically wrap text at the end of a line. You must press the ENTER key to move text to the next line. If you make a mistake, you can use the BACKSPACE key to correct it.

 Related Topics

Procedure

[Copying, Cutting, and Pasting Cutouts](#)

Tool

[Text Tool](#)

text color

A solid color. If you select a pattern or non-solid color for text, the text is drawn in the closest solid color.

font style

The graphic qualities of the text. You can make text **bold**, *italic*, and underlined. You can also put an outline or shadow around the text.

How to Edit a Drawing

Paintbrush provides a variety of tools and functions for changing your drawing. Until you paste down part of a drawing, you can edit it with the BACKSPACE key and the Undo command. After you paste it down, you have three other ways to change the drawing.

- Erase part of the drawing with the Eraser tool.
- Change colors with the Color Eraser tool.
- Define and work with a [cutout](#).



Related Topics

Procedure


[Editing Graphics](#)






Tools

[Eraser](#)

[Color Eraser](#)

Cutouts

A cutout is an area you define with the Pick tool or the Scissor tool.  Paintbrush provides several special effects for working with cutouts. You can use any combination of these to create custom drawings.

- You can cut, copy, and paste a cutout to and from the Clipboard. If the cutout is larger than the drawing area, you need to choose Zoom Out from the View menu before you paste the cutout.
- You can move a cutout within the drawing area.
- You can sweep a cutout. Sweeping leaves a trail of copies behind when you move the cutout.
-  You can flip a cutout horizontally or vertically.
-  You can shrink or enlarge a cutout to a different size.
-  You can tilt a cutout on an angle.
-  You can invert the colors in a cutout.
- You can save a cutout to a file.
- You can paste a cutout from a file.
-  Related Procedures

Procedures

[Copying, Cutting, and Pasting Cutouts](#)

[Displaying All of a Drawing](#)

[Flipping Cutouts](#)

[Inverting Colors in Cutouts](#)

[Moving Cutouts](#)

[Moving a Cutout and Leaving a Copy](#)

[Retrieving Cutouts](#)

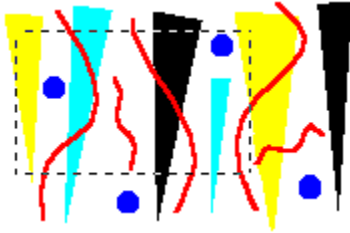
[Saving Cutouts](#)

[Shrinking and Enlarging Cutouts](#)

[Sweeping Cutouts](#)

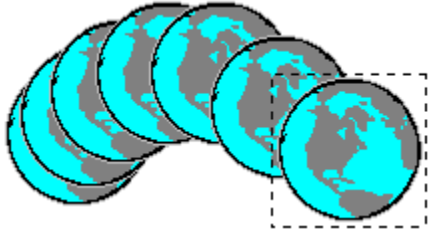
[Tilting Cutouts](#)

Use the Pick tool to define a rectangular cutout, as shown in the following:



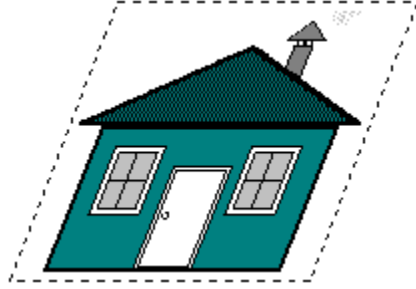
Use the Scissors tool to draw a cutout freehand, as shown in the following:













paste down

Make the most recent drawing or text permanent. The current drawing or text is pasted down when you do any of the following:

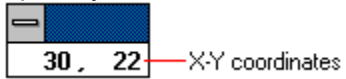
- Select a tool.
- Use a scroll bar.
- Open another application.
- Change the size of the window.
- Reposition the text insertion point when using the Text tool.

Once part of a drawing or text is pasted down, you cannot change it with the BACKSPACE key or the Undo command.

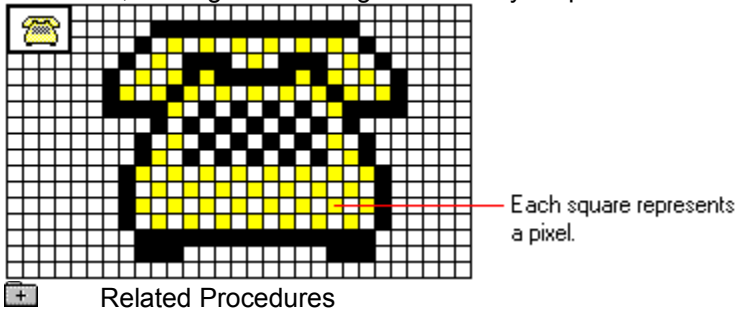
Detail Work

Paintbrush provides two ways to work with fine details in your drawing: the Cursor Position command and the Zoom In command.

You can use Cursor Position to see the x-y coordinates of the pointer. You can use the coordinates to place your lines or text accurately.



You can use Zoom In to magnify a portion of your drawing. You can then change your drawing one pixel at a time, making the finishing touches to your picture.

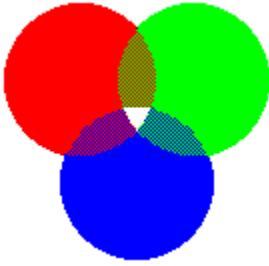



Procedures

[Editing with Zoom In](#)

[Using the Cursor Position Option](#)

Custom Colors



Every color and pattern in Paintbrush is made by mixing red, blue and green. Changing the mix of these primary colors creates a new color. 

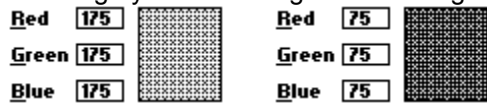
You can create custom colors and patterns by varying the amounts of red, green, and blue. You can change colors at any time. Changing a color while you are creating a drawing gives you a new color to use. It does not change the colors you have already used.

 Related Procedure

The following example shows the kind of colors you get by mixing red, green, and blue:



In a monochrome monitor, each of the numbers for red, green, and blue must always stay the same, although you can change them as a group as show in the following example:



How Paintbrush Prints

When Paintbrush prints a drawing, it preserves the proportions of the drawing. (Objects such as squares and circles do not become rectangles and ellipses on the printed page.)

When you print, you can tell Paintbrush to:

- Print all of the drawing.
 - Paintbrush can print either a draft or proof copy. You can also scale your drawing to a different size.
- Print part of the drawing.
- Add header or footer text to each page. This might be explanatory text, the date, a page number, or the filename.
- Adjust the margins for the picture.



Related Procedures

Procedures

[Printing Drawings](#)

[Printing Headers and Footers](#)

[Printing Part of a Drawing](#)

[Setting Margins](#)

draft

Describes an unenhanced copy of the drawing printed with the fastest printer speed.

proof

Describes a high quality copy of the drawing printed with the printer's advanced features.

File Formats

You can save your Paintbrush drawings in four bitmap formats or as Paintbrush files. Unless you change the setting, Windows automatically saves a new drawing in one of the bitmap formats. The standard bitmap format for your drawing depends of the type of display you have. Paintbrush saves an existing drawing that you open and edit in its original file format, unless you specify otherwise. The format options are:

- PCX (Paintbrush file)
- Monochrome bitmap
- 16 color bitmap
- 256 color bitmap
- 24-bit bitmap

You should save images in a bitmap format whenever possible. Doing this maintains compatibility with other Windows applications and with future versions of Windows.

- Related Procedure

Paintbrush Commands

Click a menu name or command.



File Edit View Font Style Size Pick Options

Paintbrush Commands

Click a menu name or command.



File	<u>E</u>dit	<u>V</u>iew	<u>F</u>ont	<u>S</u>tyle	<u>S</u>ize	<u>P</u>ick	<u>O</u>ptions
<u>N</u>ew							
<u>O</u>pen...							
<u>S</u>ave							
Save <u>A</u>s...							
Page <u>S</u>etup...							
<u>P</u>rint...							
<u>P</u>rinter Setup...							
<u>E</u>xit							

Paintbrush Commands

Click a menu name or command.



<u>F</u>ile	<u>E</u>dit	<u>V</u>iew	<u>F</u>ont	<u>S</u>tyle	<u>S</u>ize	<u>P</u>ick	<u>O</u>ptions
<u>U</u>ndo							
C<u>u</u>t							
<u>C</u>opy							
<u>P</u>aste							
<u>C</u>opy <u>T</u>o...							
<u>P</u>aste <u>F</u>rom...							

Paintbrush Commands

Click a menu name or command.



<u>F</u>ile	<u>E</u>dit	<u>V</u>iew	<u>F</u>ont	<u>S</u>tyl<u>e</u>	<u>S</u>ize	<u>P</u>ick	<u>O</u>ptions
		Zoom <u>I</u> n					
		Zoom <u>O</u> t					
		<u>V</u> iew Picture					
		<u>T</u> ools and Linesize Palette					
		<u>C</u> ursor Position					

Paintbrush Commands

Click a menu name or command.



<u>F</u> ile	<u>E</u> dit	<u>V</u> iew	Font	<u>S</u> tyle	<u>S</u> ize	<u>P</u> ick	<u>O</u> ptions
			Terminal				
			Helv				
			Courier				
			Tms Rmn				
			Symbol				
			Roman				
			Script				
			Modern				
			System				

Paintbrush Commands

Click a menu name or command.



<u>F</u> ile	<u>E</u> dit	<u>V</u> iew	<u>F</u> ont	<u>S</u> tyl <u>e</u>	<u>S</u> iz <u>e</u>	<u>P</u> ick	<u>O</u> ptions
				<u>N</u>ormal			
				<u>B</u>old			
				<u>I</u>tal<u>i</u>c			
				<u>U</u>nderline			
				<u>O</u>utline			
				<u>S</u>hadow			

Style menu commands affect text in the drawing area and text you type until you select a tool, use a scroll bar, open another application, or reposition the text cursor. Except for Normal, choosing a style again cancels the style.

Paintbrush Commands

Click a menu name or command.



<u>F</u> ile	<u>E</u> dit	<u>V</u> iew	<u>F</u> ont	<u>S</u> tyle	<u>S</u> ize	<u>P</u> ick	<u>O</u> ptions	
					6	24	44	66
					8	26	45	70
					10	28	48	72
					12	30	50	74
					15 *	32	52	75
					16 *	36	54	76
					18	37	56	78
					19	38	57	80
					20	40	60	84
					22	42	64	

Paintbrush Commands

Click a menu name or command.



<u>F</u> ile	<u>E</u> dit	<u>V</u> iew	<u>F</u> ont	<u>S</u> tyl <u>e</u>	<u>S</u> ize	<u>P</u> ick	<u>O</u> ptions
						<u>F</u> lip <u>H</u> orizontal	
						<u>F</u> lip <u>V</u> ertical	
						<u>I</u> nverse	
						<u>S</u> hrink + <u>G</u> row	
						<u>T</u> ilt	
						<u>C</u> lear	

Paintbrush Commands

Click a menu name or command.



New Command



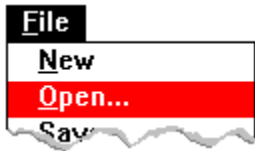
Creates a new drawing area.

The workspace for the new drawing uses the settings specified with the [Image Attributes command](#). In addition, if you selected a new background color, the New command displays it.

When you choose the New command, Paintbrush lets you save changes to the current drawing before creating a new drawing area.

- Related Procedure

Open Command



Opens an existing file.

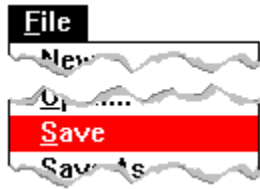
Choose the Info button to see the height, width, and number of colors and planes in the file.

Choose BMP, MSP, or PCX to find files in the selected format in the current directory.

When you choose this command, Paintbrush lets you save changes to the current drawing before opening a new file.

- Related Procedure

Save Command



Saves changes to the current drawing.

When you choose this command, the drawing remains open so you can continue working on it.

- Related Procedure

Save As Command



Saves a new drawing or existing drawing under another name.

You might want to rename a file so that you can change an existing file without modifying the original.

Unless you change the setting in the Save As dialog box, Paintbrush automatically saves a new drawing in the bitmap (.BMP) format. It saves a drawing that you open and edit in the same format that it was opened in. Choose Options to change the format of the drawing you want to save.

If you are concerned about the amount of disk space needed to store a drawing, you can choose the Info button to see the size of and number of colors in the drawing before you save it. The larger the size of the drawing and the more colors used, the more disk space it requires.

- Related Procedure

Page Setup Command



Sets the margins, and adds headers and footers to the printed drawing.

Use this command to position your drawing on the page when you print it. Otherwise, Paintbrush will use the standard margin settings when it prints the drawing.

When specifying headers or footers, type text or use the following codes:

Type	To do this
&d	Enter the current date.
&p	Enter page numbers.
&f	Enter the current filename.
&l	Justify the text that follows at the left margin.
&r	Justify the text that follows at the right margin.
&c	Center the text that follows in the top or bottom margin. This is the default.
&t	Enter the current time.

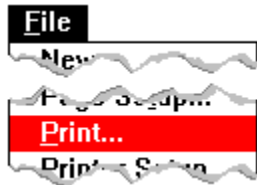
- Related Procedures

Procedures

[Printing Headers and Footers](#)

[Setting Margins](#)

Print Command



Prints a drawing.

You can specify:

- Draft or proof quality printing.
- Whole or partial printing of the drawing.
- Number of copies.
- Printing at printer resolution rather than screen resolution.

If you have connected and installed a printer, you can print the drawing. Paintbrush automatically prints with the default printer.

- Related Procedures

Procedures

[Installing New Printers](#)

[Printing Drawings](#)

Printer Setup Command

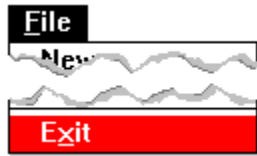


Sets printer options for Paintbrush before printing.

You can:

- Select a default printer for Paintbrush.
- Choose Setup and change options for the printer.
The available options depend on the type of printer selected.
- Related Procedure

Exit Command



Exits Paintbrush and closes the Paintbrush window.

If the drawing is unsaved, Paintbrush lets you save it before exiting.

Undo Command



Undoes the most recent drawing or editing action.

You can use Undo until you do any of these things:

- Select a tool.
- Use a scroll bar.
- Open another application.
- Resize the window.

As soon as you do any of these, Paintbrush pastes down the objects currently in the drawing area, and Undo no longer functions.

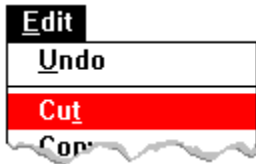
- Related Procedures

Procedures

[Editing Graphics with Undo](#)

[Editing with Zoom In](#)

Cut Command

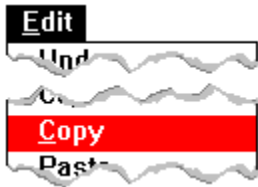


Removes a cutout from your drawing and places it onto the Clipboard, erasing the previous Clipboard contents.

Use Paste to place the cutout in another place in the current drawing, in another drawing, or in another application.

- Related Procedure

Copy Command



Copies a cutout from your drawing onto the Clipboard, erasing the previous Clipboard contents.

Use Paste to place the cutout in another place in the current drawing, in another drawing, or in another application.



Related Procedure

Paste Command



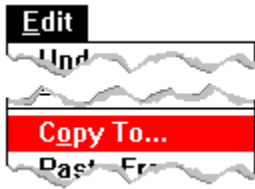
Pastes the Clipboard contents in the upper-left corner of the drawing.

Paste inserts the Clipboard contents into a box in the upper left-corner of the drawing. You can drag the box to another part of the drawing. To paste down the image in the box, click outside the box.



Related Procedure

Copy To Command



Saves a cutout in a file.

You can save a cutout as a Paintbrush file (.PCX) or as a bitmap file (.BMP). Unless you change the setting in the Save As dialog box, Windows automatically assigns the extension .BMP and saves your cutout as a Windows bitmap. Choose Options to specify the format in which you want to save the cutout.

If you are concerned about the amount of disk space needed to store a cutout, you can choose the Info button to see the size of and number of colors in the cutout before you save it. The larger the size of the cutout and the more colors used, the more disk space it requires.

- Related Procedure

Paste From Command



Retrieves a cutout from a file and places it in a drawing.

Select BMP, MSP, or PCX to find files in the selected format in the current directory.

If you're concerned about the amount of disk space a cutout uses, choose the Info button to see the height, width, and number of colors and planes in the cutout.

Paste From inserts the cutout into a box in the upper left-corner of the drawing. You can drag the box to another part of the drawing. To paste down the image in the box, click outside the box.

- Related Procedure


Zoom In Command



Magnifies part of a drawing so you can change a pixel at a time, or returns a drawing to normal resolution after you shrink it with Zoom Out.

When the drawing is at normal resolution and you choose Zoom In, the pointer changes to a rectangle. Click the rectangle over an area you want to display in detail.

The left mouse button changes a pixel to the foreground color. The right mouse button changes a pixel to the background color. Dragging changes a wide area of pixels.

Use the Paint Roller tool to change an area within the magnified area. 

In the small box in the upper-left corner of the drawing area, you can see how changes you make to the magnified area look at normal resolution.

- [Related Topics](#)

Procedures

[Displaying All of a Drawing](#)

[Editing with Zoom In](#)

Tool

[Paint Roller](#)

Zoom Out Command



Shrinks a drawing to fit the drawing area, or returns a drawing to normal resolution after you magnify it with Zoom In.

With Zoom Out, you can view a drawing that is larger than the drawing.

With Zoom Out, you can copy, cut, and paste cutouts; however, you can't use the drawing tools.

When you use Zoom Out to view a drawing, you might not see some of the line detail in the drawing. Generally, the larger the size of your original, the greater the amount of line detail that you lose when Paintbrush shrinks the drawing. You see this loss of detail only in the compacted version of the drawing. It does not affect your full-size drawing.

- Related Procedures

Procedures

[Copying, Cutting, and Pasting Cutouts](#)

[Displaying All of a Drawing](#)

[Editing with Zoom In](#)

View Picture Command

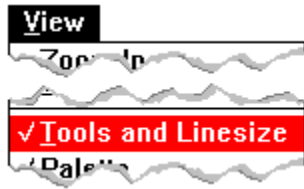


Removes everything but the drawing from the screen.

Use View Picture to view more of your drawing. Because the menus, Toolbox, Palette, Linesize box, and even the cursor disappear when you choose View Picture, you cannot edit your drawing in any way.

- Related Procedure

Tools and Linesize Command

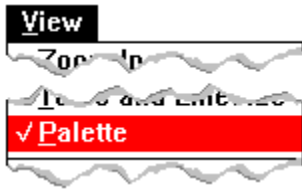


Removes the Toolbox and Linesize box from the Paintbrush window.

Use Tools and Linesize to view more of your drawing. You can still use the selected tool, drawing width, and color as well as the menu commands when the Toolbox and Linesize box are not visible on the screen.

- Related Procedure

Palette Command

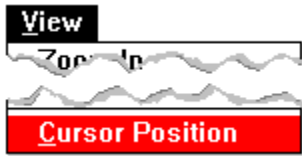


Removes the Palette from the Paintbrush window.

Use Palette to view more of your drawing. You can still use the selected tool, drawing width, and color as well as the menu commands when the Palette is not visible on the screen.

