

Basic operations

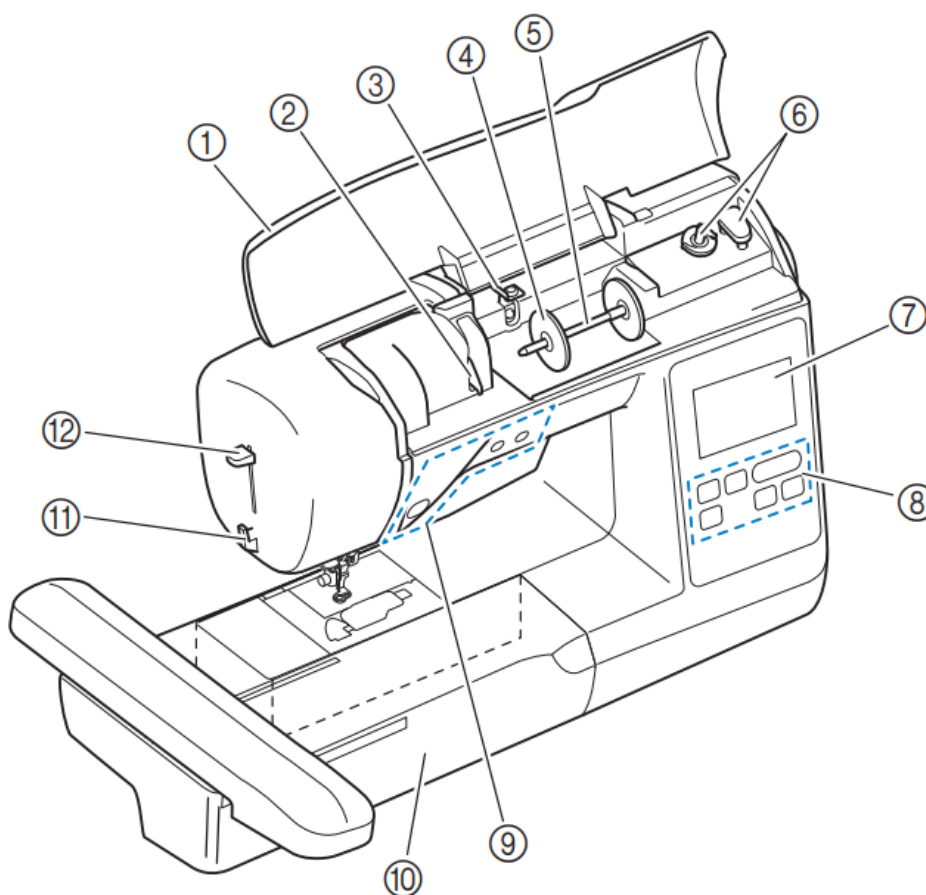
GETTING READY

Names of Machine Parts and Their Functions

The names of the various parts of the machine and their functions are described below. Before using the machine, carefully read these descriptions to learn the names of the machine and their locations.

Machine

Front view



1 Top cover

Open the top cover to place the spool of thread on the spool pin.

2 Thread guide plate

Pass the thread around the thread guide plate when threading the upper thread.

3 Bobbin winding thread guide and pretension disk

Pass the thread under this thread guide and around the pretension disk when winding the bobbin thread.

4 Spool cap

Use the spool cap to hold the spool of thread in place.

5 Spool pin

Place a spool of thread on the spool pin.

6 Bobbin winder

Use the bobbin winder when winding the bobbin.

7 LCD (liquid crystal display)

Settings for the selected pattern and error messages appear in the LCD. (page B-9)

8 Operation panel

From the operation panel, embroidery patterns can be selected and edited, and operations for using the machine can be selected. (page B-4)

9 Operation buttons

Use these buttons to operate the machine. (page B-4)

10 Embroidery unit

Attach embroidery unit to embroider. (page B-26)

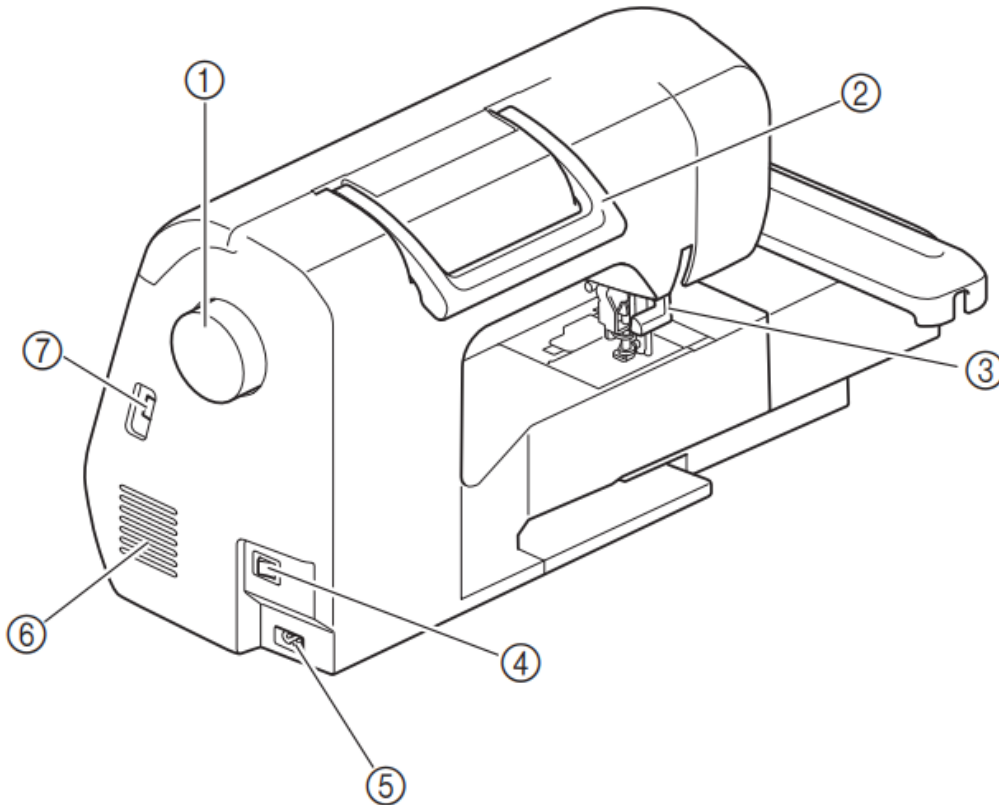
11 Thread cutter

Pass the threads through the thread cutter to cut them.

12 Needle threader lever

Use the needle threader lever to thread the needle.

Right-side/rear view



1 Handwheel

Turn the handwheel toward you (counterclockwise) to raise and lower the needle.

2 Handle

Carry the machine by its handle when transporting.

3 Presser foot lever

Raise and lower the presser foot lever to raise and lower the presser foot.

4 Main power switch

Use the main power switch to turn the machine on and off.

5 Power supply jack

Insert the plug on the power cord into the power supply jack.

6 Air vent

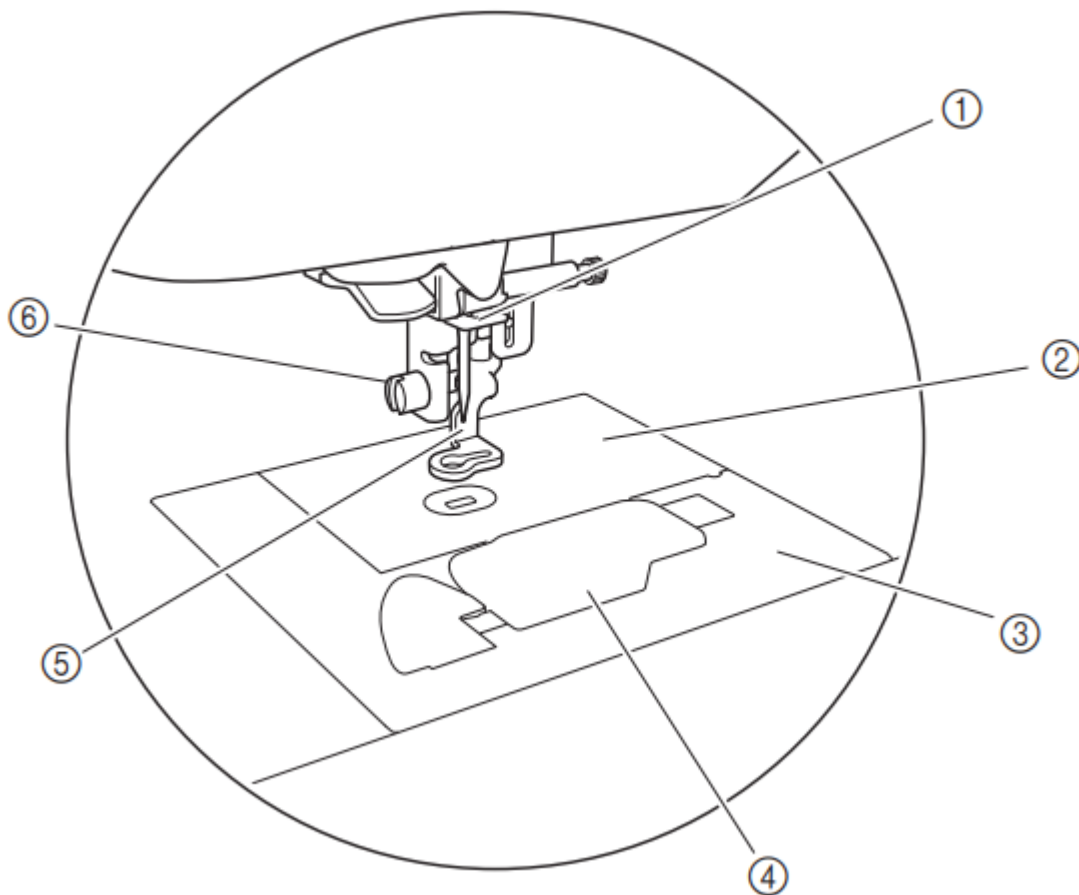
The air vent allows the air surrounding the motor to circulate.

Do not cover the air vent while the machine is being used.

7 USB port (for a USB flash drive)

In order to import patterns from a USB flash drive, insert the USB flash drive directly into the USB port

Needle and presser foot section



1 Needle bar thread guide

Pass the upper thread through the needle bar thread guide.

2 Needle plate

3 Needle plate cover

Remove the needle plate cover to clean the bobbin case and race.

4 Bobbin cover/bobbin case

Remove the bobbin cover and then insert the bobbin into the bobbin case.

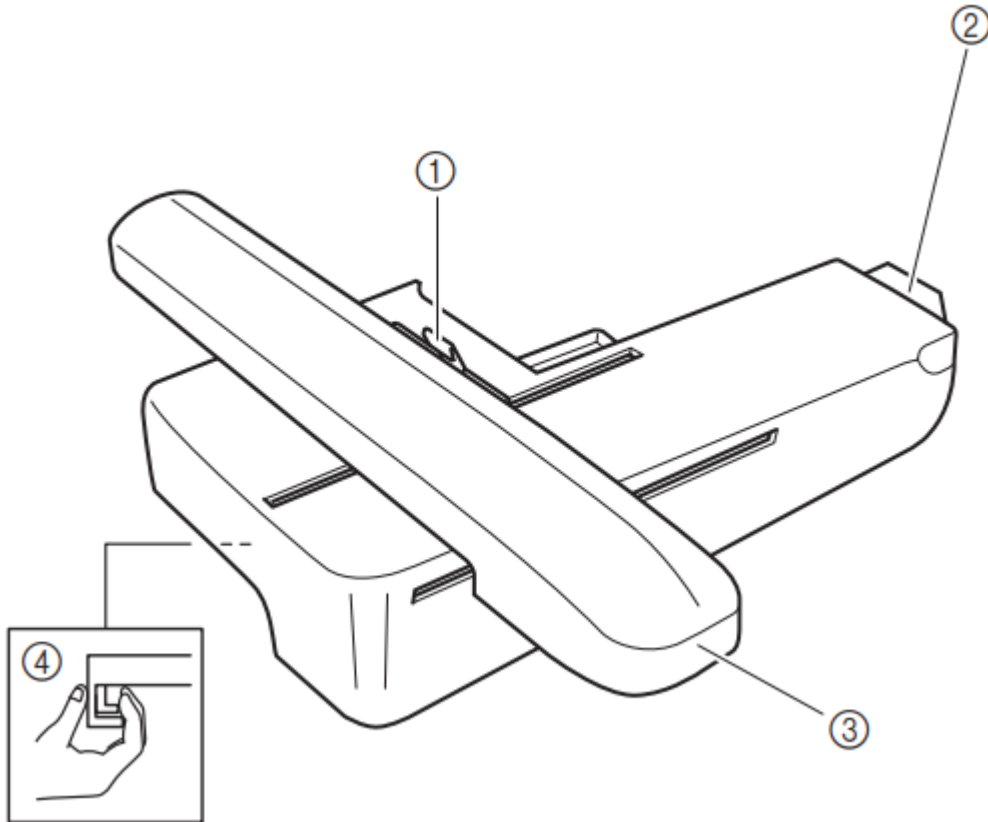
5 Embroidery foot

The embroidery foot helps control fabric flexibility for better stitch consistency.

