PE-DESIGN VERSION 4.0





IMPORTANT INFORMATION: REGULATIONS

Federal Communications Commission Compliance Notice (for U.S.A only)

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

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

Important - About the Interface Cable

This equipment has been certified to comply with FCC standards, which are applied to the U.S.A. only. A shielded interface cable should be used according to FCC 15. 27(C).

Caution

Changes or modifications not expressly approved by the manufacturer or local sales distributor could void the user's authority to operate the equipment.

Canadian Department of Communications Compliance Statement (for Canada only)

This digital apparatus does not exceed the Class B limits for radio noise emission from digital apparatus as set out in the interference-causing equipment standard entitled "Digital Apparatus", ICES-003 of the Department of Communications

Radio Interference (220–240V area only)

This machine complies with EN55022 (CISPR Publication 22)/Class B.

For users in the UK, Eire, Malta and Cyprus only

Important

The wires in this mains lead are coloured in accordance with the following code:

BLUE NEUTRAL BROWN LIVE

Note

As the colours of the mains lead of this appliance may not correspond with the coloured markings identifying the terminals in your plugs, proceed as follows:

- Connect BROWN wire to terminal marked L or coloured RED.
- Connect BLUE wire to terminal marked N or coloured BLACK.

When using A.B.S. 1363 fused plug, a 3 Amp. fuse must be fitted.

If the terminals of the plug are unmarked, consult a qualified electrician before use.

Important (in the United Kingdom)

- Mains Supply (AC 230/240V, 50Hz only)
- DO NOT cut off the mains plug from equipment. If the plug fitted is not suitable for the power point in your home or the cable is too short to reach a power point, then obtain an appropriate safety approved extension lead or consult your dealer.
- BE SURE to replace the fuse only with an identical approved type, as originally fitted, and to replace the fuse cover.
- If nonetheless the mains plug is cut off, ensure to remove the fuse and dispose of the plug immediately, to avoid a possible shock hazard by inadvertent connection to the mains supply.

Congratulations on choosing our product!

Thank you very much for purchasing our product. To obtain the best performance from this unit and to ensure safe and correct operation, please read this Instruction Manual carefully, and then keep it in a safe place together with your warranty.

Please read before using this product

For Designing beautiful embroidery patterns

 This system allows you to create a wide variety of embroidery patterns and supports a wider range of sewing attribute settings (thread density, sewing pitch, etc.). However, the final result will depend on your particular sewing machine model. We recommend that you make a trial sewing sample with your sewing data before sewing on the final material.

For safe operation

- Do not use AC adapters other than the model specified for this unit.
- Plug the AC adapter directly in the wall outlet. Do not use extension cords.
- Avoid dropping a needle, a piece of wire or other metallic objects into the unit, or into the card slot.
- Do not store anything on the unit.
- Remember to unplug the AC adapter after each use, and when the unit is not going to be used for a long period.

For a longer service life

- When storing the unit, avoid direct sunlight and high humidity locations. Do not store the unit close to a heater, iron or other hot objects.
- Do not spill water or other liquids on the unit, AC adapter or cards.
- Do not drop or hit the unit or AC adapter.

For repairs or adjustments

In the event malfunction occurs or adjustment is required, please consult your nearest service center.

Notice

This Instruction Manual does not explain how to use your computer under Windows. Please refer to the Windows manuals.

Copyright acknowledgment

MS-DOS and Windows are registered trademarks of Microsoft Corp.

IBM is a registered trademark of International Business Machine Corporation.

Important

Using this unit for unauthorized copying of material from Embroidery Cards, newspapers and magazines for commercial purpose is an infringement of copyright which is punishable by law.

Caution

The software included with this product is protected by copyright laws. This software can be used or copied only in accordance with the copyright laws.

"SAVETHESE INSTRUCTIONS"

"This product is intended for household use."

"For additional product information and updates, visit our web site at: www.brother.com"

New features of Version 4.0

G	eneral
•	Matches new large sewing area (160 mm × 260 mm)
•	Region Motif Sewing
•	More image file types can be entered
•	More thread colors
•	Function to prevent pattern shrinkage (Pull Compensation)92, 177
•	Matches new Original Card
	(Card Writer Box must also be updated if you are using version 1.0-3.0)
•	"Select All" shortcut added
De	esign Center
•	Wizard function
•	Photo stitch
•	Image management
•	TWAIN operation function
La	ayout & Editing
•	Feathered Edge Stitch
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•	Memo Function (Property)
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•	Template function
•	Additions to the point editing function
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•	Next/Previous added to the sewing order change function
•	Changes in the Sewing Attribute Dialog design
•	Realistic Preview Attribute Setting can constantly show updated settings
•	Function for checking the version of the Card Writer Module

File Utility

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Programmable Stitch Creator

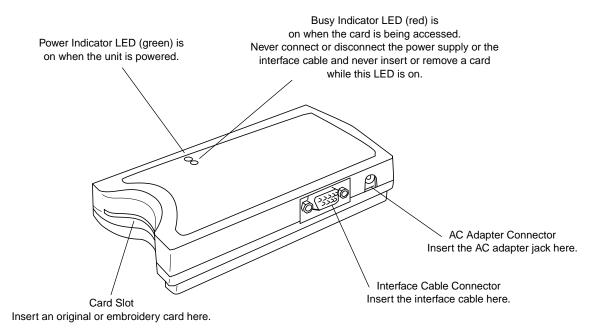
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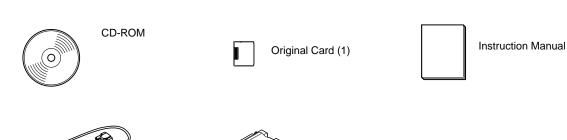
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Before Using

Principal Parts



Accessories



Options

Security Device



Interface Cable

Setting Up

IMPORTANT: Be sure the PC is turned off before making any connection.

Attaching the Security Device

- 1 Attach the included Security Device to the computer's printer port.

 The application will not work if the Security Device is not properly attached.
- ◆ To make sure that the attached Printer Port is set to operate correctly, go to Windows My Computer Control Panel System Device Manager.
 If the settings are different from normal, follow the computer's operation guide to change the settings so that the Printer Port will operate correctly.
- ◆ The application will automatically search for the Security Device, even if the Printer Port is expanded.
- ◆ If you are connecting a printer, scanner, etc., to the Printer Port, first connect the Security Device so that it is closest to the computer, then connect the cable of the device.
- ◆ Even if you connect other printers or other devices after connecting this Security Device, the device should operate with no troubles.

However, if the device does not operate correctly, use an open Printer Port or remove the Security Device to use the other devices.

NOTE:

The devices listed below can not be used in the same Port with the Security Device.

SCSI interface for printer port

Printer Port connection type FDD

Printer Port connection type HDD

Printer Port connection type CD-ROM drive

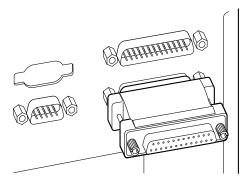
Printer Port connection type ZIP drive

Printer Port communication Interlink or other network software

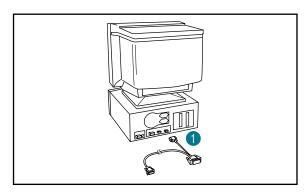
Others, data transmission devices that do not conform to Centronix printer interface standardized specifications.

IMPORTANT:

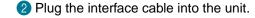
When connecting the Security Device or connecting cables to the Security Device, be sure to turn off the power of the computer and the connecting device.

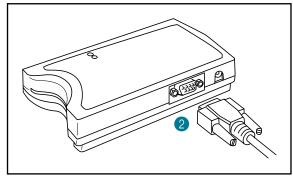


Security Device connected to the computer

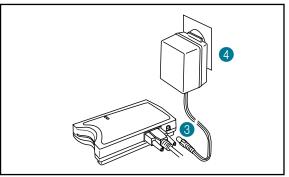


- 1 Plug the supplied interface cable into an RS-232C serial port of your PC.
- Choose a port that is not used for another peripheral.
- In the File Utility application, choose the default port AUTO if no other peripheral is connected. Choose the first available COM port if other peripherals are connected to your computer. See Serial Port Setting on page 208.
- The PC end of the interface cable has two different pin connectors. Use the appropriate pin connector for your computer.

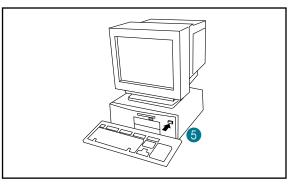




- 3 Connect the AC adapter to the unit.
- 4 Plug the AC adapter into a wall outlet to turn it on.



5 Turn the PC on.



IMPORTANT: It is not recommended to turn a peripheral on/off while the PC is on. Make it a habit to turn on all the peripherals (this unit, the printer, the CRT display...) before you turn your PC on, and to turn the PC off before turning the peripherals off.

Installing the Software

System Requirements

Before you start installing the software on your PC, check that your system meets the following requirements. If it does not, consult your dealer.

PC	IBM-PC or compatible	
CPU	486 or Later (we recommend Pentium or higher)	
Windows	Windows 95 or Later	
Memory	32M or more (we recommend 64M or more)	
Hard disk free space	30M or more	
Display	SVGA (800 × 600) or more, High color (16 Bits) or more	
Serial port	An RS-232C port that is not used with other peripherals	
Printer Port	To connect to the Security Device, 25 pin Printer Port (Parallel Port) is needed.	
Mouse	A mouse that is supported by your version of Windows.	
Printer	A graphic printer that is supported by your system (if you wish to print your images)	
Scanner	If you have a TWAIN standardized scanner, the application can import images directly from the scanner.	
CD-ROM drive Required		

Installing

Note:

When performing an upgrade, if there is no previous version of the application installed, the upgrade can not be installed. After installing the application, you should uninstall any previous versions of the application.

- 1 Start Windows (refer to the Windows manual).
- If you have other Windows applications running, click Cancel to exit, close all the other applications and start again.
- 2 Insert the CD-ROM into the CD-ROM drive. The installer starts up automatically and displays a dialog allowing you to select the language.

If the installer does not start up automatically:

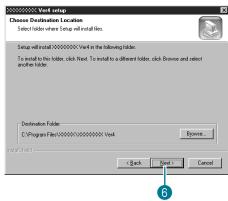
- Click start .
- Click Run on the menu. The Run dialog appears.
- Type the full path of the installation program.
 Example: D:\Setup if the CD-ROM is in drive D, or
 E:\Setup if the CD-ROM is in drive E.

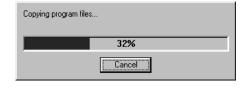
Programmable Stich Creator











3 Select the desired language, and then click **OK**.

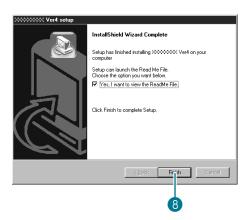
- 4 Wait until the panel shown here is replaced with the **Welcome** dialog shown next.
- 6 Click Next to proceed with the installation.
- If you have other Windows applications running, click Cancel to exit, close all the other applications and start again.

- 6 Click Next to install in the default folder.
- If you want to install into another folder, click Browse. Select a drive and a folder (if necessary, type the name of a new folder). When the desired folder is selected, click OK. The Choose Destination Location shows the selected folder. Click Next to install in that folder.
- Click Back to move back to the previous step.
- Click Cancel to exit.

When you click **Next** on the **Choose Destination Location** dialog, installation starts.

- Wait until this panel is replaced with the next dialog.
- Click Cancel to exit.

Quik Reference



When the setup is completed, this dialog appears.

- 8 If you want to display the README file, just click Finish.
- If you don't want to display the README file, click the check box to delete the check, then click
 Finish.



The installation is complete. The program group window shows the icons for the applications installed.

To start the installed applications:

Double-click the icon of the application you want to start.

The icons can be moved from dialog box to desktop by clicking on icon and dragging. This will create a shortcut.

NOTE:

You may also set up the program in either of the following ways:

- Access the Setup.exe file by double-clicking the My Computer icon, then the name of your CD-ROM
 drive and finally the Setup.exe file or by selecting the name of your CD-ROM drive, then the
 Setup.exe file in the Windows Explorer window.
- Select Add/Remove Programs in the Control Panel window, then click Install in the Install/Uninstall tab and follow the installation prompts.

Note on the use of Version 4.0 and the Internet Explorer

Version 4.0 does not work properly on a PC which is running Internet Explorer Version 4.0. It does work properly, however, with Internet Explorer Version 4.01 (version nr. 4.72.2106.8 and later versions).

If your PC is currently running Internet Explorer Version 4.0, please change it to Version 3.x, Version 4.01 (version nr. 4.72.2106.8 or later versions) or Version 5.x before using your applications.

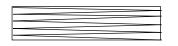
Tips and Techniques for Creating Embroidery Patterns

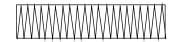
When Satin stitch is used in a wide area, the stitched area may shrink after sewing, depending on the material and the type of thread used. When this happens, switch to this alternate method: Select Fill stitch and use a stabilizer material on the reverse side of the fabric.



Note: When using Satin stitch in a wide area, the needle may move out of position by about 10 mm with some machines. To avoid this, use the above mentioned alternate method.

To limit shrinking, set the stitch direction perpendicular to the larger edge of the area.





Shrinking more likely to occur

Shrinking less likely to occur

After creating an embroidery pattern made of several different parts (in Design Center or Layout & Editing), make sure that you check the sewing order and correct it if necessary.

With Design Center, the default sewing order is the order in which the sewing attributes are set. With Layout & Editing, the default sewing order is the order in which the elements are drawn.

There are two ways of enlarging or reducing an imported embroidery pattern in Layout & Editing. You may choose to simply scale your pattern with the selection cursor or apply the Stitch to Block function to the pattern and then scale it.

When you scale an imported pattern, the number of stitches that will be sewn remain the same, resulting in a change of embroidery quality if the size of the pattern is greatly changed.

Selecting the Sew – Stitch to Block command, then scaling a pattern allows you to keep the original embroidery quality of the pattern, as the number of stitches that will be sewn automatically adapt to the new size. Selecting the "Normal" sensitivity setting of the Stitch to Block function will allow you to maintain the embroidery quality in most cases. Selecting a finer density setting in the Stitch to Block Sensitivity dialog will allow you to obtain a more complex embroidery; selecting a coarser density will create a simpler embroidery.

When a pattern is scaled only moderately, it may not be necessary to apply the Stitch to Block function.

This system allows you to create a wide variety of embroidery patterns and supports wider ranges for the setting of the sewing attributes (thread density, sewing pitch, etc.). However, the final result also depends on your particular sewing machine model. We recommend that you make a trial sewing sample with your sewing data before sewing on the final material. Remember to sew your trial sample on the same fabric, using the same needle and the same machine embroidery thread as your final material.

Getting Started

Introduction

This package contains four applications:

Design Center

Design Center is used to create embroidery patterns from images. The images may come from scanning a printed image or can be created with an application like Paint[®]. The extension of the image files must be **bmp**, **tif**, **jpg**, **pcx**, **wmf**, **png**, **eps**, **pcd**, or **fpx**. Design Center automatically detects outlines in the image and replaces them with broken lines that can be edited and assigned sewing attributes. The procedure is divided in four steps:

- ◆ Stage 1 Original Image: You open the image file and select one or more colors that the application will use to retrace the outlines.
- ◆ Stage 2 Line Image: The original color image is replaced with a black and white image (the colors selected in Stage 1 become black, and all the other colors become white). You can edit this image using pens and erasers of different thicknesses. (You can also start at this step and draw a complete black and white image by hand.)
 - When the image is ready, you set and start the automatic retracing process.
- ◆ Stage 3 Figure Handle: The black and white image is replaced with a set of outlines made of editable broken lines. You can edit the broken lines by moving, inserting or deleting points.
- ◆ Stage 4 Sew Setting: In this final step, you apply sewing attributes (thread color and stitch type) to the outlines and regions inside.

At any stage, you can save your work to retrieve it later. Up to stage 2, the file will be saved with the extension **pel**. In stages 3 and 4, the file will be saved with the extension **pem**. Saving your work as you move through the stages will be helpful if you make changes and then decide to use the original pattern again.

When your image has reached stage 4, you can import it in Layout & Editing. The image will be considered a single object by Layout & Editing, which means that you will be able to move and scale it, but you will not be able to edit the outline. You can however change the pattern and some of the sewing attributes after applying the Stitch to Block function.

Layout & Editing

Layout & Editing is used to assemble a complete embroidery image from various components. These components include:

- Embroidery patterns created with Design Center.
- ♦ Embroidery patterns purchased on Embroidery cards from your dealer (installed using the File Utility application). Note that some patterns cannot be read.
- Embroidery patterns in the Tajima, Melco, Pfaff and Husqvarna formats.
- ◆ Patterns created within Layout & Editing itself. These patterns include text, circles and related shapes, rounded boxes, polygonal lines, curves and manual punching patterns.

After gathering the different components of your embroidery picture, you can use the layout functions to modify their relative position, orientation and scale.

When an embroidery image is complete, you can save it (the file name extension will be **pes**) and write it to an Original card. The Original card can then be inserted into your sewing machine and the embroidery process continued.

Programmable Stitch Creator

Programmable Stitch Creator allows you to create, edit and save fill stitch patterns, which you can apply to the enclosed regions of patterns, both in Design Center and Layout & Editing. The fill stitch pattern files are saved as **pas** files. The application comes with a number of **pas** files, which you can use as such or edit to enhance your embroidery patterns.

File Utility

This application is used to handle file exchanges between your disk and the card module. It has two functions:

- ◆ Install Embroidery Card: This is used to transfer embroidery data from an optional embroidery card to your hard drive or another disk.
- Write to Original Card: Transfers embroidery data files created with Layout & Editing to an original card.

About this Chapter

The next three sections of this chapter are organized as a tutorial to provide you with a hands-on introduction to the different features of the applications.

You will first create a pattern using Design Center.

Next, the pattern will be imported into Layout & Editing. You will learn how to add a few components to the embroidery image and to organize the layout.

In the third section, you will then learn how to use Programmable Stitch Creator to edit a programmable stitch in order to create your own.

File Utility

Using Design Center

In this section, we are going to create an embroidery pattern. That pattern will be created by automatic retracing of an image. This pattern will be used later as the stepping stone to creating a more complex embroidery picture.

The complete procedure will take us through the different steps of a normal working session with Design Center and will introduce you to its most important features.

Step 1	Starting Design Center	page 12
Step 2	Opening an Image	page 13
Step 3	Converting to Line Image	page 14
Step 4	Editing Lines	page 15
Step 5	Converting to Figure Handle Image	page 17
Step 6	Moving to Sew Setting	page 18
Step 7	Setting Sewing Attributes	page 18
Step 8	Previewing the Image	page 22
Step 9	Saving the File	page 23

Please follow these instructions step by step, in the sequence given. If you have to interrupt your training for any reason, it is recommended to save the file (see Step 9). You will be able to retrieve it later and resume your work.

Step 1 Starting Design Center

1 To start Design Center, click the start Design Center to open the Design Center window.

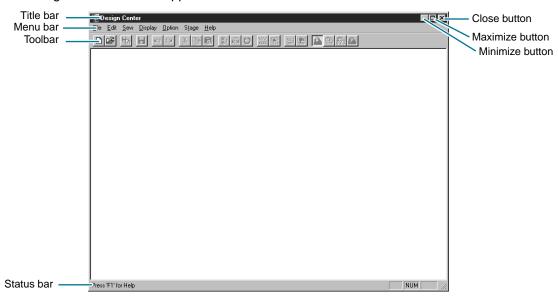
You may also double-click the Design Center icon in the program group.



If the shortcut icon for Design Center is created, for example, on computer desktop, double-click it to start program.

You can also click **Option** on the menu bar of Layout & Editing, then click **Design Center** on the submenu.

The Design Center window appears.



The window size will be smaller than the display area on the screen of your personal computer.

2 To make the Design Center window fill up the available space on your screen, click the maximize button on the right side of title bar.

If you are working with other programs, you can reduce the Design Center window temporarily to an icon (see icon below) by clicking the minimize button on the right side of the title bar. You can then access the other windows and icons on the display screen by using the mouse.



To return to the Design Center window, click the icon, bearing the name of the opened document, at the bottom of your screen.

Step 2 Opening an Image

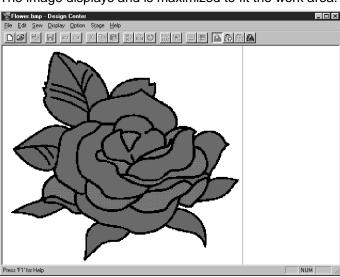
We are now going to open an image and convert it into an embroidery image. If wizard dialog opened, click cancel to close the dialog wizard.

① Click File on the menu bar, then click Open on the submenu. The Open dialog appears.



- Select the file Flower.bmp in the Data folder.
 - If the Preview check box is checked, the contents of the selected file displays in the Preview window.
- Click Open to open the file.
- Double-clicking the file name will also open the file and close the dialog.

The image displays and is maximized to fit the work area.



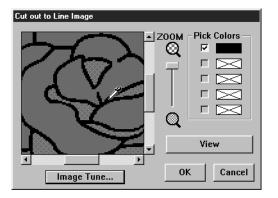
Step 3 Converting to Line Image

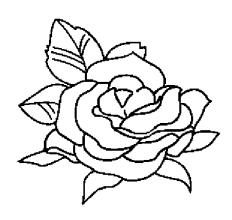
Move to line image: Click Stage on the menu bar, then click To Line Image on the submenu. You can also click the button of the Toolbar shown below:



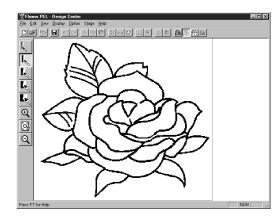
NOTE: Many menu functions can be activated by clicking a button on the Toolbar.

The **Cut out to Line Image** dialog will display. In this dialog, you will select the color(s) that will be used to make the outline of the image.





- ◆ If necessary, scroll and zoom the image.
- ◆ Move the cursor over the image. Its shape changes to .Click on any point of the outline. The selected color displays in the upper box under Pick Colors and a . appears in the check box to show that the color is selected.
- When the outline of the image uses more than one color, you can repeat to select a total of five colors.
 If you try to select more, colors are scrolled down, and the color that was at the bottom is deselected.
- If you selected a color by mistake, simply click its check box to deselect it.
- Click View to see the effect of your selection.
- If you wanted to select another choice of color, click Cancel. The image displays again and you can repeat this step with another color.
- If your preview image looks like the one shown here, click OK to confirm the outline of your pattern.
- ◆ Click Cancel to exit and go back to the image.
- If necessary, click Image Tune to reduce the colors or the noise. (page 105)
- When you click OK, the line image displays.



 At this stage, the data can be saved as a *.pel file.

Quik Reference

Editing Lines

At this step, you might normally need to correct a few lines. You should especially make sure that the lines around regions are completely closed or intersect to form a region. You may also wish to edit a line image and either add or remove some details or your image. You can do this at this stage using the pens and erasers of the Tool Box.

In this example, you are going practice how to use an eraser to remove some of the outline.

- 1 To make your editing job easier, enlarge the image using the zoom function.
 - Click | ♥ on the Tool Box. The shape of the cursor changes to ⊕ when you move it over the work area.
- 2 Drag the cursor over the pattern and click. The area is enlarged as soon as you release the mouse. You can repeat this step several times. To zoom in on a specific area, position the cursor to a point just next to the area, then click the left mouse button and hold it down as you move the cursor diagonally. A dotted box appears as you drag and the selected area will be magnified when you let go of the mouse button.

For a more complete description of the zoom features, see "Zoom-in Mode" on page 59, "Zoomout Mode" and "Fit Design Page to Window" on page 60.

- on the Tool Box. The shape of the cursor changes to when you move it over the work area.
- Position the cursor over the first line you want to erase. Click and hold the right button of the mouse. The shape of the cursor changes to 🍳
- 5 Carefully erase the line, then move the cursor to the next line to erase and scroll the image as needed. Repeat this procedure to delete a few petals and leaves.

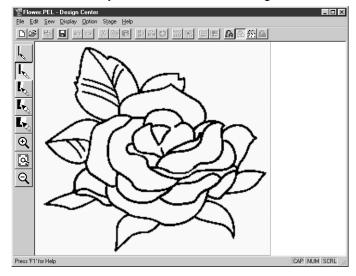
NOTE:

If you deleted parts of the outline by mistake, you may need to redraw some of lines. To do this, simply hold down the left mouse button and start drawing the line. If you are not satisfied with your editions, you can go back to Stage 1, convert your pattern and start editing again.

6 After editing your image, you will want to zoom out again to view the whole picture. There are two ways of proceeding.

Click on the Tool Box. The shape of the cursor changes to when you move it over the work area. Click a point of the Design Page and the image shrinks toward that point. Repeat this step several times.

Click on the Tool Box. The Design Page fits the Design Center window automatically. Your window may now look like the following:



Step 5 Converting to Figure Handle Image

In Stage 2, the image is just a collection of dots or pixels. Editing in Stage 2 means adding or removing black dots. When you move to Stage 3 (figure handle image) the application automatically follows adjacent black dots to detect paths and replaces them with broken lines. Those broken lines can then be edited.

① Click Stage on the menu bar, then click To Figure Handle on the submenu. You can also click the button of the Toolbar shown below:



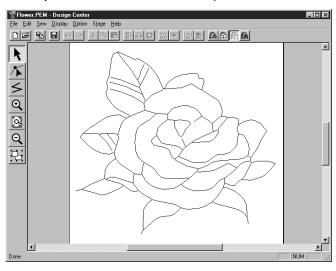
The following dialog will display.



This dialog allows you to preview how the image will fit in the selected Design Page. The Design Page size is the actual size of the area to be sewn.

- Leave all settings unchanged and click OK.
- For more details about the settings, see "Design Page Property" on page 101 and "To Figure Handle" on page 106.

2 When you click **OK**, the conversion process starts. After a while, the figure handle image appears.



The Tool Box provides editing tools to draw lines, move, delete points or insert new points, as well as zooming tools. In this example, we will however leave the image as is. For details on how to edit the figure handle image, see "Using the Stage 3 Tool Box" page 61.

NOTE:

You may also change the Design Page properties at this stage using the menu command Option - Design Page Property, which will open the Design Page Property dialog.

File Utility

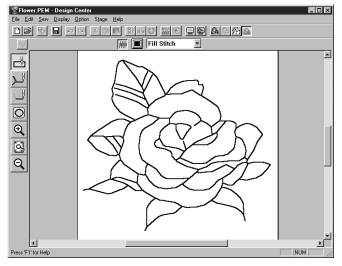
Step 6 Moving to Sew Setting

① Click Stage on the menu bar, then click To Sew Setting on the submenu.

You can also click the button of the Toolbar shown below:



The Sew Setting window appears.



In this stage, you can set and check the sewing attributes of each part of the pattern. You can also set a pair of patterns for hole sewing in order to avoid sewing twice at the same place. The other tools available are for zooming.

- 2 To zoom in and out, use the and buttons on the Tool Box in the same way as you did at the Figure Handle stage.
- 3 To maximize the Design Page so that it fits the window, click on the Tool Box.

Step 7 Setting Sewing Attributes

We are now going to apply sewing attributes to the different parts on the picture.

Setting the outlines

1 Click on the Tool Box.

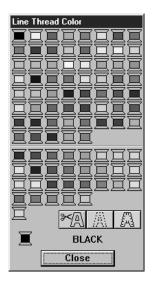
The shape of the cursor changes to \triangleright and is displayed together with a small figure of the Tool Box button.

The Sewing Attributes bar now looks like this:



Quik Reference

2 To set the outline color: Click the Line color button on the Sewing Attributes bar to display the Line Thread Color dialog.



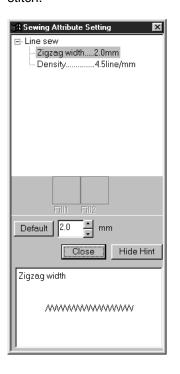
- Click the desired color if you want a color other than black.
- Click Close only if you want to remove the dialog from the screen.
- Place the cursor on the title bar; click and drag the dialog box to a more convenient place on the screen.

The **Line color** button shows the selected color.

- 3 To set the stitch type: Click the **Line sew type** selector Running Stitch on the Sewing Attributes bar, then click **Zigzag Stitch**.
- 4 To set the characteristics of the zigzag stitch, click **Sew** on the menu bar, then click **Sewing**Attribute on the submenu. You can also click the button of the Toolbar shown below.

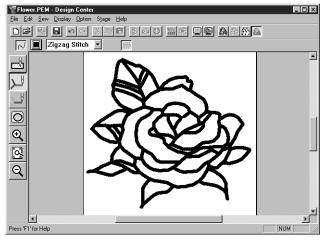


The **Sewing Attribute Setting** dialog appears. The dialog displays the default settings for the line stitch.



- ◆ To change the width from 2.0 mm to 1.5 mm, for example, type or select 1.5 in the Zigzag width selector.
- Click Close if you want to remove the dialog from the screen.

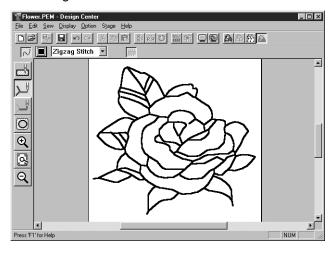
6 Click on the outline of the pattern to apply the settings (color and stitch type) to the outlines. Your image now looks like this:



If you think that the outline is still too thick, you can change it now.

- 6 To change the width of the outline: Click on the outline using the mouse's right button. The **Sewing Attribute Setting** dialog displays.

 Proceed in the same way as described in point 4 to change the Zigzag width from 1.5 mm to 1 mm.
- Click on the outlines to apply the new setting. Your image now looks like this:



Setting the regions

1 Click on the Tool Box.

The shape of the cursor changes to \triangleright and is displayed together with a small rectangle. The Sewing Attributes bar now looks like this:



For the leaves:

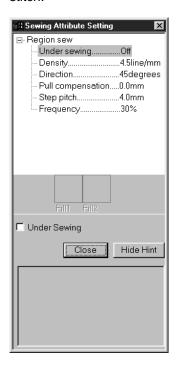
Click the **Region color** button on the Sewing Attributes bar to display the **Region Thread Color** dialog, then select the **LEAF GREEN** color. Refer to the list of color names on page 230.

The **Region color** button **s**hows the selected color.

Click the Region sew type selector Fill Stitch on the Sewing Attributes bar, then click Fill Stitch. To set the characteristics of the fill stitch, click Sew on the menu bar, then click Sewing Attribute on the submenu. You can also click the button of the Toolbar shown below.



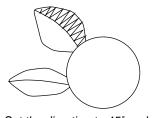
The **Sewing Attribute Setting** dialog appears. The dialog displays the default settings for the region stitch.



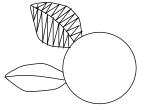
- Set the direction of the fill stitch as explained in the "NOTE" below.
 - Click on the regions of the leaves to which you want to apply a setting.
 - Repeat the same operation for each stitch direction.

NOTE:

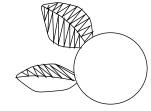
Using different directions for different regions can add contrast and improve the appearance of the embroidery.



Set the direction to 45° and click.



Set the direction to 90° and click.

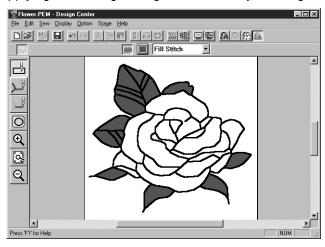


Set the direction to 135° and click.

NOTE:

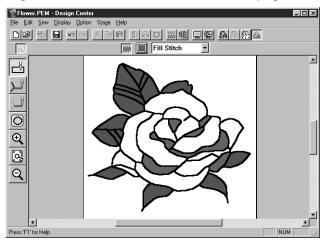
To be able to apply the sewing settings to a region, the region has to be closed. If you cannot apply any setting to a given region, go back to the Figure Handle stage and make sure that region is closed. Edit any faulty line with the Point Edit tool. For details on how to edit the figure handle image, see "Point Edit Mode" on page 64.

After applying the sewing setting to the leaves, your image will look like this:



2 For one side of the petals:

Select the **CARMINE** color and set the direction, then click each region you want to apply the settings to. Refer to the list of color names on page 230.



Select the RED color and set the direction, then click each region you want to apply the settings to. Refer to the list of color names on page 230.

Step 8 Previewing the Image

To see how the pattern will look like once sewn, you can use the preview feature.

Toolbar: 미글 및 및 요구 사람은 원주이 ※## 및 필필 요요요요

Operation:

1 Click Display, then Preview.

You can also click on the button of the Toolbar shown above. A preview of your embroidery pattern will appear.

2 To return to the normal working screen, click Display, then Preview or the Toolbar button again.

NOTE:

You cannot do any editing on the preview screen.

Step 9 Saving the File

This image will be used as the basis of a more complex embroidery picture. For that reason, we need to save it.

① Click File on the menu bar, then click Save As on the submenu. This dialog displays.



- A default name Flower.pem is displayed.
- If necessary, change the drive and folder.
- Click Save to save the file.

NOTE:

To save the file under its default file name and in the same folder as the original file, you could use **Save** instead of **Save As**.

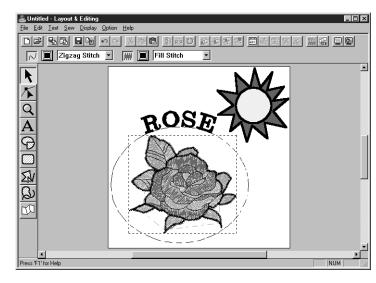
If you did not save the line image data, you will be asked whether you want to save it as a *.pel file.

Using Layout & Editing

In this section, we are going to compose a complete embroidery file combining a pattern imported from Design Center as well as patterns created with Layout & Editing, one of which we will apply a programmable stitch to.

The complete procedure will take you through the different steps of a normal working session with Layout & Editing and will introduce you to some of its most important features.

At the end of this session, your embroidery picture will look like this:



Step 1	Starting Layout & Editing	page 25
Step 2	Importing Embroidery Patterns from Design Center	page 26
Step 3	Zooming In and Out	page 27
Step 4	Moving the Embroidery Pattern	page 30
Step 5	Adding an Oval	page 31
Step 6	Adjusting the Size and Location of the Oval	page 32
Step 7	Adding Text	page 33
Step 8	Fitting the Text around the Oval	page 35
Step 9	Moving the Oval and Text	page 36
Step 10	Adding a Circle for Drawing the Sun	page 36
Step 11	Selecting a Programmable Fill Stitch	page 38
Step 12	Adding Broken Lines for Drawing the Sun Rays	page 40
Step 13	Changing the Sewing Order of Sun and Rays	page 41
Step 14	Adjusting the Rays	page 41
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Step 16	Previewing the Sewing Image	page 43
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Step 18	Saving the File	page 44

Please follow these instructions step by step, in the sequence given. If you have to interrupt your training for any reason, feel free to save the file (see Step 18). You will be able to retrieve it later and resume your work.

File Utility

Step 1 Starting Layout & Editing

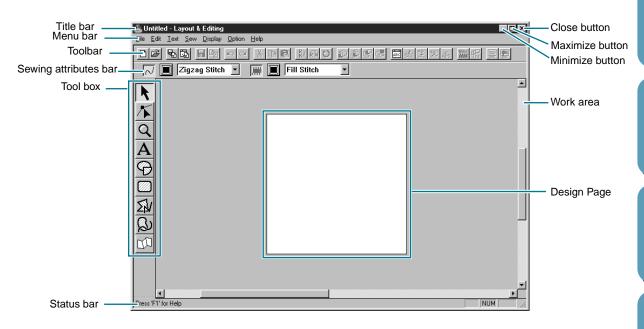
To start Layout & Editing, click the start Layout & Editing to open the Layout & Editing window.

You may also double-click the Layout & Editing icon in the program group.



If the shortcut icon for Design Center is created, for example, on computer desktop, double-click it to start program.

The Layout & Editing window appears.



The window size will be smaller than the display area on the screen of your personal computer.

2 To make the Layout & Editing window fill up the available space on your screen, click the maximize button on the right side of title bar.

If you are working with other programs, you can reduce the Layout & Editing window temporarily to an icon by clicking the minimize button on the right side of title bar. You can then access the other windows and icons on the display screen by using the mouse.



To return to the Layout & Editing window, click the icon.

NOTE:

If needed, you may change the Design Page properties at this point using the menu command Option - Design Page Property, which will open the Design Page Property dialog. However, we will leave the settings as is in this example.

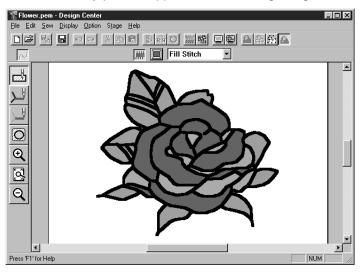
Step 2 Importing Embroidery Patterns from Design Center

The first components of our embroidery picture will be a pattern imported from Design Center. If you interrupted the exercise and closed the Design Center window, you will have to start the application again and open the saved **Flower.pem** file again.

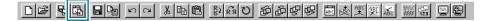
- To start Design Center, click **Option** on the menu bar, then click **Design Center** on the submenu. The **Design Center** window displays.
- 2 Click File on the Design Center menu bar, then click Open on the submenu. An Open dialog similar to this will display.



- Select the drive, the folder and the file name (Flower.pem), then click Open.
- If the Preview check box is checked, you may view your files in the Preview window.
- Be sure to select a pem file saved in stage 4. You cannot import another file type from Design Center.
- 3 The embroidery pattern appears on the Design Page of the Design Center application.

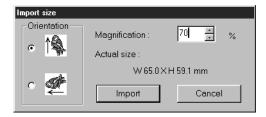


- 4 Click on the Layout & Editing window to bring it in the foreground of the screen.
- **5** Click **File** on the Layout & Editing menu bar, click **Import** on the submenu, then click **from Design Center**. You can also click the button of the Toolbar shown below.



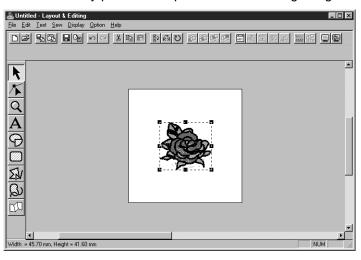
Quik Reference

6 The Import Size dialog appears.



- ◆ Select **70** %, for example.
- Leave the default orientation setting as is.
- ◆ Click Import.

The embroidery pattern is imported into the Design Page of Layout & Editing.



The dotted line and the handles that appear around the image mean that the image is selected. An imported image is always selected as a single object. It is not possible to select a part of an imported image separately.

Step 3 Zooming In and Out

The quality of the display depends on the screen resolution of your computer. By default, the window is set so that the entire Design Page is visible. If you need to work on a specific part of the Design Page, you might wish to see a more detailed display of that part. This can be achieved by zooming in. When you want to see the whole Design Page again, you can zoom out.