- Related Procedure

Cursor Position Command

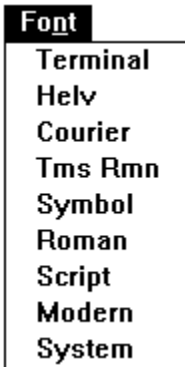


Displays the pointer position as x-y coordinates.

Use these width and height coordinates to align text or lines in your drawings. Cursor Position is particularly helpful when you create charts and tables.

- Related Procedure

Font Names



Changes text to a different font.

The Font menu lists all available fonts. When you choose a font name, the command changes the font of text in the drawing area and text you type until you select a tool, use a scroll bar, open another application, or reposition the text cursor.

- Related Procedure

Normal Command



Cancels bold, italic, underline, outline, and shadow character styles.

- Related Procedure

Bold Command



Makes text bold.

- Related Procedure

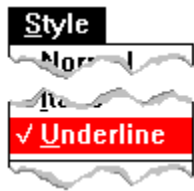
Italic Command



Italicizes text.

- Related Procedure

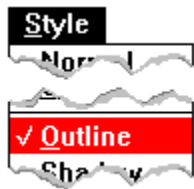
Underline Command



Underlines text.

- Related Procedure

Outline Command



Outlines text.

The outline is in the current background color.

- Related Procedure

Shadow Command



Creates a shadow around text.

The shadow is in the current background color.

- Related Procedure

Font Sizes

6	24	44	66
8	26	45	70
10	28	48	72
12	30	50	74
15 *	32	52	75
16 *	36	54	76
18	37	56	78
19	38	57	80
20	40	60	84
22	42	64	

Changes the size of text to the font size you choose from the menu.

The Size menu lists a range of point sizes for all the fonts. Font sizes available with the selected font appear in black. Font sizes that can't be used are dimmed. Font sizes followed by an asterisk are precision-drawn font sizes provided by a font file. Font sizes without an asterisk are font sizes that are scaled by Windows to approximate the size indicated.

The availability of point sizes depends on the resolution of your printer. If no printer is installed, the available point sizes are based on the screen resolution of your video display.

- Related Procedure

Flip Horizontal Command



Flips a cutout from side to side.

- Related Procedure

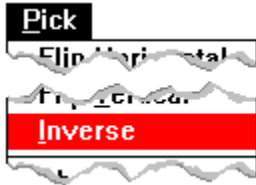
Flip Vertical Command



Flips a cutout from top to bottom.

- Related Procedure

Inverse Command

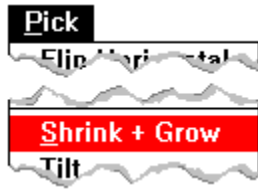


Inverts the colors in a cutout.

In a black and white drawing, black becomes white and white becomes black. In a color drawing, a color changes to its complementary color.

- Related Procedure

Shrink+Grow Command



Changes the size of a cutout.

When you choose this command, you drag a flexible box to define the new size of the cutout. The cutout shrinks or enlarges to fit the dimensions of the box. Before you choose this command, choose the [Clear command](#) to move the cutout instead of copying it.

- Related Procedure

Tilt Command



Tilts a cutout.

When you choose this command, you press and hold down the mouse button to anchor a flexible box, then move the mouse to tilt the cutout. The cutout will be defined by the flexible box. Before you choose this command, choose the [Clear command](#) to move the cutout instead of copying it.

- Related Procedure

Clear Command



Fills in the cutout area with the background color when you choose the Shrink+Grow or Tilt command. This has the effect of erasing the contents of the area.

Choose Clear before you choose Shrink+Grow or Tilt to move the original cutout to the area defined by the Shrink+Grow or Tilt commands. If you don't choose Clear, the original cutout remains intact.

- Related Procedures

Procedures

[Shrinking and Enlarging Cutouts](#)

[Tilting Cutouts](#)

Image Attributes Command



Specifies the settings for a new drawing.

With this command, you can specify the drawing size, the unit of measurement, and whether you want the drawing displayed in colors or black and white. Choose Default to return the drawing area to the original size.

The settings you specify take effect when you start a new drawing with the [New](#) command.

- Related Procedure

Brush Shapes Command



Changes the shape of the Brush tool.

When you choose this command, you see a dialog box with six choices of brush shapes. A faster way of opening this dialog box is to double-click the Brush tool in the Toolbox.

- Related Tool

Edit Colors Command



Creates a custom color and places it in the palette.

When you choose this command, three scroll bars are displayed in the dialog box. Move the scroll boxes to the left or right to vary the amounts of red, green, and blue (or RGB components) present in a color selected in the Palette.

You can change colors and patterns at any time. Changing colors and patterns in mid-drawing does not affect your drawing in any way other than to provide you with more color options.

- Related Procedure

Get Colors Command



Retrieves color palettes saved in a file.

Use this command to retrieve color palettes to which you've added custom colors.

Retrieve a color palette file as you would other Paintbrush files.

- Related Procedure

Save Colors Command



Saves color palettes in a file.

Use this command to save color palettes to which you've added custom colors.

Save a color palette file as you would other Paintbrush files. If you don't specify an extension, the extension .PAL is automatically assigned to the filename. If you specify an extension, it overrides any automatic extension.

- Related Procedure

Paintbrush Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Procedures

Click a folder or topic title.



- Creating Drawings
 - [Changing Default Settings for New Drawings](#)
 - [Starting New Drawings](#)
 - [Selecting Background and Foreground Colors](#)
 - [Selecting a Drawing Width](#)
 - [Selecting and Using a Drawing Tool](#)
 - [Editing Graphics](#)
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Procedures

Click a folder or topic title.



- Creating Drawings
- Viewing Drawings in Different Ways
 - [Showing the Entire Screen](#)
 - [Displaying All of a Drawing](#)
 - [Enlarging the Drawing Area](#)
 - [Editing with Zoom In](#)
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Procedures

Click a folder or topic title.



- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
 - [Copying, Cutting, and Pasting Cutouts](#)
 - [Moving Cutouts](#)
 - [Moving a Cutout and Leaving a Copy](#)
 - [Sweeping Cutouts](#)
 - [Saving Cutouts](#)
 - [Retrieving Cutouts](#)
 - [Flipping Cutouts](#)
 - [Tilting Cutouts](#)
 - [Shrinking and Enlarging Cutouts](#)
 - [Inverting Colors in Cutouts](#)
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
 - [Choosing Fonts and Font Sizes](#)
 - [Changing Text Styles](#)
 - [Entering Text](#)
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
 - [Creating Custom Colors](#)
 - [Saving and Retrieving Custom Color Files](#)
 - [Using the Cursor Position Option](#)
- Printing
- Working with Paintbrush Files

Paintbrush Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
 - [Printing Drawings](#)
 - [Printing Part of a Drawing](#)
 - [Changing Printers and Printer Options](#)
 - [Printing Headers and Footers](#)
 - [Setting Margins](#)
- Working with Paintbrush Files

Paintbrush Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

[Opening Existing Files](#)

[Using Microsoft Paint Files](#)

[Saving Existing Files](#)

[Saving New or Renaming Existing Files](#)

Changing Default Settings for New Drawings

When you start Paintbrush, it uses default settings. For example, Paintbrush establishes a standard size for a drawing area based on your type of video display and the amount of memory available. If you want to create a drawing that is larger or smaller than the standard size established by Paintbrush, you can change the standard drawing size.

To change default settings for a new drawing:

- 1 Choose Image Attributes from the Options menu.
- 2 Select the settings you want.

This setting	Specifies
Width	The drawing width.
Height	The drawing height.
Units	The unit of measurement you want to use when you enter the width and height of your drawing. Select inches (in), centimeters (cm), or <u>picture elements (pels)</u> .
Colors	Whether you work in color or black and white.
Default	That Paintbrush return the drawing area to the original size used to accommodate your video display.

- 3 Click OK.
- 4 Choose New from the File menu to start a drawing with the new settings.

Or double-click the Eraser tool in the Toolbox to start a new drawing.

Paintbrush now uses the new settings in the Image Attributes dialog box each time you start Paintbrush.

Keep in mind that the larger the drawing and the more colors you use, the more memory required. If you plan to print your drawing at printer resolution, be sure that you enter the correct dimensions (in pixels) for the printed drawing in the Image Attributes dialog box. Also, be sure that the dimensions you specify are in proportion to the current screen dimensions of the drawing. Because printing at printer resolution requires more memory, you cannot print as large a drawing as you can printing at screen resolution.

- Keyboard Procedure

Starting New Drawings

To start a new drawing:

- 1 Select [new background and foreground colors](#) for your drawing if you want to.
 - 2 [Change the default settings](#) for the drawing if you want to.
 - 3 Choose New from the File menu.
 - 4 [Select a tool and start drawing.](#)
- Keyboard Procedure

Selecting Background and Foreground Colors

You can change the foreground color at any time while creating a drawing. You can also change the background color at any time and, by doing so, create special effects with tools and commands that use the background color to draw.

To select a different background color:

- ▶ Point to the color in the Palette and click the right mouse button.

To set the background color for a new drawing:

- ▶ Choose New from the File menu.

To select a different foreground color:

- ▶ Point to the color in the Palette and click the left mouse button.
- Keyboard Procedure

Selecting a Drawing Width

The Linesize box in the lower-left corner of the Paintbrush window displays the available drawing widths. The top line represents a one-pixel width. The drawing width determines the width of an object you draw or the thickness of the border around the object. ■

To select a drawing width:

- ▶ Point to a width in the Linesize box and click the mouse button.
- Keyboard Procedure

example

If you are drawing a line, the selected drawing width determines the width of the line. If you are drawing a filled box, the selected drawing width determines the thickness of the border around the box. You might want to experiment with how different drawing widths work with different tools so that you can use them most effectively.

Selecting and Using a Drawing Tool

Before you begin working in the drawing area, you need to select the tool you want to work with from the Toolbox at the left of the Paintbrush window.

To select a drawing tool:

- ▶ Point to the Airbrush, Brush, or Paint Roller tool and click the mouse button.

To draw with a selected tool:

- 1 Move the pointer into the drawing area.
 - 2 Position the pointer where you want to start drawing.
 - 3 Drag the pointer through the drawing area.
If you are drawing an object such as a box or circle, the object expands and contracts, following the pointer's movements.
 - 4 Release the mouse button when you are finished drawing the object.
- Keyboard Procedure

Editing Graphics

If you make a mistake while drawing, you can use the Undo command on the Edit menu or the BACKSPACE key to make simple corrections.

To delete everything you have drawn since selecting a tool:

- ▶ Choose Undo from the Edit menu.

Using just BACKSPACE lets you delete a portion or all of what you have drawn since selecting the tool you are currently working with. BACKSPACE is particularly handy for small cleanup jobs such as deleting stray dots made by the Airbrush.

To delete a portion of what you have drawn since selecting a tool:

- 1 Press BACKSPACE.

The pointer turns into a square with an X inside. The size of the square depends on the selected drawing width.

- 2 Drag the pointer over parts of the drawing you want to delete.
- 3 Release the mouse button when you finish.
- 4 Press the mouse button again to continue drawing with the selected tool.

You can use Undo and BACKSPACE until you do any of these things:

- Select a tool.
- Use a scroll bar.
- Open another application.
- Resize the window.

Once you do any of these, Paintbrush pastes down the objects currently in the drawing area, and Undo and BACKSPACE no longer work. You must now use an eraser tool or select and edit a portion of your drawing called a cutout. ■

- Related Tool
- Keyboard Procedure

hint

To prevent undoing work that you are satisfied with, protect that section of your drawing from Undo and BACKSPACE by reselecting the tool you are currently working with or by taking one of the other actions in the previous list. Then Undo and BACKSPACE can delete only your most recent work.

Showing the Entire Screen

With the View Picture command, you can display as much of your drawing as fits on the entire screen by temporarily removing everything but your drawing. Because the menus, Toolbox, Palette, Linesize box, and even the cursor disappear when you choose View Picture, you cannot edit your drawing in any way.

To display your drawing on the entire screen:

- ▶ Choose View Picture from the View menu.
Or double-click the Pick tool in the Toolbox.
- To cancel View Picture, click the mouse button or press ESC.
- Related Procedure
- Keyboard Procedure

Displaying All of a Drawing

If you create a drawing that is larger than the drawing area and the entire screen, you can still view all of the drawing on the screen at one time.

To display all of a drawing that is larger than the drawing area:

- Choose Zoom Out from the View menu.

Zoom Out shrinks the drawing to fit the drawing area.

You can still [copy, cut, and paste cutouts](#); however, you can't use the drawing tools.

To cancel Zoom Out, choose Zoom In from the View menu or press ESC.

When you use Zoom Out to view a drawing, you might lose some of the line detail in the drawing.

Generally, the larger the size of your original, the greater the amount of line detail that you lose when Paintbrush shrinks the drawing. You see this loss of detail only in the compacted version of the drawing. It does not affect your full-size drawing.

- Related Procedure
- Keyboard Procedure

Enlarging the Drawing Area

You can remove the Toolbox, Linesize box, and Palette from the Paintbrush window to increase the size of the drawing area. You can still use the selected tool, drawing width, and color as well as the menu commands when the Toolbox, Linesize box, and Palette are not visible on the screen.

To remove the Toolbox and Linesize Box:

- Choose Tools and Linesize from the View menu.
To redisplay the Toolbox and Linesize box, choose Tools and Linesize again.

To remove the Palette:

- Choose Palette from the View menu.
To redisplay the Palette, choose Palette again.
- Related Procedures
- Keyboard Procedure

Procedures

[Displaying All of a Drawing](#)

[Showing the Entire Screen](#)

Editing with Zoom In

With the Zoom In command, you can magnify a portion of a drawing so you can make changes on a pixel-by-pixel basis.

To magnify a portion of a drawing and change a pixel at a time:

- 1 Choose Zoom In from the View menu.

The pointer changes to a movable rectangle.

- 2 Place the rectangle over the area you want to magnify.

- 3 Click the mouse button.

Paintbrush magnifies the portion of your drawing enclosed by the rectangle.

In the small box that appears in the upper-left corner of the drawing area, you can see your changes at normal resolution.

- 4 Point to pixels you want to edit and click either mouse button.

Clicking the left mouse button changes a pixel to the foreground color. Clicking the right mouse button changes a pixel to the background color. Dragging changes a wide area of pixels.

Use the Paint Roller tool to change an area within the magnified area. ■

- 5 Choose Zoom Out from the Edit menu when you finish.

Or choose Undo from the Edit menu to return to the normal resolution and cancel any changes made to your drawing.

- Related Tool
- Keyboard Procedure

hint

If you use the Paint Roller tool with a full-size drawing and the paint leaks through the border of an object and fills the drawing area, choose Undo and use Zoom In to patch the areas where the paint leaked through.

Copying, Cutting, and Pasting Cutouts

To copy and paste or cut and paste a cutout:

1 Use the Pick tool or Scissors tool to define the cutout.

2 Choose Copy from the File menu to copy the cutout.

Or choose Cut from the File menu to cut the cutout.

3 Open the file you want to paste the cutout in.

4 Choose Paste from the Edit menu.

You cannot paste a cutout larger than the current drawing area unless you have zoomed out to display your entire drawing. If you try, Paintbrush pastes only the part of the cutout showing in the drawing area.

5 Move the pointer inside the cutout.

If you are working in Zoom Out mode, the image will not appear inside the cutout frame.

6 Press the left mouse button to paste the cutout transparently.

Or press the right mouse button to paste the cutout opaquely.

If you are working in Zoom Out mode, you can only paste the cutout opaquely.

7 Drag the cutout where you want it.

8 Click outside the cutout to paste down the cutout.

If the drawing you are pasting to is in Zoom Out mode, the cutout frame may be hidden by the image boundaries. In that case, you may have to click the gray area just outside the drawing area to paste down the cutout.

- Related Tools
- Keyboard Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Moving Cutouts

To move a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Move the pointer inside the cutout.
 - 3 Press the left mouse button to paste the cutout transparently.
Or press the right mouse button to paste the cutout opaquely.
 - 4 Drag the cutout.
 - 5 Release the mouse button when the cutout is where you want it.
 - 6 Click outside the cutout to paste down the cutout.
- Related Tools
 - Keyboard Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Moving a Cutout and Leaving a Copy

To move a cutout and leave a copy behind:

- 1 Use the Pick tool or Scissors tool to define the cutout.
- 2 Move the pointer inside the cutout.
- 3 Press and hold down the SHIFT key.
- 4 Press the left mouse button to paste the cutout transparently.
Or press the right mouse to paste the cutout opaquely.
- 5 Drag the cutout.
- 6 Release SHIFT once you have moved the cutout away from the copy.
- 7 Release the mouse button when the cutout is where you want it.
- 8 Click outside the cutout to paste down the cutout.

- Related Tools

Tools

[Pick Tool](#)

[Scissors Tool](#)

Sweeping Cutouts

When you sweep a cutout, you move the cutout across the drawing area, leaving a trail of copies of the cutout behind.

To sweep a cutout across the drawing area:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Move the pointer inside the cutout.
 - 3 Press and hold down the CTRL key.
 - 4 Press the left mouse button to paste the cutout transparently.
Or press the right mouse button to paste the cutout opaquely.
 - 5 Drag the cutout.
 - 6 Release CTRL and the mouse button when you finish.
 - 7 Click outside the cutout to paste down the changes.
- Related Tools
 - Keyboard Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Transparent and Opaque Pasting and Sweeping

Whenever you paste or sweep a cutout, you have the option of pasting or sweeping transparently or opaquely. If you paste or sweep transparently, any part of your drawing covered by the cutout shows through. If you paste or sweep opaquely, the entire cutout area covers whatever part of the drawing is underneath it.

If you want to paste or sweep transparently, the background color for the cutout and the currently selected background color must be the same. Otherwise, the object you paste or sweep won't be transparent. ■

hint

If you want to sweep a cutout opaquely across the screen, you might want to define a freeform cutout. If you create a cutout that closely encircles the object you want to sweep, the shape that you sweep is only the defined object. If you define a rectangular cutout, you get the object inside a box of background color.

Saving Cutouts

You can save a cutout as a Paintbrush file (.PCX) or as a bitmap file (.BMP).

To save a cutout to a file:

- 1 Use the Pick tool or Scissors tool to define the cutout.
- 2 Choose Copy To from the Edit menu.
- 3 If you want to save the file in the current directory, type the filename.
If you want to save the file in a different directory, double-click its name in the Directories box. Then type the filename. ■
- 4 Choose Options to specify the format in which to save the cutout.
- 5 Click the Info button to see the height, width, and number of colors and planes in the cutout. Then click OK. ■
- 6 Click OK.
 - Related Topics
 - Keyboard Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Retrieving Cutouts](#)

Tools

[Pick Tool](#)

[Scissors Tool](#)

hint

If you are concerned about the amount of disk space needed to store a cutout, you can click the Info button in the Copy To dialog box to see the size of and number of colors in the cutout before you save it. The larger the size of the cutout and the more colors used, the more disk space it requires.

Retrieving Cutouts

You can use the Paste From to retrieve a cutout from disk and place it in the drawing area. The cutout appears in a flexible rectangle in the upper-left corner of the drawing area. (The Pick cutout tool at the top right of the Toolbox is automatically selected.) You need to move the cutout to the location where you want it to appear permanently in the drawing area .