6 Embroidery foot screw

Use the embroidery foot screw to hold the embroidery foot in place

Embroidery Unit



1 Frame-securing lever

Press the frame-securing lever to the left to attach or remove the embroidery frame. (page B-33)

2 Embroidery unit connector

Insert the embroidery unit connector into the connection port when attaching the embroidery unit. (page B-26)

3 Carriage

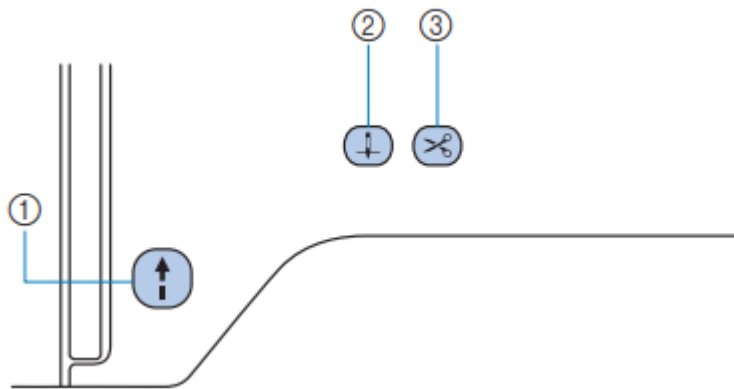
The carriage moves the embroidery frame automatically when embroidering. (page B-26)

4 Release button (located under the embroidery unit)

Press the release button to remove the embroidery unit. (page B-27)

CAUTION Before inserting or removing the embroidery unit, turn the main power to OFF.

Operation buttons



1 “Start/Stop” button

Press the “Start/Stop” button to start or stop embroidering.

The button changes color according to the machine’s operation mode.

Green: The machine is ready to embroider or is embroidering.

Red: The machine can not embroider.

Orange: The machine is winding the bobbin thread, or the bobbin winder shaft is moved to the right side

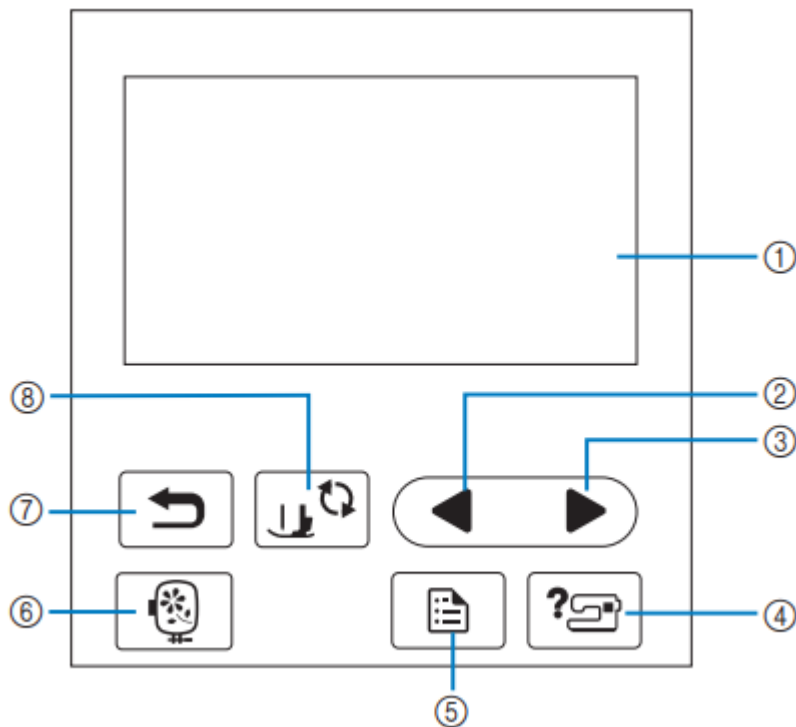
2 Needle position button

Press the needle position button to raise or lower the needle.

3 Thread cutter button

Press the thread cutter button after embroidering is stopped to cut both the upper and the bobbin threads

Operation panel and operation keys



1 LCD (liquid crystal display) (touch panel)

Selected pattern settings and messages are displayed.

Touch the keys displayed on the LCD to perform operations.

For details, refer to “LCD Operation” on page B-9.

2 Previous page key ◀

Displays the previous screen when there are items that are not displayed on the LCD.

3 Next page key ▶

Displays the next screen when there are items that are not displayed on the LCD.

4 Help key

Press to get help on using the machine.

5 Settings key

Press to set the needle stop position, the buzzer sound, and more.

6 Embroidery key

Press this key to sew embroidery.

7 Back key

Press to return to the previous screen.

8 Presser foot/Needle exchange key




















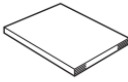
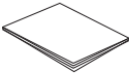
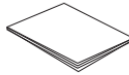
Press this key before changing the needle, the presser foot, etc. This key locks all key and button functions to prevent operation of the machine.

Note

- The operation keys of this machine are capacitive touch sensors. Operate the keys by directly touching them with your finger. The response of the keys varies according to the user. The pressure exerted on the keys does not affect the response of the keys.
- Since the operation keys react differently depending on the user, adjust the setting for “Adjusting input sensitivity for operation keys” on page B-12.
- When using an electrostatic touch pen, make sure that its point is 8 mm or more. Do not use a touch pen with a thin point or a unique shape.

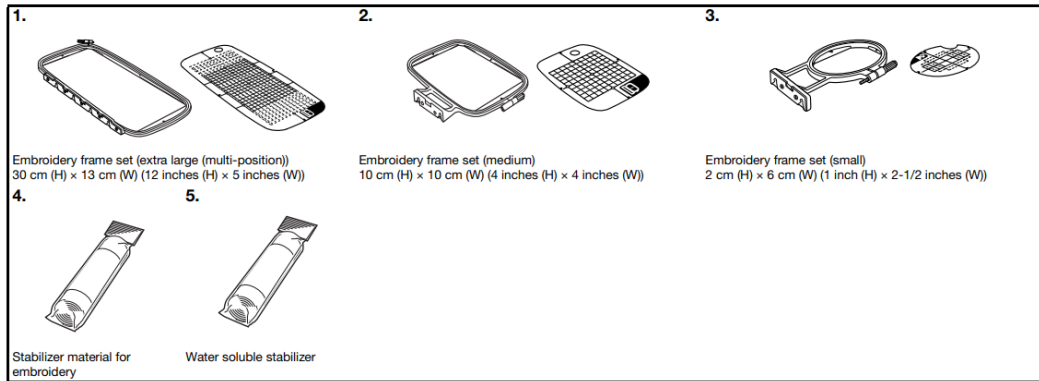
Included accessories

Included accessories may differ from the table below depending on the machine model you purchased. For more details on included accessories and their part codes of your machine, refer to the Quick Reference Guide.

1.  Embroidery foot “Q” (on machine)	2.  Needle set 2/11 needle	3.  Bobbin (4) (One is on machine.)	4.  Seam ripper	5.  Scissors	6.  Cleaning brush
7.  Screwdriver (large)	8.  Screwdriver (small)	9.  Disc-shaped screwdriver	10.  Spool cap (large)	11.  Spool cap (medium) (on machine)	12.  Spool cap (small)
13.  Thread spool insert (mini king thread spool)	14.  Spool net	15.  Bobbin case (no color on the screw) (on machine)	16.  Embroidery frame set (large) 18 cm (H) x 13 cm (W) (7 inches (H) x 5 inches (W))	17.  Poly 90 weight bobbin thread	
18.  Accessory bag	19.  Dust cover	20.  Operation Manual	21.  Quick Reference Guide	22.  Embroidery Design Guide	

Optional accessories

The following are available as optional accessories to be purchased separately. For more optional accessories and their part codes, refer to the Quick Reference Guide.




Memo

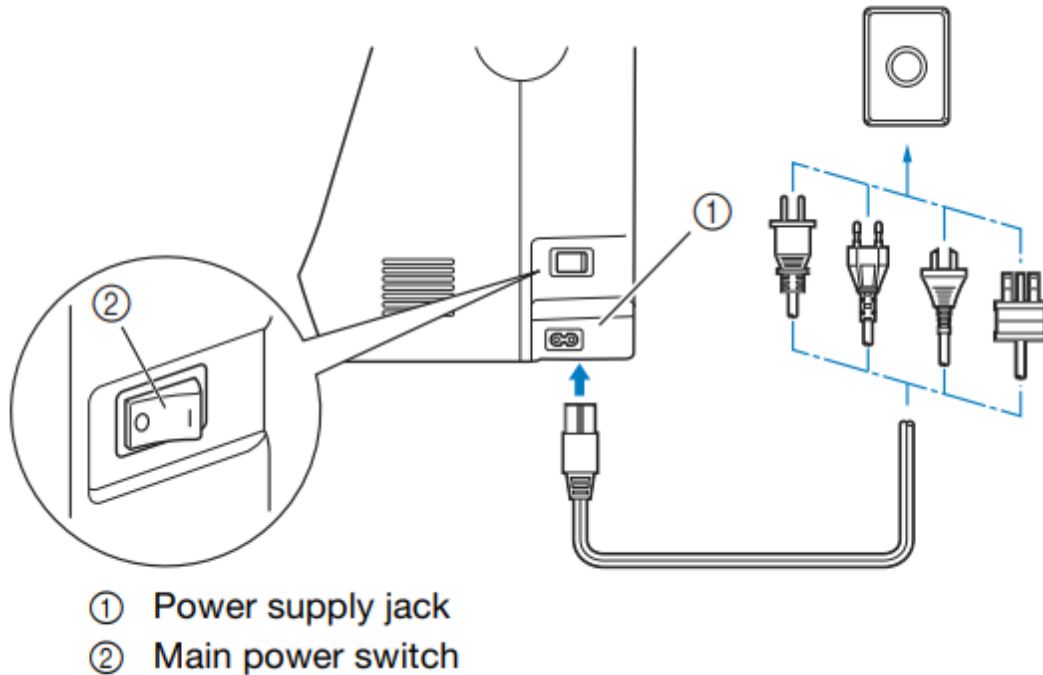
- To obtain optional accessories or parts, contact your authorized Brother dealer.
- All specifications are correct at the time of printing. Please be aware that some specifications may change without notice.
- Visit your nearest authorized Brother dealer for a complete listing of optional accessories available for your machine.
- Always use accessories recommended for this machine.

Turning the Machine On/Off

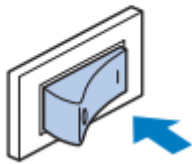
Turning on the machine

1. Make sure that the machine is turned off (the main power switch is set to “”), and then plug the power cord into the power supply jack on the right side of the machine.