We are going to show how to zoom in on a portion of the picture and how to return to the standard display.

For a more complete description of the zoom features, see "Zoom Mode" on page 125.

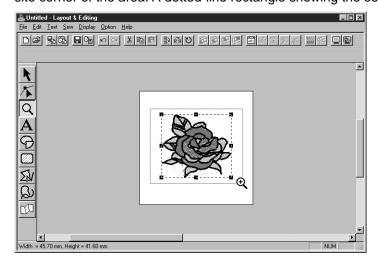
1 Click Q on the Tool Box.

Five buttons appear: QQ 1:1 🖳

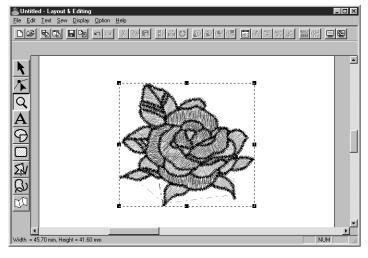
2 Click 🗨

The shape of the cursor changes to \bigoplus .

3 Drag the cursor across the area that you want to enlarge and click. Alternatively, position the cursor at a corner of the rectangular area that you want to enlarge, then click the mouse's left button and keep the button down while moving the mouse toward the opposite corner of the area. A dotted-line rectangle showing the selected area appears.

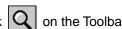


Release the mouse's button when the dotted-line rectangle matches the area that you want to enlarge. When you release the mouse's left button, the selected area is enlarged.

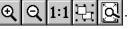


The whole picture is enlarged at the same time. Repeat this procedure to enlarge the pattern even more.

4 To display the image with its real dimensions, click |Q| on the Toolbar.

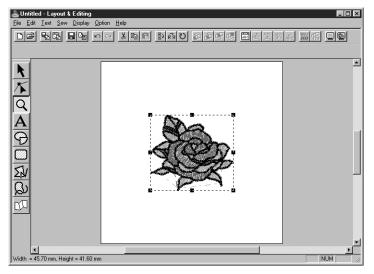


Five buttons appear:



File Utility





Step 4 **Moving the Embroidery Pattern**

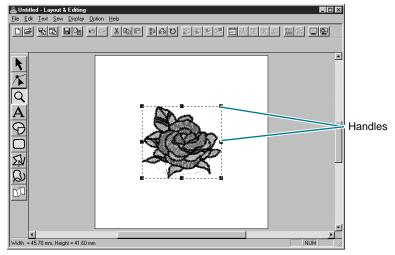
When you import a pattern from Design Center, Layout & Editing puts the pattern at the center of the Design Page. We are now going to see how to move the imported pattern to a different location.

1 Click on the Tool Box.

The shape of the cursor changes to \mathbb{R} .



2 Click the pattern.

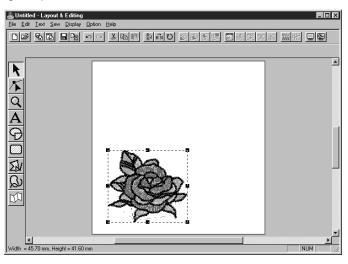


The Status bar shows the dimensions (width and height) of the selected pattern.

3 Move the cursor over the selected pattern.

The shape of the cursor will change to \Leftrightarrow

You can now drag the pattern to another location.



Step 5 Adding an Oval

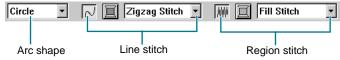
The next component of our embroidery picture will be an oval. Since this oval will be used only as a guide to fit text that we will add later, we must set it so that it is not sewn.





on the Tool Box.

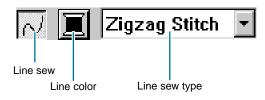
The shape of the cursor changes to + and displays together with a small ellipse. The Sewing Attributes bar now looks like this:

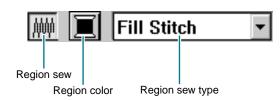


If you keep the cursor for a while on a button or selector of the Sewing Attributes bar, a small label indicating the function of the button will display.

The Arc shape selector allows you to select the shape of the pattern. For example, Circle is used to draw circle and ellipses. The other options are used to draw circle-related patterns such as arcs. For more details, see "Circle and Arc Drawing Mode" on page 128.

The Line stitch and Region stitch groups of buttons are for setting the stitch type and thread color for the outline (Line stitch) and for the region inside (Region stitch).





If you click on the Line sew button, the Line color button and the Line sew type selector disappear. This means that the outline will not be sewn. To make the Line color button and the Line sew type selector reappear, click the Line sew button again.

Select the shape: Since the default shape is Circle, you don't need to change the setting in the Arc shape selector.

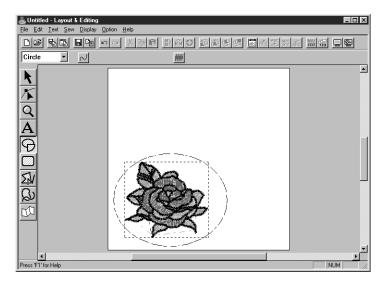
NOTE:

When drawing a circle or other circle-related pattern, you must always select the shape that you want before drawing. You cannot, for example, draw a circle and change it to an arc afterward.

- 3 Disable the outline: Click the Line sew button. The Line color and Line sew type buttons disappear.
- 4 Disable the region inside: Click the Region sew button. The Region color and Region sew type buttons disappear.
- **5** Draw the oval: Move the cursor to a point, click and drag.

As you drag, an outline of the oval is drawn. The final oval (outline and region inside) appears when you release the mouse's button.

Do not worry now about the position, size or aspect ratio (ratio between the height and width) of the oval. We will adjust them later.



If, for any reason, you want to delete the oval and draw it again, click on the Tool Box, click on the oval to select it, then press **Delete** or click **Edit – Delete** on the menu bar.

If you wanted to attribute a color or a stitch type to the oval after drawing it, click on the Tool Box, then click on the oval to select it and click on the Line sew and Region sew buttons. The Sewing Attributes bar for the oval will show the current settings and allow you to change them.

Step 6 Adjusting the Size and Location of the Oval

We are going to adapt the size and aspect ratio of the oval and move it to its final position.

■ To change the size of the oval

If your oval looks very different from the one shown in the illustration above, proceed as follows to modify its size and proportions.

- 1 Click on the Tool Box.
- 2 Click the oval to select it. The shape of the cursor changes from $\c\c$ to $\c\c$.
- Move the cursor over one of the handles of the oval.
 The shape of the cursor will change to ←→ , ↑ , or ✓ , depending on the handle the cursor is on.
- Orag the handle in the direction of the arrow to scale the pattern.
 - → is for scaling the width.
 - I is for scaling the height.

To center the oval on the pattern

If your oval is not well centered, on the pattern, proceed as follows to move it.

1 Click on the Tool Box.

The shape of the cursor changes to \mathbb{R} .

- 2 Click the oval to select it.
- 4 You can now drag the oval to its final location.

Step 7 Adding Text

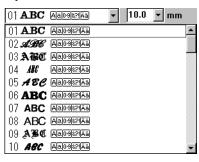
The next component of our embroidery picture is a piece of text.

Click A on the Tool Box.

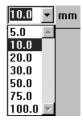
The shape of the cursor changes to \(\) and this appears on the Sewing Attributes bar:



- 2 Set the text color: You can set the text color at this step. For this example, we are not going to change the default black color.
- 3 Set the font: You can set the font at this step. For this example, we are not going to change the default font, but if you click on the Font selector, you can scroll through the many different font styles available.



4 Set the text size: Click on the Text size selector and select the desired size of the characters (for this example, we will keep the default size of 10.0 mm). The value indicates the height of the characters.



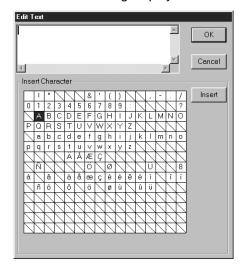
5 Set the text stitch: Click on the Text sew type selector and select the desired stitch for the text. For this example, we will keep the default stitch Satin stitch.



For more precise setting of the text attributes, see "Text Attribute Setting" on page 171.

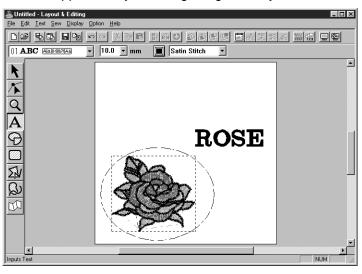
6 Enter the text: Click anywhere in the Design Page. The actual location does not matter, because we can move the text after creating it.

The Edit Text dialog displays.



- ◆ Type your text ("ROSE", for example).
- You can also enter a character by clicking it on the character table, then clicking Insert or simply by double-clicking it. This is specially useful if you have to enter accented characters that are not available on your keyboard.
- Click OK to confirm.
- Click Cancel to exit.

The text appears on your Design Page when you click OK.



If you want to edit the entered text, click on the Tool Box, then click on the text to select it and click Text – Edit Text Letters on the menu bar to open the Edit Text dialog. You may then edit your text as necessary. If you simply wanted to delete the text, select it, then press Delete.

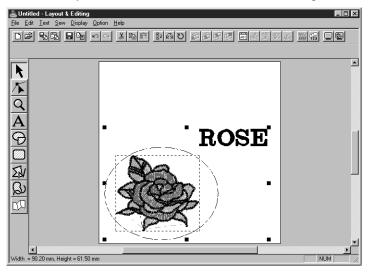
If you want to change the text color, font or other attributes after entering the text, you can do so while in the text mode or after clicking on the Tool Box, and selecting the text. The Sewing Attributes bar for the text pattern will show the current settings and allow you to change them.

Quik Reference

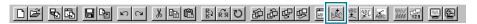
Step 8 Fitting the Text around the Oval

We are going to fit the text around the oval.

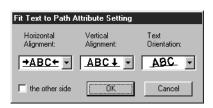
- lacksquare On the Tool Box to set the cursor in selection mode $\c\c\c$.
- 2 Click the text ("ROSE") to select it.
- 3 Press the **Shift** key and hold it down while clicking on the oval. This allows you to select the oval without deselecting the text.



4 Click **Text** on the menu bar, then click **Fit Text to Path Setting** on the submenu. You can also click the button of the Toolbar shown below.

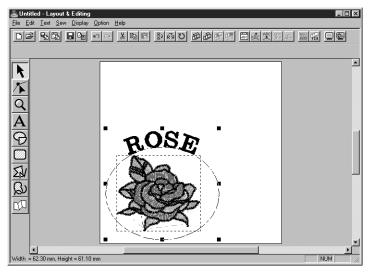


This dialog appears.



- Click OK without changing any setting.
- For more details about this setting, see "Fit Text to Path Setting" on page 172.

5 Your text now fits nicely on the oval.



Step 9 Moving the Oval and Text

Once the text is fit to the oval, you can move both patterns as a group, without affecting their relative position, or you can move the text alone to change its position on the oval.

■ To move both patterns as a group

- ① Click on the Tool Box, then click on the oval to select it.
- 2 Move the cursor over the oval, to change the shape of the cursor to .
- 3 Drag the oval: The text moves together with the oval.

To move the text over the oval

- ① Click on the Tool Box, then click on the text to select it.
- 2 Move the cursor over the text to change the shape of the cursor to .
- 3 Drag the text: The text can only move along the oval.

Step 10 Adding a Circle for Drawing the Sun

The next component will be a sun. We will first draw a circle to get the basic shape.

1 Draw a circle.

To draw a circle, proceed as you did to draw the oval, but hold the **Shift** key down while dragging.

If you need to modify the size of the circle, drag a handle at one of the corners.

2 Set the stitch color and type of the outline.

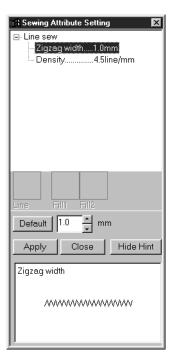
To do this, you must first select the circle using the button. Next, click on the Line sew button

so that the Line color button and the Line sew type selector Zigzag Stitch appear and select a line color and stitch.

3 Set the sewing attributes of the outline stitch.
Select Sew – Sewing Attribute Setting. You can also click the button of the Toolbar shown below.

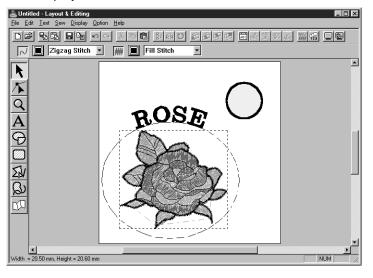


The Sewing Attribute Setting dialog opens.



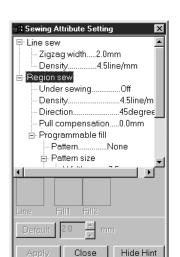
- Set the width of the zigzag stitch to 1.0 mm.
 - Click Apply.

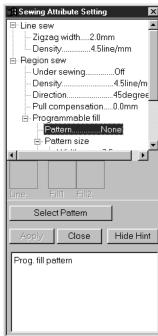
Set the sewing attributes of the region. Click on the Region sew button
 ■ so that the Region color
 button and the Region sew type selector
 ■ appear and select a region color and a stitch. In this example, we will leave the other sewing attributes of the region as is. Your display will look as follows.



You are going to see how to select a special stitch pattern (fill stitch) created with the Programmable Stitch Creator application, how to change its settings and how to apply it as the region stitch for the rays, which you will draw in Step 12. Stitch patterns are arranged in a tile-like manner within the selected regions, creating very decorative fill stitches.

- 1 Select Prog. Fill Stitch in the Region sew type selector.
- 2 Click Sew Sewing Attribute Setting on the menu bar to open the Sewing Attribute Setting dialog. You can also click on the Toolbar button shown hereafter.

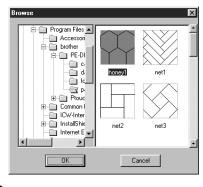




- Select Pattern in the Programmable Fill category.
- Click Select Pattern to open the Browse dialog.
- Select the path Program Files/ Version 4.0/Pattern.
 The Pattern folder contains the programmable stitch files. These files have the extension pas.
 The Browse dialog shown hereafter now allows you to preview and browse through the existing pas files.

Note:

"*.pas" files are patterns for Programmable Fill. "*.pmf" files are patterns for Motif.



- Browse through the illustrated stitches and click on the honey1 illustration, which is then highlighted.
- Either double-click the illustration or click OK to select that stitch. The dialog closes and the selected stitch can now be previewed in the Sewing Attribute Setting dialog.
- 3 Change the stitch pattern size. Select a width and height of 10.0 mm (3/8 inch) by clicking on the "up" arrow.

NOTE:

As soon as you click an arrow in this dialog, an illustration of the stitch pattern as well as the type of setting you are selecting are displayed in the other preview window of the dialog. You can see how each click on an arrow affects the pattern.

You may also type in a value. In that case however, you cannot preview the setting immediately as you set it.

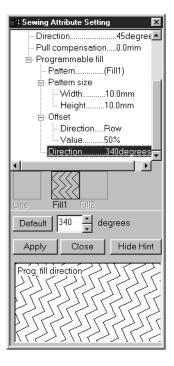
Quik Reference

Change the row offset. Under the Offset category, set the Direction as Row and set the value at "50 %". and holding the mouse button down on either arrow or by typing the value directly in the edit box window.

NOTE:

You can only choose to change either the row or the column offset for a given pattern. You cannot select both for the same stitch pattern.

6 Change the direction of the pattern. Rotate the pattern to the right by clicking on the "down" arrow until a value of **340 degrees** is selected. The **Sewing Attribute Setting** dialog will look like this:



- For more information on the different settings of a programmable stitch, see "Sewing Attribute Setting" on page 177.
- 6 Click Apply.

The stitch and its settings are set. Until they are changed again, those sewing settings, just like any other, will be applied to every new region that you draw.

Trinish setting the remaining sewing attributes for the ray pattern that you will create in the following step.

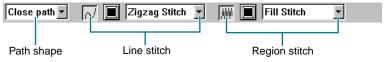
Select a region color using the Region color 🔳 button.

Select a line color and stitch using the Line color button and the Line sew type selector ∑igzag Stitch . (You can also set the characteristics of the pitch in the Line sewing tab of the Sewing Attribute Setting dialog.)

Step 12 Adding Broken Lines for Drawing the Sun Rays

Let's draw a few rays around the sun. There are, of course, many ways to do this. You could, for example, draw a single straight line for each ray. Here, we are going to use a closed polygonal line (broken line) to make all the rays in one star-like pattern.

① Click on the Tool Box. The shape of the cursor changes to — and displays together with a miniature image of the tool button. The Sewing Attributes bar now looks like this:

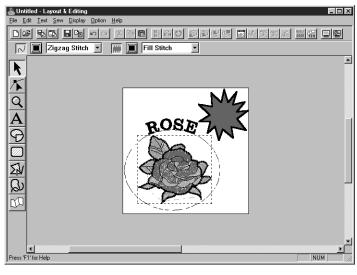


- 2 Be sure Close path is selected in the Path shape selector.
 - When drawing a closed path, the first point and the last point are automatically joined. The pattern has an outline and a region and you can apply sewing settings to both.
 - With an open path, the broken line is left open (the first and last point are not automatically joined). The pattern will not have a region, thus you can only apply sewing settings to the outline.
- 3 Draw the broken line around the circle using the circle as a guide. Move the mouse to the starting point and click. Move the mouse to the end point of the first straight line and click again.

NOTE:

You can always remove the last-entered point by clicking the mouse's right button.

A Repeat until you arrive at the last ending point. At that point double-click. As soon as you have double-clicked, the display will look like the following.



If, for any reason, you want to delete the pattern and draw it again, click on the pattern to select it, then press **Delete** or click **Edit – Delete** on the menu bar.

If you want to change the pattern path shape, color, or stitch after drawing it, click on the Tool Box, then click on the pattern to select it. Then change the settings at the Sewing Attributes bar or the **Sewing Attribute Setting** dialog.

Now that the rays are drawn, you might want to have a quick preview of the programmable stitch pattern at this stage and come back to this exercise later. To see how to preview an embroidery pattern, refer to Step 16 "Previewing the Sewing Image".

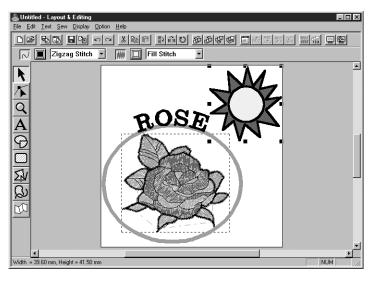
Step 13 Changing the Sewing Order of Sun and Rays

Since we have drawn the broken line after drawing the circle, the broken line pattern is in the foreground of the screen, and the circle is behind. A pattern that is in the foreground of the screen is sewn last. Since we do not want the embroidery to show the part of our broken line that is inside the circle of the sun, we are going to reverse the sewing order.

- ① Click on the Tool Box, then click on the ray pattern to select it.
- 2 Click Edit on the menu bar, then click Sew First on the submenu. You can also click on the Toolbar button shown hereafter.



This will move the ray pattern to the back of the circle.



If necessary, move the circle so that it looks centered relative to the ray pattern.

Step 14 Adjusting the Rays

At this step you might wish to modify the rays. You can do that by moving, deleting and adding points on the broken line pattern.

- Click on the Tool Box and select the ray pattern.
- 2 Click on the Tool Box.

Two buttons appear:

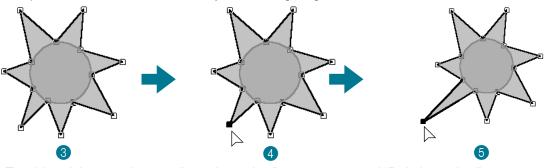
3 Click .

The shape of the cursor changes to \triangleright and the existing points of the pattern are marked with small empty squares.

4 Click the point that you want to move. The selected point is marked with a small black square.

Quik Reference

5 Drag the point to a new position.
The point remains selected, so that you can drag it again.



To add or delete a point, see "Inserting points" on page 123 and "Deleting points" on page 124.

Step 15 Setting Hole Sewing

If the sun is sewn according to the current setting, the complete broken line for the rays will be sewn first, then the circle will be sewn on top of the pattern of the rays. To avoid sewing twice at the same place, you can set the pair of patterns (circle and broken line) for hole sewing. This way, the part of the rays that is hidden behind the circle will not be sewn.

- ① Click on the Tool Box, then click on the sun's circle to select it.
- 2 Hold the **Shift** key down and click on the sun's rays. The circle and the broken line are now selected together.
- 3 Click Sew on the menu bar, then click Set Hole Sewing on the submenu. This message displays:



◆ Click **OK** to remove the message.

When a pair of patterns are set to hole sewing, they cannot be moved separately. If you need to readjust their relative position, you must first select the circle or the broken line with the selection

cursor \searrow , then release the hole sewing setting by clicking **Sew** on the menu bar, then **Cancel Hole Sewing**.

NOTE:

The Hole Sewing setting is not possible if one of the patterns in the pair is not completely inside the other pattern.

Step 16 Previewing the Sewing Image

Our embroidery image is now complete. You can preview it to have a more realistic view of how it will look once sewn. The preview function also shows how sewing will actually proceed. For example, you will be able to see clearly that the part of the broken line that is behind the circle is not sewn and how the selected programmable stitch fills the rays.

 $lacktriangled{1}$ To preview the entire embroidery picture, deselect everything by clicking on the white space with the selection cursor $\begin{tabular}{l} \end{tabular}$.

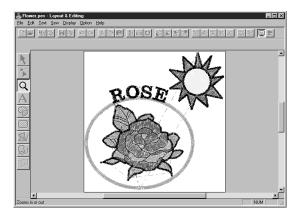
To preview a single pattern, or a group of patterns, select the pattern(s).

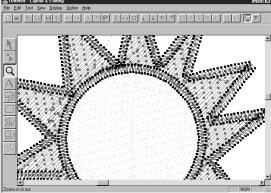
To preview a region for which you selected programmable stitch pattern, select it and zoom in on it.

2 Click **Display** on the menu bar, then click **Preview** on the submenu. You can also click on the button of the Toolbar shown below:



The preview display will appear.





3 To return to the normal display, repeat step 2 or press the Esc key.

NOTE:

You cannot do any editing on the preview screen.

Step 17 Transferring the Data to a Card

Before you can actually sew your embroidery pattern, you must transfer it to an Original card.

- 1 Insert an Original card in the module.
- 2 Click File on the menu bar, then click Write to Card on the submenu. You can also click on the button of the Toolbar shown below:



This dialog will display.



- If the card is not brand new, make sure that you want to erase the data that is already stored on the card and click OK.
- ◆ Click Cancel to exit.

If the card module is not correctly connected or powered, if the card is not inserted or is defective, you will see an error message. Refer to "Write to Card" on page 154 for more details.

NOTE:

You can also save the data to your disk as explained next, and then use the File Utility application to transfer the data to the card. See "Writing to an Original Card" on page 204.

Step 18 Saving the File

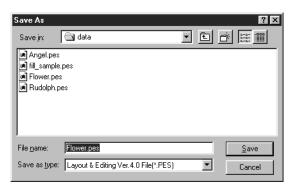
Before quitting the application, you should save your file on disk to be able to retrieve it later.

Click File on the menu bar, then click Save on the submenu. You can also click on the button of the Toolbar shown below:



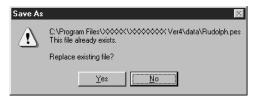
If the file already exists on the disk (the file has been saved at least once), the file is saved immediately.

② If the file name is still **Untitled** or if, for any other reason, the file cannot be found on the disk, the application will ask you to enter a file name and select a target folder.



- Select the drive, the folder and type the file name.
- Click Save to save.
- ◆ Click Cancel to exit.

If the new file name already exists, this dialog will appear:



- ◆ Click **Yes** to overwrite.
- Click No if you do not want to overwrite the existing file. You can then enter another file name.

The new file name displays in the title bar of the Layout & Editing window.

Using Programmable Stitch Creator

This application allows you to design your own fill stitch patterns, which you can set as sewing attributes to enclosed regions of patterns, both in Design Center and Layout & Editing. The stitch patterns fill the regions in a tile-like manner, resulting in particularly decorative embroidery patterns. You may create your own fill stitch patterns or use the many stitches delivered with this application with or without editing them.

In this exercise, you are going to see how to edit an existing stitch pattern.

The complete procedure will take you through the different steps of a normal working session with Programmable Stitch Creator and will introduce you to its most important features.

Step 1	Starting Programmable Stitch Creator	page 47
Step 2	Opening a Programmable Stitch File	page 48
Step 3	Drawing Lines to Edit the Programmable Stitch	page 49
Step 4	Saving the Edited Programmable Stitch	page 50
Step 5	Quitting Programmable Stitch Creator	page 50

Please follow these instructions step by step, in the sequence given. If you have to interrupt your training for any reason, feel free to save the file (see Step 4). You will be able to retrieve it later and resume your work.

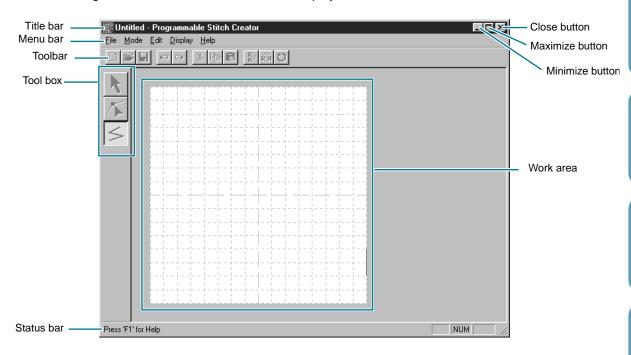
Step 1 Starting Programmable Stitch Creator

To start Programmable Stitch Creator, click the start button, then select Programs, Version 4.0, then double-click Programmable Stitch Creator to open the Programmable Stitch Creator window. You may also double-click the Programmable Stitch Creator icon in the program group.



If the shortcut icon for programmable stitch creator is created, for example, on computer desktop, double-click it to start program.

The Programmable Stitch Creator window displays.



The window size will be smaller than the display area on the screen of your personal computer.

2 To make the Programmable Stitch Creator window fill up the available space on your screen, click the maximize button on the right side of title bar. If you are working with other programs, you can reduce the Programmable Stitch Creator window

If you are working with other programs, you can reduce the Programmable Stitch Creator window temporarily to an icon by clicking the minimize button on the right side of title bar. You can then access the other windows and icons on the display screen by using the mouse.



To return to the Programmable Stitch Creator window, click the icon.

File Utility

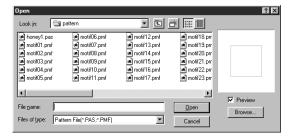
Quik Reference

Step 2 Opening a Programmable Stitch File

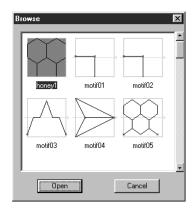
① Click File on the menu bar, then click Open on the submenu. You can also click on the Toolbar button shown below.



The Open dialog opens.



The **Browse** dialog opens.



Note:

You will create a pattern for **Programmable Fill** here.

If you know which file you want to open:

 Select a pas file in the Pattern folder by clicking on it.

The contents of the selected file displays in the **Preview** window, provided its check box is checked.

Double-click the selected pas file or click
 Open to open the file.

If you want to scroll through the available files before opening one:

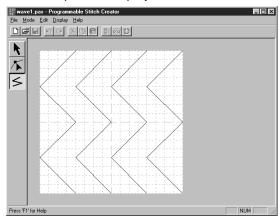
- Click Browse to preview all the available pas files in the selected folder.
- Browse through the files with the help of the scroll bar.
- Select a stitch pattern by clicking on it. The selected pattern is highlighted.
- Double-click the selected pattern or click
 Open to open the file and to close both the
 Open and the Browse dialogs.

Note:

"*.pas" files are patterns for Programmable Fill.
"*.pmf" files are patterns for Motif. Use the
Mode menu to change the type of file to create.

Quik Reference

The stitch pattern displays on the work area of the Programmable Stitch Creator application.



Step 3 Drawing Lines to Edit the Programmable Stitch

We are going to draw a wave between the displayed ones using the Line drawing tool of the Tool Box. To draw these waves, we will use the grid setting **medium** with which the **pes** file stitch pattern was saved.

NOTE:

Grid types should be selected according to the details you want to draw. Select a narrower grid for more detailed stitches and a wider grid for more simple ones.

For more information on the grids and on how to select them, refer to "Grid" on page 226.

- ① Click on the Tool Box. Move the cursor over the work area. The shape of the cursor changes
 - to + and displays together with a miniature illustration of the tool button.
- 2 Move the mouse to the second vertical grid line following a wave and click.

NOTE:

The horizontal and vertical lines that you draw on the work area always follow the grid. The points you create by clicking the mouse are inserted at the intersection of the horizontal and vertical lines of the grid, enabling you to draw diagonal lines as well. So, regardless on where you click, a point will automatically be inserted at the nearest intersection.

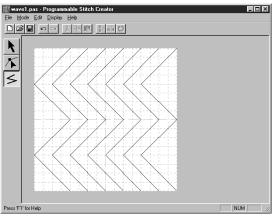
3 Move the mouse to the first angle and click again.

NOTE:

You can always remove the last-entered point by clicking the mouse's right button.

4 Repeat until you reach the end of the line and double-click.

6 Repeat the procedure to add two more waves. Your display may look somewhat like the following.



If you want to edit some points of the pattern that you drew, you can do so in the Point edit mode, which you were introduced to in the Layout & Editing window. The Point edit mode lets you move, insert and delete points (see "Point Edit Mode" on page 213 or go back to Step 14 "Adjusting the Rays" on page 41).

Step 4 Saving the Edited Programmable Stitch

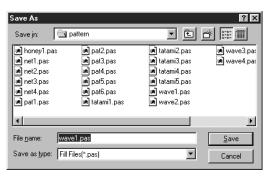
In order to apply your edited stitch pattern to a region in Layout & Editing or Design Center, you must first save it as a **pas** file. To do this, proceed as follows.

1 Click File on the menu bar, then click Save on the submenu. You can also click on the button of the Toolbar shown below:



Since the **pas** files that come with your program are "Read Only" files and cannot be overwritten, the **Save** as dialog opens.

2 Type in a file name and select another target folder if you want to save your own stitch pattern files separately.



- Select the drive, the folder and type the file name.
- ◆ Click Save to save.
- ◆ Click Cancel to exit.

Step 5 Quitting Programmable Stitch Creator

Now that you have created a stitch pattern, you may close this application as you will no longer need it for this exercise.

① Click File on the menu bar, then click Exit on the submenu.

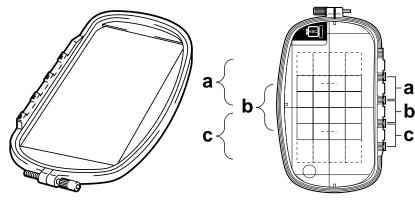
If you have saved your file as recommended in the previous step, the application will close immediately. If you have changed anything after the last time you saved the file, you will be asked whether you want to save the file. Click **Yes**, then proceed as explained in the previous step.

File Utility

Creating data for the multi-position frame

By attaching the enclosed (or optional) **multi-position frame** (130×300 mm or 100×172 mm) at each of its three installation positions, multi-position designs can be embroidered.

With this program you will be able to create designs that you can stitch in any multi-position hoop. (Jumbo Hoop and Extra Large Hoop)



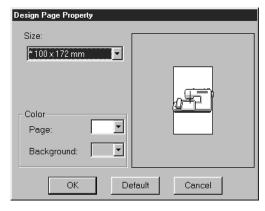
Example of Multi-Position Frame: 100 × 172 mm embroidery frame

Although the size of the pattern that can be embroidered using an multi-position frame is 130×180 mm (or 100×100 mm, depending on the sewing area of the embroidery machine), first determine which of the three installation positions (indicated as a, b, and c in the illustration above) the multi-position frame will be installed at and determine the orientation of the data.

When creating the pattern, each design section can only be as large as the sewing field of the machine.

Select the Design Page size

1 In Layout & Editing, click Option, then Design Page Property.



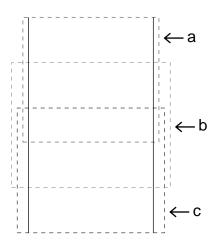
- ◆ From the Size selector, choose a Design Page size of 130 × 300 mm, 300 × 130 mm, 100 × 172 mm, or 172 × 100 mm.
 - (Settings for multi-position frames are indicated by "*".)
- Choose the appropriate setting after checking the size of the embroidery frame available for your machine.

NOTE:

The Design Page size in dialog shown above is not available in Design Center since the maximum sizes for a single pattern are 260×160 mm, 130×180 mm, and 100×100 mm. Remember that 260×160 mm size cannot be used for a multi-position frame.

Create the pattern

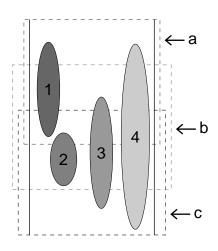
1 The Design Page appears on the screen as shown below.



- ◆ Explanation of a, b, and c:
 - a: Embroidering area when the embroidery frame is installed at the top installation position.
 - b: Embroidering area when the embroidery frame is installed at the middle installation position.
 - c: Embroidering area when the embroidery frame is installed at the bottom installation position.

The broken lines indicate each area.

2 Create the pattern, making sure that it meets the following conditions.



- ◆ The size of one pattern must be no bigger than 100 × 100 mm (or 130 × 180 mm). (If the pattern is imported from Design Center, only these size settings are available.)
- ◆ Each pattern must completely fit within one single area (a, b, or c).
 - 1: This pattern is correct since it fits completely within area a.
 - 2: This pattern is correct since it fits completely within either area b or area c.
 - 3: The size of this pattern is acceptable, but its position must be corrected since it does not fit completely within any of the areas.
 - 4: This pattern must be corrected since it is too large.

NOTE:

If a pattern does not meet the conditions mentioned above, a warning will appear when continuing to the next step.

 Specify the sewing order in the same way that it is specified for a normal frame.

With the **Optimize hoop change** setting, the actual sewing order (including the embroidery frame installation order) is optimized as explained below.

(The **Optimize hoop change** setting can be found on the Sew menu. The setting is turned on when a check mark appears in front of the setting.)

Optimize Hoop Change

- 1 Click on Sew.
- 2 Select Optimize Hoop Change.

By Selecting **Optimize Hoop Change**, you are minimizing the number of times the hoop is repositioned while stitching the entire design. When **Optimize Hoop Change** is turned off, each design is sewn in the order the designs are placed in the design page.

NOTE:

Since the pattern may not be sewn correctly or the fabric may not feed evenly if the embroidery frame installation position is changed too often, we recommend turning on the Optimize hoop change setting. Since turning on this setting will change the sewing order that you have set, check the sewing order before you begin embroidering.

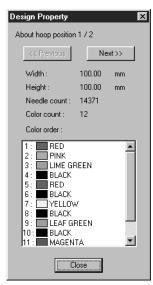
Check the design

NOTE:

Make sure that no pattern has been selected before clicking this command. If a pattern has already been selected, only the information for that pattern is displayed.

① Click Option, then Design Property.

At the same time that the **Design Property** dialog appears, the Design Page is automatically enlarged or shrunk to fit in the entire window.



- The first line of the dialog shows the position in the embroidery frame installation order for the currently displayed design.
- Only the designs that would be sewn at the current position in the embroidery frame installation order appear in the Design Page. In addition, the embroidering area for the current frame installation position is outlined in red.
- Click Previous or Next to display information for the designs at other positions in the embroidery frame installation order.
- At this time, the corresponding pattern and embroidery frame position appear in the Design Page.

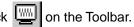
NOTE:

If an object is larger than the embroidering area or if an object is positioned so that it does not completely fit within an embroidering area, the error message "Please change the object size or position." is displayed instead of this dialog. After the object causing the error appears selected, change its size or position. (If more than one object causes the error message to appear, the objects will appear selected in the sewing order.)

NOTE:

Make sure that no pattern has been selected before clicking this command. If a pattern has been already been selected, only the information for that pattern is displayed.

2 To preview the image, click Display, then Preview or click



NOTE:

Just like for the command Option – Design Property, if an object is larger than the embroidering area or if an object is positioned so that it does not completely fit within an embroidering area, the error message "Please change the object size or position." is displayed instead of displaying a preview of the image. After the object causing the error appears selected, change its size or position. (If more than one object causes the error message to appear, the objects will appear selected in the sewing order.)

NOTE:

Make sure that no pattern has been selected before clicking this command. If a pattern has been already been selected, only that pattern is previewed.

Save the data

1 Click File, then Save or Save As, and then save the data.

All of the data is saved as one file (*.pes).

If the file size or the number of color changes is larger than the specified number or if one of the patterns do not completely fit within an embroidering area, the message "Please change the object size or position. Do you want to save the data anyway?" is displayed.

NOTE:

The saved file cannot be opened in a previous version (ver. 2.0x or earlier) of Layout & Editing.

NOTE:

If a Design Page for a Multi-position embroidery frame (130 \times 300 mm, 300 \times 130 mm, 100 \times 172 mm, or 172 \times 100 mm) is selected, you can select only "PES Version 2.5, PES Version 3.0, or PES version 4.0 as the File Type.

Write the data to an original card

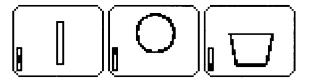
1 Click File, then Write to Card or click on the Toolbar, and then write the data to an original card.

Data for an multi-position embroidery frame is created by considering the data for each embroidery frame installation position as one pattern and combining them.

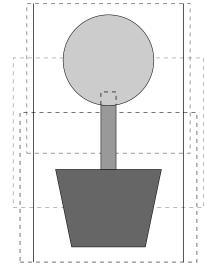
Therefore, when this type of data is written to an original card, all of the data for one multi-position embroidery frame pattern is saved as a combination of multiple patterns.

(For more details on the number of patterns that is written to a card, refer to "3. Check data".)

If the pattern shown below at the right is written to an original card and the written pattern is checked on the embroidering machine, it will appears as follows.



- : This pattern is sewn when the embroidery frame is installed at the top installation position (position a).
- : This pattern is sewn when the embroidery frame is installed at the middle installation position (position b).
- This pattern is sewn when the embroidery frame is installed at the bottom installation position (position c).



Therefore, the frame installation position sewing order for the pattern shown above is b, a, then c.

2 Writing data to an original card using File Utility.

When writing data to a card using File Utility, all of the data is written at the same time, like 1 explained above.

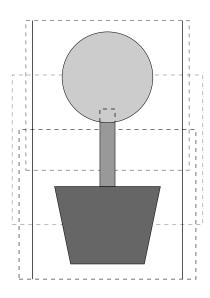
However, the difference is that if there is space on the card, other patterns can also be written to the card.

