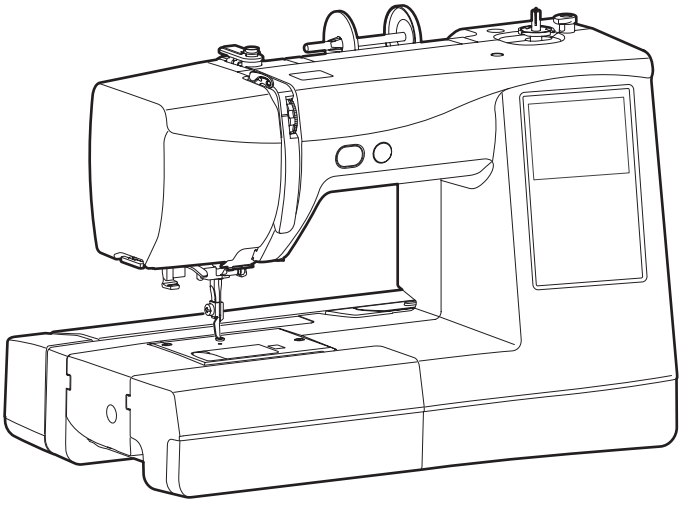
Instruction Book

Memory Craft 100E



IMPORTANT SAFETY INSTRUCTIONS

When using an electrical appliance, basic safety precautions should always be followed, including the following:

This sewing machine is designed and manufactured for household use only.

Read all instructions before using this sewing machine.

DANGER— To reduce the risk of electric shock:

1. An appliance should never be left unattended when plugged in. Always unplug this sewing machine from the electric outlet immediately after using and before cleaning.

WARNING— To reduce the risk of burns, fire, electric shock, or injury to persons:

1. Do not allow to be used as a toy. Close attention is necessary when this sewing machine is used by or near children.
2. Use this appliance only for its intended use as described in this owner's manual. Use only attachments recommended by the manufacturer as contained in this owner's manual.
3. Never operate this sewing machine if it has a damaged cord or plug, if it is not working properly, if it has been dropped or damaged, or dropped into water. Return this sewing machine to the nearest authorized dealer or service center for examination, repair, electrical or mechanical adjustment.
4. Never operate the appliance with any air opening blocked. Keep ventilation openings of this sewing machine and foot controller free from accumulation of lint, dust and loose cloth.
5. Never drop or insert any object into any opening.
6. Do not use outdoors.
7. Do not operate where aerosol (spray) products are being used or where oxygen is being administered.
8. To disconnect, turn all controls to the off ("O") position, then remove plug from outlet.
9. Do not unplug by pulling on cord. To unplug, grasp the plug, not the cord.
10. Keep fingers away from all moving parts. Special care is required around the sewing machine needle and/or cutting blade.
11. Always use the proper needle plate. The wrong plate can cause the needle to break.
12. Do not use bent needles.
13. Do not pull or push fabric while stitching. It may deflect the needle causing it to break.
14. Switch this sewing machine off ("O") when making any adjustment in the needle area, such as threading the needle, changing the needle, threading the bobbin or changing the presser foot, and the like.
15. Always unplug this sewing machine from the electrical outlet when removing covers, lubricating, or when making any other adjustments mentioned in this owner's manual.

SAVE THESE INSTRUCTIONS

For Europe only:
This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge if they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved. Children shall not play with the appliance. Cleaning and user maintenance shall not be made by children without supervision.

For outside Europe (except U.S.A.):
This appliance is not intended for use by persons (including children) with reduced physical, sensory or mental capabilities, or lack of experience and knowledge, unless they have been given supervision or instruction concerning use of the appliance by a person responsible for their safety.
Children should be supervised to ensure that they do not play with the appliance.



Please note that on disposal, this product must be safely recycled in accordance with relevant National legislation relating to electrical/electronic products. If in doubt please contact your retailer for guidance. (EEA (European Economic Area) and UK)

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CARE AND MAINTENANCE

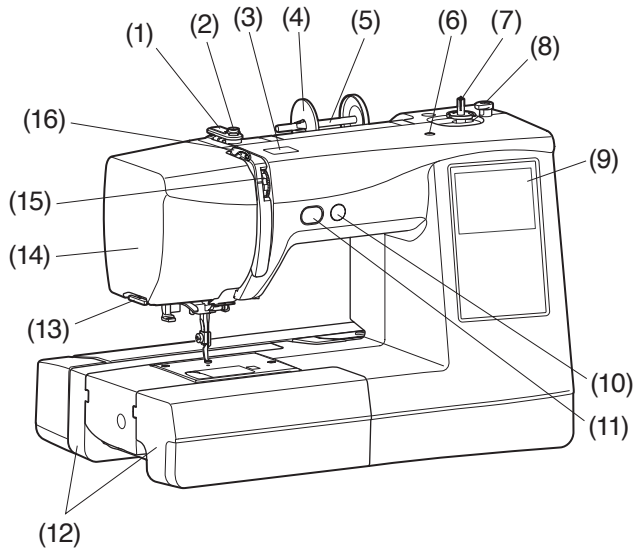
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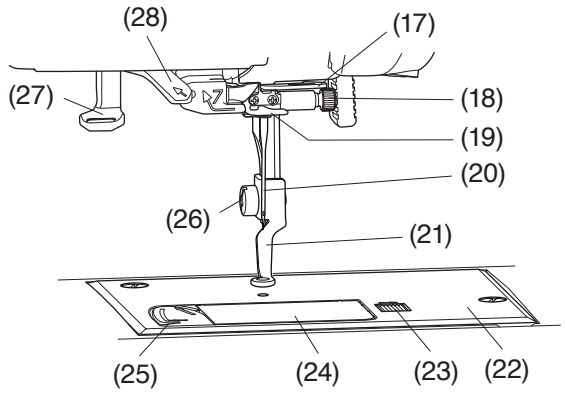
DESIGN CHART

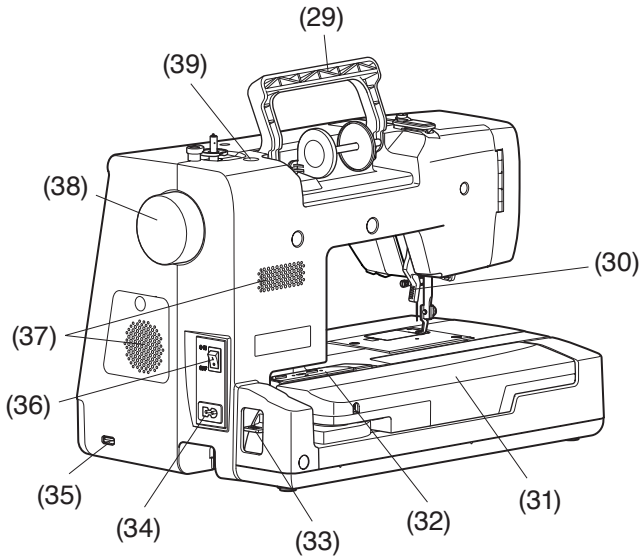
Embroidery 97
Embroidery Monogram 101

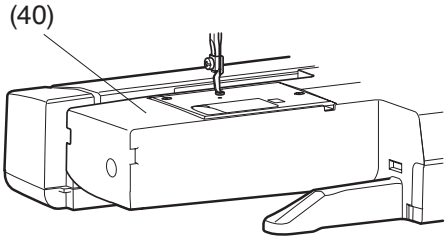
QUICK REFERENCE CHART

Embroidery 104









ESSENTIAL PARTS

Names of Parts

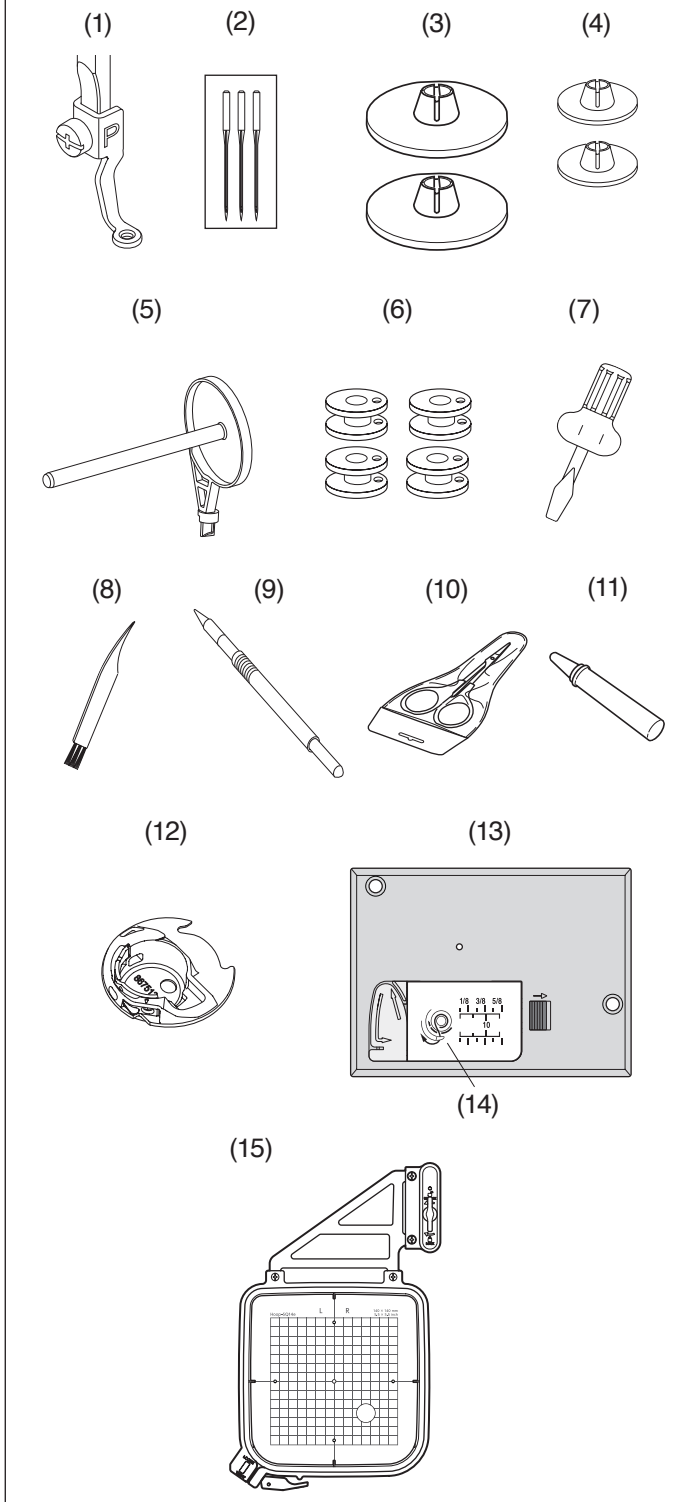
(1) Upper thread guide
(2) Bobbin winding tension disk
(3) Cover
(4) Spool holder (large)
(5) Spool pin
(6) Hole for extra spool pin
(7) Bobbin winder spindle
(8) Bobbin winder stopper
(9) Visual touch screen
(10) Thread cutter button
(11) Start/stop button
(12) Extension table (accessory storage)
(13) Thread cutter/holder
(14) Face cover
(15) Thread tension dial
(16) Thread take-up lever

(17) Lower thread guide
(18) Needle clamp screw
(19) Needle bar thread guide
(20) Needle
(21) Embroidery foot P
(22) Needle plate
(23) Hook cover release button
(24) Hook cover plate
(25) Bobbin thread cutter
(26) Setscrew
(27) Needle threader lever
(28) Needle threader guide

(29) Carrying handle
(30) Presser foot lifter
(31) Carriage arm
(32) Carriage
(33) Carriage arm release lever
(34) Machine socket
(35) USB port
(36) Power switch
(37) Ventilation openings
(38) Handwheel
(39) Cap

(40) Free-arm

NOTE:
- To carry the sewing machine, hold the carrying handle with your hand, and support the sewing machine with the other hand.
- Sewing machine design and specifications are subject to change without prior notice.

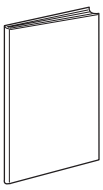


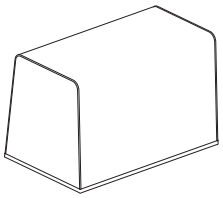
Standard Accessories

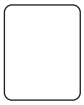
No.	Part Name	Part No.
1	Embroidery foot P	852890000
2	Needle set	852802108
3	Spool holder (large) x 2* (1 is set on the machine)	822020503
4	Spool holder (small) x 2*	822019509
5	Extra spool pin	809041004
6	Bobbin x 4* (1 is set on the machine)	102261103
7	Screwdriver	820832005
8	Lint brush	802424004
9	Touch screen stylus	860194002
10	Scissors	803813203
11	Bobbin holder cleaner	859858007
12	Special bobbin holder for embroidery	867513208
13	Needle plate (set on the machine)	815604000
14	Hook cover plate	809136100
15	Embroidery hoop SQ14e (with template)	819801104

* This is the part number of a single item (not for a set).

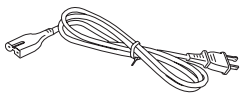
(16) (17) (18)







(19)



Standard Accessories

No.	Part Name		Part No.
16	Instruction book		815800008
17	Soft cover		819807007
18	Threading guide sticker		101506A09
19	Power supply cable**	U.S.A. and Canada	856519004
		U.K.	830377008
		Australia	830314018
		Continental Europe	830335004

** The power supply cable included may differ from the illustration.

Instructional Video

https://www.youtube.com/playlist?list=PLQy563Wz2act0QK9E6z38yuWx19LyF4hM

Template Sheets

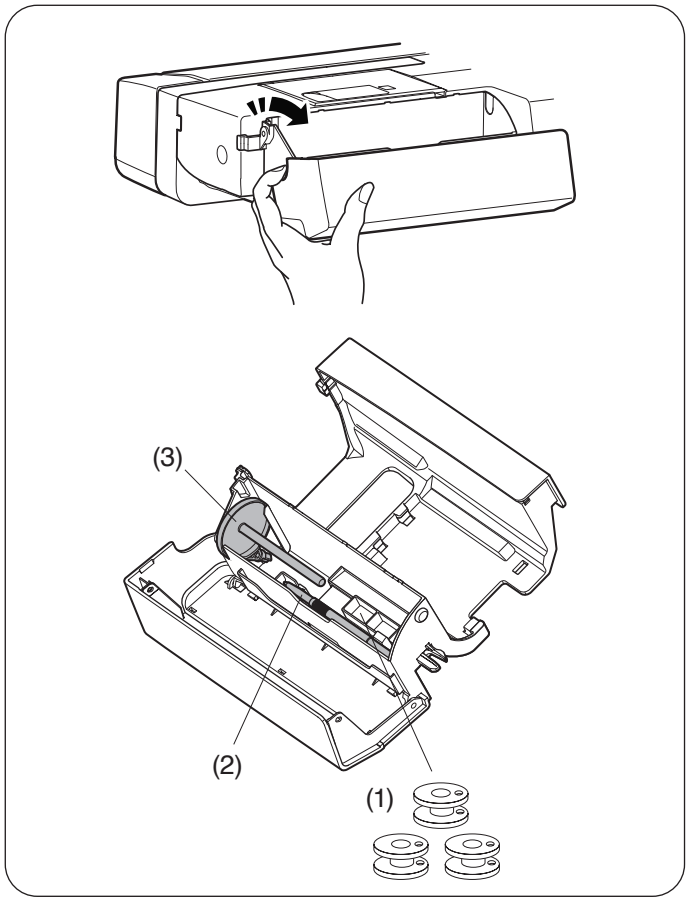
https://www7.janome.co.jp/global/product/machineupdates/template-sheets-for-mc100e/

Download application for PC

EmbroideryEditor

https://www7.janome.co.jp/global/product/softwareapps/embroideryeditor-for-new-download/

* This application is for PC only.

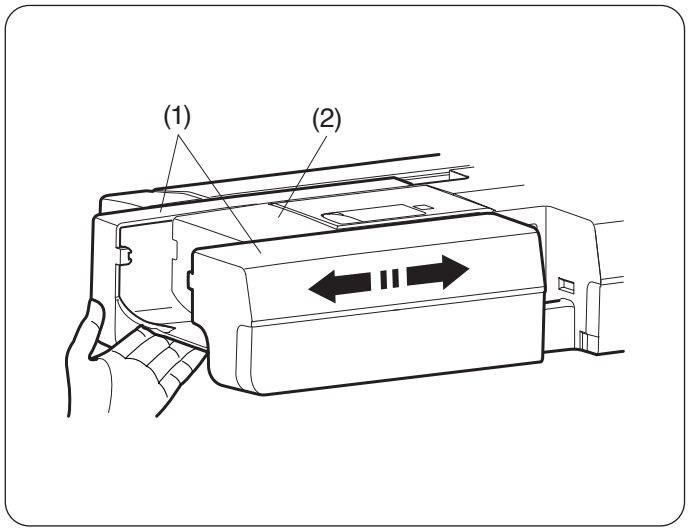


Accessory Storage

The accessories can be conveniently stored in the compartments of the extension table.

To store the accessories in the compartment of the extension table, hook your fingers in the hollow on the left side of the extension table.
Pull it open in the direction of the arrow to open it.

(1) Bobbin
(2) Touch screen stylus
(3) Extra spool pin



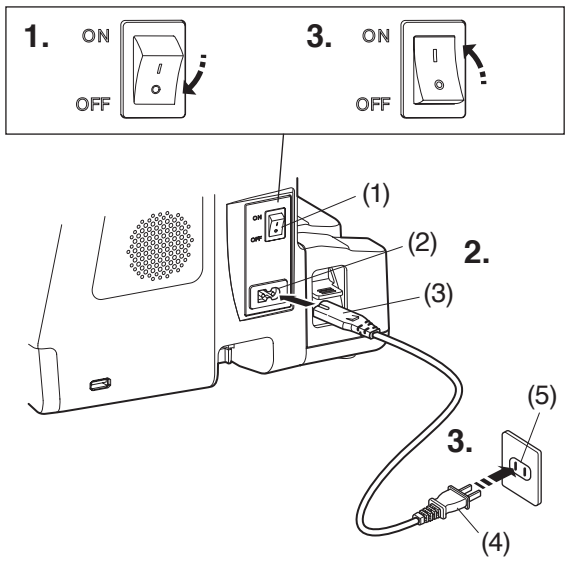
Extension Table

Remove the extension table when using the optional free-arm embroidery hoops (refer to page 67).

(1) Extension table
(2) Free-arm

To detach:
Draw the table out to the left.

To attach:
Slide the table on the base and push the table to the right.



GETTING READY TO SEW

Connecting the Power Supply

1. First make sure the power switch is OFF.
2. Insert the machine plug of the power supply cable into the machine socket.
3. Insert the power supply plug into the wall outlet, and turn the power switch ON.
   (1) Power switch
   (2) Machine socket
   (3) Machine plug
   (4) Power supply plug
   (5) Wall outlet

NOTE:
- Make sure to use the power supply cable that came with the machine.
- If you turn OFF the power switch, wait for 5 seconds before turning it on again.

⚠ WARNING:
- While in operation, always keep your eyes on the sewing area, and do not touch any moving parts such as the thread take-up lever, handwheel or needle.
- Always turn OFF the power switch and unplug the machine from the power supply:
  - when leaving the machine unattended.
  - when cleaning the machine.

Before using your sewing machine

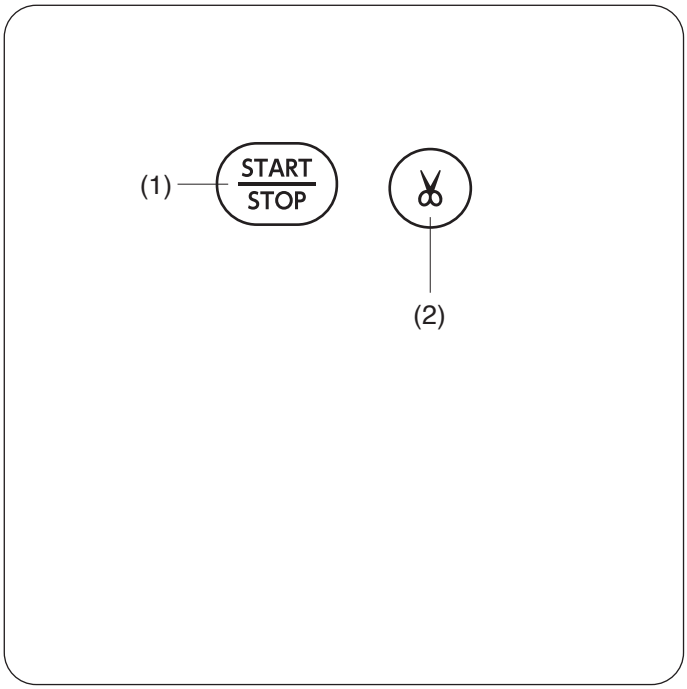
Before using your sewing machine for the first time, attach the hoop on the machine with a scrap of fabric and run the machine for a few minutes to test sew.
Wipe away any oil which may appear.

Operating instructions:

The symbol “O” on the switch indicates the “OFF” position of the switch.

For the U.S.A. and Canada only

Polarized plug (one blade wider than the other):
To reduce the risk of electric shock, this plug is intended to fit in a polarized outlet only one way. If it does not fit fully in the outlet, reverse the plug. If it still does not fit, contact a qualified electrician to install the proper outlet. Do not modify the plug in any way.



Machine Operating Buttons

(1) Start/stop button

Press this button to start or stop the machine.

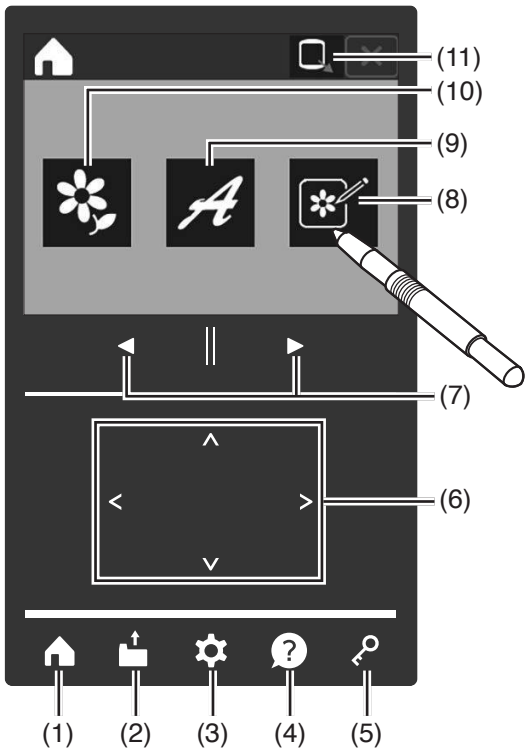
The button will turn red when the machine is running, and blue when it has been stopped.

(2) Thread cutter button

Press this button to trim the threads. The needle bar automatically rises after trimming the threads.

After using auto thread cutting or threading the bobbin holder, you can start sewing without drawing up the bobbin thread.

NOTE:
The thread cutter button does not function:
- directly after turning ON the power.
- when the presser foot is raised with the presser foot lifter.
- after being pressed 3 times in a row.



Touch screen Keys

⚠ CAUTION:
Do not press the visual touch screen with hard or sharp objects like pencils or screwdrivers. Use touch screen stylus included in the standard accessories.

(1) Home key

Press this key to go to the top of the category selections.

(2) Open file key (refer to pages 74-75)

Press this key and the open file window will open.

You can open pattern combinations and monograms saved in the machine's internal memory or USB flash drive.

(3) Set mode key (refer to pages 76-85)

Press this key to enter the setting mode. You can customize the machine settings to your preference.

The settings for "Machine Settings", "Embroidery Settings", and "Language Setting" are available in this mode.

(4) Help key (refer to page 10)

Press this key and the help window will open.

(5) Lockout key

Press this key to lockout the machine when threading the machine, replacing the accessories, etc.

To reduce the risk of injury, all the buttons and keys except the lockout key are deactivated.

To unlock the machine, press this key again.

(6) Cursor keys

Press the cursor keys to move the cursor, the embroidery hoop or designs in editing window, etc.

(7) Page keys (refer to pages 32, 55)

Press the page keys to display the next page or previous page. In the editing mode, you can switch embroidery patterns or layers.

(8) Editing key (refer to page 54)

Press this key to show the editing window.

(9) Monogram key (refer to page 31)

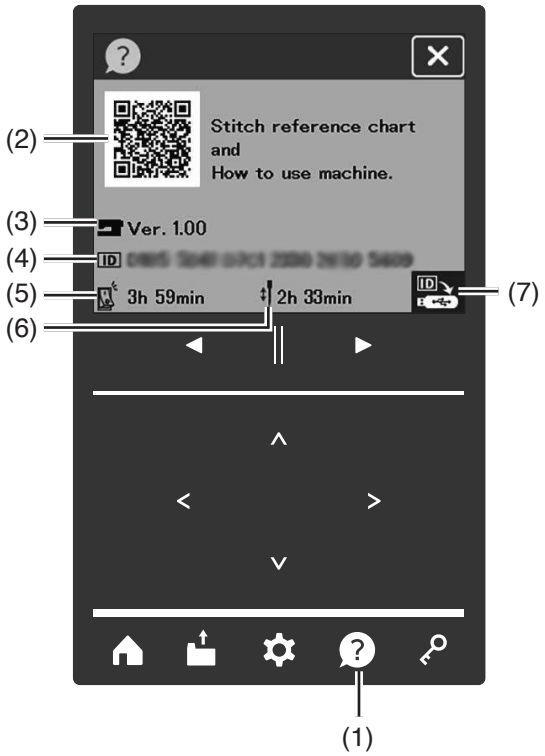
Press this key to show the font selection keys for monogramming.

(10) Design category key (refer to pages 29-30)

Press this key to show the design category selection keys for built-in embroidery designs.

(11) Home position key (refer to page 30)

Press this key to move the carriage to home position.



Help Screen

Press the help key to show the help window. You can check the QR code, software version of the machine, machine ID, total power-on time of the machine, and total operating time of the machine.

(1) Help key
(2) QR code
(3) Software version
(4) Machine ID
(5) Total power-on time
(6) Total operating time

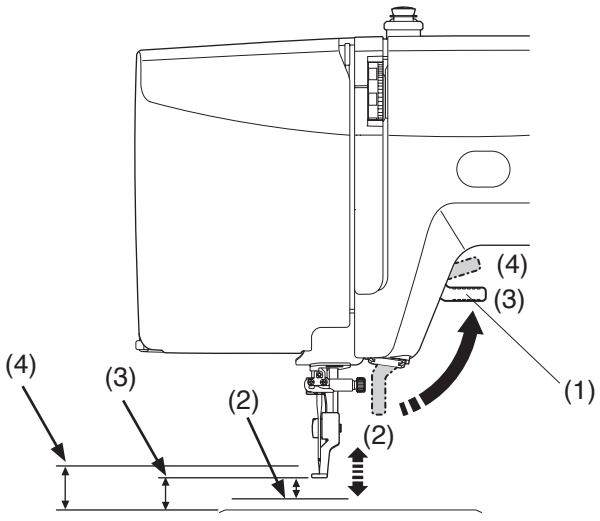
Read the QR code to see the instructional video, design chart and quick reference chart.

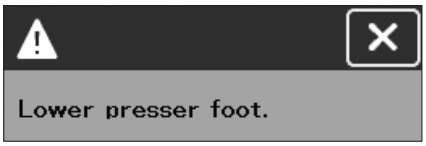
Press the machine ID copy key to save the machine ID (machineID.txt) to the USB flash drive inserted in the sewing machine.

(7) Machine ID copy key

NOTE:

- QR code reader (scanner) application can be downloaded from App store or market. Standard data charges from your internet provider may apply.
- QR Code is a registered trademark of Denso Wave Inc.





Raising and Lowering the Presser Foot

⚠ CAUTION:
Do not turn the handwheel when the presser foot is in extra lifted position. This may cause damage to the presser foot.

The presser foot lifter raises and lowers the presser foot. You can raise the presser foot about 6 mm (1/4″) higher than the normal up position by exerting more pressure when lifting the presser foot lifter. This helps you when attaching the embroidery hoop.

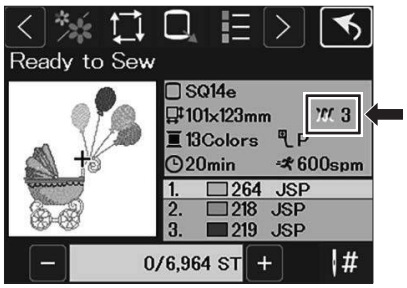
(1) Presser foot lifter
(2) Down position
(3) Up position
(4) Extra lifted position

NOTE:
If you press the start/stop button without lowering the presser foot, the warning message appears on the visual touch screen.
Lower the presser foot lifter and press the start/stop button.

Adjusting Thread Tension

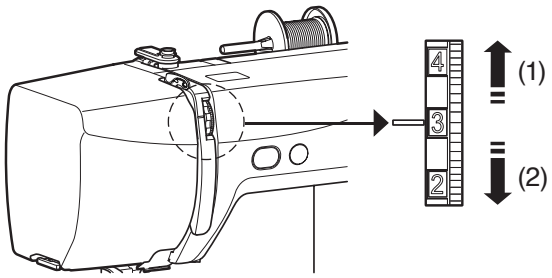
Set the thread tension dial at “3”. You may need to manually adjust the tension balance depending on the sewing conditions, or you can fine-tune the thread tension to suit your preference.

The optimized thread tension for the selected stitch pattern is shown on the window.



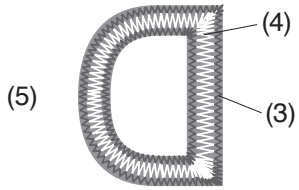


NOTE:
Adjust the thread tension dial to the number shown on screen. The message will not be displayed if the “Confirm to Check Thread Tension Dial” is set to “OFF” (refer to page 85)



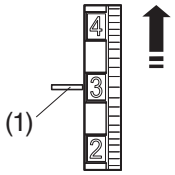
Adjust the thread tension dial to the number shown on screen.

(1) Turn the dial to smaller number, and the needle thread tension becomes weaker.
(2) Turn the dial to bigger number, and the needle thread tension becomes stronger.



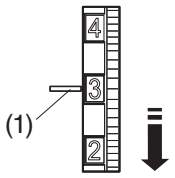
Balanced thread tension
Both needle and bobbin threads interlock between the layers.

(3) Needle thread
(4) Bobbin thread
(5) Wrong side of the fabric



Needle thread tension is too tight:
Turn the dial to smaller number.

(1) Setting mark



Needle thread tension is too weak:
Turn the dial to bigger number.

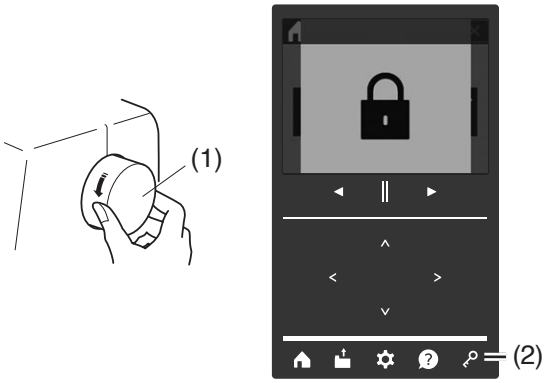
(1) Setting mark

Removing and Attaching the Embroidery foot P

⚠ CAUTION:
Always make sure to press the lockout key to lockout the machine or turn the power switch OFF before replacing the presser foot.

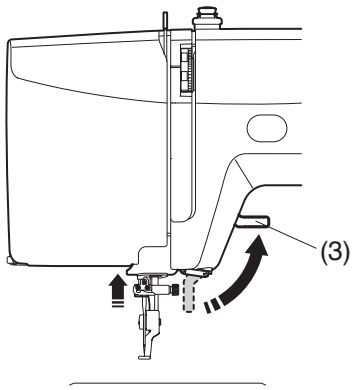
Removing the embroidery foot P

1. Turn the handwheel toward you to raise the needle. Press the lockout key to lockout the machine.



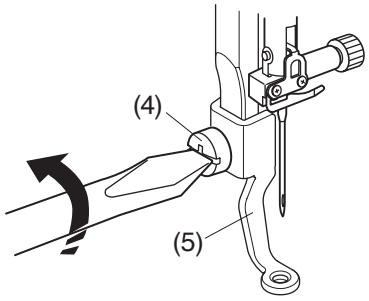
(1) Handwheel
(2) Lockout key

2. Raise the presser foot lifter.



(3) Presser foot lifter

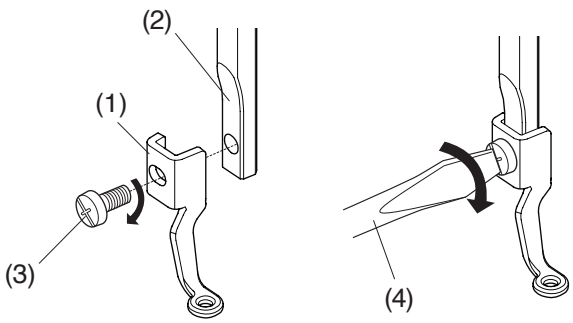
3. Loosen the setscrew and remove the embroidery foot P.



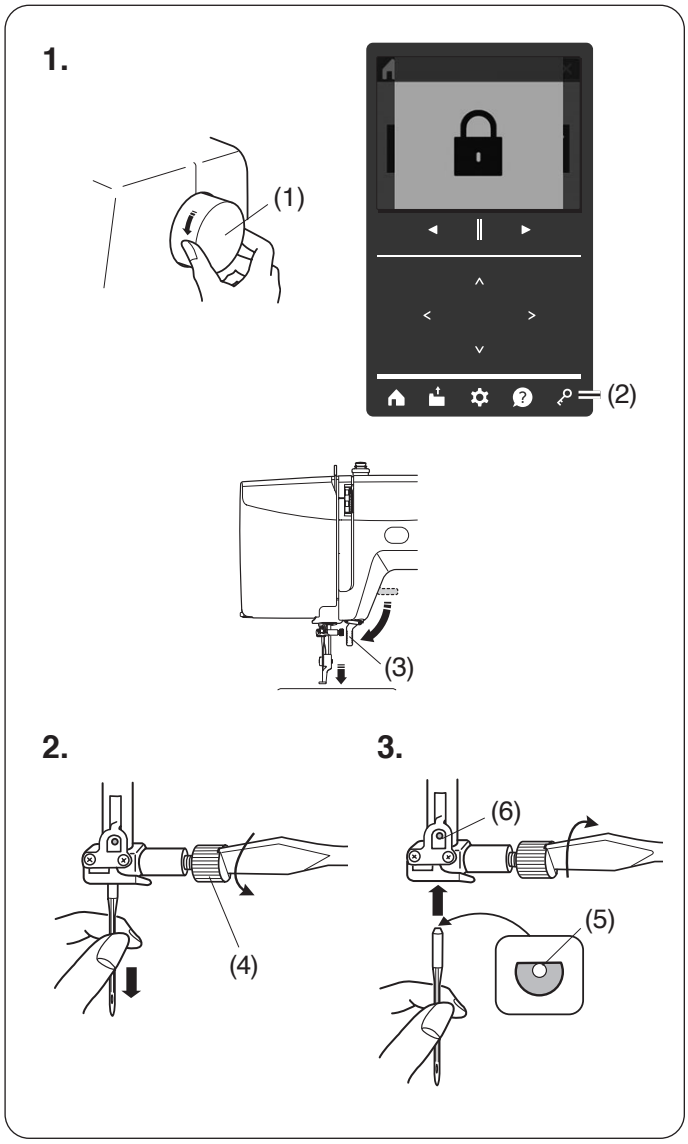
(4) Setscrew
(5) Embroidery foot P

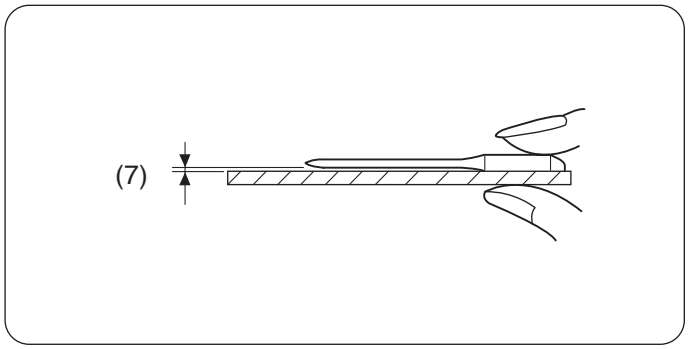
Attaching the embroidery foot P

Attach embroidery foot P to the presser bar.
Tighten the setscrew securely with the screwdriver.
Press the lockout key to unlock the machine.



(1) Embroidery foot P
(2) Presser bar
(3) Setscrew
(4) Screwdriver





Replacing the Needle

⚠ CAUTION:
Always make sure to press the lockout key to lockout the machine or turn the power switch OFF before replacing the needle.

1. Turn the handwheel toward you to raise the needle.
Press the lockout key to lockout the machine.
Lower the presser foot lifter.
(1) Handwheel
(2) Lockout key
(3) Presser foot lifter

2. Loosen the needle clamp screw by turning it counterclockwise.
Remove the needle from the clamp.
(4) Needle clamp screw

3. Insert a new needle into the needle clamp with the flat side of the needle to the rear.
When inserting the needle into the needle clamp, push it up against the stopper pin and tighten the needle clamp screw firmly with a screwdriver.
Press the lockout key to unlock the machine.
(5) Flat side
(6) Stopper pin

⚠ CAUTION:
Be sure to tighten the needle clamp screw firmly with a screwdriver when attaching a needle to the machine, otherwise the needle may break or cause malfunction.

To check needle straightness, place the flat side of the needle onto something flat (a needle plate, glass, etc.).

The gap between the needle and the flat surface should be consistent.

(7) Gap

Never use a blunt needle.

Fabric and Needle Chart

Fabric	Thread	Needle
Fine	Embroidery thread	Blue tip needle
Medium		
Heavy weight		Universal needle #14/90

Janome bobbin thread for embroidery is recommended for bobbin.

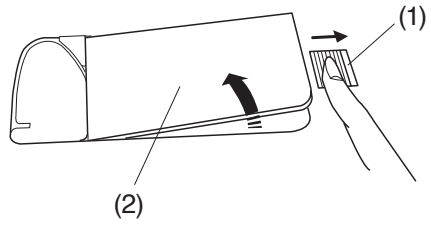
Winding the Bobbin

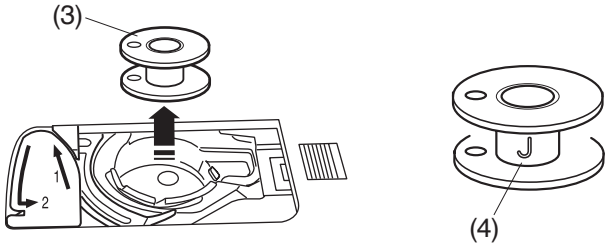
Removing the Bobbin

Slide the hook cover release button to the right, and remove the hook cover plate.

Lift out the bobbin from the bobbin holder.

(1) Hook cover release button
(2) Hook cover plate
(3) Bobbin





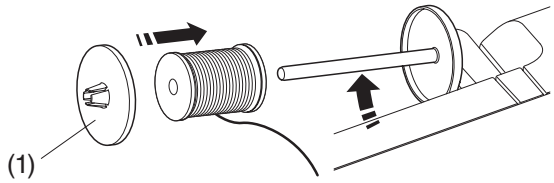
NOTE:
- Use “J” plastic bobbins (4) for the horizontal hook. Using other bobbins, such as pre-wound paper bobbins, may cause stitching problems and/or damage to the bobbin holder.
- Do not use the easy bobbin or metal bobbins.

Setting the spool of thread

Lift up the spool pin. Place the spool of thread on the spool pin.

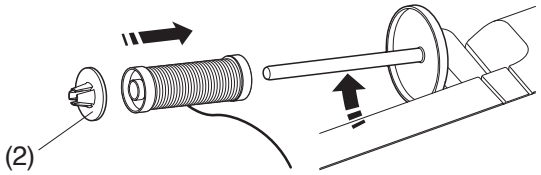
Attach the spool holder (large), and press it firmly against the spool of thread.