2. Insert the plug of the power cord into a household electrical outlet.



3. Press the right side of the main power switch on the right side of the machine to turn the machine on (set it to “I”)



→ The light, LCD and the “Start/Stop” button light up when the machine is turned on

Memo

- When the machine is turned on, the machine will make a sound when it moves; this is not a malfunction
- If the machine is turned off in the middle of embroidering, the operation will resume after turning the power on again

4. When the machine is turned on, the opening movie is played. Press anywhere on the screen

Turning off the machine



1. When you are finished using the machine, turn it off. In addition, before transporting the machine to another location, be sure to turn it off. Make sure that the machine is not embroidering.

2. Press the main power switch on the right side of the machine in the direction of the “○” symbol to turn the machine off



Select machine setting for the first time

When you first turn on the machine, select the language of your choice. Follow the procedure below when the settings screen appears automatically.

1. Press  and  to select your choice of language



2. Press 

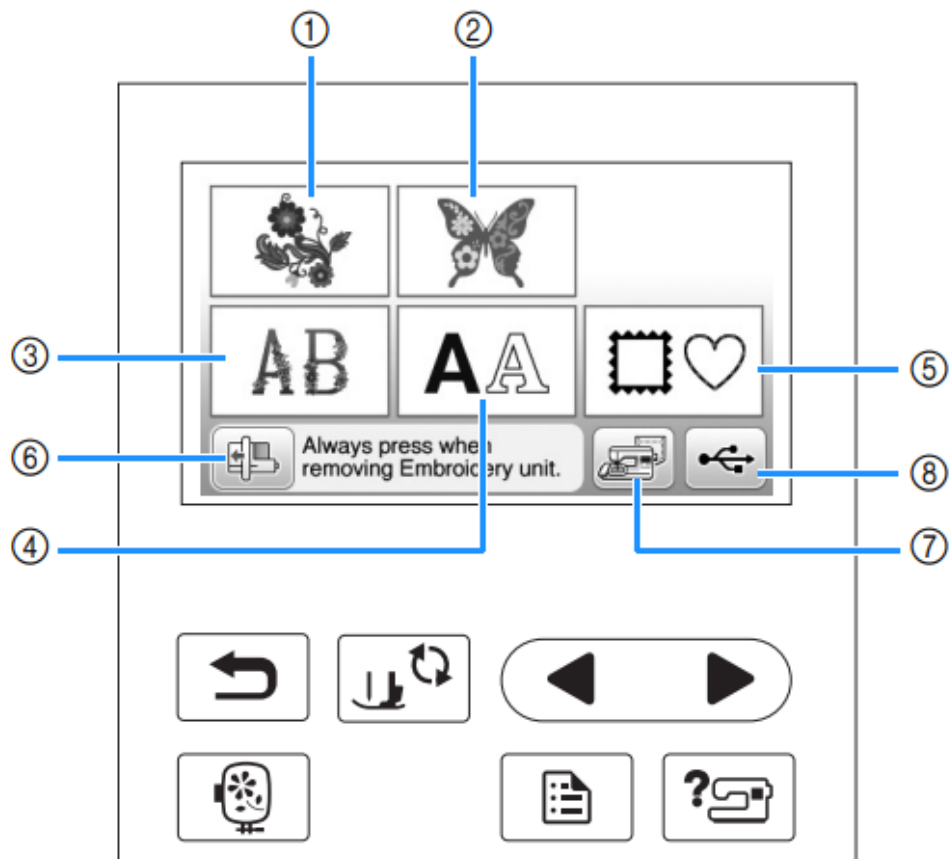
LCD Operation

Viewing the LCD

An opening movie may be displayed when the power is turned on. When the opening movie is displayed, the screen will be displayed if you touch the LCD with your finger. Press a key with your

finger to select the embroidery pattern, to select a machine function, or to select an operation indicated on the key.

1. The screen below appears after the embroidery carriage moves to its initial position



Embroidery patterns

2. Brother "Exclusives"

3. Floral alphabet patterns


4. Character patterns

5. Frame patterns

6. Press this key to position the embroidery unit for storage

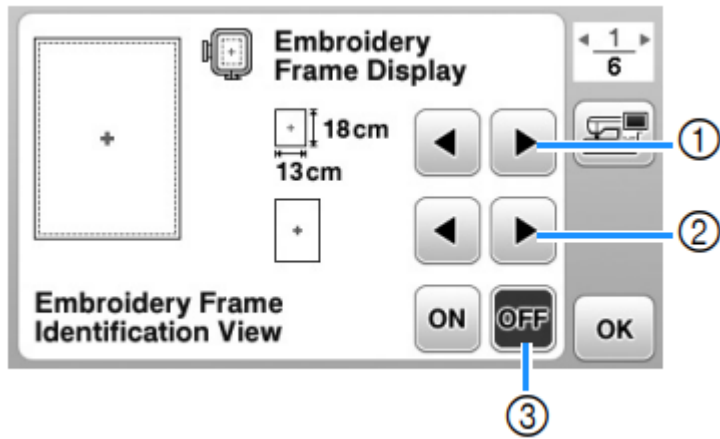
7. Patterns saved in the machine's memory 8 Patterns saved in USB flash drive

Using the settings key

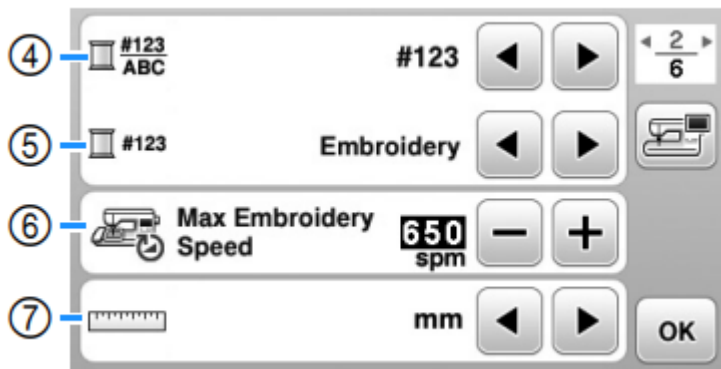
Press  to change the default machine settings (needle stop position, embroidery speed, opening display, etc.). Press OK, after you changed necessary settings.

• Embroidery settings

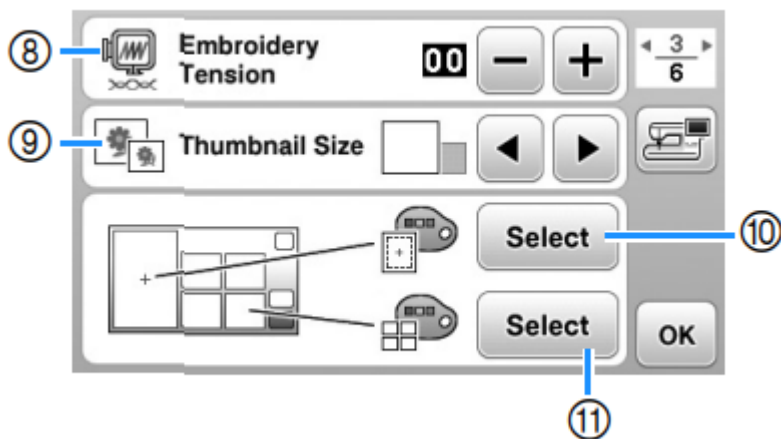
Page 1



Page 2



Page 3



1. Select the embroidery frame to be used.
2. Select the centerpoint marker and grid that are displayed. For details, refer to “Changing the “Embroidery Frame Display”” in the “Embroidering” section.

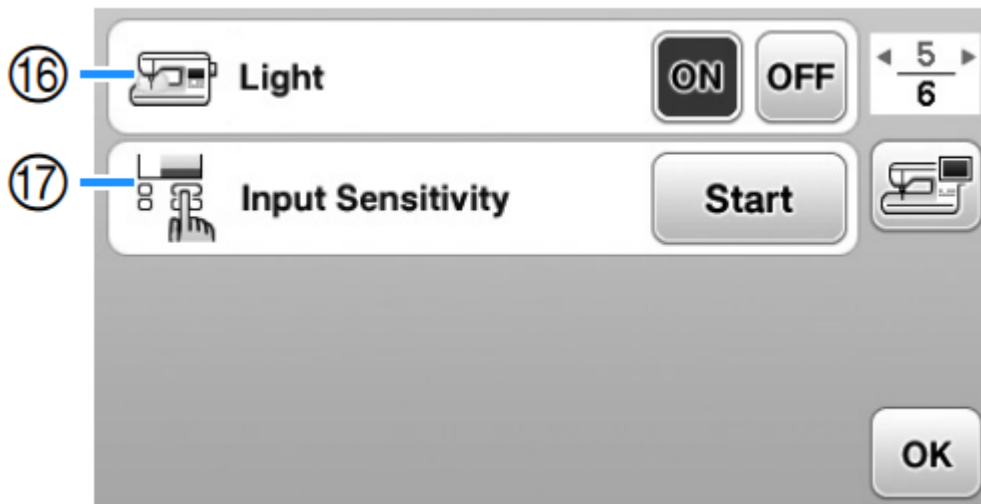
3. When set to “ON”, the embroidery pattern can be selected according to the embroidery frame size that you have selected in number 1. For details, refer to “Selecting/displaying patterns according to the embroidery frame size” in the “Embroidering” section.
4. Change the thread color display on the “Embroidery” screen; thread number, color name. (page B-38).
5. When the thread number “#123” is selected, select from six thread brands. (page B-38).
6. Adjust the maximum embroidery speed setting. For details, refer to “Adjusting the embroidery speed” in the “Embroidering” section.
7. Change the display units (mm/inch).
8. Adjust the upper thread tension for embroidering. For details, refer to “Adjusting thread tension” in the “Embroidering” section.
9. Press to specify the size of pattern thumbnails. For details, refer to “Specifying the size of pattern thumbnails” in the “Embroidering” section.
10. Change the color of the background for the embroidery display area. For details, refer to “Changing the background colors of the embroidery patterns” in the “Embroidering” section.
11. A Change the color of the background for the thumbnail area. For details, refer to “Changing the background colors of the embroidery patterns” in the “Embroidering” section.

- **General settings**

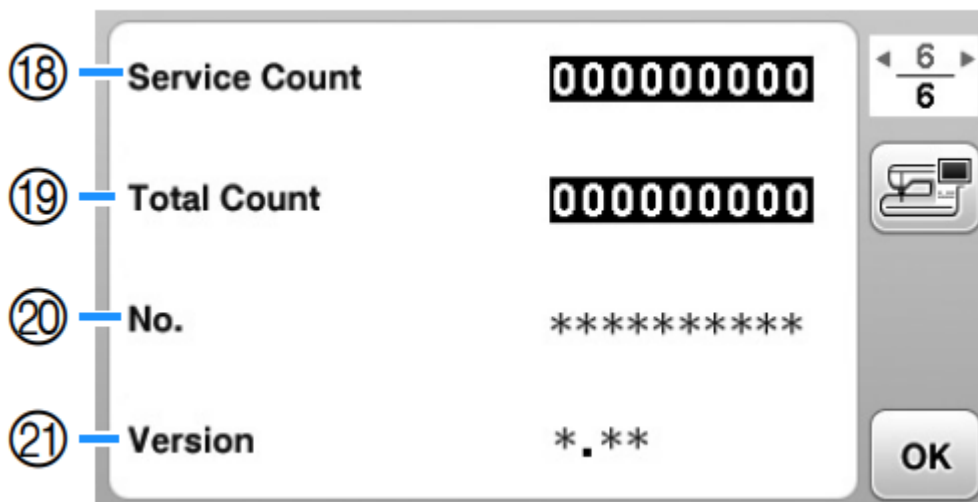
Page 4



Page 5



Page 6



12 Select the needle stop position (the needle position for when the machine is not being operated) to be up or down.

13 Select whether to hear the beep operation sound. For details, refer to “Operation beep” in the “Appendix” section. D

14 Select whether to display the opening screen when the machine is turned on.

15 Select the display language. (page B-12)

16 Select whether to turn on the light for the needle area and work area.

17 Select the level of the input sensitivity for operation keys. (page B-12)




18 Display the service count which is a reminder to take your machine in for regular servicing. (Contact your authorized Brother dealer for details.)