Notes on embroidering using the multi-position embroidery frame:

- Before embroidering your project, sew a trial sample of the pattern on a scrap piece of fabric that is the same as that used for your project. In addition, use the correct needle and thread.
- Be sure to affix stabilizer material to the back of the fabric and tightly stretch the fabric within
 the embroidery frame. When embroidering on thin or stretch fabrics, use two layers of stabilizer
 material. If no stabilizer material is used, the fabric may become over-stretched or wrinkled or
 the embroidery may not be sewn correctly.
- Use the zigzag stitch for sewing the outlines in order to prevent embroidering outside the outlines.



 For patterns that require the embroidery frame to be installed at different installation positions, design the embroidery pattern data so that the various parts of the pattern overlap in order to prevent misalignment while embroidering.



Design Center

Design Center is used to create individual patterns from image files created with other applications. You can also apply stitch patterns created with Programmable Stitch Creator to regions of images displayed in Design Center. The resulting embroidery pattern can then be imported into the Layout & Editing Design Page and combined with other patterns.

The embroidery pattern is created in four stages:

◆ **STAGE 1**: Original image

You can open an image that you purchased from a commercial source, created using an application such as Paintbrush or scanned from a printed source using a scanner and the appropriate software. The image file must be in the uncompressed format, its file name extension must be **bmp**, **tif**, **jpg**, **pcx**,

wmf, png, eps, pcd, or fpx.

Note that graphic files in other formats can be converted into the specified format if you have the proper conversion software.

In Stage 1, the image is displayed with its original colors and you cannot modify it.

◆ STAGE 2: Line image

To move from Stage 1 to Stage 2, you select maximum 5 colors of the image data that will be converted into black outlines. Unselected colors will be converted into white. You can then correct the black and white image using pens and erasers of different thicknesses.

If you save the file in Stage 2, its file name extension will be PEL.

◆ **STAGE 3**: Figure handle image

When you move to Stage 3, the application automatically detects the outline of the black areas and replaces it with a set of broken lines. The broken lines can be edited (you can move and delete points or insert new points).

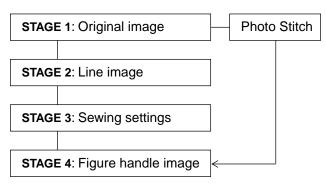
If you save the file in Stage 3, its file name extension will be PEM.

◆ **STAGE 4**: Sewing settings

You can set the stitch, thread color, etc. for the outlines and regions to complete the embroidery data If you save the file in Stage 4, its file name extension will be PEM.

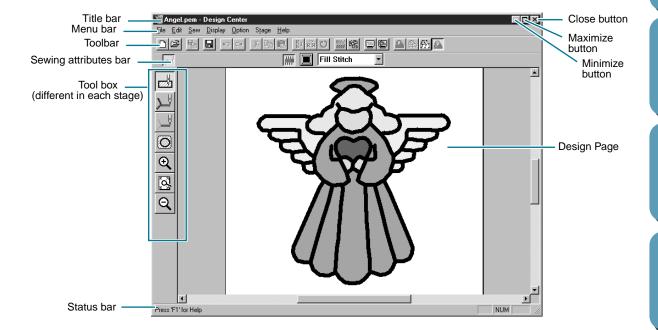
If you have to interrupt your work at stage 2, 3 and 4, save the file and retrieve it later to resume working.

If you use the "To Photo Stitch" function, you can open an image file in Stage 1 and change it to Photo Stitch embroidery data. This involves, for example, adjusting the shape, size, and sharpness of the pattern, etc. When the data is created, you will move directly to Stage 4, without going through Stage 2 or Stage 3.



Quik Reference

The Screen



Menu bar	Gives access to the functions.
Toolbar	Shortcut for the menu functions.
Sewing attributes bar	Sets the sewing attributes (color, stitch) of the patterns (displays in Stage 4 only)
Tool box	Used to select and edit the image. Stage 1 has no Tool Box; the other stages all have a different Tool Boxes.
Status bar	Provides short information.
Design Page	The actual part of the work area that can be saved and sewn.

Using the Stage 2 Tool Box

In Stage 2, the Tool Box is used to modify the line image generated from the original image or to create a line image from scratch.



The five first buttons are used as pens and erasers of different thicknesses. Cursor shape when moved or dragged over the work area:

for the pens and 🔪 for the erasers.

When you start the application, the number 2 Pen tool is active by default.

Sets the cursor in zoom-in mode.

Cursor shape: (+)

Maximizes the selected Design Page to fit in the window.

Sets the cursor in zoom-out mode.

Cursor shape: (-

Drawing and Erasing

Drawing

Click the button with the desired pen thickness on the Tool Box. The cursor changes to



2 To add a dot, click; to draw a line, drag with the mouse's left button. If the (Shift) key is held down while moving the mouse, only vertical or horizontal lines will be drawn.

Erasing

- Click the button with the desired eraser thickness on the Tool Box.
- $oldsymbol{2}$ To erase, drag while pressing the mouse's right button. The cursor changes to ${}^{\mathbb{N}}$

Zoom-in Mode

- 2 Click on the area you want to enlarge or drag the cursor across the area that you want to enlarge, then release it. You can repeat this step several times.

Design Center

Fit Design Page to Window

This feature allows you to maximize the selected Design Page so that it will fit in the window.

① Click on the Tool Box. The Design Page is enlarged or shrunk automatically to fit the window.

Zoom-out Mode

- ① Click On the Tool Box. The shape of the cursor changes to O.
- 2 Click on the area you want to shrink or drag the cursor across the area that you want to shrink, then release it. The image shrinks toward that point. You can repeat this step several times.

Using the Stage 3 Tool Box

In Stage 3, outline data that has been generated automatically can be edited using the Tool Box. Clicking a button of the Tool Box changes the cursor mode and shape. The left side of the Status bar tells you what you can do in each cursor mode.

K	Sets the cursor in selection mode.When you start the application, the selection mode is active by default. Cursor shape:	page 62
不	Sets the cursor in point edit mode. Cursor shape:	page 64
5	Sets the cursor in line drawing mode. Cursor shape:	page 65
Q	Sets the cursor in zoom-in mode. Cursor shape:	page 65
	Maximizes the selected Design Page to fit in the window.	page 66
Q	Sets the cursor in zoom-out mode. Cursor shape:	page 66
뫄	Fills the display with the selected objects.	page 66

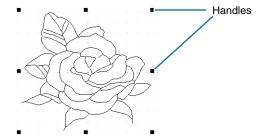
Selection Mode

The cursor selection mode is used to select one or more outlines. Once an outline is selected, you can move it, scale it, and change its direction by rotating it or inverting it.

Selecting patterns

- ① Click on the Tool Box. The shape of the cursor changes to
- 2 Click the pattern that you want to select. The cursor changes \bigoplus when it touches an outline.

You know that the object is selected when handles are displayed and the outlines display in blue. Note that a pattern will not be selected if you click on a transparent part of it.



- 3 To deselect the pattern, select another one, click on the white space or click another button of the Tool Box, except a Zoom tool.
- 4 To select an additional pattern, click it while holding the **Shift** key down. Note that you can also select patterns by dragging the cursor across the whole pattern that you want to select. As you drag, a dotted rectangle appears. When you release the mouse button, all patterns that are completely contained in that rectangle will be selected.

Moving patterns

- Select the data that you wish to move.
- 2 Position the cursor over the data and click (a dotted box appears around the data), then drag to a new destination.

Holding down the (Shift) key while dragging the pattern moves the pattern horizontally or vertically. NOTE:

By pressing the arrow keys, the selected pattern can be moved 0.5 mm (about 0.02 inch) to the left, right, up or down.

Scaling patterns

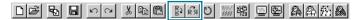
• Move the cursor over one of the handles of a selected pattern or group of selected patterns.

🕽 , 🦴 or 🧷 , depending on the handle the The shape of the cursor will change to ↔, cursor is on.

- 2 Drag the handle in the direction of the arrow to scale the pattern.
 - is for scaling the width.
 - is for scaling the height.
 - and 📝 are for scaling both dimensions at the same time.

Flipping a pattern horizontally or vertically

Select the data that you wish to flip horizontally (up/down) or vertically(left/right). The buttons below become active.



2 To flip horizontally, select the command Edit – Mirror – Horizontal or click on the Toolbar.

To flip vertically, select the command Edit – Mirror – Vertical or click on the Toolbar.

Rotating a pattern

1 Select the data that you wish to rotate. The button below becomes active.



- 2 Select the menu command Edit Rotate or click on the Toolbar. The handles around the selected pattern are replaced by smaller boxes on the four corners of the selected area.
- 3 To rotate the pattern, move the cursor on one of the four rotation handles.

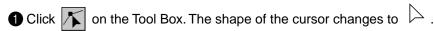
The shape of the cursor changes to **()** as soon as your cursor touches a rotation handle. Click on a rotation handle and a lined box appears around the selected the pattern. You can rotate the pattern clockwise or counterclockwise by dragging the mouse.

A simple dragging of the mouse will rotate the pattern by 1° increments. Pressing the **Shift** key will rotate it by 15° increments.

Point Edit Mode

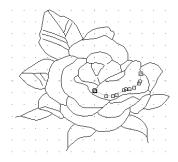
The point edit mode allows you to move, insert and delete points in an outline.

Moving points



2 Click the outline that you want to edit.

The selected line displays in pink and existing points of the selected line are marked with small empty squares. The starting and ending points of a line are marked by bigger squares.



3 Click the point that you want to move.

To select an additional point, click that point while holding the **Shift** key down.

The selected points are marked by filled squares.

NOTE:

If you click on the line instead of a square, a new point is inserted.

4 Drag the cursor to a new position. All the selected points move in the same direction.

Holding down the Shift key while dragging the point moves the point horizontally or vertically. NOTE:

By pressing the arrow keys, the selected point can be moved 0.1mm (about 0.01 inch) to the left, right, up or down.

Inserting points

- lacktriangled Click lacktriangled on the Tool Box. The shape of the cursor changes to lacktriangled .
- 2 Click the outline that you want to edit.

The selected line displays in pink and existing points of the selected line are marked with small empty squares. The starting and ending points of a line are marked by bigger squares.

3 Click where you want to insert a new point on the outline.
A new point appears, marked by a filled black square. The new point can be edited.

Deleting points

- lacksquare On the Tool Box. The shape of the cursor changes to lacksquare .
- 2 Click the outline that you want to edit. The existing points of the outline are marked with small empty squares.
- 3 Click the point that you want to delete.

To select an additional point, click that point while holding the **Shift** key down. The selected points are marked by filled squares.

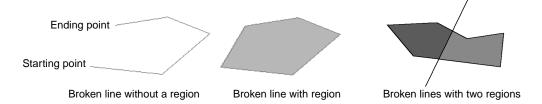
4 Press the **Delete** key to remove the point from the outline. Note that the points marked by red squares cannot be deleted.

Line Drawing Mode

The line drawing mode allows you to add broken lines to your pattern. A broken line is made of one or more contiguous straight lines, the ending point of a straight line being the starting point of the next one. If the broken line you drew did not create enclosed regions, it remains a simple outline and you can only set sewing attributes for the line itself in Stage 4.

If the broken line did create enclosed regions, you can assign stitches and colors to both the outline and the regions in Stage 4.

If you draw a line through an existing region, creating two separate regions, you will be able to set sewing attributes to both separately, as well as to the separating line.



Drawing a broken line

The shape of the cursor changes to ____ and is displayed together with a small image of the tool button.

2 Draw the line.

Move the mouse to the starting point and click.

Move the mouse to the ending point of the first straight line and click again.

NOTE:

You can always remove the last-entered point by clicking the mouse's right button. If needed, use the grid to help you draw the lines. You can set the grid so that each of its vertical and horizontal lines are visible. For more information on the grid, refer to "Grid Setup" on page 98.

3 Repeat until you arrive at the last end point. At that point double-click.

If the **Shift** key is held down while moving the mouse, only vertical or horizontal lines will be drawn.

Zoom-in Mode

The zoom-in mode is used to magnify a part of the outline so that you can check it and edit it more easily.

1 Click (on the Tool Box.

The shape of the cursor changes to \bigoplus .

2 Click on the area you want to enlarge or drag the cursor across the area that you want to enlarge, then release it. You can repeat this step several times.

Quik Reference

Fit Design Page to Window

This feature allows you to maximize the selected Design Page so that it will fit in the window.

① Click on the Tool Box. The Design Page is enlarged or shrunk automatically to fit the window.

Zoom-out Mode

The zoom-out mode is used to return to the normal display after zooming in.

1 Click Q on the Tool Box.

The shape of the cursor changes to \bigcirc .

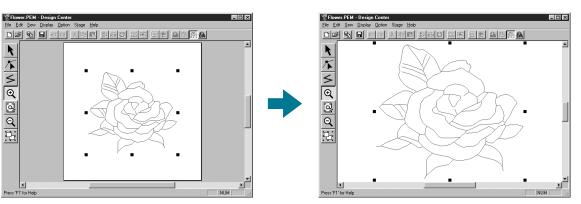
2 Click on the area you want to shrink or drag the cursor across the area that you want to shrink, then release it. The image shrinks toward that point. You can repeat this step several times.

Enlarging Selected Outlines to the Screen Size

The last button of the Tool Box allows you to quickly enlarge a selected outline to the screen size.

- 1 Select one or more outlines.
- 2 Click on the Tool Box.

The selected outlines now occupy all the available space on the screen.



Using the Stage 4 Tool Box

In Stage 4, outline data from Stage 3 are assigned line and region sewing attributes. This is done by using the Tool Box and the Sewing Attributes bar.

Clicking a button of the Tool Box changes the cursor mode and shape. The left side of the Status bar tells you what you can do in each cursor mode.

	Sets the cursor in region setting mode. When you start the application, this tool is active by default Cursor shape: , with a miniature of the button	page 67
	Sets the cursor in line (all) setting mode. Cursor shape: , with a small image of the button	page 69
\\	Sets the cursor in line (part) setting mode. Cursor shape: , with a small image of the button	page 70
	Sets the cursor in hole sewing mode. Cursor shape: , with a small image of the button	page 72
•	Sets the cursor in zoom-in mode. Cursor shape:	page 72
	Maximizes the selected Design Page to fit in the window.	page 72
Q	Sets the cursor in zoom-out mode. Cursor shape:	page 72

Region Setting Mode

In this mode, you can apply the current sewing attributes to an enclosed region. You can also change the sewing attributes applied to a region.

Applying the sewing attributes to a region

1 Click on the Tool Box.

The shape of the cursor changes to \triangleright and is displayed together with a small rectangle. The Sewing Attributes bar now looks like this:

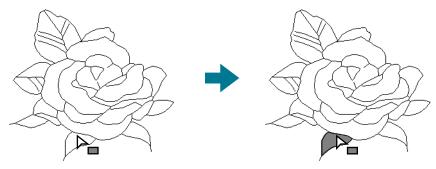


You can select the color and stitch at this step or after applying them to the region. See "Color" on page 75 and "Stitch" on page 76.

You can also use the menu (see "Sewing Attributes" on page 92) or the following method to define the density and other characteristics of the stitch. If you do not make these settings at this stage, the current settings will be applied, but you can modify them later.

Quik Reference

2 Click the enclosed region that you want to set.
The color and stitch selected on the Sewing Attributes bar are applied to the region.

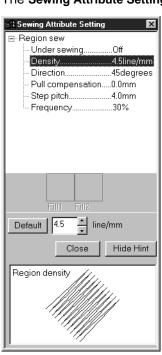


Checking the sewing attributes of a region

1 Click on the Tool Box.

The shape of the cursor changes to \triangleright and is displayed together with a small rectangle.

2 Click the enclosed region using the mouse's right button. The Sewing Attributes bar shows the color and stitch for the selection. You can change the color and stitch at this step (see "Applying the sewing attributes to a region" on page 67). The Sewing Attribute Setting dialog for the selected stitch displays.



- If necessary, change the settings.
 See "Sewing Attributes" on page 92.
- To restore the default value of a setting after changing it, click the Default button at the left of that setting.
- ◆ To apply the new settings to the region, click each region you want to apply those settings to using the left button.
- Click Close to remove the dialog from the screen.

Line (all) Setting Mode

In this mode, you can apply the current sewing attributes to the outline of patterns. You can also change the sewing attributes applied to outlines.

Applying the sewing attributes to an outline

Click on the Tool Box.

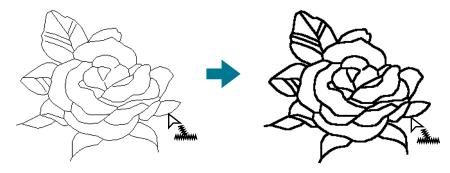
The shape of the cursor changes to \triangleright and is displayed together with a small figure of the Tool Box button. The Sewing Attributes bar now looks like this:



You can select the color and stitch at this step or after applying them to the outline. See "Color" on page 75 and "Stitch" on page 76.

You can also use the menu (See "Sewing Attributes" on page 92) or the following method to define the characteristics of the stitch. If you do not make these settings now, the current settings will be applied, but you can modify them later.

2 Click the outline that you want to set.
The color and stitch selected on the Sewing Attributes bar are applied to the clicked outline.



Checking the sewing attributes of an outline

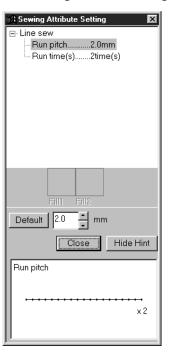
1 Click on the Tool Box.

The shape of the cursor changes to \triangleright and is displayed together with a small figure of the Tool Box button.

2 Click the outline using the mouse's right button.
The Sewing Attributes bar shows the color and stitch for the selection. You can change the color

e Alphabetic Index

and stitch at this step (see "Applying the sewing attributes to an outline" on page 69). The **Sewing Attribute Setting** dialog for the selected stitch displays.



- ◆ If necessary, change the settings. See "Sewing Attributes" on page 92.
- To restore the default value of a setting after changing it, click the Default button at the left of that setting.
- To apply the new settings to the outline, then click the outline of the pattern(s) using the left button.
- ◆ Click Close to remove the dialog from the screen.

Line (part) Setting Mode

In this mode, you can apply the current sewing attributes to a portion of the outline. You can also change the sewing attributes applied to a portion of the outline.

A single line of the outline extends from both sides of the cursor position to the next branch points.

Applying the sewing attributes to a portion of the outline

1 Click on the Tool Box.

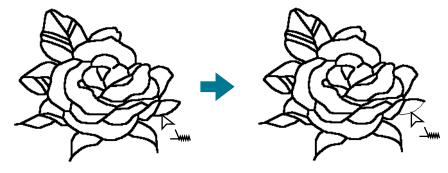
The shape of the cursor changes to \triangleright and is displayed together with a small figure of the Tool Box button. The Sewing Attributes bar now looks like this:



You can select the stitch at this step or after applying them to a portion of the outline. See "Stitch" on page 76. The color cannot be set separately for a portion of the outline. If you set a portion of the outline before setting the whole outline, the default color will be black.

2 You can also use the menu (see "Sewing Attributes" on page 92) or the method described on page 71 (Checking the sewing attributes of a portion of an outline) to define the characteristics of the stitch. If you do not make these settings now, the current settings will be applied, but you can modify them later.

3 Click the line of the outline that you want to set.
The stitch selected on the Sewing Attributes bar are applied to the line.



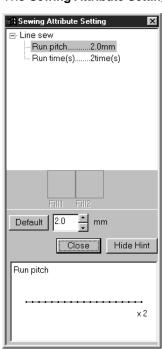
Checking the sewing attributes of a portion of an outline

1 Click on the Tool Box.

The shape of the cursor changes to \triangleright and is displayed together with a small figure of the Tool Box button.

Click the line you want to check using the mouse's right button. The Sewing Attributes bar shows the color and stitch for the selection. You can change the stitch (not the color) at this step (see "Applying the sewing attributes to a region" on page 67).

The Sewing Attribute Setting dialog for the selected stitch displays.



- If necessary, change the settings.
 See "Sewing Attributes" on page 92.
- To restore the default value of a setting after changing it, click the Default button at the left of that setting.
- To apply the new settings to single lines, click the lines you want to apply the settings to with the left button.
- ◆ Click **Close** to remove the dialog from the screen.

Hole Sewing Mode

The hole sewing mode is used to avoid sewing overlapping areas twice. It can be set only when one of the overlapping areas is completely enclosed in another area.

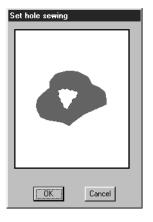
Click on the Tool Box.

The shape of the cursor changes to \(\sum \) and is displayed together with a small figure of the Tool Box button.

2 Click on the enclosing part of a pattern comprised of a region completely enclosed into another one.



3 This dialog will display.



- Click on the central region to toggle hole sewing on/off.
- ◆ Click **OK** to set hole sewing.
- ◆ Click **Cancel** to exit without setting hole sewing.

Zoom-in Mode

The zoom-in mode is used to magnify a part of the outline so that you can inspect it and edit it more easily.

- 2 Click on the area you want to enlarge or drag the cursor across the area that you want to enlarge, then release it. You can repeat this step several times.

Fit Design Page to Window

This feature allows you to maximize the selected Design Page so that it will fit in the window.

① Click on the Tool Box. The Design Page is enlarged or shrunk automatically to fit the window.

Zoom-out Mode

The zoom-out mode is used to return to the normal display after zooming in.

- 1 Click on the Tool Box. The shape of the cursor changes to
- 2 Click on the area you want to shrink or drag the cursor across the area that you want to shrink, then release it. The image shrinks toward that point. You can repeat this step several times.

Using the Sewing Attributes Bar

The Sewing Attributes, available in Stage 4, bar allows you to set the color and stitch of a region or outline.

The sewing attributes which are available depend on the cursor mode.

Example 1: The cursor is in the region setting mode.



Example 2: The cursor is in the line setting mode.



When the cursor is left for a while on an element of the Sewing Attributes bar, a label indicating the function of that element appears.

(MM)	Region sew: Switches the inside region on/off.	page 73
[2]	Line sew: Switches line sew on/off.	page 74
	Region color, Line color: Sets the thread color for outline or region inside.	page 75
Fill Stitch Running Stitch	Region sew type, Line sew type: Sets the stitch for outline or region inside.	page 76

Setting the Thread Color and Stitch

Region sew

Purpose: Switches the inside region on/off.

When the inside region is switched off, it is not sewn (and you cannot set its color

or stitch).

Available: When you click on the Tool Box to put the cursor in the Region sewing

mode.

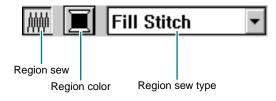
Operation:

1 Click the Region sew button.

This button has two states:

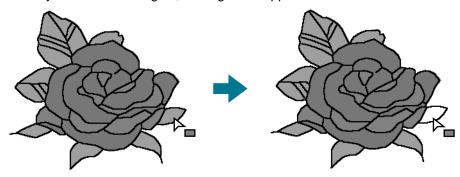
on: the Region color button and the Region sew type selector are displayed.

off: the Region color button and the Region sew type selector are not displayed.



Quik Reference

Click inside a region to turn it on or off.
When you turn off the region, the region disappears.



When you turn on the region, the region gets the color displayed on the **Region color** button, and the stitch displayed on the **Region sew type** selector.

See also: "Color" on page 75 and "Stitch" on page 76

■ Line sew 🛭

Purpose: Switches the outline on/off.

When the outline is switched off, it is not sewn (and you cannot set its color or stitch).

Available: When you click or on the Tool Box to put the cursor in the Line (all or

parts) sewing mode.

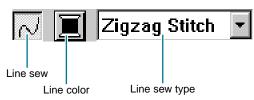
Operation:

1 Click the Line sew button.

This button has two states:

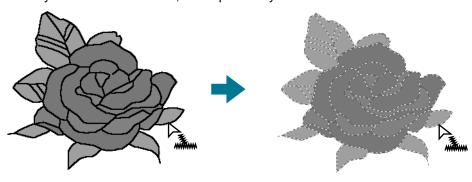
on: the Line color button and the Line sew type selector are displayed.

off: the Line color button and the Line sew type selector are not displayed.



2 Click an outline to turn it on or off.

When you turn off the outline, it is replaced by a dotted line that will not be sewn.



When you turn on the outline, the outline gets the color displayed on the **Line color** button, and the stitch displayed on the **Line sew type** selector.

See also: "Color" on page 75 and "Stitch" on page 76

■ Color

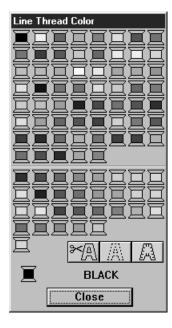
Purpose: Sets the thread color for outline or region inside.

Available: When the cursor is in Region setting mode or Line setting mode.

Operation:

1 Click the color button.

In Region setting mode, the **RegionThread Color** dialog displays and in Line setting mode, the **Line Thread Color** dialog displays. The same color settings are available in both dialogs.



- Click the desired color.
- The last spool and the three blocks with "A" in each block have a special function. See "Special colors" on page 144
- For a list of the different color names, see page 230.
- Click Close to remove the dialog from the screen.

When you click the desired color, the new color is displayed on the **Region color** button or **Line color** button.

NOTE:

The colors in the top half of the dialog are Base-Color. On sewing machines that can display color names, the selected color name will be displayed as shown in the dialog. (In the dialogs and other displays in this application, the color name is displayed in uppercase letters.)

The colors in the bottom half of the dialog are Option-Color. On sewing machines that can display color names, the name of the closest Base-Color will be displayed. (In the dialogs and other displays in this application, the color name is displayed in lowercase letters with a number; for example, "blue2". In this case, "BLUE" will be displayed on the sewing machine.)

You can change the order of the thread color display by selecting Option-Select Color Arrengement from the menu. In this case, Base-Color and Option-Color are mixed together, so use the uppercase/lowercase color name display to distinguish between them.

See also: "Region sew" on page 73, "Line sew" on page 74 and "Special colors" on page 144

Layout & Editing

Quik Reference

Stitch Zigzag Stitch 🛨 Fill Stitch 🛨

Purpose: Sets the stitch for outline or region inside.

Available: When the cursor is in Region setting mode or Line setting mode.

Operation:

1 Click the sew type selector.

The available options display.



For outlines, Running Stitch and Zigzag Stitch are available. For regions Fill Stitch, Satin Stitch, Programmable Fill Stitch and Motif Stitch are available.

2 Click the desired stitch.

The new setting displays on the selector.

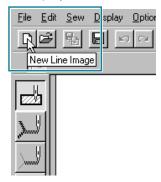
"Region sew" on page 73 and "Line sew" on page 74

Using the Menu Bar and the Toolbar

File	Handles file input/output, such as opening and saving.	page 77
Edit	Performs simple actions on selected objects, such as cutting and pasting.	page 87
Sew	Allows you to control the way the pattern will be sewn.	page 92
Display	Modifies the appearance of the screen.	page 98
Option	Allows you to start the other applications and to set the Design Page size and unit system.	page 101
Stage	Allows you to move from one stage to the next or previous one.	page 104
Help	Gives you access to the on-screen help information system.	page 114

Many functions available on the menu can also be accessed by clicking an icon on the Toolbar or by pressing a shortcut key or key combination.

When you leave the cursor for a while on a button of the Toolbar, a label indicating the function of the button displays.



File Menu

The File menu handles file input/output, such as opening, saving and printing.

The File menu handles life input/output, such as opening, saving and printing.		
New Line Image	Creates a new blank Design Page and switches to Stage 2.	page 78
New Figure Data	Creates a new blank Design Page and switches to Stage 3.	page 78
Wizard	Gives a step-by-step guide for creating pattern data, according the type of data you want to create.	page 79
Open	Opens a previously saved file (*.PEM, *.PEL) or image file (Windows BMP (*.bmp), Exif (*.tif, *.jpg), ZSoftPCX (*.pcx), Windows Meta File (*.wmf), Portable Network Graphics (*.png), Encapsulated PostScript (*.eps), Kodak PhotoCD (*.pcd), FlashPix (*.fpx).	page 81
Select TWAIN device	Selects which TWAIN device installed in the computer to use.	page 82
Input from TWAIN device	Operates a TWAIN standardized scanner or other device to import an image.	page 83
Input from Clipboard	Opens a new design page in Stage 1, and puts the image data on the clipboard.	page 83
Output to Clipboard	Copies the Stage 1 image data to the clipboard.	page 84
Import Figure	Adds a *.pem file to your Design Page (available only in Stage 3).	page 84
Save	Saves your Design Page on the disk as latest Version file (default).	page 85

Save As	Saves the current file under a new file name. Savable files are: in Stage 1, Bitmap files (*.bmp); in Stage 2, PEL files; and in Stage 3 and 4, PEL and PEM files.	page 85
Exit	Exits the application.	page 86

New Line Image

Purpose: Creates a new blank Design Page and switches to Stage 2.

Shortcut key: Ctrl + N

Operation:

- 1 Click File, then New Line Image.
 - If the current Design Page is not edited, a new blank Design Page (Stage 2) appears immediately.
- 2 If the current Design Page is edited, you will be asked whether you want to save the changes, for example:



- ◆ Click **Yes** to save the Design Page first.
- ◆ Click **No** to abandon the Design Page.
- Click Cancel to do anything else (for example, modifying the current Design Page or saving it with another file name).

Depending on the stage you are currently using and the editing you did, the file to be saved is a *.pel file or a *.pem file or both.

A new file opens automatically in Stage 2. In Stage 2, you can use the pens and erasers to create black and white drawings. You may also want to use this feature to create patterns that are easier to draw by hand, for example, free-hand writing.

See also: "Open" on page 81, "Save" and "Save As" on page 85 and "New Figure Data" on

page 78

New Figure Data

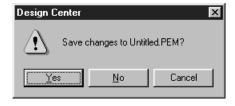
Purpose: Creates a new blank Design Page and switches to Stage 3.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

- 1 Click File, then New Figure Data.
 - If the current Design Page is not edited, a new blank Design Page (Stage 3) appears immediately.
- ② If the current Design Page is edited, you will be asked whether you want to save the changes, for example:



- Click Yes to save the Design Page first.
- ◆ Click **No** to abandon the Design Page.
- Click Cancel to do anything else (for example, modify the current Design Page or saving it with another file name).

Depending on the stage you are currently using and the editing you did, the file to be saved is a *.pel file or a *.pem file or both.

A new file opens automatically in Stage 3. The size of the Design Page is the currently set size. In Stage 3, you can use the line drawing tool to draw lines, or you can use Import Figure to retrieve the data from a saved pem file.

See also: "Open" on page 81, "Save" and "Save As" on page 85 and "New Line Image" on

page 78

Wizard

Purpose: Gives a step-by-step guide for creating pattern data, according the type of data

you want to create.

Shortcut key: F3

Toolbar: No button for this function

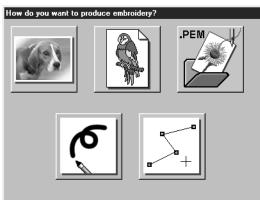
Operation:

Click File, then Wizard.

A step-by-step selection guide dialog similar to this will display.

(The same type of dialog will display when Design Center is running.)

However, if the current Design Page is edited, you will be asked whether you want to save the changes.



Position the mouse pointer over any button and the name of the action will display. The functions for each button are described below.

♦ Photo Stitch

Use this button when creating a Photo Stitch from an image. Click the button, and the Photo Stitch dialog is displayed showing the next necessary step. (See below)

♦ From Image

Use this button when creating normal embroidery data from an image. Click the button, and the From Image dialog is displayed showing the next necessary step. (See below)

◆ Open PEM

Use this button when you want to edit a saved (previously created) PEM file. Click the button and the File Open dialog will open to select a PEM file. For details, see the section in File – "Open" about PEM files (page 81).

♦ New Line Image

Opens a new Stage 2 Design Page.

Use this button when you want to use the black and white Pen tool to draw an image, then create embroidery data from the image.

For details, see File – "New Line Image" (page 78).

♦ New Figure

Opens a new Stage 3 Design Page.

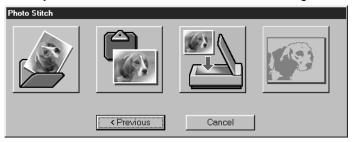
Use this button when you want to create data from vector data from the beginning, or when you want to create data from vector data taken from a previously saved PEM file. For details, see File – "New Figure Data" (page 78).

♦ Cancel

Closes this dialog.

When Photo Stitch is selected

When you click the Photo Stitch button in the dialog above, the following dialog opens.



Position the mouse pointer over any button and the name of the action will display. The functions for each button are described below.

Open Photo File

Opens a previously saved image file and pastes it in the Design Page. For details, see the section in File – "Open" (page 81).

♦ From TWAIN device

Import an image from a TWAIN device and paste it in the Design Page. For details, see File – "Input from TWAIN device" (page 83).

◆ From Clipboard

Pastes an image from the clipboard in the Design page. This function can only be used when there is an image on the clipboard.

For details, see File – "Input from Clipboard" (page 83).

♦ Use Current Photo

Use an image opened in Stage 1. This function can only be used when an image is opeded in Stage 1.

♦ Previous

Closes the current dialog, and returns to the selection dialog from the previous step.

◆ Cancel

Closes this dialog.

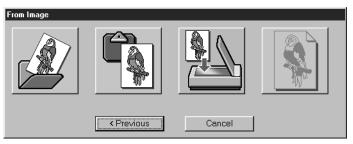
If any button other than **Previous/Cancel** is clicked, the image importing operation will take place, and the image will be pasted on the Stage 1 Design Page. After that, the Select Mask dialog for creating Photo Stitch data will open.

For directions after that point, see Stage – "To Photo Stitch" (page 109).

File Utility

When From Image is selected

When you click the From Image button from the dialog on page 79, the following dialog opens.



Position the mouse pointer over any button and the name of the action will display. The functions for each button are described below.

Open Image File

Opens a previously saved image file and pastes it in the Design Page. For details, see the section in File – "Open" about image files (page 81).

♦ From TWAIN device

Import an image from a TWAIN device and paste it in the Design Page. For details, see File – "Input from TWAIN device" (page 83).

◆ From Clipboard

Pastes an image from the clipboard in the Design page. This function can only be used when there is an image on the clipboard.

For details, see File – "Input from Clipboard" (page 83).

◆ Use Current image

Use an image opened in Stage 1. This function can only be used when an image is opeded in Stage 1.

♦ Previous

Closes the current dialog, and returns to the selection dialog from the previous step.

◆ Cancel

Closes this dialog.

If any button other than **Previous/Cancel** is clicked, the image importing operation will take place, and the image will be pasted on the Stage 1 Design Page. After that, the Cut out to Line Image dialog, which lets you choose colors for outlines, will open. You can then continue with creating normal embroidery data.

For directions on that topic, see Stage – "To Line Image" (page 104).

After that, continue through the steps Stage – "To Figure Handle" (page 106) and Stage – "To Sew Setting" (page 108) to create the data. For details, see those sections in the manual.

Open

Purpose: Opens a previously saved file (*.PEM, *.PEL) or image file (Windows BMP

(*.bmp), Exif (*.tif, *.jpg), ZSoftPCX (*.pcx), Windows Meta File (*.wmf), Portable Network Graphics (*.png), Encapsulated PostScript (*.eps), Kodak PhotoCD (*.pcd), FlashPix (*.fpx).

NOTE:

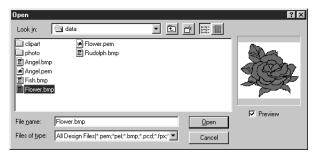
For pcd and fpx files that are saved on many pages, only the first page can be opened. Tif files that have used LZW compression can not be opened.

Shortcut key: Ctrl + O

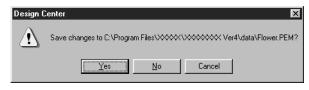
Operation:

1 Click File, then Open.

A **Open** dialog similar to this will display.



- Select the drive, the folder and the file name.
- Be sure to select the right type of file extensions in List Files of Type.
- If the Preview check box is checked, the content of the selected file displays in the preview window.
- Click Open or double-click the file name to open the file in Design Center.
- ◆ Click Cancel to exit.
- 2 The selected file opens immediately if your current Design Page is not edited.
 If the current Design Page is edited, you will be asked whether you want to save the changes.



- Click Yes to save the Design Page first.
- ◆ Click **No** to abandon the Design Page.
- Click Cancel to do anything else (for example, modifying the current Design Page or saving it with another file name).
- 3 Depending on the stage you are currently using and the editing you did, the file to be saved is a *.pel file or a *.pem file or both.

See also: "New Line Image" on page 78, "Save" and "Save As" on page 85

Select TWAIN device

Purpose: Selects which TWAIN device installed in the computer to use.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click File, then Select TWAIN device.

A dialog similar to this will display.

From the devices in the display, select which device to use and highlight that device.



- Click Select to choose the selected device and close the dialog.
- Click Cancel to ignore the operation done to change the device and close the dialog.

NOTE:

If there is no TWAIN device installed, there will be no names displayed on the Sources list. Use this function after installing the driver software for the TWAIN device you want to use.

See also: "Input from TWAIN device" on page 83

Input from TWAIN device

Purpose: Operates a TWAIN standardized scanner or other device to import an image.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Check that the scanner or other device is correctly connected.

2 Click File, then Input from TWAIN device.

The driver interface set in the **Select TWAIN device** dialog is displayed.

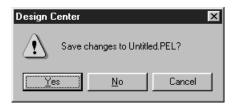
Operate that interface, make the settings for importing an image, and import the image.

NOTE:

For information on using the interface, see the help manual for that interface, or contact the manufacturers of the interface.

3 When the image transfer between the scanner (or other device) and the driver is complete, the imported image will be pasted in Stage 1.

If you were editing a pattern on the design page before the transfer, you will be asked whether you want to save the changes, for example:



- ◆ Click **Yes** to save the Design Page first.
- ◆ Click **No** to abandon the Design Page.
- Click Cancel to do anything else (for example, modify the current Design Page or saving it with another file name).

NOTE:

TWAIN is an application interface (API) standardization for software controlling scanners, etc. Also, the software itself is called TWAIN.

This software supports TWAIN standardized devices, so you can control the scanner and import the image directly.

Before using this function, you must go to the "Select TWAIN device" dialog to select a TWAIN device.

See also: "Select TWAIN device" on page 82

Input from Clipboard

Purpose: Opens a new design page in Stage 1, and puts the image data on the clipboard.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

Click File, then Input from Clipboard. (This can only be done when there is image data on the clipboard.)

If the current Design Page is not edited, the Stage 1 design page will open and will show the image data as it was on the clipboard.