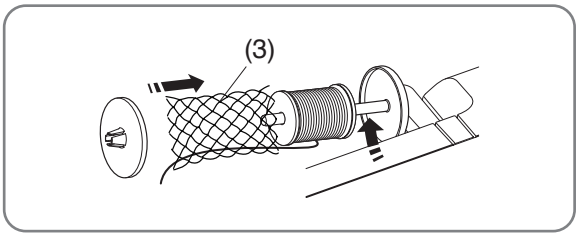
(1) Spool holder (large)



Use the spool holder (small) to hold narrow or small spools of thread.

(2) Spool holder (small)





NOTE:
- If you use a slippery thread such as monofilament transparent thread, elastic thread or metallic thread, put a net on the spool of thread to prevent the thread from slipping off the spool and jamming around the spool pin.
  If the net is too long for the spool, fold the net and place it on the spool.
- A spool net is not included with this machine.
  (3) Spool net

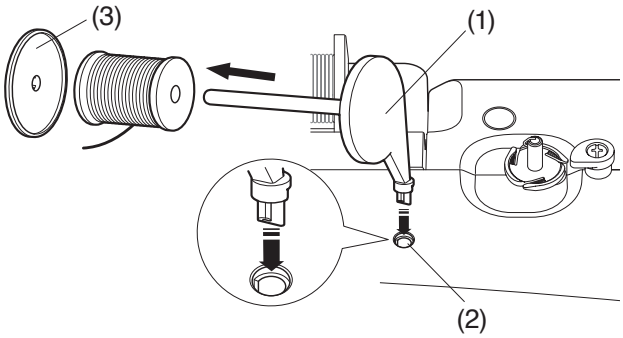
Extra spool pin

Use the extra spool pin when you need to wind a bobbin without unthreading the machine while working on a sewing project (refer to page 15).

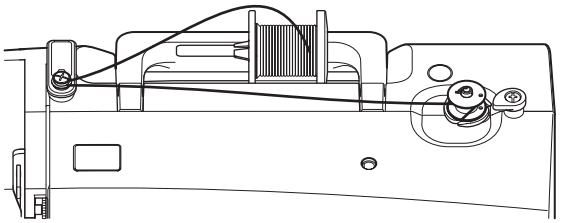
Insert the extra spool pin into the hole as shown.

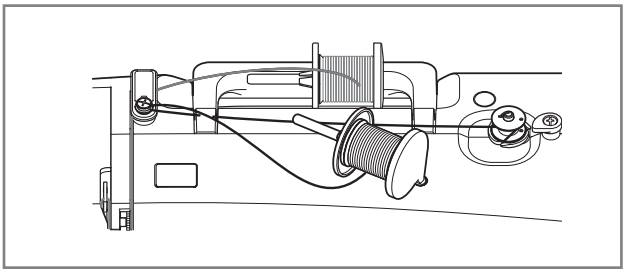
Place a spool of thread on the extra spool pin and fix the spool with the spool holder.

(1) Extra spool pin
(2) Hole for extra spool pin
(3) Spool holder (large)

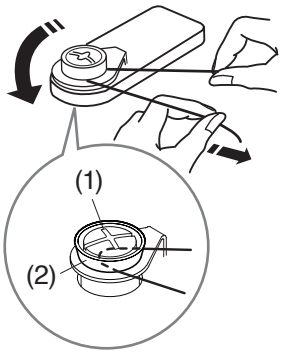


NOTE:
Remove the extra spool pin when covering the machine with the soft cover.

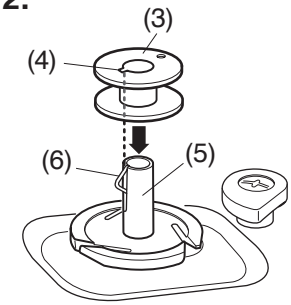




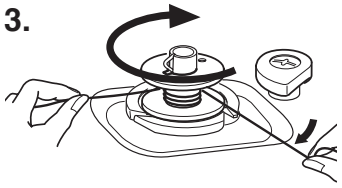
1.



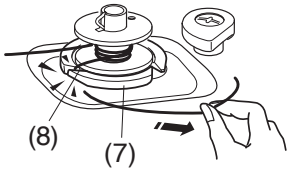
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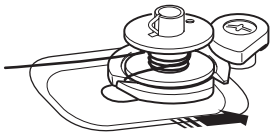
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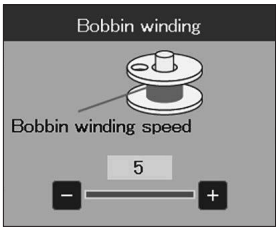


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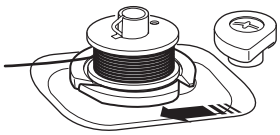
5.



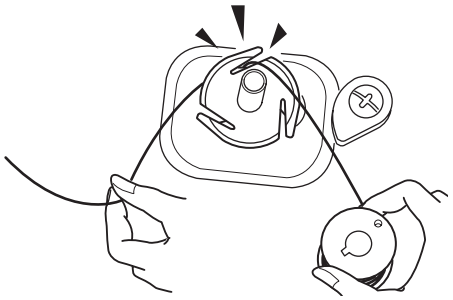


6.





7.



Winding the bobbin

1. Pull the thread from the spool.
Hold the thread with both hands and pass the thread into the bobbin winding tension disk.
Draw the thread to the left and forward around the thread guide.
Firmly pull the thread to the right while holding it with both hands.

(1) Bobbin winding tension disk
(2) Disk

Bobbin winding when the extra spool pin is attached
If you want to wind the bobbin with the extra spool pin while sewing, draw the thread around the bobbin winding tension disk as shown.

(1) Bobbin winding tension disk

2. Put the bobbin on the bobbin winder spindle.
Be sure that the bobbin snaps into the place.

(3) Bobbin
(4) Slit
(5) Bobbin winder spindle
(6) Spring (Projection)

3. Pass the thread to the bobbin.
Hold the thread with both hands and wind it around the bobbin clockwise several times.

4. Insert the thread into one of the slits of the flange plate and pull the thread to cut.

(7) Flange plate
(8) Slit

5. Push the bobbin to the right. The visual touch screen will show the bobbin winding sign.

If you wish to wind the bobbin thread more quickly or slowly, you can adjust the maximum bobbin winding speed by pressing the “+” key or “–” key.

NOTE:
Do not move the bobbin winder spindle while the machine is running.

6. Press the start/stop button.

Stop the machine when the bobbin is fully wound and stops spinning.

Return the bobbin winder spindle to its original position.

7. Remove the bobbin. Cut the thread with one of the slits of the flange plate.

NOTE:
For safety purposes, the machine will automatically stop 1.5 minutes after starting bobbin winding.

Inserting the Bobbin

⚠ CAUTION:
Always make sure to press the lockout key to lockout the machine or turn the power switch OFF before inserting the bobbin.

1. Press the lockout key to lockout the machine.
Place the bobbin in the bobbin holder with the thread running off counterclockwise as shown on the hook cover plate.

(1) Lockout key
(2) End of thread
(3) Bobbin holder
(4) Hook cover plate

2. Hold the bobbin with your fingertip so it does not rotate.
Guide the thread into the front notch of the bobbin holder.
Pull the thread to the left to pass it under the guide.

(5) Front notch
(6) Guide

3. Draw the thread to the left to pass it into the guide path marked “1”.
Make sure that the thread comes out from the side notch of the bobbin holder.

(7) Guide path 1
(8) Side notch

NOTE:
If the thread does not come out from the side notch, rethread from step **1**.

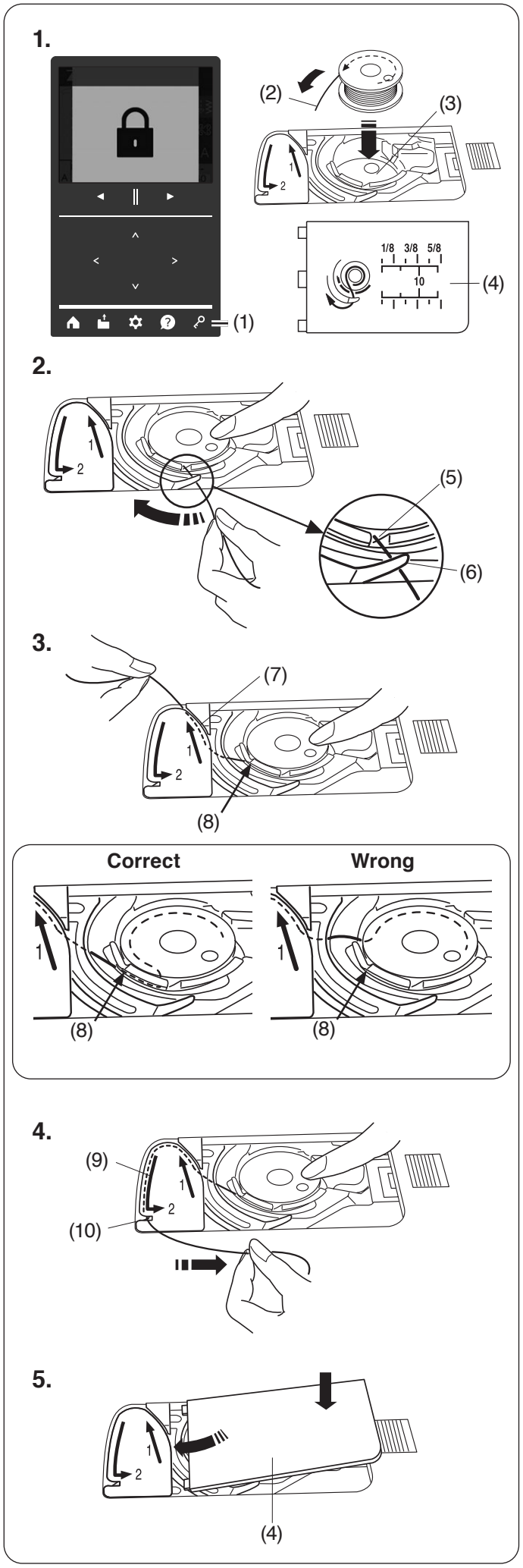
4. Continue to draw the thread along the guide path marked “2” and pull the thread to the right through the slit. The thread will be cut to a proper length and held in place.

(9) Guide path 2
(10) Slit (Thread cutter)

5. Set the left edge of the hook cover plate into the opening.
Push the hook cover plate down to fit in place.

(4) Hook cover plate

NOTE:
- Unless otherwise noted, you can start sewing without drawing up the bobbin thread.
- Refer to page 20 for how to draw up the bobbin thread.

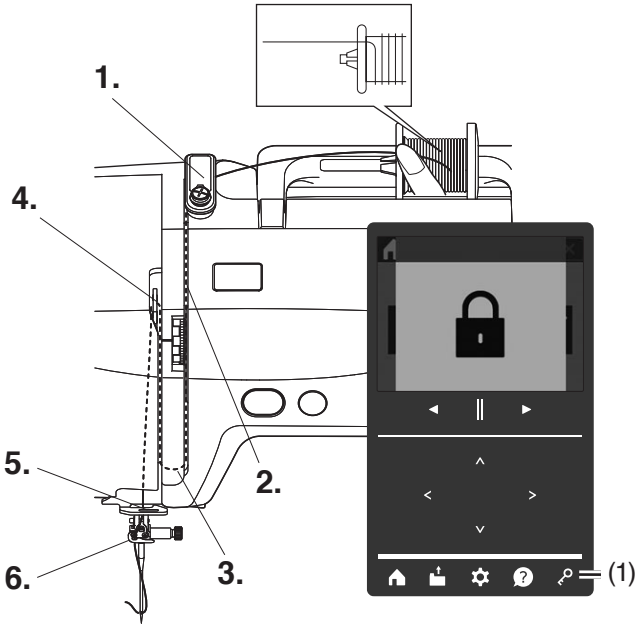


Threading the Machine

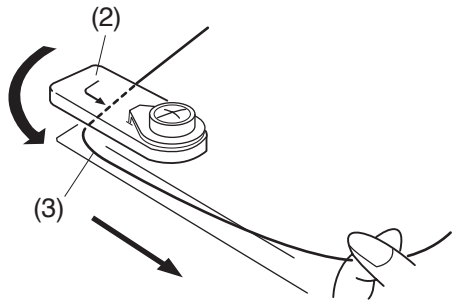
⚠ CAUTION:
Always make sure to press the lockout key to lockout the machine or turn the power switch OFF before threading the machine.

Raise the presser foot lifter.
Turn the handwheel toward you to raise the take-up lever to the highest position.
Press the lockout key to lockout the machine.

(1) Lockout key



1. 2.



Pass the thread in order from **1.** to **6.**

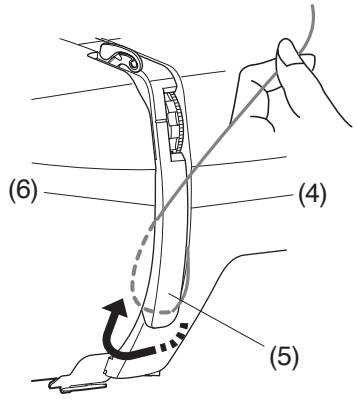
1. Hold the thread with both hands and pass the thread into the upper thread guide.

(2) Upper thread guide

2. Be sure that the thread is pulled down under the notch and into the space below the thread guide plate as shown.

(3) Notch

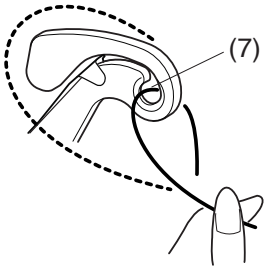
3.



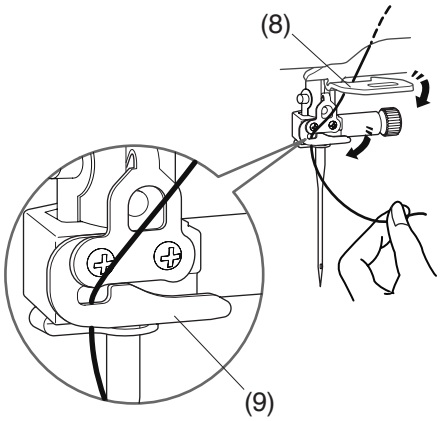
3. Firmly pull the thread toward you along the right channel until the thread snaps.
Draw the thread down along the right channel and around the bottom of the thread guide plate. Pull the thread up along the left channel.

(4) Right channel
(5) Thread guide plate
(6) Left channel

4.



5. 6.



4. While holding the thread at the spool, firmly draw the thread up and to the back of the take-up lever.

Draw the thread forward to slip it into the eye of the take-up lever.

(7) Eye of the take-up lever

5. Then pull the thread down along the left channel and through the lower thread guide.

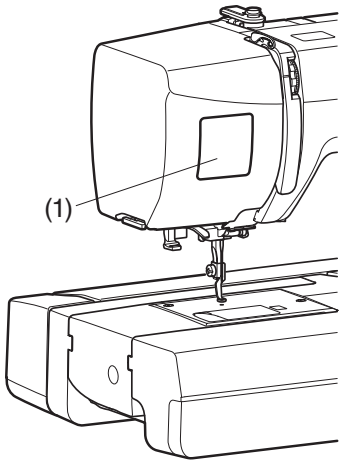
(8) Lower thread guide

6. Slide the thread from the right of the needle bar thread guide to the left.

(9) Needle bar thread guide

Thread the needle with the needle threader (refer to page 19).

Example



Guide sticker for threading

There is a threading guide sticker in the standard accessories. If you wish, you can attach the sticker on the machine to check the threading procedure.

(1) Threading guide sticker

Built-in Needle Threader

⚠ CAUTION:
Always make sure to press the lockout key to lockout the machine or turn the power switch OFF before threading the machine.

NOTE:
- The needle threader can be used with a #11/75 to #16/100 needle.
- Thread size 50 to 90 is recommended.
- Do not use thread size 30 or thicker.

1. Turn the handwheel toward you to raise the needle.
Press the lockout key to lockout the machine.
(1) Handwheel
(2) Lockout key

2. Pull the thread up to the left, over the needle threader guide while holding the thread near the spool with your hand.
(3) Needle threader guide

NOTE:
Be sure that the thread pass the slit of the needle threader as shown.
(4) Slit

3. Pull the thread up and slip it between the thread cutter and face cover from behind.
Pull the thread toward you to cut.
(5) Thread cutter

4. Lower the presser foot lifter.
Pull down the needle threader lever as far as it will go.
(6) Presser foot lifter
(7) Needle threader lever

5. Slowly release the needle threader lever to its original position to pass the thread through the needle eye.
Press the lockout key to unlock the machine.

NOTE:
If the thread loop is formed after releasing the needle threader lever, pull out the thread loop through the needle eye.

Drawing Up the Bobbin Thread

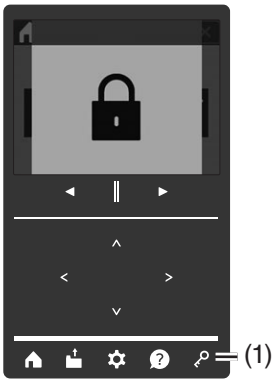
After using auto thread cutting or threading the bobbin holder, you can start sewing without drawing up the bobbin thread.

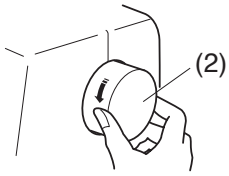
However, you need to draw up the bobbin thread when sewing basting stitch, etc.

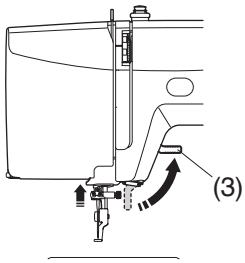
1. Press the lockout key to lockout the machine.
Turn the handwheel toward you to raise the needle.
Raise the presser foot lifter.
Remove the bobbin. Insert the bobbin into the bobbin holder again and rethread the bobbin holder according to the instructions on page 16, but leave a 10 cm (4″) tail of bobbin thread as shown.

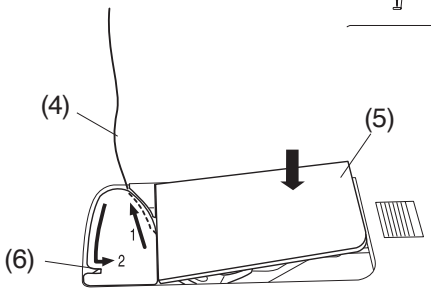
(1) Lockout key
(2) Handwheel
(3) Presser foot lifter
(4) Bobbin thread
(5) Hook cover plate

1.





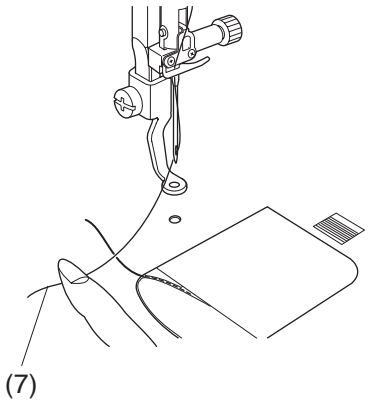




NOTE:
Do not cut the bobbin thread with the thread cutter.
(6) Thread cutter

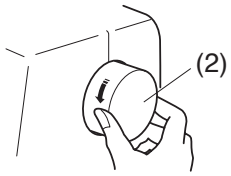
2. Hold the needle thread lightly with your left hand.
(7) Needle thread

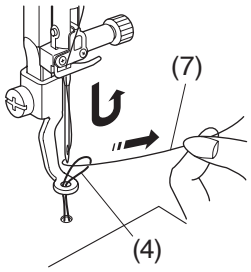
2.



3. Turn the handwheel toward you to lower and raise the needle and pick up the bobbin thread.
(2) Handwheel

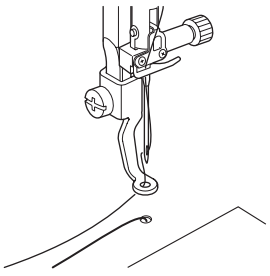
3.





4. Pull the bobbin thread under the presser foot.
Pass the needle thread through the eye of the embroidery foot P.
Press the lockout key to unlock the machine.

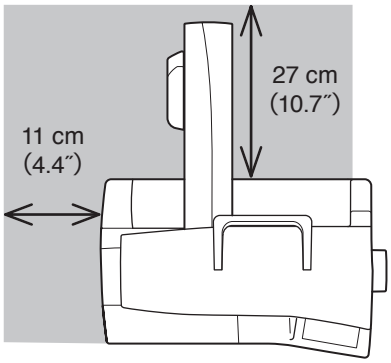
4.



SEWING EMBROIDERY

Embroidery Unit

NOTE:
Be sure to provide sufficient space around the machine to allow the hoop to move freely.
Do not place anything inside the area shown on the left.

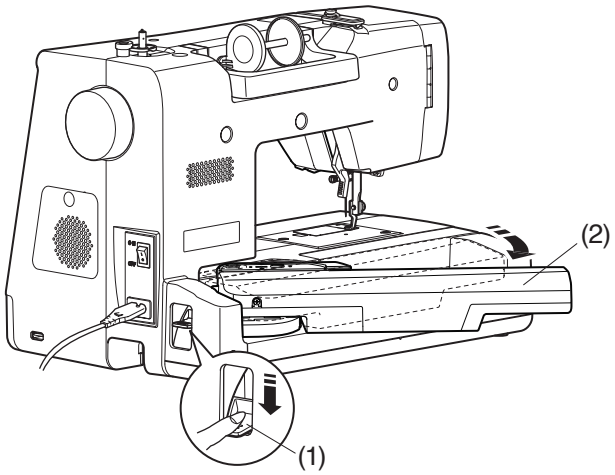


Extending the carriage arm

1. Press down the carriage arm release lever to extend the carriage arm.

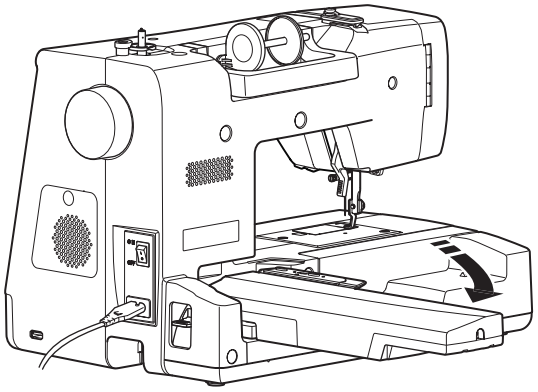
(1) Carriage arm release lever
(2) Carriage arm

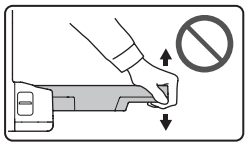
1.

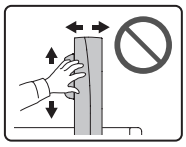


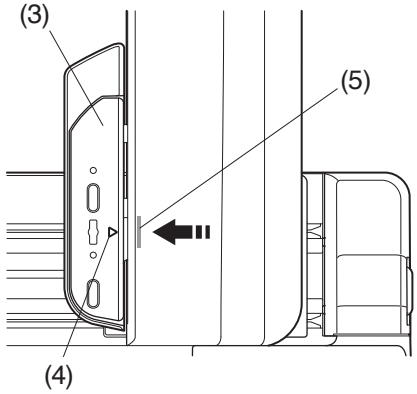
2. Swing out the carriage arm until it locks in the fully extended position.

2.









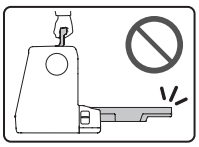
⚠ CAUTION:

- Do not push on the carriage arm when it is extended.
- Do not force to move the carriage or carriage arm by hand.
- Do not hold the carriage or carriage arm while it is moving.
- Never move the carriage by hand regardless of whether the power is ON or OFF, otherwise the machine may be damaged when opening the carriage arm.
- Be sure that the carriage is at the home position when extending the carriage arm (a triangle mark on the carriage matches with a bar sign on the carriage arm).

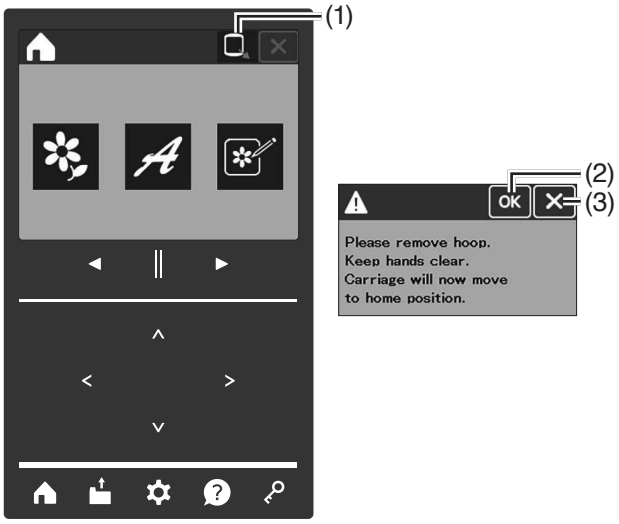
(3) Carriage
(4) Triangle mark
(5) Bar sign

Retracting the carriage arm

> **⚠ CAUTION:**
> Be sure to retract the carriage arm when carrying or storing the machine.



1.



1. Remove the hoop from the carriage.

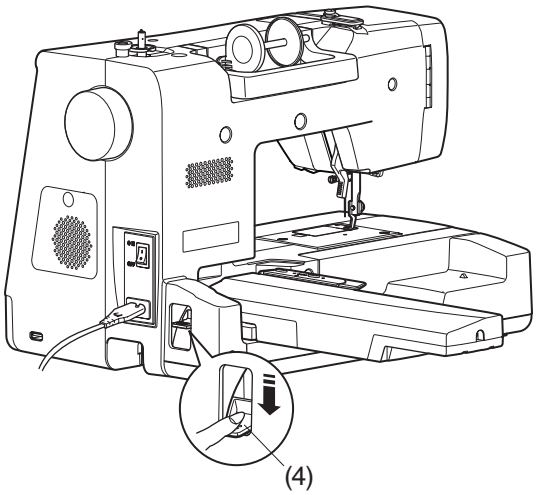
Press the home position key on the home window.

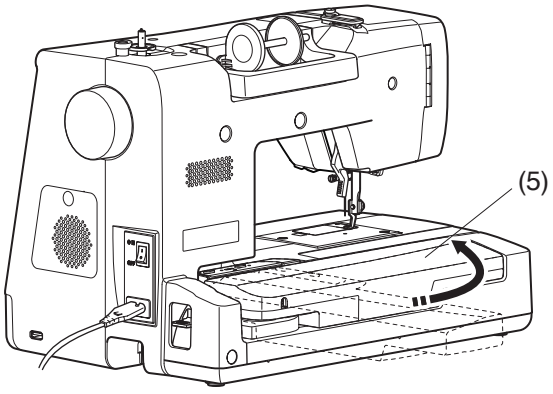
The message will appear. Press the OK key to return the carriage to the home position.

(1) Home position key
(2) OK key

> **NOTE:**
> • If the needle and the presser foot is in down position, make sure to raise the needle with turning the handwheel toward you and the presser foot with the presser foot lifter.
> • Press the X key to return to the previous window.
> (3) X key

2.



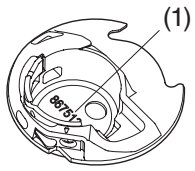


2. Push down the carriage arm release lever to retract the carriage arm.

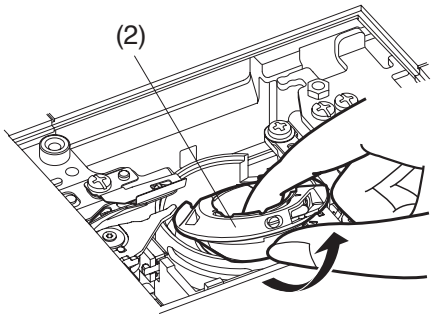
(4) Carriage arm release lever
(5) Carriage arm

> **NOTE:**
> When the carriage arm is retracted, the carriage and carriage arm moves slightly.
> Be careful not to get anything caught in the gap between the carriage or carriage arm and the sewing machine.

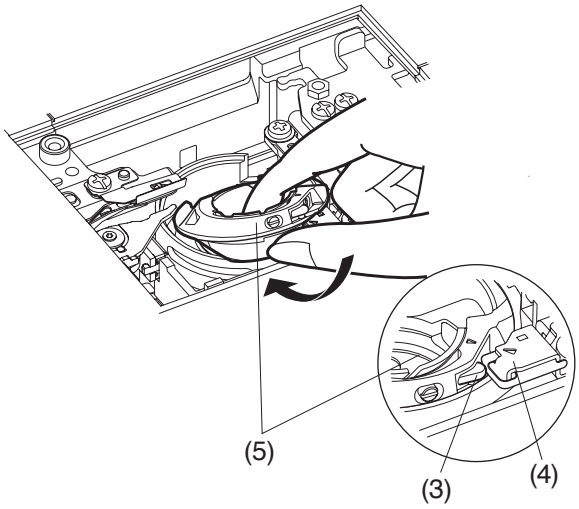
> **⚠ CAUTION:**
> • Never move the carriage by hand regardless of whether the power is ON or OFF, otherwise the machine may be damaged when retracting the carriage arm.
> • Be sure that the carriage is at the home position when retracting the carriage arm.



1.



2.



Bobbin holder for embroidery (high tension)

⚠ CAUTION:
Always make sure to press the lockout key to lockout the machine or turn the power switch OFF before replacing the bobbin holder.

Replace the standard bobbin holder (part number 867513002) with the special bobbin holder (high tension, part number 867513208) when using bobbin threads other than Janome bobbin thread for embroidery.

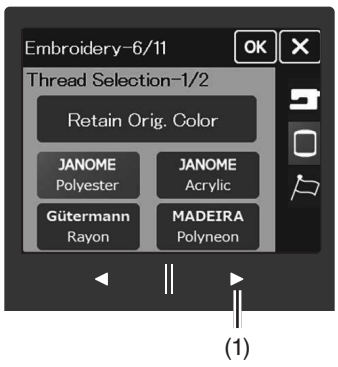
Either part number (867513002 or 867513208) is indicated inside the bobbin holder.

(1) Part number indicated here

1. Remove the needle, embroidery foot and needle plate (refer to the pages 13, 12, 86).
Take out the standard bobbin holder.
(2) Standard bobbin holder

2. Insert the special bobbin holder into the hook race. Make sure to match the knob of the bobbin holder with the stopper on the machine.
Attach the needle plate, embroidery foot and needle.
(3) Knob
(4) Stopper
(5) Special bobbin holder for embroidery (high tension)

NOTE:
Use the standard bobbin holder when sewing designs that use the same thread for the bobbin as the needle thread.





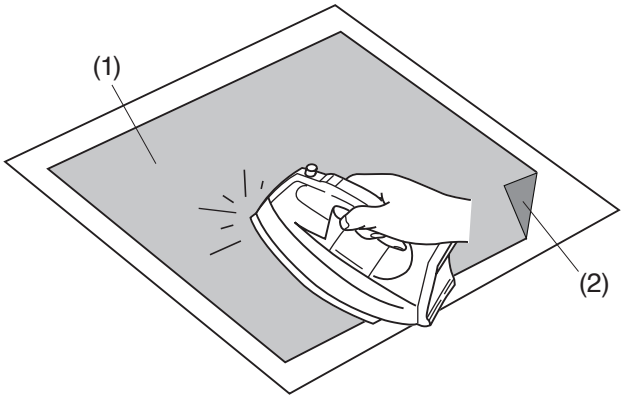
Selecting embroidery thread

Select the thread from the “Thread Selection” before threading the machine (refer to page 83).

Press the next page key to show the next page.

(1) Next page key

NOTE:
Use Janome synthetic #90 for bobbin thread.



Stabilizers

To create the best quality embroidery, it is important to use stabilizers.

In case the embroidery design pattern you are going to sew is dense, attach layers of stabilizers or a thick stabilizer on the back of the fabric for better sewing results.

How to use:

Attach the stabilizer to the wrong side of the fabric.

You may need to use more than one layer.

For firm fabrics, you may place a thin sheet of paper under the fabric.

The non-adhesive type should be used when embroidering fabric which cannot be ironed or for sections which are difficult to iron.

Cut the stabilizer larger than the embroidery hoop and set it on the hoop so that the entire piece is fastened to the hoop to prevent any looseness in the fabric.

Attaching the stabilizer

Place the wrong side of fabric and the glossy side of the stabilizer together. Fold up a corner of the stabilizer and fuse it with an iron.

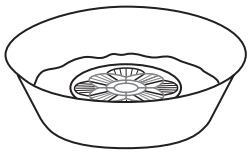
(1) Stabilizer
(2) Corner

NOTE:

- Fold up a corner of the stabilizer, to make it easier to peel off the excess stabilizer after stitching.
- Ironing temperatures vary depending on the kind of adhesive stabilizer you are using.
- Sticky stabilizers can be used only for securing a small piece of fabric or work that cannot be secured in the hoop, or for securing velvet and other napped fabric that would be permanently marked by the hoop.
- Clean the bobbin holder after stitching as glue can get stuck on it (refer to page 86).

Type	Usage	Property
Tear-away	Stable woven fabrics	Made from a fiber that will tear easily.
Iron-on	Knits and all kinds of unstable fabrics	Adhesive type fusible with an iron.
Cut-away	Knits and all kinds of unstable fabrics	Non-woven fabric that does not tear.
Water soluble	Cutwork or lace embroidery. Right side of looped fabrics such as towels to avoid loops coming through the embroidery	A thin film that will dissolve in water.
Heat-away	Cutwork or lace embroidery	A thin film that will melt away with heat.

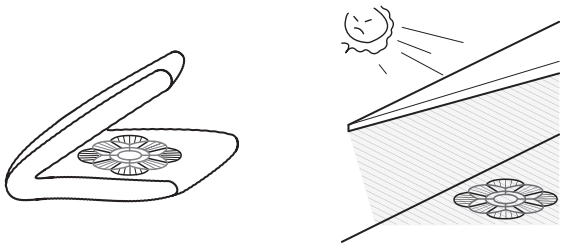
1. 2.



3.



4.



Using water soluble stabilizers (non-woven)

Unlike other stabilizers, you can remove the water soluble stabilizer by soaking the designs in a bowl of warm water.

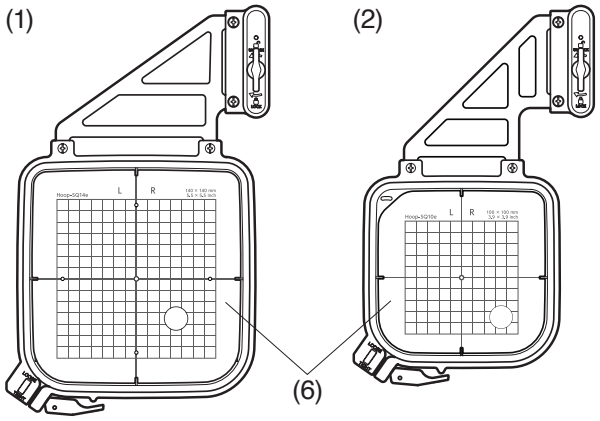
Apply layers of water soluble stabilizers to fine fabrics such as tulle and organdie or brushed fabrics such as towel, velour, and corduroy for better sewing results.

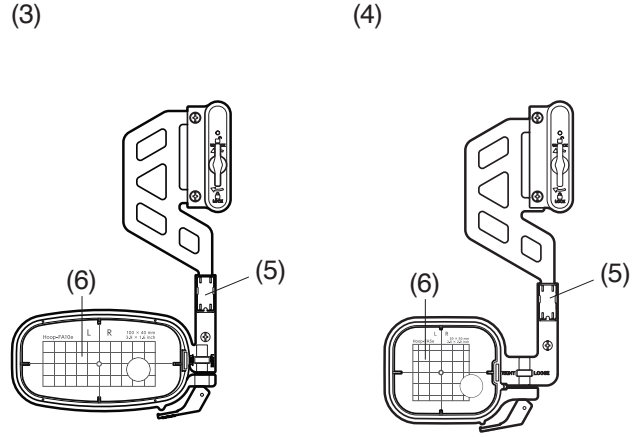
You can embroider on the water soluble stabilizer directly to create designs without fabric, or three-dimensional embroidery designs by soaking lace designs.

NOTE:
- Do not use non-washable materials.
- Apply a layer of water soluble stabilizer to the brushed side of the fabric when sewing on towel, velour or corduroys.

1. After sewing, trim away the water soluble stabilizer cutting approximately 1 cm (3/8″) with scissors around the design pattern.

   Remove the water soluble stabilizer by soaking the design in a bowl of warm water.
2. Change the warm water and soak the pattern for 10 more minutes to fully remove the stabilizer.
3. Rinse off the pattern several times to make the water soluble stabilizer softer.
4. After melting away the stabilizer, wipe off the water from the lace piece completely using a towel and dry it out in the shade.





Embroidery hoops

There is 1 embroidery hoop included in the standard accessories.

(1) Embroidery hoop SQ14e (with template)

A square embroidery hoop with a 14 cm (5.5″) square embroidery area.

(2) Embroidery hoop SQ10e (with template, optional)

A square embroidery hoop with a 10 cm (3.9″) square embroidery area.

(3) Embroidery hoop FA10e (with template, optional)

A free-arm embroidery hoop with a 10 cm by 4 cm (3.9″ by 1.6″) embroidery area.

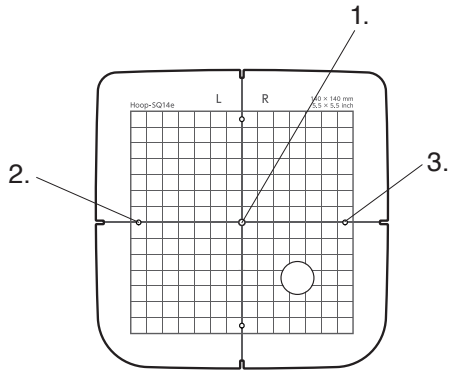
(4) Embroidery hoop FA5e (with template, optional)

A free-arm embroidery hoop with a 5 cm (2″) square embroidery area.

NOTE:
Insert the blocking plate into the inner hoop to prevent the cuff from overlapping the embroidery area when using free-arm embroidery hoops (refer to page 68).

(5) Blocking plate

(6)



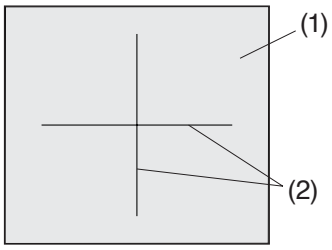
(6) Template

You can select one of 3 monogram placements: left justify, center justify and right justify.

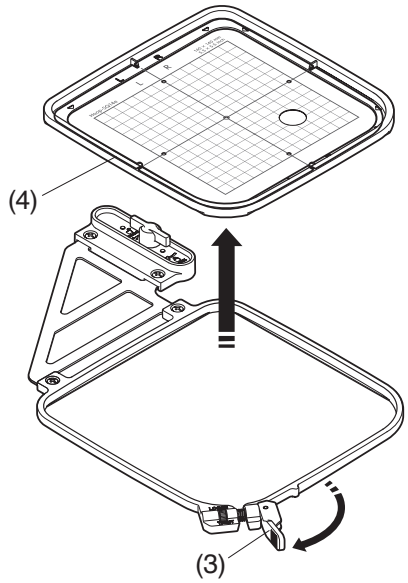
1. Center Justify:
   Sew in the center of the hoop.
2. Left Justify:
   Sew from the left end reference line on the template.
3. Right Justify:
   Sew from the right end reference line on the template.

* Refer to page 51 for monogram placements.

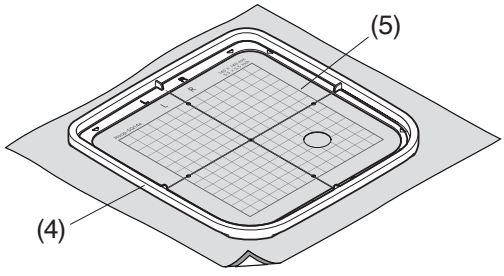
1.



2.



3.



Setting the fabric in an embroidery hoop

1. Prepare a fabric and attach a stabilizer to the wrong side of the fabric.

The fabric and stabilizer should be larger than the hoop size.

Draw centerlines on the fabric with tailor's chalk.

(1) Fabric
(2) Centerlines

NOTE:
Use the template sheet when drawing the centerlines on the fabric. The template sheet can also be downloaded via QR code (refer to page 5).