To retrieve a cutout from a file:

- 1 Choose Paste From from the Edit menu.
- 2 If the file is in the current directory, select the name of the file in the Files box. ■
If the file is not in the current directory, double-click the directory you want in the Directories box. Then select the name of the file in the Files box.
- 3 Click the Info button to see the height, width, and number of colors and planes in the cutout. Then click OK.
- 4 Click OK. ■
- 5 Move the pointer inside the flexible box in the upper-left corner of the drawing area. Then press the mouse button.
- 6 Drag the cutout where you want it and release the mouse button.
- 7 Click outside the cutout to paste it down.

CAUTION: If you paste a previously saved color drawing into a black and white drawing, Paintbrush translates the colors into black and white.

- Related Procedures
- Keyboard Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Saving Cutouts](#)

hint

To find files with a different extension, type that extension in the Filename box and then click OK.

hint

Instead of using the Files and Directories list boxes to open a file, you can type the complete pathname in the Filename box and click OK.

Flipping Cutouts

You can use the Flip Horizontally command from the Pick menu to flip a cutout from side to side. Flip Vertically flips a cutout from top to bottom.

To flip a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Choose Flip Horizontal or Flip Vertical from the Pick menu.
 - 3 Select any tool to paste down the cutout.
- Related Tools
 - Keyboard Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Tilting Cutouts

To tilt a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
- 2 Choose Tilt from the Pick menu.
- 3 Choose Clear from the Pick menu if you want to cut the original cutout area after tilting the cutout.
- 4 Move the pointer where you want to anchor the upper-left corner of the flexible box that you use to determine the angle of tilt.

Since you are tilting a copy of your cutout, you can anchor this box anywhere in your drawing.

- 5 Press and hold down the left mouse button when the pointer is where you want to anchor a corner of a flexible box.

The angle of the cutout will be defined by your placement of the flexible box.

- 6 Drag the mouse left or right.

The bottom of the flexible box shifts with the mouse.

- 7 Select any tool to paste down the cutout.

- Related Tools
- Keyboard Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Shrinking and Enlarging Cutouts

To change the size of a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
- 2 Choose Shrink+Grow from the Pick menu.
- 3 Choose Clear from the Pick menu if you want to remove the original cutout area after shrinking or enlarging the cutout.
- 4 Move the pointer where you want to anchor the upper-left corner of the flexible box that you use to change the dimensions of your cutout. Then press and hold down the mouse button.

The size of the cutout will be defined by the flexible box.

- 5 Drag the Shrink+Grow box from the anchored corner until you are satisfied with its dimensions.
Or hold down the SHIFT key and drag the box to keep the same proportions as the original.

- 6 Release the mouse button.

The cutout shrinks or enlarges to fit the dimensions of the box.

- 7 Select any tool to paste down the cutout.

- Related Tools
- Keyboard Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Inverting Colors in Cutouts

With the Inverse command, you can invert the colors in a cutout. In a black and white drawing, black becomes white and white becomes black. In a color drawing, a color changes to its complementary color.

To invert the colors:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Choose Inverse from the Pick menu.
 - 3 Click either mouse button outside the cutout to paste the inverted colors on the drawing area.
- Related Tools
 - Keyboard Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Choosing Fonts and Font Sizes

The Font menu lists all available fonts. The Size menu lists a range of font sizes for all the fonts. The availability of point sizes depends on the resolution available with your printer. If no printer is installed, the available point sizes are based on the screen resolution of your video display.

Fonts and font sizes you select affect text in the drawing area and text you type until you select a tool, use a scroll bar, switch to another application, resize the window, or reposition the text cursor.

To choose a font:

- Select the font name from the Font menu.

To select a font size:

- Select the font size from the Size menu.
Available font sizes appear in black. Unavailable font sizes are dimmed. Asterisks indicate precision-drawn font sizes provided by a font file. Font sizes without an asterisk are scaled by Windows to approximate the size.
- Related Tool
- Keyboard Procedure

Changing Text Styles

You can use various font styles to emphasize text, including bold, italics, underline, and outline. You can also create a shadow around text in the currently selected background color.

To change the text style:

- Choose the style from the Style menu.
You can select more than one style for the same text. To cancel a style, choose the style again.
The styles you select affect text until you select a tool, use a scroll bar, switch to another application, resize the window, or reposition the text cursor.

To cancel all current style selections:

- Choose Normal from the Style menu.
- Related Tool
- Keyboard Procedure

Entering Text

To use text in your drawing:

- 1 [Select the foreground color](#) you want to use for the text.
 - 2 Select the Text tool from the Toolbox.
 - 3 [Choose the font and font size](#) you want to use.
 - 4 [Choose a style](#) for the font.
 - 5 Move the pointer into the drawing area, click the mouse button, and start typing.
- Related Tool
 - Keyboard Procedure

Creating Custom Colors

You can create custom colors and patterns by varying the amounts of red, green, and blue (RGB components) present in the colors provided by Paintbrush. You can change colors and patterns as you work on a drawing. Changing colors and patterns in mid-drawing does not affect your drawing in any way other than to provide you with more color options.

To create a custom color:

1 Select a color you want to modify. Then choose Edit Colors from the Options menu.

Or double-click the color in the Palette.

2 Move the scroll boxes to increase or decrease the amount of primary color used in a color.

Click ■ for an example.

3 Click OK when you are satisfied with the color.

Or click Cancel to return to the drawing with the pre-edited color.

Or click Reset to return to the color provided by Paintbrush at the beginning of a session.

- Related Procedure
- Keyboard Procedure

example

Imagine that each scroll bar controls the brightness of a red, green, and blue flashlight. Moving the scroll box to the right increases the amount of that RGB component present in the color, lightening it. Moving the scroll box to the left decreases the amount of that RGB component present, darkening the color.

If you shine the three flashlights at the same point on a piece of paper, the color where the beams of light meet is the composite color. This composite is what you see in the large rectangle to the right of the scroll bars.

Saving and Retrieving Custom Color Files

Use the Save Colors and Get Colors commands to save and retrieve color palettes to which you've added custom colors.

To save a custom color file:

- 1 Choose Save Colors from the Options menu.
- 2 If you want to save the file in the current directory, type the filename, including a filename extension if you want to specify one.

The .PAL extension is automatically assigned to the filename if you don't specify an extension. If you specify an extension, it overrides any automatic extension.

If you want to save the file in a different directory, double-click its name in the Directories box. Then type the filename. ■

- 3 Click OK. ■

To retrieve a custom color file:

- 1 Choose Get Colors from the Options menu.
- 2 If the file is in the current directory, double-click the name of the file in the Files box. ■

If the file is not in the current directory, double-click the directory you want in the Directories box. Then double-click the name of the file in the Files box. ■

- Related Procedures
- Keyboard Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Creating Custom Colors](#)

hint

The current directory is shown below the Filename box. Double-clicking the two periods [...] at the top of the Directories box shows the directories located one level closer to a disk's root directory.

hint

Instead of using the Files and Directories list boxes to save a file, you can type the complete pathname in the Filename box and click OK.

hint

To find files with an extension other than .PAL, type that extension in the Filename box and then click OK.

hint

The current directory is shown below the Filename box. Double-clicking the two periods [..] at the top of the Directories box shows the files and directories located one level closer to a disk's root directory.

Instead of using the Files and Directories list boxes to open a file, you can type the complete pathname in the Filename box and click OK.

Using the Cursor Position Option

The Cursor Position command displays the current pointer position as an x-y coordinate. You can use these width and height coordinates to align text or lines in your drawings. It is particularly helpful when you create charts and tables.

To display the current pointer position as an x-y coordinate:

- 1 Choose Cursor Position from the View menu.

The Cursor Position window appears on the right side of the title bar above the drawing area. You can move it to any position outside the drawing area.

- 2 Move the pointer around the drawing area.

The coordinates inside the Cursor Position window change to indicate the position of the cursor. The coordinates register only while the cursor is inside the drawing area. If you move the cursor outside the drawing area, the last valid coordinates remain showing in the window until you move back inside the drawing area.

- 3 Choose Cursor Position again to remove the window.

- Keyboard Procedure

Printing Drawings

If you have connected and installed a printer, you can print your drawing. Paintbrush automatically prints to the default printer.

To print the current drawing:

- 1 Choose Print from the File menu.
- 2 Select the options you want.

This option	Prints
Draft	An unenhanced copy of the drawing using the fastest printer speed. A few printers support only one setting for printing, in which case you will not notice any difference between Draft and Proof.
Proof	A copy of the drawing that uses the printer's advanced features.
Whole	The entire drawing, including parts not showing in the drawing area.
Partial	Part of the drawing .
Number of Copies	A specific number of copies.
Use Printer Resolution	At printer resolution rather than screen resolution. Since the dimensions of a <u>pixel</u> on a printer may be different from those for a pixel on a screen, Paintbrush must stretch a drawing to produce the same dimensions on the printed page as you see on the screen.
Scaling	To the scale you specify. Scaling by 100 percent implies no scaling.

- 3 Click OK.

- Related Procedures
- Keyboard Procedure

Procedures

[Changing Printers and Printer Options](#)

[Installing New Printers](#)

Printing Part of a Drawing

If you have connected and installed a printer, you can print part of your drawing. Paintbrush automatically prints to the default printer.

To print part of a drawing:

- 1 Choose Print from the File menu and select the Partial option.
- 2 Click OK.

Paintbrush adjusts the size of your drawing so that the entire image is displayed on the screen, and the cursor becomes a flexible rectangle.

- 3 Press the mouse button where you want to anchor one corner of the flexible rectangle.
- 4 Drag the rectangle until it contains the portion of the drawing you want to print.
- 5 Release the mouse button.

Paintbrush prints the selected portion of the drawing.

- Related Procedures
- Keyboard Procedure

Procedures

[Installing New Printers](#)

[Printing Drawings](#)

Changing Printers and Printer Options

If you have several printers connected to your computer and designated as active printers, you can print to one of these printers by selecting it as the default printer.

To change printers:

- 1 Choose Printer Setup from the File menu.
- 2 Select the printer that you want to print on.
- 3 Choose Setup to change printer options.

In the dialog box that appears, the available options depend on the printer you choose.

- 4 Select the options you want.

For more information on the options, click the Help button in the printer's Setup dialog box.

- 5 Click OK to close the printer's Setup dialog box.
- 6 Click OK.

- Related Procedure
- Keyboard Procedure

Printing Headers and Footers

When you print your documents, you can add explanatory text, the date, a page number, or the filename as a header or footer on the printed pages. You can also choose whether you want a header or footer to be left-justified, right-justified, or centered on the page.

To add a header or footer to the printed document:

- 1 Choose Page Setup from the File menu.
- 2 Type the text you want to use as a header or footer in the Header or Footer box along with any of the following codes:

Type	For
&d	The current date.
&p	Page numbers.
&f	The current filename.
&l	Header or footer text (typed following the code) justified at the left margin.
&r	Header or footer text (typed following the code) justified at the right margin.
&c	Header or footer text (typed following the code) centered between the margins.
&t	The current time.

You can include any or all of these codes in a single header or footer. Headers always appear just above the top margin and footers appear just below the margin.

- 3 Click OK.
 - Related Procedure
 - Keyboard Procedure

Setting Margins

Paintbrush prints your drawing using the margin settings specified in the Page Setup dialog box. If you want to position your drawing differently on the page, Paintbrush lets you adjust the margins.

To set the margins:

- 1 Choose Page Setup from the File menu.
- 2 Type the margin settings in the Margins box.

Paintbrush warns you if your margin settings are too small for the size of your drawing. If your margin settings are larger than the size of your drawing, Paintbrush positions the upper-left corner of the drawing according to the settings in the Top and Left margin boxes.

- 3 Click OK.
 - Related Procedure
 - Keyboard Procedure

Opening Existing Files

To open an existing file:

1 Choose Open from the File menu.

2 If the file is in the current directory, select the name of the file in the Files box.

You can select one of the Open From options to find files with a specified extension. Or, type a different extension in the Filename box and click OK.

If the file is not in the current directory, double-click the directory you want in the Directories box. Then select the name of the file in the Files box. ■

3 Click the Info button to see the height, width, and number of colors and planes used in the drawing. Then click OK.

4 Click OK. ■

- Related Procedures
- Keyboard Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Using Microsoft Paint Files](#)

hint

The current directory is shown below the Filename box. Double-clicking the two periods [..] at the top of the Directories box shows the files and directories located one level closer to a disk's root directory.

hint

Instead of using the Files and Directories list boxes to open a file, you can type the complete pathname in the Filename box and click OK.

Using Microsoft Paint Files

You can convert a Microsoft Paint file to a Paintbrush file; however, you cannot use Paintbrush to work with a Paint file and then resave it as a Paint file.

To convert a Microsoft Paint file to a Paintbrush file:

- 1 Choose Open from the File menu.
- 2 Choose MSP from the Open From area to find files with the Paint (.MSP) extension.
- 3 If the file is in the current directory, double-click the name of the file in the Files box.
If the file is not in the current directory, double-click the directory you want in the Directories box. Then double-click the name of the file in the Files box. ■
- 4 Click OK to confirm that the file should be converted to a Paintbrush file.
- 5 Edit the drawing if you want to.
- 6 Choose Save from the File menu when you finish.

Paintbrush automatically assigns the extension .BMP to the old filename and saves the drawing.

- Related Procedures
- Keyboard Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Opening Existing Files](#)

hint

The current directory is shown below the Filename box. Double-clicking the two periods [..] at the top of the Directories box shows the files and directories located one level closer to a disk's root directory.

Instead of using the Files and Directories list boxes to open a file, you can type the complete pathname in the Filename box and click OK.

Saving Existing Files

To save changes to an existing drawing:

- Choose Save from the File menu.
- Related Procedure
- Keyboard Procedure

Saving New or Renaming Existing Files

Use the Save As command to name and save a new file or to save an existing file under a new name. Click ■ for an example of renaming a file.

You can save your Paintbrush drawings as Paintbrush files or as bitmap files in four formats. Unless you change the format in the Save As dialog box, Windows automatically saves a new drawing as a Windows bitmap file. It saves a drawing that you open and edit in the same format that it was opened in.

To save a new drawing or the current drawing under a different name:

- 1 Choose Save As from the File menu.
- 2 If you want to save the file in the current directory, type the filename.
If you want to save the file in a different directory, double-click its name in the Directories box. Then type the filename. ■
- 3 Choose Options to specify the format in which to save the file.
You should save images in one of the Windows bitmap formats whenever possible, in order to maintain the highest possible level of compatibility across machines and future versions of Windows.
To avoid using up more memory and disk space than is required, you should always use the bitmap format that most closely matches the number of colors used in the picture.
- 4 Click the Info button to see the height, width, and number of colors and planes in the file. Then click OK.
- 5 Click OK. ■
 - Related Procedures
 - Keyboard Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Saving Existing Files](#)

hint

The current directory is shown below the Filename box. Double-clicking the two periods [...] at the top of the Directories box shows the directories located one level closer to a disk's root directory.

hint

Instead of using the Files and Directories list boxes to save a file, you can type the complete pathname in the Filename box and click OK.

hint

If you want to make changes to an existing file without modifying the original, use Save As to save another copy of the original file by giving it another name.

Paintbrush Keys

Click a folder or topic title.



Topics

Paintbrush Keys

Click a folder or topic title.



Topics

[Editing Keys](#)

[Mouse Equivalent Keys](#)

[Movement Keys](#)

Editing Keys

Use the following keys for editing a drawing:

<u>To delete</u>	<u>Press</u>
All or a portion of what you have drawn since selecting a tool. The key changes the pointer, which you can then drag to erase your drawing.	BACKSPACE
Everything you have drawn since selecting a tool.	ALT+BACKSPACE

Use the following keys for editing text in Paintbrush:

<u>To delete</u>	<u>Press</u>
The character to the left of the insertion point in the drawing area or a text box. Or selected text.	BACKSPACE
The character to the right of the insertion point in a text box. Or selected text.	DEL

Mouse Equivalent Keys

<u>Mouse Action</u>	<u>Press</u>
Clicking the left mouse button	INS
Double-clicking the left mouse button	INS+F9
Clicking the right mouse button	DEL
Double-clicking the right mouse button	DEL+F9

Movement Keys

Use the following keys for moving among and inside Paintbrush windows:

<u>To move</u>	<u>Press</u>
The pointer among the Toolbox, Linesize box, Palette, and Drawing Area in a counter-clockwise direction	TAB
The pointer among the Toolbox, Linesize box, Palette, and Drawing Area in a clockwise direction	SHIFT+TAB
The pointer inside a window	ARROW KEYS
To the left edge of the drawing	SHIFT+HOME
To the right edge of the drawing	SHIFT+END
Up one screen	PAGE UP
Down one screen	PAGE DOWN

To the left one space

SHIFT+LEFT ARROW

To the right one space

SHIFT+RIGHT
ARROW

Up one line

SHIFT+UP ARROW

Down one line

SHIFT+DOWN
ARROW

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
 - [Changing Default Settings for New Drawings](#)
 - [Starting New Drawings](#)
 - [Selecting Background and Foreground Colors](#)
 - [Selecting a Drawing Width](#)
 - [Selecting and Using a Drawing Tool](#)
 - [Editing Graphics](#)
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
 - [Showing the Entire Screen](#)
 - [Displaying All of a Drawing](#)
 - [Enlarging the Drawing Area](#)
 - [Editing with Zoom In](#)
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
 - [Copying, Cutting, and Pasting Cutouts](#)
 - [Moving Cutouts](#)
 - [Sweeping Cutouts](#)
 - [Saving Cutouts](#)
 - [Retrieving Cutouts](#)
 - [Flipping Cutouts](#)
 - [Tilting Cutouts](#)
 - [Shrinking and Enlarging Cutouts](#)
 - [Inverting Colors in Cutouts](#)
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
 - [Choosing Fonts and Font Sizes](#)
 - [Changing Text Styles](#)
 - [Entering Text](#)
- Using Advanced Features
- Printing
- Working with Paintbrush Files

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
 - [Creating Custom Colors](#)
 - [Saving and Retrieving Custom Color Files](#)
 - [Using the Cursor Position Option](#)
- Printing
- Working with Paintbrush Files

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
 - [Printing Drawings](#)
 - [Printing Part of a Drawing](#)
 - [Changing Printers and Printer Options](#)
 - [Printing Headers and Footers](#)
 - [Setting Margins](#)
- Working with Paintbrush Files

Paintbrush Keyboard Procedures



Click a folder or topic title.