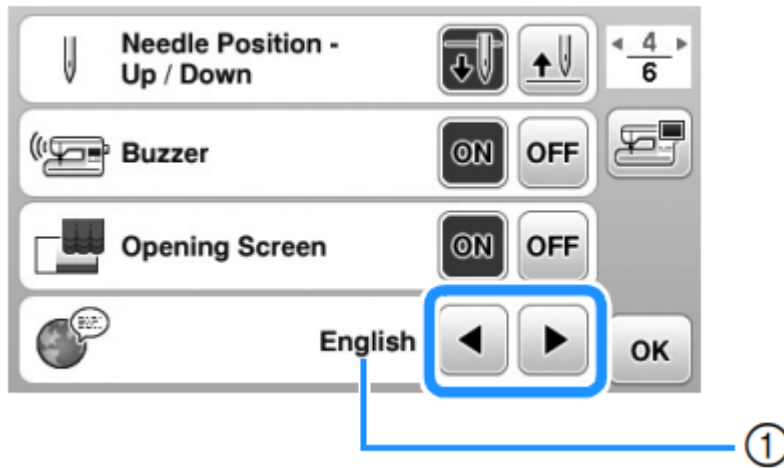
19 Display the total number of stitches sewn on this machine.


20 The “No.” is the internal machine number for your machine.

21 Display the program version of the LCD panel.

• **Choosing the display language**

1. Press 
2. Display page 4.
3. Use  and  to choose the display language.





4. Press  to return to the original screen.

Adjusting input sensitivity for operation keys

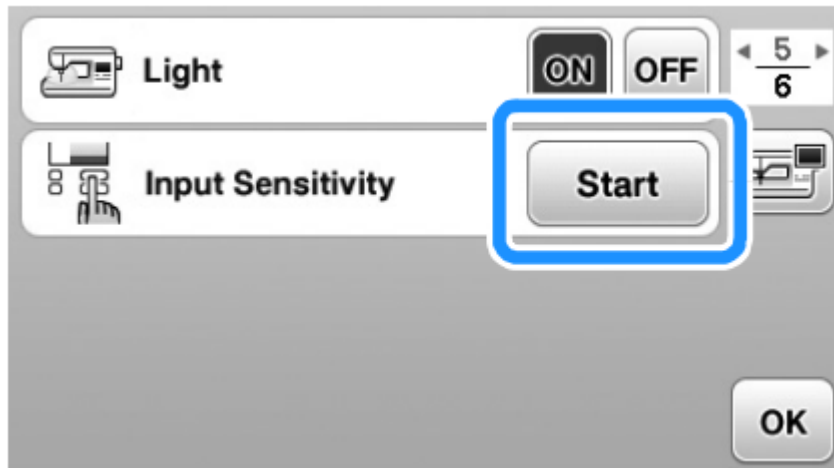
You can adjust the sensitivity of the operation keys to five levels. Display the settings screen to set desired level.




① **Operation keys**

1. Press  to display the settings screen.
2. Display page 5 by pressing .

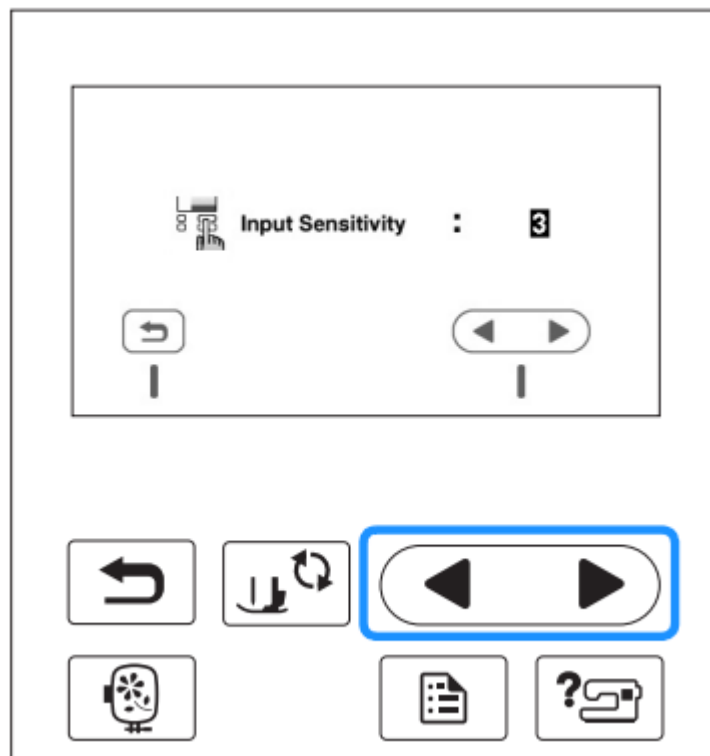
3. Press "Start"




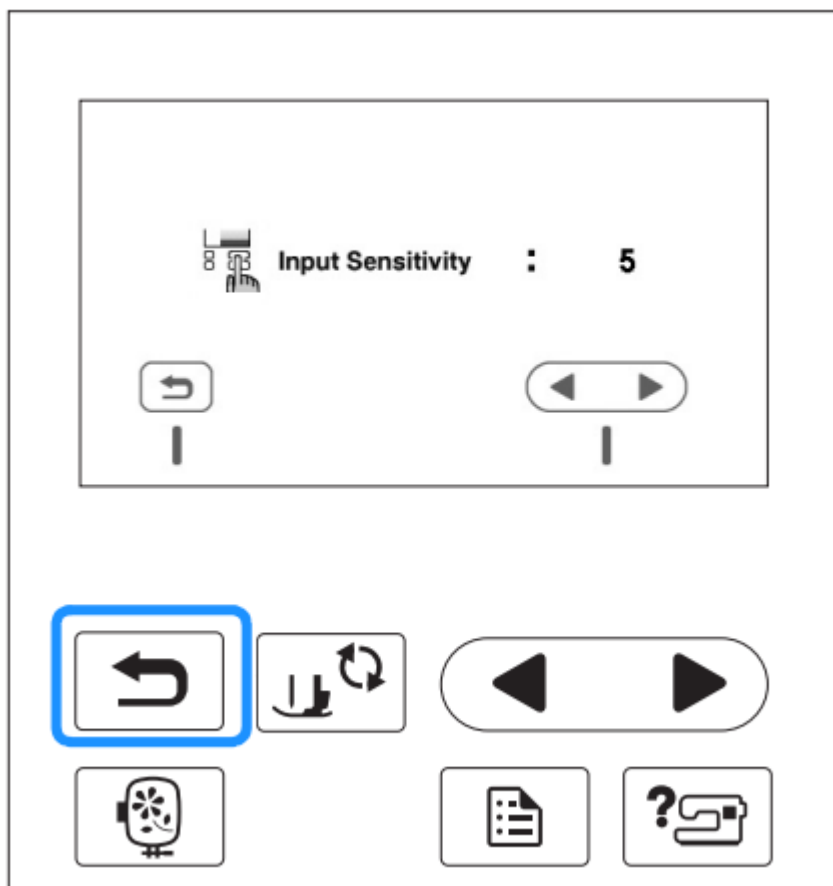
→ The adjusting screen is displayed.

4. Adjust the "Input Sensitivity" by pressing .


- The higher the setting, the more sensitive the keys will be. The default setting is "3"



5. Press  to return to previous screen.



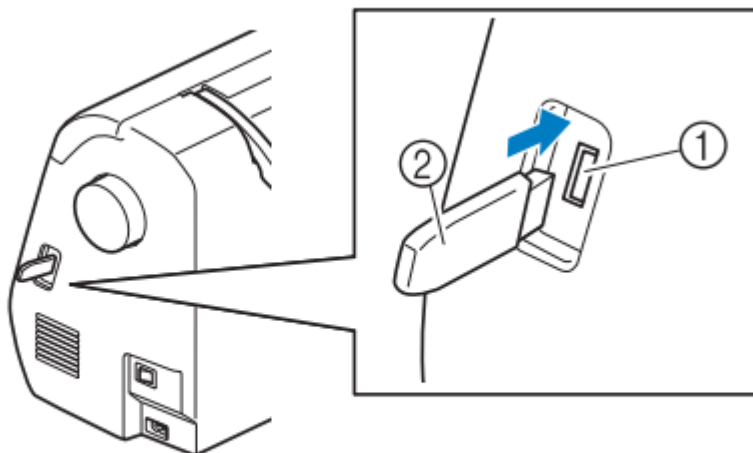
- If the machine does not respond when an operation key is pressed

Turn machine off, then hold down  (Thread cutter button) and turn on the machine to reset the setting. Display the settings screen, and then adjust the setting again.



Saving a settings screen image to USB flash drive

An image of the settings screen can be saved as a BMP file.

1. Insert the USB flash drive into the USB port on the right side of the machine.




- ① USB port
- ② USB flash drive

2.  Press
→ The settings screen appears. Select the settings screen page, make the changes that you want, and then save the screen image.
3.  Press
→ The image file will be saved to the USB flash drive.
4. Remove the USB flash drive, and then for future reference, check the saved image using a computer.
 - The files for settings screen images are saved with the name "S#####.bmp" in a folder labeled "bPocket".

Checking machine operating procedures

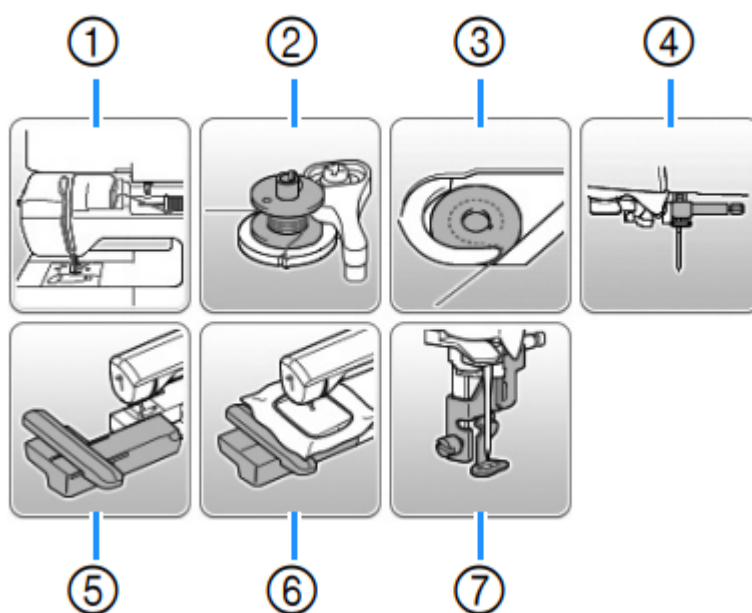
1. Turn on the machine.
→ The LCD comes on.
2. Press anywhere on the LCD screen.

3. Press  on the operation panel.




→ The machine help screen appears.

4. Press the item to be displayed.





1. Upper threading
2. Bobbin winding
3. Bobbin installation
4. Needle replacement
5. Embroidery unit attachment
6. Embroidery frame attachment
7. Embroidery foot attachment

→ The first screen describing the procedure for the selected topic appears.

▪ Pressing , returns you to the item selection screen.

5. Press  to switch to the next page.

6. If you press , you return to the previous page. After you have finished viewing, press  two times.

Replacing the Needle

Be sure to observe the following precautions concerning the handling of the needle. Failure to observe these precautions is extremely dangerous, for example, if the needle breaks and fragments are dispersed. Be sure to read and carefully follow the instructions below.