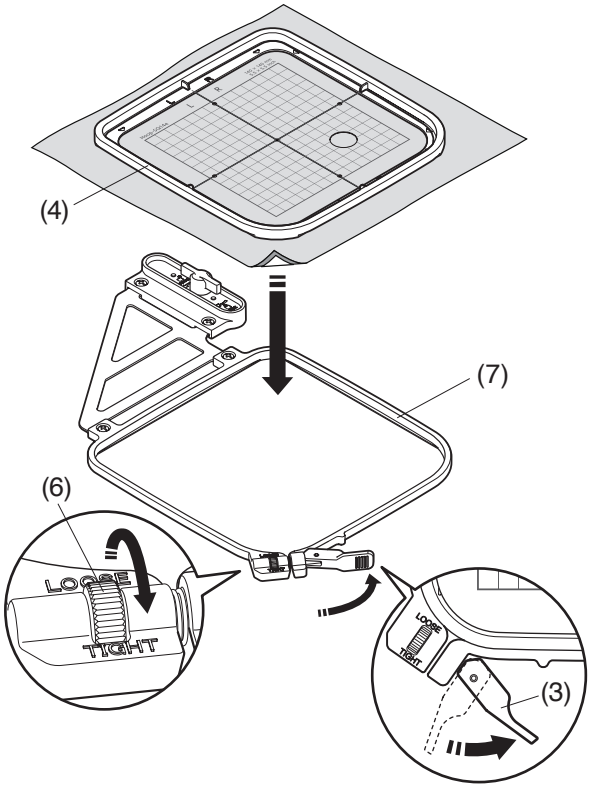
2. Turn the outer hoop lever in the direction of the arrow and remove the inner hoop.

(3) Outer hoop lever
(4) Inner hoop

3. Lay the inner hoop and template on the fabric, matching the centerlines of the fabric with the template.

(4) Inner hoop
(5) Template

4.

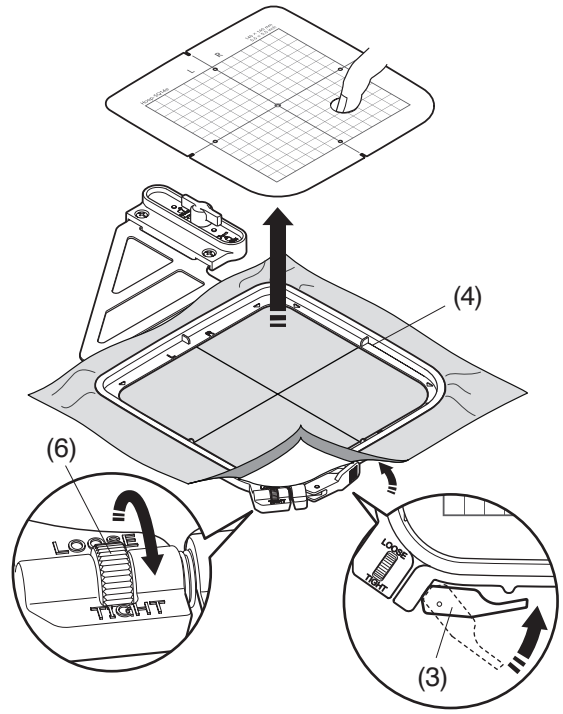


4. Push the inner hoop and fabric into the outer hoop.

Turn the outer hoop lever halfway (in the direction of the arrow) and tighten the hoop tightening screw partially with your fingers.

(3) Outer hoop lever
(4) Inner hoop
(6) Hoop tightening screw
(7) Outer hoop

5. 6.



5. Pull the four sides of the fabric to stretch it tight.

Make sure that the fabric is stretched tightly in the hoop.

6. Turn the outer hoop lever in the direction of the arrow.

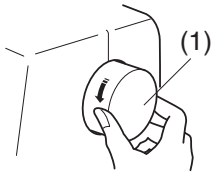
Tighten the hoop tightening screw with your finger until it stops.
Remove the template.

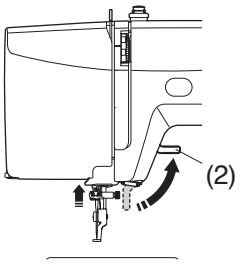
(3) Outer hoop lever
(4) Inner hoop
(6) Hoop tightening screw

⚠ CAUTION:
If the outer hoop lever is difficult to turn in the direction of the arrow, turn the hoop tightening screw in the direction of “LOOSE” slightly, and turn the outer hoop lever. Be careful not to force to turn the lever, otherwise the lever may break.

NOTE:
Thick layers of fabric and stabilizer may cause skipped stitches, or broken threads and needles. Avoid sewing on layers thicker than 3 mm (1/8″).

1.





3.



4.



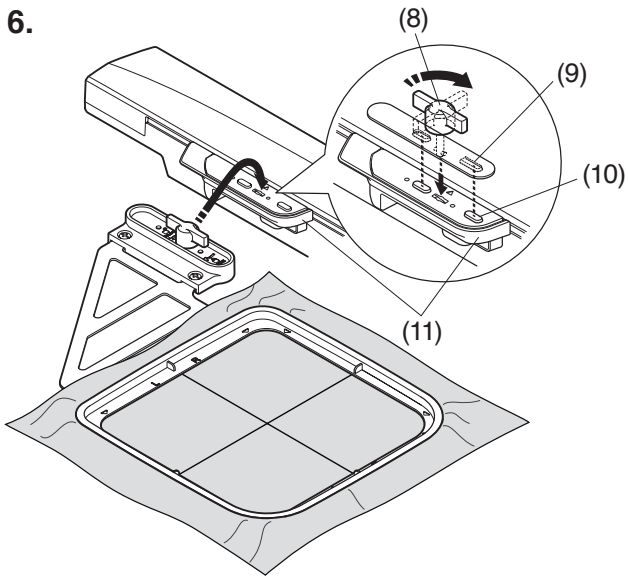
5.







6.

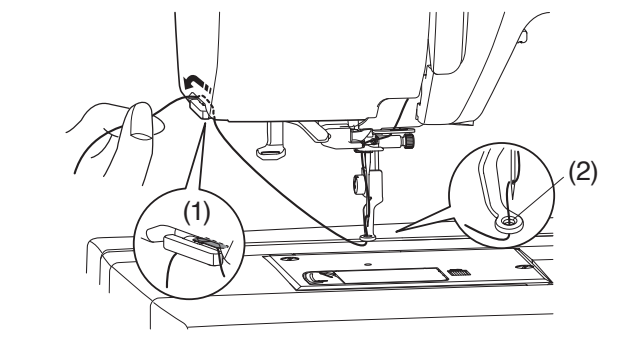


Attaching the embroidery hoop to the machine

1. Turn the handwheel toward you to raise the needle. Raise the presser foot lifter.
   (1) Handwheel
   (2) Presser foot lifter
2. Extend the carriage arm and turn the power switch ON (refer to page 21).
   Select the desired pattern (refer to page 29).
3. A warning message will appear.
   Press the OK key and the carriage moves to starting position.
   (3) OK key
4. A message will appear to confirm the size of the embroidery hoop. Press the OK key.
   (4) OK key
5. A message will appear to confirm the thread tension. Adjust the thread tension as recommended in the message. Press the X key. The Ready to Sew window will open.
   Press the lockout key to lockout the machine.
   (5) Thread tension dial
   (6) X key
   (7) Lockout key

> **⚠ CAUTION:**
> Always make sure to press the lockout key to lockout the machine before replacing the embroidery hoop.

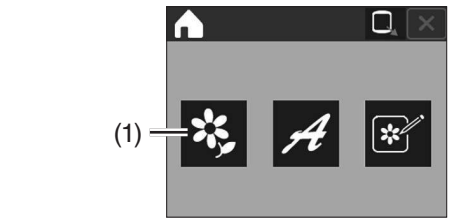
6. Place the hoop on the machine and attach the hoop to the carriage by inserting the lock pin of the hoop into the hole in the carriage arm.
   Turn the knob clockwise to secure the hoop.
   (8) Knob
   (9) Hole
   (10) Lock pin
   (11) Carriage

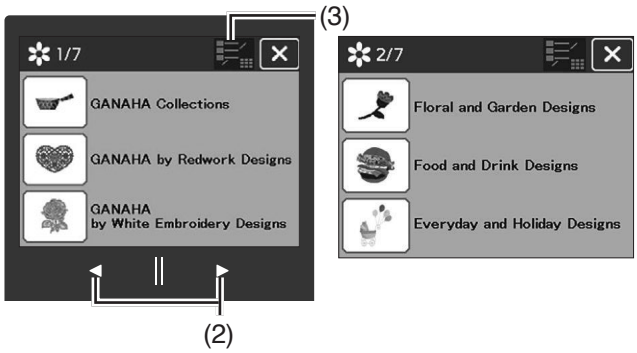


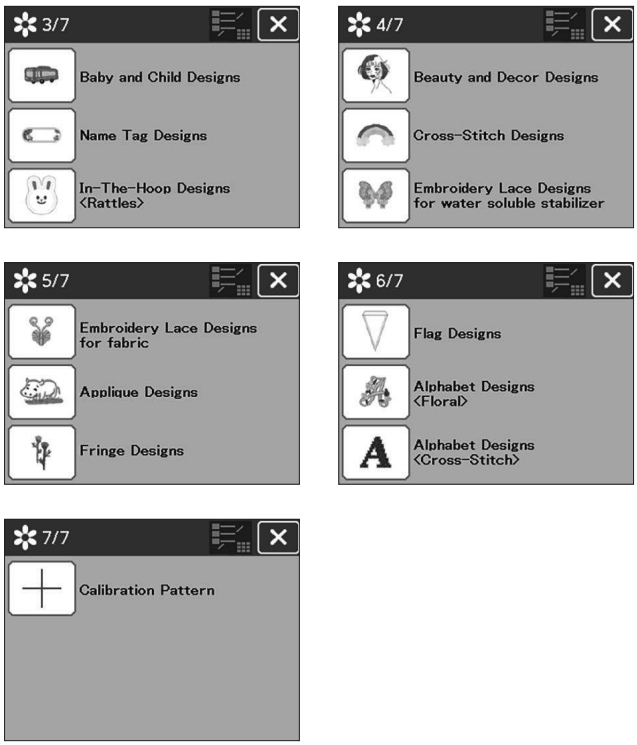
Thread holder

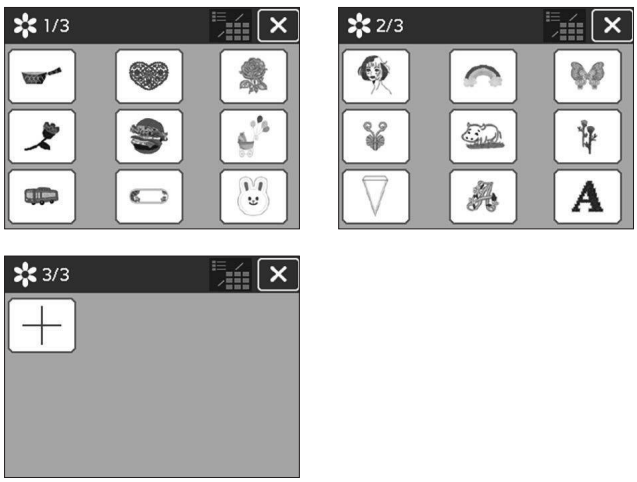
To avoid sewing over a tail of the needle thread, place the thread end on the thread holder.
Pass the needle thread through the hole in the embroidery foot and draw it up to the thread holder.
Hang the thread on the thread holder from front to back.

(1) Thread holder
(2) Hole in the embroidery foot









Selecting Built-in Embroidery Designs

Design category key

Press the design category key on the home window to show the first page of the selected design category.

(1) Design category key

Press the design category key to show the design category selection keys in 7 pages to select other designs.

Press the page keys to browse the design category.

(2) Page keys

Design category

1/7 Page

- GANAHA Collections
- GANAHA by Redwork Designs
- GANAHA by White Embroidery Designs

2/7 Page

- Floral and Garden Designs
- Food and Drink Designs
- Everyday and Holiday Designs

3/7 Page

- Baby and Child Designs
- Name Tag Designs
- In-The-Hoop Designs <Rattles>

4/7 Page

- Beauty and Decor Designs
- Cross-Stitch Designs
- Embroidery Lace Designs for water soluble stabilizer

5/7 Page

- Embroidery Lace Designs for fabric
- Applique Designs
- Fringe Designs

6/7 Page

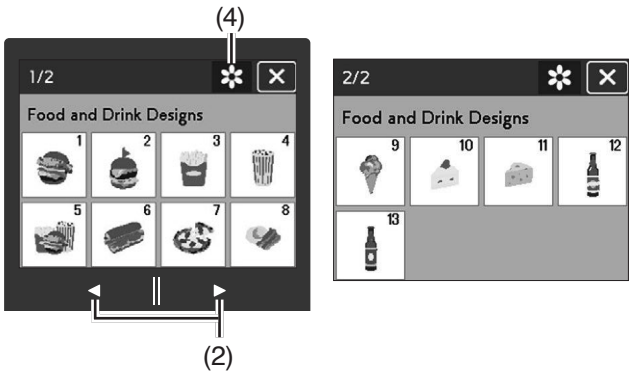
- Flag Designs
- Alphabet Designs <Floral>
- Alphabet Designs <Cross-Stitch>

7/7 Page

- Calibration Pattern

Press the category name on/off key to display a window without the category names.

(3) Category name on/off key



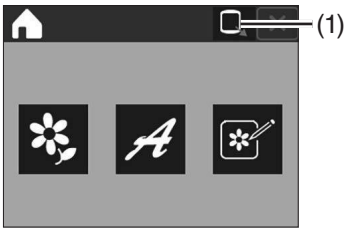
Design category (continued from previous page)

Press the design category selection key to show the first page of the selected design category.

Browse the pattern list with the page keys, and select the desired pattern by pressing the pattern key.

Press the design category selection key to return to the category selections.

(2) Page keys
(4) Design category selection key

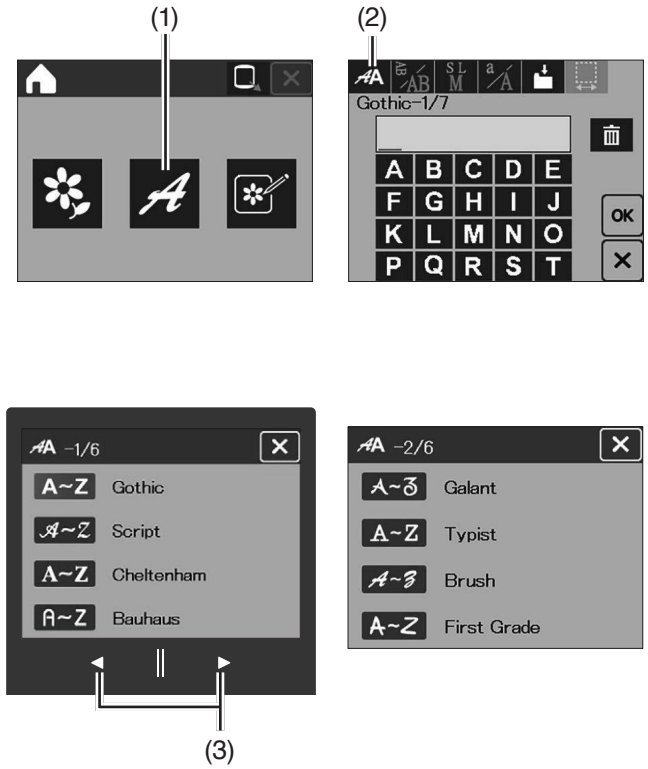


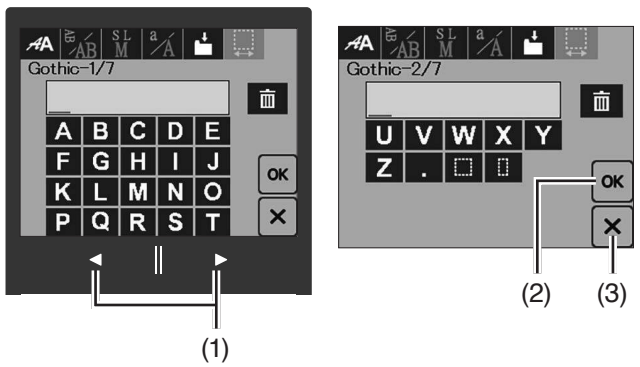
Home position key

When you stop embroidering, remove the embroidery hoop and press the home position key. Carriage will go back to the home position.

NOTE:
If the carriage arm is retracted or the carriage is in the home position, the home position key is not displayed and cannot be used.

(1) Home position key





Selecting Built-in Monograms

Press the monogram key on the home window to show the first page of the font selections.

(1) Monogram key

Press the font selection key to show the font keys in 6 pages to select other fonts.

Press the page key to browse the font category.

(2) Font selection key
(3) Page keys

Font category

1/6 Page

- Gothic
- Script
- Cheltenham
- Bauhaus

2/6 Page

- Galant
- Typist
- Brush
- First Grade

3/6 Page

- Hollowblock
- Jupiter
- Micro Gothic
- Cyrillic 1

4/6 Page

- Cyrillic 2
- Cyrillic 3
- Kaisho
- Marumoji

5/6 Page

- Kaku Gothic
- Border
- Normal Sew
- 2-Letters

6/6 Page

- 3-Letters

NOTE:
The height of micro gothic font is approximately 5 mm.

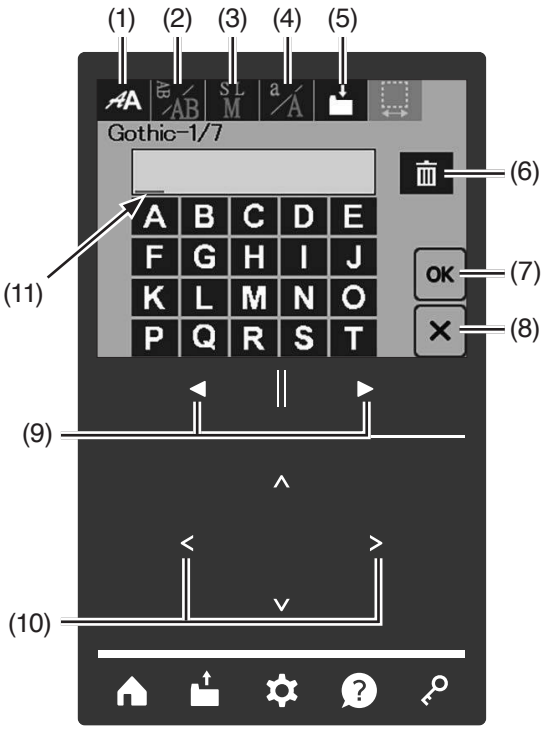
Press the font selection keys to show the first page of the selected font category.

Browse the pattern list with the page keys, and select the desired pattern by pressing the pattern key.

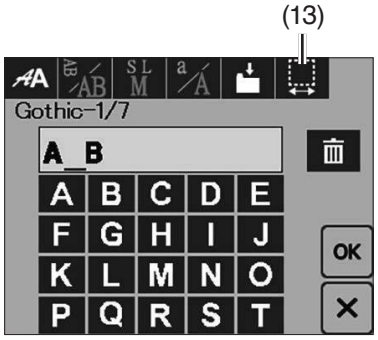
You can enter alphabet letters, numbers, symbols, European, Japanese and Cyrillic letters. Enter patterns and press OK key to show Ready to Sew window.

Press the X key to return to the previous window.

(1) Page keys
(2) OK key
(3) X key









Function Keys for Monograms

(1) Font selection key

Press this key to open the font selection window.

(2) Lettering orientation key

Press this key to select the horizontal or vertical orientation.

(3) Letter size key

You can select the following 3 letter sizes by pressing this key. The approximate letter sizes of upper case are as follows:

L (Large)	30 mm (1.2″)
M (Medium)	20 mm (0.8″)
S (Small)	10 mm (0.4″)

(4) Letter case key

Press this key to select upper case or lower case. The character display will change.

(5) Save file key

Press this key to save the monogram as a data file (refer to pages 69-73).

(6) Delete key

Press this key to delete the character above the cursor or the character in front of the cursor.

(7) OK key

Press this key to confirm your entry and open the Ready to Sew window.

(8) X key

Press this key to close the font selection window.

(9) Page keys

Press these keys to display the next page or previous page.

(10) Cursor keys

Move the cursor with pressing the cursor key to select the character you want to change.

(11) Cursor

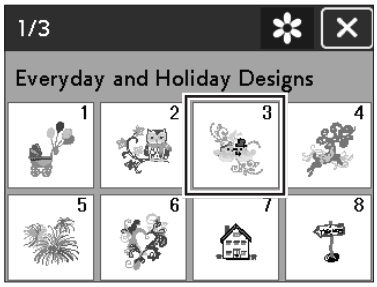
(12) Hiragana/Katakana key (for Kaisho, Marumoji, and Kaku Gothic)

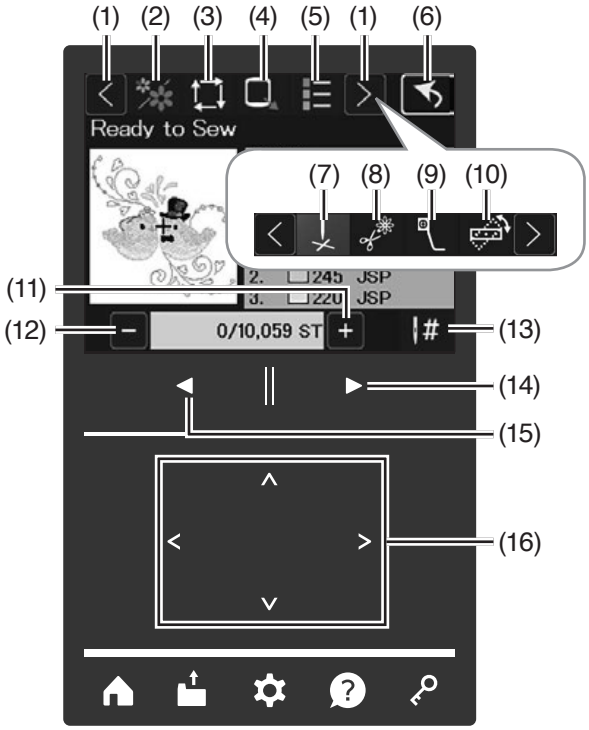
Press this key to switch Hiragana or Katakana for monograms.

(13) Space adjust key

This key is activated only when a cursor is moved below the space entered.
If the spaces between characters look uneven, insert a blank space between characters and adjust the space width to justify.
Press this key to open the space adjustment window.
To increase the space width, press the “+” key.
To decrease the space width, press the “–” key.
Press the OK key to confirm the setting.
Press the X key to cancel the setting.
Press the default key to recover the original stitch setting.

(14) OK key
(15) X key
(16) Default key





Ready to Sew Window

The Ready to Sew window shows embroidery function keys and information on the selected pattern.

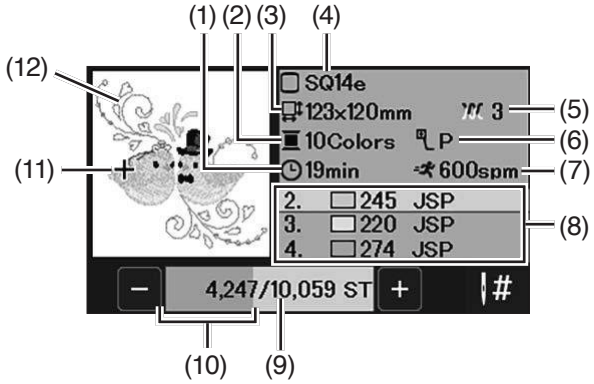
Example: Everyday and Holiday Designs #3

Select the pattern #3 in the pattern selection window for Everyday and Holiday Designs.

Ready to Sew window will open.

Function keys

(1) Function switch key
(2) Color section key (refer to page 34)
(3) Trace key (refer to page 35)
(4) Hoop back key (refer to page 36)
(5) Color list key (refer to page 37)
(6) Previous window key
Press this key to return to previous window.
(7) Cross key (refer to page 37)
(8) Jump thread cutting length key (refer to page 38)
(9) Embroidery foot key (refer to page 38)
(10) Fine position/angle adjustment key (refer to page 39)
(11) Stitch forward key (refer to page 34)
(12) Stitch backward key (refer to page 34)
(13) Jump key (refer to page 34)
(14) Next layer key (refer to page 34)
(15) Previous layer key (refer to page 34)
(16) Jog keys (refer to page 37)



Pattern information

The Ready to Sew window displays the following details:

(1) Required sewing time
(2) Number of thread colors (layers)
(3) Dimension of the design (width X height)
(4) Hoop type
(5) Tension setting
(6) Presser foot
(7) Maximum sewing speed
(8) Thread color
(9) Stitch count
(10) Progress bar
(11) Cross mark (current sewing point)
(12) Preview window

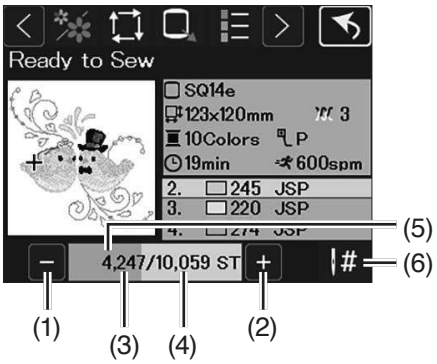
Function Keys for Embroidery

Stitch back/forward keys

Press the "–" key to move the hoop back to a previous sewing point. Press the "+" key to move the hoop ahead.

The hoop will move one stitch each time the key is pressed. Hold down the key to travel faster and jump 10, 100 or 500 stitches at a time. The stitch count and the total number of stitches are displayed in the stitch count window.

You can use these keys to move the embroidery hoop to where the thread has broken or run out.



(1) Stitch backward key
(2) Stitch forward key
(3) Stitch count
(4) Total number of stitches

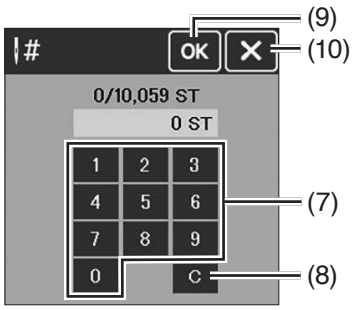
The progress bar appears when the stitch count increases, and indicates the progress of the embroidery sewing project. When the project is completed, the progress bar returns to 0.

(5) Progress bar

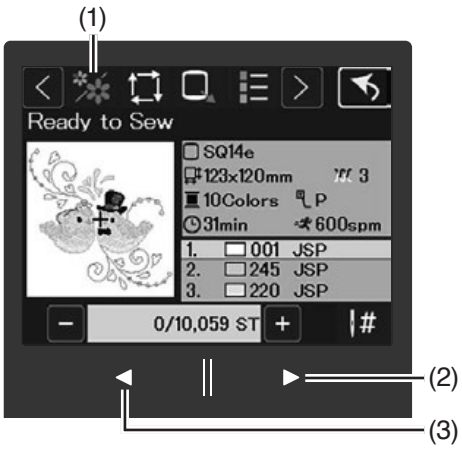
Jump key

If you want to jump to the desired sewing point directly, press the jump key and the numeric keypad window will open. Enter the desired stitch count number and press the OK key. Press the clear key to delete the stitch count number and reset to 0.

The hoop moves to the sewing point you entered.



(6) Jump key
(7) Numeric keypad window
(8) Clear key
(9) OK key
(10) X key



Color section key

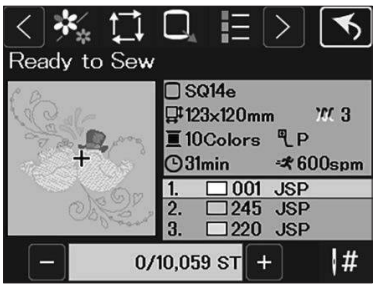
Press this key to show the complete image of the selected design or partial image of each color section only.

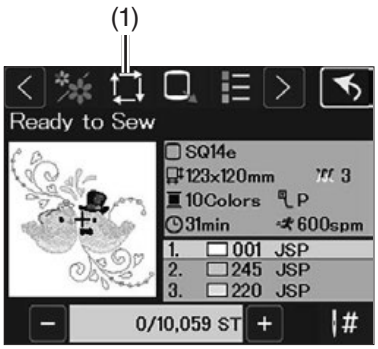
To view the next color section, press the next layer key.

To view the previous color section, press the previous layer key.

You can sew only the specific color section by pressing the next layer key until the desired section is displayed.

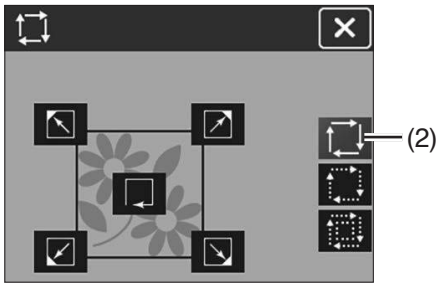
(1) Color section key
(2) Next layer key
(3) Previous layer key



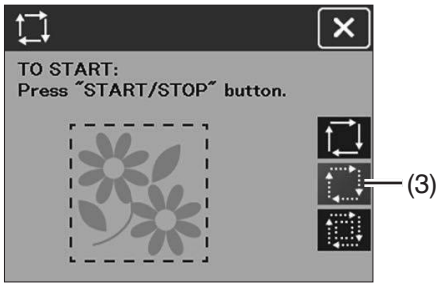




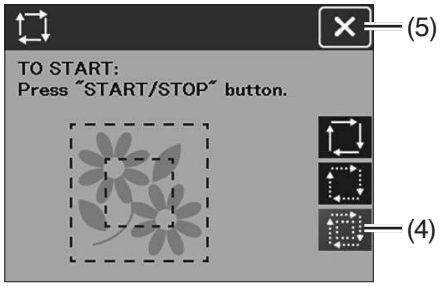
1.



2.



3.



Trace key

You can check the size of the embroidery area by tracing the pattern outline without stitching or with basting stitches.
Turn the handwheel toward you to raise the needle.
Press the trace key and the trace window will open.

(1) Trace key

NOTE:

- The machine will baste around the embroidery area with a 5 mm allowance. However, there will be no allowance if the pattern spreads over the maximum limit of embroidery area.
- Message appears if the key is pressed with the presser foot in down position. Raise the presser foot lifter and press the trace key again.
- It is recommended to bring up the bobbin thread before pressing the start/stop button (refer to page 20).

The following 3 options are available:

1. Trace without stitching

Make sure the trace key is activated.

(2) Trace key

Press the key to start tracing or press one of the keys to move the hoop to a corner.

2. Trace and baste (single)

Press the trace and baste (single) key to open the trace and baste (single) window. Press the start/stop button to start tracing with basting stitches.

(3) Trace and baste (single) key

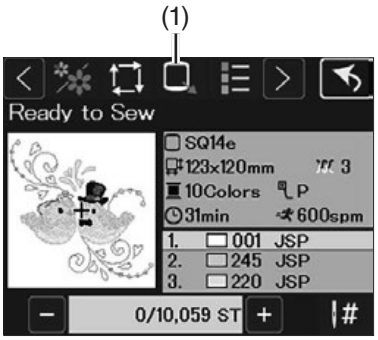
3. Trace and baste (double)

Press the trace and baste (double) key to open the trace and baste (double) window. Press the start/stop button to start tracing with basting stitches. First, the machine bastes inside the pattern then traces the pattern outline with basting stitches.

(4) Trace and baste (double) key

To close the trace window, press the X key.

(5) X key



Hoop back key

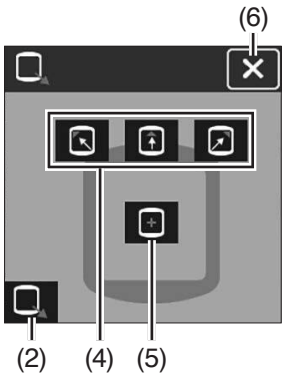
Turn the handwheel toward you to raise the needle.

Press the hoop back key and the hoop back option window will open.

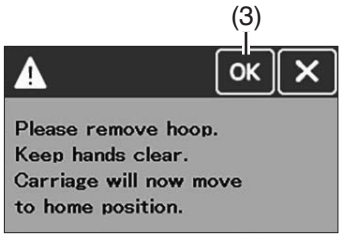
(1) Hoop back key



NOTE:
If this key is pressed while the presser foot is lowered, a message screen will appear. Raise the presser foot lifter and press the hoop back key again.



Message appears when the home position key is pressed. Press the OK key to move the carriage to the home position. Ready to Sew window will open.

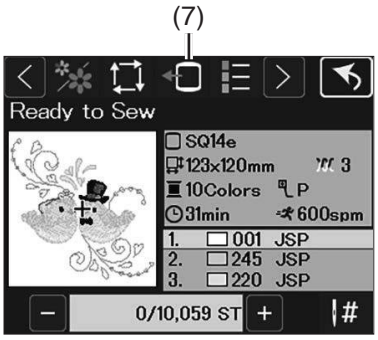


NOTE:
Before using the home position key, remove the embroidery hoop.

(2) Home position key
(3) OK key

Press one of the keys (4) to move the hoop so that the needle falls at the position indicated by the arrow on the frame. Ready to Sew window will open.

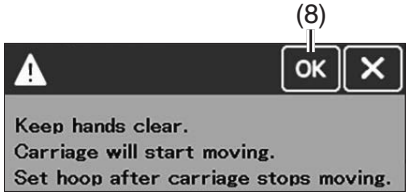
Press the key (5) to move the hoop to the center. Ready to Sew window will open.



Press the X key and the hoop back option window will close.

(6) X key

Press the key (7) or start/stop button and the message will be displayed.

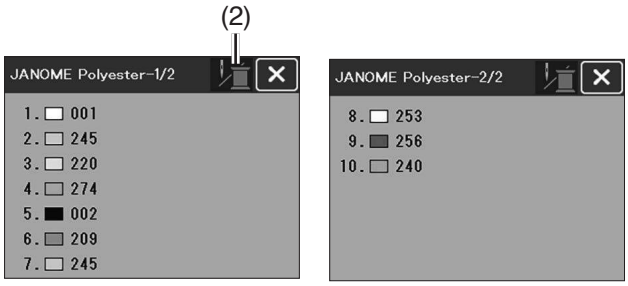


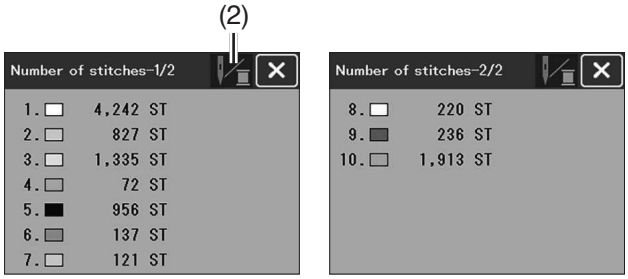
Press the OK key to return the hoop to the original position.

If the hoop is removed, attach the hoop after the carriage moves to the original position.

(8) OK key







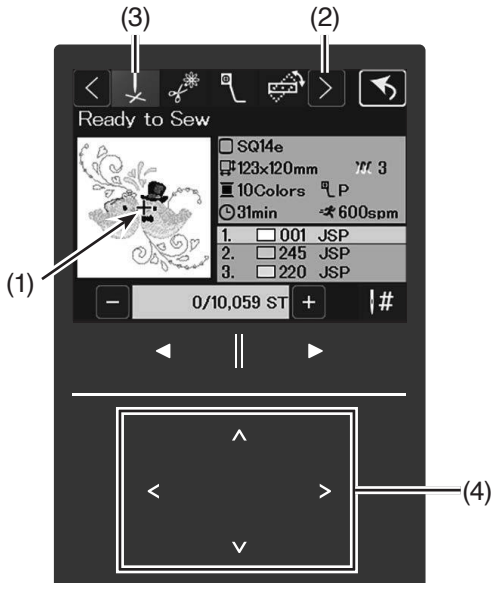
Color list key

Press the color list key to show the color list of the selected design. The list shows the color of threads to be used, the sewing order of the threads, and the stitch count for the threads to be sewn.

(1) Color list key
(2) Thread colors/Number of stitches switch key

To view the next/previous colors, press the page keys.

(3) Page keys



Cross key

The cross mark indicates the current sewing point.

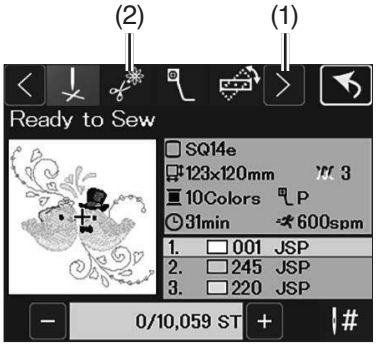
Press the function switch key to show cross key.
Press the cross key again to hide the cross mark.

(1) Cross mark (Current sewing point)
(2) Function switch key
(3) Cross key

Jog keys

Adjust the hoop position with the jog keys so that the needle position comes right above the center of the reference lines on the fabric.

(4) Jog keys



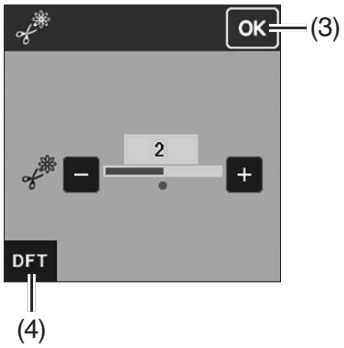
Cutting the tails of jump threads

Press the function switch key to show the jump thread cutting length key.

Press the jump thread cutting length key to open the adjusting window.

(1) Function switch key
(2) Jump thread cutting length key

NOTE:
This option can be used when the “Thread Cutting” is activated in the embroidery setting (refer to page 82).

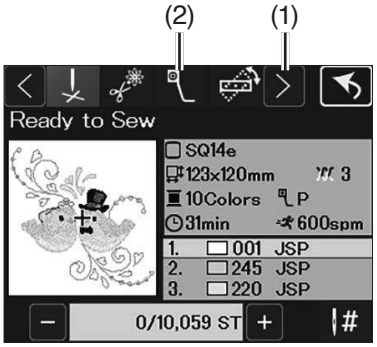


Press the “+” or “–” key to adjust the tail length of jump thread.

Press the OK key to confirm.

Press the default key to recover the original setting.

(3) OK key
(4) Default key

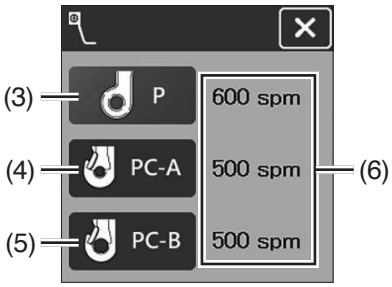


Embroidery foot key

Press the function switch key to show the embroidery foot key.

Press this key to open the embroidery foot window.

(1) Function switch key
(2) Embroidery foot key

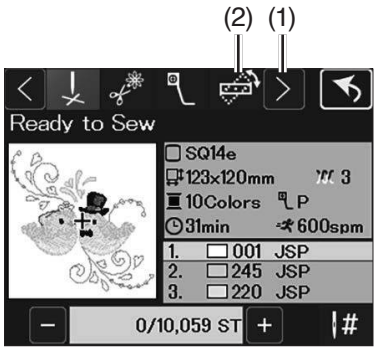


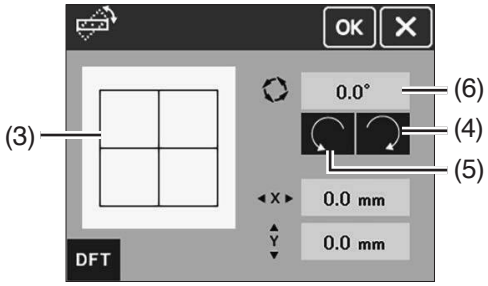
Press one of the presser foot icon keys.