- Creating Drawings
- Viewing Drawings in Different Ways
- Working with Cutouts
- Using Text
- Using Advanced Features
- Printing
- Working with Paintbrush Files

[Starting New Drawings](#)

[Opening Existing Files](#)

[Using Microsoft Paint Files](#)

[Saving Existing Files](#)

[Saving New or Renaming Existing Files](#)

Keyboard: Changing Default Settings for New Drawings

To change default settings for a new drawing:

- 1 Press ALT and then O.
 - 2 Press I.
 - 3 Press ALT+D to return the drawing area to the original size used to accommodate your video display. Then skip to step 8.
Or complete steps 4 through 7.
 - 4 Type the width you want.
 - 5 Press TAB and type the height you want.
 - 6 Press TAB and press the UP ARROW or DOWN ARROW to select inches (in), centimeters (cm), or picture elements (pels).
 - 7 Press TAB and press the UP ARROW or DOWN ARROW to select Colors or Black and White.
 - 8 Press ENTER.
 - 9 Press CTRL+N to start a drawing with the new settings.
- Mouse Procedure

Keyboard: Starting New Drawings

To start a new drawing:

- 1 Select a [new background color](#) for your drawing if you want to.
 - 2 [Change the default settings](#) for the drawing if you want to.
 - 3 Press CTRL+N.
- Mouse Procedure

Keyboard: Selecting Background and Foreground Colors

To select a different background and foreground color:

- 1 Press `TAB` until the pointer reaches the color palette, use the arrow keys to move the pointer to a color, and press `DEL` to select a background color.
 - 2 Press `CTRL+N` to set the background color for the drawing.
 - 3 Use the arrow keys to move the pointer to a color and press `INS` to select a foreground color.
- Mouse Procedure

Keyboard: Selecting a Drawing Width

To select a drawing width:

- 1 Press TAB until the pointer reaches the Linesize box.
 - 2 Use the UP ARROW or DOWN ARROW to move the pointer to a width.
 - 3 Press INS.
- Mouse Procedure

Keyboard: Selecting and Using a Drawing Tool

To select and use a drawing tool:

- 1 Press TAB until the pointer reaches the Toolbox.
 - 2 Use the arrows keys to move the pointer to the Airbrush, Brush, or Paint Roller tool.
 - 3 Press INS.
 - 4 Press TAB until the pointer reaches the drawing area.
 - 5 Use the arrow keys to move the pointer where you want to start drawing.
 - 6 Press and hold down INS.
 - 7 Use the arrow keys to draw with the tool.
Or skip this step if you're using the Paint Roller tool.
 - 8 Release INS.
- Mouse Procedure

Keyboard: Editing Graphics

To delete everything you have drawn since selecting a tool:

- 1 Press ALT and then E.
- 2 Press U.

To delete a portion of what you have drawn since selecting a tool:

- 1 Press BACKSPACE.
 - 2 Use the arrow keys to move the pointer where you want to start deleting.
 - 3 Press and hold down INS.
 - 4 Use the arrow keys to delete parts of the drawing.
 - 5 Release INS.
- Mouse Procedure

Keyboard: Showing the Entire Screen

To display your drawing on the entire screen:

- Press CTRL+C.
Or press TAB until the pointer reaches the Toolbox, use the arrow keys to move the pointer to the Pick tool, and press F9+INS.
- Related Procedure
- Mouse Procedure

Keyboard: Displaying All of a Drawing

To display all of a drawing that is larger than the drawing area:

- Press CTRL+O.
- Related Procedure
- Mouse Procedure

Keyboard: Enlarging the Drawing Area

To enlarge the drawing area:

- 1 Press ALT and then V.
- 2 Press T to remove the Toolbox and Linesize Box.

Or press P to remove the Palette.

- Related Procedures
- Mouse Procedure

Procedures

[Displaying All of a Drawing](#)

[Showing the Entire Screen](#)

Keyboard: Editing with Zoom In

To magnify a portion of a drawing and change a pixel at a time:

- 1 Press CTRL+Z.
 - 2 Use the arrow keys to move the pointer over the area you want to magnify.
 - 3 Press INS.
 - 4 Use the arrow keys to move the pointer to a pixel you want to edit.
 - 5 Press INS to change a pixel to the foreground color.
Or press DEL to change a pixel to a background color.
Or [use the Paint Roller tool](#) to change an area within the magnified area.
 - 6 Press CTRL+O when you finish.
Or press ALT+BACKSPACE to return to the normal resolution and cancel any changes made to your drawing.
- Mouse Procedure

Keyboard: Copying, Cutting, and Pasting Cutouts

To copy and paste or cut and paste a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Press CTRL+INS to copy the cutout.
Or press SHIFT+DEL to cut the cutout.
 - 3 [Open the file](#) into which you want to paste the cutout.
 - 4 Press SHIFT+INS.
 - 5 Use the arrow keys to move the pointer inside the cutout.
 - 6 Press and hold down INS to paste the cutout transparently.
Or press and hold down DEL to paste the cutout opaquely.
 - 7 Use the arrow keys to move the cutout where you want it.
 - 8 Release INS.
 - 9 Select any tool in order to paste down the cutout.
- Related Topics
 - Mouse Procedure

Information

[Transparent and Opaque Pasting and Sweeping](#)

Tools

[Pick Tool](#)

[Scissors Tool](#)

Keyboard: Moving Cutouts

To move a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Use the arrow keys to move the pointer inside the cutout.
 - 3 Press and hold down INS to paste the cutout transparently.
Or press and hold down DEL to paste the cutout opaquely.
 - 4 Use the arrow keys to move the cutout where you want it.
 - 5 Release INS.
 - 6 Select any tool in order to paste down the cutout.
- Related Topics
 - Mouse Procedure

Keyboard: Sweeping Cutouts

To sweep a succession of cutout copies across the drawing area:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Use the arrow keys to move the pointer inside the cutout.
 - 3 Press INS to paste the cutout transparently.
Or press DEL to paste the cutout opaquely.
 - 4 Press and hold down CTRL.
 - 5 Use the arrow keys to sweep the cutouts.
 - 6 Release CTRL and the mouse button when you finish.
 - 7 Select any tool in order to paste down the changes.
- Related Topics
 - Mouse Procedure

Keyboard: Saving Cutouts

To save a cutout to a file:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Press ALT and then E.
 - 3 Press O.
 - 4 If you want to save the file in the current directory, type the filename.
If you want to save the file in a different directory, press ALT+D and use the UP ARROW or DOWN ARROW key to select a directory, and press ENTER. Then press ALT+N and type the filename. ■
 - 5 Press ALT+O and press the UP ARROW or DOWN ARROW key to select the format in which to save the cutout.
 - 6 Press ALT+I to see the height, width, and number of colors and planes in the cutout. Then press ENTER.
 - 7 Press ENTER. ■
- Related Topics
 - Mouse Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Retrieving Cutouts](#)

Tools

[Pick Tool](#)

[Scissors Tool](#)

Keyboard: Retrieving Cutouts

To retrieve a cutout from a file:

- 1 Press ALT and then E.
- 2 Press F.
- 3 If the file is in the current directory, press ALT+F and use the UP ARROW or DOWN ARROW key to select the file.
Press ALT+B (BMP), ALT+M (MSP), or ALT+P (PCX) to find files with a specified extension. Or, press ALT+N and type a different extension in the Filename box. Then press ENTER.
If the file is not in the current directory, press ALT+D, use the UP ARROW or DOWN ARROW key to select a drive or directory, and press ENTER. Then press ALT+F and use the UP ARROW or DOWN ARROW key to select the file. ■
- 4 Press ALT+I to see the height, width, and number of colors and planes in the cutout. Then press ENTER.
- 5 Press TAB until the OK button is selected and then press ENTER. ■
- 6 Use the arrow keys to move the pointer inside the flexible box in the upper-left corner of the drawing area.
- 7 Press and hold down INS.
- 8 Use the arrow keys to move the cutout where you want it.
- 9 Release INS.
- 10 Select any tool in order to paste down the cutout.
 - Related Procedures
 - Mouse Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Saving Cutouts](#)

Keyboard: Flipping Cutouts

To flip a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Press ALT and then P.
 - 3 Press H (Flip Horizontal) or V (Flip Vertical).
 - 4 Select any tool in order to paste down the cutout.
- Related Tools
 - Mouse Procedure

Tools

[Pick Tool](#)

[Scissors Tool](#)

Keyboard: Tilting Cutouts

To tilt a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Press ALT and then P.
 - 3 Press T.
 - 4 Press ALT and then P if you want to cut the original cutout area after tilting the cutout. Then press C.
 - 5 Use the arrow keys to move the pointer where you want to anchor the upper-left corner of the flexible box that you use to determine the angle of tilt.
 - 6 Press and hold down INS when the pointer is where you want to anchor a corner of a flexible box.
 - 7 Press the LEFT ARROW or RIGHT ARROW key.
 - 8 Release INS.
 - 9 Select any tool in order to paste down the cutout.
- Related Tools
 - Mouse Procedure

Keyboard: Shrinking and Enlarging Cutouts

To change the size of a cutout:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Press ALT and then P.
 - 3 Press S.
 - 4 Press ALT and then P if you want to remove the original cutout area after shrinking or enlarging the cutout. Then press C.
 - 5 Use the arrow keys to move the pointer to where you want to anchor the upper-left corner of the flexible box that you use to change the dimensions of your cutout.
 - 6 Press and hold down INS.
Or press and hold down INS, then press and hold down SHIFT to keep the cutout at the same proportions as the original.
 - 7 Press the LEFT ARROW or RIGHT ARROW to expand the box horizontally.
 - 8 Press the UP ARROW or DOWN ARROW to expand the box vertically.
 - 9 Release INS.
 - 10 Select any tool in order to paste down the cutout.
- Related Tools
 - Mouse Procedure

Keyboard: Inverting Colors in Cutouts

To invert the colors:

- 1 Use the Pick tool or Scissors tool to define the cutout.
 - 2 Press ALT and then P.
 - 3 Press I.
 - 4 Press INS to paste the inverted colors on the drawing area.
- Related Tools
 - Mouse Procedure

Keyboard: Selecting a Tool

To select a drawing tool:

- 1 Press TAB until the pointer reaches the Toolbox.
- 2 Use the arrows keys to move the pointer to the tool.
- 3 Press INS.

Keyboard: Choosing Fonts and Font Sizes

To choose a font and font size:

- 1 Press ALT and then N.
 - 2 Use the UP ARROW or DOWN ARROW to select the font and press ENTER.
 - 3 Press ALT+Z and use the arrow keys to select a font size.
 - 4 Press ENTER.
- Related Tool
 - Mouse Procedure

Keyboard: Changing Text Styles

To change the text style:

- 1 Press ALT and then S. Then press the underlined letter representing the style you want on the menu or press N to cancel current style selections.
Or press CTRL+B (Bold), CTRL+I (Italic), or CTRL+U (Underline).
 - 2 Repeat step 1 for each additional style you want.
- Related Tool
 - Mouse Procedure

Keyboard: Entering Text

To use text in your drawing:

- 1 [Select the foreground color](#) you want to use for the text.
 - 2 [Select the Text tool](#) from the Toolbox.
 - 3 [Choose the font and point size](#) you want to use.
 - 4 [Choose a style](#) for the font.
 - 5 Press TAB until the pointer reaches the drawing area, press INS, and start typing.
- Related Tool
 - Mouse Procedure

Keyboard: Creating Custom Colors

To create a custom color:

- 1 [Select a color](#) you want to change to a custom color.
 - 2 Press ALT and then O. Then press E.
Or press TAB until the pointer reaches the Color Palette, use the arrow keys to move the pointer to a color, and press F9+INS.
 - 3 Press TAB until you select the text box (Red, Green, or Blue) you want to use to increase or decrease the amount of a primary color.
 - 4 Type a number from 0 to 255.
 - 5 Repeat steps 3 and 4 to change the amount of another primary color.
 - 6 Press ENTER.
Or press ESC to return to the pre-edited color.
Or press ALT+E to return to the color originally provided by Paintbrush.
- Related Procedure
 - Mouse Procedure

Keyboard: Saving and Retrieving Custom Color Files

To save a custom color file:

- 1 Press ALT and then O.
- 2 Then press S.
- 3 If you want to save the file in the current directory, type the filename, including a filename extension if you want to specify one.
If you want to save the file in a different directory, press ALT+D and use the UP ARROW or DOWN ARROW key to select a directory, and press ENTER. Then press ALT+N and type the filename. ■
- 4 Press ENTER. ■

To retrieve a custom color file:

- 1 Press ALT and then O.
 - 2 Press G.
 - 3 If the file is in the current directory, press ALT+F and use the UP ARROW or DOWN ARROW key to select the file.
If the file is not in the current directory, press ALT+D, use the UP ARROW or DOWN ARROW key to select a drive or directory, and press ENTER. Then press ALT+F and use the UP ARROW or DOWN ARROW key to select the file. ■
 - 4 Press ENTER. ■
- Related Procedures
 - Mouse Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Creating Custom Colors](#)

Keyboard: Using the Cursor Position Option

To display the current cursor position as an x-y coordinate:

- 1 Press ALT and then v.
 - 2 Press c.
 - 3 Use the arrow keys move the cursor around the drawing area.
 - 4 Choose Cursor Position again to remove the window.
- Mouse Procedure

Keyboard: Printing Drawings

To print the current drawing:

- 1 Press ALT and then F.
- 2 Press P.
- 3 Type the number of copies you want.
- 4 Press TAB and type the percentage of scaling you want.
- 5 Press TAB and press SPACEBAR to use the printer resolution rather than the screen resolution.
- 6 Press TAB and use the UP ARROW or DOWN ARROW to specify draft or proof quality of printing.
- 7 Press TAB and use the UP ARROW or DOWN ARROW to specify whether you want to print a whole drawing or part of a drawing.
- 8 Press ENTER.
- 9 Complete the procedure for [printing part of a drawing](#) if you chose Partial.
 - Related Procedure
 - Mouse Procedure

Keyboard: Printing Part of a Drawing

To print part of a drawing:

- 1 [Choose the Partial option](#) in the Print dialog box.
 - 2 Use the arrow keys to move the pointer where you want to anchor one corner of the flexible box.
 - 3 Press and hold down INS.
 - 4 Press the LEFT ARROW or RIGHT ARROW to expand the box horizontally.
 - 5 Press the UP ARROW or DOWN ARROW to expand the box vertically.
 - 6 Release INS when the box contains the portion of the drawing you want to print.
- Related Procedure
 - Mouse Procedure

Keyboard: Changing Printers and Printer Options

To change printers:

- 1 Press ALT and then F.
 - 2 Press R.
 - 3 Use the UP ARROW or DOWN ARROW to select the printer that you want.
 - 4 Press ALT+S to change printer options.
 - 5 Select the options you want and press ENTER.
 - 6 Press ENTER.
- Mouse Procedure

Keyboard: Printing Headers and Footers

To add a header or footer to the printed document:

- 1 Press ALT and then F.
- 2 Press T.
- 3 Type the header text and/or codes. Then press TAB and type the footer text and/or codes.

Type	For
------	-----

&d	The current date.
----	-------------------

&p	Page numbers.
----	---------------

&f	The current filename.
----	-----------------------

&l	Header or footer text (typed following the code) justified at the left margin.
----	--

&r	Header or footer text (typed following the code) justified at the right margin.
----	---

&c	Header or footer text (typed following the code) centered between the margins.
----	--

&t	The current time.
----	-------------------

- 3 Press ENTER.

- Related Procedure
- Mouse Procedure

Keyboard: Setting Margins

To set the margins:

- 1 Press ALT and then F.
 - 2 Press T.
 - 3 Press TAB until you reach a margin you want to change.
 - 4 Type the new margin.
 - 5 Repeat steps 3 and 4 to change other margins.
 - 6 Press ENTER.
- Related Procedure
 - Mouse Procedure

Keyboard: Opening Existing Files

To open an existing file:

- 1 Press ALT and then F.
- 2 Press O.
- 3 If the file is in the current directory, press ALT+F and use the UP ARROW or DOWN ARROW key to select the file.
Press ALT+B (BMP), ALT+M (MSP), or ALT+P (PCX) to find files with a specified extension. Or, press ALT+N and type a different extension in the Filename box. Then press ENTER.
If the file is not in the current directory, press ALT+D, use the UP ARROW or DOWN ARROW key to select a drive or directory, and press ENTER. Then press ALT+F and use the UP ARROW or DOWN ARROW key to select the file. ■
- 4 Press ALT+I to see the height, width, and number of colors and planes used in the drawing. Then press ENTER.
- 5 Press ENTER. ■
 - Related Procedures
 - Mouse Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Using Microsoft Paint Files](#)

hint

The current directory is shown below the Filename box. Choosing the two periods [..] at the top of the Directories box shows the files and directories located one level closer to a disk's root directory.

hint

Instead of using the Files and Directories list boxes to open a file, you can type the complete pathname in the Filename box and press ENTER.

Keyboard: Using Microsoft Paint Files

To convert a Microsoft Paint file to a Paintbrush file:

- 1 Press ALT and then F.
- 2 Press O.
- 3 Press ALT+M to find files with the Paint (.MSP) extension.
- 4 If the file is in the current directory, press ALT+F and use the UP ARROW or DOWN ARROW key to select the file.

If the file is not in the current directory, press ALT+D, use the UP ARROW or DOWN ARROW key to select a drive or directory, and press ENTER. Then press ALT+F and use the UP ARROW or DOWN ARROW key to select the file. ■

- 5 Press ENTER to confirm that the file should be converted to a Paintbrush file.
 - 6 Edit the drawing if you want to.
 - 7 Press CTRL+S when you finish.
- Related Procedures
 - Mouse Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Opening Existing Files](#)

hint

The current directory is shown below the Filename box. Choosing the two periods [..] at the top of the Directories box shows the files and directories located one level closer to a disk's root directory.

Instead of using the Files and Directories list boxes to open a file, you can type the complete pathname in the Filename box and press ENTER.

Keyboard: Saving Existing Files

To save changes to an existing drawing:

- Press CTRL+S.
- Related Procedure
- Mouse Procedure

Keyboard: Saving New or Renaming Existing Files

To save a new drawing or the current drawing under an additional name:

- 1 Press ALT and then F.
- 2 Press A.
- 3 If you want to save the file in the current directory, type the filename.
If you want to save the file in a different directory, press ALT+D and use the UP ARROW or DOWN ARROW key to select a directory, and press ENTER. Then press ALT+N and type the filename. ■
- 4 Press ALT+O and use the UP ARROW or DOWN ARROW key to select the format in which you want to save the file.
- 5 Press ALT+I to see the height, width, and number of colors and planes used in an existing drawing. Then press ENTER.
- 6 Press ENTER. ■
 - Related Procedures
 - Mouse Procedure

Procedures

[Browsing Through the Directories List Box](#)

[Saving Existing Files](#)

hint

The current directory is shown below the Filename box. Choosing the two periods [..] at the top of the Directories box shows the directories located one level closer to a disk's root directory.

hint

Instead of using the Files and Directories list boxes to save a file, you can type the complete pathname in the Filename box and press ENTER.

Paintbrush Tools

Click a tool.



Scissors Tool



Defines a non-rectangular cutout.

To use the Scissors tool, select the tool and move the pointer into the drawing area. Then drag the pointer to draw a line around the part of the picture that you want to be a cutout. Release the mouse button when you have enclosed the area.

Use the Scissors tool instead of the Pick tool when you want the cutout to follow an object's contours.

If you make a mistake while defining a cutout, click the right mouse button to start over.

- Related Tool
- Keyboard Version

Pick Tool



Defines a rectangular cutout.

To use the Pick tool, select the tool, move the pointer into the drawing area, and drag the pointer. A flexible rectangle stretches from the anchor point to the pointer position. When the rectangle outlines the area you want to define as a cutout, release the mouse button.

Use the Pick tool instead of the Scissors tool when the cutout's size and shape don't need to be precise.

If you make a mistake while defining a cutout, click the right mouse button to start over.

- Related Tool
- Keyboard Version

Airbrush



Sprays paint in the drawing area with foreground-colored dots.

To use the Airbrush, select the tool, move the pointer into the drawing area, and drag the pointer. Release the mouse button to stop spraying.

The drawing width you choose from the Linesize box determines the diameter of the spray.

- Related Procedures
- Keyboard Version

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Text Tool



Inserts text in the drawing area.

To use the Text tool, select the tool, move the pointer into the drawing area, click the mouse, and start typing.