Thread and needle number

- The lower the thread number is, the heavier the thread; the higher the needle number, the larger the needle.

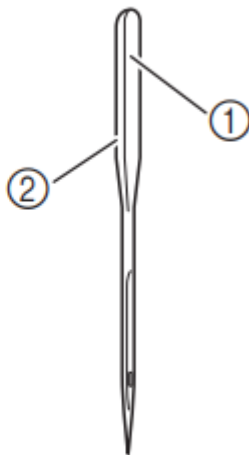
Embroidery needles

- Use a 75/11 home sewing machine needle for embroidery

Checking the needle

Sewing with a bent needle is extremely dangerous since the needle may break while the machine is being operated.


Before using the needle, place the flat side of the needle on a flat surface and check that the distance between the needle and the flat surface is even



- ① Flat side
- ② Needle type marking


Replacing the needle

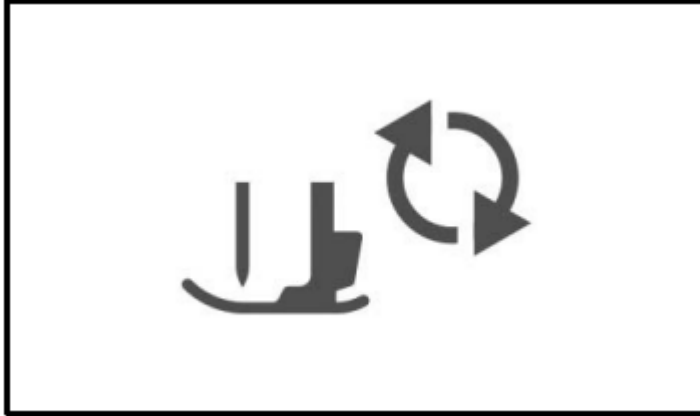
Use the screwdriver and a needle that has been determined to be straight according to the instructions in “Checking the needle”.

1. Press  (Needle position button) once or twice to raise the needle.

2. Place fabric or paper under the presser foot to cover the hole in the needle plate.

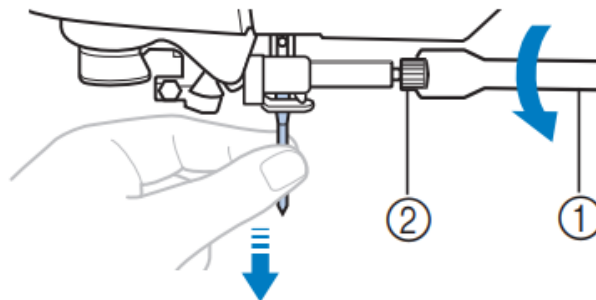
3.  Press .

→ The screen changes, and all keys and operation buttons are locked (except ).



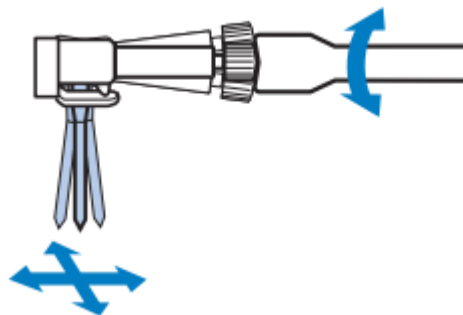
4. Hold the needle with your left hand, and then use a screwdriver to turn the needle clamp screw toward you (counterclockwise) to remove the needle.

- The needle clamp screw can also be loosened or tightened with the disc-shaped screwdriver

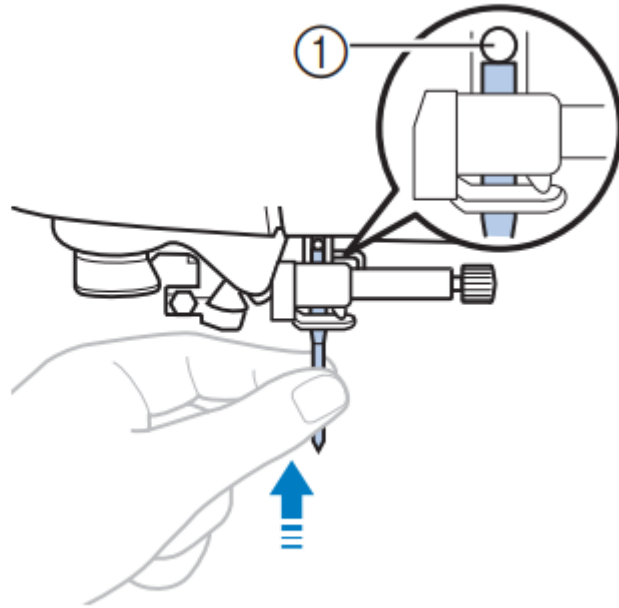


- ① Screwdriver
- ② Needle clamp screw

- Do not apply a strong force when loosening or tightening the needle clamp screw, otherwise certain parts of the machine may be damaged

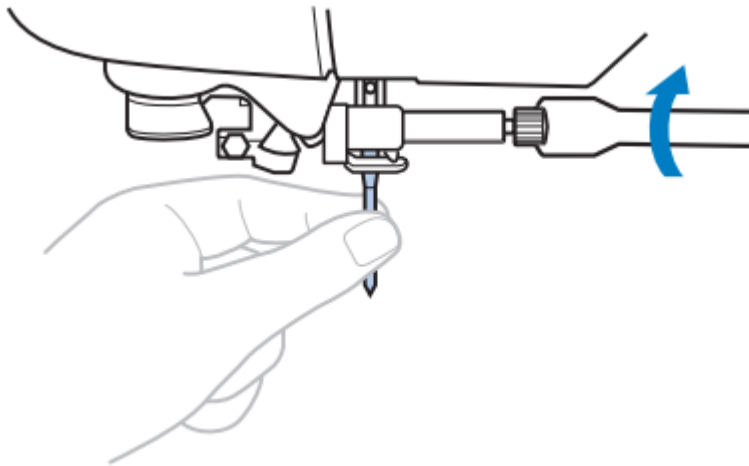



5. With the flat side of the needle toward the rear of the machine, insert the needle until it touches the needle stopper.



① Needle stopper

6. With the flat side of the needle toward the rear of the machine, insert the needle until it touches the needle stopper.

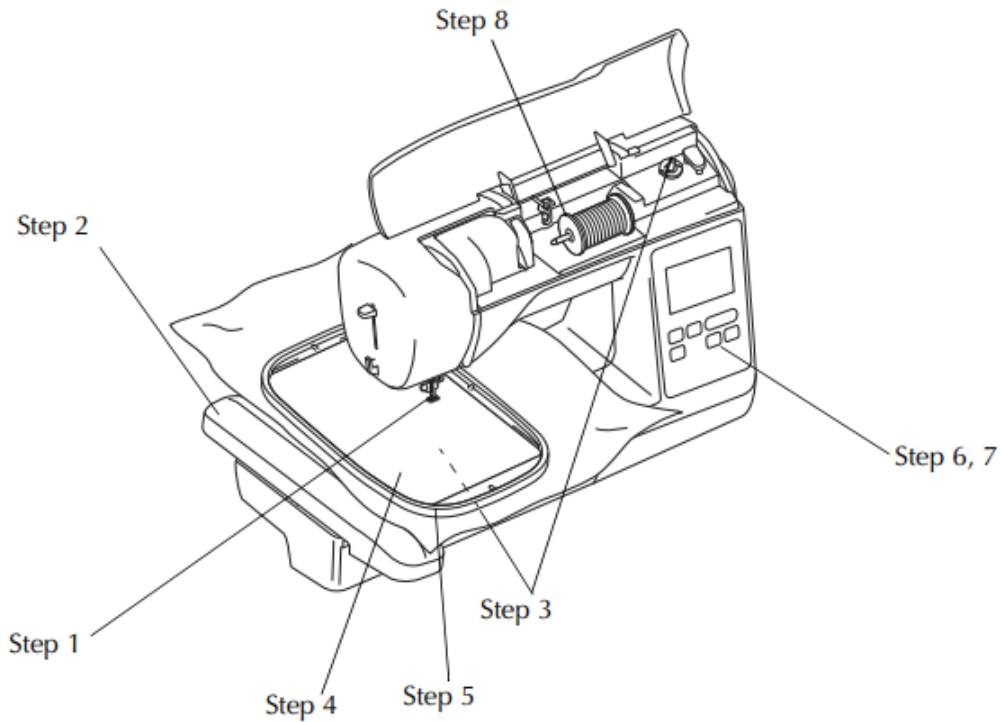


7. Press  to unlock all keys and buttons.

STARTING TO EMBROIDER

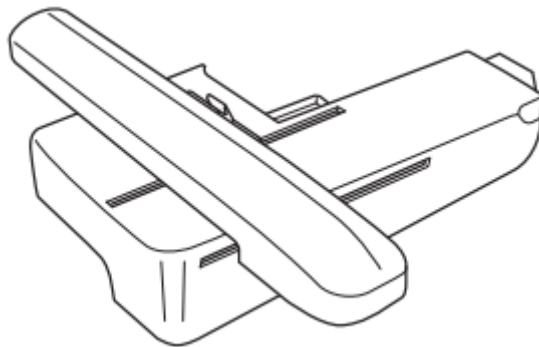
Embroidery Step by Step

Follow the steps below to prepare the machine for embroidery.

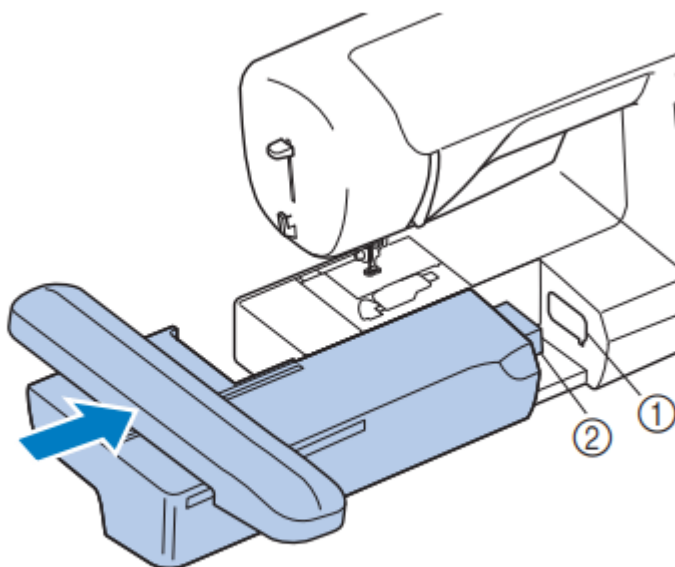


1. Checking the needle Use needle 75/11 for embroidery. B-23
2. Embroidery unit attachment Attach the embroidery unit. B-26
3. Bobbin thread setup For the bobbin thread, wind embroidery bobbin thread and set it in place. B-17
4. Fabric preparation Attach a stabilizer material to the fabric, and hoop it in the embroidery frame. B-29
5. Embroidery frame attachment Attach the embroidery frame to the embroidery unit. B-33
6. Pattern selection Turn the main power to on, and select an embroidery pattern. B-35
7. Checking the layout Check and adjust the size and position of the embroidery. B-36
8. Embroidery thread setup Set up embroidery thread according to the pattern. B-37

Attaching the Embroidery Unit




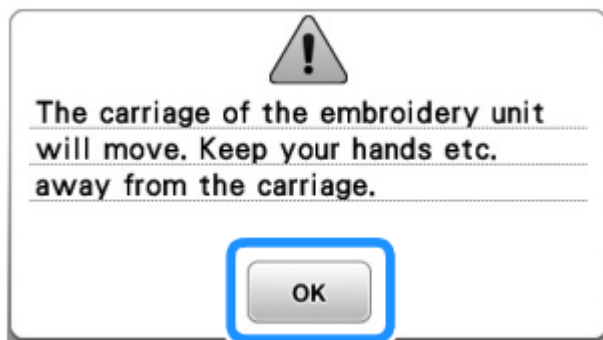
1. Turn off the machine.
2. Insert the embroidery unit connector into the connection port, and then lightly push in the embroidery unit until it snaps into place.