2 If the current Design Page is edited, you will be asked whether you want to save the changes, for example:



- ◆ Click **Yes** to save the Design Page first.
- ◆ Click **No** to abandon the Design Page.
- Click Cancel to do anything else (for example, modify the current Design Page or saving it with another file name).
- 3 Depending on the stage you are currently using and the editing you did, the file to be saved is a *.pel file or a *.pem file or both.

See also: "Open" on page 81, "Save" and "Save As" on page 85

Output to Clipboard

Purpose: Copies the Stage 1 image data to the clipboard.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

Click File, then Output to Clipboard. (This can only be done when there is image data in the Stage 1 design page.)

The image data in the design page is copied to the clipboard.

Import Figure

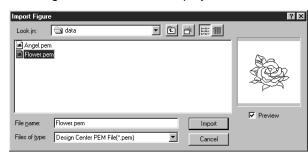
Purpose: Adds a *.pem file to your Design Page (available only in Stage 3).

Shortcut key: (F8)

Toolbar: 口声 🖫 🖫 ୍ଦ 🗸 🖺 🖺 හින ව 🍿 🍇 🔍 🖼 🗎 🖼

Operation:

Click File, then Import Figure.
A dialog similar to this will display.



- Select the drive, the folder and the file name.
- ◆ Click Import to open.
- Click Cancel to exit.

The selected pattern will be added to your Design Page.

See also: "Open" on page 81

Alphabetic Index

Shortcut key:

Ctrl + S

Operation:

① Click File, then Save.

If the file already exists on the disk (the file has been saved at least once during the same stage as the current one), the file is saved immediately.

2 If the file name is still **Untitled** or if, for any other reason, the file cannot be found on the disk, the application automatically switches to **Save As**.

See also: "Save As" below

Save As

Purpose: Saves the current file under a new file name.

Savable files are: in Stage 1, Bitmap files (*.bmp); in Stage 2, PEL files; and in

Stage 3 and 4, PEL and PEM files.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click File, then Save As.

A Save As dialog similar to this will display.



- Select the drive, the folder and type the file name.
- The correct extension is automatically set.
- Click Save to save.
- ◆ Click Cancel to exit.

Stage1 image data can only be saved as a Bitmap file (*.bmp).

From Stage 2 to 4, black and white data can be saved as a PEL file, and pattern data can be saved as a PEM file.

2 If the new file name already exists, this dialog will appear.



- Click Yes to overwrite.
- Click No if you do not want to overwrite the existing file.

Quik Reference

See also: "Save" on page 85

NOTE:

For the file type, if "PEM Version 2.0" is selected and the file is saved, the PEM file can be opened with Version 2.x. If "PEM Version 1.0" is selected and the file is saved, the PEM file can be opened with Version 1.x and 2.x. Note however that some information could be lost.

Exit

Purpose: Exits the application.

Shortcut key:

Alt + **F4**

Toolbar: No button for this function

Operation:

① Click File, then Exit.

If the current Design Page is not edited, the application closes immediately.

② If the current Design Page is edited, you will be asked whether you want to save the changes.

See also: "Save" and "Save As" on page 85

Edit Menu

The functions of the Edit menu perform simple actions on selected patterns, such as cutting and pasting.

Undo		Undoes the last operation.	page 87
Redo]	Cancels the effect of the last Undo.	page 87
Cut		Removes the selected data from the screen while saving a copy in the clipboard.	page 87
Сору		Saves the selected data in the clipboard without removing them from the screen.	page 88
Duplicate	1	Makes a copy of the selected data.	page 88
Paste		Pastes the contents of the clipboard on the screen.	page 88
Delete		Removes the selected data from the screen without saving them in the clipboard.	page 88
Mirror	Horizontal	Flips the selected data up/down.	page 89
Willion	Vertical	Flips the selected data left/right.	page 89
Rotate		Allows you to change the direction of the pattern.	page 90
Numerical	Size	Resizes the selection numerically.	page 90
Setting	Rotate	Rotates the selected pattern numerically.	page 91
Select All		Selects all the data.	page 91

Undo

Purpose: Undoes the last operation.

Shortcut key: Ctrl + Z

Operation:

1 Click Edit, then Undo.

The last operation is automatically undone.

See also: "Redo" below

Redo

Purpose: Cancels the effect of the last **Undo**.

Shortcut key: Ctrl + A

Operation:

1 Click Edit, then Redo.

The effect of the last **Undo** is cancelled.

See also: "Undo" above

Cut

Purpose: Removes the selected data from the screen while saving a copy in the clipboard.

Shortcut key: Ctrl + X

Operation:

- 1 Select one or more outline data (Stage 3 only).
- 2 Click Edit, then Cut.

The selected outline data disappear. Since they are saved in the clipboard, you can paste them back using **Edit – Paste**.

See also: "Copy", "Paste" and "Delete" below

Copy

Purpose: Saves the selected data in the clipboard without removing them from the screen.

Shortcut key:

Ctrl + C

Toolbar: Doi:10 Doi:10 10 <a href="Do

Operation:

- 1 Select one or more outline data (Stage 3 only).
- 2 Click Edit, then Copy.

The outline data are copied into the clipboard and are ready to be pasted.

See also: "Cut" above, "Duplicate" and "Paste" below

Duplicate

Purpose: Makes a copy of the selected data.

Shortcut key: Ctrl + D

Toolbar: No button for this function

Operation:

- 1 Select one or more outline data (Stage 3 only).
- 2 Click Edit, then Duplicate.

A copy of the outline data appears on the screen.

See also: "Copy" above and "Paste" below

Paste

Purpose: Pastes the contents of the clipboard on the screen.

Shortcut key: Ctrl + V

Operation:

1 Click Edit, then Paste (Stage 3 only).

The outline data saved in the clipboard (using Cut or Copy) are pasted on the screen.

See also: "Cut", "Copy" and "Duplicate" above

Delete

Purpose: Removes the selected data from the screen without saving them in the clipboard.

Shortcut key: Delete

Toolbar: No button for this function

Operation:

- 1 Select one or more outline data (Stage 3 only).
- 2 Click Edit, then Delete.

The selected outline data are removed from the screen. Since they are not saved in the clipboard, the only way to make them reappear is to use **Edit – Undo**.

See also: "Undo" and "Cut" on page 87

Mirror – Horizontal

Purpose: Flips the selected data up/down.

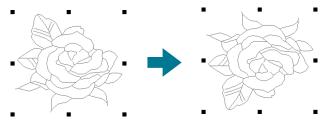
Shortcut key: Ctrl + H

Toolbar: 미글 링 및 이 교 보 타리 및 최이 ※ 캠 및 및 최유 (최종)

Operation:

- 1 Select one or more outline data (Stage 3 only).
- 2 Click Edit, then Mirror, then Horizontal.

A horizontal mirror image (top and bottom inverted) of the outline data appears on the screen. Two successive executions of this command restores the original image.



See also: "Flipping a pattern horizontally or vertically" on page 63 and "Mirror – Vertical"

below

Mirror – Vertical

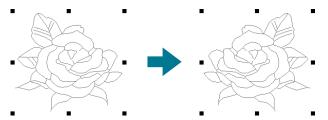
Purpose: Flips the selected data left/right.

Shortcut key: Ctrl + J

Operation:

- 1 Select one or more outline data (Stage 3 only).
- 2 Click Edit, then Mirror, then Vertical.

A vertical mirror image (left and right inverted) of the outline data appears on the screen. Two successive executions of this command restores the original image.



See also: "Flipping a pattern horizontally or vertically" on page 63 and "Mirror – Horizontal"

above

Rotate

Purpose: Allows you to change the direction of the pattern.

Shortcut key: (Ctrl) + (Y)

Toolbar:

Operation:

- 1 Select one or more outline data (Stage 3 only).
- 2 Click Edit, then Rotate.

The handles around a selected pattern are replaced by smaller rectangle on the four corners of the selected area.

3 To rotate a pattern, move the cursor on one of the four rotation handles.

The shape of the cursor changes to **()** as soon as your cursor touches a rotation handle. Click a handle and a lined box appears around the selected pattern.

You can rotate the pattern clockwise or counterclockwise by dragging the mouse.

A simple dragging of the mouse will rotate the pattern by 1° increments. Pressing the **Shift** key will rotate it by 15° increments.

See also: "Rotating a pattern" on page 63

Numerical Setting-Size

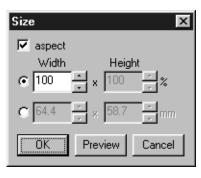
Purpose: Resizes the selection numerically.

Shortcut key: No shortcut key for this function.

Toolbar: No button for this function.

Operation:

- 1 Select one or more patterns. (Stage 3 only)
- Click Edit, then Numerical Setting, then Size. The Size dialog appears.



- ◆ To change the width and height proportionally, check aspect.
- Select the units (% or mm/inch) for the width and height.
- Either typing in a value or clicking the arrows to select the desired value can enter the width and height.
 Select 100 % to leave the pattern unchanged.

If aspect is selected, changing one dimension automatically changes the other so the proportion of the width and height remains unchanged.

- Click OK to confirm.
- Click Preview to view the pattern at the new size in the Design Page.
- Click Cancel to exit without making any changes.

NOTE:

The maximum value that can be entered is the largest value that will not allow the pattern to exceed the size of the Design Page.

The minimum value is 1 mm (0.04 inch).

See also: "Select System Unit" on page 103

Numerical Setting-Rotate

Purpose: Rotates the selected pattern numerically.

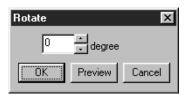
Shortcut key: No shortcut key for this function.

Toolbar: No button for this function.

Operation:

1 Select one or more patterns. (Stage 3 only)

Click Edit, then Numerical Setting, then Rotate. The Rotate dialog appears.



- The desired rotation angle can be entered by either typing in a value or clicking the arrows to select the desired value.
 - Select **0** degree to leave the pattern unchanged.
- Click OK to confirm.
- Click Preview to view the pattern rotated the specified angle in the Design Page.
- Click Cancel to exit without making any changes.

NOTE:

The range of values that can be entered is between 0 and 359 degrees, in 1-degree increments.

Select All

Purpose: Selects all the data.

Shortcut key: Ctrl + E

Toolbar: No button for this function

Operation:

1 Click Edit, then Select All (Stage 3 only).

File Utility

Sew Menu

The **Sew** menu allows you to control the way the pattern will be sewn.

Sewing Attributes	Sets the sewing attributes for outlines and regions.	page 92
Sewing Order	Allows you to check and modify the sewing order of the dif- ferent colors of a pattern as well as the sewing order of each color individually.	page 96

Sewing Attributes

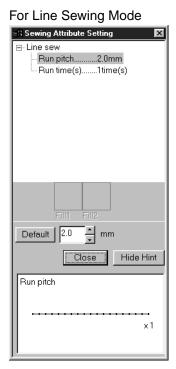
Purpose: Sets the sewing attributes for outlines and regions.

Shortcut key: Ctrl + W

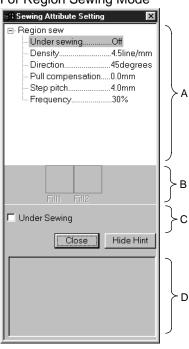
Operation:

1 Click Sew, then Sewing Attribute.

A Sewing Attribute dialog similar to this will display. You can freely change the size of this dialog.



For Region Sewing Mode



- Select the item you want to change or set in the Sewing attribute display area (A), then enter the change or setting in the Edit box. (C)
- ◆ The method for entering the setting varies according to the item. If entering numerical values, you can click on the arrow buttons to select values or enter the values directly. If the Default button is displayed in the Edit box (C), click the button to apply the Default setting to the selected item.
- When in Line Sewing Mode, click on the outline to apply the contents of the settings to the outline.
 When in Region Sewing Mode, click on the region to apply the contents of the settings to the region.
- Click Close to exit.
- Click Show Hint/Hide Hint to turn the hint image display on or off (D).

When in Line Sewing Mode, only Line sewing items are displayed. When in Region Sewing Mode, only Region sewing items are displayed.

A: Sewing attribute display area: Displays the present settings for each of the sewing attributes.

B: Selected pattern display area: When a pattern for Programmable Fill or Motif sewing is

selected, that pattern is displayed.

C: Edit box: Displays the setting values to be changed for the item selected

in the Sewing attribute display area.

D: Hint image display area: When set to display a hint, a hint image showing the settings in

the edit box is displayed.

Direction Run pitch

Quik Reference

Line sewing attribute

Setting items according to the selected stitch

Zigzag stitch
Line sewing

L Density

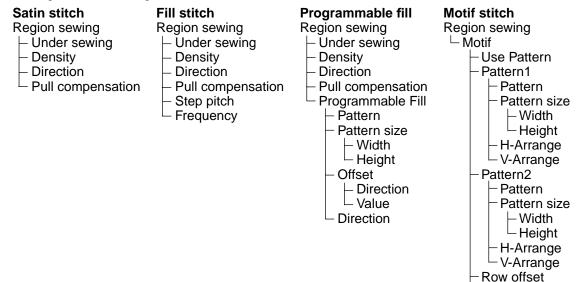
Running stitch

Line sewing	
Run pitch	
└ Run times	

Zigzag width	Sets the width of the zigzag. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 2 mm (0.08 inch)
Density	Sets the number of lines per mm (inch). Range: 1 - 7 lines per mm (25 - 178 lines per inch) Default: 4.5 lines per mm (114 lines per inch)
Run pitch	Sets the pitch of the line sewing. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 2 mm (0.08 inch)
Run times	Sets the number of times the border will be sewn. Range: 2, 4, 6 Default: 2

Region sewing attribute

Setting items according to the selected stitch



Under Sewing	Sets Under Sewing on/off. Try to use Under Sewing for wide areas, in order to prevent shrinking during stitching. Depending on the shape of the region, however, it may not be possible to make this setting. On: Under Sewing will be done Off: Under Sewing will not be done
Density	Sets the number of lines per mm. Range: 1 - 7 lines per mm (25 - 178 lines per inch) Default: 4.5 lines per mm (114 lines per inch)

File Utility

Direction	Sets the direction of the stitch. Range: 0 - 179 degrees Default: 45 degrees	135° 90° 45° 179°
Pull Compensation	Lengthens the sewing region in the stitch pattern's sewing vent pattern shrinkage during sewing. Range:0 - 2 mm (0.00 - 0.08 inch) Default:0 mm (0.00 inch)	g direction to pre-

Fill stitch only:

Step Pitch	Sets the pitch of the steps. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 4.0 mm (0.16 inch)	Step pitch $\frac{1}{t}$ \bigvee \bigvee
Frequency	Sets the spacial frequency steps. Range: 0 - 99% Default: 30%	0% \\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\

Programmable fill stitch only:

r rogrammable im stitch omy.				
Pattern		Select a pattern for Programmable Fill Stitch. Click Select Pattern , and the Browse dialog opens. Select the folder containing the pas file you want to open. Scroll through the available stitch patterns and double-click the desired pattern or click OK to select the pattern.		
Pattern Size	Width	Sets the stitch pattern width. Range: 5 - 10 mm (0.20 - 0.39 inch) Default: 7.5 mm (0.30 inch)		
	Height	Sets the stitch pattern height. Range: 5 - 10 mm (0.20 - 0.39 inch) Default: 7.5 mm (0.30 inch)		
Offset	Direction	Sets the offset arrangement of the pattern, and sets the direction of offset as Row/Column.		
	Value	When the pattern's arrangement is offset, sets the amount of offset. Range: 0 - 99 % Default: 0 %		
Pattern Direction		Allows you to rotate the angle of the stitch patterns. Range: 0 - 359 degrees Default: 0 degrees		

Motif stitch only:

Use Pattern	Selects whether to use pattern 1 or pattern 2 for Motif. If you choose to use both patterns, the data is created so that sewing is alternated between them after each row. Pattern1 only: Uses only pattern 1 (Default) Pattern2 only: Uses only pattern 2 Pattern1 and 2: Uses pattern 1 and pattern 2
Pattern	Select a pattern for Motif sewing. Click Select Pattern , and the Browse dialog will display. Select the folder containing the pmf file you want to open. Scroll through the available stitch patterns and double-click the desired pattern or click OK to select the pattern

Pattern Size	Width	Sets the pattern width (the direction along the line). Range: 2 - 10 mm (0.08 - 0.39 inch Default: 5 mm (0.20 inch)		
	Height	Sets the pattern height (the direction perpendicular to the line). Range: 2 - 10 mm (0.08 - 0.39 inch) Default: 5 mm (0.20 inch)		
H-Arrange (Horizontal Arrange)		Sets the horizontal arrangement of the pattern. For patterns like \bigcirc , patterns will be arranged along the line as shown to the right.	Normal:	
V-Arrange (Vertical Arrange)		Sets the vertical arrangement of the pattern. For patterns like \triangleright , patterns will be arranged along the line as shown to the right.	Normal: Mirror: Alternate:	
Row Offset		When the pattern arrangement is offset, sets the amount of offset for each row. Range: 0 - 10 mm (0.00 - 0.39 inch) Default: 0 mm (0.00 inch)		
Direction		Allows you to rotate the angle of the Motif patterns. Range: 0 - 359 degrees Default: 0 degrees		
Run Pitch		Sets the pitch of the sewing. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 2 mm (0.08 inch)		

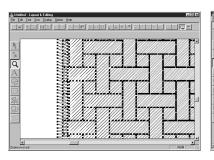
Note on the Programmable Fill Stitch:

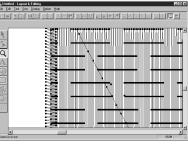
When setting the stitch and pattern directions of a programmable stitch, take note that whenever the stitch and pattern direction settings cause the stitch to be sewn in the same direction as a line in a stitch pattern, that line will not be sewn.

Use the preview function of your application to view exactly how your stitch pattern will be sewn and set the stitch direction and pattern direction according to the selected stitch or to the effect that you want to produce. To get an even better view, make test samples of different settings. Example of a programmable fill stitch:

Example 1: Stitch direction: Default: 45°

Example 2: Stitch direction: 90° Example 3: Stitch direction: 0°







See also: "Preview" on page 99, "Programmable Stitch Creator" on page 211

Purpose: Allows you to check and modify the sewing order of the different colors of a pat-

tern as well as the sewing order of each color individually.

Shortcut key: F10

Toolbar:

Operation:

1 Click Sew, then Sewing Order.

The Sewing Order dialog opens and displays the Color tab. The embroidery pattern is grayed.

2 To check and review the sewing order of the different colors of a pattern: Make sure the **Color** tab is displayed.



- ◆ Click . The color that will be sewn first displays.
- ◆ Click → or ← to review the colors that will be sewn between the first and last.
- ◆ Click → to see the color that will be sewn last.
- ◆ Click if you want the selected color to be sewn last.
- ◆ Click if you want the selected color to be sewn first.
- ◆ Click to move the selected color back one spot in the sewing order.
- ◆ Click to move the selected color forward one spot in the sewing order.
- ◆ Click **OK** to confirm.
- ◆ Click Cancel to exit.

3 To check and review the sewing order of the parts of the same color, select a color in the Color tab, then click the Part tab.

The parts to which you attributed the selected color are displayed in gray.



- ◆ Click <a> H•• <a> The part that will be sewn first displays.
- ◆ Click → or ← to review the parts that will be sewn between the first and last.
- ◆ Click → to see the part that will be sewn last.
- ◆ Click if you want the selected part to be sewn last.
- ◆ Click if you want the selected part to be sewn first.
- ◆ Click to move the selected part one spot back in the sewing order.
- ◆ Click to move the selected part one spot forward in the sewing order.
- ◆ Click **oK** to confirm.
- Click Cancel to exit.

Note that all inside regions are always sewn before the outlines. If you set an outline to be sewn first, it will be the first outline to be sewn, but will still be sewn after all inside regions.

See also: "Preview" on page 99

Display Menu

The Display menu lets you modify the appearance of the screen.

Grid Setup	Allows you to set up the grid, to switch it on or off and to display it with or without the horizontal and vertical lines.	page 98
Preview	Displays a realistic image of how the patterns will look like when embroidered.	page 99
Refresh Window	Updates the screen.	page 99
Realistic Preview	Displays a realistic image of how either selected patterns or all patterns will look after being embroidered.	
Realistic Preview Attribute Setting	Sets the preview attributes for Realistic Preview.	page 99
Toolbar	Turns the Toolbar on/off.	page 100
Status Bar	Turns the Status bar on/off.	page 100

Grid Setup

Purpose: Allows you to set up the grid, to switch it on or off and to display it with or without

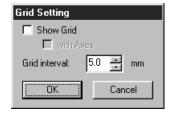
the horizontal and vertical lines.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

① Click **Display**, then **Grid Setup** (Stage 3 only). This dialog displays.



- 2 To set the grid interval, click the up and down arrows or type in the value. Setting range: 1 10 mm (0.04 0.39 in)

 Click **OK** to confirm or **Cancel** to exit.
- 3 To switch the grid on or off, click the **Show grid** check box.

The grid will display when the Show grid check box is checked.

To switch the horizontal and vertical lines of the grid on and off, click the with Axes check box. The lines will display when the with Axes check box is checked.

NOTE:

When the **Show grid** check box is checked and the **with Axes** check box is not checked, only the intersection points of the grid will be displayed.

See also: "Select System Unit" on page 196

Preview

Purpose: Displays a realistic image of how the patterns will look like when embroidered.

F9 Shortcut key:

Toolbar:

Operation:

1 Click Display, then Preview (Stage 4 only).

A preview of your embroidery patterns will appear.

You cannot make any settings while previewing a pattern.

2 To return to the normal working screen, click Display, then Preview again or press the (Esc)

See also: "Sewing Order" on page 96

Refresh Window

Purpose: Updates the screen.

Shortcut key: (Ctrl) + (R)

Toolbar: No button for this function

Operation:

1 Click Display, then Refresh Window.

Use this function when the screen does not seem to update correctly.

Realistic Preview

Displays a realistic image of how either selected patterns or all patterns will look **Purpose:**

after being embroidered.

Shortcut key: Shift + (F9)

Toolbar: 口字 喝 日 トマ メ 画画 かあり ※端 🌚

Operation:

1 Click Display, then Realistic Preview (Stage 4 only).

The patterns on the Design Page are displayed realistically according to the settings in the Realistic Preview Attribute Setting dialog.

2 To return to the normal working screen, click Display, then Realistic Preview again or press the

(Esc) key.

NOTE:

The Realistic Preview function cannot display a beautiful preview of the pattern if the monitor is set to 256 colors or less. The monitor should be set to at least 16-bit High Color (65536 colors).

See also: "Realistic Preview Attribute Setting" below

Realistic Preview Attribute Setting

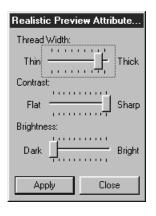
Purpose: Sets the preview attributes for Realistic Preview.

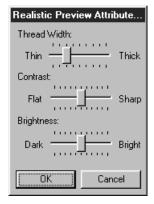
Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click **Display**, then **Realistic Preview Attribute Setting** (Stage 4 only). The following dialog appears.





- Use Thread Width to set how wide the thread will appear.
- ◆ Use Contrast to set the contrast.
- Use Brightness to set how bright the display is.
- Click Apply to display a Realistic Preview of the patterns with the new settings. (When Realistic Preview is displayed)

Or, click **OK** to save the settings for the next time Realistic Preview is displayed. (When Realistic Preview is not displayed)

◆ Click Close or Cancel to exit.

See also: "Realistic Preview" on page 99

Toolbar

Purpose: Turns the Toolbar on/off.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click **Display**, then **Toolbar**.

The Toolbar will be toggled on/off.

See also: "Status Bar" below

Status Bar

Purpose: Turns the Status bar on/off.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Display, then Status bar.

The Status bar will be toggled on/off.

See also: "Toolbar" above

Option Menu

The Option menu allows you to select the Design Page size and the unit system.

Layout & Editing	Starts Layout & Editing and displays its window up front.	page 101
Programmable Stitch Creator	Starts Programmable Stitch Creator and displays its window up front.	page 101
File Utility	Starts File Utility and displays its window up front.	page 101
Design Page Property	Allows you to change the size of the Design Page and the color of the Design Page and the Design Page background.	page 101
Select Color Arrangement	Changes the order of the colors in the Thread Color Dialog.	page 102
Select System Unit	Allows you to select the system unit (mm or inch).	page 103

Layout & Editing

Purpose: Starts Layout & Editing and displays its window up front.

Shortcut key: F5

Toolbar: No button for this function

Operation:

1 Click Option, then Layout & Editing.

Layout & Editing starts if its window wasn't open and if it was open, the window comes up front.

Programmable Stitch Creator

Purpose: Starts Programmable Stitch Creator and displays its window up front.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then Programmable Stitch Creator.

Programmable Stitch Creator starts if its window wasn't open and if it was open, the window comes up front.

File Utility

Purpose: Starts File Utility and displays its window up front.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then File Utility.

File Utility starts if its window wasn't open and if it was open, the window comes up front.

Design Page Property

Purpose: Allows you to change the size of the Design Page and the color of the Design

Page and the Design Page background.

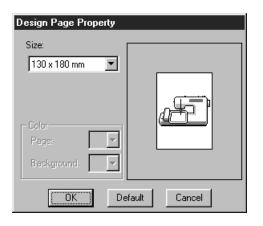
Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then Design Page Property.

At the Stage 3 only, the dialog will display as follows.

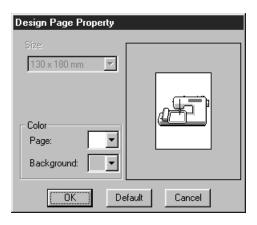


 Select the size by clicking its selector arrow, then by clicking the size.

The preview area allows you to view the setting changes. The sewing machine picture shows the direction of the Design Page (frame) on the machine.

- Click **OK** to confirm.
- ◆ Click **Default** to go back to the default setting.
- Click Cancel to exit.

At the Stage 4 only, the dialog will display as follows.



 Select the Page color or the Background color by clicking its selector arrow, then by clicking the color.

The preview window allows you to view the selected colors.

- Click OK to confirm.
- Click Default to go back to the default setting.
- ◆ Click Cancel to exit.

See also: "Select System Unit" on page 103

Select Color Arrangement

Purpose: Changes the order of the colors in the Thread Color Dialog.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

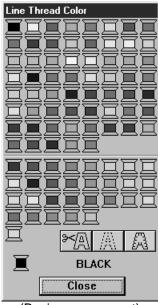
Operation:

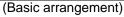
1 From the menu, click **Option**, then **Select Color Arrangement**. A dialog similar to this will display.

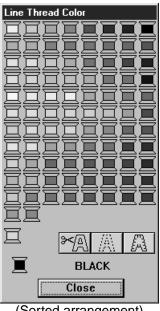


Basic arrangement: Basic Color and Optional Color displays are separated. Sorted arrangement: Basic Color and Optional Color displays are mixed together.

Quik Reference







(Sorted arrangement)

NOTE:

When Basic arrangement is selected

The colors in the top half of the dialog are Basic Color. On sewing machines that can display color names, the selected color name will be displayed as shown in the dialog. (In the dialogs and other displays in this application, the color name is displayed in uppercase letters.)

The colors in the bottom half of the dialog are Optional Color. On sewing machines that can display color names, the name of the closest Basic Color will be displayed. (In the dialogs and other displays in this application, the color name is displayed in lowercase letters with a number; for example, "blue2." In this case, "BLUE" will be displayed on the sewing machine.)

When Sorted arrangement is selected

Basic Color and Optional Color are mixed together, so use the uppercase/lowercase color name display to distinguish between them.

See also: "Color" on page 75

Select System Unit

Purpose: Allows you to select the system unit (mm or inch).

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then Select System Unit.

This dialog will display.



- Select the unit.
- Click **OK** to confirm.
- Click Cancel to exit.

Stage Menu

The Stage menu allows you to move from one stage to the next or previous one.

To Original Image	Moves back to Stage 1.	page 104
To Line Image	Moves to Stage 2.	page 104
To Figure Handle	Moves to Stage 3.	page 106
To Sew Setting	Moves from Stage 3 to Stage 4.	page 108
To Photo Stitch	Changes image data from Stage 1 to Photo Stitch embroidery data, and pastes the image into Stage 4. (This function can only be used if there is image data in Stage 1)	page 109

■ To Original Image

Purpose: Moves back to Stage 1.

Shortcut key: No shortcut key for this function

Operation:

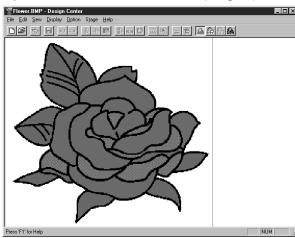
1 Click Stage, then To Original Image.

You are back to Stage 1 (the original color image displays).

NOTE:

This function can only be used if there was image data in Stage 1 (if image data was opened, if image data was pasted from the clipboard, etc.)

If you have started with a new file (Stage 2), for example, the function is not enabled.



See also: "To Line Image" on page 104, "To Figure Handle" on page 106, "To Sew Setting" on

page 108

■ To Line Image

Purpose: Moves to Stage 2.

Shortcut key: No shortcut key for this function

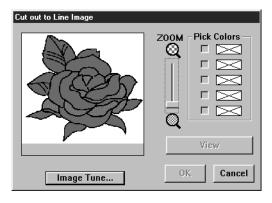
Operation:

1 Click Stage, then To Line Image.

If you were in Stage 3, you are returned to Stage 2, except when you have modified the image in Stage 3. In that case, a message will ask you to confirm that you want to abandon the changes made in Stage 3. (If working with a Photo Stitch, you can not return to Stage 2.)

NOTE:

If you started in Stage 3 by opening a Stage 3 file, you cannot go to Stage 2.



- ◆ If necessary, scroll and zoom the image.
- ◆ Select the color(s) that you want to convert into black. To do this, move the cursor over the image. The shape changes to

 Click on a color. The color moves to the upper box under

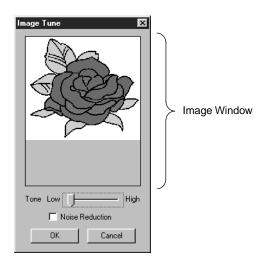
 Pick Colors and a

 appears in the check box to show that the color is on. You can repeat to select a total of five colors. If you try to select more, colors are scrolled down, and the color that was at the bottom is deselected.
- If you selected a color by mistake, simply click its check box to deselect it.
- Click View to see the effect of your selection. You can repeat this step after clicking on the check boxes of the selected colors to toggle them on/off, or after selecting different colors.
- ◆ Click **oK** to confirm.
- Click Cancel to exit.

[Color Reduction function]

If you click the **Image Tune** button in the above dialog, a **Image Tune** dialog similar to this will display, and you can reduce the colors of the image data (posterize) or reduce the noise.

With this function, you can apply an even gradation to make the image smoother. You can use **Pick Colors** to select colors easily, even from image data that was taken from a scanner or other device, and does not have clear outlines.

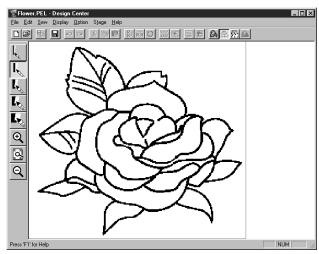


- Image Window displays the image resulting from the current operations.
- ◆ Tone sets the amount of color reduction (posterization). The right side (High) shows the original image. The farther to the left side (Low) the setting is made, the greater the amount of color reduction.
- If Noise Reduction is checked, the very small areas of noise are deleted.
- Click OK to show the finished image on the Design Page and on the Cut Out to Line Image dialog, and close the dialog. Before you open this dialog, the Pick Colors that were picked out in the Cut Out to Line Image dialog are reset.
- Click Cancel to close the dialog.

NOTE:

This operation is done so that the operations in the Cut Out to Line Image dialog can be done, so the image that results from these operations cannot be saved.

2 When you click **OK**, the black and white image is displayed and you are in Stage 2.



Note that all the colors that you selected and turned on are converted to black. It is recommended to select just as many colors as necessary to have a good outline of the image. In the above example, a single color was selected.

In Stage 2, you can edit the image using the pens and erasers and use the zooming tools. Note that if you do not like the result, you can go back to Stage 1 and select different colors.

See also: "To Original Image" on page 104, "To Figure Handle" on page 106, "To Sew Set-

ting" on page 108

To Figure Handle

Purpose: Moves to Stage 3.

Shortcut key: No shortcut key for this function

Toolbar:

Operation:

1 Click Stage, then To Figure Handle.

If you were in Stage 4, a message warns you that may lose some data if you go back to Stage 3. If you want to make sure no data is lost, click **Cancel** in that dialog and save your settings. Otherwise, click **OK** and you are returned to Stage 3.

If you were in Stage 2, this dialog displays.



- Set the resolution. For details, see the following table.
- Set the thinning process. For details, see the following table.
- Set the size as a percentage of the original using the SIZE slider (setting range: 25 % - 400 %). You will not be able to enlarge the image beyond the limits of the Design Page area. If necessary, set the Design Page size by clicking Design Page Property and selecting one of the two other Design Page sizes in the dialog that opens.
- The preview window reflects the setting changes you make.

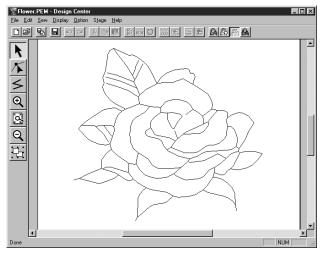
File Utility

Quik Reference

- If necessary, click Pick Area. A cross-shaped cursor will appear. Select the desired area by moving the cursor across the image. You will return to this screen as soon as you release the mouse.
- The preview window reflects the setting changes you make.
- ◆ Click **oK** to confirm.
- Click Cancel to exit.

This setting determines how detailed the generated pattern image will be. Basically, the outline of the line image is converted into pieces of broken lines. To make a more detailed pattern, you need more points on the broken lines, which also increases the length of the file. Resolution In general, Normal provides a sufficient resolution without making the file too large. If Coarse gives a satisfactory result for a particular image, select Coarse in order to keep the file as small as possible. Select Fine only if the image contains many small details, and Normal does not give a satisfactory result. This setting determines how the black lines of the line image are converted into pattern lines. **ON**: the black lines are replaced with pattern lines following the center of the black lines. You can set the degree of detailedness with the slider (if the degree is high, even very thick black lines will be replaced with a center line). Thinning **Process** OFF: the black lines are replaced with pattern lines following the border of the black lines. OFF

2 When you click **OK**, the Figure Handle Image displays and you are in Stage 3.



In Stage 3, you can edit the patterns, by moving, deleting and inserting points and by drawing lines. Use the zooming tools available whenever you need to zoom your pattern.

See also: "To Original Image" and "To Line Image" on page 104, "To Sew Setting" below,

"Grid Setup" on page 98 and "Design Page Property" on page 101

To Sew Setting

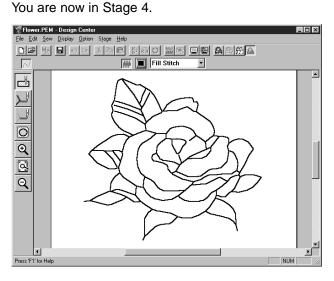
Purpose: Moves from Stage 3 to Stage 4.

Shortcut key: No shortcut key for this function

Toolbar: 미글 링 및 이 이 사람은 한테이 됐다. 교육 요요요 🙈

Operation:

1 Click Stage, then To Sew Setting.



You can set the sewing attributes. Use the zooming tools available whenever you need to scale your pattern.

See also: "To Original Image" and "To Line Image" on page 104 and "To Figure Handle" on

page 106

Use this function to open image files in Stage 1, change them to Photo Stitch embroidery data, and then go directly to Stage 4.

■ To Photo Stitch

Purpose: Changes image data from Stage 1 to Photo Stitch embroidery data, and pastes

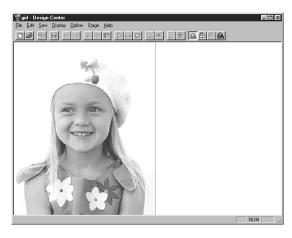
the image into Stage 4.

(This function can only be used if there is image data in Stage 1)

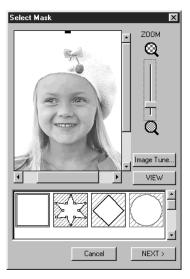
Shortcut key: No shortcut key for this function

Operation:

Prepare the image data in Stage 1. (Open, A Input from Clipboard, etc.)



Click Stage, then To Photo Stitch.
A Select Mask dialog similar to this will display.



- Select the Mask type at the bottom of dialog. (the Square mask is selected when this dialog opens).
- Click Image Tune to open the Tune Image dialog, where you can edit the image (see below).
- Click VIEW to display a preview of only the contents of the selected Mask on the Design Page. The display size will be scaled to match the Design Page size.
- Click NEXT to display the contents of the selected Mask on the full Design Page, and close this dialog. The Design Size Setting dialog, used to set the pattern size, will open next.
- Click Cancel to close this dialog and return to Stage 1.

In this dialog, set the boundaries of the Photo Stitch and make adjustments to the image data.

Use the ZOOM slider to zoom in and out on the image, as necessary.

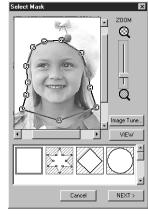
◆ In the Mask Type section in the bottom of the dialog, select the trimming shape you want to use for the Mask, and edit the Mask in the shape you want to use. When the dialog opens, the square Mask is selected.

Change the size of the Mask by dragging the handles on the outside of the Mask.

If you select the Arbitrary Shape Mask, the first display shows white square handles in the four corners of the square Mask.

You can move points, enter points, delete points, or edit this square Mask however you like in the Point Edit mode in Stage 3 (see page 122).





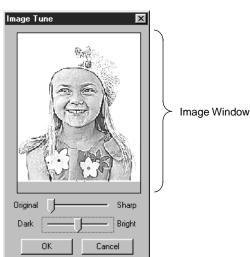
(Pattern edited with the round Mask) (Pattern edited with the arbitrary shape Mask)

NOTE:

The Mask size can be set in the range from 64×64 dots to the size of the image data.

[Emphasizing the Outline]

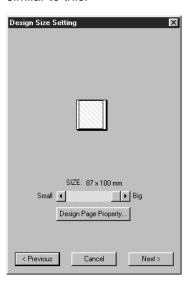
In the Select Mask dialog above, click the Tune Image button, and the Tune Image dialog similar to this will display. You can make the image brighter or darker (clearer or less sharp).



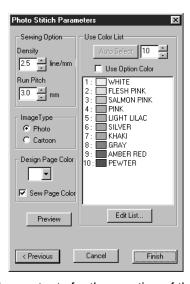
- Image Window displays the image resulting from the current operations.
- Use Original Sharp to adjust the sharpness of the image's outlines. A Sharper setting makes a more noticeable boundary between bright and dark areas.
- Use Dark Bright to adjust the brightness of the image.
- Click OK to show the finished image on the Design Page and on the Select Mask dialog, and close the dialog.
- Click Cancel to close the dialog.