Paintbrush stops your text entry at the right edge of the drawing area. Press ENTER to start a new line of text. Or move the pointer and click to reposition the insertion point. Use the scroll bars to move to and enter text in parts of a drawing that are outside the drawing area.

Until you paste down the text, you can select a new foreground color, font, point size, or text style for text in the drawing area. You can also use the BACKSPACE key to make changes in text.

NOTE: Text can be drawn only in solid colors--colors in which all pixels are the same color, not a combination of colors. If a non-solid color or a pattern is selected for drawing, text will be drawn in the solid color that is closest to the chosen color or pattern. ■

- Related Procedures
- Keyboard Version

Procedures

[Choosing Fonts and Font Sizes](#)

[Changing Text Styles](#)

[Selecting Background and Foreground Colors](#)

example

If you are using a monochrome monitor and select a light gray as your foreground color, the text characters are drawn in white. If you then change the foreground color to a pattern that is mostly black, the characters are redrawn in black.

Color Eraser



Changes portions of the foreground color to the background color or changes every occurrence of one color to another color.

To erase, select the tool and then select a foreground and background color. (The foreground color will change to the background color.) Then move the pointer into the drawing area and drag the pointer. To erase a horizontal or vertical line, hold down **SHIFT** as you drag the pointer. The drawing width you choose from the Linesize box determines the eraser size.

To change every occurrence of one color to another color, select a foreground and background color. (The foreground color will change to the background color.) Then double-click the Color Eraser tool.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Eraser](#)

Eraser



Changes the drawing to the background color.

To erase, select the tool, move the pointer into the drawing area, and drag the pointer. The drawing width you choose from the Linesize box determines the eraser size.

To erase a horizontal or vertical line, hold down SHIFT as you drag the pointer.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Color Eraser](#)

Paint Roller



Fills a closed area with the foreground color.

To use the Paint Roller, select the tool, move the pointer into the area you want to fill, and click.

If there are any breaks in the shape's border, the color will leak through and fill the entire drawing area, stopping at the borders of the drawing area. Choose Undo if this happens. Use the Zoom In command to close any breaks in the border.

If you fill an object with a pattern rather than a solid color, you won't be able to refill the object. However, you can use the [Color Eraser](#) to change the pattern to a solid color or a different pattern.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Editing with Zoom In](#)

[Selecting Background and Foreground Colors](#)

Tools

[Brush](#)

[Color Eraser](#)

Brush



Paints brush strokes in the drawing area.

To paint, select the foreground color, select the tool, and move the pointer into the drawing area. Then drag the pointer.

To change the Brush's shape, choose Brush Shapes from the Options menu or double-click the Brush tool. Then select one of the Brush shapes and choose OK.

The drawing width you choose from the Linesize box determines the size of the Brush.

To paint a horizontal or vertical line, hold down **SHIFT** as you drag the pointer.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Paint Roller](#)

Curve



Draws a curved line.

To draw a curve, select the foreground color, select the tool, and move the pointer into the drawing area. Drag the pointer from where you want to anchor one end of the curve. When the line is the length you want, release the mouse button. Drag the pointer again to stretch the curve in a different direction. When you are satisfied with the angle of the curve, release the mouse button.

To curve the line in only one direction, click the second end point. To curve the line in two directions, drag the pointer away from the first curve to bend the line in the opposite direction. When you are satisfied with the curve, release the mouse button.

Until you click the second end point or release the left mouse button to create a line curving in two directions, you can click the right button to undo the curve and start over.

The drawing width you choose from the Linesize box determines the line thickness.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Line](#)

Line



Draws a line.

To draw a line, select the foreground color, select the tool, and move the pointer into the drawing area. Then drag the pointer. A flexible line stretches from the anchored end to the pointer position. When you are satisfied with the line, release the mouse button to paste down the line.

If you are not satisfied with the line, click the right mouse button while holding down the left button to undo the line.

To draw a horizontal, vertical, or diagonal line, hold down `SHIFT` as you drag the pointer.

The drawing width you choose from the Linesize box determines the line thickness.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Curve](#)

Box



Draws a box with straight corners.

To draw a box, select the foreground color, select the tool, and move the pointer into the drawing area. Then drag the pointer. A flexible rectangle stretches from the anchor point to the pointer position. When you are satisfied with the rectangle size, release the mouse button. Until you release the left mouse button, you can click the right button to start over.

To draw a square, hold down `SHIFT` as you drag the pointer.

The drawing width you choose from the Linesize box determines the thickness of the box's border.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tools

[Filled Box](#)

[Filled Rounded Box](#)

Rounded Box



Draws a box with rounded corners.

To draw a box, select the foreground color, select the tool, and move the pointer into the drawing area. Then drag the pointer. A flexible rectangle stretches from the anchor point to the pointer position. When you are satisfied with the rectangle size, release the mouse button. Until you release the left mouse button, you can click the right button to start over.

To draw a square, hold down `SHIFT` as you drag the pointer.

The drawing width you choose from the Linesize box determines the thickness of the box's border.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tools

[Filled Box](#)

[Filled Rounded Box](#)

Filled Box



Draws filled boxes.

To draw a filled box, select background and foreground colors, select the tool, and move the pointer into the drawing area. Then drag the pointer. A flexible rectangle stretches from the anchor point to the pointer position. When you are satisfied with the rectangle size, release the mouse button. Until you release the left mouse button, you can click the right button to start over.

If you want a border, select a background color that's different from the foreground color. The drawing width you choose from the Linesize box determines the border's thickness.

To draw a square, hold down SHIFT as you drag the pointer.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tools

[Box](#)

[Rounded Box](#)

Filled Rounded Box



Draws filled rounded boxes.

To draw a filled box, select background and foreground colors, select the tool, and move the pointer into the drawing area. Then drag the pointer. A flexible rectangle stretches from the anchor point to the pointer position. When you are satisfied with the rectangle size, release the mouse button. Until you release the left mouse button, you can click the right button to start over.

If you want a border, select a background color that's different from the foreground color. The drawing width you choose from the Linesize box determines the border's thickness.

To draw a square, hold down `SHIFT` as you drag the pointer.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tools

[Box](#)

[Rounded Box](#)

Circle/Ellipse



Draws a circle or ellipse.

To draw an ellipse, select the foreground color, select the tool, and move the pointer into the drawing area. Then drag the pointer. A flexible ellipse stretches from the anchor point to the pointer position. When you are satisfied with the ellipse, release the mouse button. Until you release the left mouse button, you can click the right button to start over.

To draw a circle, hold down `SHIFT` as you drag the pointer.

The drawing width you choose from the Linesize box determines the thickness of the circle's or ellipse's border.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Filled Circle/Ellipse](#)

Filled Circle/Ellipse



Draws a filled circle or filled ellipse.

To draw a filled ellipse, select background and foreground colors, select the tool, and move the pointer into the drawing area. Then drag the pointer. A flexible ellipse stretches from the anchor point to the pointer position. When you are satisfied with the ellipse, release the mouse button. Until you release the left mouse button, you can click the right button to start over.

If you want a border, select a background color that's different from the foreground color. The drawing width you choose from the Linesize box determines the border's thickness.

To draw a filled circle, hold down SHIFT as you drag the pointer.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Circle/Ellipse](#)

Polygon



Draws polygons by connecting straight lines.

To draw polygons, select the foreground color, select the tool, and move the pointer into the drawing area. Then drag the pointer. Release the mouse button when you reach the point where you want the first side of the polygon to end. Continue adding sides until you want to complete the polygon. Double-click to add the last line. To start the polygon over, click the right mouse button before double-clicking.

To draw horizontal, vertical, or diagonal lines for the polygon, hold down `SHIFT` as you drag the pointer.

The drawing width you choose from the Linesize box determines the border's thickness.

To draw lines without dragging the pointer, move the pointer where you want a line to end and click.

- Related Tool
- Keyboard Version

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Filled Polygon](#)

Filled Polygon



Draws filled polygons by connecting straight lines.

To draw filled polygons, select background and foreground colors, select the tool, and move the pointer into the drawing area. Then drag the mouse. Release the mouse button where you want the first side of the polygon to end. Continue adding sides until you complete the polygon. Double-click to add the last line. To start the polygon over, click the right mouse button before double-clicking.

If you want a border, select a background color that's different than the foreground color. The drawing width you choose from the Linesize box determines the border's thickness.

To draw horizontal, vertical, or diagonal lines for the polygon, hold down `SHIFT` as you drag the pointer.

To draw lines without dragging the pointer, move the pointer where you want a line to end and click.

- [Related Topics](#)
- [Keyboard Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

Tool

[Polygon](#)

Paintbrush Keyboard Tools

Click a tool.



Keyboard: Scissors Tool

- Defines a non-rectangular cutout.

To use the Scissors tool, select the tool and press `TAB` until the pointer reaches the drawing area. Use the arrow keys to move the pointer where you want to start the cutout and press and hold down `INS`. Then use the arrow keys to draw a line around the part of the picture that you want to be a cutout. Release `INS` when you have outlined the area.

Use the Scissors tool instead of the Pick tool when you want the cutout to follow an object's contours.

If you make a mistake while defining a cutout, start over by releasing `INS`, pressing an arrow key, and pressing `INS` again.

- [Related Topics](#)
- [Mouse Version](#)

Procedure

[Selecting a Tool](#)

Tool

[Pick Tool](#)

Keyboard: Pick Tool



Defines a rectangular cutout.

To use the Pick tool, select the tool and press `TAB` until the pointer reaches the drawing area. Use the arrow keys to move the pointer where you want to anchor one corner of the flexible rectangle. Then press and hold down `INS`, and press the arrow keys until the rectangle outlines the area that you want to define. Release `INS`.

Use the Pick tool instead of the Scissors tool when the cutout's size and shape don't need to be precise.

If you make a mistake while defining a cutout, start over by releasing `INS`, pressing an arrow key, and pressing `INS` again.

- [Related Topics](#)
- [Mouse Version](#)

Procedure

[Selecting a Tool](#)

Tool

[Scissors Tool](#)

Keyboard: Airbrush



Sprays paint in the drawing area with foreground-colored dots.

To use the Airbrush, select the tool and press `TAB` until the pointer reaches the drawing area. Then use the arrow keys to move the pointer into the drawing area, press and hold down `INS`, and use the arrow keys to spray in the drawing area. Release `INS` to stop spraying.

The drawing width you choose from the Linesize box determines the diameter of the spray.

- Related Procedures
- Mouse Version

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Keyboard: Text Tool



Inserts text in the drawing area.

To use the Text tool, select the tool and press `TAB` until the pointer reaches the drawing area. Then press `INS` and start typing.

Paintbrush stops your text entry at the right edge of the drawing area. Press `ENTER` to start a new line of text. Or reposition the insertion point by pressing the arrow keys to move the pointer and pressing `INS`. Use Paintbrush's movement keys (see Related Topics) to move to and enter text in other parts of a drawing that is larger than the drawing area.

Until you paste down the text, you can select a new foreground color, font, point size, or text style for text in the drawing area. You can also use `BACKSPACE` to make changes in text.

NOTE: Text can be drawn only in solid colors--colors in which all pixels are the same color, not a combination of colors. If a non-solid color or a pattern is selected for drawing, text will be drawn in the solid color that is closest to the chosen color or pattern. ■

- Related Procedures
- Mouse Version

Procedures

[Choosing Fonts and Font Sizes](#)

[Changing Text Styles](#)

[Selecting a Tool](#)

Keyboard: Color Eraser



Changes portions of the foreground color to the background color or changes every occurrence of one color to another color.

To erase, select the tool and then select a foreground and background color. (The foreground color will change to the background color.) Then press `TAB` until the pointer reaches the drawing area and use the arrow keys to move the pointer where you want to start erasing. Press and hold down `INS`, and use the arrow keys to erase.

To erase a horizontal or vertical line, press and hold down `SHIFT` after you press and hold down `INS`. The drawing width you choose from the Linesize box determines the eraser size.

To change every occurrence of one color to another color, select a foreground and background color. (The foreground color will change to the background color.) Then press `TAB` until the pointer reaches the Toolbox, use the arrow keys to move the pointer to the Color Eraser, and press `F9+INS`.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Tool](#)

Tool

[Eraser](#)

Keyboard: Eraser



Changes the drawing area to the background color.

To erase, select the tool and press `TAB` until the pointer reaches the drawing area. Then use the arrow keys to move the pointer where you want to start erasing, press and hold down `INS`, and use the arrow keys to erase. The drawing width you choose from the Linesize box determines the eraser size.

To erase a horizontal or vertical line, press and hold down `SHIFT` after you press and hold down `INS`.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Color Eraser](#)

Keyboard: Paint Roller



Fills a closed area with the foreground color.

To use the Paint Roller, select the tool and press `TAB` until the pointer reaches the drawing area. Then use the arrow keys to move the pointer into the area you want to fill and press `INS`.

If there are any breaks in the shape's border, the color will leak through and fill the entire drawing area, stopping at the borders of the drawing area. Press `ALT+BACKSPACE` if this happens. Use the `Zoom In` command to close any breaks in the border.

If you fill an object with a pattern rather than a solid color, you won't be able to refill the object. However, you can use the [Color Eraser](#) to change the pattern to a solid color or a different pattern.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Editing with Zoom In](#)

[Selecting a Tool](#)

Tools

[Brush](#)

[Color Eraser](#)

Keyboard: Brush



Paints brush strokes in the drawing area.

To paint, select the tool and press `TAB` until the pointer reaches the drawing area. Then use the arrow keys to move the pointer into the drawing area, press and hold down `INS`, and use the arrow keys to paint.

To change the Brush's shape, press `ALT` and then `O`. Then press `B`, use the `LEFT ARROW` or `RIGHT ARROW` key to select a brush shape, and press `ENTER`.

The drawing width you choose from the Linesize box determines the size of the Brush.

To paint a horizontal or vertical line, press and hold down `SHIFT` after you press and hold down `INS`.

- Related Procedures
- Mouse Version

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Paint Roller](#)

Keyboard: Curve

- Draws a curved line.

To draw a curve, select the foreground color, select the tool, and press `TAB` until the pointer reaches the drawing area. Then use the arrow keys to move the pointer where you want to anchor one end of the curve, press and hold down `INS`, and use the arrow keys to draw the line. When the line is the length you want, release `INS`. Press `INS` and use the arrow keys to stretch the curve in the direction you want. When you are satisfied with the angle of the curve, release `INS`.

To curve the line in only one direction, press `INS`. To curve the line in two directions, press and hold down `INS`, and press the arrow keys. When you are satisfied with the curve, release `INS`.

Until you the curve is pasted down, you can press `F9+DEL` to start over.

The drawing width you choose from the Linesize box determines the line thickness.

- Related Topics
- Mouse Version

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Line](#)

Keyboard: Line



Draws a line.

To draw a line, select the foreground color, select the tool, press `TAB` until the pointer reaches the drawing area, and use the arrow keys to move the pointer where you want to start the line. Then press and hold down `INS` to anchor one end of the line and press the arrows keys. A flexible line stretches from the anchored end to the insertion point. When you are satisfied with the line, release `INS` to paste down the line.

If you are not satisfied with the line, press `DEL` while holding down `INS` to undo the line.

To draw a horizontal, vertical, or diagonal line, press and hold down `SHIFT` after you press and hold `INS`.

The drawing width you choose from the Linesize box determines the line thickness.

- Related Topics
- Mouse Version

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Curve](#)

Keyboard: Box



Draws a box with straight corners.

To draw a box, select the foreground color, select the tool, press `TAB` until the pointer reaches the drawing area, and use the arrow keys to move the pointer where you want to start the box. Then press and hold down `INS` and press the arrow keys. The `LEFT ARROW` and `RIGHT ARROW` keys expand or contract the box horizontally, and the `UP ARROW` and `DOWN ARROW` keys expand or contract the box vertically. When you are satisfied with the box size, release `INS`. Until you release `INS`, you can press `DEL` to start over.

To draw a square, press and hold down `SHIFT` after you press and hold down `INS`. When you are satisfied with the square, release `INS` before releasing `SHIFT`.

The drawing width you choose from the Linesize box determines the thickness of the box's border.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tools

[Filled Box](#)

[Filled Rounded Box](#)

Keyboard: Rounded Box



Draws a box with rounded corners.

To draw a box, select the foreground color, select the tool, press `TAB` until the pointer reaches the drawing area, and use the arrow keys to move the pointer where you want to start the box. Then press and hold down `INS` and press the arrow keys. The `LEFT ARROW` and `RIGHT ARROW` keys expand or contract the box horizontally, and the `UP ARROW` and `DOWN ARROW` keys expand or contract the box vertically. When you are satisfied with the box size, release `INS`. Until you release `INS`, you can press `DEL` to start over.

To draw a square, press and hold down `SHIFT` after you press and hold down `INS`. When you are satisfied with the square, release `INS` before releasing `SHIFT`.

The drawing width you choose from the Linesize box determines the thickness of the box's border.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tools

[Filled Box](#)

[Filled Rounded Box](#)

Keyboard: Filled Box



Draws filled boxes.

To draw a filled box, select background and foreground colors, select the tool, and press `TAB` until the pointer reaches the drawing area. Then use the arrow keys to move pointer where you want to start the box, press and hold down `INS`, and press the arrow keys. The `LEFT ARROW` and `RIGHT ARROW` keys expand or contract the box horizontally, and the `UP ARROW` and `DOWN ARROW` keys expand or contract the box vertically. When you are satisfied with the box size, release `INS`. Until you release `INS`, you can press `DEL` to start over.

If you want a border, select a background color different from the foreground color. The drawing width you choose from the Linesize box determines the border's thickness.

To draw a square, press and hold down `SHIFT` after you press and hold down `INS`. When you are satisfied with the square, release `INS` before releasing `SHIFT`.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tools

[Box](#)

[Rounded Box](#)

Keyboard: Filled Rounded Box



Draws filled rounded boxes.

To draw a filled box, select background and foreground colors, select the tool, and press `TAB` until the pointer reaches the drawing area. Then use the arrow keys to move pointer where you want to start the box, press and hold down `INS`, and press the arrow keys. The `LEFT ARROW` and `RIGHT ARROW` keys expand or contract the box horizontally, and the `UP ARROW` and `DOWN ARROW` keys expand or contract the box vertically. When you are satisfied with the box size, release `INS`. Until you release `INS`, you can press `DEL` to start over.

If you want a border, select a background color different from the foreground color. The drawing width you choose from the Linesize box determines the border's thickness.

To draw a square, press and hold down `SHIFT` after you press and hold down `INS`. When you are satisfied with the square, release `INS` before releasing `SHIFT`.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tools

[Box](#)

[Rounded Box](#)

Keyboard: Circle/Ellipse

- Draws an ellipse.

To draw an ellipse, select the foreground color, select the tool, press `TAB` until the pointer reaches the drawing area, and use the arrow keys to move the pointer where you want to start the ellipse. Then press and hold down `INS`, and press the arrow keys. The `LEFT ARROW` and `RIGHT ARROW` keys expand or contract the ellipse horizontally, and the `UP ARROW` and `DOWN ARROW` keys expand or contract the ellipse vertically. When you are satisfied with the ellipse, release `INS`. Until you release `INS`, you can press `DEL` to start over.

To draw a circle, press and hold down `SHIFT` after you press and hold down `INS`. When you are satisfied with the circle, release `INS` before releasing `SHIFT`.