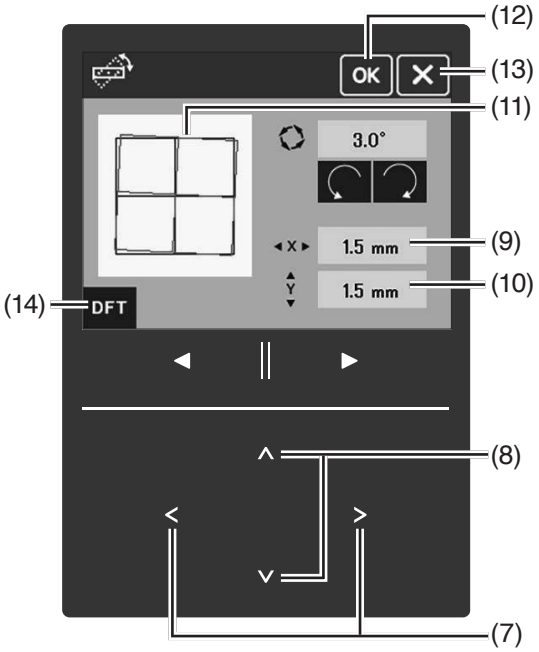
The maximum sewing speed will be automatically adjusted to suit the selected presser foot.

(3) Embroidery foot P
(4) Couching foot PC-A
(5) Couching foot PC-B
(6) Maximum sewing speed

NOTE:
Couching foot PC-A and Couching foot PC-B are optional items.







Fine position/angle adjustment key

You can make fine adjustments to the position or angle of the embroidery design without removing the embroidery hoop from the machine.
Press the function switch key to show the fine position/angle adjustment key.
Press the fine position/angle adjustment key.
The original embroidery design position is previewed as a black rectangle.

(1) Function switch key
(2) Fine position/angle adjustment key
(3) Black rectangle

Rotating a design

You can make fine adjustments to the angle of the embroidery design.

Press the key (4) to rotate the design 0.5 degrees clockwise.

Press the key (5) to rotate the design 0.5 degrees counterclockwise.

The angle value is displayed in the window (6).

NOTE:
- The angle of an embroidery design can be adjusted from -5.0 to 5.0 degrees.
- The angle of the embroidery design cannot be adjusted to exceed the sewing area.

Moving a design

You can make fine adjustments to the position of the embroidery design.
Press the one of the jog keys (7) to move the design 0.5 mm right or left (X window).
Press the one of the jog keys (8) to move the design 0.5 mm forward or backward (Y window).
The moving distance from the original position is shown as coordinates in the X and Y window.

(9) X window
(10) Y window

NOTE:
- The position of an embroidery design can be finely adjusted from -5.0 mm to 5.0 mm.
- The position of the embroidery design cannot be adjusted to exceed the sewing area.
- The moving distance from the original position is shown only in millimeters.

The red rectangle appears when you make fine adjustments to the embroidery design, and it shows the difference between the original position and the adjusted position.
Press the OK key to apply the fine adjustment.
Press the X key to cancel the settings.
Press the default key to recover the original setting.

(11) Red rectangle
(12) OK key
(13) X key
(14) Default key

Starting to Sew Embroidery

1. Select the desired pattern. A message will appear to confirm the size of the embroidery hoop.
   Press the OK key.
   (1) OK key
2. A message will appear to confirm the thread tension. Adjust the thread tension as recommended in the message. Press the X key. The Ready to Sew window will open.
   (2) Thread tension dial
   (3) X key
3. Adjust the hoop position with the jog keys so that the needle position comes right above the center of the centerlines on the fabric.
   (4) Jog keys
   (5) Centerlines on the fabric
4. Hook the needle thread to the thread cutter/holder, then press the start/stop button (refer to page 28).
   Sew 5 to 6 stitches and press the start/stop button to stop the machine.
   Cut the loose thread close to the beginning of the starting point.
   (6) Thread cutter/holder
   (7) Start/stop button
   (8) Loose thread hook to the thread holder
5. Press the start/stop button to start sewing again.
   The machine will stop (and trim the threads if auto thread cutting is activated) automatically when the first color section is finished (refer to page 82).
   Change the thread to the next color and sew the next section.

Sewing results

The embroidery pattern is sewn against the centerlines on the fabric as shown.

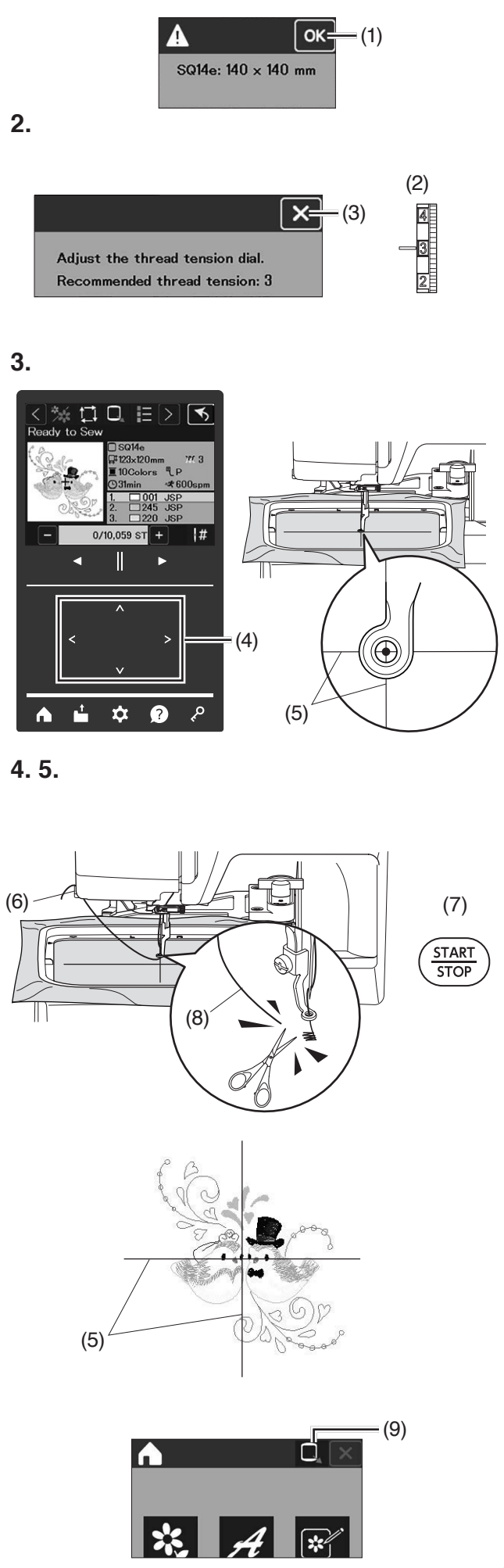
(5) Centerlines on the fabric

Retracting the carriage arm

Remove the hoop from the carriage after the project is completed.

Press the home position key to return the carriage to the home position. Retract the carriage arm (refer to page 22).

(9) Home position key



In-The-Hoop Designs <Rattles>

You can make your own stuffed doll with the In-The-Hoop Designs.
3 parts of rattles are available in this category.

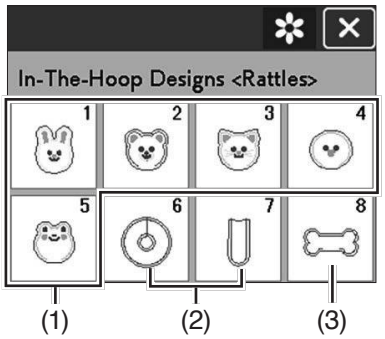
(1) Stuffed doll
(2) Handle for rattle
(3) Rattle

Prepare fabric of your desired design and material.

- Fabric 1 (front side of the doll)
- Fabric 2 (rear side of the doll)
- Fabric 3 (front side of the handle)
- Fabric 4 (rear side of the handle)
- Stabilizer (non-water-soluble)
- Wad cotton
- Plastic bell (2 cm or less)
- Ribbon (Width: 0.5 cm, Length: 4 cm)

NOTE:
- The embroidery data for the stuffed doll includes basting the ribbon before the end of the sewing so that you can pass a ball chain through it.
- If you use fabrics such as pile or boa, the shape will come out nicely when you stuff cotton, resulting in an adorable finish.
- Pile fabrics and boa may fray when the stabilizer is removed. It is recommended to use a soft stabilizer of a light to medium fabric that is glued on one side and does not need to be removed.





Example: In-The-Hoop Designs <Rattles>#5+#6

Creating the doll

The stuffed doll can be combined with two types of handles (pattern 6: circle type, pattern 7: stick type) to make a rattle. Add bells as you like.

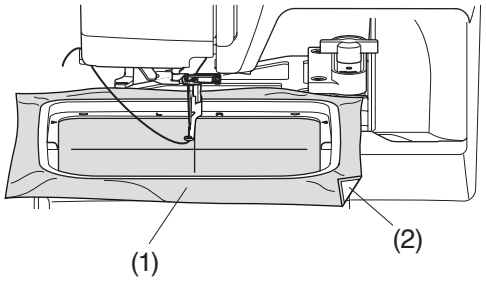
1.





1. Select #5. Press the OK key.
   Confirm the hoop size in the Ready to Sew window.

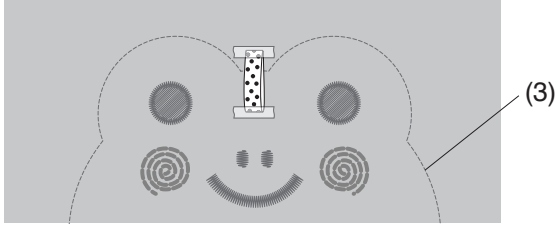
2.



2. Attach a stabilizer on the wrong side of the fabric 1. Set the fabric in embroidery hoop (refer to pages 26-27). Attach the embroidery hoop on the carriage (refer to page 28).
   (1) Fabric 1
   (2) Stabilizer

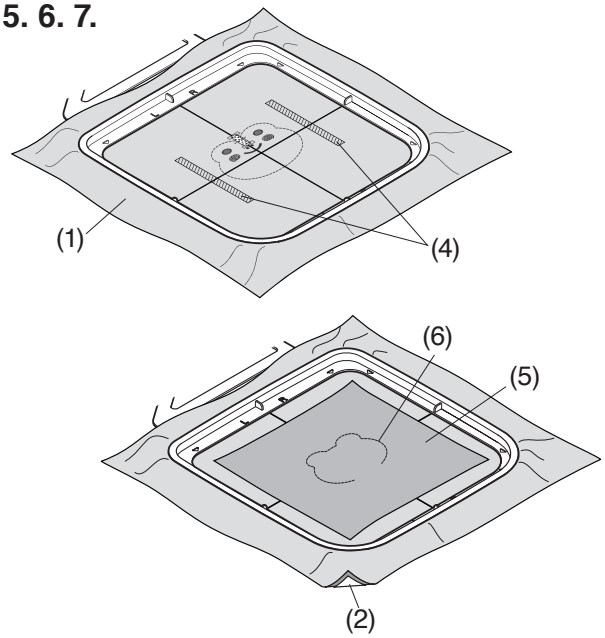
NOTE:
Do not remove the fabric from the embroidery hoop until the sewing project is completed.

3. 4.

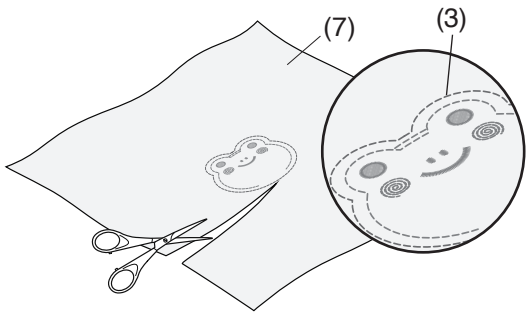


3. Embroider the following parts: eyes, mouth, nose, cheeks and cut-off line.
   (3) Cut-off line
4. If you want to attach the ribbon, baste it at this step (refer to page 44).

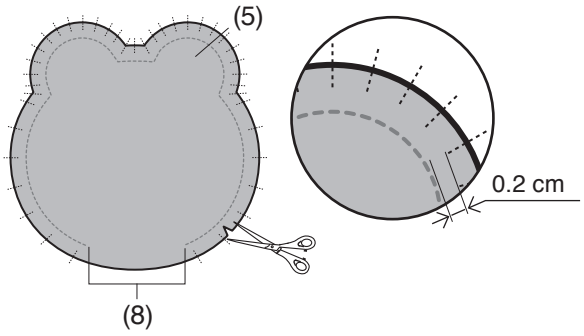
5. 6. 7.



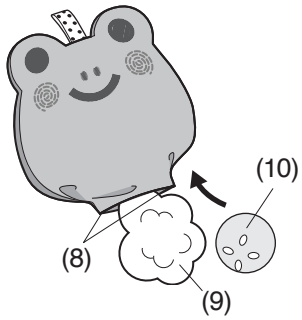
8.



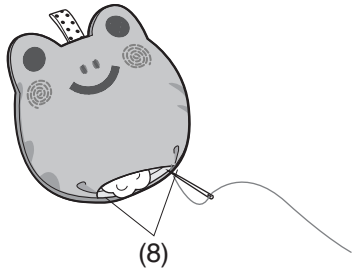
9. 10.



11.



12.



5. After sewing is finished, apply glue on both sides of the embroidery design as shown.
Place fabric 2 with the right side down on the fabric 1 and stick them together with glue.

(1) Fabric 1 (right side)
(4) Glue

NOTE:
Apply the glue lightly where it will not overlap with the stitches. If the glue sticks to the needle or the hook race, it may cause breakage or malfunction.

6. Embroider the rest of the design. After sewing is finished, remove the fabrics from the embroidery hoop.

(5) Fabric 2 (wrong side)
(6) Seam line

NOTE:
Use the same (or similar) colors for the fabrics and the upper threads, so that the threads will not stand out (or pop up) when turning the fabric inside out.

7. Remove the stabilizer from fabric 1.

(2) Stabilizer

NOTE:
- If the stabilizer is soft and one-sided, there is no need to remove it.
- Warm up the stabilizer with an iron for easier removal. Cover the stabilizer with a cloth when ironing to prevent sticking on the iron.

8. Cut the fabrics along the cut-off line (outmost seams) with scissors.

(7) Fabric 1 (wrong side)
(3) Cut-off line

9. Cut slits from the edge of the fabric to 0.2 cm in front of the seam in the curved area.
Be careful not to cut the seam.

10. Turn the doll inside out from the opening.

(5) Fabric 2 (wrong side)
(8) Opening

NOTE:
- Non-stretch fabrics may be difficult to turn the right side out. In that case, use an awl to turn the right side.
- If an awl seems to make a hole in the fabric, use a thin stick with a rounded end to turn the fabric right side out.

11. Adjust the shape of the doll and stuff the doll with wad cotton and a plastic bell from the opening.

(8) Opening
(9) Wad cotton
(10) Plastic bell

12. Stitch the opening by hand to close it.
If you want to attach a stick-type handle (#7), insert the opening of the handle into the opening of the stuffed doll and hand-sew the area around the opening to close it.

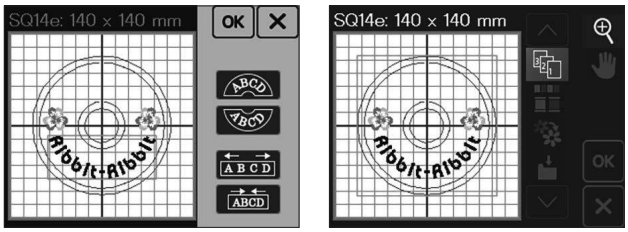
(8) Opening

Example: In-The-Hoop Designs <Rattles>#5+#6

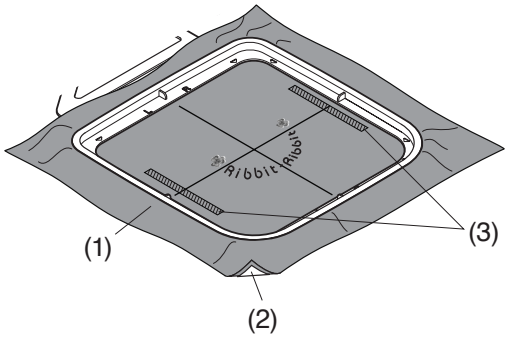
Creating the handle with monograms

1. Select #6 in the editing mode. Edit monograms as you like (refer to page 59)
2. Change the sewing order so that pattern 6 be sewn at the end (refer to page 64).

1. **2.**



3.



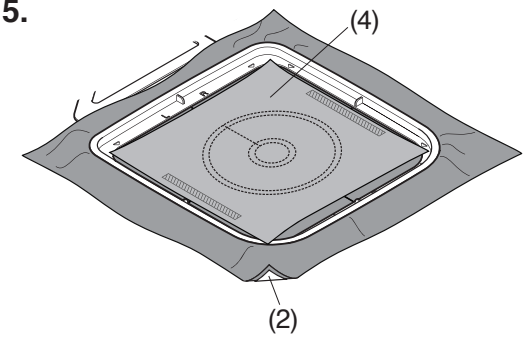
3. Attach a stabilizer on the wrong side of the fabric 3 and set the fabric in embroidery hoop (refer to pages 26-27). Attach the embroidery hoop on the carriage (refer to page 28).

   Embroider monograms and patterns. Apply glue on the inside edge of the embroidery hoop as shown.

   (1) Fabric 3 (right side)
   (2) Stabilizer
   (3) Glue

NOTE:
Apply a thin layer of glue to baste the fabric in place where it will not overlap with the stitches. If glue gets on the needle or bobbin holder, it can cause poor quality of sewing, damage or malfunction of the machine.

4. 5.



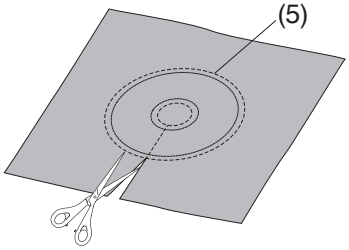
4. Place fabric 4 with the right side down on the fabric 3. Embroider the rest of the design. After sewing is finished, remove the fabrics from the embroidery hoop.

   (4) Fabric 4 (wrong side)

5. Remove stabilizer from fabric 3 if necessary.

   (2) Stabilizer

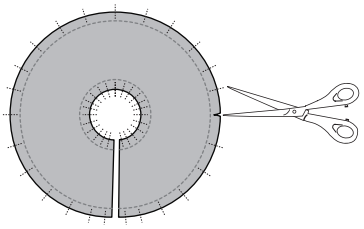
6.



6. Cut the fabrics along the cut-off line (outmost seams) with scissors.

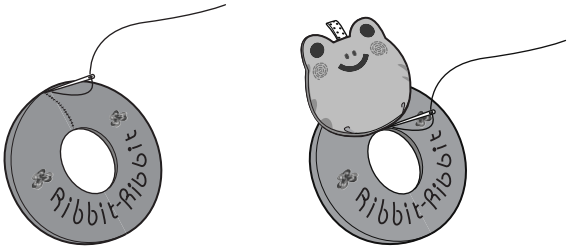
   (5) Cut-off line

7.



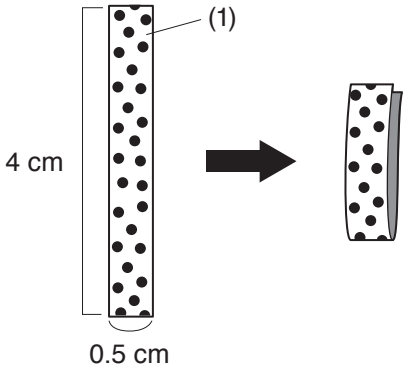
7. As in steps **9.** to **11.** of “Creating the doll”, make a slit along the curve, turn it over through the opening, and stuff it with cotton.

8.

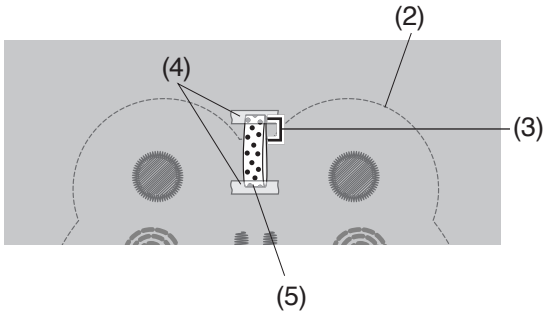


8. Stitch the opening by hand to close it.
   Attach the stuffed doll and the rattle together to hide the seam.

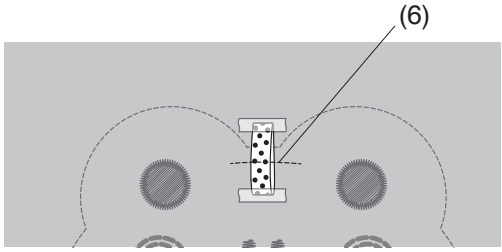
1.



2.



3.



Attaching the ribbon

The embroidery data for the stuffed doll includes sewing for basting the ribbon for passing a ball chain.
If you add the ribbon in step **4.** of “Creating the doll”, follow the step below.

1. Cut a piece of ribbon approximately 0.5 cm wide and 4 cm long and fold it in half.

(1) Ribbon

2. Place the ribbon so that the end of the ribbon exceeds approximately 0.5 cm outside the cut-off line, and secure both ends of the ribbon fix them with sticky tapes as shown. Make sure that the fold of the ribbon is on the inside of the cut-off line.

(2) Cut-off line
(3) 0.5 cm
(4) Sticky tape
(5) Ribbon fold

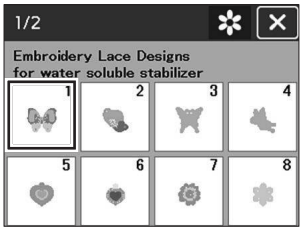
3. Baste the ribbon. After the sewing is finished, remove the sticky tapes.

(6) Basting

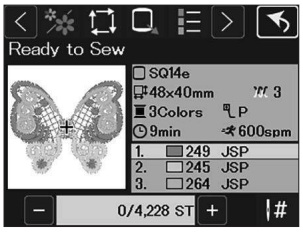
For the rest of the steps, refer to “Creating the doll” step **5.** onward (refer to page 42).

1.







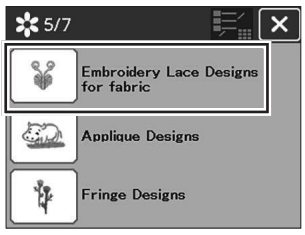


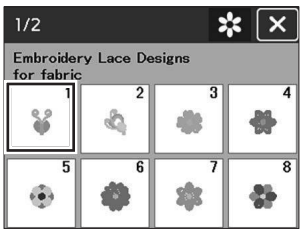
2.

(1)

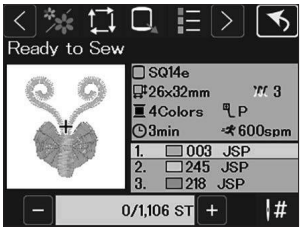


3.









Embroidery Lace Designs

You can attach the lace pieces in the “Embroidery Lace Designs for water soluble stabilizer” category to a background fabric with the lace designs in the “Designs for fabric” category to achieve a three-dimensional appearance.

Lace designs in the “Embroidery Lace Designs for water soluble stabilizer” require water soluble stabilizer for embroidering.

NOTE:
Use the standard bobbin holder when sewing designs that use the same thread for the bobbin as the needle thread.

Butterfly design

Example: Embroidery Lace Designs for water soluble stabilizer #1

Attach the water soluble stabilizer to the hoop.
Be sure that the stabilizer is stretched tightly in the hoop (refer to pages 26-27).

1. Select “Embroidery Lace Designs for water soluble stabilizer” #1. Press the OK key to confirm the hoop size. Start sewing.
2. Remove the water soluble stabilizer from the hoop. Trim away the water soluble stabilizer surrounding the design pattern with scissors.

   Remove the water soluble stabilizer by soaking the butterfly wing design in a bowl of warm water.

   Be sure that the lace piece to be attached is completely dried out after removing from water.

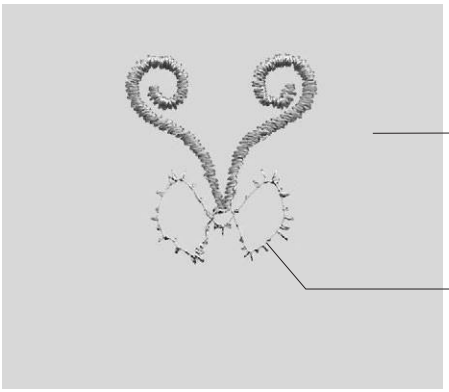
   The butterfly wings part is completed.

   (1) Butterfly wing design

NOTE:
- Do not rub or scratch the embroidery lace designs for water soluble stabilizer.
- Refer to page 25 for how to use a water soluble stabilizer.

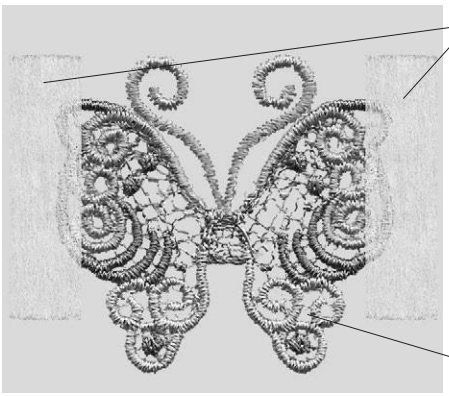
3. Attach the background fabric to the hoop.
   Select “Embroidery Lace Designs for fabric” #1.
   Confirm the embroidery hoop size and press the OK key.
   Start sewing.
   Sew the first and second sections (color).

4.



4. The second section is the placement guide for placing butterfly wings.
(2) Background fabric
(3) Placement guide (second section)

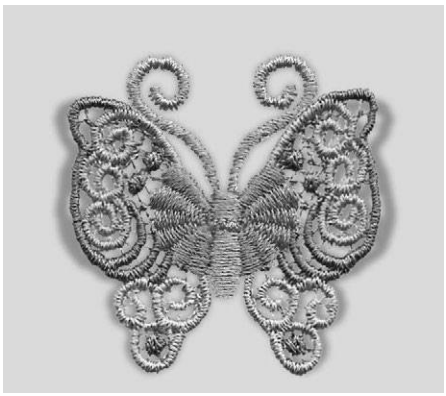
5.



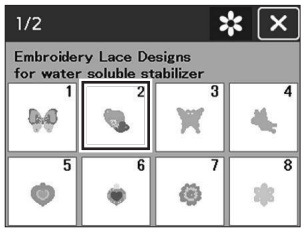
5. Place the butterfly wings piece which was created in step **2**. above so that the butterfly wings are aligned with the placement guide.
Use tape to hold the design for your convenience.
(1) Butterfly wing
(4) Tape

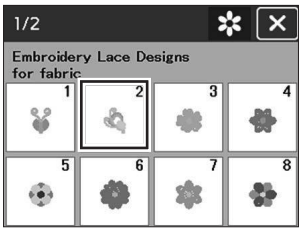
NOTE:
Press the key in the Ready to Sew window. Press one of the keys to move the carriage to a standby position (refer to page 36).

6.



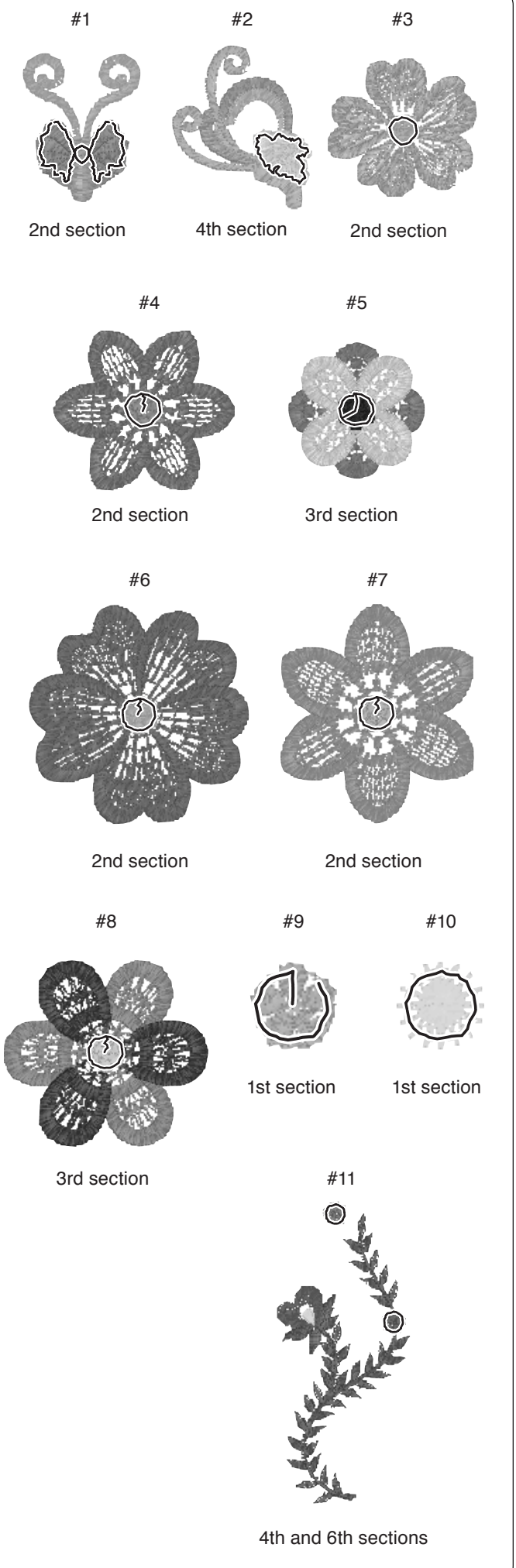
6. Sew the third section (color) over the design.
The butterfly wings are attached to the background fabric.
Sew the rest of the section (color) and remove the tape to complete the design.





NOTE:
The other butterfly design also requires a combination of "Embroidery Lace Designs for water soluble stabilizer" #2 and "Embroidery Lace Designs for fabric" #2. Place the butterfly wing piece on the placement guide and continue sewing.





Placement guides for "Embroidery Lace Designs for fabric"

Each embroidery design in the "Embroidery Lace Designs for fabric". category contains a placement guide section for placing "Embroidery Lace Designs for water soluble stabilizer".

After the placement guide is sewn, the machine will sew over the lace piece with the next section (color) to hold the piece.

The placement guides and their sewing orders are shown on the left. Place the desired lace piece on the placement guide and hold it with tape. Sew over the lace piece with the next section to hold the piece.

Applique Designs

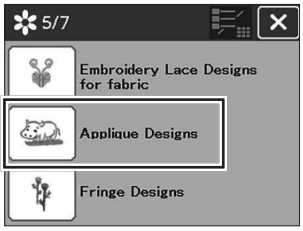
Prepare background fabric and applique fabric.

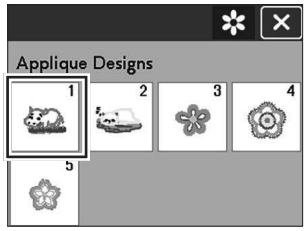
Example: Applique Designs pattern #1

1. Select the Applique Designs pattern #1.
A message will appear to confirm the size of the embroidery hoop.
Press the OK key to show the Ready to Sew window.

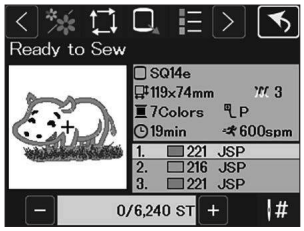
(1) OK key

1.



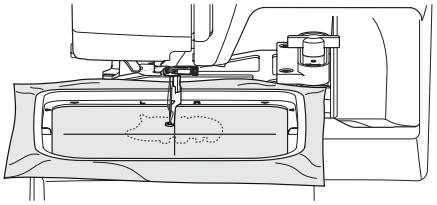






2. Set the applique fabric to the embroidery hoop.
Attach the hoop to the machine and sew the first color section.

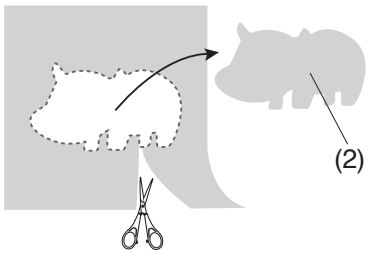
2.



3. After finishing sewing the first color section, remove the hoop from the machine.
Unhoop the applique fabric and cut the applique fabric along the stitching line to make an applique piece.

(2) Applique fabric

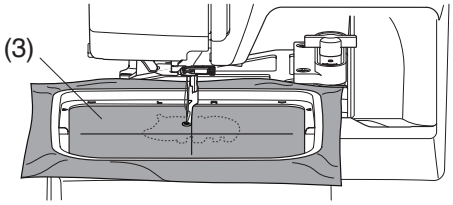
3.



4. Set the background fabric to the hoop, attach the hoop to the machine, then sew the second color section to the background fabric.

(3) Background fabric

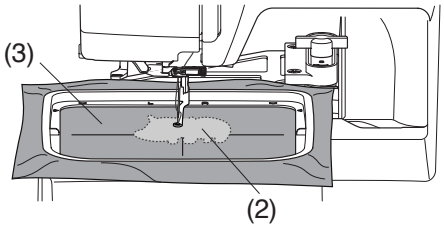
4.



5. Attach the applique fabric on the second color section.
Apply a thin layer of glue on the wrong side of the applique fabric and attach to the background fabric.

(2) Applique fabric
(3) Background fabric

5.



> **⚠ CAUTION:**
> Do not apply glue on the seams.
> If the glue sticks to the needle or the hook race, it may cause breakage or malfunction.

6. Start the machine to sew the third color section.

6.

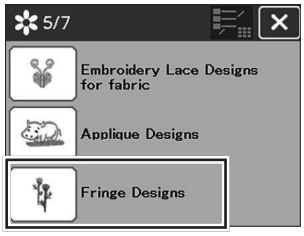


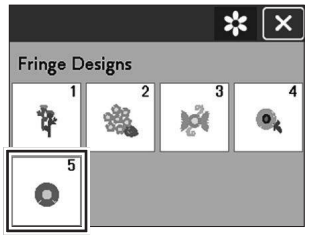
Fringe Designs

Fringe designs are special patterns for creating fringed flowers.
The embroidery design easily turns into an attractive fringed flower.

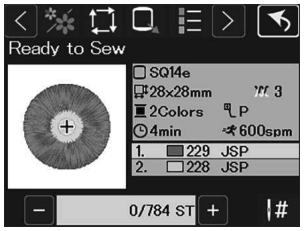
Example: Fringe Designs pattern #5

1.





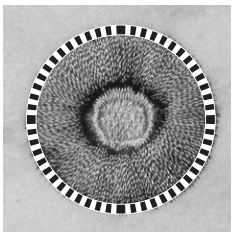


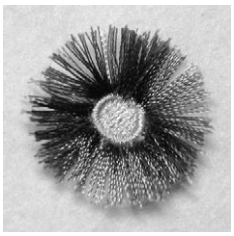


1. Select the Fringe Designs pattern #5.
A message will appear to confirm the size of the embroidery hoop.
Press the OK key.

(1) OK key

2. 3. 4. 5.





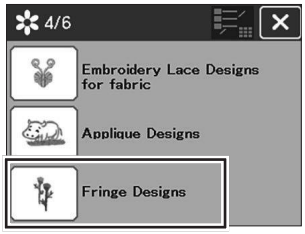
2. Sew the pattern as you would sew a normal embroidery design.

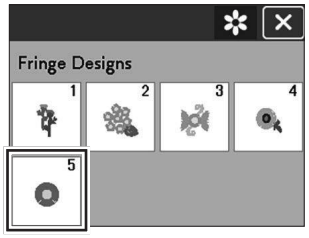
3. Remove the fabric from the hoop.

4. Cut the needle threads along the broken line at the outer edge of the pattern as show.

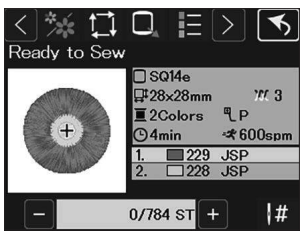
5. Ruffle the threads to make the fringe.

1.

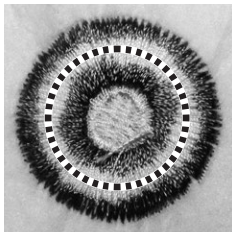






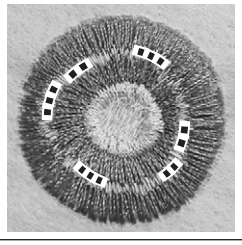


2. 3. 4. 5.





When the bobbin threads are too narrow



Alternative method for fringe designs

1. Select the Fringe Designs pattern #5.
A message will appear to confirm the size of the embroidery hoop.
Press the OK key to show the Ready to Sew window.

(1) OK key

2. Sew the pattern as you would sew a normal embroidery design.

3. Remove the fabric from the hoop.

4. Cut the bobbin threads along the broken line at the outer edge of the pattern as shown.

> **NOTE:**
> When the bobbin threads are too narrow to see and cut, choose the bobbin threads you can cut and remove them (shown as dots).

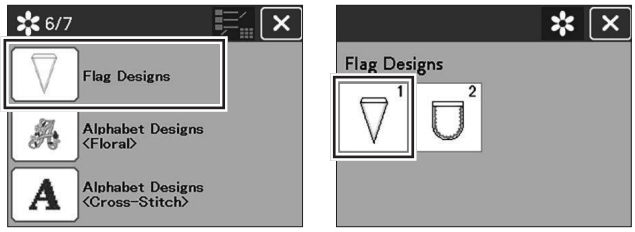
5. Pull the needle threads up and bring the loop ends to the right side of the fabric to make the fringe.

Flag Garlands

You can make your own flag garlands by embroidering patterns on the flags.

Example: Flag Designs pattern #1

1. Select Flag Designs pattern #1.

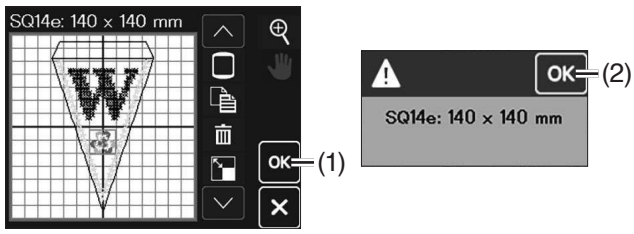


2. Edit your pennant design in the editing mode.
Press the OK key.

(1) OK key

3. A message will appear to confirm the size of the embroidery hoop.
Press the OK key to show the Ready to Sew window.

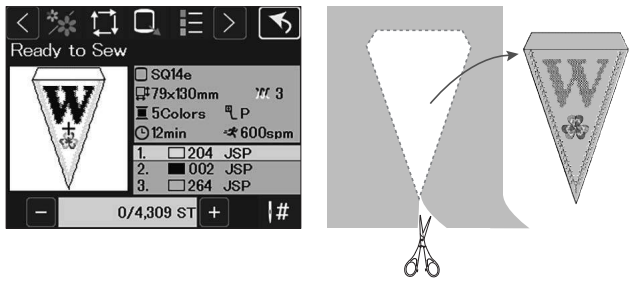
(2) OK key



4. The Ready to Sew window will open.
Set the fabric in the hoop and attach the hoop to the carriage.
Press the start/stop button to sew.

5. Remove the hoop from the carriage when sewing is finished. Remove the fabric from the hoop.

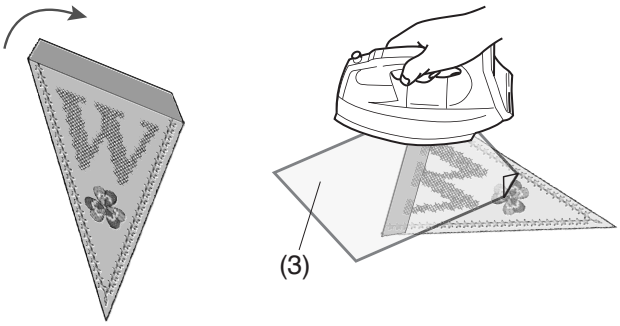
Cut out the pennant design along the outer seam.



6. Fold back the top of the pennant to the wrong side of the fabric as shown.

Use press cloth and iron the folded edge.

(3) Press cloth

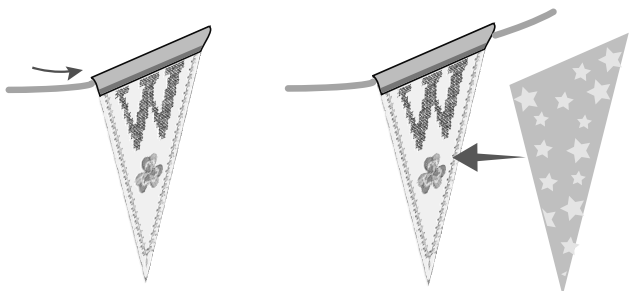


7. Sew the folded edge or paste the wrong side of the folded edge with double-sided tape or glue.
Be sure to leave space to pass the cord through.