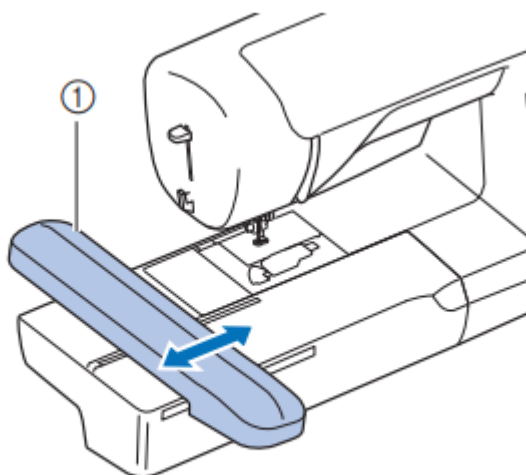
- ① Connection port
- ② Embroidery unit connector

3. Turn on the machine.
 - A message appears in the screen.

4. Be sure that no objects or hands are near the embroidery unit and press .

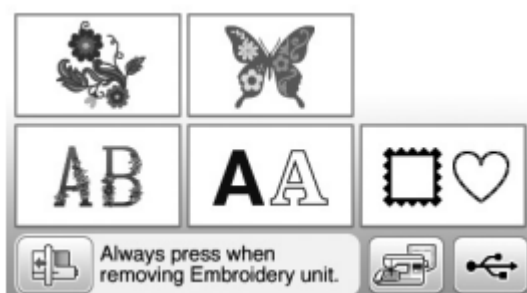


- The carriage moves to its initial position.



① Carriage

- The screen for selecting the embroidery pattern type is displayed.



For details on the embroidery patterns, refer to "Viewing the LCD" on page B-9.

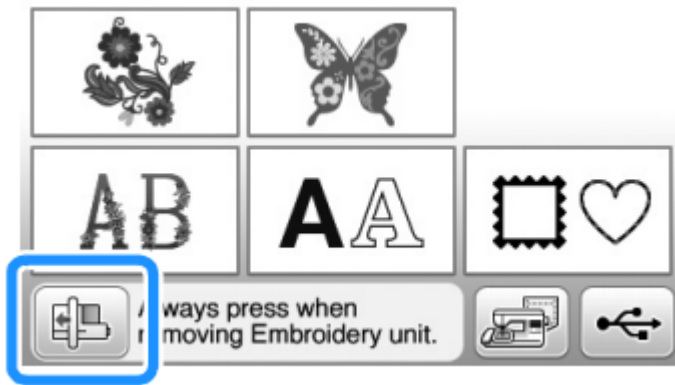
Removing the embroidery unit

Make sure that the machine is completely stopped and follow the instructions below.

1. Remove the embroidery frame.

- For details on removing the embroidery frame, refer to “Attaching the Embroidery Frame” on page B-33.

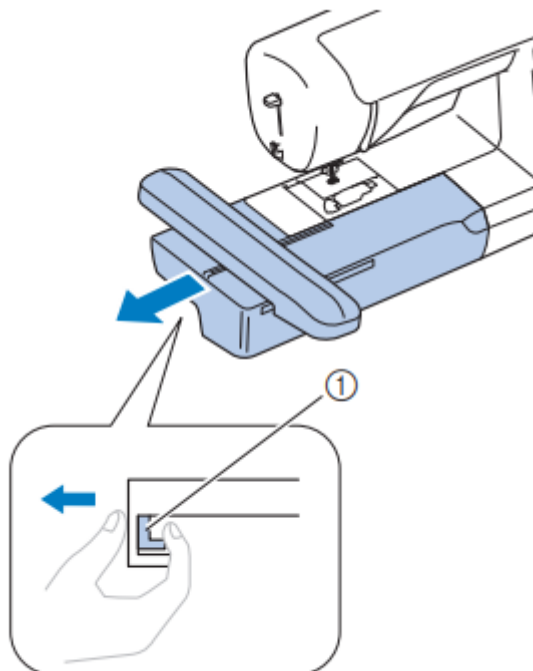
2. Press , and then press .



- The embroidery carriage moves into a position where it can be stored

3. Turn off the machine.

4. Hold the release button on the bottom left of the embroidery unit, and slowly pull the embroidery unit to the left.



① Release button

Embroidery Attractive Finishes

There are many factors that go into beautiful embroidery.

Using the appropriate stabilizer (see page B-29) and hooping the fabric in the frame (see page B-30) are two important factors mentioned earlier. Another important point is the appropriateness of the needle and thread being used. See the explanation of threads below.

Thread

Upper thread

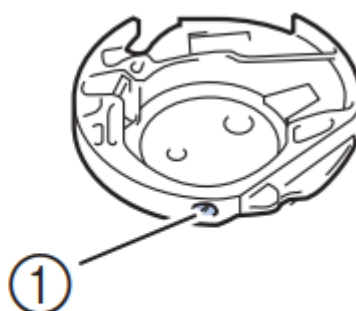
- Use embroidery thread intended for use with this machine.
- Other embroidery threads may not yield optimum results.

Bobbin thread

- Use embroidery bobbin thread intended for use with this machine

Bobbin case

Bobbin case (recommended for embroidering with included 90 weight bobbin thread)



① Bobbin case (no color on the screw)

The bobbin case included with this machine has been set to be used with 90 weight bobbin thread. If different weights of bobbin threads are used the tension screw on this case can be adjusted if necessary. For details on adjusting thread tension, refer to “Adjusting thread tension” in the “Embroidering” section.

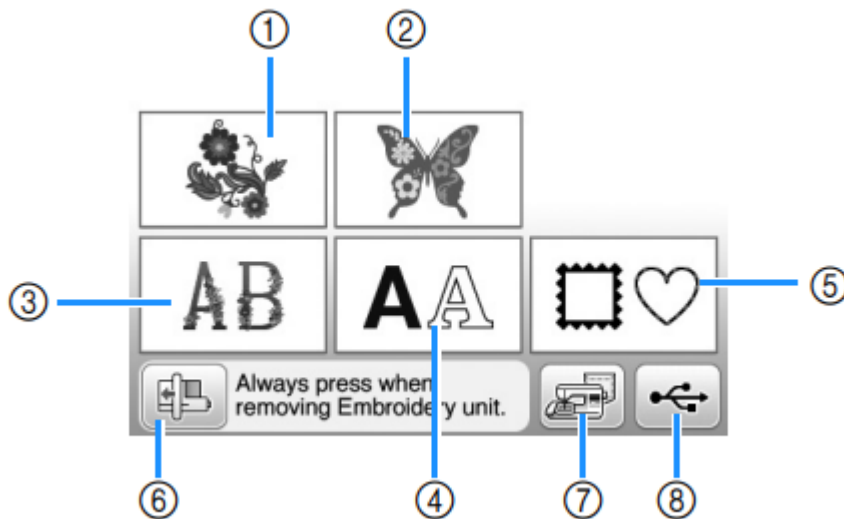
- See “Cleaning the race” in the “Appendix” section for how to remove the bobbin case.

Embroidering

EMBROIDERY

Selecting Patterns

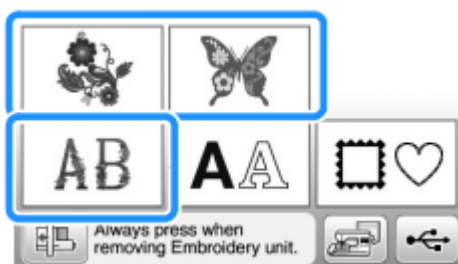
Prepare the machine for embroidery according to the instructions on “STARTING TO EMBROIDER” of “Basic operations”.



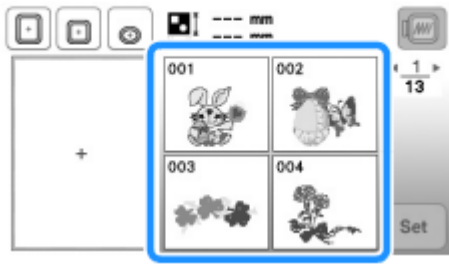
1. Embroidery patterns
2. Brother “Exclusives”
3. Floral alphabet patterns
4. Character patterns
5. Frame patterns
6. Press this key to position the embroidery unit for storage.
7. Patterns saved in the machine’s memory (page E-32)
8. Patterns saved in USB flash drive (page E-33)

Selecting embroidery patterns/Brother “Exclusives”/floral alphabet patterns

1. Select the category of the pattern.

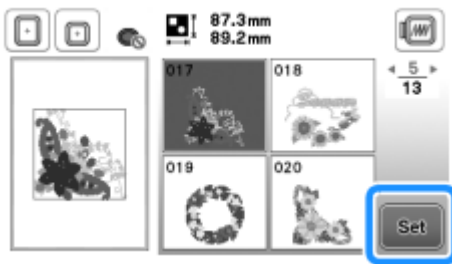


2. Press the key of the desired pattern.



→ The pattern is displayed in the left part of the screen

3. Press 



→ The pattern selected is outlined in red.

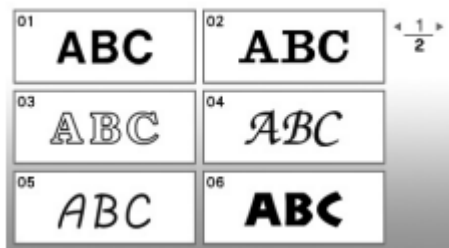
4. Proceed to “Editing Patterns” on page E-5 to edit the pattern.


Selecting character patterns

- Example: Entering “We Fly”.

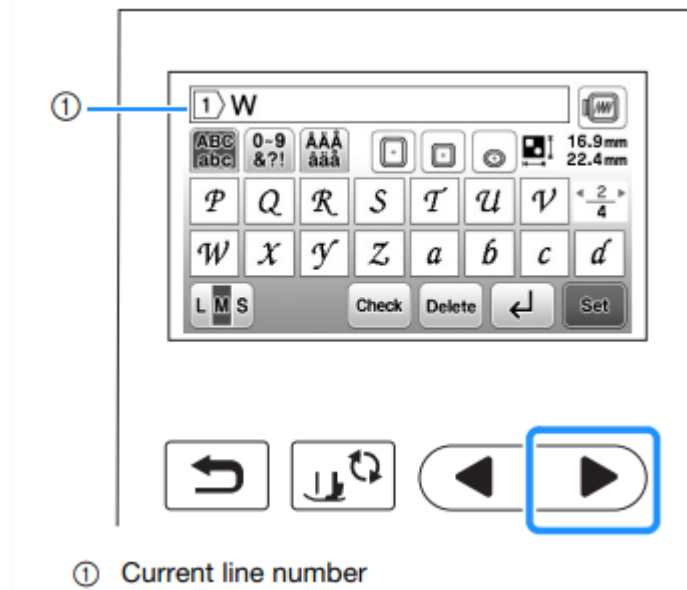
1. Press .


2. Press the key of the font you want to embroider.




3. Press  to display “W” on the screen, and then enter “W”.



- The number located on the left side of the text input box at the top of the screen indicates the current line number.