File Utility

3 In the Select Mask dialog shown on page 109, click Next to show a Design Size Setting dialog similar to this.



- Use the Size slider to set the output size of the data. The largest output size you can choose is the set size of the Design Page.
- Click Design Page Property to open the Design Page Property dialog. You can then set the Design Page size. See Design Page Property (page 101) for details.
- Click Previous to close this dialog and return to the Select Mask dialog.
- Click Cancel to close this dialog and return to Stage 1.
- Click Next to set the contents of the settings and close this dialog.
 The Photo Stitch Parameters dialog, for setting the parameters for making Photo Stitch, will open.
- 4 In the Design Size Setting dialog above, click Next to display a Photo Stitch Parameters dialog similar to this.



- Click Previous to close this dialog and return to the Design Size Setting dialog display.
- Click Preview to display of preview of the Photo Stitch on the design page after finishing the settings.
 Also, the expected stitch count of the finished pattern will be displayed on the status bar.
- Click on Finish in the Photo Stitch Parameters dialog to set the parameters for the Photo. The Photo is then pasted into Stage 4 design page. (The photo image has been converted into stitches.)

Set the contents for the creation of the Photo Stitch in this dialog.



Quik Reference

Sewing Option:

Density	Sets the thread density for sewing. A coarser density setting than for regular region sewing is acceptable. Range: 1 - 4 lines per mm (25 - 102 lines per inch) Default: 2.5 lines per mm (64 lines per inch)
Run pitch	Sets the sewing pitch. The pattern is created with this setting value as the minimum length. Range: 2 - 10 mm (0.08 - 0.39 inch) Default: 3 mm (0.12 inch)

Image Type:

Photo/Cartoon	If Photo is selected, the thread colors will be mixed together and more natural looking data will be created. If Cartoon is selected, the thread colors will not be mixed together and simply colored data will be created. Select Photo for image data from a photograph, etc. Select Cartoon for image data from an illustration, etc. (If there are less than 16 colors in the image data, the default selection is Cartoon.)
---------------	---

Design Page Color:

Set the color of the Design Page. The color selected here will be the color of the Design Page in Stage 4.

Sew Page Color	If this item is checked, the data for parts of the pattern that are the same color as the Design Page will be created. Remove the check from the item if you will keep the fabric color the same as the Design Page. The default setting is checked (ON).
----------------	---

Use Color List:

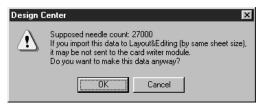
Set the type of thread color used in the created data with this item.

Auto Select	If you click this button, the most appropriate thread colors for the pattern area are automatically selected from the color list in this software. Only the number of colors shown to the right of this button will be retrieved, and those colors will be displayed on the Use Color List mentioned below. If other settings have been changed, it becomes possible to click the button.	
Number of Colors Set box	Sets the number of colors selected by the Auto Select function. Range: 1 - 50 Default: 10	
Use Optional Color	The color list in this software includes Basic Color and Optional Color (see "Select Color Arrangement", page 102.) If you check this item, Basic Color and Optional Color will both be included in the color list when selecting thread colors. If the item is not checked, only Basic Color can selected from.	
Use Color List Summary	Thread colors selected for creating the data are displayed in order by level of brightness. This order is the sewing order. The order can not be changed. The maximum number of colors is 50.	
Edit List	Click this button to open the Edit List dialog, which lets you manually set the thread colors to be used when creating the data.	

File Utility

NOTE:

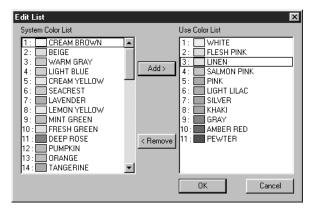
When Finish is clicked, the expected stitch count of the pattern with the changed settings is calculated. If it is over the limit decided by the size setting of the Design Page, a message similar to this will display.



Click **OK** to change the Photo Stitch data according to the settings made above, but normally, you should click **Cancel** and change the value of the settings.

[Manual Color Selection]

If you click the **Edit List** button in the Photo Stitch Parameters dialog above, an Edit List dialog similar to this will display, and you can manually set the thread colors to be used in the Photo Stitch.



- Click Add to add a selected color from the System Color List to the Use Color List. If there is no color selected, or if the Use Color List already has 50 colors, this button can not be used.
- Click Remove to delete a selected color from the Use Color List. If there is no color selected in the Use Color List, this button can not be used.
- Click OK to set the edited contents of the list and close the dialog. The edited settings will be shown in the Photo Stitch Parameters dialog. This button can not be clicked when the Use List display is empty.
- Click Cancel to close the dialog without setting the edited contents of the list.

In the **System Color List**, the thread colors in the color list for this software are listed in order by the level of brightness. (Thread colors displayed in the Use Color List are not displayed in the System Color List.)

In the **Use Color List**, thread colors selected for use in the Photo Stitch data are displayed in order from the brightest. This order is the sewing order. The order can not be changed. The maximum number of colors that can be added to this list is 50.

From this point, the colors in the lists can be selected by clicking on them, or several colors can be selected by holding the **Shift** key or **Ctrl** key and clicking on the colors.

File Utility

Alphabetic Index

Help Menu

The **Help** menu gives you access to the on-screen help information system.

Contents	Starts the on-screen help information for this application.	page 114
Using	Explains how to use the on-screen help system.	page 114
Customer Support	Opens the FAQ (Frequently Asked Questions) page in this company's homepage.	page 114
About Design Center	Gives information about the version of this application.	page 115

Contents

Purpose: Starts the on-screen help information for this application.

Shortcut key:

(F1)

Toolbar: No button for this function

Operation:

1 Click Help, then Contents.

A table of contents of the on-screen help information displays.

Refer to your Windows manual for the next operation.

See also: "Using" below and "About Design Center" on page 115

Using

Purpose: Explains how to use the on-screen help system.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

1 Click Help, then Using.

The Windows standard explanation about how to use the help system appears.

2 Refer to your Windows manual for the next operation.

See also: "Contents" above and "About Design Center" on page 115

Customer support

Purpose: Opens the **FAQ** (Frequently Asked Questions) page in this company's homepage.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

- 1 Click Help, then Customer support from the menu.
- 2 The browser installed in the computer will start, and open the FAQ page of this company's homepage.

NOTE:

This function cannot be used if there is no internet browser correctly installed in the computer.

Purpose: Gives information about the version of this application.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Help, then About Design Center.

A dialog will display.

2 Click **OK** to remove it.

See also: "Contents" and "Using" on page 114

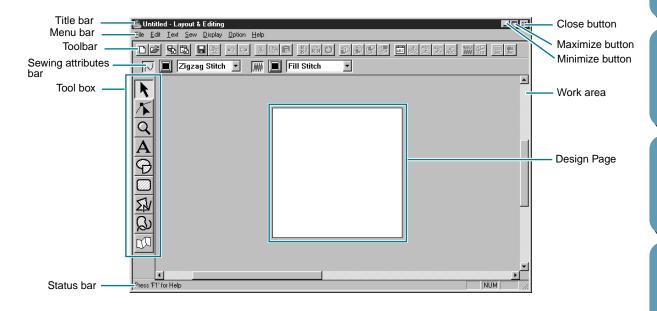
Layout & Editing

Layout & Editing is used to assemble an embroidery Design Page from different elements.

The most complex elements are created with Design Center and imported in the Design Page. You can then add text, boxes, circles, broken lines, curves and manual punching patterns. You can move all the patterns to obtain the best layout, and define sewing attributes (thread color and stitch type, including a stitch pattern created by Programmable Stitch Creator) for the different components of your Design Page.

When you have finished, you can save your work on your hard disk, print it, and transfer it to a card. The card can be inserted in your sewing machine to automatically embroider your creation.

The Screen



Menu bar	Gives access to the functions.
Toolbar	Shortcut for the menu functions.
Sewing attribute bar	Sets the sewing attributes (color, stitch) of the patterns.
Tool box	Used to select and create patterns.
Status bar	Provides short information.
Design Page	The actual part of the work area that can be saved and sewn.

Using the Tool Box

Patterns are created and edited using the Tool Box and the Sewing Attributes bar.

Clicking a button of the Tool Box changes the cursor mode and shape. The left side of the Status bar tells you what you can do in each cursor mode.

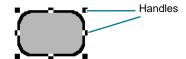
K	Sets the cursor in selection mode. When you start the application, the selection mode is active by default. Cursor shape:	page 119
<u> </u>	Sets the cursor in point edit mode. Cursor shape:	page 122
Q	Sets the cursor in zoom mode. Cursor shape: or	page 125
\mathbf{A}	Sets the cursor in text input mode. Cursor shape:	page 127
P	Sets the cursor in circle and arc drawing mode. Cursor shape: with a miniature of the tool button	page 128
	Sets the cursor in rectangle drawing mode. Cursor shape: with a miniature of the tool button	page 131
A	Sets the cursor in line drawing mode. Cursor shape: with a miniature of the tool button	page 131
B	Sets the cursor in curve drawing mode. Cursor shape: with a miniature of the tool button	page 132
0	Sets the cursor in manual punching mode. Cursor shape: with a miniature of the tool button	page 133

Selection Mode

To apply settings to an existing pattern, you must first select it. The cursor selection mode is used to select one or more patterns. Once a pattern is selected, you can move it, scale it, and change its direction by rotating it or inverting it.

Selecting patterns

- ① Click on the Tool Box. The shape of the cursor changes to
- 2 Click the pattern that you want to select.
 You know that the object is selected when handles are displayed.



The Status bar shows the dimensions (width and height) of the selection.

- 3 To deselect the pattern, select another one, click on the white space or click another tool button of the Tool Box.
- To select an additional pattern, click that pattern while holding the Shift key down. Note that you can also select patterns by dragging the cursor across the Design Page. As you drag, a dotted rectangle appears. When you release the mouse button, all patterns that overlap that rectangle will be selected.

If you select other patterns than you wanted to, click on the white space to deselect all, and start again.

Selecting patterns 2

With sis selected, press the Tab key to select the next object in the sewing order. Hold down the Shift key and press the Tab key to select the previous object in the sewing order.

If the $\begin{tabular}{ll} \textbf{Tab} \end{tab}$ key (or the $\begin{tabular}{ll} \textbf{Shift} \end{tab}$ and $\begin{tabular}{ll} \textbf{Tab} \end{tab}$ keys) are pressed:

- and no object is selected, the first object (or the last object) in the sewing order becomes selected.
- and multiple objects are selected, all objects become deselected except the soonest (or latest) object within the sewing order.
- and the last (or first) object in the sewing order is selected, the first (or last) object in the sewing order becomes selected.

Moving patterns

1 Move the cursor over a selected pattern or group of selected patterns.

The shape of the cursor will change to

2 You can now drag the pattern to another location.

Holding down the **Shift** key while dragging the pattern moves the pattern horizontally or vertically.

NOTE:

By pressing the arrow keys, the selected pattern can be moved 0.5 mm (about 0.02 inch) to the left, right, up or down.

 If Snap to Grid is selected, each press of an arrow key moves the pattern 1 grid mark in the specified direction. The arrow keys cannot be used to move text on a path if just the text is selected. The path must also be selected in order to move using the arrow keys.

Scaling patterns

Move the cursor over one of the handles of a selected pattern or group of selected patterns.

cursor is on.

- 2 Drag the handle in the direction of the arrow to scale the pattern.
 - is for scaling the width.
 - is for scaling the height.
 - and are for scaling both dimensions at the same time.

As you drag the handle, you can check the changing size on the Status bar.

Note that some patterns imported from cards cannot be scaled.

When you scale imported patterns, the number of stitches remain the same, resulting in a quality loss. To maintain the quality of the embroidery, you need to adjust the number of stitches after scaling the pattern. This can be done in the Stitch to Block Sensitivity dialog, which you open by selecting the Sew - Stitch to Block command. For more information on how to select this function, see "Stitch to Block" on page 185.

Flipping a pattern horizontally or vertically

Select the data that you wish to flip horizontally or vertically. The buttons below become active.



2 To flip horizontally, select the command Edit – Mirror – Horizontal or click 📳 on the Toolbar.

To flip vertically, select the command Edit – Mirror – Vertical or click Rs on the Toolbar.

NOTE:

Images imported from embroidery cards cannot be flipped if they were designed with the mirror function turned off.

Layout & Editing

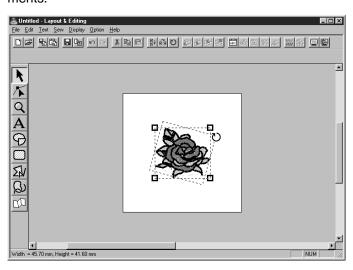
Rotating a pattern

1 Select the data that you wish to rotate. The button below becomes active.



- 2 Select the menu command Edit Rotate or click on the Toolbar. The handles around the selected pattern are replaced by smaller boxes on the four corners of the selected area.
- 3 To rotate the pattern, move the cursor on one of the four rotation handles.

The shape of the cursor changes to as soon as your cursor touches a rotation handle. Click on a rotation handle and a lined box appears around the selected the pattern. Rotate the pattern clockwise or counterclockwise by dragging the mouse. A simple dragging of the mouse will rotate the pattern by 1° increments. Pressing the **Shift** key will rotate it by 15° increments.



Point Edit Mode

The point edit mode is used to:

- move a point of a broken line, a curve, an arc, fan shape and arc & string or of a manual punching pat-
- reorient the tangent to a point of a curve;
- insert a new point in a broken line, curve or manual punching pattern;
- delete a point in a broken line, curve or manual punching pattern;
- realign the part of a broken line or a curve on both sides of a point;
- select and set a character in a text pattern.

Moving points

① Click / on the Tool Box.

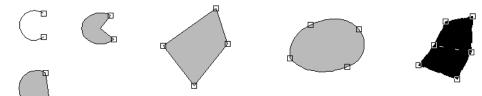
Two buttons appear:



- 2 Click . The shape of the cursor changes to . .
- 3 Click the pattern that you want to edit.

The pattern can be a broken line, a curve, an arc, a fan shape, an arc & string or a manual punching pattern.

The existing points of the pattern are marked with small empty squares



4 Click the point that you want to move.

The selected point is marked with a small black square.

You can select more than one point by clicking them while holding the (Shift) key down, or by dragging the mouse across the area.

NOTE:

If you click on the line of the pattern instead of a square, a new point is inserted.

5 Drag the point to a new position.

All the selected points move in the same direction if more than one is selected.

The point remains selected, so that you can drag it again.

Layout & Editing



Note that you must drag a point that is selected. If you start dragging by clicking elsewhere on the outline, a new point will be inserted or the selected point(s) will be deselected.

Holding down the (Shift) key while dragging the point moves the point horizontally or vertically.

NOTE:

By pressing the arrow keys, the selected point can be moved 0.5 mm (about 0.02 inch) to the left, right, up or down.

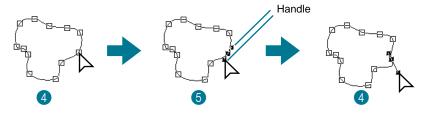
- If Snap to Grid is selected, each press of an arrow key moves the point 1 grid mark in the specified direction.
- The arrow keys cannot be used to move the endpoints of an arc or text on a path if just the text is selected.

Reorienting a tangent to a point

1 Click on the Tool Box.

Two buttons appear:

- 3 Click the pattern that you want to edit.
 The pattern can only be a curve.
 The existing points of the pattern are marked with small empty squares.
- 4 Click the point at which you want to reorient the tangent to the curve. The selected point is marked with a small black square and a control handle.
- 6 Click on one end of the handle and drag it without releasing the mouse.



Inserting points

1 Click on the Tool Box.

Two buttons appear:

2 Click \nearrow . The shape of the cursor changes to \nearrow .

3 Click the pattern that you want to edit.

The pattern can be a broken line, a curve or a manual punching pattern.

The existing points of the pattern are marked with small empty squares.

4 Click at a point of the contour other than an existing point.

A new point appears and is automatically selected (marked with a small black square and in the case of a curve, with a control handle).

When a manual punching pattern is selected, a pair of new points is inserted.

The new point can be immediately moved. In the case of a new point on a curve, you can also use the handle to reorient the tangent to the new point.



Deleting points

Click on the Tool Box.

Two buttons appear:

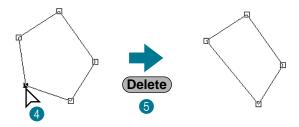


- 2 Click \(\) . The shape of the cursor changes to \(\) .
- 3 Click the pattern that you want to edit. The pattern can be a broken line, a curve or a manual punching pattern. The existing points of the pattern are marked with small empty squares.
- 4 Click the point that you want to delete.

The selected point is now marked with a small black square.

You can select more than one point by clicking them while holding the (Shift) key down, or by dragging the mouse across the area.

5 Press the **Delete** key to remove the point from the path. When a manual punching pattern is selected, a pair of points is deleted.



Realigning

① Click / on the Tool Box.

Two buttons appear:

Quik Reference

2 Click . The shape of the cursor changes to \(\sum \) and displays together with a small image of the Tool Box button.

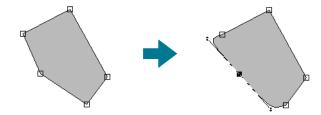
3 Click the pattern that you want to edit.

The pattern can be a broken line or a curve.

The existing points of the pattern are marked with small empty squares.

4 Click the point that you want to realign.

If the point was on a curved part, it is now on a broken line and vice versa.



NOTE:

When the point is on a curved part, you can use the handle to reorient the tangent (see "Reorienting a tangent to a point" on page 123).

Selecting characters on a text pattern

1 Click on the Tool Box.

Two buttons appear:

Two buttons appear:

- 3 Click the text pattern that you want to edit.
 The existing points of the text are marked with small empty squares.
- 4 Click the square of the character that you want to select.

If you want to select more than one character, hold the **Shift** key while clicking other squares or drag the cursor across.

The selected characters are marked with black squares.

6 When some characters of a text pattern are selected, you can apply a font, size, color, stitch and other attributes different from the rest of the text pattern.



Zoom Mode

The zoom mode is used to control the scale of the display. You can zoom in to work on details of a pattern with higher precision and you can zoom out again to see and work on parts of your Design Page that is hidden.

Zooming in

1 Click Q

Five buttons appear: \bigcirc \bigcirc \bigcirc 1:1 \bigcirc

2 Click €

The shape of the cursor changes to \bigoplus .

3 Drag the cursor across the area that you want to enlarge.

The area is enlarged as soon as you release the mouse. You can repeat the entire operation.

Zooming out

1 Click Q.

Five buttons appear: QQ 1:1 🖳 Q.

2 Click Q.

The shape of the cursor changes to \bigcirc .

3 Click a point of the Design Page where you want to do the next work. The image shrinks toward that point.
You can repeat this step until the image has returned to its normal size.

Zooming to the real size

1 Click Q.

Five buttons appear: (Q Q 1:1 🔆 Q

2 Click 1:1.

Your Design Page now appears in (almost) real size.

■ Enlarging selected objects to the screen size

1 Select one or more patterns.

2 Click Q.

Five buttons appear: QQ1:1 🖳

3 Click .

The selected objects now occupy all the available space on the screen.

Return to the standard scale

1 Click Q.

Five buttons appear: QQ1:1 🖳 Q.

File Utility



The Design Page is zoomed in or out to return to the standard scale.

Text Input Mode

The text input mode is used to enter strings of text in your Design Page. You can enter accented characters for European languages, that are not directly available on your keyboard.

The basic settings for the text strings include font and size.

Entering text

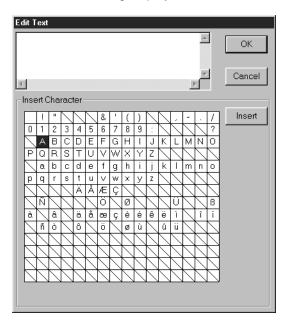
1 Click A on the Tool Box.

The shape of the cursor changes to χ and this appears on the Sewing Attributes bar:



You can select a color, a font and a size at this step or after creating the pattern. See "Color" on page 143, "Font" on page 137 and "Text size" on page 139. You can also set the sewing attributes using the **Sew** menu (see "Sewing Attribute Setting" on page 177) and the text attributes using the **Text** menu (see "Text Attribute Setting" on page 171).

2 Click at a point where you want the text to appear. The Edit Text dialog displays.

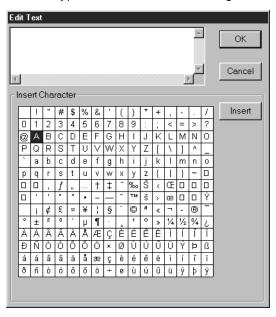


- ◆ Type your text. Press the **Enter** key to enter new lines of text.
- You can also enter a character by clicking it on the character table, then clicking Insert or simply by double-clicking it. This is specially useful if you have to enter accented characters that are not available on your keyboard.
- ◆ Click **OK** to confirm. Your text opens on the Design Page.
- ◆ Click Cancel to exit.
- If a character that you entered is not available for the selected font, a warning message displays. Click OK in that dialog to close it and to return to the Edit Text dialog where you can correct your text.

Getting Started

(If a TrueType Font is selected)

If a TrueType Font is selected, a dialog similar to the one shown below will appear.



Based on the set attributes, all characters for the selected font appear in the **Insert Character** chart. Enter characters in the same way that you would enter characters with a built-in font (as explained above).

NOTE:

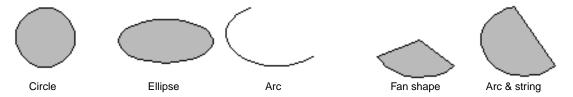
Some TrueType fonts may not convert well into beautiful embroidery data due to their design and shape.

NOTE:

If you need to edit the entered text, you can do so in the Edit Text dialog which opens when you execute the Text – Edit Text Letters command. See "Edit Text Letters" on page 170.

Circle and Arc Drawing Mode

The circle or arc drawing mode allows you to create several patterns related to the circle: normal circles (or ellipses), arcs, fan shapes and arc & strings.

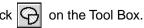


All these patterns, except arcs have an outline and a region inside can independently be assigned different sewing attributes. Arcs are simple outlines.

Note that you have to decide which pattern type you want to draw before drawing it. You cannot, for example, draw a normal circle and change it into an arc afterwards.

Drawing a circle or an ellipse

1 Click



- and displays together with a small ellipse. The Sewing The shape of the cursor changes to -Attributes bar now looks like this:



You can select the colors and stitches at this step or after creating the pattern. See "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the Sew menu (see "Sewing Attribute Setting" on page 177).

You must decide now which kind of circle-related graphic you need.

- 2 Click the Arc shape selector, then click Circle.
- Move the mouse to a point, click and drag the mouse.

The point where you start dragging is considered a corner of an imaginary rectangle. The point where you release the mouse will be the diagonally opposed point of the rectangle. The ellipse will fit inside the imaginary rectangle (its great axis equal to the larger edge of the rectangle, and it small axis equal to the smaller edge).

Note that you can draw a perfect circle by holding the (Shift) key down while dragging the mouse.

Drawing an arc

1 Click 3 on the Tool Box.

The shape of the cursor changes to + and displays together with a small ellipse. The Sewing Attributes bar now looks like this:

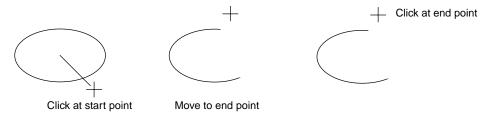


You can select the colors and stitches at this step or after creating the pattern. See "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the **Sew** menu (see "Sewing Attribute Setting" on

You must decide now which kind of circle-related graphic you need.

- 2 Click the Arc shape selector, then click Arc.
- 3 Proceed as you would to draw a circle or an ellipse. When you release the mouse, a radial line appears on the ellipse.
- 4 Move the cursor (without dragging) to the start point of the arc and click. The radial line disappears.
- Move the cursor (without dragging) to the end point of the arc and click.



Drawing a fan shape

1 Click on the Tool Box.

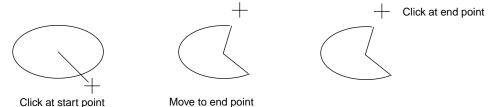
The shape of the cursor changes to —— and displays together with a small ellipse. The Sewing Attributes bar now looks like this:



You can select the colors and stitches at this step or after creating the pattern. See "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the **Sew** menu (see "Sewing Attribute Setting" on page 177). You must decide now which kind of circle-related graphic you need.

- 2 Click the Arc shape selector, then click Fan shape.
- 3 Proceed as you would to draw a circle or an ellipse. When you release the mouse, a radial line appears on the ellipse.
- Move the cursor (without dragging) to the start point of the fan shape and click. The radial line disappears.
- **5** Move the cursor (without dragging) to the end point of the fan shape and click.



Drawing an arc & string

1 Click on the Tool Box.

The shape of the cursor changes to — and displays together with a small ellipse. The Sewing Attributes bar now looks like this:

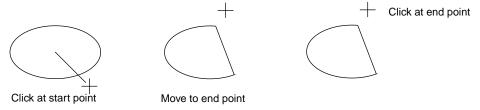


You can select the colors and stitches at this step or after creating the pattern. See "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the **Sew** menu (see "Sewing Attribute Setting" on page 177).

You must decide now which kind of circle-related graphic you need.

- 2 Click the Arc shape selector, then click Arc & String.
- 3 Proceed as you would to draw a circle or an ellipse. When you release the mouse, a radial line appears on the ellipse.
- 4 Move the cursor (without dragging) to the start point of the arc & string and click. The radial line disappears.
- 6 Move the cursor (without dragging) to the end point of the arc & string and click.



Rectangle Drawing Mode

With the rectangle drawing mode, you can create rectangles (boxes) with sharp or rounded corners. A box will automatically have an outline and a region inside that can independently be assigned different sewing attributes.

Drawing a box

1 Click on the Tool Box.

> The shape of the cursor changes to + and displays together with a small rounded box. The Sewing Attributes bar now looks like this:



You can set the edge radius, colors and stitches at this step or after creating the pattern. See "Edge radius" on page 136, "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the Sew menu (see "Sewing Attribute Setting" on page 177).

2 Move the mouse to a point, click and drag the mouse.

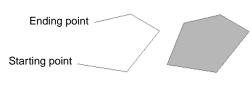
The point where you start dragging is considered a corner of the box. The point where you release the mouse will be the diagonally opposed corner of the box.

Note that you can draw a perfect square by holding the (Shift) key down while dragging the mouse.

Line Drawing Mode

The line drawing mode allows you to add broken lines to your pattern. A broken line is made of one or more contiguous straight lines, the ending point of a straight line being the starting point of the next one. If the broken line is open, the pattern will end at the last end point. An open broken line is considered a simple outline when setting the stitch and color.

If the broken line is closed, the last point will be automatically joined with the first one to form a polygon. A polygon has an outline and a region inside that can be assigned different stitches and colors. However, if two pieces of straight lines cross each other, the application cannot determine a region inside, and the pattern will be a simple outline.



Open broken line Closed broken line



This closed broken line has no region inside

Drawing a broken line

Click on the Tool Box.

The shape of the cursor changes to $\frac{1}{2}$ and displays together with a small broken line. The Sewing Attributes bar now looks like this:



You can select the path shape, colors and stitches at this step or after creating the pattern. See "Path shape" on page 137, "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the **Sew** menu (see "Sewing Attribute Setting" on page 177).

2 Draw the broken line.

Move the mouse to the start point and click.

Move the mouse to the end point of the first straight line and click again.

NOTE:

You can always remove the last-entered point by clicking the mouse's right button.

If needed, use the grid to help you draw the lines. You can set the grid so that each of its vertical and horizontal lines are visible. For more information on the grid, refer to "Grid Setup" on page 189.

If you hold the **Shift** key down while moving the mouse, only vertical or horizontal lines will be drawn.

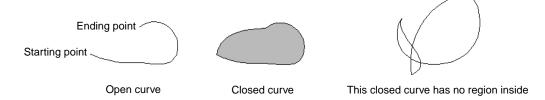
3 Repeat until you arrive at the last end point. At that point double-click.

Curve Drawing Mode

With the curve drawing mode, you can create curved lines. You create curved lines the same way as you create a broken line. Like a broken line, a curved line can be open or closed.

If the line is open, the pattern will end at the last end point. An open line is considered a simple outline when setting the stitch and color.

If the line is closed, the last point will be automatically joined with the first one to form a smooth contour. The contour has an outline and a region inside that can be assigned different stitches and colors. However, if the curved line crosses itself, the application cannot determine a region inside, and the pattern will be a simple outline.



Drawing a curve

1 Click on the Tool Box.

The shape of the cursor changes to $\frac{1}{2}$ and displays together with a small curved line. The Sewing Attributes bar now looks like this:



You can select the path shape, colors and stitches at this step or after creating the pattern. See "Path shape" on page 137, "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the **Sew** menu (see "Sewing Attribute Setting" on page 177).

2 Draw the curved line.

Move the mouse to the starting point and click.

Move the mouse to the ending point of the first line and click again.

NOTE:

You can always remove the last-entered point by clicking the mouse's right button.

3 Repeat until you arrive at the last end point. At that point double-click.

Manual Punching Mode

This mode is used to create patterns that look like manual embroidery. When you use the standard Fill or Satin stitch to fill a region, the thread in the whole region has the same direction. Some patterns, however, look better when the thread direction "follows" the curves of the pattern. The Manual Punching mode provides such a feature.

Letters that you design yourself constitute a typical example of patterns that look better when using the Manual Punching mode. The illustrations below show the preview of two letters "O".

The first one has been designed using two concentric ovals without a line sew setting, filling the larger oval with Fill stitch and turning off the region sew setting inside the small oval. The pair was then set for hole sewing.

The second letter has been redrawn using Manual Punching. To do this, we duplicated the first letter, removed the region inside, and created a manual punching pattern using the outlines of the ovals as guides. The ovals were then deleted.

The stitch density for both letters was set to a minimum in order to make it easier to see the difference between the two patterns on the preview display.



Fill stitch (the thread has a constant direction)



Manual Punching (the direction of the thread follows the curve)

When creating a manual punching pattern, it is easier to use something in the background as a guide. In the above example, we used two ovals that we removed after completing the manual punching pattern. Another possibility is to load a template image and redraw it using manual punching patterns. The advantage of this method over the automatic conversion provided by Design Center is that you have a better control on the thread orientation.

Creating a manual punching pattern

- 1 Open a template or prepare a pattern that you will use as a guide.
- 2 Click on the Tool Box.

Three buttons appear: \(\omega \cdot \cdot \).

is for creating block-type punching patterns.

is for creating running-type punching patterns (the broken line is sewn).

is for creating feed-type punching patterns (the broken line is not sewn).

Quik Reference

While creating a manual punching pattern, you can alternate the types. For example, you can start with a block-type pattern, then switch to a running-type pattern (to draw an outline of the block-type pattern) then switch to the feed type to move to the beginning of the next block-type pattern. The whole pattern, consisting of different types, will be considered a single object (all parts will have the same stitch and color).

In the example below, we start with a block-type pattern, use the feed type to move the cursor, then create a run-type pattern.

3 Click to start creating a block-type pattern.

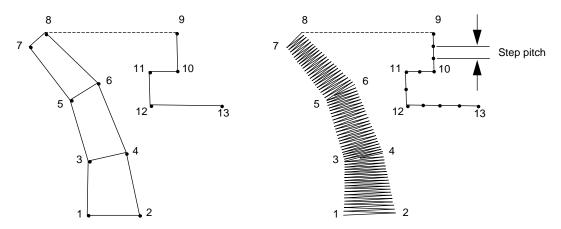
The shape of the cursor changes to —— and displays together with a small image of the block-type button. The Sewing Attributes bar now looks like this:



You can select the color and stitch at this step or after creating the pattern. See "Color" on page 143 and "Stitch" on page 145.

You can also set the sewing attributes using the **Sew** menu (see "Sewing Attribute Setting" on page 177).

4 Click point 1 on the Design Page (start point). Click point 2 and next points referring to the illustration below.



Note that you can always click the mouse's right button to remove the last entered point.

- 6 After clicking at point 8 (the last point of the above block-type pattern), click (feed-type pattern button), then click at point 9 (the start point of the running-type pattern).
- 6 Click (running-type pattern button) and click at points 10, 11, and 12 shown in the above illustration.
- When you reach point 13, (the last point of the entire pattern), double click to complete the pattern.

Using the Sewing Attributes Bar

The Sewing Attributes bar allows you to set the following characteristics:

- geometrical attributes (arc shape, rectangle edge radius, and path shape);
- text attributes (font, size and transformation level);
- embroidery attributes (thread color and stitch, outline and region inside on/off).

The sewing attributes which are available depend on the cursor mode and the type of embroidery pattern selected.

Example 1: The cursor is in selection mode, but nothing is selected.



Example 2: The cursor is in text input mode, or in selection mode with text selected.



When the cursor is left for a while on an element of the Sewing Attributes bar, a label indicating the function of that element appears. In the following instructions, we will name the components of the Sewing Attributes bar according to these labels, for easier identification.



As a general rule, the different characteristics available for a given pattern can be set either just before creating the pattern, or after the pattern is created. For example, when drawing a rectangle, you can set the colors and the corner radius just after starting the Rectangle Drawing mode. When the rectangle is created, you can select it and change its characteristics.

The only exception to that rule is when you use the Circle and Arc Drawing mode: you must decide what kind of pattern you want (circle, arc, etc.) before actually creating it. And you will not be able to change that once the pattern is created.

Geometrical attributes

Circle	Arc shape: Selects the type of arc.	page 136
0.0 v mm	Edge radius: Sets the corners of rectangles.	page 136
Close path ▼	Path shape: Opens and closes broken lines and curves.	page 137

Text attributes

01 ABC Aaggras -	Font: Selects a font for text.	page 137
10.0 v mm	Text Size: Selects the size for text.	page 139
50 🔻 %	Transform level: Selects the level of transformation.	page 140

Embroidery attributes

N	Line sew: Switches the outline on/off. When the outline is switched off, it is not sewn (and you cannot set its color or stitch).	page 141
(AW)	Region sew: Switches the inside region on/off. When the inside region is switched off, it is not sewn (and you cannot set its color or stitch).	page 142
	Line color, Region color, Text color, Punch color: Sets the thread color for outline, region inside, text, manual punching pattern and imported pattern (after the Stitch to Block function has been applied).	page 143
Running Stitch Fill Stitch	Line sew type: Sets the stitch for the outlines. Region sew type: Sets the stitch for outline, region inside, text, manual punching pattern and imported pattern (after the Stitch to Block function has been applied).	page 145

Setting Geometrical Attributes

Arc shape Circle

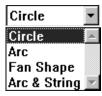
Purpose: Selects the type of arc.

Available: When you click on the Tool Box to start the Circle and Arc Drawing mode.

Operation:

1 Click the Arc shape selector.

The options display.



2 Click one of the options.

The setting applies to all the patterns that you will create in the Circle and Arc Drawing mode until you change the setting.

See also: "Circle and Arc Drawing Mode" on page 128

■ Edge radius 0.0 🔽 mm

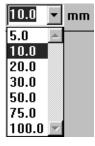
Purpose: Sets the corners of rectangles.

Available: When you click on the Tool Box to start the Rectangle Drawing mode.

When you select an existing rectangle with the cursor in Selection mode.

Operation:

1 Type the desired value on the Edge radius selector (0 - 100 mm or 0 - 3,93 inches) and press the **Enter**) key or click on the Edge radius selector to display the available values.



2 Click the desired value.

The setting applies to all the patterns that you will create in the Rectangle Drawing mode until you change the setting.

If a rectangle is selected, the setting also applies to that rectangle.

See also: "Rectangle Drawing Mode" on page 131

■ Path shape Close path ▼

Purpose: Opens and closes broken lines and curves.

Available: or on the Tool Box to start the Line or Curve Drawing When you click | XV

mode.

When you select an existing broken line or curve with the cursor in Selection

mode.

Operation:

Click on the Path shape selector. Two options are available.

Close path 🕶

Open path Close path 🔽

2 Click the desired option.

The setting applies to all the patterns that you will create in the Line or Curve Drawing mode until you change the setting.

If a broken line or curve is selected, the setting applies to that broken line or curve.

See also: "Line Drawing Mode" on page 131, "Curve Drawing Mode" on page 132

Setting Text Attributes

Font 01 ABC ADDRESS V

Purpose: Selects a font for text.

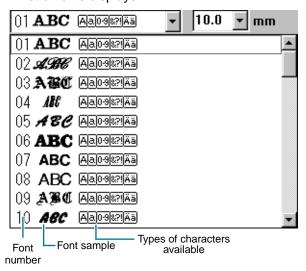
Available: When you click | A | on the Tool Box to start the Text Input mode.

When you select existing text patterns with the cursor in Selection mode.

When you select characters with the cursor in Point Edit mode.

Operation:

1 Click on the Font selector. A list of fonts displays.



2 Click the desired font.

The setting applies to all the text patterns that you will create in the Text Input mode until you change the setting.

If text patterns or characters of a text pattern are selected, the setting also applies to the selection. The following illustration shows the fonts available and, for each font, the kind of characters available:

A 1 8 33 40			
01 ABC	A a 09 82! Ää]	25 %.BC 🛭
02 AGK	Aa0982!Ää	14 ASS C Alabase	26 a.366
03 A WC	Aa098?!Ää	15 A36 Aa09829	27° ABC 🕒
04 /80	Aa098?!Ää	16 ABC Alaloguesi	28 ABC A
05 48C	Aa0982!Ää	17 <i>ABC</i> Aaoasa	29 <u>AJB</u> C A 09
06 ABC	Aa0982!Ää	18 .84.286 A	30 ABC ABOGENĂĂ
07 ABC	Aa0982!Ää	19 436 A	31 ABC ABOSENÄÄ
08 ABC	Aa0982!Ää	20 ABC Alalogues	32 ABC Aagemää
09 ABC	Aa0982!Ää	21 ab 6 A	33 ABGABO987Ää
10 <i>ABC</i>	Aa0982!Ää	22 %36 Aa	34 ABC Aageriää
11 ABC	Aa0982!	23 .A.B.C. 🗎	35 <i>A B C</i> Aageriää
12 ABC	Aa0-982!	24 &# A</td><td></td></tr></tbody></table>	

Upper case letters of the English alphabet

82!

Upper case and lower case accented letters

Lower case letters of the English alphabet

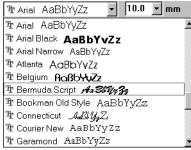
Ää

Punctuation, brackets and other symbols

0-9

Numerals

In addition, the names and samples of installed TrueType fonts appear after the fonts listed in the table above. The Arial AaBbYyZz \blacksquare 10.0 \blacksquare mm



If one of these TrueType fonts are selected, the font data is automatically converted to embroidery data. Font settings can be changed in the **TrueType Font Attribute Setting** dialog, which is displayed by clicking **Text** - **TrueType Font Attribute Setting**.