8. Pass the cord through the hole as shown.

9. Cut the fabric to the same size as the pennant design.

Sew the fabric to cover the back of the pennant.



10. Repeat the procedure above and make your own flag garland.



Monogramming for Embroidery

Programming a monogram

Example: Programming “R&B” in Gothic style font

1. Press the font selection key to show the font selection window (refer to page 31). Select Gothic font.

(1) Font selection key

Enter “R”, the cursor shifts to the right and **“R”** is automatically memorized.

Press the letter size key and select small size.

(2) Letter size key
(3) Cursor

2. Enter “&”, the cursor shifts to the right and **“&”** is automatically memorized.
Press the letter size key and select medium size.
Enter “B”, the cursor shifts to the right and **“B”** is automatically memorized.
Press the OK key.

(4) OK key

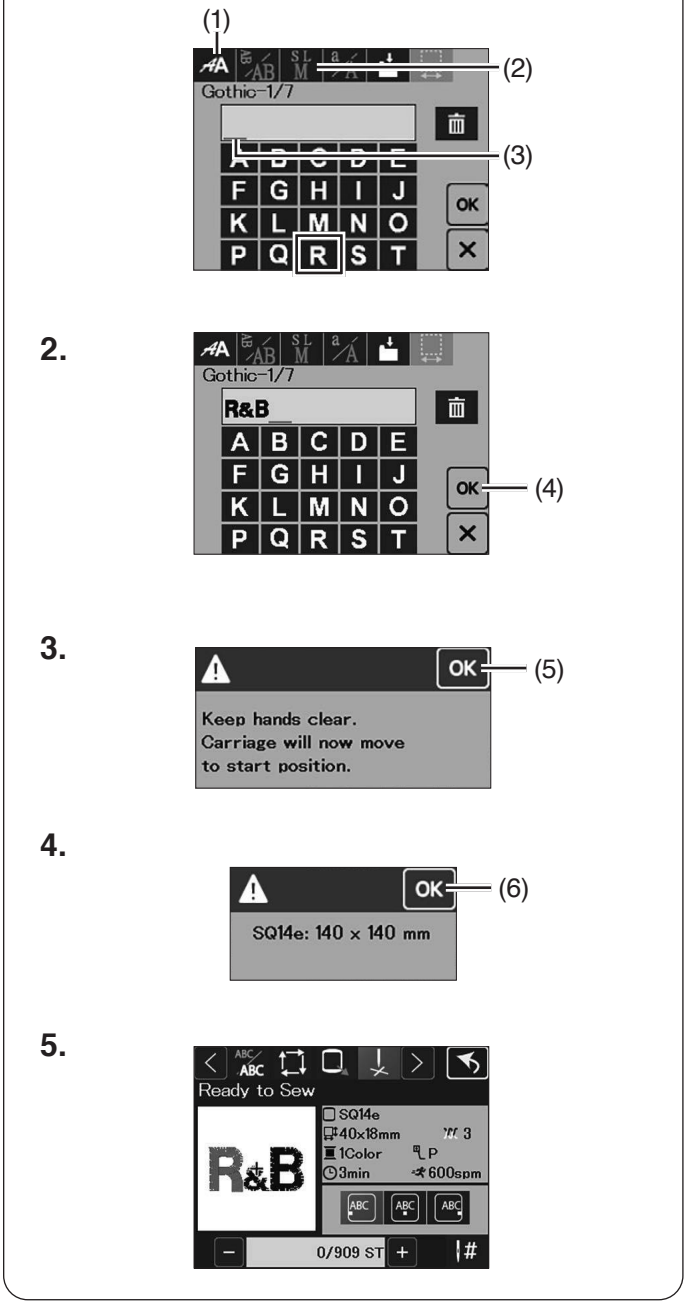
3. A warning message will appear.
Press the OK key and the carriage moves to starting position.

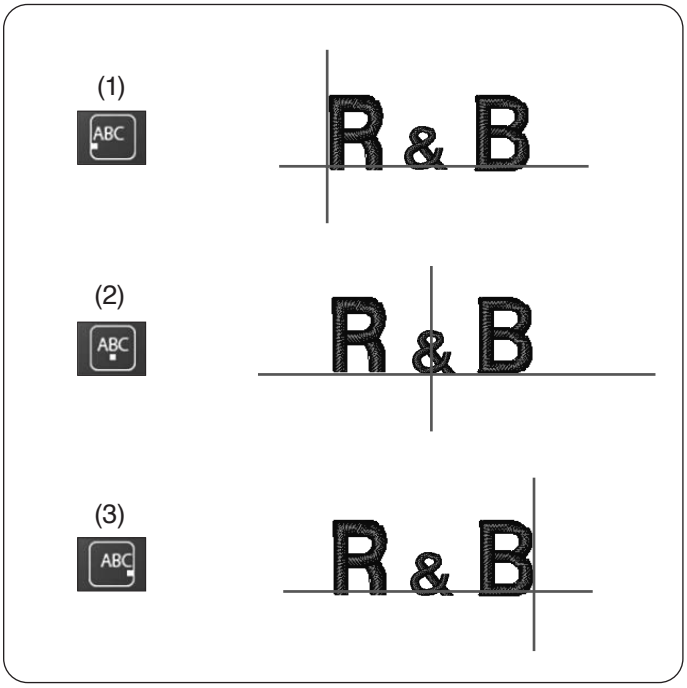
(5) OK key

4. A message will appear to confirm the hoop size.
Press the OK key.

(6) OK key

5. The screen changes to the Ready to Sew window.
Press the start/stop button to start sewing.





Monogram placement

You can select one of 3 monogram placements:
left justify, center justify and right justify.

(1) Left Justify

Press the ABC key to start sewing from the left end reference line on the template.

(2) Center Justify

Press the ABC key to sew in the center of the hoop.

(3) Right Justify

Press the ABC key sew from the right end reference line on the template.

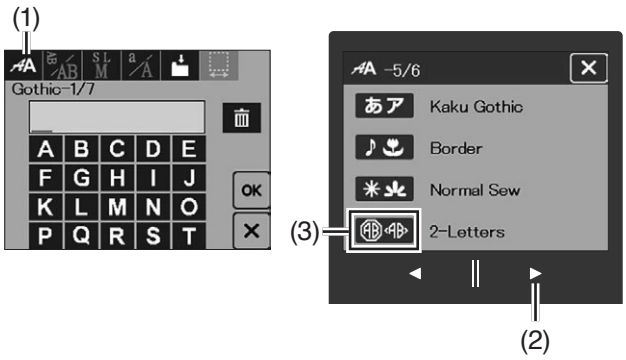
2-Letters monogram

Example: 2-Letters in an octagon

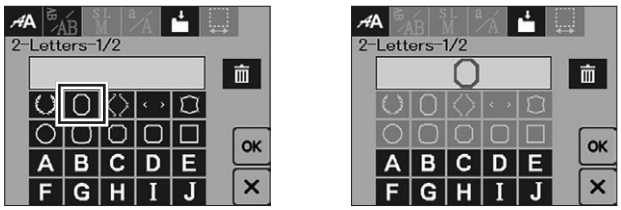
1. Press the font selection key to open the font selection window.

Press the page key and select “2-Letters”.

(1) Font selection key
(2) Page key
(3) 2-Letters

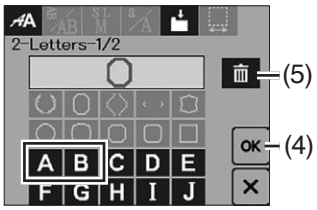


2. Select the octagon.



3. Enter “A” and “B”.
Press the OK key.

(4) OK key

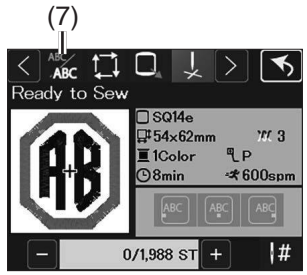


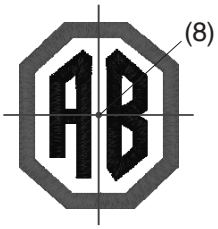
4. A message will appear to confirm the hoop size.
Press the OK key.

(6) OK key



5. The screen changes to the Ready to Sew window.
Press the start/stop button to start sewing.





NOTE:
If you want to change the text, press the delete key and start over by selecting the frame pattern and text again.

(5) Delete key

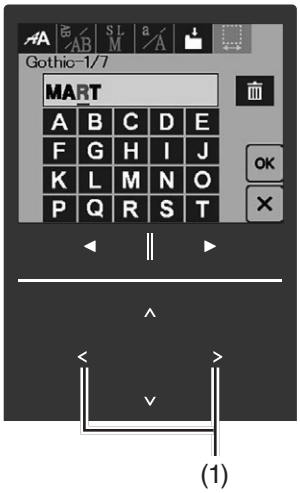
NOTE:
If you press the color change key before sewing, the machine will stop after each letter is sewn. You can then change the thread to change the color of the letters.

(7) Color change key

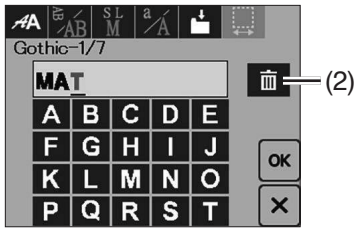
NOTE:
The 3-Letters monogram is sewn in the same way as the 2-Letters monogram.
The starting position for the 2-Letters and 3-Letters monogram is at the center of the hoop.

(8) Starting point

1.



2.



3.



4.



Editing a monogram

Deleting a character: Deleting **"R"** from **"MART"**

1. Press the cursor keys to move the cursor under "R" The color of the selected character with the cursor turns blue.
(1) Cursor keys

2. Press the delete key and the letter **"R"** is deleted.
(2) Delete key

NOTE:
If the cursor is to the right of the last character, the last character is deleted.

Inserting a character: Inserting **"E"** into **"MAT"**

3. Press the cursor keys to move the cursor under "A".
(1) Cursor keys

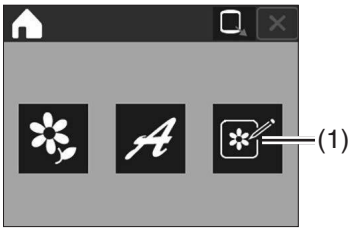
4. Enter **"E"**.
The letter "E" is inserted before **"A"**.

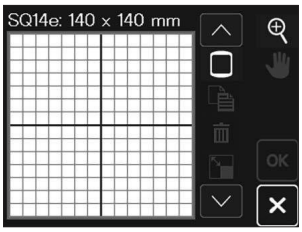
Editing Mode

In the editing mode, you can edit and combine patterns to create original embroidery designs.

Press the editing key on the home window to show the editing window for hoop SQ14e.

(1) Editing key





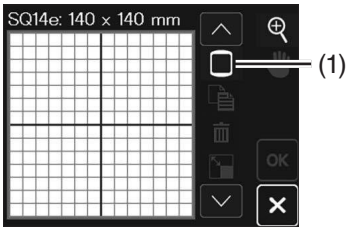
Selecting a hoop size

You can select other hoop sizes.

1. Press the hoop selection key and the hoop selection window will open.

(1) Hoop selection key

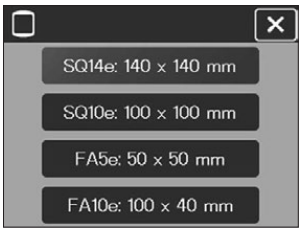
1.



2. Select the desired hoop.

The screen will return to the editing window

2.



NOTE:
In the editing mode, you cannot select patterns larger than the size of the selected hoop.

Opening the embroidery designs

In the editing window, you can open the built-in designs, monogram, and designs in the internal or USB flash drive.

To open built-in design patterns, press the home key.

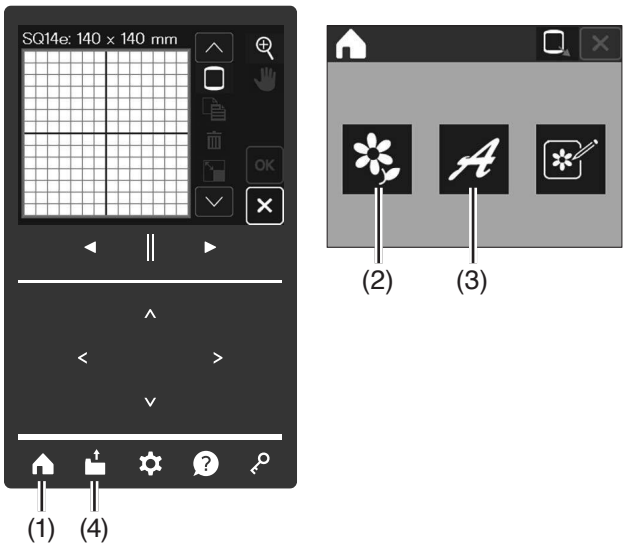
Press the design category key to select the desired pattern from the design list (refer to pages 97-100).

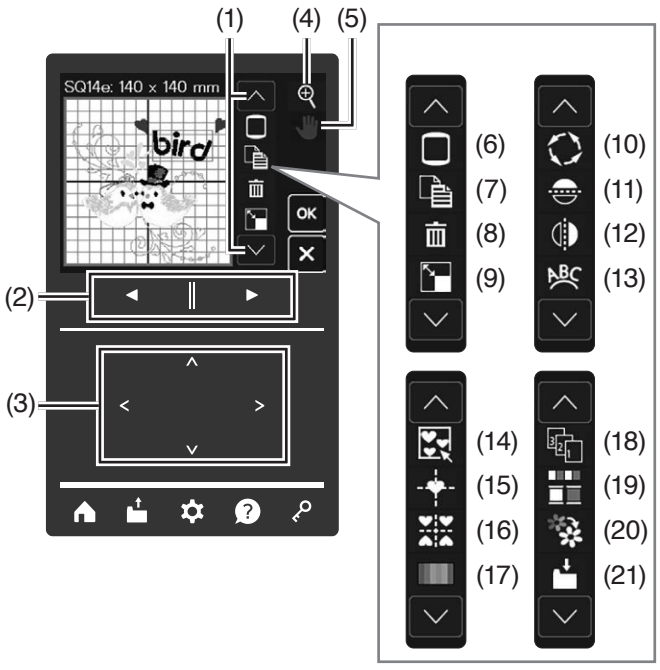
The screen will return to the editing window with the selected pattern displayed.
To add more design patterns or monogram in the editing window, press the home key again and select the desired pattern or monogram from the design list (refer to pages 97-103).

(1) Home key
(2) Design category key
(3) Monogram key

To open designs in a USB flash drive, press the open file key (refer to pages 74-75).

(4) Open file key



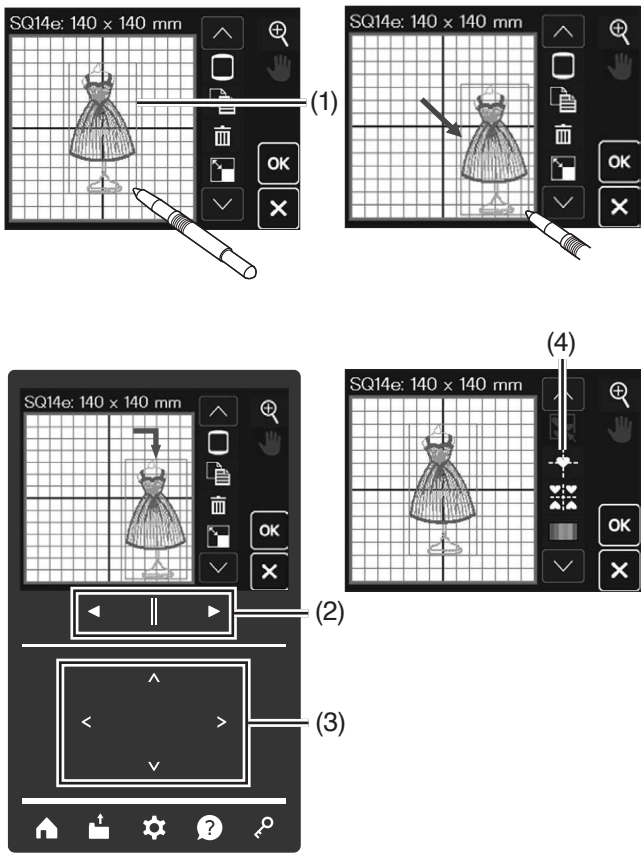


Editing Window Information

The editing window contains the following keys. Press the next/previous set key to switch the editing tools.

NOTE:
Some keys may not be available depending on the selected pattern or settings.

(1)	Next/Previous set key	
(2)	Page keys	(refer to page 55)
(3)	Jog keys	(refer to page 55)
(4)	Zoom key	(refer to page 57)
(5)	Scroll key	(refer to page 57)
(6)	Hoop selection key	(refer to page 54)
(7)	Duplicate key	(refer to page 56)
(8)	Delete key	(refer to page 56)
(9)	Resize key	(refer to page 57)
(10)	Rotate key	(refer to page 58)
(11)	Horizontal mirror image key	(refer to page 58)
(12)	Vertical mirror image key	(refer to page 58)
(13)	Arc key	(refer to page 59)
(14)	Group key	(refer to page 60)
(15)	Center position key	(refer to page 55)
(16)	Corner layout key	(refer to page 61)
(17)	Custom color key	(refer to page 62)
(18)	Sewing order key	(refer to page 64)
(19)	Color group key	(refer to page 65)
(20)	Single color sewing key	(refer to page 66)
(21)	Save file key	(refer to page 66)



Selecting a pattern

To select the pattern to edit, press on the pattern image in the editing window.
A green frame appears around the selected pattern.

(1) Green frame

NOTE:
If multiple patterns are placed close to each other and it is difficult to select the desired pattern. Use the page keys to select the pattern you want to edit.

(2) Page keys

Moving a pattern

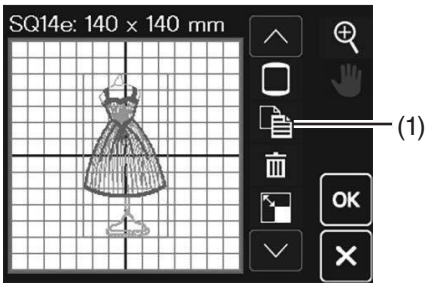
To move the embroidery pattern in the editing window, press and drag the pattern to a desired location with the touch screen stylus.
You can also move the selected pattern by pressing the jog keys.
Press the jog keys to move the pattern to the desired position in the editing window.
Press the center position key to move the pattern to the center of the editing window.

(3) Jog keys
(4) Center position key

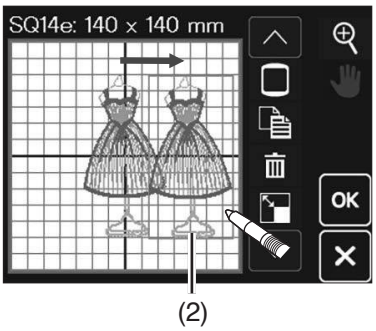
NOTE:
- Do not drag the pattern on the screen with a sharp pointed object.
- The carriage will not move when you press the jog keys since the pattern position will move relative to the hoop, not to the machine.



1.



2.



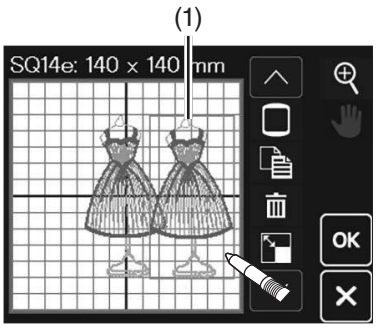
Duplicating a pattern

1. To make a copy of the selected pattern, press the duplicate key.
   A green frame appears around the selected pattern. Press the duplicate key to duplicate the selected pattern.
   (1) Duplicate key

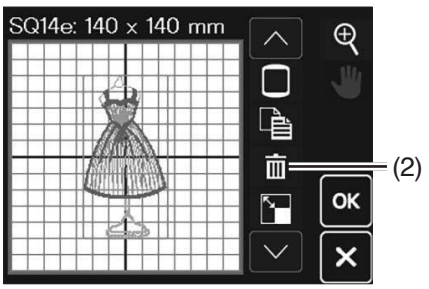
2. The duplicated pattern will be copied over the original pattern. Move the duplicate to show the original pattern.
   (2) Duplicated pattern



1.



2.



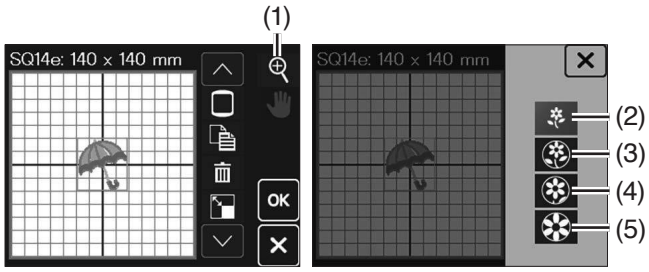
Deleting a pattern

1. Press on the pattern to delete.
   A green frame appears around the selected pattern.
   (1) Deleting pattern

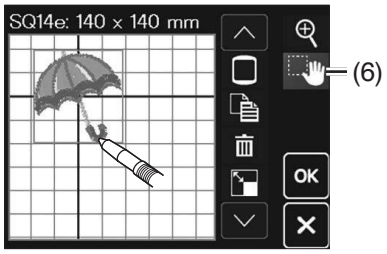
2. Press the delete key to delete the selected pattern
   (2) Delete key

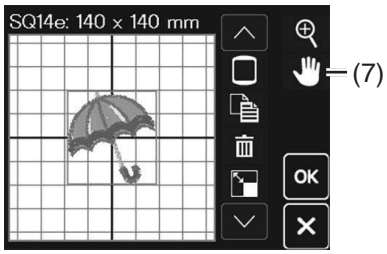


1.



2.





Zooming in the editing window

1. Press the zoom key to open the zoom in/out window.

Select the view size from normal, middle, large or largest by pressing one of the view size keys.

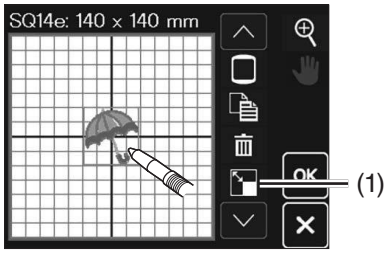
(1) Zoom key
(2) Normal view size key
(3) Middle view size key
(4) Large view size key
(5) Largest view size key

2. The scroll function is activated automatically when zoomed in (the scroll key turns blue).
To scroll the magnified window, drag the window in the desired direction.
Press the scroll key to cancel the scroll command.

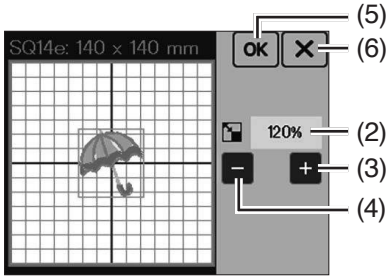
(6) Scroll key (activated)
(7) Scroll key (deactivate)



1.



2.



Resizing a pattern

1. Press the resize key to open the resize option window. A green frame appears around the selected pattern. Press the resize key to resize the selected pattern.

(1) Resize key

2. You can change the embroidery pattern size from 80% to 120% of the original size.

Press the “+” key to enlarge the pattern size.
Press the “–” key to reduce the pattern size.
The size will change 1% each time you press the “+” or “–” key. To change the size quickly, press and hold the “+” or “–” key.

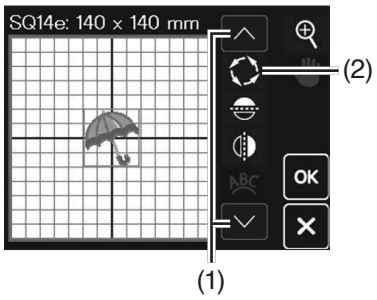
The scale of a resized pattern is displayed as a percentage.

Press the OK key to confirm the new size.
Press the X key to return to the previous page.

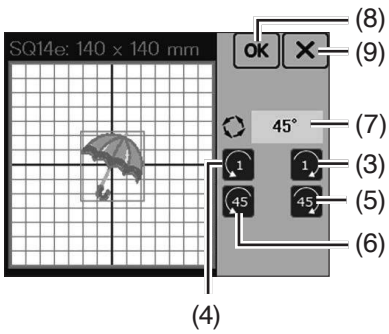
(2) Pattern size
(3) + key
(4) – key
(5) OK key
(6) X key



1.



2.



Rotating a pattern

1. Press on the pattern to rotate.
A green frame appears around the selected pattern.
Press the next/previous set key to show the rotate key.
Press the rotate key to rotate the selected pattern.

(1) Next/Previous set key
(2) Rotate key

2. Press the key (3) to rotate the selected pattern 1 degree clockwise.

Press the key (4) to rotate the selected pattern 1 degree counterclockwise.

Press the key (5) to rotate the selected pattern 45 degree clockwise.

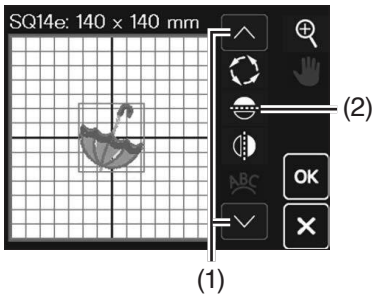
Press the key (6) to rotate the selected pattern 45 degree counterclockwise.

The angle of a rotated pattern is displayed in the window.
Press the OK key to confirm.
Press the X key to return to the previous page.

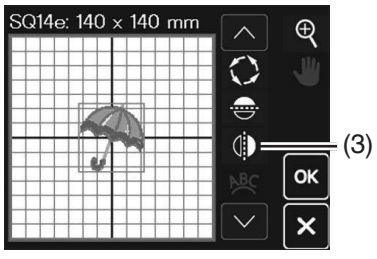
(7) Angle of a rotated pattern
(8) OK key
(9) X key



1.



2.



Flipping a pattern

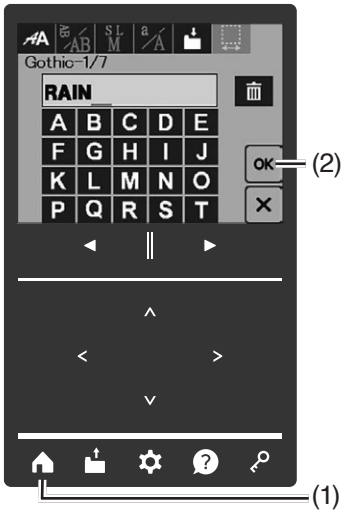
1. Press on the pattern to flip.
A green frame appears around the selected pattern.
Press the next/previous set key to show the horizontal mirror image key.
Press the horizontal mirror image key to create the horizontal mirror image of a selected pattern.

(1) Next/Previous set key
(2) Horizontal mirror image key

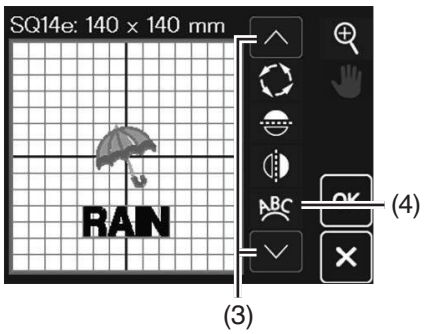
2. Press the vertical mirror image key to create the vertical mirror image of a selected pattern.

(3) Vertical mirror image key

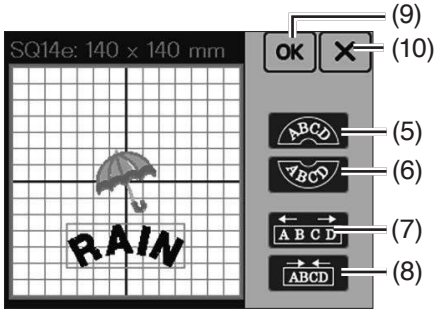
1.



2.



3.



Monogramming in an arc

In the editing mode, you can make a monogram in an upper or lower arc.

Example: RAIN/Gothic/Middle size/Upper case

1. Press the home key and press the monogram key in the home window (refer to page 31).

Enter the monogram and press the OK key.

(1) Home key
(2) OK key

2. The entered characters are displayed in the editing window.

Press the next/previous set key to show the arc key.

Press the arc key and the arc layout window will open.

(3) Next/Previous set key
(4) Arc key

3. Press the upper arc key to make an upper arc.

Press the lower arc key to make a lower arc.

Press the enlarge key to make the arc longer.

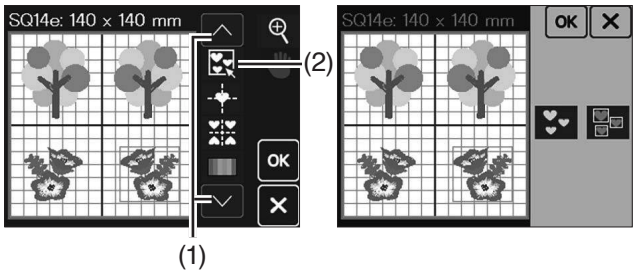
Press the shorten key to make the arc shorter.

Press the OK key.

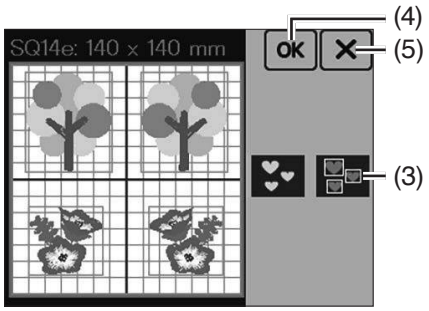
Press the X key to return to the previous page.

(5) Upper arc key
(6) Lower arc key
(7) Enlarge key
(8) Shorten key
(9) OK key
(10) X key

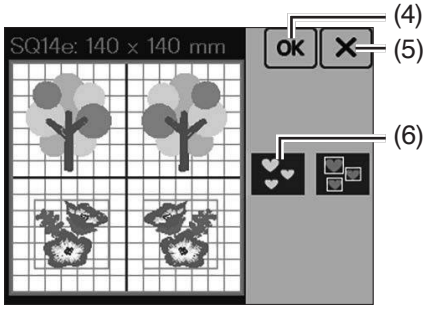
1.



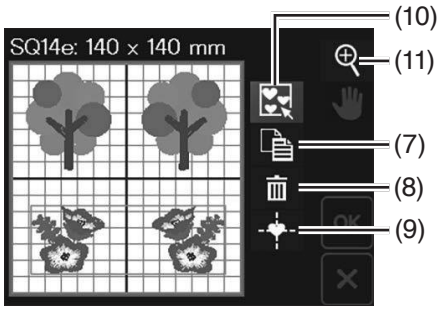
2.



3.



4.



Grouping patterns

1. You can group patterns together.
Press the next/previous set key to show the group key. Press the group key and the grouping option window will open.

(1) Next/Previous set key
(2) Group key

2. Press the group all key and press the OK key to group all the patterns in the editing window.
Press the X key to return to the previous page.

(3) Group all key
(4) OK key
(5) X key

3. If you wish to group the selected patterns only, press the group select key.

Select the desired patterns by pressing on the pattern images. A green frame appears around the selected pattern.

Press the selected pattern again to unselect the pattern.

Press the OK key to group the selected patterns.

Press the X key to return to the previous page.

(4) OK key
(5) X key
(6) Group select key

4. The grouped patterns can be moved, duplicated, deleted and moved to the center position as a unit.

After editing, press the group key.

When grouping the selected patterns only, the rest of the patterns are grayed out and cannot be selected.

To ungroup the patterns, press the group key again.

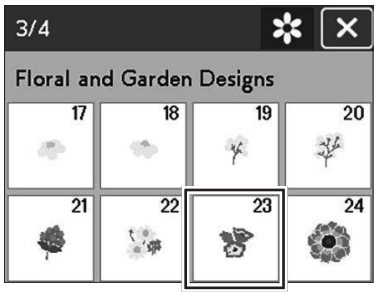
To change the magnification, press the zoom key (refer to page 57).

(7) Duplicate key
(8) Delete key
(9) Center position key
(10) Group key
(11) Zoom key

Corner layout

1. Select a pattern.

1.



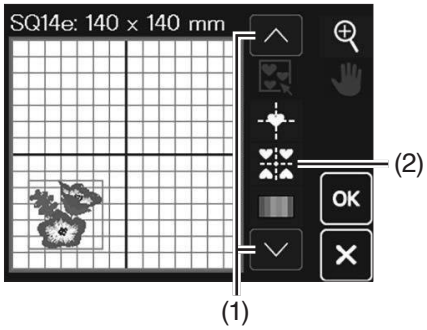
2. Move the design down and to the left.

Press the next/previous set key to show the corner layout key.

Press the corner layout key.

(1) Next/Previous set key
(2) Corner layout key

2.

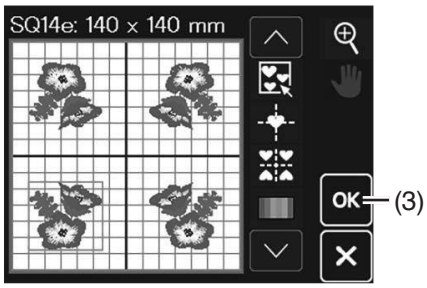


3. The pattern will automatically be copied and placed symmetrically into 4 corners.

Press the OK key.

(3) OK key

3.



4. The Ready to Sew window will open.

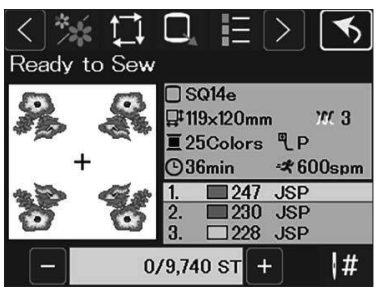
A message will appear to confirm the size of the embroidery hoop.

Press the OK key.

(4) OK key

4.





Customizing the display colors

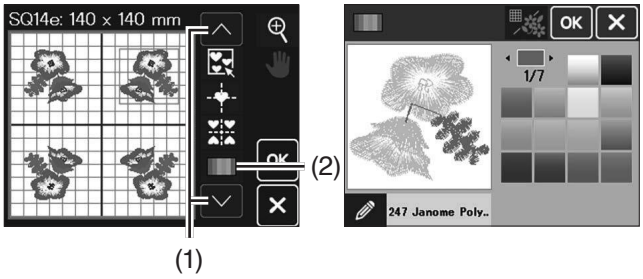
You can simulate the colors of the actual fabric and threads on the screen by customizing the colors of the design image and editing window.

Colors of the design pattern

1. Press the next/previous set key to show the custom color key.

Press the custom color key and the custom color window will open.

(1) Next/Previous set key
(2) Custom color key



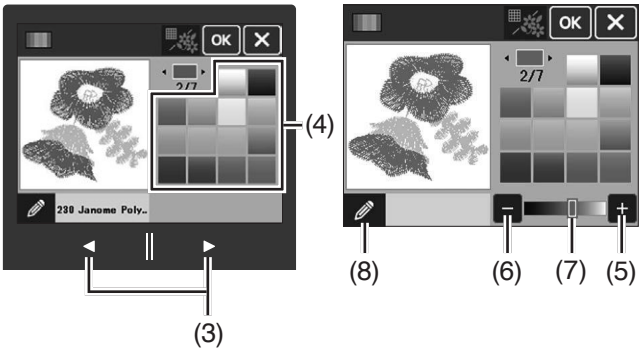
2. Press the page keys until the desired section is displayed in the preview window.

To select the hue, press one of the 14 color tiles.

(3) Page keys
(4) Color tiles

3. To change the shade of the selected color, press the "+" or "–" key, or drag the slider to the left or right.

(5) + key
(6) – key
(7) Slider



4. You can assign a name to the customized color for the color section by pressing the name key (refer to page 72).

Enter a new name in the new name window and press the OK key.

Up to 30 characters can be entered.
Press the delete key to change the input.

(8) Name key
(9) OK key
(10) Delete key

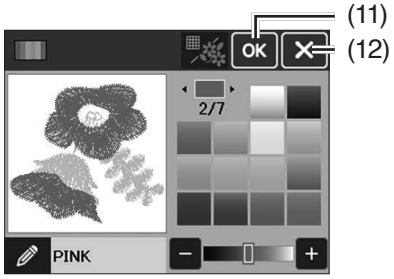


5. Press the OK key in the custom color window.

The assigned name will be displayed instead of the name and code of the thread color in the embroidery window.

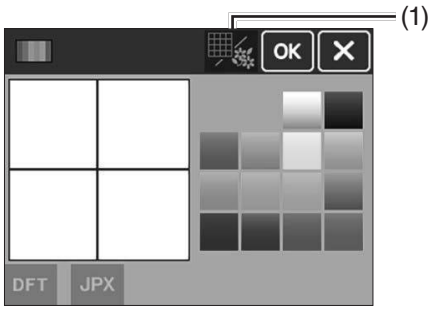
Press the X key to return to the previous page.

(11) OK key
(12) X key

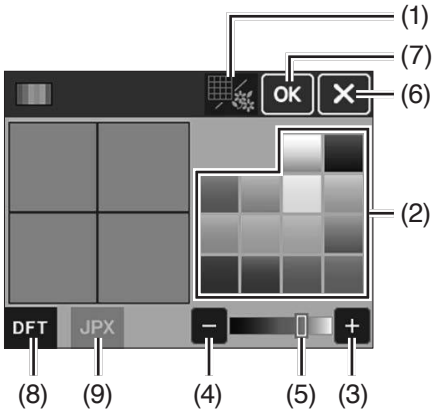


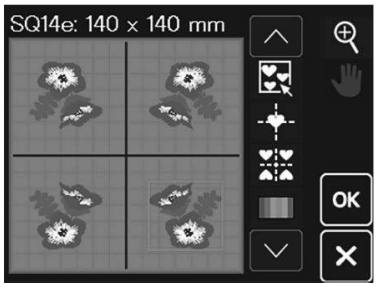


1.



2. 3.





Colors of the background

1. To change the background color, press the design color/background color key and select the desired color.
The custom color window will open.
(1) Design color/background color key

2. To select the hue, press one of the 14 color tiles.
To change the shade of the selected color, press the "+" or "–" key, or drag the slider to the left or right.
Press the X key to return to the previous window.
Press the design color/background color key to return to the custom color window.
(1) Design color/background color key
(2) Color tiles
(3) + key
(4) – key
(5) Slider
(6) X key

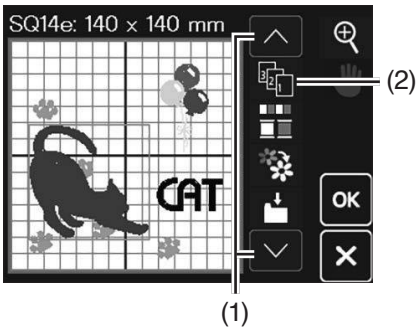
3. Press the OK key.
Background color of the editing window will be changed.
(7) OK key

NOTE:

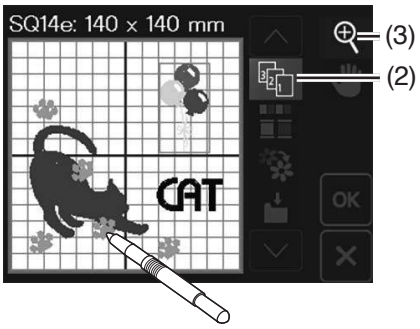
- To return the background color to its original color, press the default key and OK key.
(8) Default key
- Press the background image key to display the image on the background of the editing window if you are opening a JPX format file that contains a background image. By doing so, you can visually confirm the layout of a embroidery pattern and the background images.
.JPX file format can be saved with a background image.
(9) Background image key



1.



2.



Sewing order

You can change the sewing order of a pattern combination.

1. Press the next/previous set key to show the sewing order key. Press the sewing order key.

(1) Next/Previous set key
(2) Sewing order key

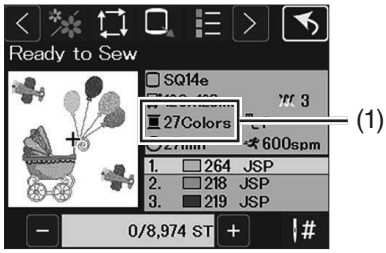
2. Press on the images of the patterns one by one. The patterns will be sewn in the order you press on the images. Press the sewing order key again to return to the previous screen.