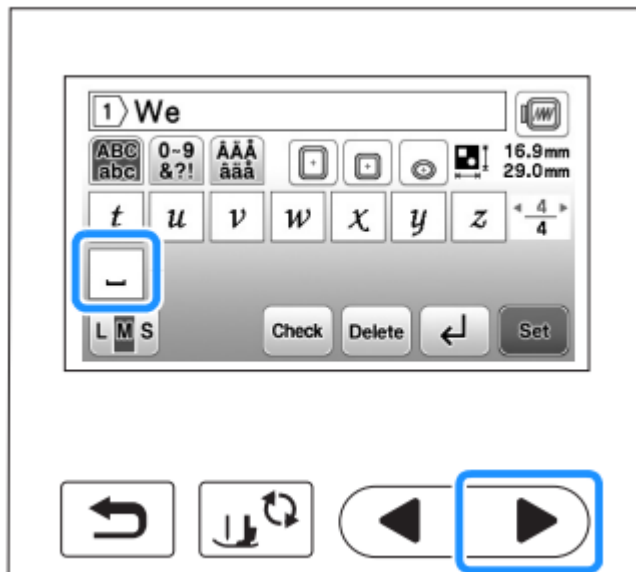
- After selecting a character if you would like to change the character size press . The size changes each time you press the key, from large to medium to small.


4. Press  to display “e” on the screen, and then enter “e”.




- If you make a mistake, press  to erase the mistake.
- If the pattern is too small to see clearly, you can use the  key to check it.
- If you want to add multiple lines, refer to “Entering a line feed” on page E-4.

5. Press , and then press  to enter a space.

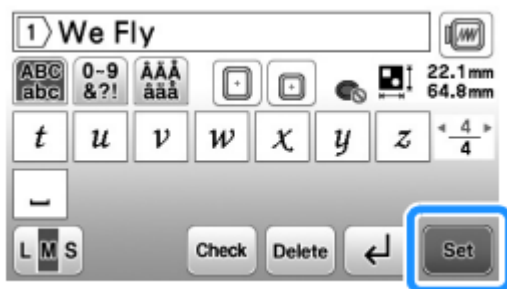


6. Press , and then enter "F".



7. Press  to display "l" and "y", and enter them.


8. Press .



→ The editing screen is displayed.

9. Proceed to “Editing Patterns” on page E-5 to edit the pattern.

- For details on editing characters, refer to “Editing Character Patterns” on page E-9.

- To return to the previous screen to select another pattern, press .

Care and Maintenance

Restrictions on oiling

In order to prevent damaging this machine, it must not be oiled by the user.

This machine was manufactured with the necessary amount of oil applied to ensure correct operation, making periodic oiling unnecessary.

If problems occur, such as difficulty turning the handwheel or an unusual noise, immediately stop using the machine, and contact your authorized Brother dealer or the nearest Brother authorized service center.

Precautions on storing the machine

Do not store the machine in any of the locations described below, otherwise damage to the machine may result, for example, rust caused by condensation.

- Exposed to extremely high temperatures
- Exposed to extremely low temperatures
- Exposed to extreme temperature changes
- Exposed to high humidity or steam
- Near a flame, heater or air conditioner
- Outdoors or exposed to direct sunlight
- Exposed to extremely dusty or oily environments

Note

- In order to extend the life of this machine, periodically turn it on and use it.
- Storing this machine for an extended period of time without using it may reduce its efficiency.

Cleaning the LCD Screen

If the screen is dirty, gently wipe it with a soft, dry cloth. Do not use organic solvents or detergents.

Note Do not wipe the LCD screen with a damp cloth.

Memo Occasionally, condensation may form on the LCD screen or it may become fogged up; however, this is not a malfunction. After a while, the cloudiness will disappear.


Cleaning the machine surface

If the surface of the machine is dirty, lightly soak a cloth in neutral detergent, squeeze it out firmly, and then wipe the surface of the machine. After cleaning it once with a damp cloth, wipe it again with a dry cloth.

CAUTION Unplug the power cord before cleaning the machine, otherwise injuries or an electric shock may occur.

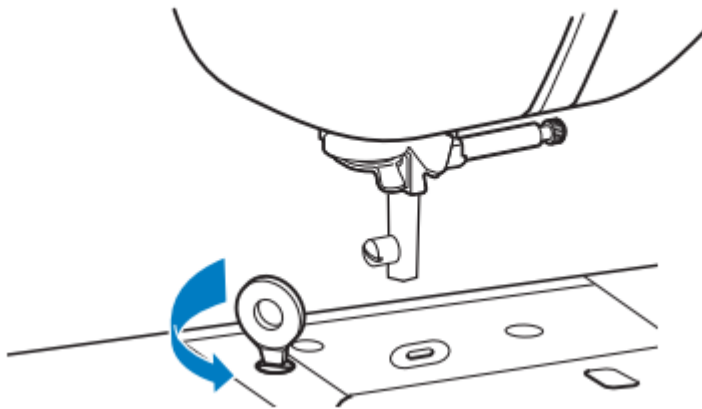
Cleaning the race

Sewing performance will suffer if lint and dust collects in the bobbin case, therefore, it should be cleaned regularly.

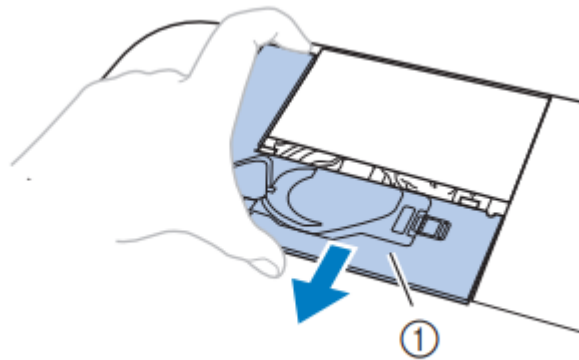
1. Press  (Needle position button) to raise the needle.
2. Turn off the machine.
3. Unplug the power cord from the power supply jack on the right side of the machine.
4. Remove the needle and embroidery foot.
 - For details, refer to “Replacing the needle” in the “Basic operations” section and “Replacing the embroidery foot” on page A-5.
5. Remove the embroidery unit.
6. Remove the needle plate cover.

If there is a screw in the needle plate cover

1. Use the disc-shaped screwdriver to remove the screw in the needle plate cover.



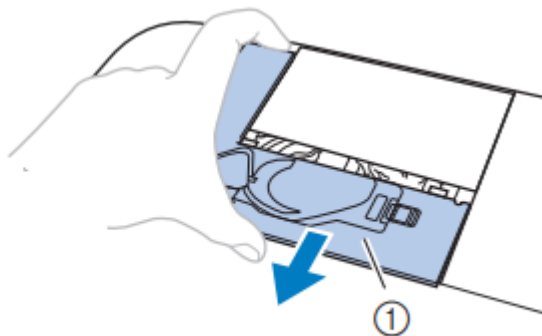
2. Grasp both sides of the needle plate cover, and then slide it toward you.



① Needle plate cover

If there is no screw in the needle plate cover

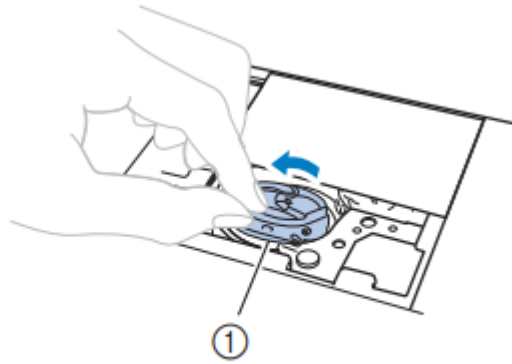
1. Grasp both sides of the needle plate cover, and then slide it toward you.



① Needle plate cover

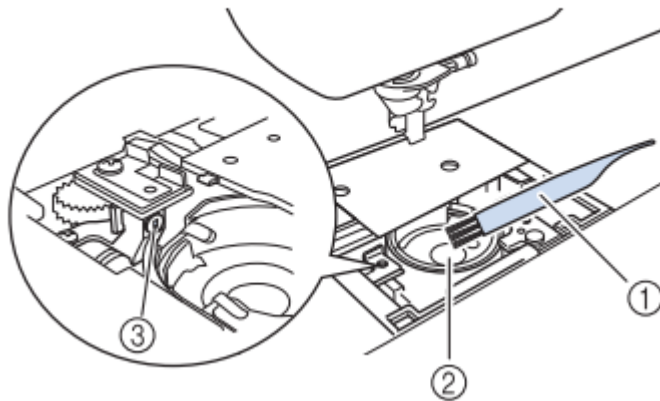
7. Remove the bobbin case.

Grasp the bobbin case, and then pull it out.



① Bobbin case

8. Use the cleaning brush or a vacuum cleaner to remove any lint and dust from the race and bobbin thread sensor and the surrounding area.



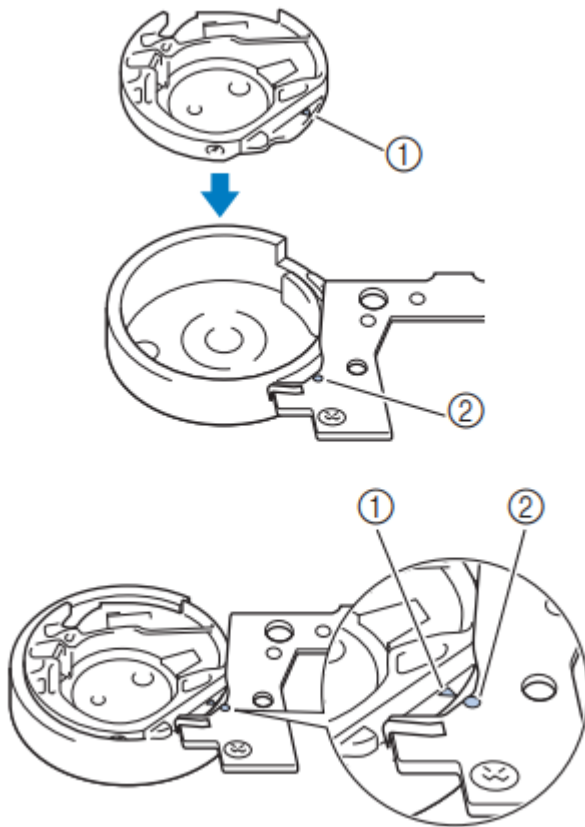
1. Cleaning brush

2. Race

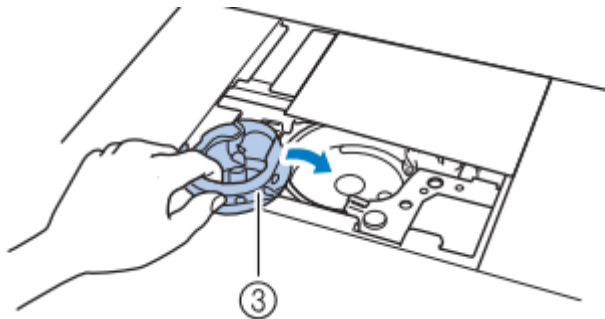
3. Bobbin thread sensor

- Do not apply oil to the bobbin case.

9. Insert the bobbin case so that the ▲ mark on the bobbin case aligns with the ● mark on the machine.



• Align the ▲ and ● marks.



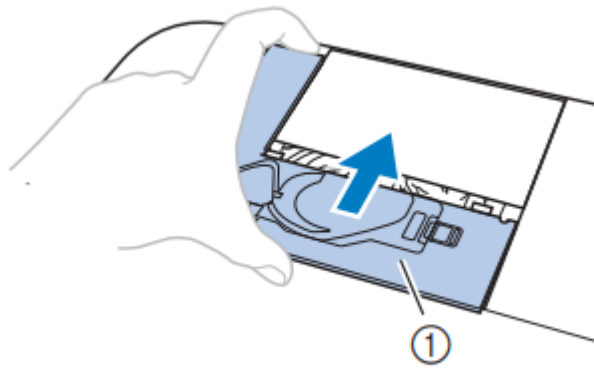
1. ▲ mark

2. ● mark

3. Bobbin case

• Make sure that the indicated points are aligned before installing the bobbin case.


10. Insert the tabs on the needle plate cover into the needle plate, and then slide the cover back on



① Needle plate cover

About the maintenance message



Once this message appears, it is recommended to take your machine to an authorized Brother dealer or nearest Brother authorized service center for a regular maintenance check. Although this message will disappear and the machine will continue to function once you press , the message will display several more times until the appropriate maintenance is performed. Please take the time to arrange the maintenance your machine requires once this message appears. Such steps will help to ensure you receive continued, uninterrupted hours of machine operation for the future.