The drawing width you choose from the Linesize box determines the thickness of the circle's or ellipse's border.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Filled Circle/Ellipse](#)

Keyboard: Filled Circle/Ellipse

- Draws a filled circle or filled ellipse.

To draw a filled ellipse, select background and foreground colors, select the tool, press `TAB` until the pointer reaches the drawing area, and use the arrow keys to move the pointer where you want to start the ellipse. Then press and hold down `INS`, and press the arrow keys. The `LEFT ARROW` and `RIGHT ARROW` keys expand or contract the ellipse horizontally, and the `UP ARROW` and `DOWN ARROW` keys expand or contract the ellipse vertically. When you are satisfied with the ellipse, release `INS`. Until you release `INS`, you can press `DEL` to start over.

If you want a border, select a background color different from the foreground color. The drawing width you choose from the `Linesize` box determines the border's thickness.

To draw a circle, press and hold down `SHIFT` after you press and hold down `INS`. When you are satisfied with the circle, release `INS` before releasing `SHIFT`.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Circle/Ellipse](#)

Keyboard: Polygon

- Draws polygons out of connected straight lines.

To draw polygons, select the foreground color, select the tool, press `TAB` until the pointer reaches the drawing area, and use the arrow keys to move where you want to start the polygon. Then press and hold down `INS`, and press the arrow keys. Release `INS` when you reach the point where you want the first side of the polygon to end. Continue adding sides until you want to complete the polygon. Press `F9+INS` to add the last line. To start the polygon over, press `DEL` before pressing `F9+INS`.

To draw horizontal, vertical, or diagonal lines for the polygon, press and hold down `SHIFT` after you press and hold down `INS`.

The drawing width you choose from the `Linesize` box determines the border's thickness.

To draw lines after the first line without pressing and holding down `INS`, move the pointer where you want a line to end and press `INS`.

- [Related Topics](#)
- [Mouse Version](#)

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Filled Polygon](#)

Keyboard: Filled Polygon

- Draws filled polygons out of connected straight lines.

To draw filled polygons, select background and foreground colors, select the tool, press TAB until the pointer reaches the drawing area, and use the arrow keys to move the pointer where you want to start the filled polygon. Then press and hold down INS, and press the arrow keys. Release INS where you want the first side of the polygon to end. Continue adding sides until you complete the polygon. Press F9+INS to add the last line. To start the polygon over, press DEL before pressing F9+INS.

If you want a border, select a background color different than the foreground color. The drawing width you choose from the Linesize box determines the border's thickness.

To draw horizontal, vertical, or diagonal lines for the polygon, press and hold down SHIFT after you press and hold down INS.

To draw lines after the first line without pressing and holding down INS, move the pointer where you want a line to end and press INS.
- Related Topics
- Mouse Version

Procedures

[Selecting Background and Foreground Colors](#)

[Selecting a Drawing Width](#)

[Selecting a Tool](#)

Tool

[Polygon](#)

Paintbrush

A graphics application with a variety of tools for creating simple or elaborate drawings.

application Control-menu



R estore
M ove
S ize
M inimize
M aximize
C lose
S witch To...

- Restores the application window to its former size.
- Moves the application window to another location.
- Changes the size of the application window.
- Shrinks the application window to an icon.
- Enlarges the application window to its maximum size.
- Closes the application window.
- Starts Windows Task List.



Contains the title of the application running in the window, in this case Paintbrush.

- Drag the title bar to move an application window on the screen.

Minimize button



- Click the Minimize button to shrink the Paintbrush window to an icon.

Maximize button



- Click the Maximize button to enlarge the Paintbrush window to its maximum size.

File menu

File

New

Creates a new drawing.

Open...

Opens an existing file.

Save

Saves changes to the current drawing.

Save As...

Saves a new drawing or an existing drawing under a new name.

Page Setup...

Sets margins, and adds headers and footers.

Print...

Prints a drawing.

Printer Setup...

Sets printer options before printing.

Exit

Exits Paintbrush and closes the Paintbrush window.

Edit menu

Edit

<u>U</u>ndo	Undoes the most recent drawing or editing action.
<u>C</u>ut	Places a cutout from your drawing onto the Clipboard.
<u>C</u>opy	Copies a cutout from your drawing onto the Clipboard.
<u>P</u>aste	Pastes a copy of the Clipboard contents into the drawing.
<u>C</u>opy To...	Saves a cutout in a file.
<u>P</u>aste <u>F</u>rom...	Retrieves a cutout from a file and places it in a drawing.

View menu

<u>V</u>iew	
<u>Z</u>oom <u>I</u>n	Magnifies part of a drawing so you can change a pixel at a time.
<u>Z</u>oom <u>O</u>ut	Fits a drawing to the size of the drawing area.
<u>V</u>iew <u>P</u>icture	Removes everything but the drawing from the screen.
✓ <u>T</u>ools and <u>L</u>inesize	Removes the Toolbox and Linesize box from the window.
✓ <u>P</u>alette	Removes the Palette from the window.
<u>C</u>ursor <u>P</u>osition	Displays the pointer position as x-y coordinates.

Font menu

Font

- Terminal
- Helv
- Courier
- Tms Rmn
- Symbol
- Roman
- Script
- Modern
- ✓ System

Changes text to a different font.

Style menu

Style	
✓ N ormal	Cancels character styles.
B old	Makes text bold.
<i>I</i> talic	Italicizes text.
<u>U</u> nderline	Underlines text.
O utline	Outlines text with the current background color.
S hadow	Creates a shadow around text.

Size menu

Size			
6	24	44	66
8	26	45	70
10	28	48	72
12	30	50	74
15	32	52	75
16	36	54	76
18	37	56	78
19	38	57	80
20	40	60	84
22	42	64	

Changes the size of the text to the font size you choose.

Pick menu

Pick

Flip Horizontal

Flips a cutout from side to side.

Flip Vertical

Flips a cutout from top to bottom.

Inverse

Inverts the colors in a cutout.

Shrink + Grow

Changes the size of a cutout.

Tilt

Tilts a cutout.

Clear

Changes the area within the cutout to the background color.

Options menu

Options

Image Attributes...

Specifies the settings for a new drawing.

Brush Shapes...

Changes the shape of the Brush tool.

Edit Colors...

Creates a custom color and places it in the palette.

Get Colors...

Retrieves color palettes saved in a file.

Save Colors...

Saves color palettes in a file.

Help menu

Help

Index

Displays an alphabetical list of all Help topics.

Keyboard

Displays Help on Paintbrush key combinations.

Commands

Displays Help on Paintbrush commands.

Procedures

Displays Help on Paintbrush procedures.

Tools

Displays Help on Paintbrush tools.

Using Help

Displays information about Windows Help.

About Paintbrush ...

Displays important information about Paintbrush.

menu bar

<u>F</u>ile	<u>E</u>dit	<u>V</u>iew	<u>F</u>ont	<u>S</u>tyle	<u>S</u>ize	<u>P</u>ick	<u>O</u>ptions	<u>H</u>elp
--------------------	--------------------	--------------------	--------------------	---------------------	--------------------	--------------------	-----------------------	--------------------

Contains the names of all the Paintbrush menus.

- Click a menu name to display the menu commands.

Scissors tool

Draws a cutout. A cutout is a selected portion of a drawing. You select a portion of a drawing so that you can carry out an action that affects the cutout. For example, you can copy and paste cutouts, move cutouts, and change the size and shape of cutouts.

Use the Scissors tool instead of the Pick tool when you want the cutout to follow an object's contours.

- Select the tool and drag the pointer until the cutout is enclosed.

Pick tool

Defines a rectangular cutout. A cutout is a selected portion of a drawing. You select a portion of a drawing so that you can carry out an action that affects the cutout. For example, you can copy and paste cutouts, move cutouts, and change the size and shape of cutouts.

Use the Pick tool instead of the Scissors tool when the cutout's size and shape don't need to be precise.

- Select the tool and drag the pointer until the cutout is the size you want it.

Airbrush



Sprays dots in the drawing area.

The drawing width you choose from the Linesize box determines the diameter of the spray. You select the color of the spray by choosing a foreground color.

- Select the tool and drag the pointer through the drawing area.

Text tool

Inserts text in the drawing area.

With menu commands, you can choose a font and font size. You can also choose font styles such as bold, underline, and italics. You select the color of the text by choosing a foreground color.

- Select the tool, move the pointer into the drawing area, and click where you want to start typing.

Color Eraser



Changes the foreground color to the background color.

Use the Color Eraser if you want to change only one color of many in a drawing. The drawing width you choose from the Linesize box determines the eraser size.

- Select the color you want to erase as the foreground color, select the tool, and drag the pointer through the drawing area.

Eraser

Changes any color in the drawing to the background color.

The drawing width you choose from the Linesize box determines the eraser size.

- Select the tool and drag the pointer through the drawing area.

Paint Roller



Fills a closed area with the foreground color.

- Select the tool, move the pointer inside an object, and click.

Brush



Paints brush strokes in the drawing area.

Double-click the tool in the toolbox to choose a brush shape. The drawing width you choose from the Linesize box determines the size of the Brush. You select the color of the strokes by choosing a foreground color.

- Select the tool and drag the pointer through the drawing area.

Curve

Draws a curved line.

You can draw a line that curves in one direction or two. The drawing width you choose from the Linesize box determines the line thickness. You select the color of the line by choosing a foreground color.

- Select the tool, and drag the pointer first in one direction and then the other to create a simple curve.

Line

Draws a line.

The drawing width you choose from the Linesize box determines the line thickness. You select the color of the line by choosing a foreground color.

- Select the tool and drag the pointer.

Box

Draws a box.

The drawing width you choose from the Linesize box determines the thickness of the box's sides. You select the color of the sides by choosing a foreground color.

- Select the tool and drag the pointer.

Rounded Box



Draws a box with rounded corners.

The drawing width you choose from the Linesize box determines the thickness of the box's sides. You select the color of the sides by choosing a foreground color.

- Select the tool and drag the pointer.

Filled Box

Draws boxes filled with a color.

The drawing width you choose from the Linesize box determines the thickness of the box's border. You select the color of the border by choosing a background color and the color of the interior by choosing a foreground color.

- Select the tool and drag the pointer.

Filled Rounded Box



Draws rounded boxes filled with a color.

The drawing width you choose from the Linesize box determines the thickness of the box's border. You select the color of the border by choosing a background color and the color of the interior by choosing a foreground color.

- Select the tool and drag the pointer.

Circle/Ellipse

Draws a circle or ellipse.

The drawing width you choose from the Linesize box determines the thickness of the circle or ellipse. You select the color of the circle or ellipse by choosing a foreground color.

- Select the tool and drag the pointer.

Filled Circle/Ellipse

Draws a circle or ellipse filled with a color.

The drawing width you choose from the Linesize box determines the thickness of the circle's or ellipse's border. You select the color of the border by choosing a background color and the color of the interior by choosing a foreground color.

- Select the tool and drag the pointer.

Polygon



Draws polygons by connecting straight lines.

The drawing width you choose from the Linesize box determines the thickness of the sides. You select the color of the polygon by choosing a foreground color.

- Select the tool, drag the pointer to create lines, and double-click to complete the polygon.

Filled Polygon



Draws polygons filled with a color by connecting straight lines.

The drawing width you choose from the Linesize box determines the thickness of the polygon's border. You select the color of the border by choosing a background color and the color of the interior by choosing a foreground color.

- Select the tool, drag the pointer to create lines, and double-click to complete the polygon.

Linesize box



Determines the width of any lines you make with Paintbrush tools.

Line width affects:

- The border size of objects made with the box, circle/ellipse, and polygon tools.
- The thickness of lines made with the Line and Curve tool.
- The width of Brush strokes and diameter of Airbrush spray.
- The size of the erasers.
- Move the pointer to a line width and click to choose the line width.

Palette



Colors you can use in a drawing.

You can choose background and foreground colors for your drawing. You can also change a color on the palette to a custom color.

- Move the pointer to a color, and click the left mouse button to choose a foreground color or click the right mouse button to choose a background color.

image



Example of a drawing you can create in Paintbrush.

pointer

The object on the screen that follows the mouse's movement and indicates which area of the screen will be affected when you click the mouse button. Outside the drawing, the pointer is usually arrow-shaped. In the drawing, the pointer is usually cross-shaped. However, if you select the text tool, the pointer changes to an I-beam; if you select the Paint Roller, the pointer changes to a Paint Roller.

- Move the mouse to move the pointer.

foreground and background colors



Colors used in a drawing's foreground and background. In the above example, the foreground color (black) sits on top of the background color (white). The foreground color is the color you draw with. The background color is the color you draw on.

- Move the pointer to a color in the palette and click the left button to select a foreground color or the right button to select a background color.

drawing area

Area in which you can create your drawings. If the drawing area is smaller than the Paintbrush window, a black frame separates it from the gray area (the area where you cannot perform any Paintbrush actions).

The drawing area can also contain text or graphics copied from another application.

- Choose the Image Attributes command from the Options menu to specify drawing size you want.

application window

The main window for an application, in this case the Paintbrush window. It contains the Paintbrush tools, palette, and drawing area where you create paintbrush drawings.

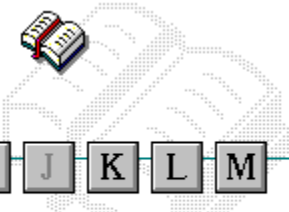
window border 

The outside edge of a window.

- Drag the window border to change the size of the window.

Windows Glossary

Click a button or term.



- A
- B
- C
- D
- E
- F
- G
- H
- I
- J
- K
- L
- M
- N
- O
- P
- Q
- R
- S
- T
- U
- V
- W
- X
- Y
- Z

Windows Glossary

Click a button or term.



A B C D E F G H I J K L M

N O P Q R S T U V W X Y Z

A

[386 enhanced mode](#)

[active](#)

[active printer](#)

[animation](#)

[application](#)

[application icon](#)

[application window](#)

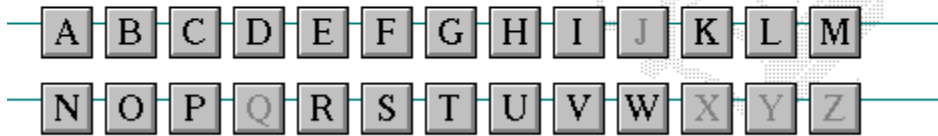
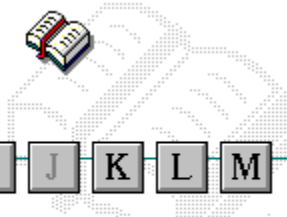
[arrow keys](#)

[associate](#)

[AUTOEXEC.BAT](#)

Windows Glossary

Click a button or term.



B

[<< button](#)

[>> button](#)

[Back button](#)

[base-level synthesizer](#)

[batch file](#)

[baud rate](#)

[bitmap](#)

[branch](#)

[browse](#)

[byte](#)

Windows Glossary

Click a button or term.



[A](#) [B](#) [C](#) [D](#) [E](#) [F](#) [G](#) [H](#) [I](#) [J](#) [K](#) [L](#) [M](#)

[N](#) [O](#) [P](#) [Q](#) [R](#) [S](#) [T](#) [U](#) [V](#) [W](#) [X](#) [Y](#) [Z](#)

C

[cascading menu](#)

[CD-ROM](#)

[channel](#)

[check box](#)

[choose](#)

[Clipboard](#)

[close](#)

[collapse](#)

[command](#)

[command button](#)

[command line](#)

[complementary color](#)

[compound device](#)

[CONFIG.SYS](#)

[Contents button](#)

[Control menu](#)

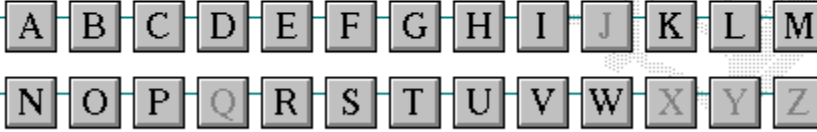
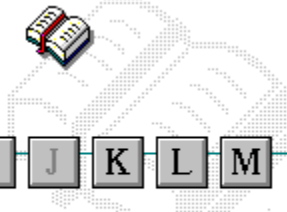
[Control-menu box](#)

[conventional memory](#)

[cutout](#)

Windows Glossary

Click a button or term.



D

[data bits](#)

[default button](#)

[default printer](#)

[desktop](#)

[desktop pattern](#)

[destination directory](#)

[device contention](#)

[device driver](#)

[dialog box](#)

[directory path](#)

[Directory Tree](#)

[Directory Tree window](#)

[directory window](#)

[disk-drive icon](#)

[display box](#)

[document](#)

[document file](#)

[document window](#)

[DOS](#)

[drag](#)

[drop-down list box](#)

Windows Glossary

Click a button or term.



A B C D E F G H I J K L M

N O P Q R S T U V W X Y Z

E

[error-checking](#)

[expand](#)

[expanded memory](#)

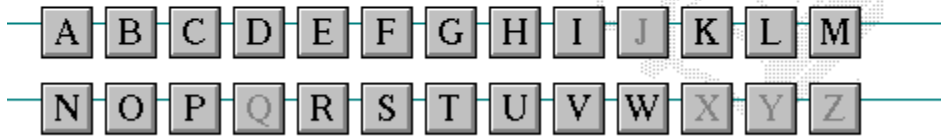
[extended memory](#)

[extended synthesizer](#)

[extension](#)

Windows Glossary

Click a button or term.



F

[file](#)

[file information line](#)

[flow control](#)

[font](#)

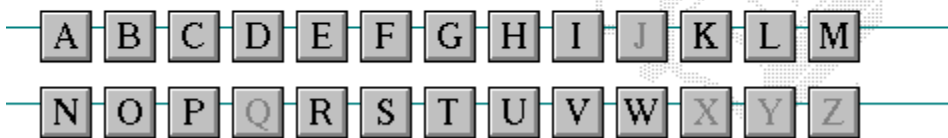
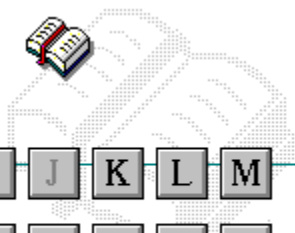
[font size](#)

[format](#)

[full-screen application](#)

Windows Glossary

Click a button or term.



G

General MIDI Mode standard

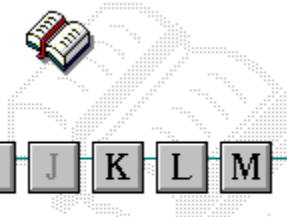
group

group icon

group window

Windows Glossary

Click a button or term.



A B C D E F G H I J K L M

N O P Q R S T U V W X Y Z

H

[History button](#)

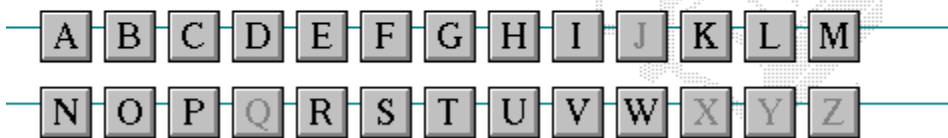
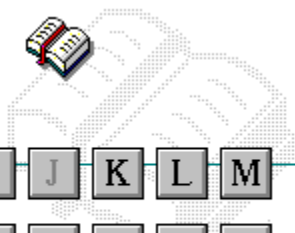
[hotspot](#)

[hue](#)

[HyperGuide button bar](#)

Windows Glossary

Click a button or term.