(2) Sewing order key

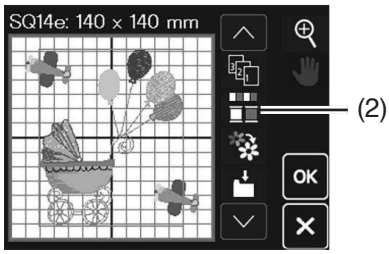
NOTE:
To change the magnification, press the zoom key (refer to page 57).

(3) Zoom key

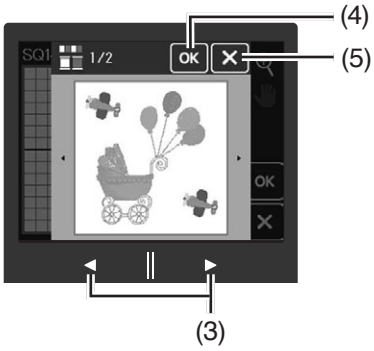
1.



2.



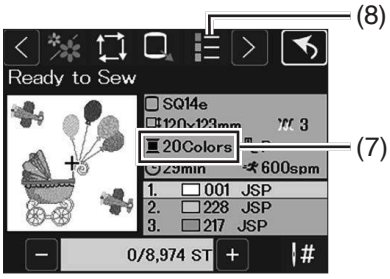
3. 4.

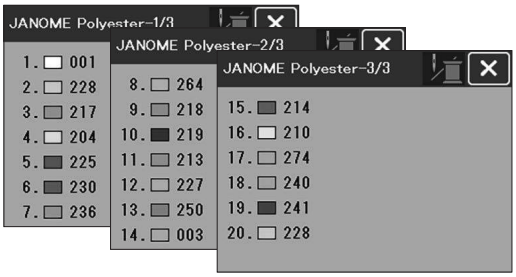


5.



6.





Color grouping

When combining patterns, you can reduce the number of color sections with color grouping.

Set the sewing order so that the same airplane patterns are sewn (refer to page 64). If the sewing order is set to include different patterns between the same patterns, the same thread colors in the same patterns cannot be grouped together.

1. For example, the combined design pattern created on the left has 27 color sections.
(1) 27 color sections

2. Press the color group key in the editing window.
(2) Color group key

3. Color group window will be open.
Press the page keys to confirm which patterns are grouped together.
(3) Page keys

4. Press the OK key to unite all color sections of the same color and the Ready to Sew window opens. Press the X key to return to the previous window.
(4) OK key
(5) X key

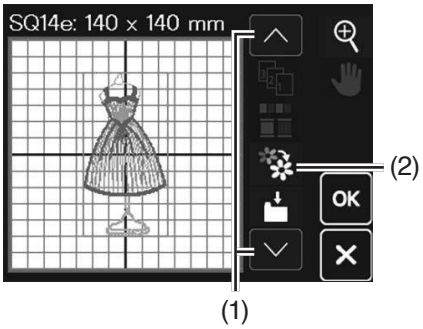
5. Check the hoop size and press the OK key.
(6) OK key

6. The number of color sections is reduced to 20.
(7) 20 color sections
(8) Color list key

NOTE:
- Color grouping can be checked with the color list key.
- Color grouping will be cancelled when returning to the editing window.



1.



2. 3.

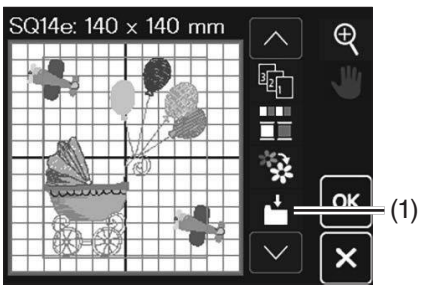




4.







Single color sewing

If you want to sew a pattern or a pattern combination in one color only, press the single color sewing key. The machine will not stop until the entire design is sewn.

1. Press the next/previous set key to show the single color sewing key.
Press the single color sewing key.
(1) Next/Previous set key
(2) Single color sewing key

2. A message appears. Press the OK key.
Press the X key to return to the previous window.
(3) OK key
(4) X key

3. Check the hoop size and press the OK key.
(5) OK key

4. The design will be displayed in gray.
Press the start/stop button to start single color sewing.
The design will be sewn without stopping for any color change.

NOTE:
Single color sewing will be cancelled when returning to the editing window.

Saving a file

You can save original embroidery designs as files in the internal memory or USB flash drive with pressing the save file key (refer to pages 69-73).

(1) Save file key

Free-Arm Embroidery (optional)

The free-arm embroidery hoop FA10e/FA5e is specially designed for embroidering tubular garments such as sleeves, pant legs etc.

Check the opening size of the tubular portion of the garment. The opening width must be 200 mm (8″) or wider.
The embroidery area should be within 200 mm (8″) from the opening.

Opening width:

If the opening width is 200 mm - 250 mm, the embroidery area should be limited in order to prevent fabric from restraining hoop movement.

Example: Baby and Child Design #5 with FA10e free-arm embroidery hoop

1. Draw centerlines on the fabric with tailor's chalk.

(1) Centerlines

2. Open the editing window and select the FA10e free-arm embroidery hoop. (FA10e: 100 mm x 40 mm).

Press the home key to open the embroidery window.

(2) Hoop selection key
(3) Home key
(4) FA10e: 100 mm x 40 mm

3. Press the design category key to select the Baby and Child Design #5.

(5) Design category key

4. Press the opening width key in the editing window to show the embroidery area window.

Press the "+" or "–" key to adjust the opening width.

Press the OK key in the embroidery area window.

Press the X key to return to the previous page.

(6) Opening width key
(7) "+", "–" key
(8) OK key
(9) X key

Press the OK key after editing and a message will appear to confirm the hoop size.

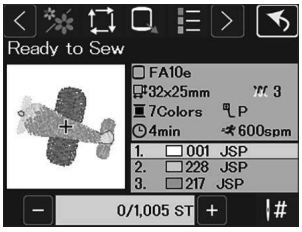
(10) OK key

NOTE:

- If the opening width is set to less than 250 mm, automatic thread trimming for jump threads will be disabled, even if "Thread Cutting" in the embroidery settings is set to anything other than "OFF" (refer to page 82).
- Settings for the embroidery area is not available when using the FA5e free-arm embroidery hoop. The automatic thread cutting for jump threads is always disabled.

5.

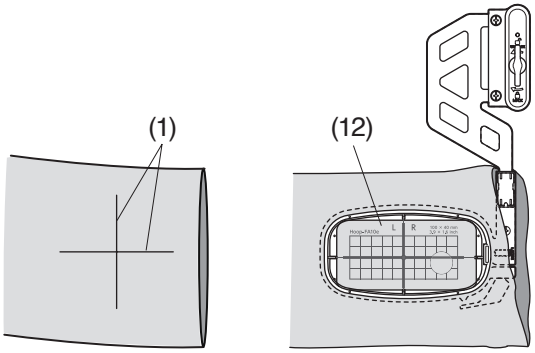




5. Press the OK key and the Ready to Sew window will open.

(11) OK key

6.

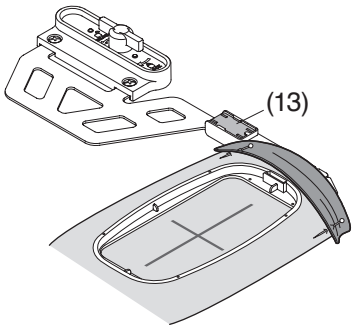


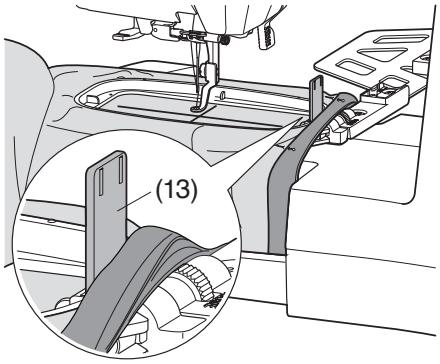
6. Set the garment in the FA10e hoop as shown.

Position the garment so that the centerlines match those on the template in the hoop.

(1) Centerlines
(12) Template

7.





7. Remove the extension table (refer to page 6).

Place the garment over the free-arm of the machine and attach the FA10e hoop to the carriage (refer to page 28).

Roll up the cuff so that it will not jam at the neck of the free-arm.

Insert the blocking plate into the inner hoop to prevent the cuff from overlapping the embroidery area.

(13) Blocking plate

8. Remove the hoop from the carriage when sewing is finished. Remove the garment from the free-arm.

SAVING AND OPENING A FILE

Saving a File

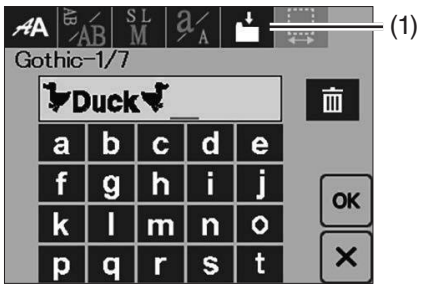
You can save original embroidery designs as files in the internal memory or USB flash drive.

⚠ CAUTION:
Do not turn OFF the power or disconnect the USB flash drive while saving or opening files, otherwise it may damage the memory bank.

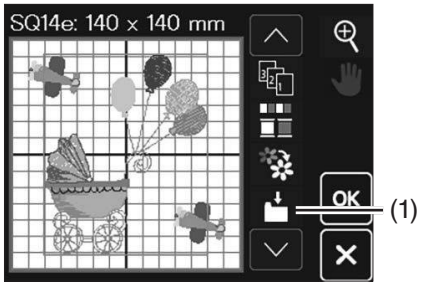
NOTE:
- This model supports FAT16 and FAT32 formats only. If the USB flash drive is not read, check its format (refer to pages 95-96).
- Do not use a USB card reader and USB hub.

Saving a file in an internal memory

1. Press the save file key in the pattern selection window for monogramming and the editing window. The save file window will open.



(1)

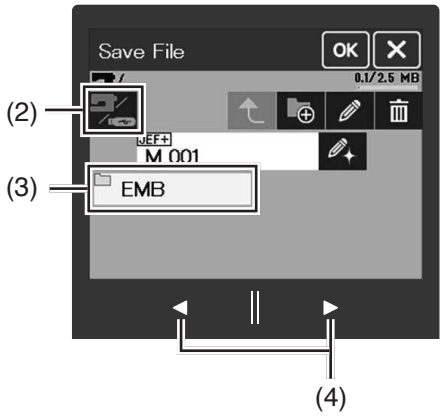


(1)

(1) Save file key

2. Press the internal memory/USB flash drive switch key to select the internal memory.

3. The EMB folder is displayed on the screen.
Press the EMB folder icon to select the folder.



(2)

(3)

(4)

(2) Internal memory/USB flash drive switch key

(3) EMB folder

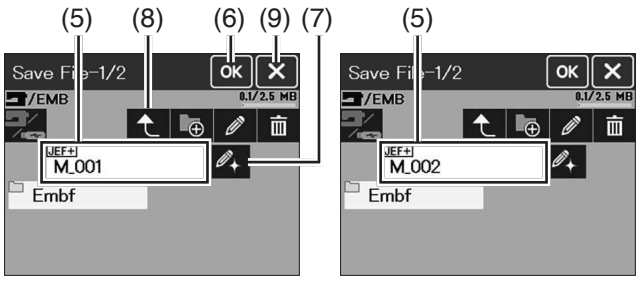
To create a new folder to save it in, refer to page 71 “Creating a new folder” .

If the saved files exceed the limits to be displayed on one window in steps **2.** or **3.**, press the page keys to view other pages.

Files and folders are displayed on separate pages. Use the page keys to switch between pages.

(4) Page keys

4.



4. The EMB folder is shown and the file name is assigned automatically starting from M_001..in order. Press the OK key and the file is saved in the selected folder.

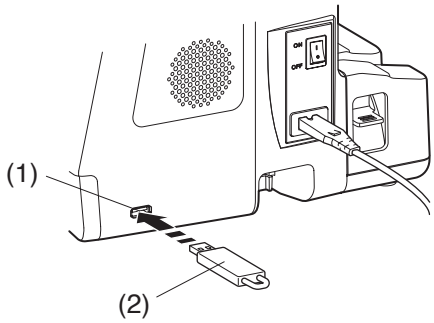
(5) File name
(6) OK key

If data has already been saved under the name M_001, the number will automatically be incremented and M_002 will be displayed.

To save the file name with a new name key, refer to page 73.

Press the upper folder key to go to the save file window at the upper level, or press the X key to return to the pattern selection window without saving the data.

(7) New name key
(8) Upper folder key
(9) X key





Saving a file on a USB flash drive

1. To save a file on a USB flash drive, insert a USB flash drive to USB port.

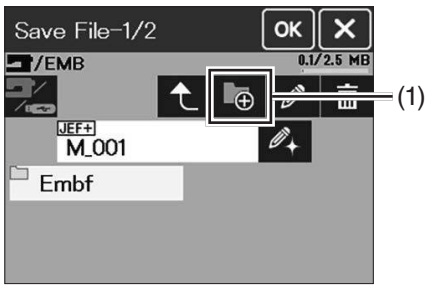
(1) USB port
(2) USB flash drive

2. Press the internal memory/USB flash drive switch key to select the USB memory on the save file window (refer to page 69).

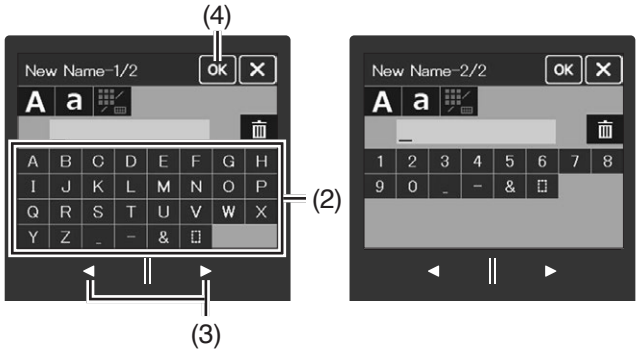
(3) Internal memory/USB flash drive switch key

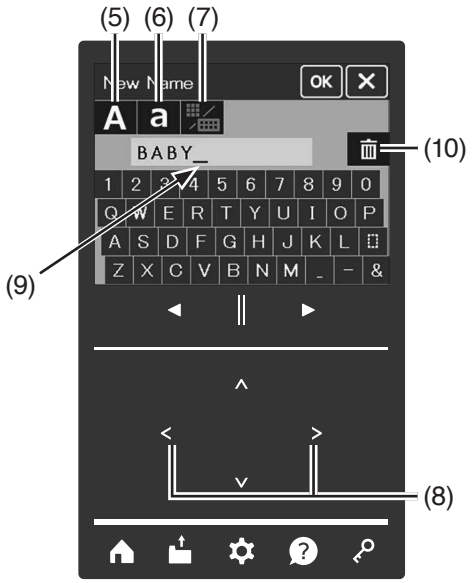
Icon	Description
 Rename key	To change the name of the file or folder. (refer to page 72).
 New name key	To assign a new name to the file, press the new name key (refer to page 73).
 Delete key	To delete the file or folder (refer to page 72).
 New folder key	To create the new folder (refer to page 71).
 Upper folder key	To move to the upper folder.
	To save data to internal memory of the machine.
	To save data to USB flash drive.
	To save data for embroidery designs in the internal memory of the machine.

1.



2.

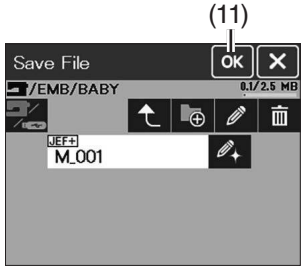




3.



4.



Creating a new folder

You can create your own folders to save data instead of using the folders provided by the sewing machine.

1. Press the new folder key in the save file window in step **3.** on page 69 and the keyboard window will open.

(1) New folder key

2. Enter a name of 10 characters or less.

To enter numbers, press the page keys.

Press the OK key to show the save file window again.

(2) Characters
(3) Page keys
(4) OK key

Press the upper case key or lower case key to select the letter case.

If you wish to use the QWERTY layout keyboard, press the keyboard key.

To edit while entering characters, press the cursor keys to move the cursor under the character to delete, then press the delete key.

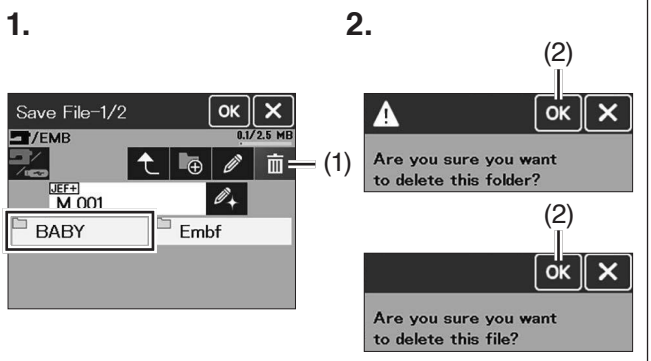
A message will appear if the same name already exists. Press the X key and enter a new name.

(5) Upper case key
(6) Lower case key
(7) Keyboard key
(8) Cursor keys
(9) Cursor
(10) Delete key

3. The newly created folder will be displayed in the save file (EMB) window. Press the folder to open the newly created folder.

4. When you press the OK key in the newly created folder, the pattern with the file name “M_001” will be saved to the newly created folder and you will return to the pattern selection window.

(11) OK key



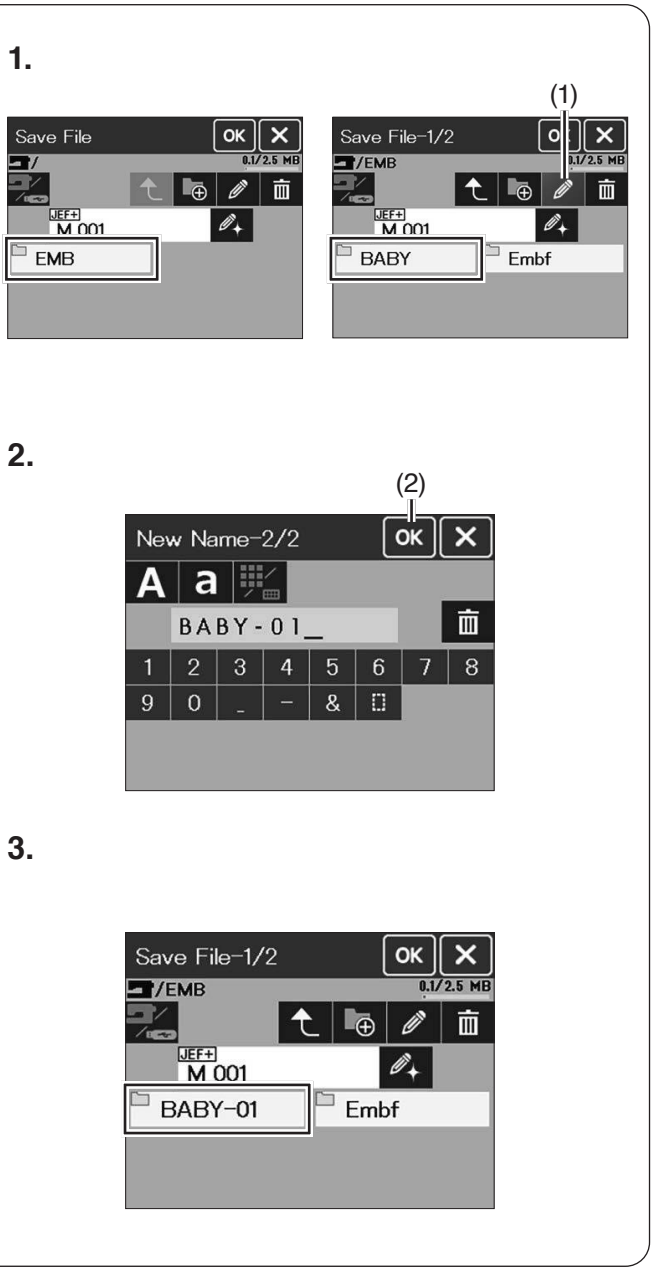
Deleting a file or folder

Press the delete key and select the file or folder to delete.

1. On the save file (EMB) screen, press the delete key to turn it blue.
   The delete key is activated.
   (1) Delete key

   Select the folder or file to delete.
2. A confirmation message will appear.

   Press the OK key to delete the file or folder.
   (2) OK key



Rename key and new name key

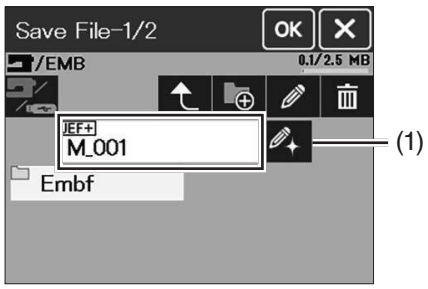
You can change a name of a file or folder already created.

Changing folder name with rename key

1. Press the save file key on the pattern selection window to open the save file window.
   Select the location of the file or folder to rename.
   Press the rename key to turn it to blue. You can change the name of the folder or file with the key selected.
   Select the folder to rename.
   (1) Rename key
2. New name window will be displayed.

   Enter a new name and press the OK key.
   (2) OK key
3. The save file (EMB) window opens with a new folder name (refer to page 71).

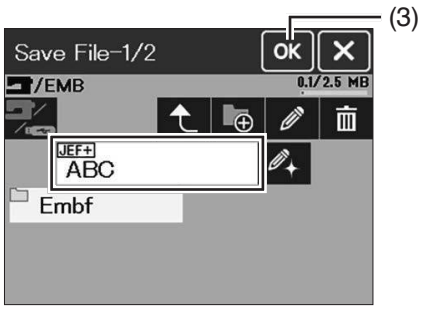
1.



2.



3.



Changing file name with new name key

1. To change the machine' s default file name "M_001" on the save file (EMB) window, press the new name key to show the new name window (refer to page 70 step **4.**).

(1) New name key

2. Enter a name of 10 characters or less.
Press the OK key (refer to page 71).

(2) OK key

3. Save file window opens with a new file name. Press the OK key.
File is saved with a new name.

(3) OK key

Opening a File

You can open saved files in the machine's internal memory or USB flash drive.

⚠ CAUTION:
Do not turn OFF the power or disconnect the USB flash drive while saving or opening files, otherwise it may damage the memory bank.

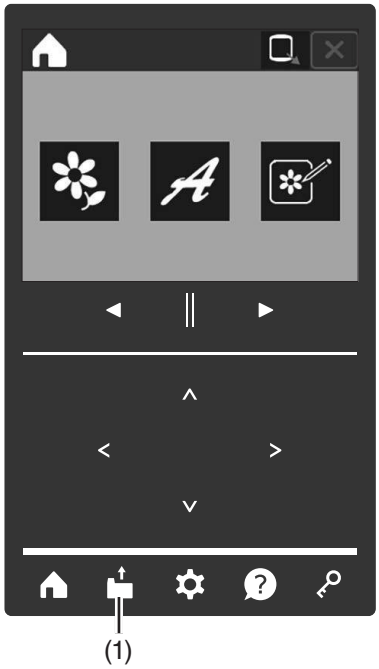
NOTE:
- This model supports FAT16 and FAT32 formats only. If the USB flash drive is not read, check its format (refer to pages 95-96).
- Do not use a USB card reader and USB hub.

Opening a file in the internal memory of the machine

1. Press the open file key to open the open file window.

(1) Open file key

1.



2. Make sure to press the internal memory/USB flash drive switch key to select the USB flash drive.

(2) Internal memory/USB flash drive switch key

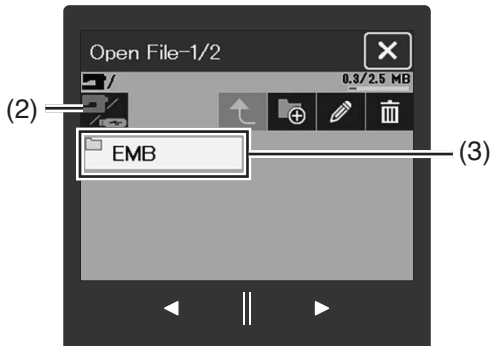
3. Select the desired folder in the open file window.

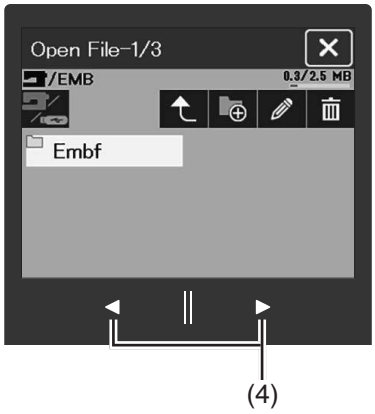
Press the page key to display the next page and check the files stored in the EMB folder.

(3) EMB folder
(4) Page keys

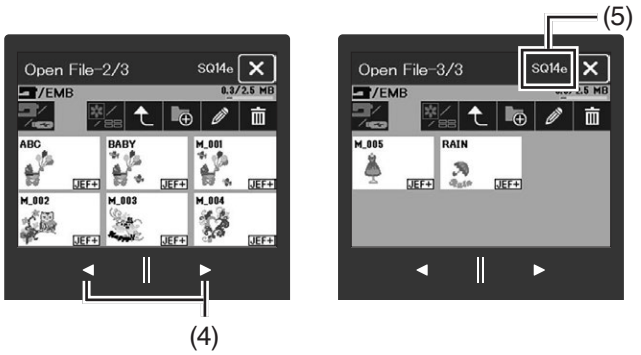
To create a new folder, delete a file or folder, and change a file or folder name, refer to pages 71-72.

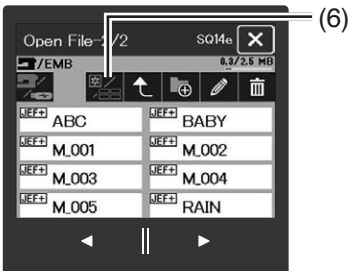
2. 3.

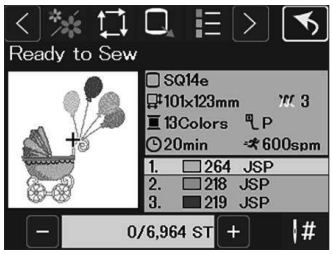


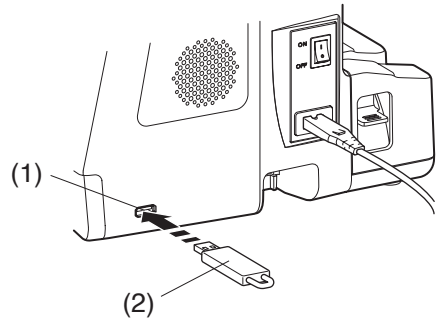


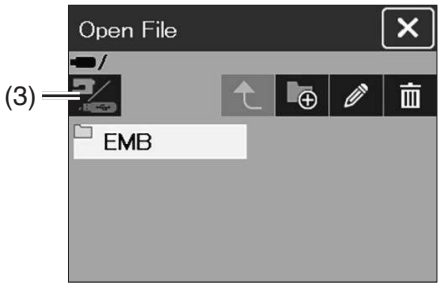
4.











4. Select the desired file.
The saved data will be displayed on the Ready to Sew window.

When you press the file open key on the editing window, the selected pattern will be displayed on the editing window.

The file list is set to display icons with pattern name, pattern preview and file format by default (6 files can be displayed per page)

If the saved files exceed the limits to be displayed on one window, press the page keys to view other pages. The file will also appear on a separate page for each hoop.

(4) Page keys
(5) Embroidery hoop

Press the icon/list key to switch the display the list with or without pattern preview (8 files can be displayed per page).

(6) Icon/list key

File format

File format icons are as follows:

File format icon	Description
JEF	*.JEF (non-editable Janome embroidery format)
JEF+	*.JEF+ (editable Janome embroidery format)
JPX	
JPX	*.JPX (*.JEF+ with a background bitmap image)
JPX	*.JPX (Acufil embroidery format)
JPX	*.JPX (Cutwork embroidery format)
	*.JPX (Free-arm embroidery format)
DST	*.DST (Tajima embroidery format)
JCPR	*.JCPR (protected embroidery format)

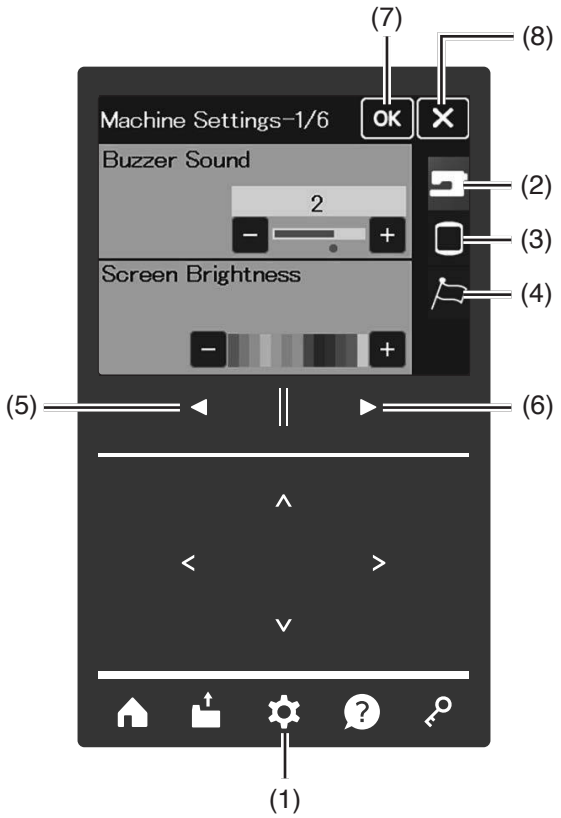
Opening a file on a USB flash drive

1. To open a file on a USB flash drive, insert a USB flash drive to USB port.

(1) USB port
(2) USB flash drive

2. Make sure to press the internal memory/USB flash drive switch key to select the USB flash drive (refer to page 74).

(3) Internal memory/USB flash drive switch key



CUSTOMIZING MACHINE SETTINGS

Machine Settings Mode

Press the set mode key to enter the machine settings mode.
You can select various options and customize the machine settings to suit your personal preference.
Press one of the 3 keys to select the mode to customize.

(1) Set mode key

(2) Machine settings mode key

Press this key to enter the machine settings.

(3) Embroidery settings mode key

Press this key to enter the embroidery settings mode (refer to pages 80-85).

(4) Language setting mode key

Press this key to enter the language setting mode (refer to page 85).

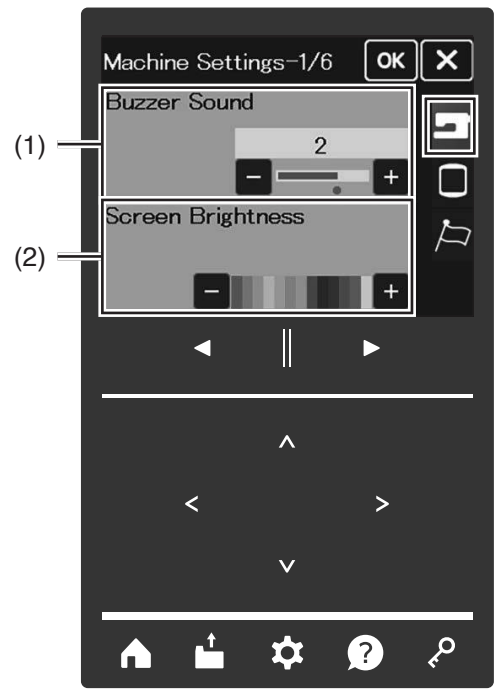
To browse pages in each mode, press the previous page key or next page key.

(5) Previous page key
(6) Next page key

Registering the custom settings

After customizing the settings, press the OK key to enable the new settings.
To cancel the changes to the settings, press the X key and the setting mode window will close.

(7) OK key
(8) X key



Machine Settings

Press the machine settings mode key to enter the machine settings mode.

(1) Buzzer Sound

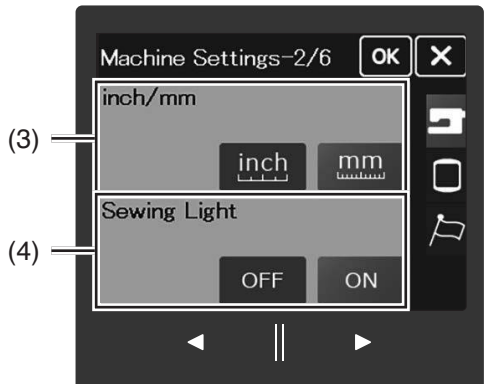
The signal sound can be adjusted by pressing the “+” or “–” key.

Set the value to “OFF” by pressing the “–” key several times to mute the signal sounds.

(2) Screen Brightness

You can adjust the brightness of the visual touch screen by pressing the “+” or “–” key.

Press the next page key to show the next menu.



(3) inch/mm

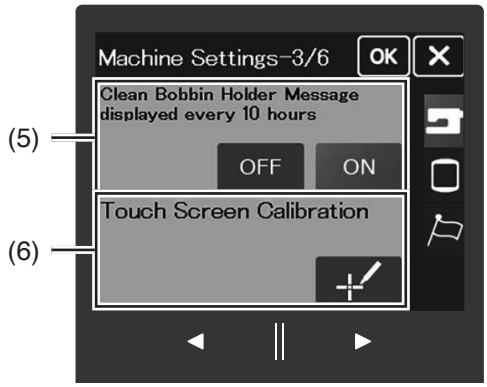
You can set your machine's dimensional unit to either inches or millimeters by pressing the "inch" or "mm" key.

The default unit is millimeters.

(4) Sewing Light

The sewing lights can be turned on or off.

Press the next page key to show the next menu.



(5) Clean Bobbin Holder Message displayed every 10 hours

The caution message for cleaning the bobbin holder and the hook race will be displayed when a certain time (10 hours) passes if this function is turned on. The caution message will not be displayed when this option is turned off.

(6) Touch Screen Calibration

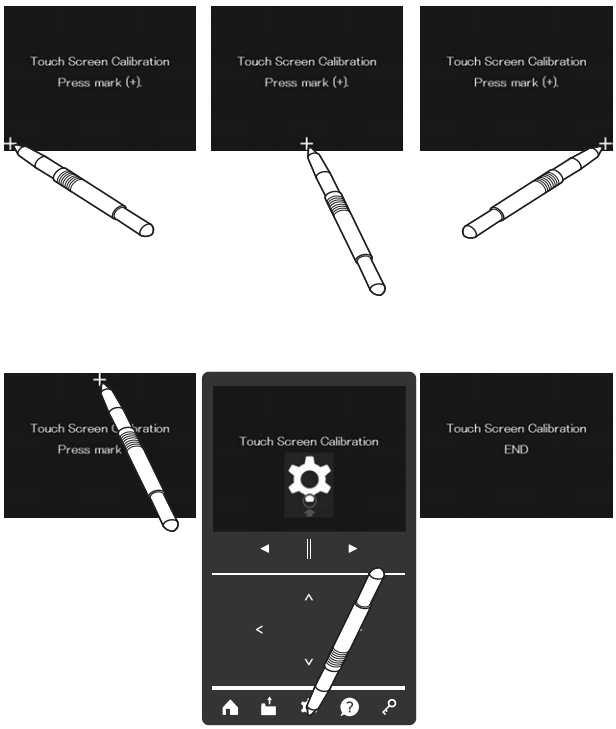
You can calibrate the key positions of the visual touch screen if you feel the visual touch screen key is not responding properly.

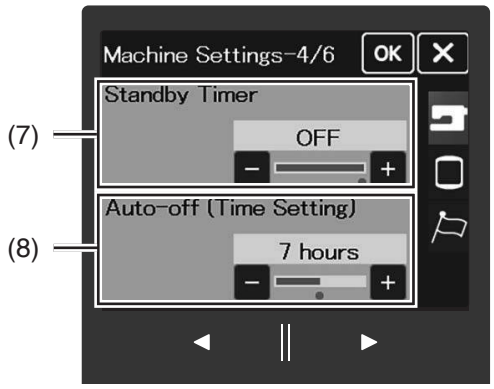
Press the  key to open the calibration window.

Press the "+" sign with the touch screen stylus as the sign appears.

When you press the last sign, the screen shows "END" and the calibration window will close.

Press the next page key to show the next menu.





(7) Standby Timer

The sewing lights will be turned off and the machine will enter standby mode if you do not use the machine within the time period set by this timer. Doing any operation will turn the lights and screen on again.

The standby timer can be set from 1 to 30 minutes.

If you wish to turn off the timer, press and hold the “+” key until “OFF” shows in the timer window.

(8) Auto-off (Timer Setting)

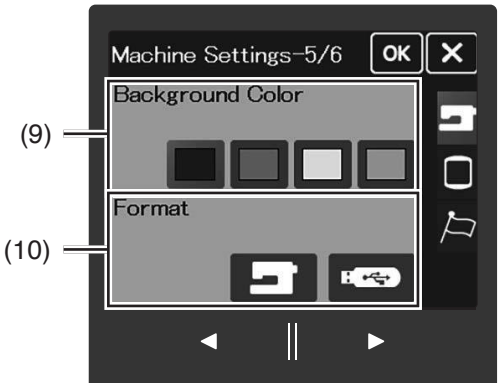
The machine will be automatically turned off if you do not use it within the time period set by this timer.

The “Auto-off (Time Setting)” can be set from 1 to 12 hours.

If you wish to turn off the timer, press and hold the “+” key until “OFF” shows in the timer window.

To turn on the machine again, turn the power switch ON.
Press the next page key to show the next menu.

NOTE:
The auto-off timer is available in EU countries and some regions which use 200 - 240 voltage standards.



(9) Background Color

You can select from the colorful wallpapers for the background of the visual touch screen by pressing the relevant icon.

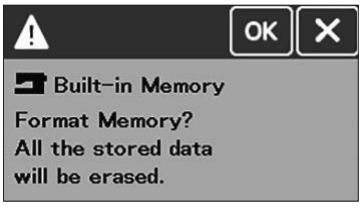
(10) Format

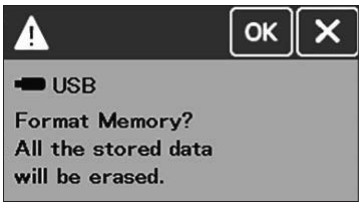
If the internal memory of the machine or USB flash drive does not function due to damage to the memory bank, you need to re-enable it by formatting the memory.

To format the machine’s internal memory, press the machine icon key and a confirmation message will appear.
Press the OK key to format.

To format a USB flash drive, press the USB icon and the confirmation window will open.
Press the OK key to format.

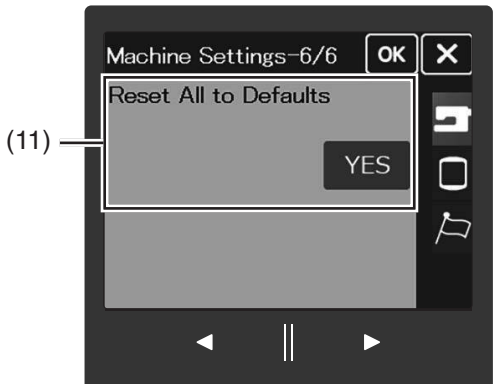
Press the next page key to show the next menu.





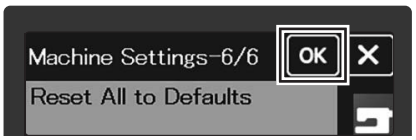
⚠ CAUTION:
Do not turn OFF the power or disconnect the USB flash drive while a warning message is displayed otherwise it may damage the memory bank.

NOTE:
- This model supports FAT16 and FAT32 formats only. If the USB flash drive is not read, check its format (refer to pages 95-96).
- Do not use a USB card reader and USB hub.