NOTE:

Some TrueType fonts may not convert well into beautiful embroidery data due to their design and shape.

See also: "Text Input Mode" on page 127, "Point Edit Mode" on page 122, "TrueType Font

Attribute Setting" on page 175

Text size 10.0 mm

Purpose: Selects the size for text.

Available: When you click |A| on the Tool Box to start the Text Input mode.

When you select existing text patterns with the cursor in Selection mode.

When you select characters with the cursor in Point Edit mode.

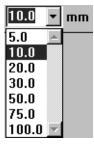
Operation:

1 Type the desired value in the Text size selector (5 - 100 mm or 0.20 - 3.93 inches) and press the

Enter key

or

click on the Text size selector to display the available values.



2 Click the desired value.

The setting applies to all the text patterns that you will create in the Text Input mode until you change the setting.

If a text pattern or characters of a text pattern are selected, the setting also applies to the selection.

See also: "Text Input Mode" on page 127, "Point Edit Mode" on page 122

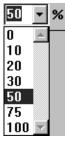
■ Transform level 🗓 🗸 %

Purpose: Selects the level of transformation.

Available: When you select an existing transformed text with the cursor in Selection mode.

Operation:

1 Type the desired value in the Transform level selector (0 - 100%) and press the Enter key or click on the Transform level selector to display the available values.



2 Click the desired value.

The setting applies to all the transformed text patterns that you will create in the Text Input mode until you change the setting.

If a text pattern is selected, the setting also applies to the selection.



See also: "Text Input Mode" on page 127 and "Transform Text" on page 174

Setting the Thread Color and Stitch

All patterns can be assigned at least one color. Patterns with an outline and a region inside can be assigned two different thread colors. Characters in a text pattern can be assigned individual thread colors.

All patterns can be assigned at least one stitch type. Patterns with an outline and a region inside can be assigned two different stitch types.

Patterns with an outline and a region inside are: Text converted from True Type Font, Circle, Fan Shape, Arc & String, Rectangle, Closed Broken Line, and Closed Curve. For these patterns, it is possible to switch the outline and the regions on and off.

Patterns with only an outline are: Arc, Open Broken Line, and Open Curve. For these patterns, it is still possible to switch the outline on and off.

Patterns with only a region are: Text included this software, manual punch patterns and converted imported patterns (to which the Stitch to block function has been applied). For those three types of patterns, it is not possible to switch the region inside on and off.

Manual punch patterns: You can set a color to all three manual punch pattern types (block, running and feed), but you can only set a stitch sew type to the block patterns.

Imported patterns converted with the Stitch to Block function: You can modify globally the sewing attributes of the blocks of the same color.

■ Line sew \(\bar{\pi} \)

Switches the outline on/off. Purpose:

When the outline is switched off, it is not sewn (and you cannot set its color or

stitch).

Available: When the cursor is in Selection mode with nothing selected.

> When you select a pattern that has an outline (Text converted from True Type Font, Circle, Arc, Fan Shape, Arc & String, Rectangle, Broken Line, Curve)

on the Tool Box to start drawing When you click

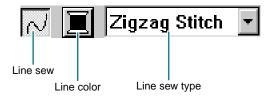
such a pattern.

Operation:

Click the Line sew button.

This button has two states:

on: the Line color button and the Line sew type selector are displayed off: the Line color button and the Line sew type selector are not displayed. Clicking the button toggles between the two states.

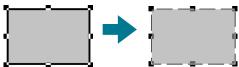


The setting applies to all the patterns with an outline that you will create until you change the setting.

File Utility

If a pattern is selected, the setting applies to that pattern.

Line sew off:



2 To restore the outline click the Line sew button again.

NOTE:

If the fonts included in this software (font number 1-35) are selected, the Line sew setting can not be made.

See also: "Color" on page 143 and "Stitch" on page 145

Region sew 🏻

Purpose: Switches the inside region on/off.

When the inside region is switched off, it is not sewn (and you cannot set its color

or stitch).

Available: When the cursor is in Selection mode with nothing selected.

When you select a pattern that has an inside region (Text converted from True Type Font, Circle, Fan Shape, Arc & String, Rectangle, closed Broken Line and

Curve)

When you click $|\mathbf{A}|$, $|\mathbf{G}|$, $|\mathbf{M}|$, $|\mathbf{M}|$ on the Tool Box to start drawing

such a pattern.

Operation:

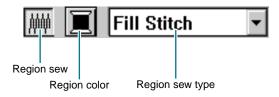
① Click the Region sew button.

This button has two states:

on: the Region color button and the Region sew type selector are displayed

off: the Region color button and the Region sew type selector are not displayed.

Clicking the button toggles between the two states.



The setting applies to all the patterns with an inside region that you will create until you change the setting.

If a pattern is selected, the setting applies to that pattern.



2 To restore the inside region click the Region sew button again.

See also: "Color" on page 143 and "Stitch" on page 145

Color 🔳

Purpose: Sets the thread color for outline, region inside, text, manual punching pattern and

imported pattern (after the Stitch to Block function has been applied).

Available: When the cursor is in Selection mode with nothing selected, the Line color and

Region color buttons are displayed (if they have not been turned off with the Line

sew or Region sew buttons).

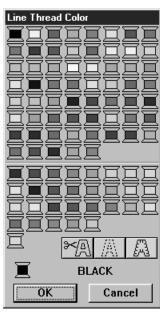
When you start one of the drawing modes or Text Input mode, or select an existing

pattern, the Color button for the corresponding pattern appears.

Operation:

Click the color button.

In Region setting mode, the **RegionThread Color** dialog displays and in Line setting mode, the **Line Thread Color** dialog displays. The same color settings are available in both dialogs.



- Click the desired color.
- The last spool and the three blocks with "A" in each block have a special function. See "Special colors" on page 144
- For a list of the different color names, see page 230.
- Click OK to confirm.
- Click Cancel to exit.

The setting applies to all the patterns of the same categories that you will create until you change it. The color button of each category shows the current color for that category. If a pattern is selected, the setting also applies to that pattern.

NOTE:

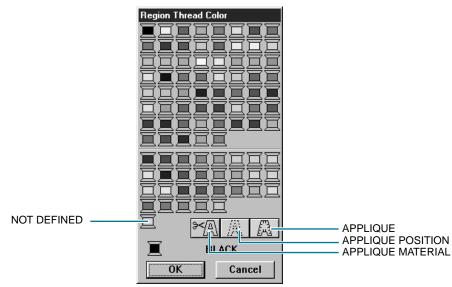
The colors in the top half of the dialog are Base-Color. On sewing machines that can display color names, the selected color name will be displayed as shown in the dialog. (In the dialogs and other displays in this application, the color name is displayed in uppercase letters.)

The colors in the bottom half of the dialog are Option-Color. On sewing machines that can display color names, the name of the closest Base-Color will be displayed. (In the dialogs and other displays in this application, the color name is displayed in lowercase letters with a number; for example, "blue2." In this case, "BLUE" will be displayed on the sewing machine.)

You can change the order of the thread color display by selecting Option-Select Color Arrangement from the menu. In this case, Base-Color and Option-Color are mixed together, so use the uppercase/lowercase color name display to distinguish between them.

See also: "Line sew" on page 141 and "Region sew" on page 142

Special colors



- ♦ NOT DEFINED: Sewing machines that feature automatic thread color display will automatically switch the display to the specified color. If you are using such a machine and if you wish to be able to select manually the color for a monochrome pattern, you can select the "NOT DEFINED" color.
- ◆ Colors for creating appliqués: You can create appliqués using the three special colors shown in the above illustration.

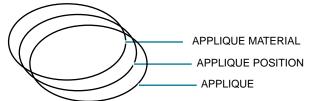
APPLIQUE MATERIAL marks the outline of the region to cut from the appliqué material.

APPLIQUE POSITION marks the position on the backing material where the appliqué must be sewn. **APPLIQUE** sews the appliqué on the backing material.

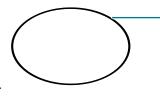
Example:

- 1 Create an oval.
- 2 Duplicate the oval and move it apart from the first one. Repeat this step to obtain a total of three identical ovals.
- 3 Select the ovals one by one and make the following settings:

Oval	Sewing Attributes bar			Sewing Attributes	
Ovai	Region sew button	Line color	Line sew type	Sewing Attributes	
1	OFF	APPLIQUE MATERIAL	Running	RUN TIME = 1	
2	OFF	APPLIQUE POSITION	Running	RUN TIME = 1	
3	OFF	APPLIQUE	Zigzag	_	



A Bring the APPLIQUE POSITION oval and the APPLIQUE oval at the same position as the APPLIQUE MATERIAL oval (using the grid can make this operation easier). You can confirm the appliqué position using the preview function (see "Preview" on page 190).



APPLIQUE MATERIAL / APPLIQUE POSITION / APPLIQUE

5 Add details as you would with a normal embroidery picture.



When sewing, proceed as follows:

- 1 Place the appliqué material on the machine and start sewing. At this step, only the APPLIQUE MATERIAL outline will be sewn.
- 2 Remove the appliqué material from the machine and cut along the outline.
- 3 Place the backing material on the machine and start sewing. At this step, only the APPLIQUE POSI-TION outline will be sewn.
- 4 Affix the appliqué on the marked position with a small amount of fabric glue.
- **5** Restart sewing. At this step, the APPLIQUE outline will be sewn.
- 6 Sew the other details of the picture. Note that the sewing order will be MATERIAL → POSITION → APPLIQUE.

Stitch Running Stitch Fill Stitch

Purpose: Sets the stitch for outline, region inside, text, manual punching pattern and

imported pattern (after the Stitch to Block function has been applied).

Available: When the cursor is in the selection mode, the Line sew type and Region sew type

selectors are displayed (if they have not been turned off with the Line sew or

Region sew buttons).

When you start one of the drawing modes or select an existing pattern, the sew

type button for that pattern appears.

When you are in the text or manual punching mode or after applying a Stitch to

block setting to an imported pattern.

Operation:

Click the sew type selector.
 The available options display.





For outlines, Zigzag, Running and Motif stitches are available.

For regions, Satin, Fill, Programmable Fill and Motif stitches are available.

2 Click the desired stitch.

The setting applies to all the patterns of the same categories that you will create until you change it. If a pattern is selected, the setting also applies to that pattern.

NOTE:

You can set the stitch attributes for the selected line and region stitches in the Sewing attribute Setting dialog.

When you select Prog. fill Stitch or Motif Stitch, you also need to select a pattern in the Sewing Attribute Setting dialog, as there is no default programmable stitch setting.

See also: "Line sew" on page 141, "Region sew" on page 142 and "Sewing Attribute Setting"

on page 177

Layout & Editing

Quik Reference

Using the Menu Bar and the Toolbar

File	Handles file input/output, such as opening, saving and printing.	page 147
Edit	Performs simple actions on selected patterns, such as cutting and pasting.	page 160
Text	Performs actions on text patterns, such as fitting text to a curved path.	page 170
Sew	Defines how each pattern will be sewn.	page 177
Display	Modifies the appearance of the screen.	page 189
Option	Provides additional options.	page 193
Help	Gives you access to the on-screen help information system.	page 197

Most functions available on the menu can also be activated by clicking a button on the Toolbar or by pressing a shortcut key or key combination.

When you leave the cursor for a while on a button of the Toolbar, a label indicating the function of the button displays.



File Menu

The File menu handles file input/output, such as opening, saving and printing.

New		Creates a new blank Design Page.	page 147
Open		Opens a previously saved Design Page file (*.pes file).	page 148
Import	from File	Imports embroidery patterns from embroidery cards (*.pec), original cards (*.pes) and files created in the Tajima (*.dst), Melco (*.exp), Pfaff (*.pcs) and Husqvarna (*.hus) formats and adds them to your current Design Page.	page 149
	from Design Center	Imports an embroidery pattern from Design Center.	page 151
Template Open		Opens a background image that can be used as a guide to draw a new embroidery pattern.	page 152
Save		Saves your Design Page on the disk as a Version 4.0 file (default).	page 153
Save As		Saves your Design Page on the disk under a new file name.	page 153
Export		Exports the data shown in the Design Page as a file of a different format (dst, hus, exp, and pcs).	page 154
Write to Card		Writes your Design Page to an original card.	page 154
Property		To enter comments in a saved PES file.	page 155
Print Setup		Allows you to change the printing settings for previewed embroideries.	page 155
Print Preview		Allows you to preview the contents of the Design Page and check the sewing color order, the dimensions and the needle count before printing.	page 157
Print		Prints your Design Page and some sewing information.	page 158
Exit		Exits the application.	page 159

New

Purpose: Creates a new blank Design Page.

Shortcut key: Ctrl + N

Operation:

1 Click File, then New.

If the current Design Page is not edited, a new blank Design Page appears immediately.

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② If the current Design Page is edited, you will be asked whether you want to save the changes.



- ◆ Click **Yes** to save the Design Page first.
- Click No to abandon the Design Page.
- Click Cancel to do anything else (for example, modify the current Design Page or saving it with another file name).

See also: "Open" below and "Save" and "Save As" on page 153

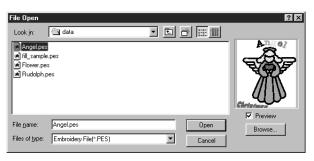
Open

Purpose: Opens a previously saved Design Page file (*.pes file).

Shortcut key: Ctrl + O

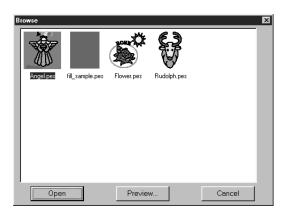
Operation:

Click File, then Open.
A File Open dialog similar to this will display.



- Select the drive, the folder and the file name.
- Be sure to select a folder containing pes files.
- The contents of the selected file displays in the Preview window, provided its check box is checked.
- Click Open or double click the file name. The file will appear on the Design Page.
- You can also select the drive and folder only and then click Browse to display a graphic contents of the currently selected folder (provided it contains *.pes files).
- Click Cancel to exit.

2 If you choose to browse, a Browse dialog similar to this will display:



- ◆ To select a file, click on its icon.
- ◆ To open the file, click Open or doubleclick the icon.
- ◆ To see a more detailed image, click Preview.
- To return to the File Open dialog, click Cancel.
- 3 If you choose to preview, a **Preview** dialog similar to this will display.



- Click Open to open the file.
- Click Cancel to return to the Browse dialog.

When you click Open while viewing the File Open, Browse or Preview dialog, the selected file opens immediately if your current Design Page is not edited.

If the current Design Page is edited, you will be asked whether you want to save the changes.



- ◆ Click **Yes** to save the Design Page first.
- ◆ Click **No** to abandon the Design Page.
- Click Cancel to do anything else (for example, modifying the current Design Page or saving it with another file name).

Note that parts of the embroidery picture which are not within the Design Page cannot be previewed.

See also: "New" on page 147, "Save" on page 153, "Save As" on page 153

Import – from File

Purpose: Imports embroidery patterns from embroidery cards (*.pec), original cards (*.pes)

and files created in the Tajima (*.dst), Melco (*.exp), Pfaff (*.pcs) and Husqvarna

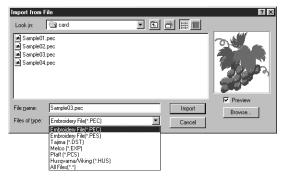
(*.hus) formats and adds them to your current Design Page.

Shortcut key: F8

File Utility

Operation:

Click File, then Import, then from File. An Import from File dialog similar to this displays.



- Select the drive, the folder and the file name.
- Be sure to select the right type of file extension in Files of Type.
- If the Preview check box is checked, the content of the selected file displays in the preview window.
- Click Import or double-click the file name to display the file on the Design Page.
 - You can also select the drive and folder only and then click Browse to display a graphic contents of the currently selected file format.
- ◆ Click Cancel to exit.

Note that *.pec files are files installed from a card. See "Install Embroidery Card" on page 200.

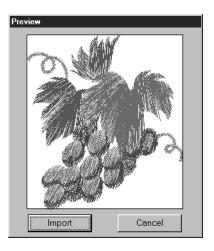
2 If you choose to browse, a Browse dialog similar to this will display:



- ◆ To select a file, click on its icon.
- ◆ To open the file, click **Import** or double-click the icon.
- ◆ To see a more detailed image, click Preview.
- To return to the Import from File dialog, click Cancel.

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3 If you choose to preview, a Preview dialog similar to this will display.



- ◆ Click **Import** to import the file.
- ◆ Click Cancel to return to the Browse dialog.

When you import a file, its contents are added to your current Design Page. You can repeat the operation and assemble your Design Page from a library of patterns that you have created. **NOTE:**

When importing patterns from other makers, make sure to choose a pattern whose size will fit in the Design Page.

When converted for this application, the colors of patterns imported from dst (Tajima), exp (Melco), pcs (Pfaff) and Hus (Husqvarna) files may be slightly changed. When this happens, you can change the color with the Sew – Change colors of a stitch object function.

When importing some pec files from embroidery cards, the Select Import size dialog will display. If this happens, select the import size by clicking the appropriate radio button, then click OK to import the data.

See also: "Save As" on page 153

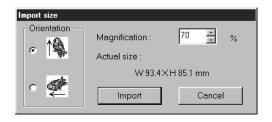
■ Import – from Design Center

Purpose: Imports an embroidery pattern from Design Center.

Shortcut key: F7

Operation:

- 1 Start Design Center and open the file that you want to import into Layout & Editing.
- 2 Click File, then Import, then from Design Center.
 The Import size dialog displays.



- Select the magnification factor. You can type it or increase/decrease it using the arrow buttons.
- The application will not allow you to magnify the embroidery data to a size such that it would not fit in your Design Page area.
- Select the Orientation by clicking the Orientation radio button opposite the appropriate icon.
- ◆ Click Import to import the data.
- Click Cancel if you want to exit the function.

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3 If you are not running Design Center or if it does not contain a **pem** file, the first or the second message will appear.





See also: "Design Center" on page 57

Template Open

Purpose: Opens a background image that can be used as a guide to draw a new embroi-

dery pattern.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click File, then Template Open.

A Open template file dialog similar to this will display.



Select the drive, the folder and the file name.

Click **OK** to exit.

- If the Preview check box is checked, the contents of the selected file displays in the Preview window.
- Click Open to open the file.
- Double-clicking the file name will also open the file and close the dialog.
- ◆ Click Cancel if you want to exit the function.
- This application can handle only uncompressed files.
- The file extension must be one of the following: Windows BMP (*.bmp), Exif (*.tif, *.jpg), ZSoftPCX (*.pcx), Windows Meta File (*.wmf), Portable Network Graphics (*.png), Encapsulated PostScript (*.eps), Kodak PhotoCD (*.pcd), FlashPix (*.fpx).
 NOTE:

For pcd and fpx files that are saved on many pages, only the first page can be opened. Tif files that have used LZW compression can not be opened.

2 Your Design Page will display the image:



- The image cannot be directly embroidered. You can only use it as a guide to draw an embroidery pattern (using broken lines, curves or manual punching).
- Design Center allows you to make an embroidery pattern from an image with more precision.

See also: "Template-On, Faded, Off" on page 191

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Purpose: Saves your Design Page on the disk as a Version 4.0 file (default).

Shortcut key: (Ctrl) + (S)

Operation:

1 Click File, then Save.

If the file already exists on the disk (the file has been saved at least once), the file is saved immediately.

2 If the file name is still **Untitled** or if, for any other reason, the file cannot be found on the disk, the application automatically switches to **Save As**.

See also: "Save As" on page 153, "Write to Card" on page 154

Save As

Purpose: Saves your Design Page on the disk under a new file name.

NOTE:

If you select a previous version, saved *.pes files can be opened with a previous

version of the software.

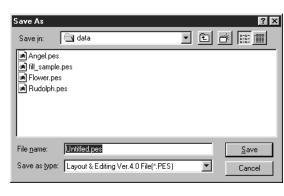
Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click File, then Save As.

A File Save As dialog similar to this will display.



- Select the drive, the folder and type the file name.
- Click Save to save.
- ◆ Click Cancel to exit.

2 If the new file name already exists, this message will appear:



- Click Yes to overwrite.
- Click No if you do not want to overwrite the existing file.

The new file name displays in the title bar of the Layout & Editing window.

See also: "Save" on page 153, "Write to Card" on page 154

Export

Purpose: Exports the data shown in the Design Page as a file of a different format (dst, hus,

exp, and pcs).

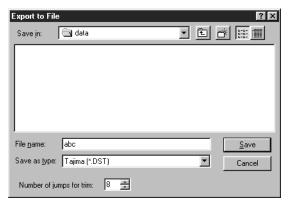
Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click File, then Export.

A dialog like the one shown below appears.



- Select the drive and the folder, and then type the file name.
- Select the format (DST,EXP,PCS,HUS) in which you wish to export the file.
 - ◆ Number of jumps for trim: With the DST format, jump codes are used to indicate when the thread must be cut in order to change the thread color. Since the number of codes differ depending on the sewing machine being used, this setting allows you to select the appropriate value. (This setting can only be specified if the DST format is selected.)

NOTE:

Some patterns installed from a card cannot be exported.

Write to Card

Purpose: Writes your Design Page to an original card.

Shortcut key: (F4)

Operation:

1 Click File, then Write to Card. This message will display.



- If the card is not brand new, make sure that you want to erase the data that is already stored on the card and click OK.
- Click Cancel to exit.

If the card module is not connected, this message displays.



- Correct the problem, then click Retry.
- Click Cancel to exit.

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Click OK.

See also: "Save" on page 153, "Save As" on page 153

displays while the data is being transferred to the card. After a while, the following message will appear.

Property

Purpose: To enter comments in a saved PES file.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click File, then Property. The File Property dialogue appears.



- Enter or revise the necessary points in text format. Design Name, Category, Author, Keywords, and Comment.
- Click **OK** to save the entered data and finish. The entered data will be saved to

the file the next time you Save.

Click Cancel to finish without saving the entered data.

Print Setup

Purpose: Allows you to change the printing settings for previewed embroideries.

No shortcut key for this function Shortcut key:

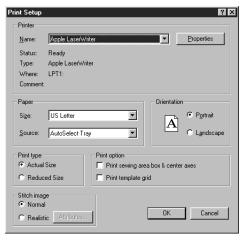
Toolbar: No button for this function

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Operation:

1 Click File, then Print Setup.

A Print Setup dialog similar to this will display.



- Click Properties to set the printer properties.
- Choose the appropriate Paper and Orientation settings.
- Choose the Print type and Print Option of the preview image and sewing information.
- Click **OK** to confirm the settings.
- Click Cancel to exit.

You can choose to print the preview image on one or two pages for one pattern or one hoop position.

The Actual Size will print two pages:

The image in its actual size on the first and the dimensions of the embroidery, the sewing color order and the needle count on the second page. The file name is printed on both pages.

The Padused Size will print a reduced illustration of the image and all the above mentioned item.

The **Reduced Size** will print a reduced illustration of the image and all the above mentioned items on a single page.

NOTE:

If a Design Page for a multi-position embroidery frame (130 \times 300 mm, 300 \times 130 mm, 100 \times 172 mm, or 172 \times 100 mm) is selected, each Print type will print the whole image of Design Page on the first page.

And in this case, the number of pages depends on your design.

Print sewing area box & center axes

Select **Print sewing area box & center axes** to print black lines to indicate the sewing area (see "Select Sewing Area") and the center axes for the data.

This setting is only available when **Actual Size** is selected.

Print template grid

Select **Print template grid** to print green lines to represent the grid printed on the embroidery sheet included with the embroidery frame.

NOTE:

The size of the grid that is printed may be slightly different from the grid printed on the embroidery sheets for some embroidering machines.

If Stitch Image is set to Normal, the pattern is printed as lines and dots.

If **Stitch Image** is set to **Realistic**, the pattern is printed as a realistic image.

NOTE:

To change the settings of a realistic image, click Attributes.

See "Realistic Preview Attribute Setting" for more details.

These attributes are stored separately from the Realistic Preview attributes

See also: "Realistic Preview Attribute Setting" on page 190

Print Preview

Purpose: Allows you to preview the contents of the Design Page and check the sewing color

order, the dimensions and the needle count before printing.

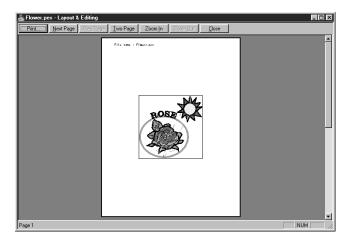
Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click File, then Print Preview.

If **Actual Size** was selected in the **Print Setup** dialog, the **Layout & Editing** window changes to the following.



The buttons that are selectable display in black and the other ones are grayed.

- Click Print to open the Print dialog and print.
- Click Next Page to display the next page.
- Click Prev Page to display the previous page.
- Click Two Page to display both pages at the same time.
- Click Zoom In and Zoom Out to enlarge and reduce the page.
- ◆ Click Close to return to the Design Page.
- 2 Enlarge the image either by clicking Zoom In or by clicking directly on the point of the page that you want to enlarge. Scroll the page as needed to view its hidden parts.
 When you reach the limit of the zooming in function, the Zoom In button becomes inactive and the Zoom Out button becomes active. Click the Zoom Out button or the image to reduce its size again. One of the zooming function is always active.
- 3 Click **Next Page** to display page 2 containing the sewing information (not available if **Reduced Size** was selected in the **Print Setup** dialog).
 - This button becomes inactive and the Prev Page button becomes active.
- 4 Click Prev Page to go back to the display of the embroidery (not available if Reduced Size was selected in the Print Setup dialog).
 - This button becomes inactive and the **Next Page** button becomes active.
- 6 Click Two Page to display both pages at the same time. The Two Page button is replaced by the One Page button.

Click **One Page** to display one page at a time. The **Next Page** and **Prev Page** become inactive. **NOTE**:

If you need to view an image in detail, displaying only one page at a time allows you to enlarge it more.

If you want to check the sewing information for individual objects composing your embroidery, you can do that by clicking Option – Design Property.

See also: "Print Setup" on page 155, "Print" on page 158 and "Design Property" on page 194

Print

Purpose: Prints your Design Page and some sewing information.

Shortcut key:

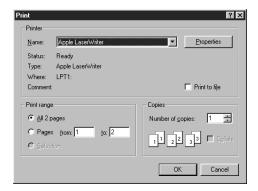
Ctrl + P

Toolbar: No button for this function

Operation:

1 Click File, then Print.

A Print dialog similar to this will display.



- Make the necessary setting.
- ◆ Click **oK** to print.
- ◆ Click Cancel to exit.
- Click Properties to change the default settings of the printer.
- 2 Follow the instructions in the Windows manuals and in the manuals of your printer for the next operations.

Depending on the **Print Type** setting, one or two pages will be printed for one pattern or one hoop position.

Printing a Design Page for a multi-position embroidery frame (130 \times 300 mm, 300 \times 130 mm, 100 \times 172 mm, or 172 \times 100 mm)

If a Design Page for a multi-position embroidery frame is selected, each section of the design is printed on a separate page.

- If a 130 × 300 mm or 300 × 130 mm Design Page is selected, the design is divided into sections of 130 × 180 mm or 180 × 130 mm and each section is printed on a separate page.
- If a 100 x 172 mm or 172 x 100 mm Design Page is selected, the design is divided into sections of 100 x 100 mm and each section is printed on a separate page.

Printing a Design Page for a multi-position embroidery frame

When Actual Size is selected:

- lacktriangled Prints the entire Design Page at actual size (However, for a 130 \times 300 mm or 300 \times 130 mm Design Page, a reduced image of the Design Page is printed.)
- 2 Prints the pattern in the section of the Design Page that would be sewn with the first embroidery frame installation position
- 3 Prints the color order for the pattern in the section of the Design Page that would be sewn with the first embroidery frame installation position
- Prints the pattern in the section of the Design Page that would be sewn with the second embroidery frame installation position
- **6** Prints the color order for the pattern in the section of the Design Page that would be sewn with the second embroidery frame installation position

•

This continues until all of the sewing data is printed.

Quik Reference

When Reduced Size is selected:

- Prints the entire Design Page at actual size (However, for a 130 × 300 mm or 300 × 130 mm Design Page, a reduced image of the Design Page is printed.)
- 2 Prints the pattern and its color order for the section of the Design Page that would be sewn with the first embroidery frame installation position
- 3 Prints the pattern and its color order for the section of the Design Page that would be sewn with the second embroidery frame installation position

:

This continues until all of the sewing data is printed.

NOTE:

In addition, when the File – Print Preview command is selected, each section of the pattern is displayed as mentioned above.

Exit

Purpose: Exits the application.

Shortcut key: Alt + F4

Toolbar: No button for this function

Operation:

1 Click File, then Exit.

If the current Design Page is not edited, the application closes immediately.

2 If the current Design Page is edited, you will be asked whether you want to save the changes. See "Open" on page 148.

See also: "Save" on page 153, "Save As" on page 153

The functions of the Edit menu perform simple actions on selected patterns, such as cutting and pasting.

Undo		Undoes the last operation.	page 160
Redo		Cancels the effect of the last Undo.	page 160
Group		Turns several selected objects into one object.	page 161
Ungroup		Cancels the grouping for grouped objects.	page 161
Cut		Removes the selected pattern(s) from the screen while saving a copy in the clipboard.	page 161
Сору		Saves the selected pattern(s) in the clipboard without removing them from the screen.	page 162
Duplicate		Makes a copy of the selected pattern(s).	page 162
Paste		Pastes the contents of the clipboard on the screen.	page 162
Delete		Removes the selected pattern(s) from the screen without saving them in the clipboard.	page 163
Mirror	Horizontal	Flips the selected pattern(s) up/down.	page 163
WIIITOI	Vertical	Flips the selected pattern(s) left/right.	page 163
Rotate		Allows you to manually rotate the selected pattern(s) by an arbitrary angle.	page 164
Numerical	Size	Resizes the selected pattern numerically.	page 165
Setting	Rotate	Rotates the selected pattern numerically.	page 166
Center	•	Moves the selected object to the center of Design Page.	page 166
Align		Aligns the selected patterns as indicated.	page 167
Sew Order		Allows you to move the selected pattern to the beginning, end, one forward, or one back in the sew order.	page 168
Select All		Selects all the patterns.	page 169

Undo

Purpose: Undoes the last operation.

Shortcut key: Ctrl + Z

Operation:

1 Click Edit, then Undo.

The last operation is automatically undone. For example, if you have mistakenly deleted an pattern, this function will make it reappear.

See also: "Redo" below

Redo

Purpose: Cancels the effect of the last **Undo**.

Shortcut key: Ctrl + A

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Operation:

1 Click Edit, then Redo.

The effect of the last **Undo** is cancelled. For example, you have used **Undo** just after drawing a circle. **Undo** deleted the circle. Using **Redo** will make the circle reappear.

See also: "Undo" on page 160

Group

Purpose: Turns several selected objects into one object.

Shortcut key: Ctrl + G

Toolbar: No button for this function

Operation:

Select several objects.

2 Click Edit then Group.

The selected objects will become one object.

You can treat the objects as one object for any further editing functions.

NOTE:

When this function is operated, the sewing order for the selected objects will change. The grouped objects will be moved to the sewing position of the last object in the group, and will be sewn in order in that position. The sewing order of the grouped objects can not be changed, nor can another object be inserted in the sewing order of the grouped objects. If you want to change the sewing order in those ways, cancel the grouping.

NOTE:

- If you select either a path, or text fit to a path, both will be included in the grouping.
- When selecting an object set as part of a hole sewing pattern, the entire hole sewing pattern will be included in the grouping.

See also: "Ungroup" below

Ungroup

Purpose: Cancels the grouping for grouped objects.

Shortcut key: Shift + G

Toolbar: No button for this function

Operation:

Select a grouped object.

2 Click Edit then Ungroup.

The grouping of the selected object is cancelled.

After completing this operation, you can carry out editing operations on each object individually.

See also: "Group" above

Cut

Purpose: Removes the selected pattern(s) from the screen while saving a copy in the clip-

board.

Shortcut key: (Ctrl) + (X)

Toolbar: DI SI BI DA O X BI BAO DDGG BI MA WA WA DB

Operation:

- 1 Select one or more patterns.
- 2 Click Edit, then Cut.

The selected patterns disappear. Since they are saved in the clipboard, you can paste them back using **Edit – Paste**.

See also: "Copy", "Paste" below and "Delete" on page 163

Copy

Purpose: Saves the selected pattern(s) in the clipboard without removing them from the

screen.

Shortcut key: Ctrl + C

Operation:

- 1 Select one or more patterns.
- 2 Click Edit, then Copy.

The patterns are copied into the clipboard and are ready to be pasted.

See also: "Cut" on page 161, "Duplicate" and "Paste" below

Duplicate

Purpose: Makes a copy of the selected pattern(s).

Shortcut key: Ctrl + D

Toolbar: No button for this function

Operation:

- Select one or more patterns.
- 2 Click Edit, then Duplicate.

A copy of the patterns appears on the screen.

See also: "Copy" above and "Paste" below

Paste

Purpose: Pastes the contents of the clipboard on the screen.

Shortcut key: Ctrl + V

Operation:

① Click Edit, then Paste.

The patterns saved in the clipboard (using Cut or Copy) are pasted on the screen.

See also: "Cut" on page 161, "Copy" and "Duplicate" above

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Delete

Purpose: Removes the selected pattern(s) from the screen without saving them in the clip-

board.

Shortcut key: Delete

Toolbar: No button for this function

Operation:

Select one or more patterns.

2 Click Edit, then Delete.

The selected pattern(s) are removed from the screen. Since they are not saved in the clipboard, the only way to make them reappear is to use **Edit – Undo**.

See also: "Undo" on page 160, "Cut" on page 161

Mirror – Horizontal

Purpose: Flips the selected pattern(s) up/down.

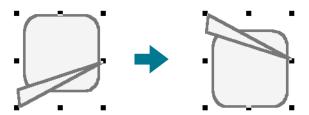
Shortcut key: Ctrl + H

Operation:

Select one or more patterns.

2 Click Edit, then Mirror, then Horizontal.

The selected pattern(s) are replaced by their horizontal mirror image (top and bottom inverted). Two successive applications of this function restores the original image.



Note that some patterns installed from a card cannot be flipped.

See also: "Mirror – Vertical" below, "Rotate" on page 164

Mirror – Vertical

Purpose: Flips the selected pattern(s) left/right.

Shortcut key: Ctrl + J

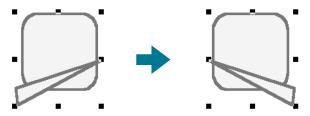
Operation:

1 Select one or more patterns.

2 Click Edit, then Mirror, then Vertical.

The selected pattern(s) are replaced by their vertical mirror image (left and right inverted).

Two successive applications of this function restores the original image.



Note that some patterns installed from a card cannot be flipped.

See also: "Mirror – Horizontal" on page 163, "Rotate" below

Rotate

Purpose: Allows you to manually rotate the selected pattern(s) by an arbitrary angle.

Shortcut key: Ctrl

Ctrl + Y

Toolbar: DA BB PO NO KBB BA O BAUT MA WA PP

Operation:

Select one or more patterns.



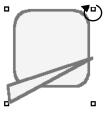
2 Click Edit, then Rotate.

The shape of the handles changes.



Move the cursor to one of the handles.

The shape of the cursor changes.



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4 Drag the handle to rotate the pattern the desired angle and release the mouse button.



A simple dragging of the mouse will rotate the pattern by 1° increments. Pressing the **Shift** key will rotate it by 15° increments.

See also: "Mirror – Horizontal" and "Mirror – Vertical" on page 163

Numerical Setting-Size

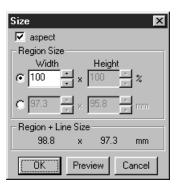
Purpose: Resizes the selected pattern numerically.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

- 1 Select one or more patterns.
- Click Edit, then Numerical Setting, then Size. The Size dialog appears.



- To change the width and height proportionally, check aspect.
- Select the units (% or mm/inch) for the width and height.
- Either typing in a value or clicking the arrows to select the desired value can enter the width and height.
 Select 100% to leave the pattern unchanged.

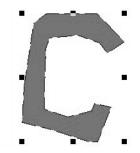
If aspect is selected, changing one dimension automatically changes the other so the proportion of the width and height remains unchanged.

The specified size is for the region. If the pattern has a line, the size of the entire pattern can be checked under **Region + Line**Size at the bottom of the dialog.

- Click OK to confirm.
- Click Preview to view the pattern at the new size in the Design Page.
- Click Cancel to exit without making any changes.

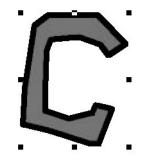
Region (without line)





Region + line





NOTE:

The maximum value that can be entered is the largest value that will not allow the pattern to exceed the size of the Design Page.

The minimum value is 1 mm (0.04 inch).

See also: "Select System Unit" on page 196

Numerical Setting-Rotate

Purpose: Rotates the selected pattern numerically.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

- 1 Select one or more patterns.
- 2 Click Edit, then Numerical Setting, then Rotate. The Rotate dialog appears.



- The desired rotation angle can be entered by either typing in a value or clicking the arrows to select the desired value. Select 0 degree to leave the pattern unchanged.
- ◆ Click **ok** to confirm.
- ◆ Click **Preview** to view the pattern rotated the specified angle in the Design Page.
- Click Cancel to exit without making any changes.

NOTE:

The range of values that can be entered is between 0 and 359 degrees, in 1degree increments.

Center

Purpose: Moves the selected object to the center of Design Page.

Shortcut key: (Ctrl) + (M)

Toolbar: No button for this function

Operation:

1 Select one or more objects.

2 Click Edit, then Center.

The entire selected object moves to the center of Design Page.

NOTE:

For Letters Fit to a Path

If you select either the letters or the path only, the selected object will be moved to the center of Design page, but the unselected object will not be moved with it.

For Objects set for Hole Sewing

When selecting an object set as part of a hole sewing pattern, the selected object will be moved to the center of Design Page, but the unselected objects will not be moved with it.

Align

Purpose: Aligns the selected patterns as indicated.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

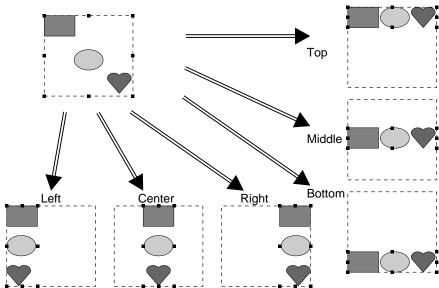
Operation:

1 Select the patterns which you want to Align.

2 Click Edit, then Align, then Left, Center, Right, Top, Middle, or Bottom, depending on how you wish to align the patterns.