I

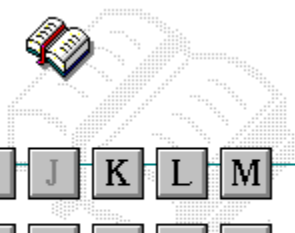
[icon](#)

[insertion point](#)

[International MIDI Association](#)

Windows Glossary

Click a button or term.



A	B	C	D	E	F	G	H	I	J	K	L	M
N	O	P	Q	R	S	T	U	V	W	X	Y	Z

J

No defined terms.

Windows Glossary

Click a button or term.



A B C D E F G H I J K L M

N O P Q R S T U V W X Y Z

K

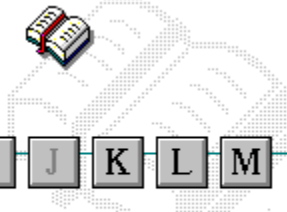
[keymaps](#)

[keyword](#)

[kilobyte](#)

Windows Glossary

Click a button or term.



A B C D E F G H I J K L M

N O P Q R S T U V W X Y Z

L

[list box](#)

[local printer](#)

[local queue](#)

[luminosity](#)

Windows Glossary

Click a button or term.



[A](#) [B](#) [C](#) [D](#) [E](#) [F](#) [G](#) [H](#) [I](#) [J](#) [K](#) [L](#) [M](#)

[N](#) [O](#) [P](#) [Q](#) [R](#) [S](#) [T](#) [U](#) [V](#) [W](#) [X](#) [Y](#) [Z](#)

M

[maximize](#)

[Maximize button](#)

[Media Control Interface](#)

[memory](#)

[menu](#)

[menu bar](#)

[menu command](#)

[menu name](#)

[menu title](#)

[MIDI](#)

[MIDI file](#)

[MIDI Mapper](#)

[MIDI sequencer](#)

[MIDI Manufacturer's Association \(MMA\)](#)

[minimize](#)

[Minimize button](#)

[movie file](#)

[MSCDEX](#)

[multimedia extensions](#)

[Multimedia PC](#)

[multitasking](#)

Windows Glossary

Click a button or term.



A B C D E F G H I J K L M

N O P Q R S T U V W X Y Z

N

[network printer](#)

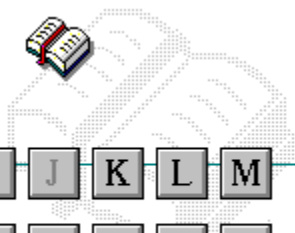
[network queue](#)

[network server](#)

[non-Windows application](#)

Windows Glossary

Click a button or term.



A	B	C	D	E	F	G	H	I	J	K	L	M
N	O	P	Q	R	S	T	U	V	W	X	Y	Z

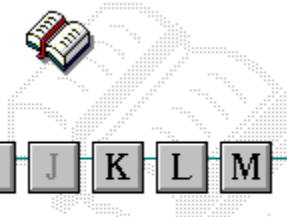
O

[open](#)

[option button](#)

Windows Glossary

Click a button or term.



[A](#) [B](#) [C](#) [D](#) [E](#) [F](#) [G](#) [H](#) [I](#) [J](#) [K](#) [L](#) [M](#)

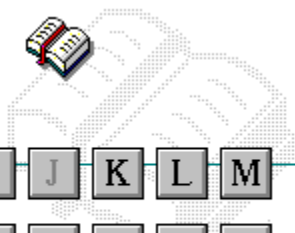
[N](#) [O](#) [P](#) [Q](#) [R](#) [S](#) [T](#) [U](#) [V](#) [W](#) [X](#) [Y](#) [Z](#)

P

[parity](#)
[palette](#)
[patch](#)
[patchmaps](#)
[pathname](#)
[picture elements](#)
[pixels](#)
[playlist](#)
[pointer](#)
[port](#)
[print option](#)
[printer-driver file](#)
[printer font](#)
[printer queue information line](#)
[program file](#)
[program information file \(PIF\)](#)
[program item](#)
[program item icon](#)

Windows Glossary

Click a button or term.



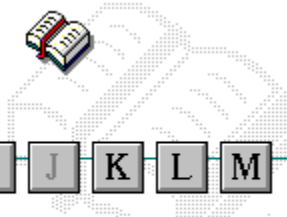
A	B	C	D	E	F	G	H	I	J	K	L	M
N	O	P	Q	R	S	T	U	V	W	X	Y	Z

Q

No defined terms.

Windows Glossary

Click a button or term.



A B C D E F G H I J K L M

N O P Q R S T U V W X Y Z

R

[RGB components](#)

[read-only](#)

[real mode](#)

[Restore button](#)

[root directory](#)

Windows Glossary

Click a button or term.



[A](#) [B](#) [C](#) [D](#) [E](#) [F](#) [G](#) [H](#) [I](#) [J](#) [K](#) [L](#) [M](#)

[N](#) [O](#) [P](#) [Q](#) [R](#) [S](#) [T](#) [U](#) [V](#) [W](#) [X](#) [Y](#) [Z](#)

S

[sample](#)

[saturation](#)

[scaled font size](#)

[screen font](#)

[screen saver](#)

[scroll arrow](#)

[scroll bar](#)

[scroll box](#)

[Search button](#)

[select](#)

[selection cursor](#)

[serial port](#)

[shortcut key](#)

[shrink](#)

[simple device](#)

[solid color](#)

[source directory](#)

[spin box](#)

[standard mode](#)

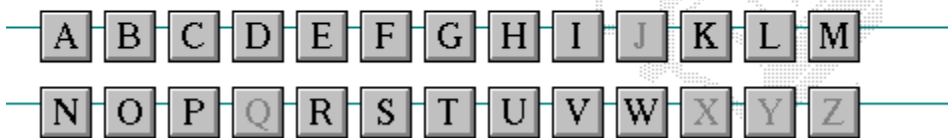
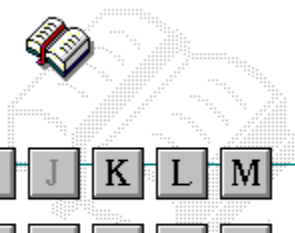
[status bar](#)

[stop bits](#)

[synthesizer](#)

Windows Glossary

Click a button or term.



T

[Task List](#)

[text box](#)

[text file](#)

[title](#)

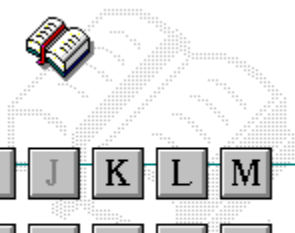
[title bar](#)

[topic](#)

[track](#)

Windows Glossary

Click a button or term.



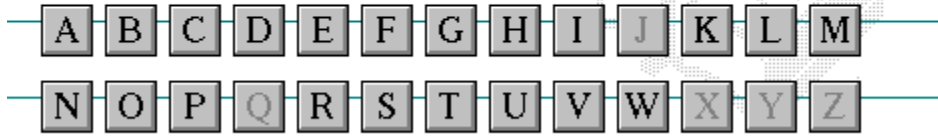
A	B	C	D	E	F	G	H	I	J	K	L	M
N	O	P	Q	R	S	T	U	V	W	X	Y	Z

U

Up button

Windows Glossary

Click a button or term.



V

[vector font](#)

[virtual memory](#)

[volume label](#)

▪ W

waveform

WAVE format

wildcard characters

window

window border

Windows application

wrap

▪ X

No defined terms.

▪ Y

No defined terms.

▪ Z

No defined terms.

386 enhanced mode

Provides access to the virtual memory capabilities of the Intel 80386 processor. With virtual memory capabilities, Windows applications can use more memory than is physically available. Enhanced mode also allows for multitasking of non-Windows applications.

active

Describes the selected window or icon that you are currently working with. Windows always applies the next keystroke or command you choose to the active window. If a window is active, it appears in front of all other windows on the desktop, and its title bar changes color to differentiate it visually from other windows. If an icon is made active, its Control menu appears.

Inactive is the opposite of active and describes windows or icons on the desktop that are not selected.

active printer

An installed printer that has been assigned to a printer port using Setup or Control Panel. More than one printer can be set up to work on a single port, but only one can be active, since only one printer can be physically connected to the port at a time.

An inactive printer is an installed printer that is not currently connected to the printer port.

animation

The display of a series of graphic images, simulating motion. You can play animation files (for example, files with the.MMM extension) with the Media Player accessory. Animations are also called movies.

application

A computer program used for a particular kind of work, such as word processing. This term is often used interchangeably with "program."

application icon



Alarm Clock

An icon that represents an application that is running.

application window

The main window for an application. It contains the application's menu bar and main workspace. An application window may contain multiple document windows.

arrow keys

The four arrow keys on your computer keyboard. These keys move the cursor or pointer on your screen to locations you choose. Each arrow key moves the cursor or pointer in the direction of the arrow on the key. Each arrow key is named for the direction in which arrow points: UP ARROW, DOWN ARROW, LEFT ARROW, and RIGHT ARROW.

associate

To assign files that have the same extension to a program. When you choose a file with the specified extension, the associated application runs with the file loaded.

AUTOEXEC.BAT

Batch file that lists MS-DOS commands. MS-DOS automatically carries out the commands in your AUTOEXEC.BAT file when you turn on your computer. The file is located in the root directory of your first hard disk, which is usually drive C.

Typically, an AUTOEXEC.BAT file starts memory-resident utilities such as a network and sets up environment variables that are used later by applications. In addition, your AUTOEXEC.BAT file might set your MS-DOS prompt or start pop-up programs such as Borland's SideKick.

<< button



Displays the previous topic in a series of topics, until you reach the first topic in the series. Then the button is dimmed. Use this button when you want to backtrack through topics the way they are organized in HyperGuide.

>> button



Displays the next topic in a series of topics, until you reach the last topic in the series. Then the button is dimmed. Use this button to move from topic to topic in the recommended order.

Back button

Displays the last topic you viewed. HyperGuide moves back one topic at a time, in the order in which you viewed them.

base-level synthesizer

One of the two types of synthesizers accommodated by Windows.

MIDI files authored for Windows include two versions of a song: one version for base-level synthesizers and another version for extended synthesizers. The distinctions between base-level and extended synthesizers are based on the number of instruments and notes the synthesizer can play.

batch file

A file that runs a sequence, or "batch," of commands when you type its filename. All filenames of batch files end with the extension .BAT, even though you don't have to type this extension to run the batch file.

baud rate

Signalling speed measured by the number of signals per second.

bitmap



An image stored as an array of bits.

branch



A segment of the Directory Tree, representing a directory and any subdirectories it contains.

browse

To look through files and directories. In some dialog boxes, the Browse button shows a list of files and directories from which you can choose.

byte

The amount of memory space (normally 8 bits) that a computer needs to represent a single character or word.

cascading menu



A menu that opens from a command on another menu.

CD-ROM

Compact Disc-Read Only Memory. An optical data-storage technology that allows large quantities of data (such as animations, images, music, and sound) to be stored on a compact disc similar to discs used by the music industry.

channel

MIDI uses channels to send messages to individual devices within a MIDI setup. There are 16 MIDI channel numbers. Devices in a MIDI setup can be directed to respond only to messages marked with a channel number specific to the device.

check box



A small square box that appears in dialog boxes and can be selected or cleared. When the check box is selected, an X appears in the box.

choose

To use key combinations or your mouse to carry out a command in Windows. You often choose a command after you have selected an item or made it active.

Clipboard



A temporary storage area in memory, used to transfer information. You can cut or copy information onto the Clipboard and then paste it into another document or application.

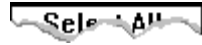
close

To reduce a document window or application window to an icon or, in some cases, to remove it from the desktop. You close a window by double-clicking the Control-menu box or choosing the Close command from the Control menu. When closing an application window, you can choose to save or abandon changes to the current document before you close it.

collapse

To hide a level of directory information in the Directory Tree window. When you first start File Manager, all directories but the root directory are collapsed.

command



A word or phrase, usually found in a menu, that you choose to carry out an action.

command button

A button in a dialog box that carries out or cancels the selected action. Two common command buttons are OK and Cancel. The button that carries out the action will often have a label that describes it (for example, Open, Create, Install). Another dialog box appears when you choose a command followed by ellipses.

command line

Information given to MS-DOS that specifies a command and all the pertinent information to carry it out. For example, to start Windows, you type **win** at the MS-DOS prompt.

complementary color

The color exactly opposite a color on the RGB color wheel. For example, the complementary color of blue is yellow.

compound device

Devices, such as the waveform audio driver, that have an associated file and require a filename specification when opened.

CONFIG.SYS

A file that defines device drivers and specifies your MS-DOS configuration. For example, a typical CONFIG.SYS file might specify the location of the MS-DOS file COMMAND.COM, define an extended memory manager, and specify how many files an application can have open at once. MS-DOS runs the commands in the CONFIG.SYS file each time you turn on your computer. Your CONFIG.SYS file is located in the root directory of your first hard disk, which is usually drive C.

Contents button



Displays the HyperGuide contents.

Control menu

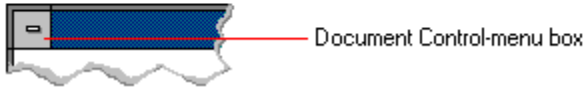


The menu in the upper-left corner of a window. The Control menu appears on every application that runs in a window and on some non-Windows applications. Document windows, icons, and some dialog boxes also have Control menus.

Control menu commands move, change the size of, and close windows. You can also switch to Task List by using the Control menu. For non-Windows applications, Control menu commands transfer information and perform other functions, depending on the application.

Control-menu box

The box located in the upper-left corner of a window. Clicking the Control-menu box opens the Control menu for the window.



conventional memory

The first 640K of memory that MS-DOS uses to run applications. Most computers have at least 256K of conventional memory and can accommodate up to 640K of conventional memory.

cutout



A portion of a Paintbrush drawing you select with the Scissors or Pick tool.

data bits

The bits in each package of data sent between two computers during telecommunication. Most characters are transmitted in 7 or 8 data bits.

default button

The command button in some dialog boxes that is automatically selected or chosen by Windows as the most logical or safest choice. The default button has a bold border, indicating that it will be chosen if you press ENTER. You can override a default button by choosing Cancel or another command button.

default printer

The printer that Windows applications automatically use when you choose the Print command. You can have only one default printer, which must also be the active printer on the port. The printer you use most often should be made the default printer.

desktop

The background of your screen, on which windows, icons, and dialog boxes appear.

desktop pattern

A geometric pattern that appears across your desktop. You can design your own pattern or choose one of the patterns provided by Windows.

destination directory

The directory to which you intend to copy or move one or more files.

device contention

When several applications simultaneously request use of a peripheral device, such as a printer or modem.

Windows automatically handles device contention when all the applications are Windows applications. When one of the applications is a non-Windows application, however, the conflict is handled according to the options you select in the 386 Enhanced dialog box. This dialog box appears when you choose the 386 Enhanced icon in Control Panel.

device driver

Tells Windows how to control a piece of hardware. Using Control Panel, you can install device drivers for your:

- Display (monitor)
- Keyboard
- Mouse
- Network

dialog box

A rectangular box that either requests or provides information. Many dialog boxes present options that you must choose from before Windows can carry out a command. Some dialog boxes present warnings or explain why a command can't be completed.

directory path



The directions to a directory or file within your system.

In the illustration, C:\ART stands for the ART directory on drive C. Any commands you use affect the files and subdirectories in this directory.

When you want to specify a file, make sure the filename follows the directory path.

Directory Tree



A graphic display of a disk's directory structure. The directories on the disk are shown as branching from the disk's root directory.

Directory Tree window



A File Manager window that shows the complete branching structure of the selected disk drive.

directory window



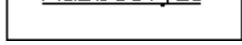
A File Manager window that lists the contents of a specific directory. The directory window shows all the files and subdirectories contained in the directory.

disk-drive icon



An icon in the Directory Tree window of File Manager that represents a disk drive on your system. Different icons depict floppy disk drives, hard disk drives, RAM drives, CD-ROM drives, and network disk drives.

display box



A display box is not an option, but a type of text box that shows an example of another option you have selected, in this case a sample of the 10 pt, underlined, Helvetica font.

document

Whatever you create with an application, including information you enter, edit, view, or save. A document can be a business report, a spreadsheet, a picture, and so on.

document file 

Files that are associated with an application. You can start an application and open the associated file by choosing a document file icon.

document window

A window inside an application window. Each document window contains a single document or other data file. There can be more than one document window inside an application window.

DOS

Disk Operating System, typically known as MS-DOS (Microsoft) or PC-DOS (IBM). This is the underlying software that must exist for your PC to operate.

drag

A mouse move. You drag a Windows element by pointing to it, holding down the mouse button, and sliding the mouse from one spot on the surface of your desk to another and releasing the mouse button.

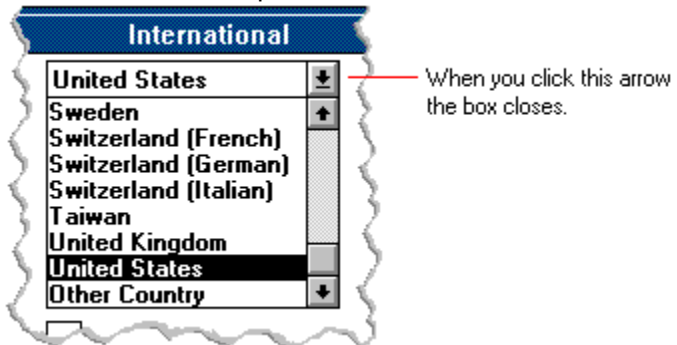
drop-down list box

A list box that opens and closes in dialog boxes.

Before you open a drop-down list box, it looks like this:



After the list box is open, it looks like this:



NOTE: When the list is longer than the box, scroll bars are provided.

error checking

A method for validating transmissions.

expand

To show hidden directory levels in the Directory Tree. With File Manager, you can expand a single directory level, one branch of the Directory Tree, or all branches at once.

expanded memory

Memory in addition to conventional memory that is available to applications. It is allocated in 16K blocks. Windows makes use of expanded memory only if the /r switch is used at startup. Windows running in 386 enhanced mode simulates expanded memory for the applications that need it. Windows running in standard mode or 386 enhanced mode allows applications to use expanded memory, but does not use expanded memory itself in managing applications.

extended memory

Memory in addition to conventional memory that is not readily accessible to MS-DOS or MS-DOS applications. Extended memory cannot be used on 8086 and 8088 computers. Windows running in standard mode or 386 enhanced mode uses extended memory to manage and run applications.

extended synthesizer

One of the two types of synthesizers accommodated by Windows.

MIDI files authored for Windows include two versions of a song: one version for base-level synthesizers and another version for extended synthesizers. The distinctions between base-level and extended synthesizers are based on the number of instruments and notes the synthesizer can play.


extension

Part of a file or directory name that appears after a period and provides additional information. It usually indicates the type of file or directory. For example, program files have default extensions of .COM or .EXE .

Many applications include a default extension automatically when you save a file the first time. For example, Notepad adds a .TXT extension to all filenames unless you specify otherwise.

file

A document or application that has been given a name. All documents are stored as files in Windows.

file information line Write - REPORT.TXT 12% of 101K 12:08 AM 2-6-91

Information specific to each file in a print queue. The information can include these details:

- The file's position in the queue or a printer icon if the file is printing.
- The title of the print job assigned by the application (if your network software supports this).
- What percentage of the file has printed so far.
- The size of the file in kilobytes (if the Print File Size command on the View menu is selected).
- The time and date you sent the file to Print Manager (if the Time/Date Sent command on the View menu is selected).