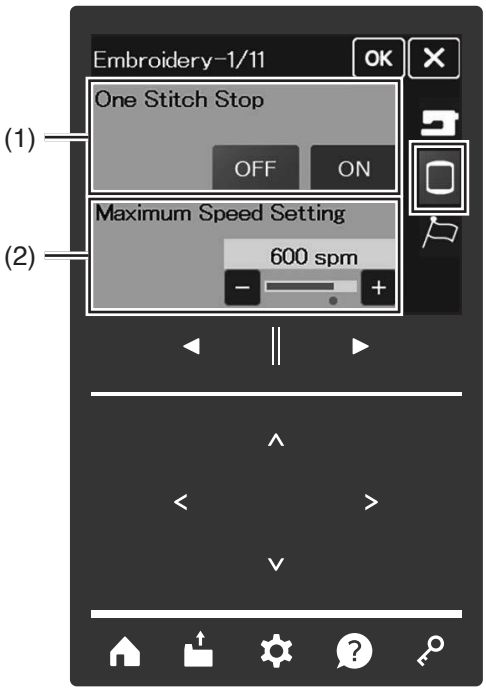


(11) Reset All to Defaults

Press the Yes key to reset all the parameters except the language setting to the original values (factory settings).



After customizing the settings, press the OK key to enable the new settings.



Embroidery Settings

Press the embroidery settings mode key to enter the embroidery settings mode.

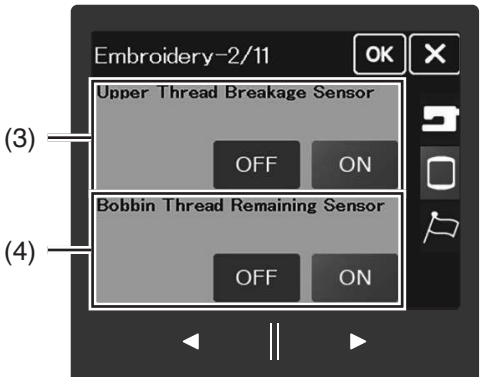
(1) One Stitch Stop

When this option is turned on, the machine sews one stitch and stops automatically with the “One Stitch Stop” message displayed on the screen, so that you can bring the bobbin thread up before sewing.

(2) Maximum Speed Setting

The maximum sewing speed can be set from 400 spm to 600 spm in 100 spm intervals from 600 spm to 660 spm in 60 spm intervals depending on the embroidery patterns by pressing the “+” or “–” key.

Press the next page key to show the next menu.



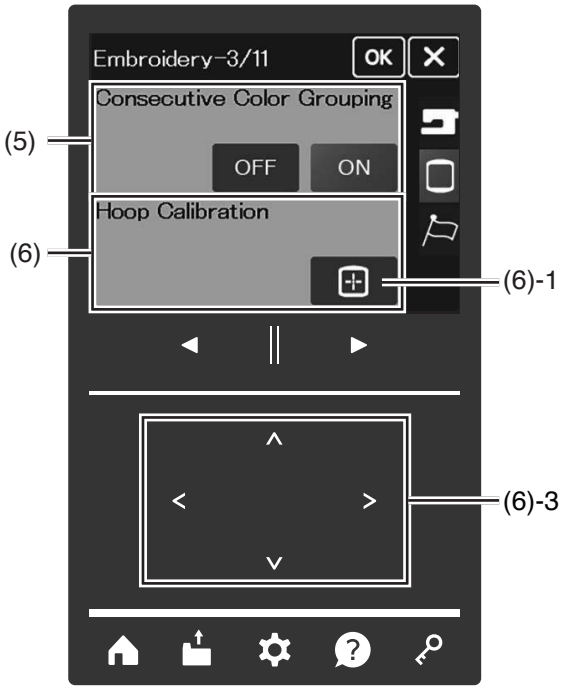
(3) Upper Thread Breakage Sensor

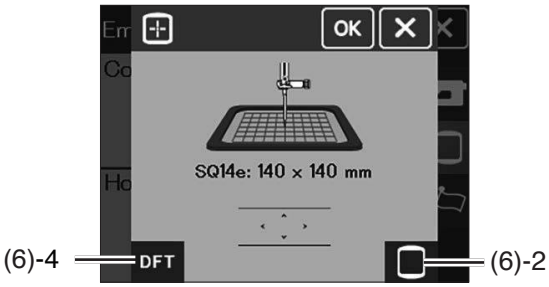
If you want to turn off the auto-stop function when the upper thread (needle thread) breaks, turn off the upper thread breakage sensor.

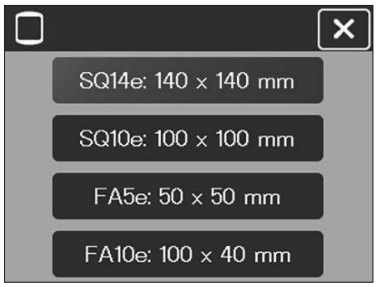
(4) Bobbin Thread Remaining Sensor

If you want to turn off the auto-stop function right before the bobbin thread runs out, turn off the bobbin thread remaining sensor.

Press the next page key to show the next menu.







(5) Consecutive Color Grouping

If an imported stitch data file or design files of a pattern combination contain consecutive sections in the same color, these sections are automatically grouped together as one section when opening the file or saving the pattern combination as a file or going to the Ready to Sew window. This option is invalid when combining the built-in designs and externally sourced designs.

Turn this option off if you do not wish to group the sections together.

Press the next page key to show the next menu.

(6) Hoop Calibration

You can calibrate the center position of the hoops.

Press the key (6)-1 to open the hoop position adjustment window. The carriage moves to the center position.

Press the key (6)-2 to show the hoop selection window. Select the hoop and attach it to the carriage. Set the template in the hoop.

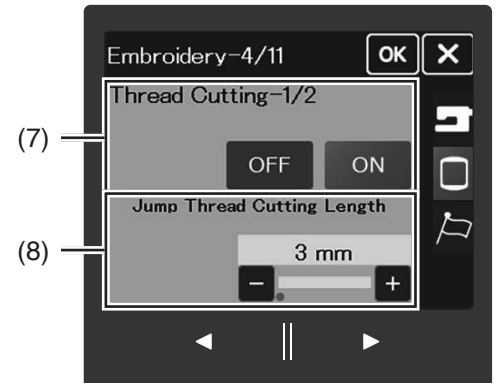
Adjust the hoop position by pressing the jog keys (6)-3 so that the needle is right above the hole in the template.

After customizing the settings, press the OK key to enable the new settings.

To return to the default settings, press the default key (6)-4 on the hoop position adjustment window, then press the OK key.

Press the OK key on the Embroidery Settings screen.

Press the next page key to show the next menu.



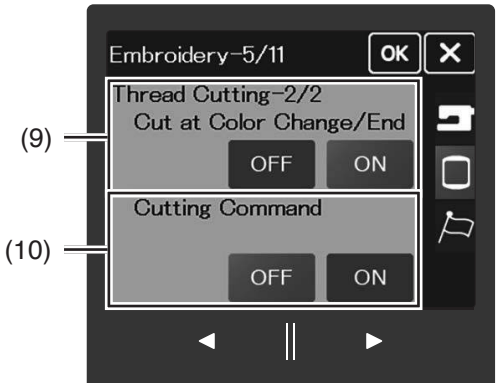
(7) Thread Cutting

When this option is turned on, the following thread cutting options (8), (9) and (10) will be enabled. The machine trims the thread and stops automatically.

(8) Jump Thread Cutting Length

When this option is turned on, the machine trims the jump threads if the jump thread length is the same or more than the set value. Jump thread cutting length can be set from 3 mm to 30 mm or “OFF”.

Press the next page key to show the next menu.



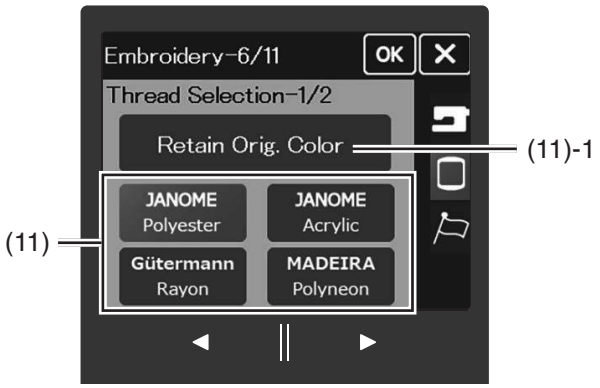
(9) Cut at Color Change/End

When this option is turned on, the machine trims the thread when it stops to change the thread to the next color.

(10) Cutting Command

When this option is turned on, the machine trims the threads at the trim code if the imported stitch data file contains a trim command (cutting command).

Press the next page key to show the next menu.



(11) Thread Selection

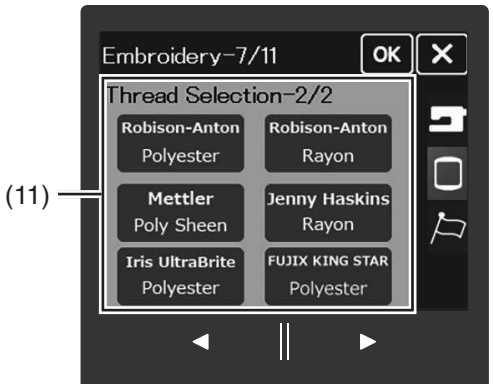
There are 10 types of embroidery thread to choose from.

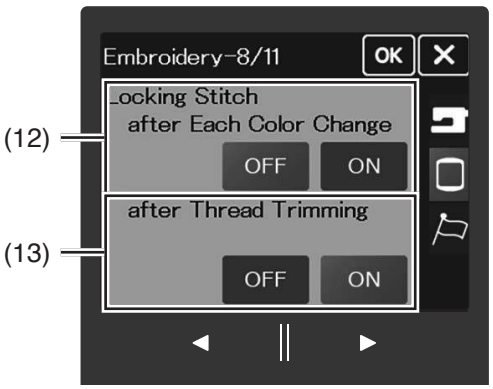
Press the key of the thread you wish to use. The color code and the selected brand are shown on the Ready to Sew window. The color code and the selected brand are also shown by pressing the color list key.

If you use imported embroidery stitch data containing proper thread information, press the “Retain Orig. Color” key (11)-1 to retain this information.

(11)-1 Retain original color key

Press the next page key to show the next page of the thread selection.





(12) Locking Stitch after Each Color Change

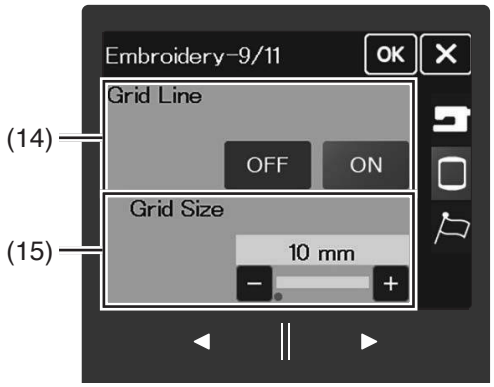
The threads may ravel if the stitch data does not contain locking stitches at the beginning of each color section.

To avoid raveling, insert locking stitches at the beginning when this option is turned on.

(13) Locking Stitch after Thread Trimming

If you turn the thread cutting on (refer to the previous page “Thread Cutting”), the machine will insert locking stitches after the jump to avoid threads from raveling.

Press the next page key to show the next menu.



(14) Grid Line

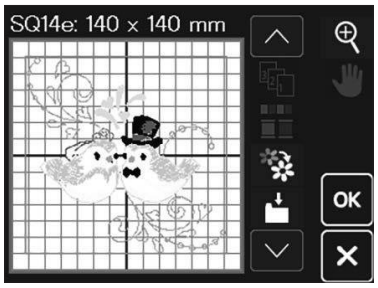
Turn this option on to show grid in the editing window.

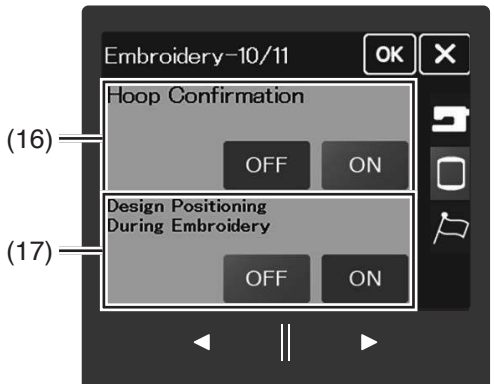
(15) Grid Size

The grid size can be altered from 10 mm to 30 mm with the “+” or “–” key when the grid line option is on.

Turn the grid line option off to hide the grid.

Press the next page key to show the next menu.





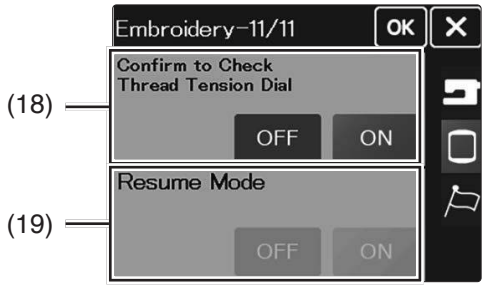
(16) Hoop Confirmation

The hoop confirmation message will appear every time before opening the Ready to Sew window. However you can turn this option off by selecting “OFF”.

(17) Design Positioning During Embroidery

If you turn on the “Design Positioning During Embroidery”, you can re-position the embroidery design with the jog keys during embroidery.

Press the next page key to show the next menu.

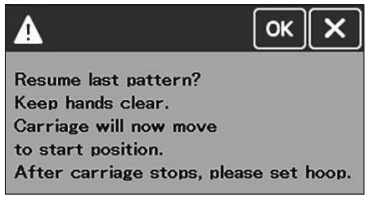


(18) Confirm to Check Thread Tension Dial

Turn this option on to show the message to confirm the thread tension every time the thread tension is changed.

(19) Resume Mode

> **NOTE:**
> You cannot turn off the resume mode setting if the "Auto-off (Time Setting)" is not set to "OFF" (refer to page 78).

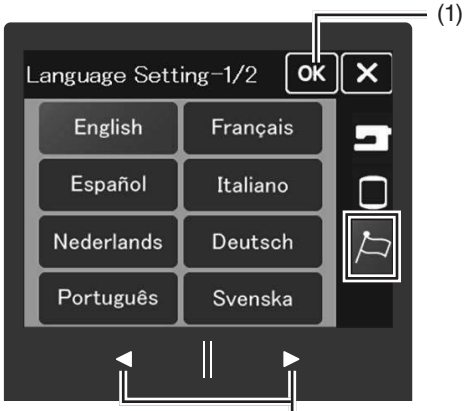


When resume mode is turned on, the last stitch sewn before turning the power switch OFF will resume when you turn the power ON again.

Press the OK key to resume the last stitch of the sewn pattern.



After customizing the settings, press the OK key to enable the new settings.



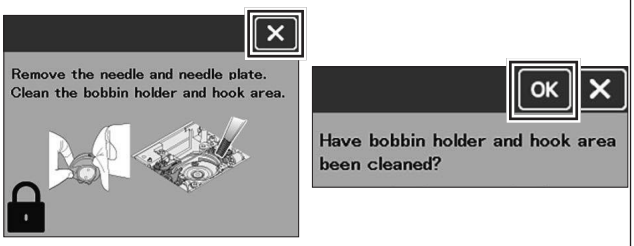
Language Setting

Select the desired language in two pages and press the OK key.
The visual touch screen shows messages in the selected language.

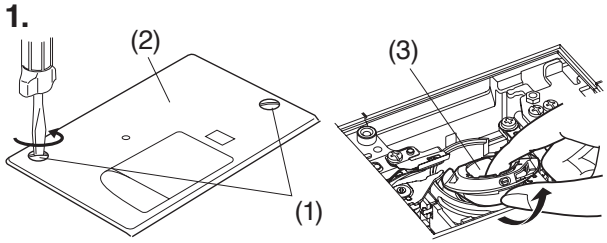
Press the page keys to show the next page of the language selection.

(1) OK key
(2) Page keys

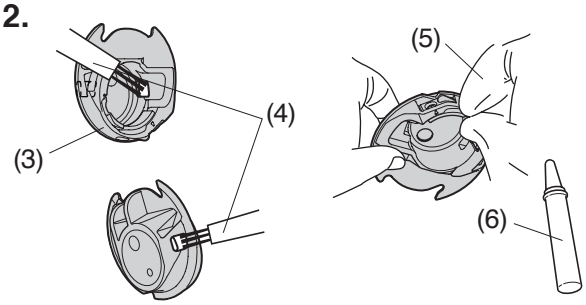




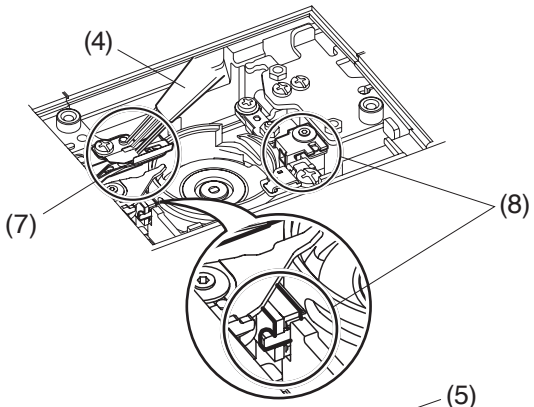
1.



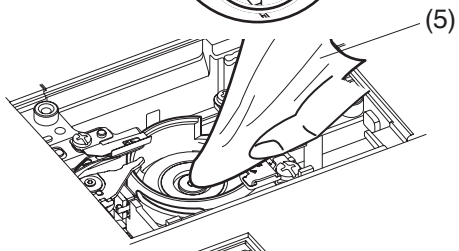
2.



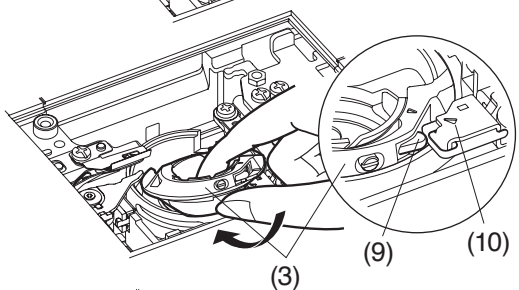
3.

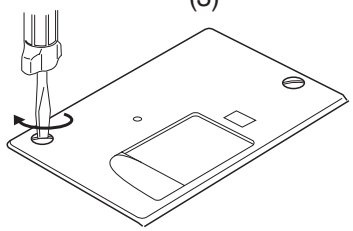


4.



5.





CARE AND MAINTENANCE

Cleaning the Hook Area

⚠ WARNING:

- Turn the power switch OFF and unplug the machine before cleaning.
- Do not dismantle the machine in any way other than as explained in this section.

⚠ CAUTION:

- Do not store the machine in a high-humidity area, near a heat radiator, or in direct sunlight. Store the machine in cool dry place.
- Clean the outside of the machine with a soft cloth.
- Do not use chemical solvents.

Clean the hook area at least once a month.

The caution message for cleaning the bobbin case and the hook race will be displayed when a certain time (10 hours) passes if “Clean Bobbin Holder Message displayed every 10 hours” option is turned on (refer to page 77).

1. Turn the power switch OFF and unplug the machine. Remove the needle and embroidery foot P (refer to pages 12, 13).
Remove the needle plate by turning the setscrews with the screwdriver.
Take out the bobbin and bobbin holder.
(1) Setscrews
(2) Needle plate
(3) Bobbin holder

2. Clean the bobbin holder with a lint brush.
Apply a few drops of the bobbin holder cleaner (included in the standard accessories) to a soft cloth and wipe the bobbin holder thoroughly both inside and outside.
(4) Lint brush
(5) Soft cloth
(6) Bobbin holder cleaner

3. Clean the auto thread cutter device and around the bobbin thread remaining sensor with the lint brush.
(7) Auto thread cutter device
(8) Bobbin thread remaining sensor

4. Clean the hook race with a soft cloth.
(5) Soft cloth

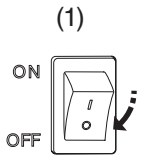
5. Insert the bobbin holder so that the knob fits next to the stopper in the hook race.
(9) Knob
(10) Stopper

Attach the needle plate, presser foot and needle.
Insert the bobbin.

Cleaning the Thread Path

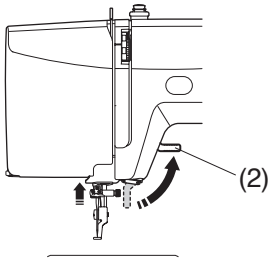
Clean lint and wax in the tension area with a piece of paper.

1. Turn the power switch OFF.



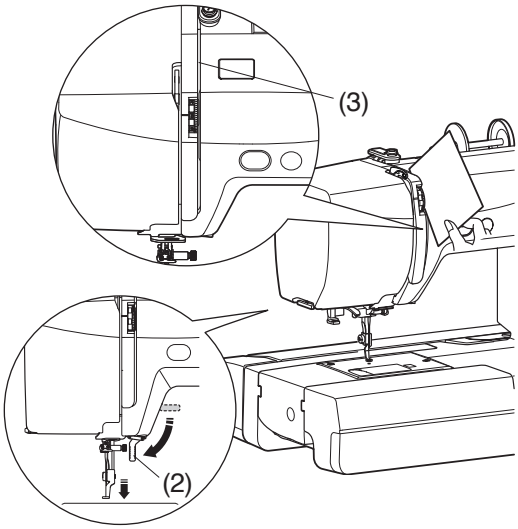
(1) Power switch

2. Raise the presser foot lifter.



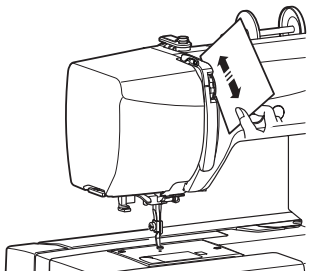
(2) Presser foot lifter

3. Insert a piece of paper along the right channel and Lower the presser foot lifter.

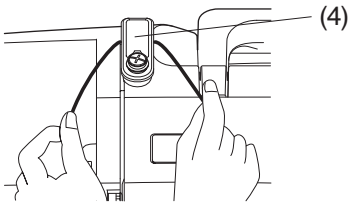


(2) Presser foot lifter
(3) Right channel

4. Scrape out the lint with the paper.

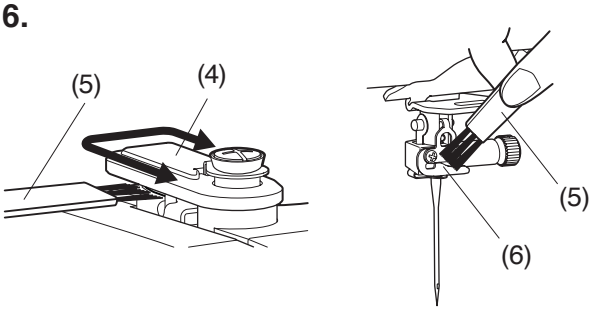


5. Hold the thread with both hands and pass the thread into the thread guide plate.
Scrape out the lint with the thread.



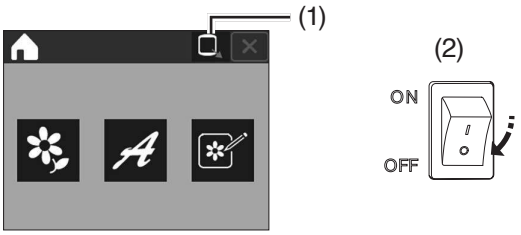
(4) Thread guide plate

6. Clean the needle bar thread guide with the lint brush.

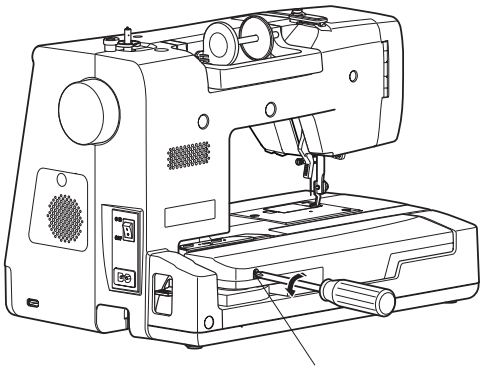


(4) Thread guide plate
(5) Lint brush
(6) Needle bar thread guide

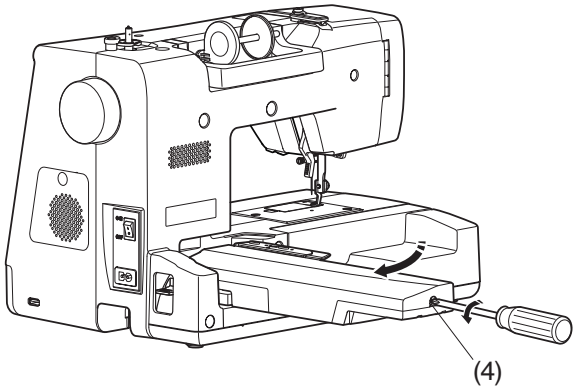
1.



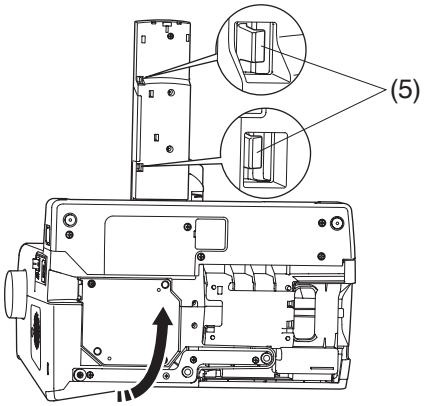
2.



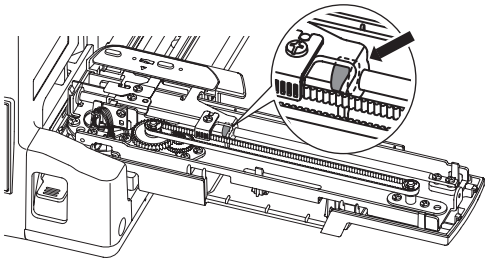
3.

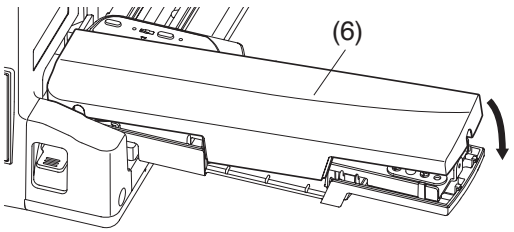


4. 5.



6.





Oiling the Machine

⚠ WARNING:

- Move the carriage to the home position, turn the power switch OFF, and unplug the machine before oiling the machine.
- Wait until the motor cools down before oiling.
- Do not dismantle the machine in any way other than as explained in this section.
- Do not oil any parts other than as explained in this section.

NOTE:

- Oil the points as shown at least once a month if you are using the machine every day.
- Use good quality sewing machine oil.
- One or two drops of oil is sufficient.
- Remove excess oil, otherwise it may stain fabric.
- In case machine is not used for an extended time, oil it before sewing.
- A Phillips head screwdriver is not included with this machine.
- Be sure to oil in order as follows.

Oil the Y-carriage

NOTE:
Be careful not to damage any parts when raising the machine.

1. Press the home position key to return the carriage to the home position.

Turn the power switch OFF.

(1) Home position key
(2) Power switch

2. Retract the carriage arm and remove the setscrew A.

(3) Setscrew A

3. Extend the carriage arm and remove the setscrew B.

(4) Setscrew B

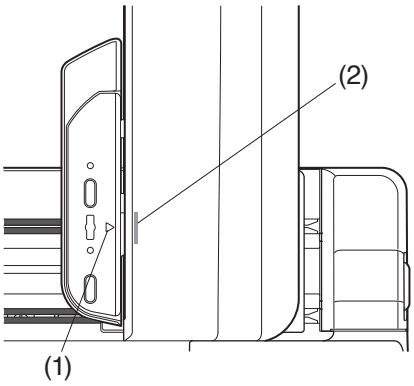
4. Tilt the sewing machine in the direction of the arrow so that the front comes to the underside of the machine.

5. While lifting up the Y carriage cover, release the two hooks and remove the Y carriage cover.

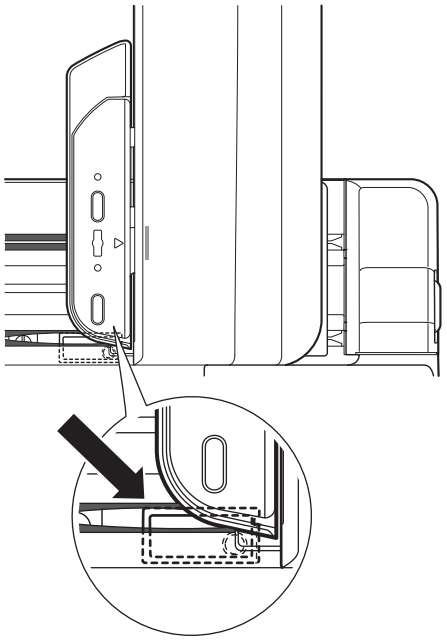
(5) Hooks
(6) Y carriage cover

6. Oil the arrow point (felt) as indicated in the illustration. To attach the carriage cover, follow the procedures in reverse.

1.



2.



Oil the X-carriage

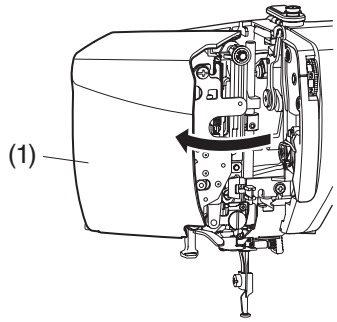
1. Make sure the carriage is in the home position with the carriage arm extended.
   (1) Triangle mark on the carriage
   (2) Bar sign on the carriage arm

NOTE:
The home position is where the triangle mark on the carriage and the bar sign on the carriage arm are aligned.

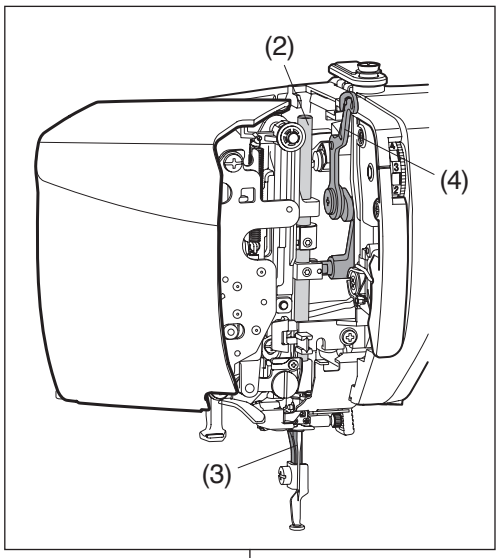
2. Flip over the black sheet on the left side of the carriage arm and apply oil in the carriage arm where the arrow is pointing.

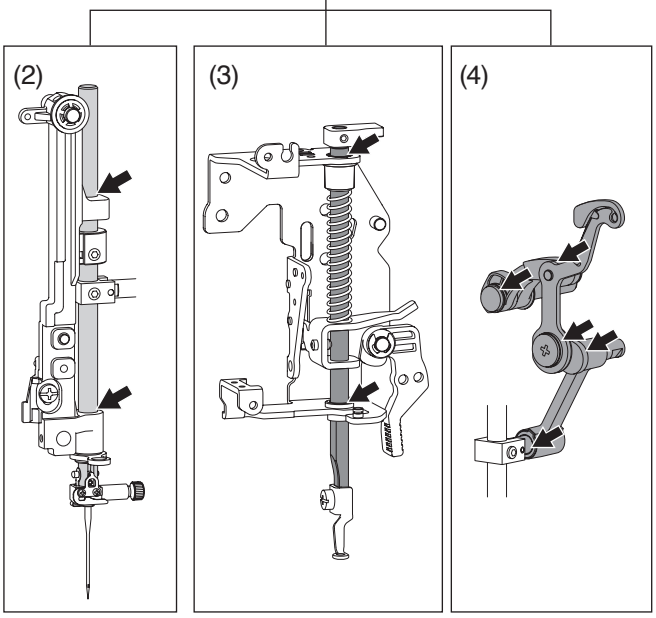
NOTE:
Do not tilt the machine for about 30 minutes after oiling.

1.



2.





Oil the needle bar, presser bar and thread take-up lever

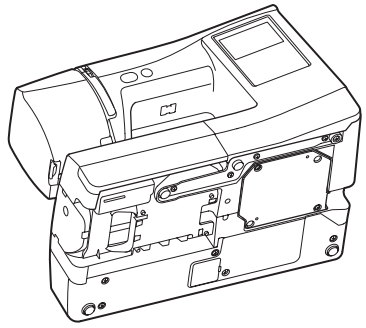
1. Open the face cover.

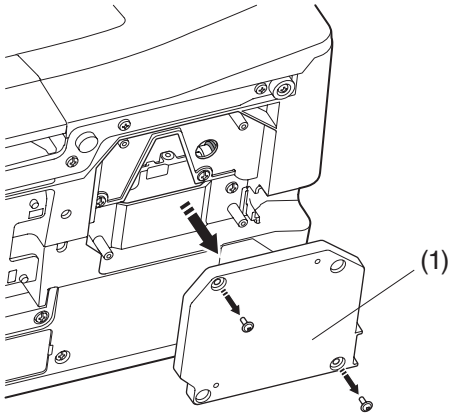
(1) Face cover

2. Oil the arrow points as indicated in the illustration. Close the face cover.

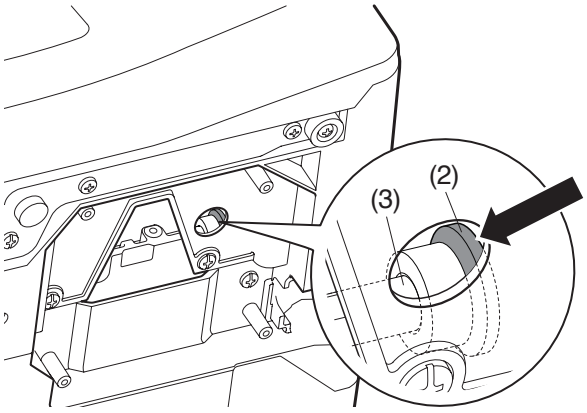
(2) Needle bar
(3) Presser bar
(4) Thread take-up lever

1.





2.



Oil the lower shaft supporter (bottom)

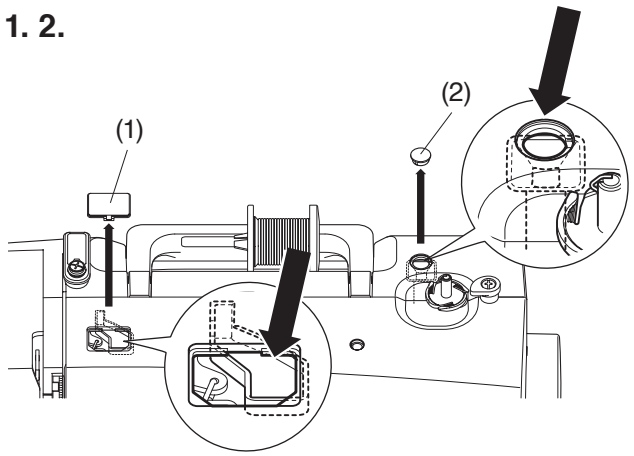
1. Lay the machine as shown.
Remove the maintenance cover on the bottom side of the machine with a screwdriver.
(1) Maintenance cover

2. Oil the arrow point (felt) as indicated in the illustration.
(2) Felt
(3) Shaft

After oiling, attach the maintenance cover, follow the procedure **1.** to **2.** in reverse.

NOTE:
If the oil does not reach the arrow point, soak a cotton swab in oil and apply it to the machine.

1. 2.



Oil the upper shaft supporter (top side)

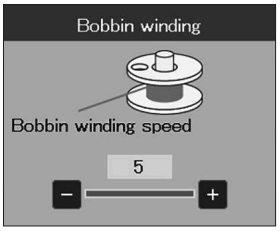
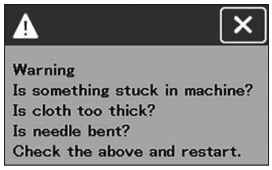
1. Remove the cover and the cap on the top side of the machine.
(1) Cover
(2) Cap

2. Oil the arrow points (felt) as indicated in the illustration.

NOTE:
Do not tilt the machine for about 30 minutes after oiling.

Problems and Warning Signals

If a buzzer sounds and the visual touch screen shows a warning sign, follow the guidance below.

Warning Sign	Cause	Try this
	The bobbin winder spindle is shifted to the right.	Shift the bobbin winder spindle to the left for stitching (refer to page 15).
	The machine stops due to overload.	Wait for at least 15 seconds to restart. Remove tangled threads around take-up lever, hook race and auto thread cutter device.
	The machine is malfunctioning.	Contact the service center or the store from whom the machine was purchased.
	This message appears if an auto-thread cutting error occurred due to a problem of the motor initialization, a problem in the electronic components or a thread tangling in hook area.	Turn the power OFF and remove tangled threads around the hook race and auto thread cutter device, then turn the power ON. If this message does not disappear, contact the service center or the store from whom the machine was purchased.

Troubleshooting

Condition	Cause	Reference
The machine is noisy.	1. Thread is caught in the hook race. 2. Lint is built up in the hook race or bobbin holder.	Page 86 Page 86
The needle thread breaks.	1. The needle thread is not threaded properly. 2. The needle thread tension is too tight. 3. The needle is bent or blunt. 4. The needle is incorrectly inserted. 5. Thread is too thick or too fine for the needle. 6. Thread is jammed in the hook area. 7. The thread is tangled around the spool. 8. The needle thread was not set in the thread holder when embroidery sewing started.	Pages 17-18 Page 11 Replace the needle. Page 13 Page 13 Page 86 Use the spool holder. Page 28
The bobbin thread breaks.	1. The bobbin thread is not threaded properly in the bobbin holder. 2. Lint has collected in the bobbin holder. 3. The bobbin is damaged and does not turn smoothly.	Page 16 Page 86 Replace the bobbin.
The needle breaks.	1. The needle is incorrectly inserted. 2. The needle is bent or blunt. 3. The needle clamp screw is loose. 4. The needle thread tension is too tight. 5. The needle is too fine for the fabric being used.	Page 13 Page 13 Page 13 Page 11 Page 13
Skipped stitches	1. The needle is incorrectly inserted, bent or blunt. 2. The needle and/or threads are not suitable for the work being sewn. 3. A blue tip needle is not being used for sewing stretch, very fine fabrics and synthetic fabrics. 4. The needle thread is not threaded properly. 5. A stabilizer is not used when sewing stretch fabrics. 6. A poor quality needle is used. 7. The embroidery hoop is not set properly. 8. The fabric is not stretched tightly enough on the embroidery hoop.	Page 13 Page 13 Page 13 Pages 17-18 Apply a stabilizer. Replace the needle. Page 28 Pages 26-27
Seam puckering.	1. The needle thread tension is too tight. 2. The needle thread or the bobbin thread is not threaded properly. 3. The needle is too heavy for the fabric being sewn. 4. A stabilizer is not used when sewing very fine fabrics.	Page 11 Pages 16-18 Page 13 Apply a stabilizer.

Condition	Cause	Reference
The machine does not run.	1. The machine is not plugged in. 2. Thread is caught in the hook race. 3. The presser foot lifter is not lowered.	Page 7 Page 86 Page 10
The embroidery patterns are distorted.	1. The needle thread tension is too strong. 2. Stabilizer is not used for sewing stretch and very fine fabrics. 3. The hoop tightening screw is too loose. 4. Something is caught between the carriage and the carriage arm. 5. The carriage arm is hitting something around the machine. 6. The fabric is caught or trapped when sewing embroidery. 7. The embroidery hoop is hitting something around the machine. 8. The embroidery foot is caught by a jump thread.	Page 11 Apply a stabilizer. Page 27 Page 21 Page 21 Stop the machine and free the fabric. Page 21 Trim the jump thread.
Auto thread cutting failed.	1. Threads are caught in the auto thread cutter device.	Page 86
Keys on the visual touch screen and touch panel keys do not work.	1. The key position is out of alignment.	Page 77
Visual touch screen is not clear.	1. The screen brightness is not adjusted properly.	Page 76
Visual touch screen swells.	1. The machine has been exposed to a high-humidity and high-temperature area.	Use and store the machine in cool dry place.
The bobbin thread remaining sensor does not work; There is no signal sound when the bobbin thread has run out and the machine does not stop sewing.	1. The bobbin thread remaining sensor is turned off. 2. Lint has been collected around the bobbin thread detecting sensor. 3. A bobbin other than the “J” plastic bobbin is used.	Page 80 Page 86 Page 14
The message “Bobbin thread is not sufficient.” appears and the machine stops, although there is enough thread wound on the bobbin.	1. A strong light such as a white light bulb or LED light illuminates the area around the hook cover on the needle plate.	Do not shine the area around the hook cover on the needle plate with strong light.
The USB flash drive is not read.	1. Format setting of the USB flash drive is not correct. 2. The USB flash drive is malfunctioning.	Pages 95-96 Replace the USB flash drive.