The selected patterns are aligned as shown below.

3 To choose a different alignment, click **Undo** and repeat 2.

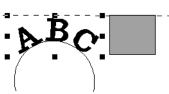


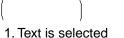
Text on a path:

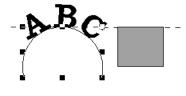
Text on a path can be aligned by selecting other objects on the design page as well as the text, the path, or both the text and the path. Each selected pattern is aligned on its outline. In order to align with object(s) on the design page all the object(s) must be selected with text and/or path.

NOTE:

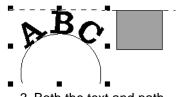
Refer to index for related topics, if necessary.







2. Path is selected



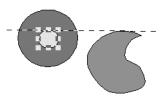
3. Both the text and path are selected

Objects set for hole sewing:

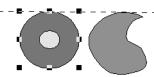
If just the inside of a pattern is selected, the pattern is aligned on the outline of the inside area. If the outside of the pattern is also selected, the pattern is aligned on the outline of the outside area. In order to align with object(s) on the design page all the object(s) must be selected.

NOTE:

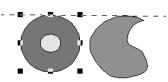
Refer to index for related topics, if necessary.



1. Inside area is selected



2. Outside area is selected



3. Both the inside and outside areas are selected

Sew Order

Allows you to move the selected pattern to the beginning, end, one forward, or Purpose:

one back in the sew order.

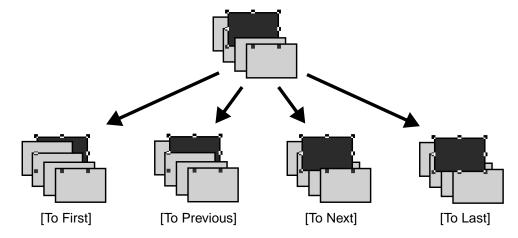
Shortcut key: (Ctrl) + (B) (To First), (Ctrl) + (F) (To Last)

Toolbar:

Operation:

- Select one or more patterns.
- Click Edit, then Sew Order. Use To First, To Previous, To Next, To Last to select the desired sew order.

The sew order will change to the selected sew order.



Purpose: Selects all the patterns.

Shortcut key:

(Ctrl) + (E)

Toolbar: No button for this function

Operation:

1 Make sure that the cursor is in Selection mode.

2 Click Edit, then Select All.

Text Menu

The functions of the Text menu performs actions on text patterns, such as fitting text to a curved path.

Edit Text Letters	Allows you to edit an entered text.	page 170
Text Attribute Setting	Allows for precise control of character attributes.	page 171
Fit Text to Path Setting	Fits a line of text along a path.	page 172
Release Text from Path	Release the text from the path.	page 174
Transform Text	Applies a preset transformation to text.	page 174
Clear Transformation	Restores the original shape of the text.	page 175
True Type Font Attribute Setting	Sets the attributes, such as the style, for TrueType fonts that are converted to embroidery data.	page 175

Edit Text Letters

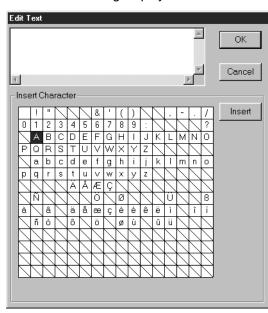
Purpose: Allows you to edit an entered text.

Shortcut key: Ctrl + L

Toolbar: No button for this function

Operation:

- ① Select the text you want to edit. You cannot edit more than one text pattern at a time. If you select more than one text pattern, this function is not available.
- 2 Click Text, then Edit Text Letters. The Edit Text dialog displays.



- ◆ The selected text is highlighted in the text field.
- ◆ Edit your text as needed by deleting unwanted characters and typing or entering other characters by clicking them one at the time on the character table, then clicking Insert or simply by double-clicking them. Press the Enter key to enter new lines of text.
- Click OK to confirm.
- ◆ Click Cancel to exit.
- If a character that you entered is not available for the selected font, a warning message displays. Click OK in that dialog to close it and to return to the Edit Text dialog where you can correct your text.

NOTE:

If text converted from a TrueType font is selected, the list of characters displayed is for the font of the first letter of the text.

If text made from multiple TrueType fonts is selected, the list of characters displayed is for the font of the first letter of the text.

See also: "Entering text" on page 127

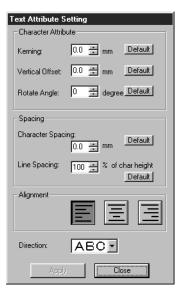
■ Text Attribute Setting

Purpose: Allows for precise control of character attributes.

Shortcut key: Ctrl + K

Operation:

- 1 Select one or more text patterns.
- Click Text, then Text Attribute Setting. The Text Attribute Setting dialog displays.



- Enter the desired values for each setting.
- ◆ To restore the default value of an individual setting, click its **Default** button.
- Click Apply to confirm the effect of the setting.
- Click Close to remove the dialog.

Kerning	Sets the spacing between individual characters. Range: -100 - 100 mm (-3.94 - 3.94 inches) Default: 0	0.0 mm Abcdef	5.0 mm (between "A" and "b") A bcdef
Vertical Offset	Moves the text vertically. Range: -100 - 100 mm (-3.94 - 3.94 inches) Default: 0	0.0 mm Abcdef	2.0 mm Abcdef
Rotate angle	Rotates the characters. Range: 0 - 359 degrees Default: 0	O degree Abcdef	20 degree Abcdef
Character Spacing	Sets the spacing between all characters. Range: -100 - 100 mm (-3.94 - 3.94 inches) Default: 0	O.0 mm Abcdef	Abcdef
Line Spacing	Sets the spacing between lines in percents of the character height. Range: 0 – 1000% Default: 0	Abcdef ghijki	150% A b c d e f g h i j k l

Quik Reference

		Center	Right
Alignment	Aligns several lines of text to the left, center or right.	A b c d e f g h i j k l	A b c d e f g h i j k l
		Horizontal	Vertical
Direction	Specifies whether characters will be positioned horizontally or vertically.	ABC	Α
			В
			С

Note:

The vertical letters will be displayed in a vertical manner on design page.

Note:

Both Kerning and Character Spacing set the spacing between characters. The difference is that Character Spacing is always applied to the entire text pattern, while Kerning can be applied to individual characters. If you apply Kerning to the entire text pattern, it works exactly like Character Spacing. See "Selecting characters on a text pattern" on page 125 for more details about selecting individual characters in a text pattern.

See also: "Fit Text to Path Setting" below and "Transform Text" on page 174

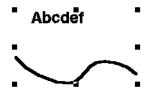
Fit Text to Path Setting

Purpose: Fits a line of text along a path.

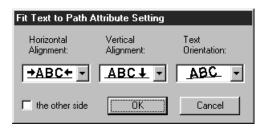
Shortcut key: Ctrl + T

Operation:

1 Select a line of text and a path.



2 Click Text, then Fit Text to Path Setting.



- Select Horizontal and Vertical Alignment and Text Orientation.
- Check the other side if you want the characters to be reversed.
- Click **OK** to confirm the setting.
- ◆ Click Cancel to exit.

Horizontal Alignment	Sets the distribution of characters along the path.	ABOLL About
Vertical Alignment	Sets the distance between the text and the path.	ABCH! ABCH!
Text Orientation	Sets the orientation of the characters relative to the path.	ABC + CO P
The other side	Reverses the characters.	☐ the other side

See also: "Release Text from Path" on page 174

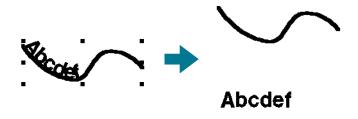
Release Text from Path

Purpose: Release the text from the path.

Shortcut key: (Ctrl) + (Q)

Operation:

- 1 Select a text fitted to a path.
- 2 Click Text, then Release Text from Path.



See also: "Fit Text to Path Setting" on page 172

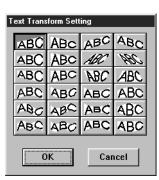
Transform Text

Purpose: Applies a preset transformation to text.

Shortcut key: F2

Operation:

- 1 Select a line of text.
- Click Text, then Transform Text.
 The Text Transform Setting dialog displays.



- Click on the desired transformation.
- Click **OK** or double-click to apply the transformation.
- ◆ Click Cancel to exit.



3 If necessary, set the level of transformation. See "Transform level" on page 140.

NOTE:

Take note that text data that has been changed from True Type font has data for both line and region sewing, so if you use this function, depending on the form of the True Type font, there may be a gap between the line and the region of the text.

See also: "Clear Transformation" on page 175

Clear Transformation

Purpose: Restores the original shape of the text.

Shortcut key: (F3)

Operation:

1 Select transformed text.

2 Click Text, then Clear Transformation.



See also: "Transform Text" on page 174

TrueType Font Attribute Setting

Purpose: Sets the attributes, such as the style, for TrueType fonts that are converted to

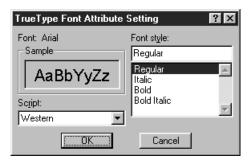
embroidery data.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

Click Text, then TrueType Font Attribute Setting
A dialog similar to the one shown below appears.



If any characters converted from a True-Type font is selected, the attributes for the selected characters are displayed.

- The Font attribute indicates the name of the selected font.
- ◆ The Sample box shows a sample of the font with the selected attributes.
- Use Font Style to select the desired font style.
- Use Script to select the desired character set for the font.
- ◆ Click **OK** to set the attributes and close the dialog.

Any entered TrueType font text will be converted to embroidery data with the font's new attribute settings. In addition, selecting text data converted from a TrueType font creates embroidery data based on the new attribute settings.

 Click Cancel to close the dialog without changing any settings.

For details on entering text, refer to "Text Input Mode" (page 127).

File Utility

NOTE:

The settings for Font Style and Script may differ depending on the TrueType font that is selected. NOTE:

If text created from multiple TrueType fonts is selected, this dialog cannot be displayed. In addition, if text of the same font but different font styles or scripts is selected, this dialog appears with the attribute settings for the first letter in the text.

In either case mentioned above, selecting only one character from within text displays a dialog containing only that character's attributes.

See also: "Text Input Mode" on page 127, "Setting Text Attributes" on page 137

Quik Reference

Sew Menu

The Sew menu allows you to control the way each pattern will be sewn.

Sewing Attribute Setting	Sets the sewing attributes of the regions and the outlines of a pattern.	page 177
Check Sewing Order	Allows you to check the sewing order of patterns.	page 183
Set hole sewing	Sets a pair of patterns for hole sewing (to avoid sewing twice at the same place when a pattern covers another one).	page 184
Cancel hole sewing	Cancels hole sewing setting.	page 185
Stitch to Block	Converts imported stitch patterns into blocks (manual punching data), allowing you to set sewing attributes and to keep the stitching quality when scaling.	page 185
Change colors of a stitch object	Changes the color of imported stitch data.	page 186
Select Sewing Area	Sets the sewing area	page 187
Optimize hoop change	Optimizes the sewing order of patterns in a Design Page for multi-position embroidery frames (100 × 172 mm, 172 × 100 mm, 130 × 300 mm, or 300 × 130 mm)	page 188

Sewing Attribute Setting

Purpose: Sets the sewing attributes of the regions and the outlines of a pattern.

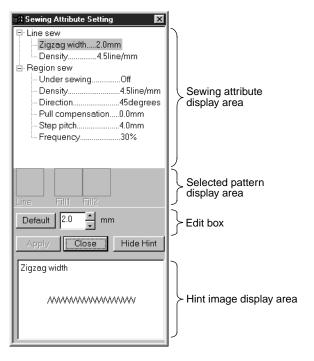
Shortcut key: Ctrl + W

Operation:

1 Select one of the buttons of the Tool Box used to draw or select an existing pattern.

2 Click Sew, then Sewing Attribute Setting.

A Sewing Attribute Setting dialog similar to this will display. You can change the size of this dialog as you like.



- Select the item you want to change or set in the Sewing attribute display area, then enter the change or setting in the edit box.
- ◆ The method for entering the setting varies according to the item. If entering numerical values, you can click on the arrow buttons to select values or enter the values directly. If the Default button is displayed in the Edit box, click the button to apply the Default setting to the selected item.
- Click Apply to confirm the setting.
- ◆ Click Close to exit.
- Click Show Hint/Hide Hint to turn the hint image display on or off.

Sewing attribute display area: Displays the present settings for each of the sewing attributes.

Selected pattern display area: When a pattern for Programmable Fill or Motif sewing is selected,

that pattern is displayed.

Edit box: Displays the setting values to be changed for the item selected in

the Sewing attribute display area.

Hint image display area: When set to display a hint, a hint image showing the settings in the

edit box is displayed.

Line sewing attributes

Setting items according to the selected stitch

Zigzag stitch Line sewing	Running stitch Line sewing	Manual Punch Line sewing	Motif stitch Line sewing
Zigzag widthDensity	Run pitch Run times	└ Run pitch	⊢ Run pitch ⊢ Motif ⊢ Pattern
			Pattern size Width Height H-Arrange V-Arrange

Sets the width of the zigzag. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 2 mm (0.08 inch)	
Density	Sets the number of lines per mm (inch). Range: 1 - 7 lines per mm (25 - 178 lines per inch) Default: 4.5 lines per mm (114 lines per inch)

Quik Reference

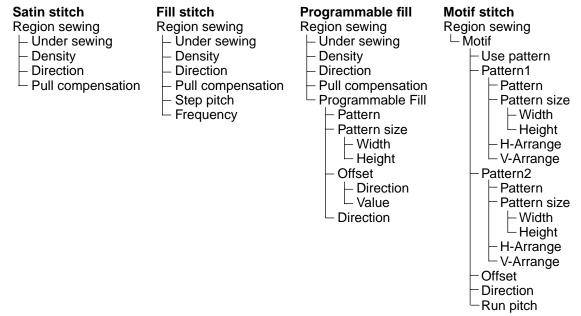
Run pitch	Sets the pitch of the line sewing. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 2 mm (0.08 inch)	
Run times	Sets the number of times the border will be sewn. Range: 1 - 5 Default: 1	

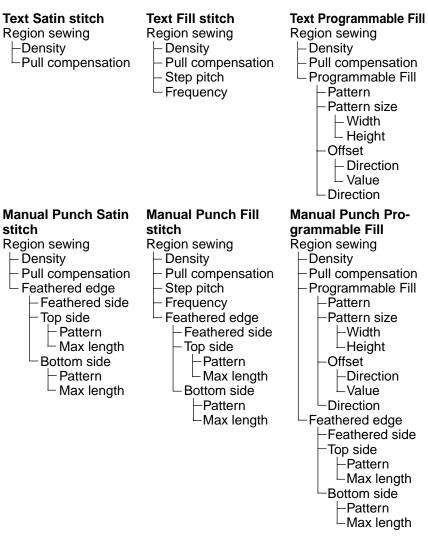
Motif Stitch only:

Pattern		Select a pattern for Motif sewing. Click Select Pattern, and the Browse dialog will display. Select the folder containing the pmf file you want to open. Scroll through the available stitch patterns and double-click the desired pattern or click OK to select the pattern	
Pattern Size	Width	Sets the pattern width (the direction along Range: 2 - 10 mm (0.08 - 0.39 inch) Default: 5 mm (0.20 inch)	the line).
	Height	Sets the pattern height (the direction perpe Range: 2 - 10 mm (0.08 - 0.39 inch) Default: 5 mm (0.20 inch)	endicular to the line).
H-Arrange (Horizontal Arrange)		Sets the horizontal arrangement of the pattern. For patterns like , patterns will be arranged along the line as shown to the right.	Normal:
V-Arrange (Vertical Arrange)		Sets the vertical arrangement of the pattern. For patterns like , patterns will be arranged along the line as shown to the right.	Normal: DDDDDDDDDDDDDDDDDDDDDDDDDDDDDDDDDDDD

Region sewing attribute

Setting items according to the selected stitch





Under Sewing	Sets under sewing on/off. Try to use Under sewing for wide areas, in order to prevent shrinking during stitching. Depending on the shape of the region, however, it may not be possible to make this setting. On: Under sewing will be done Off: Under sewing will not be done	
Density	Sets the number of lines per mm. Range: 1 - 7 lines per mm (25 - 178 lines per inch) Default: 4.5 lines per mm (114 lines per inch)	
Direction	Sets the direction of the stitch. Range: 0 - 179 degrees Default: 45 degrees 135° 179° 45° 179°	
Pull Compensation	Lengthens the sewing region in the stitch pattern's sewing direction to prevent pattern shrinkage during sewing. Range:0 - 2 mm (0.00 - 0.08 inch) Default:0 mm (0.00 inch)	

Fill stitch only:

Step Pitch	Sets the pitch of the steps. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 4 mm (0.16 inch)	Step pitch $\frac{+}{+}$ \bigvee \bigvee
Frequency	Sets the spacial frequency steps. Range: 0 - 99% Default: 30%	30% † ₩₩

Programmable fill stitch only:

Pattern	Select a pattern for Programmable Fill Stitch. Click Select Pattern, and the Browse dialog opens. Select folder containing the pas file you want to open. Scroll throw the available stitch patterns and double-click the desired pattern or click OK to select the pattern	
Pattern Size	Width	Sets the stitch pattern width. Range: 5 - 10 mm (0.20 - 0.39 inch) Default: 7.5 mm (0.30 inch)
Pattern Size	Height	Sets the stitch pattern height. Range: 5 - 10 (0.20 - 0.39 inch) Default: 7.5 mm (0.30 inch)
	Direction	Sets the offset arrangement of the pattern, and sets the direction of offset as Row/Column.
Offset	Value	When the pattern's arrangement is offset, sets the amount of offset. Range: 0 - 99 % Default: 0 %
Direction		Allows you to rotate the angle of the stitch patterns. Range: 0 - 359 degrees Default: 0 degrees

Motif Stitch only:

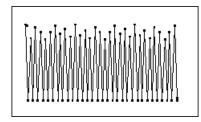
Use Pattern		Selects whether to use pattern 1 or pattern 2 for Motif. If you choose to use both patterns, the data is created so that sewing is alternated between them after each row. Pattern1 only: Uses only pattern 1 (Default) Pattern2 only: Uses only pattern 2 Pattern1 and 2: Uses pattern 1 and pattern 2	
Pattern		Select a pattern for Motif sewing. Click Select Pattern , and the Browse dialog will display. Select the folder containing the pmf file you want to open. Scroll through the available stitch patterns and double-click the desired pattern or click OK to select the pattern.	
Pattern Size	Width	Sets the pattern width (the direction along the line). Range: 2 - 10 mm (0.08 - 0.39 inch Default: 5 mm (0.20 inch)	
Tattern 5126	Height	Sets the pattern height (the direction perpendicular to the line). Range: 2 - 10 mm (0.08 - 0.39 inch) Default: 5 mm (0.20 inch)	

H-Arrange (Horizontal Arrange)	Sets the horizontal arrangement of the pattern. For patterns like , patterns will be arranged along the line as shown below. Normal: Mirror: Alternate: Alternate:
V-Arrange (Vertical Arrange)	Sets the vertical arrangement of the pattern. For patterns like , patterns will be arranged along the line as shown below.
Row Offset	When the pattern arrangement is offset, sets the amount of offset for each row. Range: 0 - 10 mm (0.00 - 0.39 inch) Default: 0 mm (0.00 inch)
Direction	Allows you to rotate the angle of the Motif patterns. Range: 0 - 359 degrees Default: 0 degrees
Run Pitch	Sets the pitch of the sewing. Range: 1 - 10 mm (0.04 - 0.39 inch) Default: 2 mm (0.08 inch)

Feathered Edge only:

Feathered Side	Sets which side of the sewing direction to apply the Feathered edge setting to. When creating data in Manual Punch mode, the Topside has organization points 1-3, and the Bottom side has organization points 2-4. Top: Feathered Edge is sewn on the Topside. Bottom: Feathered Edge is sewn on the Bottomside.
Pattern	Selects a pattern to use with the Feathered Edge. Click Select Pattern , and the Browse dialog will open. Scroll through the available Feathered Edge patterns and double-click the desired pattern or click OK to select the pattern
Max length	Sets the length of feathered edge. Range: 0.2 - 100 mm (0.01 - 3.94 inch) Default: 3 mm (0.12 inch)

(Example of a feathered side pattern)



Note on the Programmable Fill Stitch:

When setting the stitch and pattern directions of a programmable stitch, take note that whenever the stitch and pattern direction settings cause the stitch to be sewn in the same direction as a line in a stitch pattern, that line will not be sewn.

Use the preview function of your application to view exactly how your stitch pattern will be sewn and set the stitch direction and pattern direction according to the selected stitch or to the effect that you want to produce. To get an even better view, make test samples of different settings.

File Utility

Example of a programmable fill stitch

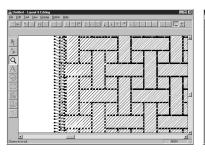
Example 1:

Stitch direction: Default: 45°

Example 2:

Stitch direction: 90°

Example 3: Stitch direction: 0°







See also: "Preview" on page 190, "Programmable Stitch Creator" on page 211

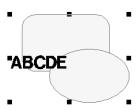
Check Sewing Order

Purpose: Allows you to check the sewing order of patterns.

Shortcut key: (F10)

Operation:

Select a set of patterns.



Click Sew, then Check Sewing Order. The Check Sewing Order dialog displays.



- ◆ Click to see the pattern that will be sewn first.
- ◆ Click → to see the pattern that will be sewn last.
- ◆ Click → or ← to see the patterns that will be sewn between the first and last.
- At the beginning, all patterns are grayed. As you click , , , , , or , , the corresponding pattern will appear in normal color.
- Click Close to exit.

If you want to modify the sewing order, use **Edit – Sew Order – Sew First** or **Edit – Sew Order – Sew Last**.

See also: "Sew Order" on page 168 and "Set hole sewing" on page 184

Alphabetic Index

Sets a pair of patterns for hole sewing (to avoid sewing twice at the same place Purpose:

when a pattern covers another one).

Shortcut key: No shortcut key for this function

No button for this function Toolbar:

Operation:

Set hole sewing

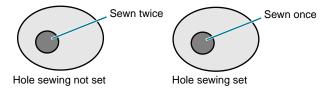
1 Select a pair of patterns, for example, a rectangle included in another rectangle.

2 Click Sew, then Set Hole Sewing. This message will display.



Click **OK** to remove the message.

3 Once a pair of patterns has been set for hole sewing, they are grouped and will move together if you try to move one of the patterns. To change their relative position, you will have to cancel hole sewing first.

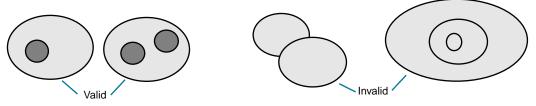


If the selected pair cannot be set for hole sewing, this message displays.



Click **OK** to remove the message.

For a pair to be valid, one of the pattern must be completely enclosed within the other pattern of the pair.



Note that you can see better what the hole sewing setting does by previewing the pair before and after setting the pair for hole sewing (see "Preview" on page 190).

See also: "Cancel hole sewing" on page 185

Cancel hole sewing

Purpose: Cancels hole sewing setting.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Select a pattern that has been set for hole sewing.

2 Click Sew, then Cancel Hole Sewing.

The pair of patterns can now be moved independently.

See also: "Set hole sewing" on page 184

Stitch to Block

Purpose: Converts imported stitch patterns into blocks (manual punching data), allowing

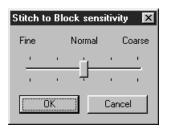
you to set sewing attributes and to keep the stitching quality when scaling.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

- Select the imported stitch data opened in the Design Page to which you want to apply the setting to.
- 2 Click Sew, then Stitch to Block. This dialog displays.



- Select the sensitivity by dragging the slider.
- The normal setting should provide satisfactory results in most cases, but depending on the complexity of a pattern, you may need to select a coarser or a finer stitch density.
- ◆ Click **oK** to confirm.
- ◆ Click Cancel to exit.

NOTE:

Applying this function may affect the content of some patterns.

You may further modify the pattern if needed with the help of the Point Edit Mode.

3 After applying this function, the Sewing Attributes bar displays as follows:

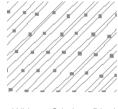


You can select and modify the sewing settings of the blocks of the same color.

To do this, select a block whose color or sewing settings you want to change. All the blocks of that color are selected and the block color and stitch type display in the Sewing Attributes bar.

NOTE:

The sewing setting changes apply globally to the blocks of the same color. Immediately after the operation, the data of the blocks is grouped, so they become one object. When you enlarge or reduce a converted pattern with the selection cursor, the number of stitches sewn automatically adapt to the new size of the pattern, allowing you to keep the original embroidery quality.



Without Stitch to Block



With Stitch to block

NOTE:

The selected color blocks can be moved or scaled individually, therefore, if you want to move the whole pattern once it has been converted, be sure to select the whole pattern.

See also: "Sewing Attribute Setting" on page 177, "Scaling patterns" on page 120 and "Point

Edit Mode" on page 122

Change colors of a stitch object

Purpose: Changes the color of imported stitch data.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

- Select the pattern.
- ② Click Sew, then Change colors of a stitch object.
 The Change colors dialog appears, listing and displaying the colors used for the selected pattern.
 - Change Colors X

 1: 2: 3: 4:

 Change Colors...

 OK

 Cancel
- See also: "Color" on page 143

- Click the color you want to change.
- Click the Change Colors button.
- Select the desired color in the Region
 Thread Color dialog which displays.
 The new color displays in the Change Colors dialog and the pattern displays the new setting. Repeat this procedure for each color you want to change.
- Click OK to confirm.
- Click Cancel to exit.

Select Sewing Area

Purpose: Sets the sewing area

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Sew, then Select Sewing Area. This dialog displays.

Select sewing area C Design Page area Use existing design area Cancel

- Select Design Page area or Use existing design area.
- Click **OK** to confirm.
- Click Cancel to exit.

With Design Page area, the patterns will be sewn so that the place where the needle is when you start coincides with the center of your Design Page.

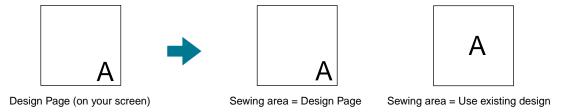
NOTE:

When Design Page area is selected, the dimension of the pattern matches the size of the Design Page, therefore reducing the ability to move a pattern around the layout screen of your embroidery

With Use existing design area, the patterns will be sewn so that the place the needle is when you start coincides with the center of the actual patterns.

NOTE:

When Use existing design area is selected, the actual pattern size is maintained, therefore allowing greater mobility when using the layout function of your embroidery machine.



See also: "Design Page Property" on page 195

Optimize hoop change

Purpose: Optimizes the sewing order of patterns in a Design Page for multi-position embroi-

dery frames (100 \times 172 mm, 172 \times 100 mm, 130 \times 300 mm, or 300 \times 130 mm)

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Sew, then Optimize hoop change.

This setting can be turned on or off. A check mark appears when this setting is turned on; no check mark is displayed when this setting is turned off.

When the **Optimize hoop change** setting is turned on:

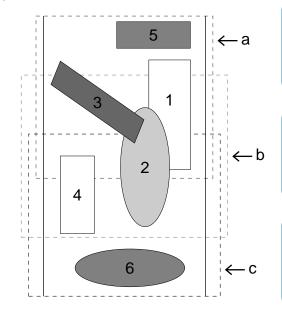
The sewing order that you have set is optimized to reduce the number of times that the embroidery frame installation position is changed.

For the example shown at the right, the sewing order is: a (pattern 1) \rightarrow b (pattern 2) \rightarrow a (patterns 3 & 5) \rightarrow c (patterns 4 & 6)

When the **Optimize hoop change** setting is turned off:

Each pattern is sewn according to the sewing order that you have set. Therefore, since the number of times for changing the embroidery frame installation position is not optimized, it may be changed more often than if it was optimized.

For the example shown at the right, the sewing order is: a (pattern 1) \rightarrow b (pattern 2) \rightarrow a (pattern 3) \rightarrow c (pattern 4) \rightarrow a (pattern 5) \rightarrow c (pattern 6)



NOTE:

Depending on the pattern, turning on the Optimize hoop change setting may reduce the number of times that the embroidery frame installation position is changed. More importantly, it reduces the chances of the embroidery not being sewn correctly or the fabric becoming wrinkled when the embroidery frame installation position is changed too often.

Display Menu

The Display menu lets you modify the appearance of the screen.

Grid Setup	Controls the display and characteristics of the grid.	page 189
Preview	Displays a realistic image of how the patterns will look like when embroidered.	page 190
Refresh Window	Updates the screen.	page 190
Realistic Preview	Displays a realistic image of how either selected patterns or all patterns will look after being embroidered.	page 190
Realistic Preview Attribute Setting	Sets the preview attributes for Realistic Preview.	page 190
Template-On, Faded, Off	Turns on or off the template image or displays it faded.	page 191
Toolbar	Turns the Toolbar on/off.	page 191
Status Bar	Turns the Status bar on/off.	page 192

Grid Setup

Purpose: Controls the display and characteristics of the grid.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click **Display**, then **Grid Setup**. The **Grid Setting** dialog appears.



- Check Snap to Grid when you want to use the grid for aligning patterns or creating patterns of the same size. The cursor will move by the amount set in Grid Interval.
- The snap feature works whether or not the grid is displayed.
- Check Show Grid to see the grid on your Design Page.
- ◆ Type in the Grid Interval to set both horizontal and vertical steps of the grid. Grid interval range: 1 - 10 mm (0.04 - 0.39 inch)
- Check with Axes to turn the horizontal and vertical lines of the grid on.
- When the Show grid check box is checked and the with Axes check box is not checked, only the intersection points of the grid will be displayed.
- Click OK to confirm.
- Click Cancel to exit.

See also: "Select System Unit" on page 196

Preview

Purpose: Displays a realistic image of how the patterns will look like when embroidered.

Shortcut key: F9

Operation:

1 Click Display, then Preview.

A preview of your embroidery patterns will appear.

You cannot make any settings while previewing a pattern.

2 To return to the normal, working screen, click Display, then Preview again or press the Esc

See also: "Check Sewing Order" on page 183

Refresh Window

Purpose: Updates the screen.

Shortcut key: Ctrl + R

Toolbar: No button for this function

Operation:

1 Click Display, then Refresh Window.

Use this function when the screen does not seem to respond correctly, for example, when residue of a pattern remains on the screen after the pattern has been cut.

Realistic Preview

Purpose: Displays a realistic image of how either selected patterns or all patterns will look

after being embroidered.

Shortcut key: Shift + F9

Toolbar: DI SI GI PAU BAU BAU SAUT MA WA E

Operation:

1 Click Display, then Realistic Preview.

The patterns on the Design Page are displayed realistically according to the settings in the **Realistic Preview Attribute Setting** dialog.

2 To return to the normal working screen, click Display, then Realistic Preview again or press the

Esc key.

NOTE:

The Realistic Preview function cannot display a beautiful preview of the pattern if the monitor is set to 256 colors or less. The monitor should be set to at least 16-bit High Color (65536 colors).

See also: "Realistic Preview Attribute Setting" below

■ Realistic Preview Attribute Setting

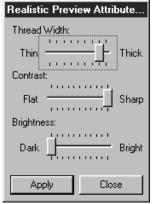
Purpose: Sets the preview attributes for Realistic Preview.

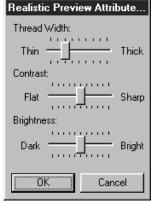
Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click **Display**, then **Realistic Preview Attribute Setting**. The following dialog appears.





- Use Thread Width to set how wide the thread will appear.
- Use Contrast to set the contrast.
- Use Brightness to set how bright the display is.
- Click Apply to display a Realistic Preview of the patterns with the new settings.(When Realistic Preview is displayed.)
 Or, click OK to save the setting for the next time it is displayed. (When Realistic Preview is not displayed.)
- Click Close or Cancel to exit.

See also: "Realistic Preview" on page 190

Template-On, Faded, Off

Purpose: Turns on or off the template image or displays it faded.

Shortcut key: F6

Toolbar: No button for this function

Operation:

- ① Click **Display**, then **Template**, then select the desired setting.
- Click On to display the original image.
- Click Faded to fade the image before displaying it.
- Click Off to hide the image.

This function is not available if a template image is not open.

Press the shortcut key to switch between displaying the template image to displaying it faded to hiding the image.

See also: "Template Open" on page 152

NOTE:

This function will be helpful when doing manual punch.

Toolbar

Purpose: Turns the Toolbar on/off.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Display, then Toolbar.

The Toolbar will be toggled on/off.

See also: "Status Bar" on page 192

Status Bar

Purpose: Turns the Status bar on/off.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Display, then Status bar.

The Status bar will be toggled on/off.

See also: "Toolbar" on page 191

Option Menu

The **Option** menu provides additional options.

Design Center	Starts Design Center and displays its window up front.	page 193
Programmable Stitch Creator	Starts Programmable Stitch Creator and displays its window up front.	page 193
File Utility	Starts File Utility and displays its window up front.	page 193
Design Property	Opens a dialog containing sewing information for the selected pattern(s).	page 194
Design Page Property	Allows you to change the size of the Design Page and the color of the Design Page and the Design Page background.	page 195
Select Color Arrangement	Changes the order of the colors in the Thread Color Dialog.	page 195
Select System Unit	Allows you to select the unit of length (mm or inch).	page 196

Design Center

Purpose: Starts Design Center and displays its window up front.

Shortcut key: F5

Toolbar: No button for this function

Operation:

1 Click Option, then Design Center.

Design Center starts if its window wasn't open and if it was open, the window comes up front. After creating a pattern with the Design Center Application, you can import it in Design Page of Layout & Editing.

See also: "Import – from Design Center" on page 151

Programmable Stitch Creator

Purpose: Starts Programmable Stitch Creator and displays its window up front.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then Programmable Stitch Creator.

Programmable Stitch Creator starts if its window wasn't open and if it was open, the window comes up front.

File Utility

Purpose: Starts File Utility and displays its window up front.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then File Utility.

File Utility starts if its window wasn't open and if it was open, the window comes up front.

Design Property

Purpose: Opens a dialog containing sewing information for the selected pattern(s).

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then Design Property.
The Design Property dialog displays.



Click Close to close the window.

This dialog allows you to quickly check the dimensions, the needle count, the color count and color order of the selected pattern(s).

You can select and check the properties of individual objects composing your embroidery pattern.

If a Design Page for a multi-position embroidery frame (130 \times 300 mm, 300 \times 130 mm, 100 \times 172 mm, or 172 \times 100 mm) is selected:

If no object in the Design Page is selected, the following Design Property dialog displays.



- The first line of the dialog shows the position in the embroidery frame installation order for the currently displayed design.
- Only the designs that would be sewn at the current position in the embroidery frame installation order appear in the Design Page. In addition, the embroidering area for the current frame installation position is outlined in red.
- Click Previous or Next to display information for the designs at other positions in the embroidery frame installation order.

When this dialog appears, the Design Page is automatically enlarged or shrunk to fit in the entire window.

The **Previous** button cannot be clicked when the design corresponding to the first embroidery installation position is already displayed. In addition, the **Next** button cannot be clicked when the design corresponding to the last embroidery installation position is already displayed.

NOTE:

If an object is larger than the embroidering area or if an object is positioned so that it does not completely fit within an embroidering area, the error message "Please change the object size or position." is displayed instead of this dialog. After the object causing the error appears selected, change its size or position. (If more than one object causes the error message to appear, the objects will appear selected in the sewing order.)

Design Page Property

Purpose: Allows you to change the size of the Design Page and the color of the Design

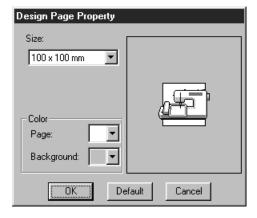
Page and the Design Page background.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

Click Option, then Design Page Property. The Design Page Property dialog displays.



- Select the size by clicking the appropriate radio button.
 - Select the Page color or the Background color by clicking its selector arrow, then by clicking the color.
- The preview area allows you to view the setting changes. The sewing machine picture shows the direction of the Design Page (frame) on the machine.
- ◆ Click **oK** to confirm.
- Click **Default** to go back to the default setting.
- Click Cancel to exit.

The Design Page sizes 130×300 mm, 300×130 mm, 100×172 mm, and 172×100 mm, indicated by "*", are used to embroider multi-position designs using a special embroidery frame attached to the sewing machine at three installation positions. Check that that you have the multi-position embroidery frame and that these multi-position designs can be embroidered using your sewing machine.

See also: "Select System Unit" on page 196

Select Color Arrangement

Purpose: Changes the order of the colors in the Thread Color Dialog.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

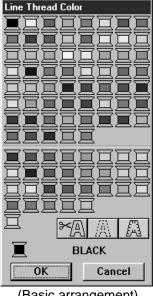
Operation:

1 From the menu, click **Option**, then **Select Color Arrangement**. A dialog similar to this will display.

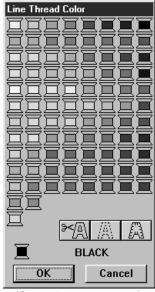


Quik Reference

Basic arrangement: Basic Color and Optional Color displays are separated. Sorted arrangement: Basic Color and Optional Color displays are mixed together.







(Sorted arrangement)

NOTE:

When Basic arrangement is selected

The colors in the top half of the dialog are Basic Color. On sewing machines that can display color names, the selected color name will be displayed as shown in the dialog. (In the dialogs and other displays in this application, the color name is displayed in uppercase letters.)

The colors in the bottom half of the dialog are Optional Color. On sewing machines that can display color names, the name of the closest Basic Color will be displayed. (In the dialogs and other displays in this application, the color name is displayed in lowercase letters with a number; for example, "blue2." In this case, "BLUE" will be displayed on the sewing machine.)

When Sorted arrangement is selected

Basic Color and Optional Color are mixed together, so use the uppercase/lowercase color name display to distinguish between them.

See also: "Color" on page 143

Select System Unit

Allows you to select the unit of length (mm or inch). Purpose:

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Option, then Select System Unit.

This dialog will appear.



- Select the unit (mm or inch).
- Click **OK** to confirm.
- Click Cancel to exit.

See also: "Grid Setup" on page 189, "Design Page Property" on page 195

Help Menu

The **Help** menu gives you access to the on-screen help information system.

Contents	Starts the on-screen help information for this application.	page 197
Using	Explains how to use the on-screen help system.	page 197
Customer support	Opens the FAQ (Frequently Asked Questions) page in this company's homepage.	page 197
About Layout & Editing	Gives information about the version of this application.	page 198

Contents

Purpose: Starts the on-screen help information for this application.