If you are connected to a network printer, the printer queue information line shows the network server connection. Any detailed information the network can provide appears in the message box at the upper-right corner of the Print Manager window. Networks can provide varying degrees of detailed information.

flow control

The method for controlling the flow of information.

font Water **Water** *Water* Water Water

A graphic design applied to all numerals, symbols, and characters in the alphabet. A font usually comes in different sizes and provides different styles, such as bold, italic, and underlining for emphasizing text.

font size

The height of a printed character, measured in points. One inch equals 72 points. For example, 12-point Helv is 12 points high.

Helv

Helv 8 ABCDEFGHIJKL

Helv 10 ABCDEFGHIJKL

Helv 12 ABCDEFGHIJKL

Helv 14 ABCDEFGHIJKL

The font and font size you use determine the amount of text that fits on one page.

format

(1) The appearance of text on the pages of a document. (2) To prepare a disk so it can hold information. Formatting a disk erases all information that was previously on it.

full-screen application

A non-Windows application that uses the entire screen--rather than a window--to run in the Windows environment.

General MIDI Mode standard

A MIDI specification controlled by the MIDI Manufacturers Association (MMA). The purpose of this specification is to enable MIDI file authors to create files that sound the same across a variety of different synthesizers.

group

A collection of applications within Program Manager. Grouping your applications makes them easier to find.

group icon 

A group window you have reduced to an icon in Program Manager.

group window

A window that displays the items in a group within Program Manager. These items can be applications, files associated with applications, or a combination of both.

History button

Displays a list of the HyperGuide topics you have viewed. Use this button to revisit any of the last 40 HyperGuide topics you have viewed. The most recent topic appears first.

hotspot

Text, graphics, or parts of graphics that provide links to other HyperGuide topics or more information about the current topic.

Whether text or graphics, the pointer changes to the shape of a hand whenever it is over a hotspot. If you click a hotspot that is linked to another topic, that topic will appear in the HyperGuide window. If the hotspot is linked to more information, HyperGuide displays the information in a popup window on top of the HyperGuide window.

hue

The position of a color along the color spectrum.

HyperGuide button bar



Contains the HyperGuide buttons you use to move among topics and contents screens. It is located near the top of the HyperGuide window.

icon

A graphic representation of a disk drive, directory, group, application, document, and so on. You can restore an application icon to a window when you want to use the application.

insertion point |

The place where text will be inserted when you type. The insertion point usually appears as a flashing vertical bar in an application's window or in a dialog box. The text you type appears to the left of the insertion point, which moves to the right as you type.

International MIDI Association (IMA)

The non-profit MIDI organization that circulates information about the MIDI specification.

keymaps

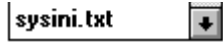
Percussion instruments are key-based--each note plays a different percussion instrument. Keymaps translate MIDI key values to ensure the proper percussion instruments are used to play MIDI files. All MIDI files for Windows are authored using standard key assignments based on the General MIDI Mode standard.

keyword

Words in the HyperGuide Search dialog box that are associated with topics. Each application's documentation has its own keyword list, including the glossary words in HyperGuide. You select from the list of keywords or type a keyword to see the list of topics associated with that keyword.

kilobyte

The measurement used for the size of a computer's memory, where 1 kilobyte (K) = 1,024 bytes.

list box

A box within a dialog box that lists available choices--for example, the list of all available files in a directory. If all the choices don't fit in the box, there will be a vertical scroll bar to the right of the list box. In some list boxes, you can select more than one item.

local printer

A printer that is directly connected to your printer by a cable.

|| 2 Calendar - SCHEDULE.CAL 6K 12:10AM 2-6-91 ||

local queue

Lists the files that you directed to any active printer connected to your computer. The computer and printers are connected locally by a cable.

When Print Manager starts printing on a local printer, its icon appears at the bottom of your screen. If you restore the icon to a window, you see the print queue for any active printer connected to your computer. You can use the Print Manager window to check the status of files in the print queue or to interrupt or cancel a print job.

luminosity

The brightness of the color on a scale from black to white.

maximize

To enlarge a window to its maximum size by using the Maximize button or the Maximize command.

Maximize button ▪

The small button at the upper-right corner of a window that contains an Up arrow. Mouse users can click the Maximize button to enlarge a window to its maximum size. Keyboard users can use the Maximize command on the Control menu.

Media Control Interface (MCI)

A standard control interface for multimedia devices and files. MCI allows a multimedia application to easily control a variety of multimedia devices and files.

memory

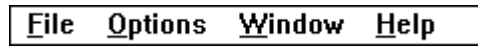
The space in a computer where information is stored while you are working with it. Most PCs have a small amount of read-only memory (ROM), containing the built-in programs that start the operation of the computer when it is turned on, and a large amount of random-access memory (RAM) for users' programs and data.

menu

✓ **Minimize on Use**

A list of available commands in an application window. Menu names appear in the menu bar near the top of the window. The Control menu, represented by the Control-menu box at the left end of the title bar, is common to all Windows applications. You use a command on a menu by selecting the menu name, then choosing the command you want.

menu bar



The horizontal bar containing the names of an application's menus. It appears just under the title bar.

menu command



A word or phrase in a menu that you choose to carry out an action, such as copying a file.

menu name

The name for a particular menu that appears in the menu bar and opens a menu when you choose it.

menu title

A word or phrase in the menu bar that identifies a group of commands. Selecting the menu title causes the title to be highlighted and its menu of commands to appear below it.

MIDI

Musical Instrument Digital Interface. MIDI sets a communications standard for transferring data between musical instruments and associated devices.

MIDI file

A file format for storing MIDI songs. In Windows, MIDI files have a .MID filename extension.

MIDI Mapper

A Control Panel option that lets you create and edit MIDI setup maps. Windows uses these maps to translate and redirect MIDI data.

MIDI Sequencer

Software that creates or plays songs stored as MIDI files. When a sequencer plays MIDI files, it sends MIDI data from the file to a MIDI synthesizer that produces the sounds. Windows provides a MIDI sequencer to play MIDI files.

MIDI Manufacturer's Association (MMA)

A collective organization composed of MIDI instrument manufacturers and MIDI software companies. The MMA works with the MIDI Standards Committee to maintain the MIDI specification.

minimize

To reduce a window to an icon using the Minimize button or the Minimize command. The document or application remains open (or running), and can be the active application or document.

Minimize button ■

The small button at the upper-right corner of a window that contains a Down arrow. Mouse users can click the Minimize button to reduce a window to an icon. Keyboard users can use the Minimize command on the Control menu.

movie file

A multimedia data file (for example, a file with the .MMM extension). You can play movie files with the Media Player accessory. Movie files are also called animations.

MSCDEX

Microsoft Compact Disc Extensions. MSCDEX is software that makes CD-ROM drives appear to DOS as network drives. You must have MSCDEX installed on your computer for the CD-ROM drive to work.

multimedia extensions

Additional features added to Windows version 3.0 that enable your computer to run animations, play sound and MIDI files, and display high-quality images.

Multimedia PC

Multimedia personal computer. A multimedia computer satisfies a minimum set of hardware/software requirements necessary for multimedia computing. The requirements include:

- An 80286/386/486 microprocessor running at 10MHz or faster
- 2MB or more of RAM
- 30MB or larger hard disk
- VGA display
- A digital audio subsystem
- A CD-ROM drive
- Systems software compatible with Microsoft Windows version 3.0 with multimedia extensions

multitasking

The ability of a single computer to perform several tasks simultaneously.

Multitasking makes it possible to print one document while editing another, or to perform lengthy computations while you work on something else.

network printer

A printer that is accessible to your computer only through a network.

network queue

Lists the files on the network server if you are using a network printer.

network server

A computer on a network that provides a particular service to other computers. For example, a disk server manages a large file server, and a print server manages a printer.

non-Windows application

An application that was not designed to run in Windows. Generally, non-Windows applications do not conform to Windows user-interface standards.

open

To display the contents of a directory or file in a window, or to enlarge an icon to a window.

option button



A small round button that appears in a dialog box and is used to select an option. Within a group of related option buttons, you can select only one button.

palette

Defines the colors used in a bitmap image. Every device independent bitmap (DIB) has an associated color palette.

parity

The method of detecting errors in data transmission.

patch

A specific sound created by a synthesizer. A synthesizer plays notes using sounds defined as patches.

patchmaps

A patch is a specific sound created by a synthesizer. A synthesizer plays notes using sounds defined as patches. Patchmaps translate MIDI patch changes to ensure the proper instruments are used to play MIDI files. All MIDI files for Windows are authored using standard patch assignments based on the General MIDI Mode standard.

pathname

The directions to a directory or file within your system. For example, C:\WINDOWS3\APPTS\JUNE.CAL is the pathname of the JUNE.CAL file in the APPTS subdirectory in the WINDOWS3 directory on drive C.

picture elements

The smallest graphics unit on the screen. Also known as pels.

pixels

The smallest graphic units on the screen. Also known as picture elements (pels).

playlist

A list of compact disc titles and tracks that determines the order in which the tracks on the disc are played. Playlists are only used in Music Box.

Use the Program button to assign or edit titles, and to change the playlist.

pointer



In Windows, the shape of the pointer indicates its function.



For selecting Windows items, scrolling, resizing windows, and moving windows and dialog boxes with your mouse. This is the pointer you will see most often.



For choosing a HyperGuide hotspot.



For selecting text with your mouse.



For changing the size of a window with your mouse.



For changing the location or size of a window with your keyboard.



For indicating the application is processing your request.

port

A connection on a computer where you plug in a cable that carries data to a device.

LPT ports are parallel ports. COM ports are serial ports. EPT is a port used for certain printers, such as the IBM Personal Pageprinter. You can use the EPT port only if you have installed a special card in your computer.

Multimedia PCs also have a port for a MIDI sequencer.

print options

Printer-specific settings such as page orientation--portrait or landscape--or the manner in which paper feeds through the printer. These options vary from printer to printer.

printer-driver file

A file that gives Windows important information about how to control your printer, including details about printer features and the printing interface, descriptions of fonts (such as sizes and styles), character translations, and control sequences the printer uses to achieve various formats. Windows has printer-driver files for most commonly used printers.

printer font

A series of dots connected by lines that can be scaled to different sizes. Another name for printer fonts is vector (or stroke) fonts. Plotters typically use vector fonts.

printer queue information line**PCL/HP LaserJet on LPT1 [Printing]**

Indicates the following:

- The name of the printer.
- Where the printer connects to your computer.
- The current status of the printer.

program file 

A file that contains information that controls an application. In File Manager, each program file is represented by an icon. You can start the application by choosing the icon. Filenames for program files can have these extensions: .EXE, .COM, .PIF, and .BAT.

program information file (PIF)

A file that provides important information that Windows needs to run a non-Windows application. PIFs contain information such as the name of the file, a startup directory, whether the program writes directly to the screen or to memory, and multitasking options for applications running in 386 enhanced mode.

program item 

A program file or associated document represented by an icon in Program Manager. The program item provides the instructions Windows needs to start an application and open a document (if specified) when you choose the icon.

program item icon

An icon representing an application you can start or an associated document you can open from a group in Program Manager. The program item provides the instructions Windows needs to start an application and open a document (if specified) when you choose the icon.

RGB components

The amount of each of the three primary colors--red, green, and blue--present in a color. Every color and pattern is made by varying the three primary colors. This is true even in monochrome (black and white) mode. For instance, white is made by mixing together 255 parts of red, 255 parts of green, and 255 parts of blue. Black, on the other hand, is 0 red, 0 green, and 0 blue.

read-only

Describes a file or CD-ROM disc that can only be opened and read. You cannot edit a read-only file or CD-ROM disc and save your changes.

real mode

An operating mode that Windows runs in to provide maximum compatibility with versions of Windows applications released prior to Windows version 3.0. Real mode is the only mode available for computers with less than 1 MB of extended memory.

Restore button

The small button at the upper-right corner of a window that contains both an Up arrow and a Down arrow. The Restore button appears only after you have enlarged a window to its maximum size. Mouse users can click the Restore button to return the window to its previous size. Keyboard users can use the Restore command on the Control menu.

root directory

The main directory on a disk. The root directory is created at the first level when you format a disk. The symbol used to indicate the root directory of a disk is the backslash (\). For example, the root directory for drive C is noted as C:\.

sample

A piece of waveform data represented by a single numerical value. You convert sound into digital form by taking samples of the sound at specific time intervals and converting them to numeric values.

saturation

The purity of a hue, moving from gray to the pure color.

scaled font size

A font size that approximates a specified font size for use on the screen. Windows scales larger font sizes when a size that is available for the printer is not available for the screen. Scaled fonts may look slightly different from unscaled fonts. When you choose a smaller font size that is available for the printer but not for the screen, Windows substitutes the correct size from a precision-drawn font that resembles the selected font as closely as possible.

screen font

A font that duplicates a printer font on your screen.



If you choose a printer font that does not have a corresponding screen font, Windows substitutes a screen font that closely resembles the printer font. The substitute font duplicates the line lengths and page breaks of the font you selected.

When you purchase extra fonts from a printer or font manufacturer, ask about the availability of screen fonts to match.

screen saver

An image or pattern that is shown on your computer screen during periods of inactivity. Screen savers hide information currently on the screen; by changing patterns they can also save wear on the electronics in the display.

scroll arrow

An arrow on either end of a scroll bar that is used to scroll through the contents of a window or list box. Clicking a scroll arrow moves the contents one line. Holding down a scroll arrow scrolls the contents continuously.

Scroll arrows also control the playing of media in some applications, such as Media Player and Sound Recorder.

scroll bar

A bar that appears at the right and/or bottom edge of a window whose contents aren't completely visible. Each scroll bar contains two scroll arrows and a scroll box, which allow you to scroll within the window or list box.

A scroll bar is also used to control playing of media in some applications, such as Media Player and Sound Recorder.

scroll box

The square or rectangular box within a scroll bar that indicates your relative position within a document or list box. Mouse users can drag the scroll box up or down quickly through long documents.

A scroll box is also used to control playing of media in some applications, such as Media Player and Sound Recorder.

Search button

Displays the keywords you can use to search for topics. Use this button to look for topics related to a keyword.

select

To mark an item by highlighting it with key combinations or with a mouse. Selecting does not initiate an action. After selecting an item, you choose the action that affects or involves the item. For example, you can select text and then choose the Copy command to copy the text onto the Clipboard.

selection cursor

The marking device that shows where you are in a window, menu, or dialog box and what you have selected. The selection cursor appears as a dotted box around the text in a dialog box option.

serial ports

Ports used by your system, named COM1, COM2, and so on. Serial ports are typically used for connecting modems, mouse devices, and some kinds of printers.

shortcut key

A key or key combination, available for some commands, that you can press to carry out a command without first selecting a menu. The shortcut key for a command is listed to the right of the command name on the menu.

shrink

To reduce a window to an icon using the Minimize button or the Minimize command. The document or application remains open (or running), and can be the active application or document.

simple device

Devices, such as audio compact-disc players, that don't have an associated file and can be opened without a filename specification.

solid color

A color directly supported by your display.

source directory

The directory containing the file or files you intend to copy or move.

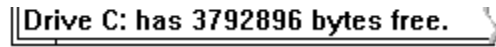
spin box



A spin box shows one item in a range of possible choices. Clicking the Up or Down arrow to the right of the entry lets you "spin" through the available choices until your choice appears in the display rectangle.

standard mode

The normal operating mode for running Windows. This mode provides access to extended memory. In standard mode, you can also switch among non-Windows applications.

status barA screenshot of a status bar from a file explorer window. The text "Drive C: has 3792896 bytes free." is displayed in a bold, black font. The text is enclosed in a thin black rectangular border that has a slight 3D effect, with a shadow on the right side. The background of the status bar is white.

A line of information located at the top or bottom of a window. For example, in a directory window the status bar tells how many files are selected, how much disk space they occupy, and the total number of files in the directory. In the Directory Tree window, the status bar shows the number of bytes available on the disk and the total disk capacity. Not all windows have a status bar.

stop bits

The timing unit between characters.

Stop bits are not actually bits; they determine the time between transmitted characters.

synthesizer

An electronic instrument able to make music and sounds by creating its own audio waveforms and sending them out to an audio system. A synthesizer can play back MIDI files.

Task List

A window that shows all the applications you have running so you can switch among them. You can open the Task List window by choosing Switch To from the Control Menu or by pressing CTRL+ESC.

text box **Filename:**

A box within a dialog box where you type the information needed to carry out a command. When the dialog box appears, the text box may be blank or may contain text.

text file

A file containing only plain text, numbers or symbols. The text in a text file is uniform and does not contain any formatting, such as bold, underline, or different fonts and font sizes. A text file usually consists of characters coded from the ASCII character set.

The advantage of a text file is that it can be transferred to almost any text editor or word processor. Also, MS-DOS and Windows use text files, such as AUTOEXEC.BAT, CONFIG.SYS, and WIN.INI.

title

Another name for a software application written to run on a Multimedia PC.

title bar

The horizontal bar at the top of a window that contains the title of the window or dialog box. On many windows, the title bar also contains the Control-menu box and Maximize and Minimize buttons.

topic

The level in the HyperGuide hierarchy at which you see information in the main window. This information can be in the form of a Quick Look graphic, an explanation of a command, a conceptual overview, a procedure, or a table of keys. Information in pop-up windows and contents screens are not considered topics.

track

A sequence of sound on a CD disc, which usually corresponds to a song.

Up button



Moves up one level in the HyperGuide hierarchy.

vector fonts

A series of dots connected by lines that can be scaled to different sizes.

virtual memory

A memory management system used by Windows running in 386 enhanced mode, which allows Windows to behave as if there were more memory than is actually present in the system. Virtual memory equals the amount of free RAM plus the amount of disk space allocated to a swap file that Windows uses to simulate additional RAM.

volume label

The name you give a disk by using the Label command. Disk labels are optional. You see this information in File Manager only if you assigned a label to your disk. You can change or add a disk label through File Manager.

WAVE format

Microsoft's format for digitized waveform files. These files have a .WAV extension.

waveform

A sound waveform displays variances in air pressure over time. An audio signal waveform displays variances in voltage over time.

wildcard characters

Two MS-DOS characters you can substitute for all or part of a file or directory name when you want to find similarly-named files or want one command to affect a number of files or directories.

An asterisk (*) substitutes for all characters. A question mark (?) substitutes for a single character.

For example, this entry covers all files with a .DOC extension in the current directory:

***.DOC**

And this entry covers everything named with FY, three other characters, and the extension .90:

FY???.90

window

A rectangular area on your screen in which you view an application or document. You can open, close, and move windows, and change the size of most windows. You can open several windows on the desktop at the same time and you can shrink windows to icons or enlarge them to fill the entire desktop.

window border

The outside edge of a window. You can lengthen or shorten each border. You can also change the width of the border with Control Panel's Desktop command.

Windows application

An application that was designed for Windows and will not run without Windows. All Windows applications follow the same conventions for arrangement of menus, style of dialog boxes, use of the keyboard and mouse, and so on.

wrap

The automatic movement of the insertion point from the end of one line to the beginning of the next line as you type. When text wraps, you do not need to press ENTER at the end of each line in a paragraph.