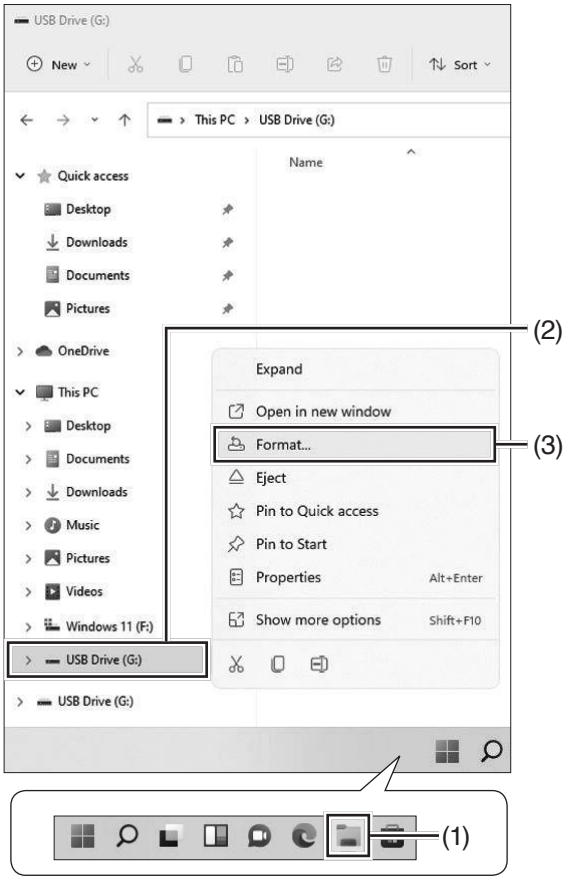
It is not abnormal for a faint humming sound to be heard from the internal motors.
The visual touch screen and function key area may become warm after several hours of continuous use.

Formatting USB Flash Drives

NOTE:
Formatting of USB flash drive must be carried out on a personal computer using Microsoft Windows.*

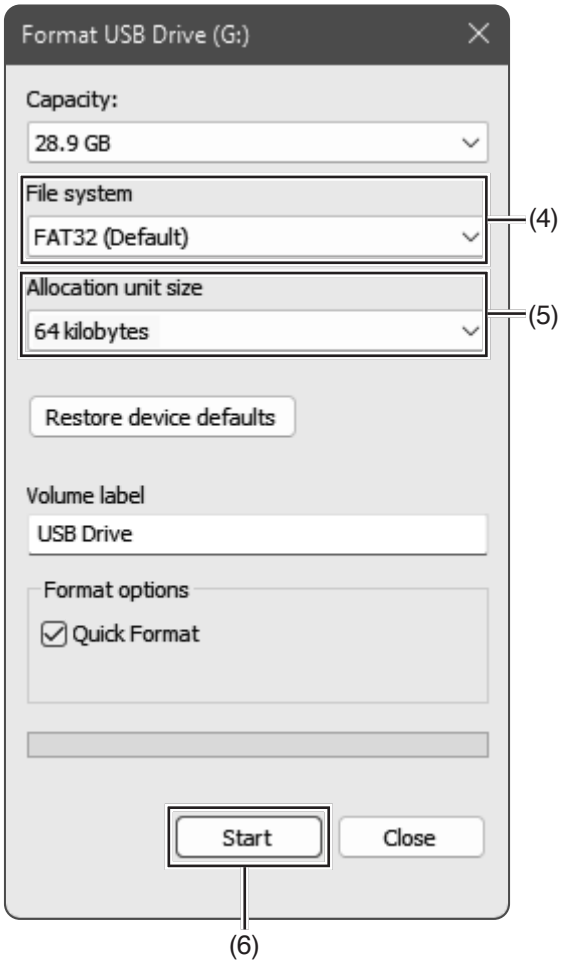
For Windows 11 and 10 users, screen shot samples using Windows 11 are shown.

1.



1. Using File Explorer, right click on the USB flash drive. Click format.
- (1) Explorer
- (2) USB flash drive
- (3) Format

2. 3. 4.



2. Format window will be displayed. Select FAT16 or FAT32 from file system.
- (4) File system

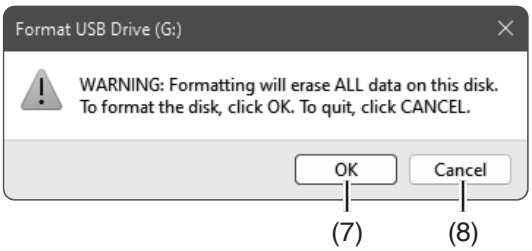
NOTE:
If FAT16 or FAT32 cannot be selected, use other PC. Or use other USB flash drive which can be read.

3. From allocation unit size, select a size of 64 kilobytes or less.
- (5) Allocation unit size

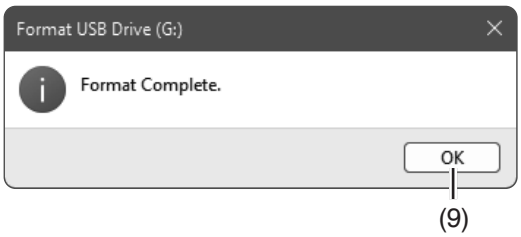
4. Click the start key.
- (6) Start key

* Windows is a registered trademark of Microsoft Corporation.

5.



6.



5. After the start key is clicked, the confirmation message will be displayed. Click the OK key to begin formatting.

(7) OK key

NOTE:
If there is any important data remaining on the USB flash drive, click the cancel key.
After saving the data elsewhere, begin the process again from 1.

(8) Cancel key

6. A message will be displayed when the formatting is complete.

Click the OK key.

(9) OK key

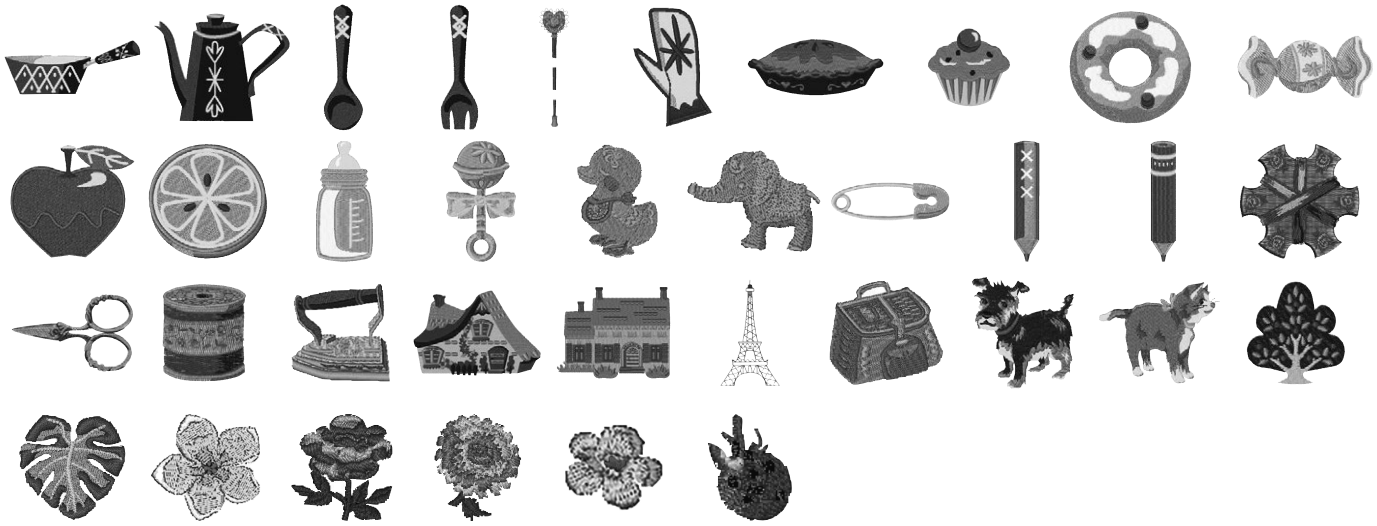
DESIGN CHART

Embroidery

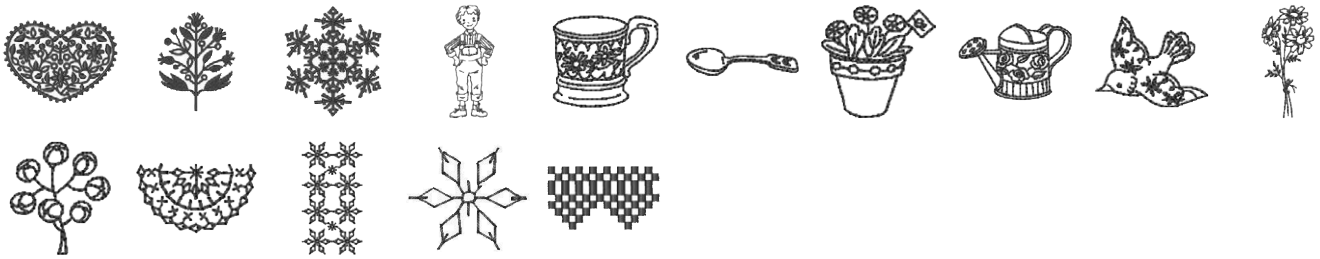
Pattern images are not to scale.

You can download the colored version of these contents via QR code.

GANAHA Collections © Y. GANAHA



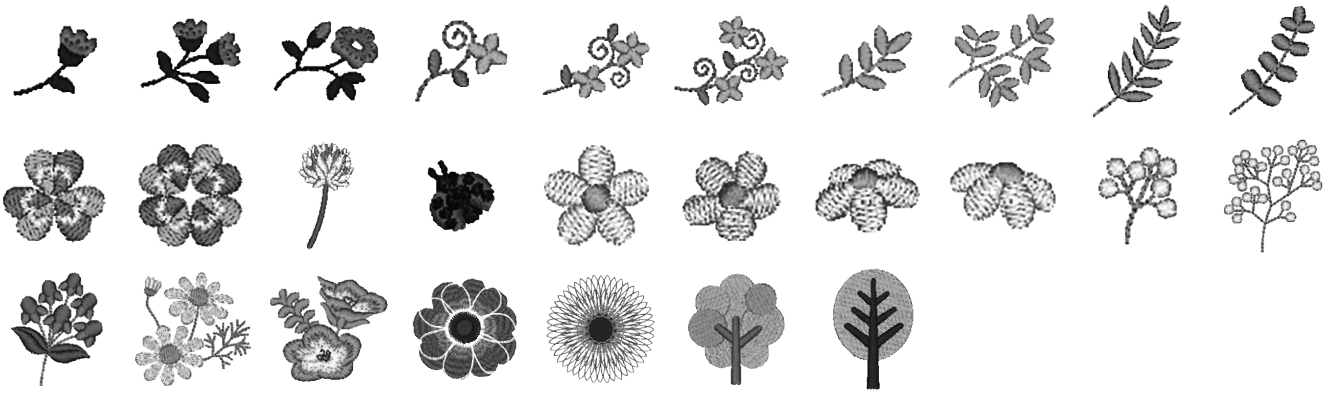
GANAHA by Redwork Designs © Y. GANAHA



GANAHA by White Embroidery Designs © Y. GANAHA



Floral and Garden Designs



DESIGN CHART

Embroidery

Pattern images are not to scale.

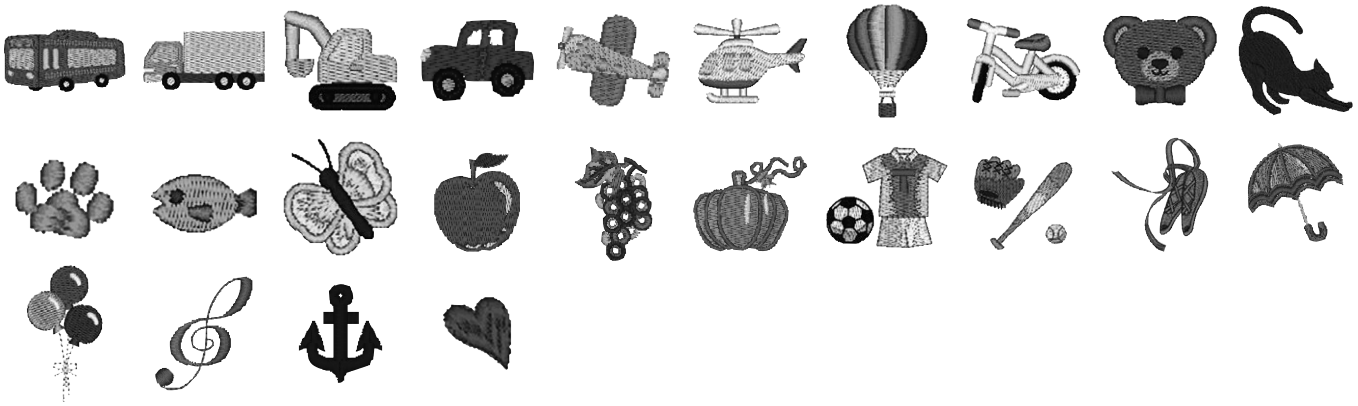
Food and Drink Designs



Everyday and Holiday Designs



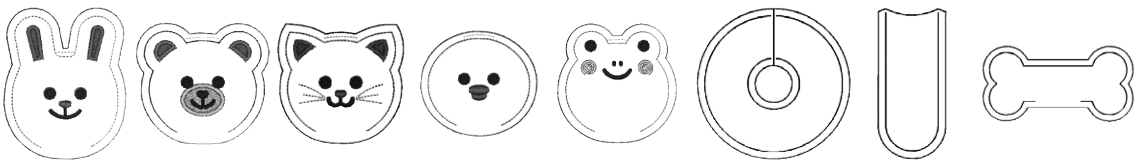
Baby and Child Designs



Name Tag Designs



In-The-Hoop Designs <Rattles>



DESIGN CHART

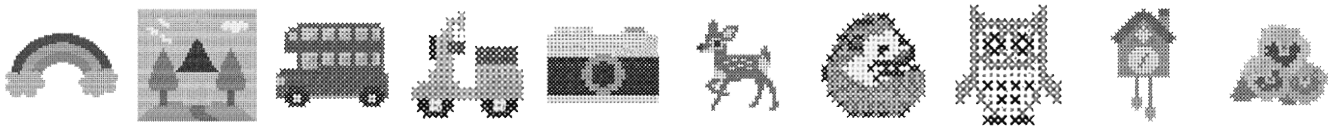
Embroidery

Pattern images are not to scale.

Beauty and Decor Designs



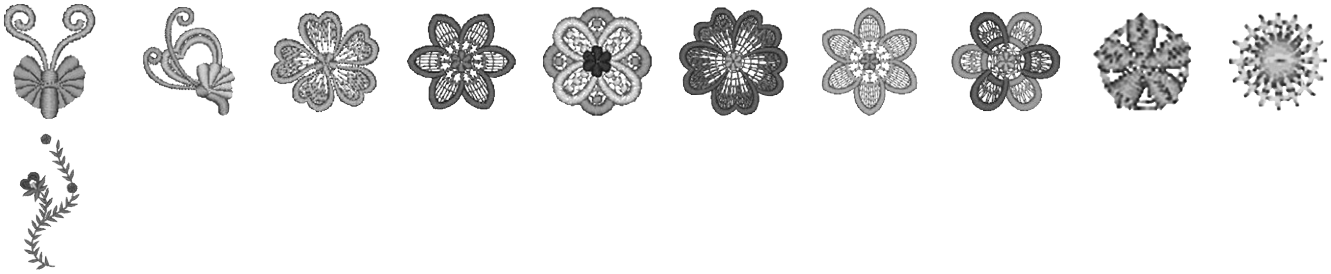
Cross-Stitch Designs



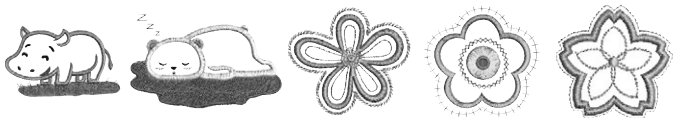
Embroidery Lace Designs for water soluble stabilizer



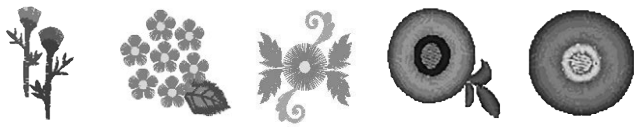
Embroidery Lace Designs for fabric



Applique Designs



Fringe Designs

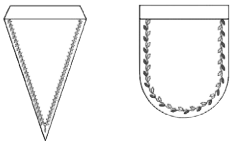


DESIGN CHART

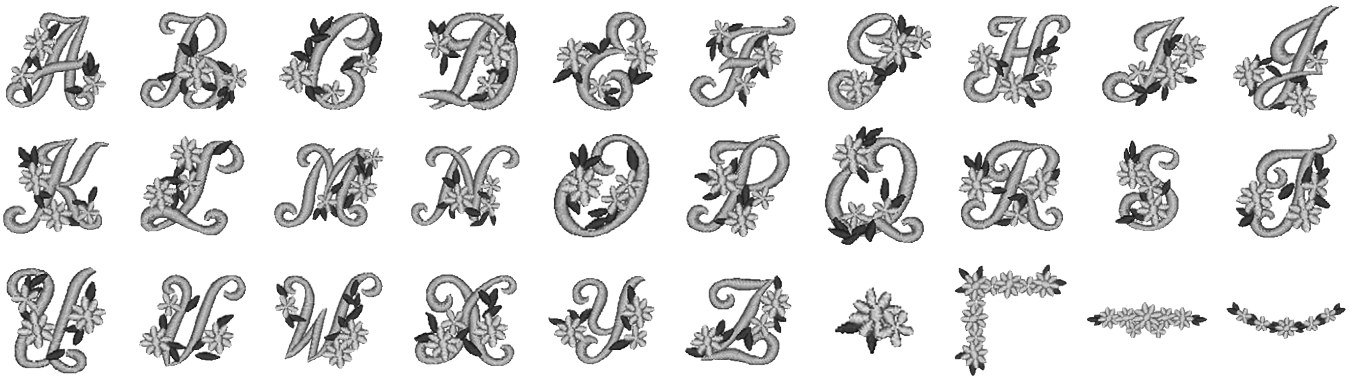
Embroidery

Pattern images are not to scale.

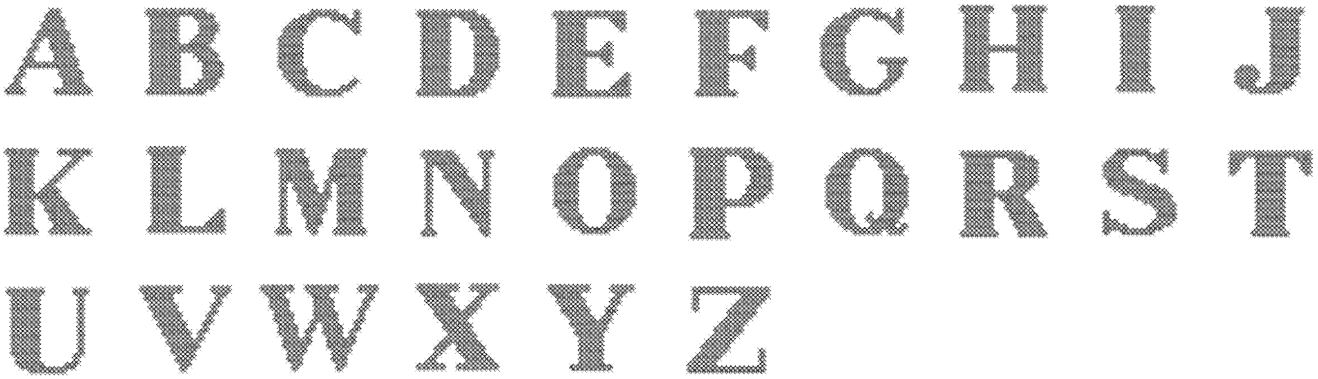
Flag Designs



Alphabet Designs <Floral>



Alphabet Designs <Cross-Stitch>



Calibration Pattern



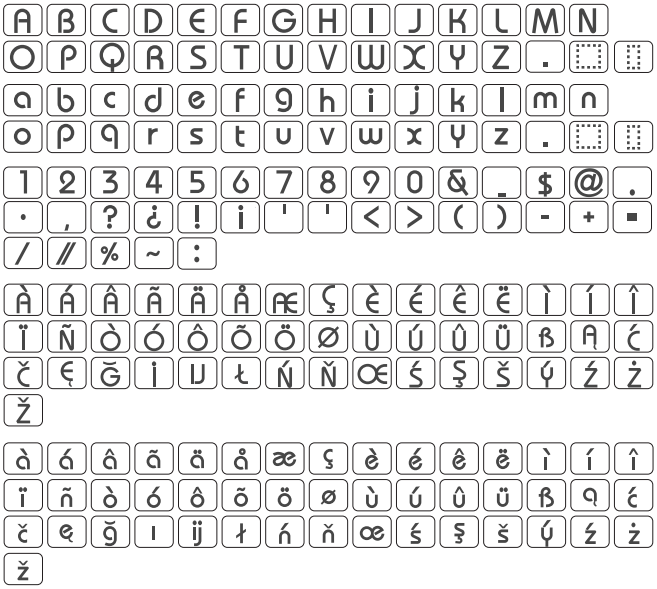
DESIGN CHART

Embroidery Monogram

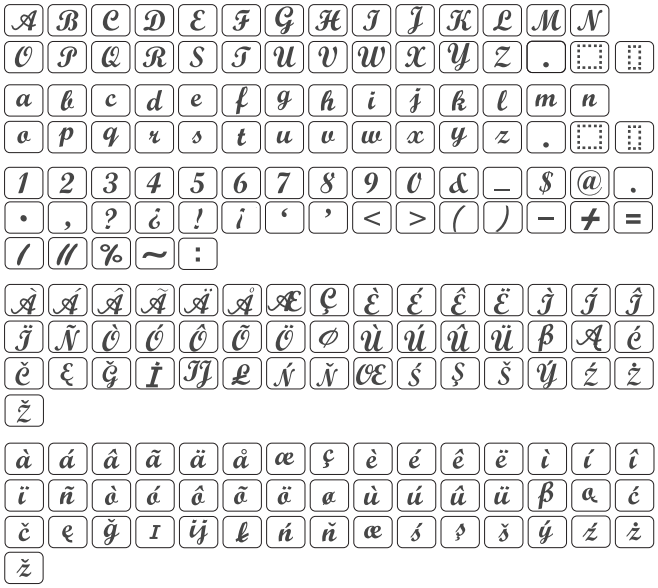
Gothic



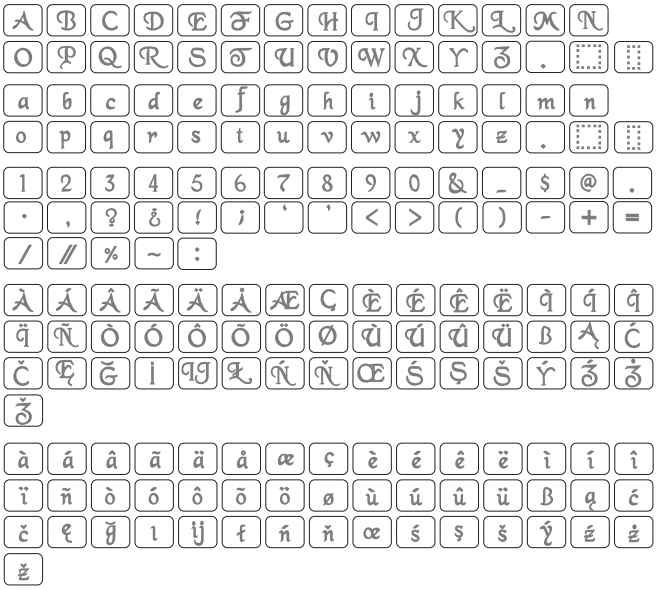
Bauhaus



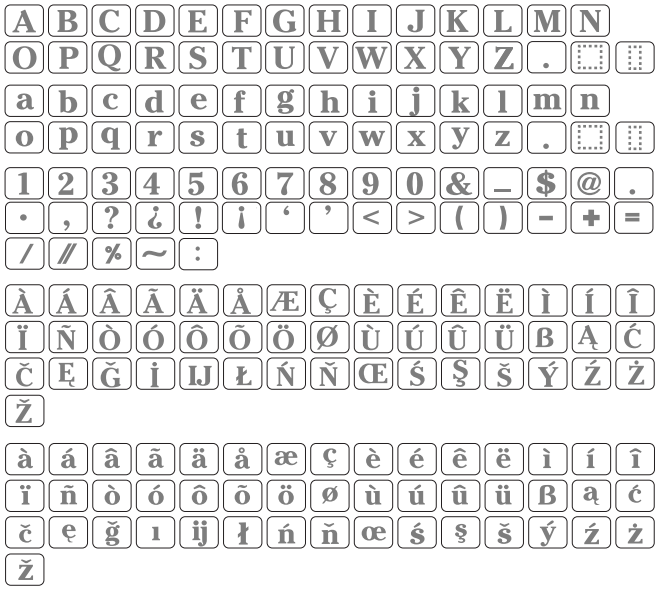
Script



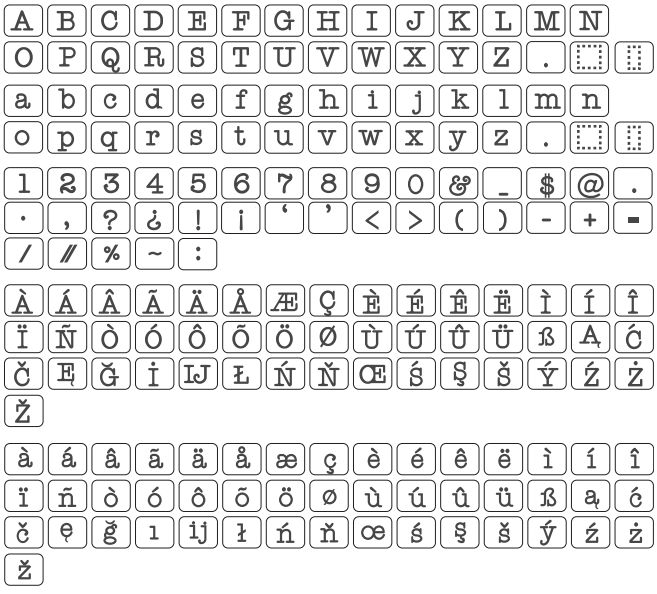
Galant



Cheltenham



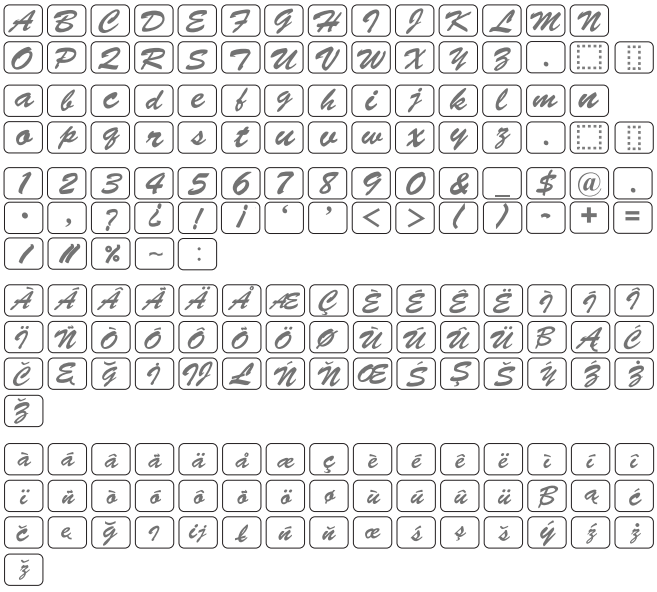
Typist



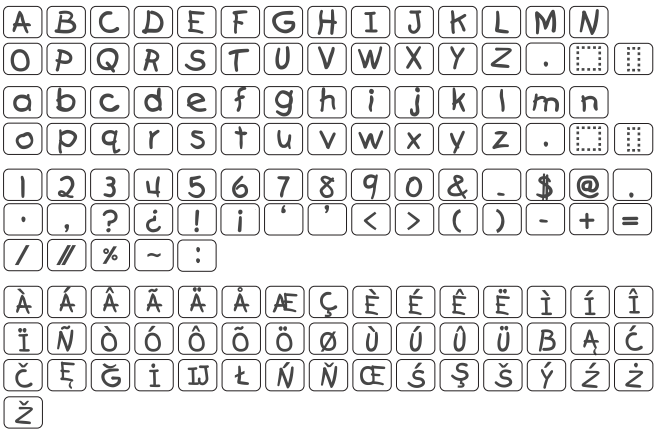
DESIGN CHART

Embroidery Monogram

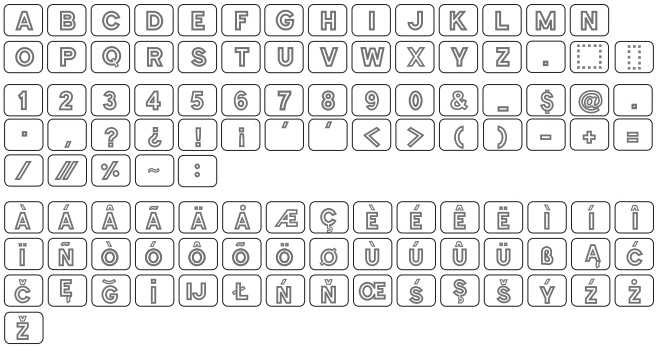
Brush



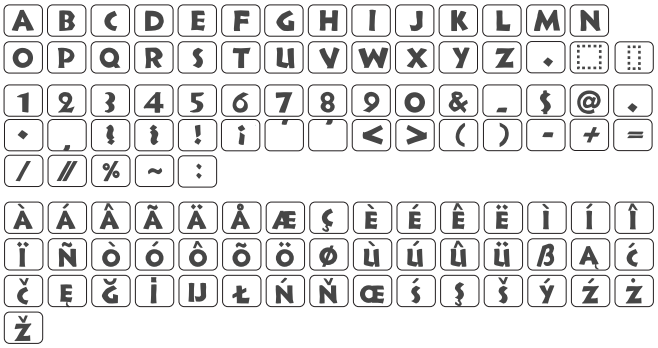
First Grade



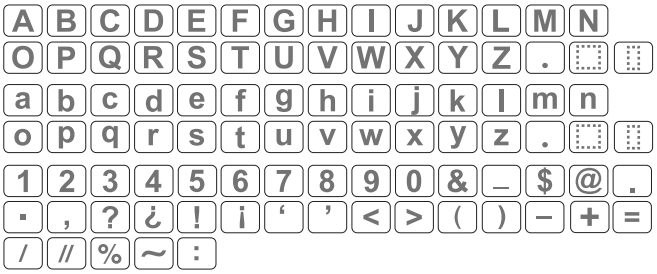
Hollowblock



Jupiter



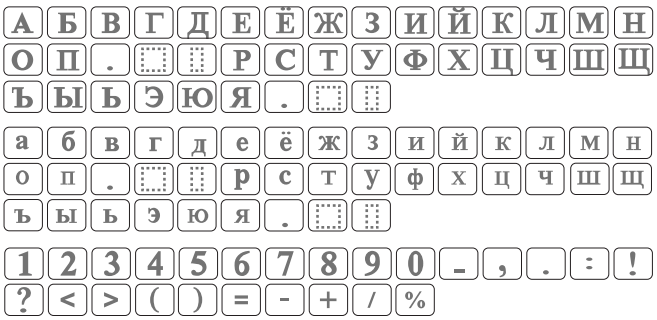
Micro Gothic



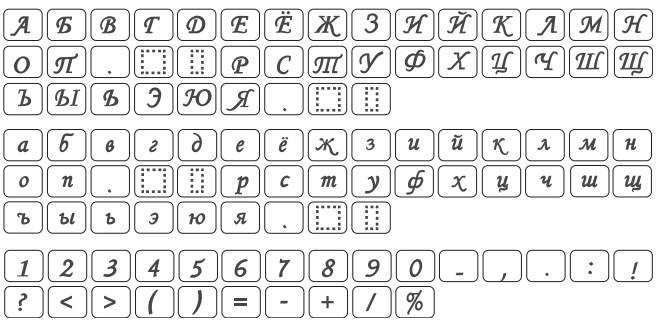
Cyrillic 1



Cyrillic 2



Cyrillic 3



DESIGN CHART

Embroidery Monogram

Kaisho

あ い う え お か き く け こ さ し す せ そ
た ち つ て と な に ぬ ね の は ひ ふ へ ほ
ま み む め も や ゆ よ ⬚ ⬚ ら り る れ ろ
わ を ん 、 。 ぁ ぃ ぅ ぇ ぉ っ ゃ ゅ ょ ー
が ぎ ぐ げ ご ざ じ ず ぜ ぞ だ ぢ づ で ど
ば び ぶ べ ぼ ぱ ぴ ぷ ぺ ぽ ゔ

ア イ ウ エ オ カ キ ク ケ コ サ シ ス セ ソ
タ チ ツ テ ト ナ ニ ヌ ネ ノ ハ ヒ フ ヘ ホ
マ ミ ム メ モ ヤ ユ ヨ ⬚ ⬚ ラ リ ル レ ロ
ワ ヲ ン 、 。 ァ ィ ゥ ェ ォ ッ ャ ュ ョ ー
ガ ギ グ ゲ ゴ ザ ジ ズ ゼ ゾ ダ ヂ ヅ デ ド
バ ビ ブ ベ ボ パ ピ プ ペ ポ ヴ

小 中 学 校 幼 稚 保 育 園 年 組 部 係 班 子
供 父 母 入 卒 式 会 社 祭 男 女 名 前 住 所
春 夏 秋 冬 元 気 晴 雨 曇 雪 結 婚 御 見 舞
待 引 越 礼 知 慶 新 誕 様 交 通 安 全 祝 休
株 生 才 時 分 曜 日 月 火 水 木 金 土 東 西
南 北 平 成 令 和 第 上 下 左 右 花 山 川 百
千 万

〇 一 二 三 四 五 六 七 八 九 十

Marumoji

あ い う え お か き く け こ さ し す せ そ
た ち つ て と な に ぬ ね の は ひ ふ へ ほ
ま み む め も や ゆ よ ⬚ ⬚ ら り る れ ろ
わ を ん 、 。 あ い う え お つ や ゆ よ ー
が ぎ ぐ げ ご ざ じ ず ぜ ぞ だ ぢ づ で ど
ば び ぶ べ ぼ ぱ ぴ ぷ ぺ ぽ グ

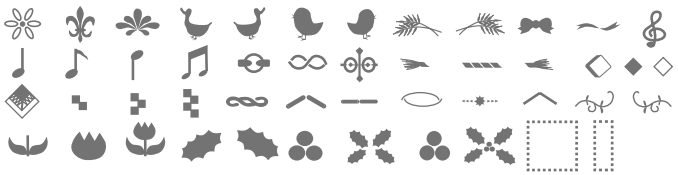
ア イ ウ エ オ カ キ ク ケ コ サ シ ス セ ソ
タ チ ツ テ ト ナ ニ ヌ ネ ノ ハ ヒ フ ヘ ホ
マ ミ ム メ モ ヤ ユ ヨ ⬚ ⬚ ラ リ ル レ ロ
ワ ヲ ン 、 。 ア イ ウ エ オ ツ ヤ ユ ヨ ー
ガ ギ グ ゲ ゴ ザ ジ ズ ゼ ゾ ダ ヂ ヅ デ ド
バ ビ ブ ベ ボ パ ピ プ ペ ポ ヴ

Kaku Gothic

あ い う え お か き く け こ さ し す せ そ
た ち つ て と な に ぬ ね の は ひ ふ へ ほ
ま み む め も や ゆ よ ⬚ ⬚ ら り る れ ろ
わ を ん 、 。 あ い う え お つ や ゆ よ ー
が ぎ ぐ げ ご ざ じ ず ぜ ぞ だ ぢ づ で ど
ば び ぶ べ ぼ ぱ ぴ ぷ ぺ ぽ ゔ

ア イ ウ エ オ カ キ ク ケ コ サ シ ス セ ソ
タ チ ツ テ ト ナ ニ ヌ ネ ノ ハ ヒ フ ヘ ホ
マ ミ ム メ モ ヤ ユ ヨ ⬚ ⬚ ラ リ ル レ ロ
ワ ヲ ン 、 。 ア イ ウ エ オ ツ ヤ ユ ヨ ー
ガ ギ グ ゲ ゴ ザ ジ ズ ゼ ゾ ダ ヂ ヅ デ ド
バ ビ ブ ベ ボ パ ピ プ ペ ポ ヴ

Border



Normal Sew



2-Letters



3-Letters



QUICK REFERENCE CHART

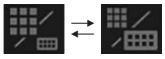
Embroidery

You can download the colored version of these contents via QR code.

Common Keys	
	Change pages, windows, layers
	Move cursors, patterns, carriage
	Home window
	Open file
	Machine settings
	On-screen help
	Lockout/Unlock machine

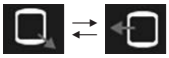
Home Window	
	Embroidery design mode
	Monogram mode
	Editing mode
	Move carriage to home position

Machine Settings	
	Machine Settings
	Embroidery Settings
	Language Setting

File/Folder	
	Move to parent folder
	Create new folder
	Change file/folder name
	Delete file/folder
	Internal memory/USB flash drive
	Enter new file name
	Folder for embroidery provided with this machine
	Upper case
	Lower case
	Hiragana
	Katakana
	Switch keyboard layout

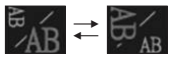
QUICK REFERENCE CHART

Embroidery

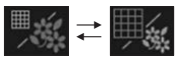
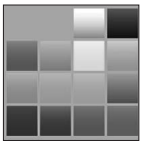
Ready to Sew Window	
	Change layer, move page
	Adjust pattern position
	Switch functions
	Show color section of design
	Check/Baste embroidery size by tracing
	Move carriage/Move hoop back to original position
	Open color list of thread/stitch count
	Switch sewing order of thread/stitch count
	Show/Hide current sewing point as cross mark
	Adjust jump thread cutting length
	Change embroidery foot
	Adjust fine position/angle
	Jump to desired sewing point
	Jump stitch count forward/backward
	Return to previous window

Editing Window	
	Change pattern selections, pages
	Move patterns
	Switch editing tools
	Change embroidery hoop
	Copy pattern
	Delete pattern
	Resize pattern
	Rotate pattern
	Flip pattern horizontally
	Flip pattern vertically
	Make monogram in upper/lower/enlarge/ shorten arc
	Group all patterns () / Group selected patters ()
	Move pattern to center position
	Copy and place pattern symmetrically into 4 corners
	Customize design color and background color
	Change sewing orders
	Reduce number of color sections by grouping
	Sew single color
	Save embroidery designs
	Zoom view size in editing window ( Normal,  Middle,  Large, Largest)
	Scroll the magnified window, drag the selected pattern
	Adjust embroidery area for free-arm embroidery

QUICK REFERENCE CHART
Embroidery

Monogramming	
	Select font
	Horizontal/Vertical orientation
	Medium/Small/Large size
	Upper/Lower case
	Hiragana/Katakana
	Save monogram design
	Adjust spacing size

Monogramming Ready to Sew Screen	
	Stop sewing at each letter for color change
	Sew from the left end reference line
	Sew in the center of the hoop
	Sew from the right end reference line

Background and Pattern Color	
	Preview customized colors for pattern
	Change pattern/background color
	Select pattern/background color
	Change shade of selected color
	Assign name to customized color
JPX	Change display to background image with .JPX file format
DFT	Return to original background color

EC DECLARATION OF CONFORMITY

Manufacturer: JANOME Corporation
Address: 1463 Hazama-machi, Hachioji, Tokyo 193-0941, Japan

This machine complies with the following regulations:

EN 60335-1: 2012 ; A11 ; A13 ; A1 ; A14 ; A2 ; A15 ; A16
EN 60335-2-28: 2003 ; A1 ; A11
EN 62233: 2008
EN IEC 55014-1: 2021
EN IEC 55014-2: 2021
EN IEC 61000-3-2: 2019 ; A1
EN 61000-3-3: 2013 ; A1 ; A2

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