Shortcut key: F1

Toolbar: No button for this function

Operation:

1 Click Help, then Contents.

A table of contents of the on-screen help information displays.

2 Refer to your Windows manual for the next operation.

See also: "Using" below, "About Layout & Editing" on page 198

Using

Purpose: Explains how to use the on-screen help system.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

① Click Help, then Using.

The Windows standard explanation about how to use the help system appears.

2 Refer to your Windows manual for the next operation.

See also: "Contents", "About Layout & Editing" below

Customer support

Purpose: Opens the **FAQ** (Frequently Asked Questions) page in this company's homepage.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Help, then Customer support from the menu.

2 The browser installed in the computer will start, and open the FAQ page of this company's homepage.

NOTE:

This function cannot be used if there is no internet browser correctly installed in the computer.

About Layout & Editing

Purpose: Gives information about the version of this application.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Help, then About Layout & Editing. A dialog will display.

2 Click **oK** to remove it.

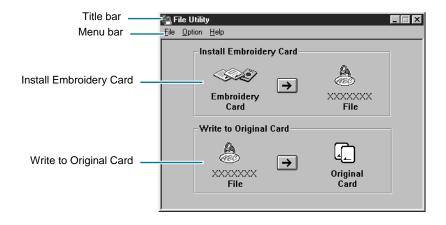
See also: "Contents" and "Using" on page 197

File Utility

File Utility has two functions:

- ◆ Install Embroidery Card: Transfers embroidery data from an embroidery card to your hard disk or to another disk.
- ◆ Write to Original Card: Transfers embroidery data files created with Layout & Editing to an original card

The Screen



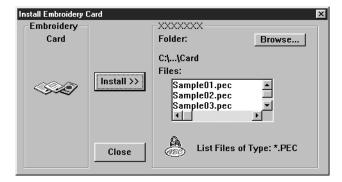
Menu bar	Gives access to the functions.
Install Embroidery Card	Click the arrow button in this area to start the card reading process.
Write to Original Card	Click the arrow button in this area to start the card writing process.

Install Embroidery Card

Operation

To transfer embroidery data from an embroidery card to your hard disk, proceed as follows:

Click the arrow button in the Install Embroidery Card area. An Install Embroidery Card dialog similar to this displays.



- ◆ The current folder and the *.PEC files it contains are shown.
- ◆ Click **Browse** to change the folder.
- Click Install to install the data in the current folder.
- Click Close to remove the dialog from the screen.

2 If you click Browse, this dialog will display.



- Select the drive and folder. If necessary, type a new folder name.
- Click OK to confirm the new folder and return to the Install Embroidery Card dialog. (If the folder is new, a message will inform you that the folder is going to be created. Click OK to remove the message.)
- Click Cancel to return to the Install Embroidery Card dialog without changing the folder.
- 3 When you click **Install** on the **Install Embroidery Card** dialog, you are asked to enter a prefix for the file.

The resulting file name will be made of the characters that you input here (the prefix), followed with the three digits. The file name extension **PEC** will be added automatically.



- Type a name for the file.
- ◆ Click **oK** to start.
- Click Cancel to return to the Install Embroidery Card.

4 If you don't type anything, this message will appear.



 Click **OK** to remove the message and return to the previous dialog.

6 When you click **OK** on the **Prefix Setting** dialog with a valid prefix, this message displays.



- Check that the card module is connected and powered, and that a card is inserted. If necessary, connect the module and its power adaptor, and insert a card.
- Click OK to start installing.
- ◆ Click Cancel to exit.

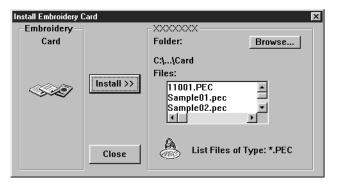
Note that it is better to switch your computer off before connecting any peripheral.

- 6 If the card module is ready and no problems are detected, the application starts transferring the data from the card to the specified folder. The application informs you that the transfer is in progress.
- Wait until the transfer is completed.
 When the transfer is complete, the Installation is completed message displays.



◆ Click **OK** to remove the message.

8 The Install Embroidery Card dialog reappears, showing the new file.

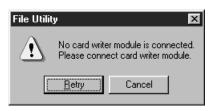


- ◆ Check that the new file appears in the Files box.
- Click Close to remove the dialog from the screen.

Error Messages

The application is able to detect problems that may occur before or during data transfer. Here is the complete list of error messages that may appear.

If the card module is not correctly connected:



- Correct the connection between the card module and the computer. Check that the module is powered.
- Click Retry to start reading.
- Click Cancel to exit.

If there is no card in the card module:



- Insert a Embroidery card in the module.
- Click **Retry** to start reading.
- Click Cancel to exit.
- 3 If an incorrect or defective card is inserted:



- Insert another Embroidery card in the module.
- Click Retry to start reading.
- Click Cancel to exit.
- 4 If a defect is detected after reading has already started, or if you remove the card while reading is in progress, reading will stop and this message will display:



Click **OK** to remove the message.

You should never remove a card while the red indicator light in on. If you do so, you will have to restart the operation from the start.

If you did not remove the card and the above message appears, then the card is defective or was not well inserted. Reinsert the card correctly and try reading again. If you get the same message, then the card is defective. Try with another card.

File Utility

6 If the data cable between the card module and the computer or the power adaptor is disconnected while reading is in progress, reading will stop and this message will display:



◆ Click **OK** to remove the message.

Check all the connections and correct as necessary, then try again from the start. If the connections are correct, then a cable may be defective. Consult your dealer.

6 When every COM port is already in use for other peripherals, the following message appears.



- Click Retry to start reading.
 - Click Cancel to remove the message.

Disconnect a peripheral connected to your computer and try again.

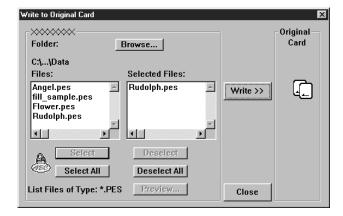
Writing to an Original Card

IMPORTANT: If you are using our company's scanner system, use two separate sets of original cards: one for the scanner system, and one for this system.

Operation

To transfer an embroidery file that you have created or edited with Layout & Editing to an original card, proceed as follows:

Click the arrow button in the Write to Original Card area.
The application will first check that there is no problem with the card module and the card inserted.
If no problem is detected, a Write to Original Card dialog similar to this displays.



 As you select a file to be transferred to the card, its file name moves to the list on the right. However, if the available space on the card is not sufficient, the file is not selected, and this message appears:



The same message appears when you click Select All and there is not enough space on the card. Click OK to remove the message and try with other file(s).

- ◆ The current folder and the *.PES files it contains are shown.
- Click a file name in the left file box, then click Select. You can repeat this step to select more than one file.
- Click Select All to select all files in the folder.
- To deselect a file, click its file name in the right file box, then click Deselect.
- To deselect all selected files, click Deselect All.
- Click a file name, then click Preview to see the embroidery image. Click OK to remove the preview.
- Click Browse to change the folder.
- Click Write to write the selected file(s) to the card.
- Click Close to remove the dialog from the screen.

Quik Reference

2 If you click Browse, this dialog will display.



- Select the drive and folder.
- Click OK to confirm the new folder and return to the Write to Original Card dialog.
- Click Cancel to return to the Write to Original Card dialog without changing the folder.
- When you click Write on the Write to Original Card dialog, you are asked whether you want to delete existing data on the card.

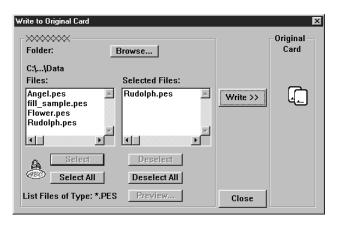


- Click OK if you want to write the selected files and delete old data from the card.
- If you do not want to delete old files on the card, click Cancel to exit.
- The application starts transferring the selected files to the card and informs you that the transfer is in progress.
- Wait until the transfer is completed.
 When the transfer is completed, the Writing is Complete message displays.



◆ Click **OK** to remove the message.

6 The Write to Original Card dialog reappears.



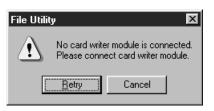
 Click Close to remove the dialog from the screen, or select other files to transfer.

File Utility

Error Messages

The application is able to detect problems that may occur before or during data transfer. Here is the complete list of error messages that may appear.

1 If the card module is not correctly connected:



- Correct the connection between the card module and the computer.
 Check that the module is powered.
- Click Retry to start reading.
- Click Cancel to exit.

2 If there is no card in the card module:



- Insert an Original card in the module.
- ◆ Click Retry to start reading.
- ◆ Click Cancel to exit.

3 If a read-only card is inserted:



- Insert an Original card in the module.
- ◆ Click Retry to start reading.
- Click Cancel to exit.
- 4 If an incorrect or defective card is inserted:



- Insert an Original card in the module.
 - Click Retry to start reading.
- Click Cancel to exit.
- **6** If a defect is detected after writing has already started, or if you remove the card while writing is in progress, writing will stop and this message will display:



◆ Click **OK** to remove the message.

You should never remove a card while the red indicator light in on. If you do so, you will have to restart the operation from the start.

If you did not remove the card and the above message appears, then the card is defective or was not well inserted. Reinsert the card correctly and try writing again. If you get the same message, then the card is defective. Try with another card.

6 If the data cable between the card module and the computer or the power adaptor is disconnected while writing is in progress, writing will stop and this message will display:



◆ Click **oK** to remove the message.

Check all the connections and correct as necessary, then try again from the start. If the connections are correct, then a cable may be defective. Consult your dealer.

• When every COM port is already in use for other peripherals, the following message appears.



- Click Retry to start reading.
- Click Cancel to remove the message.

Disconnect a peripheral connected to your computer and try again.

Others

There is no sewing data in file: <file>

(Cause) You select the file without sewing data.

(Remedy) Select the another file with sewing data. Refer to Layout & Editing.

Error PES format file: <file>

(Cause) Selected PES file is saved with invalid data.

(Remedy) Select the another file.

Selected file requires a New Card Reader/Writer box.

Please replace your Card Reader/Writer box at your dealer.

(Cause) You tried to write a design exceeding the 130 × 180 mm size to a card using an old Card Reader/Writer box (VER.A).

(Remedy) Designs larger than 130 × 180 mm can only be written to a card using the new version of the Card Reader/Writer box (VER.B). Inquire about the new version at your nearest dealer.

This Original Card requires a New Card Reader/Writer box.

Please replace your Card Reader/Writer box at your dealer.

(Cause) You tried to use an old Card Reader/Writer box (VER.A) to write a design to a new original card.

(Remedy) Only the new Card Reader/Writer box (VER.B) can be used to write designs to the new original cards. Inquire about the new version at your nearest dealer.

Using the Menu Bar

File Menu

The File menu is used only to exit this application.

Exit

Purpose: Exits the application.

Shortcut key: Alt

(Alt) + (F4)

Operation:

Click File, then Exit.

The application closes immediately.

Option Menu

The Option menu is used only to set up the serial port.

Serial Port Setting

Purpose: Allows you to set up the computer serial port connection to the card writer module.

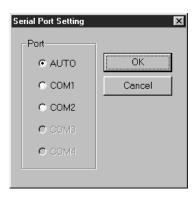
Shortcut key: No shortcut key for this function

Operation:

1 Click Option, then Serial Port Setting.

A **Serial Port Setting** dialog similar to this one displays.

The number of **COM** ports selectable depends on your computer settings.



- When the default setting AUTO is selected, the COM port to which the card writer module is connected is automatically recognized.
- When COM 1 4 is selected, the data is sent to the selected COM port. Check the port to which your card writer module is connected, then select the appropriate COM port.
- ◆ Click **oK** to confirm.
- ◆ Click Cancel to exit.

About Card Writer Module

Purpose: Checks the version of the connected Card Writer Module.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 From the menu, click Option, then About Card Writer Module.

The program communicates with the Card Writer Module to receive the version information, and shows the results in a dialog like the one below.



If the Card Writer Module is not connected, this function can not be used, so be sure to connect the module before selecting the function from the menu.

Function Limitations According to Different Card Writer Module Versions

Function		I	II
Module version	Α	NO	NO
	В	YES	YES

- I. Function for writing to card or reading from a card pattern data from a Design Page size of $160 \text{ mm} \times 260 \text{ mm}$ (pattern size larger than $130 \text{ mm} \times 180 \text{ mm}$).
- II. Function for writing pattern data to a new original card.

Please take note that there are some limitations in the Card Writer Module functions, according to the version.

For Ver. 4 of this software, the Card Writer Module is Version B. (The Card Writer Module included with Versions 1.0 through 3.0 is Version A.

Help Menu

The **Help** menu gives you access to the on-screen help information system.

Contents	Starts the on-screen help information for this application.	page 209
Using	Explains how to use the on-screen help system.	page 210
Customer support	Opens the FAQ (Frequently Asked Questions) page in this company's homepage.	page 210
About File Utility	Gives information about the version of this application.	page 210

Contents

Purpose: Starts the on-screen help information for this application.

Shortcut key: F1

Operation:

1 Click Help, then Contents.

A table of contents of the on-screen help information displays.

2 Refer to your Windows manual for the next operation.

See also: "Using" and "About File Utility" below

Using

Purpose: Explains how to use the on-screen help system.

Shortcut key: No shortcut key for this function

Operation:

① Click Help, then Using.

The Windows standard explanation about how to use the help system appears.

Refer to your Windows manual for the next operation.

See also: "Contents" on page 209, "About File Utility" below

Customer support

Purpose: Opens the **FAQ** (Frequently Asked Questions) page in this company's homepage.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Help, then Customer support from the menu.

2 The browser installed in the computer will start, and open the FAQ page of this company's homepage.

NOTE:

This function cannot be used if there is no internet browser correctly installed in the computer.

About File Utility

Purpose: Gives information about the version of this application.

Shortcut key: No shortcut key for this function

Operation:

1 Click Help, then About File Utility.

A dialog will display.

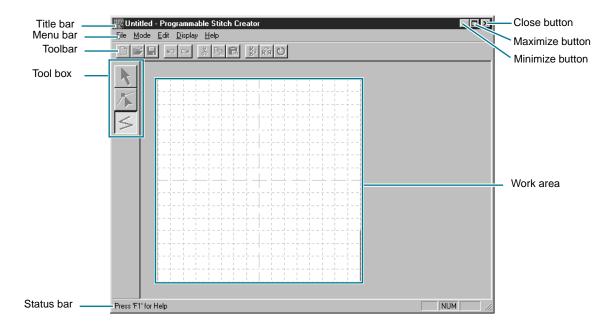
2 Click ok to remove it.

See also: "Contents" on page 209, "Using" above

Programmable Stitch Creator

This application allows you to design your own fill stitch patterns, which you can set as sewing attributes to enclosed regions of patterns, both in Design Center and Layout & Editing. The fill stitch patterns fill the regions in a tile-like manner, resulting in particularly decorative embroidery patterns. You may create your own fill stitch patterns or use the many stitches delivered with this application with or without editing them. This application also allows you to design patterns for motif sewing. You can use Layout & Editing to apply line stitch or fill stitch sewing attributes, or you can use Design Center to apply fill stitch attributes to the motif pattern.

The Screen



Menu bar	Gives access to the functions.
Toolbar	Shortcut for the menu functions.
Tool box	Used to select and create fill stitch patterns.
Status bar	Provides short information.

Using the Tool Box

K	Sets the cursor in select mode. Cursor shape:	page 212
1	Sets the cursor in point edit mode. Cursor shape:	page 213
5	Sets the cursor in line drawing mode. When you start the application, the drawing mode is active by default. Cursor shape: with a miniature of the tool button	page 215

Selection Mode

The cursor selection mode is used to select one or more lines. Once a line is selected, you can move it, scale it, and change its direction by rotating it or inverting it.

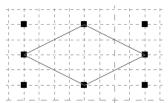
Selecting lines

1 Click



2 Click the line that you want to select.

You know that the line is selected when handles are displayed.



A pattern will not be selected if you do not click on a part of it.

- 3 To deselect the line, select another one, click on an empty space or click another button of the Tool Box.
- 4 To select an additional line, click that line while holding the **Shift** key down.

NOTE:

You can also select lines by dragging the cursor across the Work Area. As you drag, a dotted rectangle appears. When you release the mouse button, all lines that are completely contained in that rectangle will be selected.

If other lines that you did not want selected are selected, click on an empty space to deselect all lines, and then start again.

Moving lines

Move the cursor over a selected pattern or group of selected patterns.

The shape of the cursor will change to (1).

2 You can now drag the pattern to another location. Holding down the (Shift) key while dragging the line moves the line horizontally or vertically. NOTE:

Pressing the up, down, left, or right arrow keys will move the line one grid space each time the key is pressed. If the grid is not displayed, the line moves the distance of the smallest grid space in the direction shown on the key.

Scaling lines

1 Move the cursor over one of the handles of a selected line or group of selected lines.

2 Drag the handle in the direction of the arrow to scale the pattern.

→ is for scaling the width.

is for scaling the height.

and are for scaling both dimensions at the same time.

Point Edit Mode

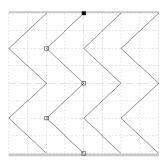
The point edit mode allows you to move, insert and delete points of a stitch pattern.

The points you move or insert are positioned at the intersection of the horizontal and vertical lines of the grid. So, regardless on where you drag a point to or insert a point on the line, it will automatically position itself at the nearest intersection.

Depending on the stitch you want to create, you may need to select a different working grid. For more information on the grids and on how to select them, refer to "Grid" on page 226.

Moving points

2 Click the broken line that you want to edit. You can only select one broken line at a time. The existing points of the selected broken line are marked with small empty squares.



3 Click the point that you want to move.

To select an additional point, click that point while holding the **Shift** key down. You may also click and drag the cursor over the area which includes all the points that you want to select. When you release the mouse, the points included in that area are selected.

The selected points are marked by filled squares.

NOTE:

If you click on the line instead of a square, a new point is inserted.

Pressing $(Ctrl) + \rightarrow or \leftarrow will move the selection to the previous or next point in a line.$

4 Drag the cursor to a new position. All the selected points move in the same direction.

Holding down the **Shift** key while dragging the point moves the point horizontally or vertically.

NOTE:

Pressing the up, down, left, or right arrow keys will move the point one grid space each time the key is pressed. If the grid is not displayed, the point moves the distance of the smallest grid space in the direction shown on the key.

When in Motif Mode, if you move the start point (blue rectangle) or the end point (red rectangle) up or down, the other point will automatically move up or down. Also, the start and end points can not be moved closer than a certain fixed distance.

Inserting points

- 2 Click the broken line that you want to edit. You can only select one broken line at a time. The existing points of the selected broken line are marked with small empty squares.
- 3 Click where you want to insert a new point on the broken line.

 A new point appears, marked by a filled black square. The new point can be edited.

Deleting points

- ① Click on the Tool Box. The shape of the cursor changes to when you move it over the Work page.
- 2 Click the broken line that you want to edit. You can only select one broken line at a time. The existing points of the broken line are marked with small empty squares.
- 3 Click the point that you want to delete.

 To select an additional point, click that point while holding the **Shift** key down. The selected points are marked by filled squares.
- 4 Press the **Delete** key to remove the selected points from the outline. If the point is composed of a single line, the line is deleted.

NOTE

When in Motif Mode, the start point (blue rectangle) and end point (red rectangle) can not be deleted.

Layout & Editing

Line Drawing Mode

The line drawing mode allows you to draw broken lines to create your stitch pattern. A broken line is made of one or more contiguous straight lines, the ending point of a straight line being the starting point of the next one.

The horizontal and vertical lines that you draw on the work area always follow the grid. The points you create by clicking the mouse are inserted at the intersection of the horizontal and vertical lines of the grid, enabling you to draw diagonal lines as well. So, regardless of where you click, a point will automatically be inserted at the nearest intersection.

Depending on the stitch pattern you want to draw, you may need to select a different working grid. For more information on the grids and on how to select them, refer to "Grid" on page 226.

Drawing a broken line

- ① Click on the Tool Box. When you move it over the Work page, the cursor changes to is displayed together with a small image of the tool button.
- 2 Move the mouse to the starting point of your broken line and click.
- 3 Move the mouse to the ending point of the first straight line and click again. NOTE:

You can always remove the last-entered point by clicking the mouse's right button.

Repeat until you arrive at the last end point. At that point double-click.
Repeat the whole procedure if you want to include other broken lines in a stitch pattern.

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Using the Menu Bar

File Menu

The File menu allows you to execute commands regarding the files, such as opening and saving.

New	Creates a new blank work area.	page 216
Open	Opens a previously saved programmable stitch file.	page 216
Template Open	Opens a background image file that can be used as a guide to draw a new pattern for Programmable Fill and Motif.	page 218
Save	Saves your work area on the disk.	page 218
Save As	Saves the current stitch pattern under a new file name.	page 219
Exit	Exits the application.	page 219

New

Purpose: Creates a new blank work area.

Shortcut key: Ctrl + N

Toolbar:

Operation:

- Click File, then New.
 - If the current work area is not edited, a new blank work area appears immediately.
- ② If the current work area is edited, you will be asked whether you want to save the changes, for example:



- ◆ Click Yes to save the work area first.
- ◆ Click No to abandon the work area.
- Click Cancel to do anything else (for example, modify the current work area or saving it with another file name).

A new blank work area appears.

See also: "Open", "Save" and "Save As" in this section

Open

Purpose: Opens a previously saved programmable stitch file.

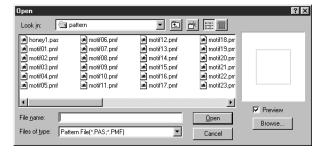
Shortcut key: Ctrl + O

Toolbar:

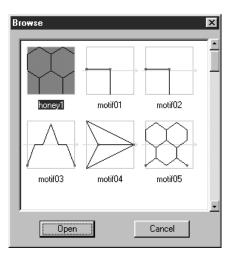
Operation:

1 Click File, then Open.

A Open dialog similar to this will display.



- Select the drive, the folder and the file name.
- Be sure the folder you select contains pas or pmf files.
- If the Preview check box is checked, the content of the selected file displays in the preview window.
- ◆ Click **Open** or double-click the file name to open the file in the work area.
- Click Browse to preview all the available pas or pmf files in the selected folder.
- Click Cancel to exit.
- When you click Browse, the Browse dialog opens.



- ◆ Browse through the files with the help of the scroll bar.
 A green → in the middle of the pattern display area shows that this is data for Motif (*.pmf). Otherwise, the data is for
- Select a stitch pattern by clicking on it.
 The selected pattern is highlighted.

Programmable Fill (*.pas).

- Double-click the selected pattern or click Open to open the file and to close both the Open and the Browse dialogs. The mode will automatically change to match the selected pattern (pas or pmf).
- Click Cancel to go back to the Open dialog.
- The selected file opens immediately if your current work area is not edited.
 If the current work area is edited, you will be asked whether you want to save the changes.



- ◆ Click Yes to save the work area first.
 - Click No to abandon the work area.
- Click Cancel to do anything else (for example, modifying the current work area or saving it with another file name).
- 4 The edited stitch pattern is now saved and the selected file opens.

See also: "New", "Save" and "Save As" in this section

Template Open

Purpose: Opens a background image file that can be used as a guide to draw a new pattern

for Programmable Fill and Motif.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

Click File, then Template Open.
An Open Template dialog similar to this will display.



- Select the drive, the folder and the file name.
- If the Preview check box is checked, the content of the selected file displays in the Preview window.
- Click Open to open the file. The following file formats can be opened: Windows BMP (*.bmp), Exif (*.tif, .jpg), ZsoftPCX (.pcx), Windows Meta File (*.wmf), Portable Network Graphics (*.png), Encapsulated PostScript (*.eps), Kodak PhotoCD (*.pcd), FlashPix (*.fpx).

NOTE:

For pcd and fpx files that are saved on many pages, only the first page can be opened. Tif files that have used LZW compression can not be opened.

- Double-clicking the file name will also open the file and close the dialog.
- Click Cancel if you want to exit the function.

See also: "Template-On, Faded, Off" on page 227

Save

Purpose: Saves your work area on the disk.

Shortcut key: (Ctrl) + (S)

Toolbar:

Operation:

1 Click File, then Save.

If the file already exists on the disk (the file has been saved at least once), the file is saved immediately.

2 If the file name is still Untitled, if it is one of the "Read Only" pas or pmf files which come with this application or if, for any other reason, the file cannot be found on the disk, the application automatically switches to Save As.

See also: "Save As" on page 219

Alphabetic Index

Purpose: Saves the current stitch pattern under a new file name.

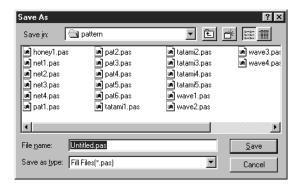
Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

Click File, then Save As.

A Save As dialog similar to this will display.



- Select the drive, the folder and type the file name.
- The file extension is automatically set to match the Mode setting.
 When Mode = Fill: *.pas
 When Mode = Motif: *.pmf
 - Click Save to save.
- Click Cancel to exit.

If the new file name already exists, this dialog will appear.



- Click Yes to overwrite.
- Click No if you do not want to overwrite the existing file.

See also: "Save" above

Exit

Purpose: Exits the application.

Shortcut key: Alt + F4

Toolbar: No button for this function

Operation:

1 Click File, then Exit.

If the current stitch pattern is not edited, the application closes immediately.

2 If the current stitch pattern is edited, you will be asked whether you want to save the changes.

See also: "Save" on page 218 and "Save As" above

Mode Menu

You can use Programmable Stitch Creator to create patterns for Programmable Fill, and patterns for Motif Fill or Motif Line. However, the method and Work Area are different for each. Use this mode menu to make the setting for which pattern you will create.

Purpose: Changes the Mode for creating data.

Shortcut key: No shortcut key for this function.

Toolbar: No button for this function

Operation:

- 1 From the menu, click Mode, then select the heading that matches the pattern you want to create.
 - ◆ Click Fill: the mode changes to create a pattern for Programmable Fill.
 - ◆ Click Motif: the mode changes to create a pattern for Motif.
- ② If the current work area is edited, you will be asked whether you want to save the changes, for example:

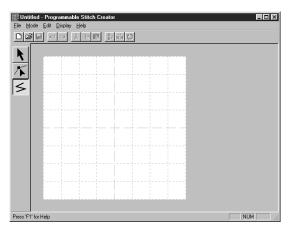


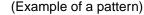
- Click Yes to save the work area Page first.
- Click No to abandon the work area.
- Click Cancel to do anything else (for example, modify the current Design Page or saving it with another file name).

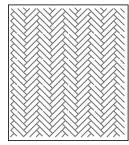
Fill Mode

In Fill Mode, you can make a pattern out of one line or many lines.

In the tool box, there is a selection mode tool, a point edit mode tool, and a line drawing mode tool. Using these tools, you can freely input and edit lines in the Work Area to create your pattern. The sewing method for Programmable Fill is different from the regular Fill, where the thread is constantly sewn in a set direction. Instead, the pattern will be sewn in such a way that the needle drops directly over the created pattern.







Motif Mode

In Motif Mode, you can create outline patterns efficiently using just one line.

In the center of the Work Area, a green arrow is displayed, showing the direction that the pattern (stitch) will be sewn.

Also, in the center of the left edge of the box, there is blue rectangle, that shows the start point. In the center of the right edge of the screen there is a red rectangle that shows the end point. These points are connected by a line.

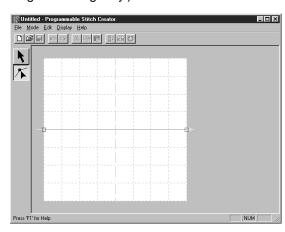
The selection tool and the point edit tool are in the tool box. Using the line already shown, you can create a pattern by inserting points, moving, or editing the line in other ways.

You can not delete the start or end points. Also, the points must be in the same up/down position, so if you move one point up or down, the other point will automatically move the same.

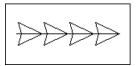
The sewing method for these patterns is done with the efficiency of outline patterns, like created patterns.

(You can use \bigcirc to check the order of the points.)

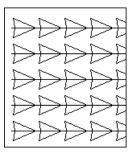
Also, you can set these patterns to be sewn for Line sewing or Region sewing. (In Design Center, Region sewing only.)



(Example of a pattern)
Line sewing



Region sewing



Undo		Undoes the last operation.	page 222
Redo		Cancels the effect of the last Undo.	page 222
Cut		Removes the selected line(s) from the screen while saving a copy in the clipboard.	page 223
Сору		Saves the selected line(s) in the clipboard without removing them from the screen.	page 223
Duplicate		Makes a copy of the selected line(s).	page 223
Paste		Pastes the lines of the clipboard on the screen.	page 223
Delete		Removes the selected line(s) from the screen without saving them in the clipboard.	page 224
Mirror	Holizontal	Flips the selected line(s) up/down.	page 224
IVIIIIOI	Vertical	Flips the selected line(s) left/right.	page 224
Rotate		Allows you to manually rotate the selected line(s) by an arbitrary angle.	page 224
Select All		Selects all the patterns.	page 225

Undo

Purpose: Undoes the last operation.

Shortcut key: Ctrl + Z

Toolbar:

Operation:

1 Click Edit, then Undo.

The last operation is automatically undone. For example, if you have mistakenly deleted a line, this function will make it reappear.

See also: "Redo" below

Redo

Purpose: Cancels the effect of the last Undo.

Shortcut key: Ctrl + A

Toolbar:

Operation:

1 Click Edit, then Redo.

The effect of the last **Undo** is canceled. For example, if you have used **Undo** just after drawing a line, the line is deleted. Using **Redo** will make the line reappear.

See also: "Undo" above

Purpose: Removes the selected line(s) from the screen while saving a copy in the clipboard.

Shortcut key: Ctrl + X

Toolbar: D译用 na 基面 Bi 原 D

Operation:

Cut

Select one or more lines.

2 Click Edit, then Cut.

The selected lines disappear. Since they are saved in the clipboard, you can paste them back using **Edit - Paste**.

See also: "Copy", "Paste" below, "Delete" on page 224

Сору

Purpose: Saves the selected line(s) in the clipboard without removing them from the screen.

Shortcut key: Ctrl + C

Toolbar: DG日 ロロ X 画画 B原で

Operation:

Select one or more lines.

2 Click Edit, then Copy.

The patterns are copied into the clipboard and are ready to be pasted.

See also: "Cut" above, "Duplicate" and "Paste" below

Duplicate

Purpose: Makes a copy of the selected line(s).

Shortcut key: Ctrl + D

Toolbar: No button for this function

Operation:

1 Select one or more lines.

2 Click Edit, then Duplicate.

A copy of the lines appears on the screen.

See also: "Copy" above and "Paste" below

Paste

Purpose: Pastes the lines of the clipboard on the screen.

Shortcut key: Ctrl + V

Toolbar:

Operation:

1 Click Edit, then Paste.

The lines saved in the clipboard (using Cut or Copy) are pasted on the screen.

See also: "Cut", "Copy" and "Duplicate" above

Delete

Purpose: Removes the selected line(s) from the screen without saving them in the clip-

board.

Shortcut key: Delete

Toolbar: No button for this function

Operation:

Select one or more lines.

2 Click Edit, then Delete.

The selected line(s) are removed from the screen. Since they are not saved in the clipboard, the only way to make them reappear is to use **Edit - Undo**.

See also: "Undo" on page 222 and "Cut" on page 223

Mirror – Horizontal

Purpose: Flips the selected line(s) up/down.

Shortcut key: Ctrl + H

Toolbar:

Operation:

Select one or more lines.

2 Click Edit, then Mirror, then Horizontal.

The selected line(s) are replaced by their horizontal mirror image (top and bottom inverted). Two successive applications of this function restores the original image.

See also: "Mirror – Vertical" and "Rotate" below

Mirror – Vertical

Purpose: Flips the selected line(s) left/right.

Shortcut key: (Ctrl) + (J)

Toolbar:

Operation:

Select one or more lines.

2 Click Edit, then Mirror, then Vertical.

The selected line(s) are replaced by their vertical mirror image (left and right inverted). Two successive applications of this function restores the original image.

See also: "Mirror – Horizontal" above and "Rotate" below

Rotate

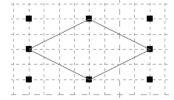
Purpose: Allows you to manually rotate the selected line(s) by an arbitrary angle.

Shortcut key: Ctrl + Y

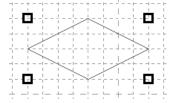
Toolbar: DA MA MA MA DA MA D

Operation:

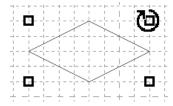
Select one or more patterns.



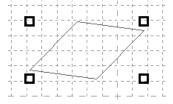
2 Click Edit, then Rotate. The shape of the handles changes.



3 Move the cursor to one of the handles. The shape of the cursor changes.



Trag the handle to rotate the pattern the desired angle, and then release the mouse button.



A simple dragging of the mouse will rotate the line by 1 degree increments. Pressing the Shift key will rotate it by 15 degree increments.

Select All

Purpose: Selects all the patterns.

Shortcut key: (Ctrl) + (E)

Toolbar: No button for this function

Operation:

- Make sure that the cursor must be in Selection mode.
- 2 Click Edit, then Select All.

Display Menu

Grid	Selects the work grid.	page 226
Template-On, Faded, Off	Turns on or off the template image or displays it faded.	page 227
Preview	Turns the repeating image display of the pattern being created on/off.	page 227
Toolbar	Turns the Toolbar on/off.	page 227
Status bar	Turns the Status bar on/off.	page 228

Grid

Purpose: Selects the work grid.

Shortcut key: No shortcut key for this function.

Toolbar: No button for this function

Operation:

1 Click Grid. The selected grid is preceded by a radio button.

2 Click the grid setting you need for the stitch pattern that you are creating or editing. You can also switch grids while you are working on a stitch pattern, then continue drawing.

Click Wide: The grid step changes to 1/8 of a work area's side.

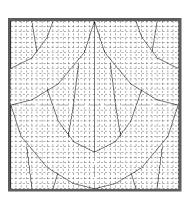
Click **Medium**: The grid step changes to 1/16 of a work area's side.

Click Narrow: The grid step changes to 1/32 of a work area's side.

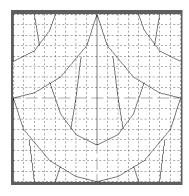
Click **None**: The grid disappears.

The grid setting will be saved when the application is turned off, so when the application is turned on the next time, the same settings will be applied.

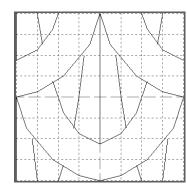
Example 1: Narrow grid



Example 2: Medium grid



Example 3: Wide grid



The horizontal and vertical lines that you draw on the work area always follow the grid. The points you create by clicking the mouse are inserted at the intersection of the horizontal and vertical lines of the grid, enabling you to draw diagonal lines as well. Regardless of where you click, a point will automatically be inserted at the nearest intersection.

Select a different work grid according to the type of stitch you want to draw. Select a narrower grid for drawing finer details or to give curve-like or circle-like looks to your stitch lines and select a wider grid if you want to draw a simpler stitch pattern.

Template-On, Faded, Off

Turns on or off the template image or displays it faded. Purpose:

Shortcut key: (**F6**)

Toolbar: No button for this function

Operation:

- 1 Click Display, then Template, then select the desired setting.
 - ◆ Click On to display the original image.
 - Click Faded to fade the image before displaying it.
 - Click Off to hide the image.

This function is not available if a template image is not open. Press the shortcut key to switch between displaying the template image to displaying it faded to hiding the image.

See also: "Template Open" on page 218

Preview

Turns the repeating image display of the pattern being created on/off. Purpose:

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Display, then Preview.

If the Preview dialogue was not displayed, the Preview dialogue matching the mode setting will be displayed, as shown in the examples below.







(Mode = Motif)

When the application is turned off, the Preview dialog display's On/Off condition and the display position will be saved, so the next time the application is opened the same conditions will be shown.

Toolbar

Purpose: Turns the Toolbar on/off.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Display, then Toolbar.

The Toolbar will be toggled on/off.

See also: "Status bar" on page 228

Alphabetic Index

Status bar

Purpose: Turns the Status bar on/off.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

① Click Display, then Status Bar.

The Status Bar will be toggled on/off.

See also: "Toolbar" on page 227

Help Menu

The **Help** menu gives you access to the on-screen help information system.

Contents	Starts the on-screen help information for this application.	page 228
Using	Explains how to use the on-screen help system.	page 228
Customer support	Opens the FAQ (Frequently Asked Questions) page in this company's homepage.	page 229
About Programmable Stitch Creator	Gives information about the version of this application.	page 229

Contents

Purpose: Starts the on-screen help information for this application.

Shortcut key: F1

Operation:

1 Click Help, then Contents.

A table of contents of the on-screen help information displays.

2 Refer to your Windows manual for the next operation.

See also: "Using" below and "About Programmable Stitch Creator" on page 229

Using

Purpose: Explains how to use the on-screen help system.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

1 Click Help, then Using.

The Windows standard explanation about how to use the help system appears.

Refer to your Windows manual for the next operation.

See also: "Contents" above and "About Programmable Stitch Creator" on page 229

Customer support

Purpose: Opens the **FAQ** (Frequently Asked Questions) page in this company's homepage.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

1 Click Help, then Customer support from the menu.

2 The browser installed in the computer will start, and open the FAQ page of this company's homepage.

NOTE:

This function cannot be used if there is no internet browser correctly installed in the computer.

About Programmable Stitch Creator

Purpose: Gives information about the version of this application.

Shortcut key: No shortcut key for this function

Toolbar: No button for this function

Operation:

1 Click Help, then About Programmable Stitch Creator. A dialog will display.

2 Click **OK** to remove it.

See also: "Contents" and "Using" on page 228

Color Palette

Basic color only

Black	White	Red	Pink	Deep Rose	Flesh Pink	Dark Fuchsia	Vermilion
Carmine	Royal Purple	Magenta	Salmon Pink	Amber Red	Lemon Yellow	Yellow	Harvest Gold
Orange	Pumpkin	Tangerine	Cream Brown	Cream Yellow	Khaki	Deep Gold	Brass
Linen	Dark Brown	Reddish Brown	Gray Brown	Beige	Warm Gray	Russet Brown	Light Brown
Sea Crest	Mint Green	Leaf Green	Olive Green	Dark Olive	Teal Green	Emerald Green	Deep Green
Fresh Green	Lime Green	Moss Green	Blue	Ultra	Light Blue	Sky Blue	Electric Blue
Peacoc Blue	Prussia Blue	Corn	Light Lilac	Lilac	Violet	Purple	Lavender
Wisteria Violet	Pewter	Dark Gray	Silver	Gray			
Not Defined							

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