Touch panel is malfunctioning

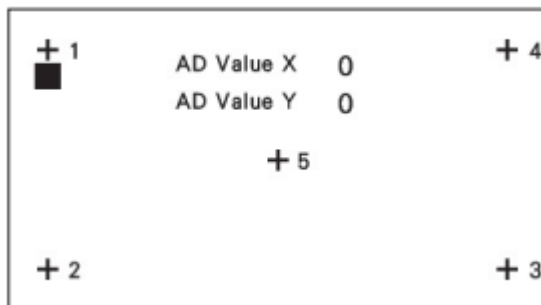
If the screen does not respond correctly when you touch a key (the machine does not perform the operation or performs a different operation), follow the steps below to make the proper adjustments.

1. Holding your finger on the screen, turn the main power switch to OFF and back to ON.



→ The touch panel adjustment screen is displayed.

2. Lightly touch the center of each +, in order from 1 to 5.




3. Turn the main power to OFF, then turn it back to ON.

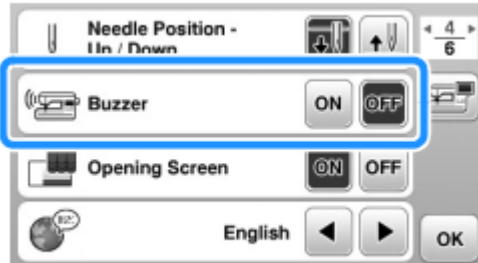
Operation beep

Each time a key is pressed you will hear one beep. If an incorrect operation is performed you will hear two or four beeps.



- **If a key is pressed (correct operation)**
 - One beep sounds.
- **If an incorrect operation is performed**
 - Two or four beeps sound.
- **If the machine locks up, for example, because the thread is tangled**
 - The machine beeps for four seconds and the machine automatically stops.
 - Be sure to check for the cause of the error and correct it before continuing to sew.

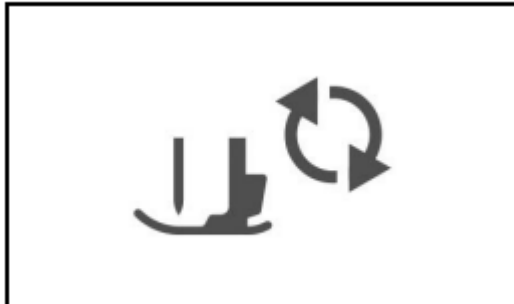
• Canceling the operation beep

1. Press  to display the settings screen.
2. Display page 4.
3. Set “Buzzer” to “OFF.”



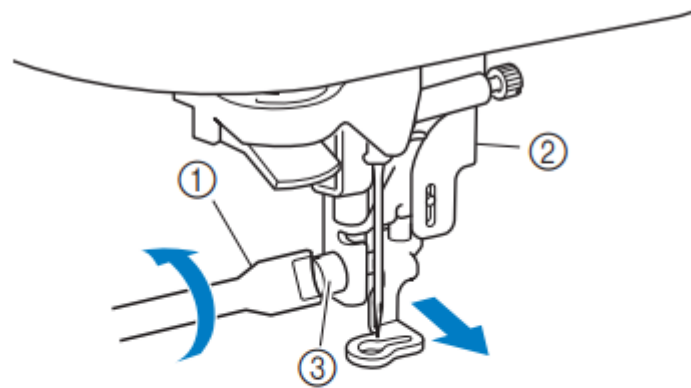
Replacing the embroidery foot

1. Press  (Needle position button) once or twice to raise the needle.
2. Press .
→ The screen changes, and all keys and operation buttons are locked (except).



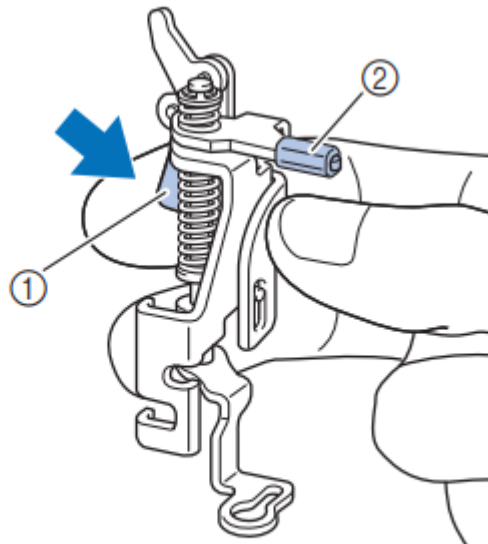
3. Raise the presser foot lever.

4. Use the included screwdriver to loosen the embroidery foot screw, and then remove the embroidery foot.



- ① Screwdriver
- ② Embroidery foot
- ③ Embroidery foot screw

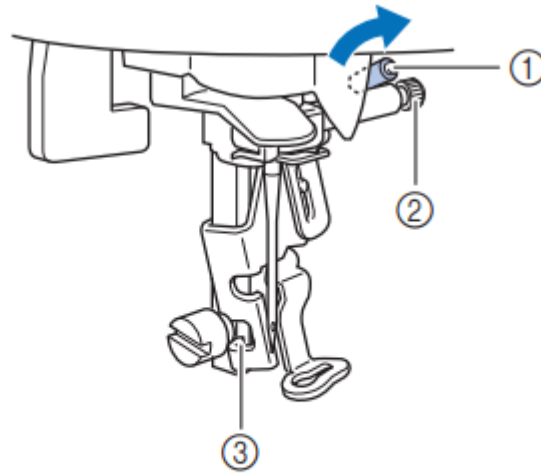
5. Hold the embroidery foot with your right hand, as shown. Hold the embroidery foot with your index finger wrapped around the lever at the back of the foot.




- ① Lever
- ② Embroidery foot bar

6. While pressing in the lever with your finger fit the embroidery foot bar over the needle clamp screw and then fit the presser foot holder screw into the presser foot mounting

notch to attach the embroidery foot to the presser foot bar.



- ① Embroidery foot bar
- ② Needle clamp screw
- ③ Mounting notch

7. Secure the embroidery foot with the presser foot holder screw.
Set the embroidery foot perpendicular.
8. Presser foot holder screw hSlowly lower the presser foot lever.
9. Raise the presser foot lever to check that the embroidery foot is securely attached.
10. Press  to unlock all keys and buttons.

Troubleshooting

List of symptoms

Getting ready

Symptom	Probable Cause	Remedy	F
Cannot thread the needle.	Needle is not in the correct position.	Press the “Needle position” button to raise the needle.	B-
	Needle is installed incorrectly.	Reinstall the needle correctly.	B-
	Needle is turned, bent or the point is dull.	Replace the needle.	B-
	Upper threading is incorrect.	Check the steps for threading the machine and rethread the machine.	B-
	The needle threader hook is bent and does not pass through the eye of the needle.	Contact your authorized dealer or the nearest Brother authorized service center.	-
	The needle threader lever cannot be moved or returned to its original position.	Contact your authorized dealer or the nearest Brother authorized service center.	-
Bobbin thread does not wind neatly on the bobbin.	The thread is not passed through the bobbin winding thread guide correctly.	Correctly pass the thread through the bobbin winding thread guide.	B-
	The thread that was pulled out was not wound onto the bobbin correctly.	Wind the thread that was pulled off around the bobbin 5 or 6 times clockwise.	B-
	The empty bobbin was not set on the pin properly.	Set the empty bobbin on the pin and slowly turn the bobbin until you hear it click in place.	B-



While winding the bobbin, the bobbin thread was wound below the bobbin winder seat.	You have not wound the bobbin thread properly. While initially winding thread on the bobbin the bobbin thread is not properly inserted into the guides.	After removing the thread wound below the bobbin winder seat, wind the bobbin correctly. Follow the drawn images on the top of the machine for guidance when threading the machine for bobbin winding.	B-
The bobbin thread cannot be pulled up.	Bobbin is set incorrectly.	Reset the bobbin correctly.	B-
Nothing appears in the LCD.	Main power switch is not turned on.	Turn the main power to ON.	B-
	The plug of the power cord is not inserted into an electrical outlet.	Insert the plug of the power cord into an electrical outlet.	B-
The LCD screen is fogged up.	Condensation has formed on the LCD screen.	After a while, the cloudiness will disappear.	-
The operation keys do not respond.	A glove is worn when the keys are pressed. The keys are pressed with a fingernail. A non-electrostatic touch pen is being used.	Directly touch the operation keys with your finger. When using a commercially available touch pen, make sure that it is compatible with capacitive sensing.	B-
The operation keys do not respond, or the sensitivity is too strong.	The sensitivity of the operation keys is not set for the user.	Adjust the sensitivity of the operation keys.	B-
The sewing light does not come on.	The sewing light is damaged.	Contact your authorized dealer or the nearest Brother authorized service center.	-

	"Light" is set to "OFF" in the settings screen.	Change the setting to "ON".	B-
Embroidery unit does not operate.	Embroidery unit is not attached correctly.	Reattach the embroidery unit correctly.	B-
	Embroidery frame was attached before the unit was initialized.	Remove the embroidery frame, and then perform the initialization process correctly.	B-

While embroidering



Symptom	Probable Cause	Remedy	
Machine does not operate.	"Start/Stop" button was not pushed.	Press the "Start/Stop" button.	B-
	The bobbin winder shaft is pushed to the right.	Move the bobbin winder shaft to the left.	B-
	There is no pattern selected.	Select a pattern.	B-
	Presser foot is not lowered.	Lower the presser foot.	B-
Needle breaks.	Needle is installed incorrectly.	Reinstall the needle correctly.	B-
	Needle clamp screw is not tightened.	Tighten the needle clamp screw.	B-
	Needle is turned or bent.	Replace the needle.	B-
	Using improper needle or thread for the selected fabric.	Check the information about the needle and thread to be used.	B-
	Upper thread tension is too tight.	Adjust the thread tension.	E-
	Spool cap is set incorrectly.	Check the method for attaching the spool cap, then reattach the spool cap.	B-
	There are scratches around the opening in the needle plate.	Replace the needle plate, or consult your authorized Brother dealer.	-
	There are scratches around the opening in the presser foot.	Replace the presser foot, or consult your authorized Brother dealer.	A-
	There are scratches on the bobbin case.	Replace the bobbin case, or consult your authorized Brother dealer.	A-



	Needle is defective.	Replace the needle.	B-
	A bobbin designed specifically for this machine is not used.	Incorrect bobbins will not work properly. Only use a bobbin designed specifically for this machine.	B-
	Upper threading is incorrect.	Check the steps for threading the machine and rethread the machine.	B-
	Bobbin is set incorrectly.	Reset the bobbin correctly.	B-
	Embroidery foot is attached incorrectly.	Attach the embroidery foot correctly.	A-
Needle breaks.	Stabilizer is not attached to fabric being embroidered.	Attach stabilizer.	B-
	Bobbin thread is incorrectly wound.	Use a correctly wound bobbin.	B-
Upper thread breaks.	Machine is not threaded correctly (used the wrong spool cap, spool cap is loose, the thread did not catch the needle bar threader, etc.).	Rethread the machine correctly.	B-
	Knotted or tangled thread is being used.	Remove any knots or tangles.	-
	Upper thread tension is too strong.	Adjust the thread tension.	E-
	Thread is tangled.	Use scissors, etc., to cut the tangled thread and remove it from the race, etc.	A-
	Needle is turned, bent or the point is dull.	Replace the needle.	B-

	Needle is installed incorrectly.	Reinstall the needle correctly.	B-
	There are scratches near the hole in the embroidery foot.	Replace the embroidery foot, or consult your authorized Brother dealer.	A-
	There are scratches on the bobbin case.	Replace the bobbin case, or consult your authorized Brother dealer.	A-
	Using improper needle or thread for the selected fabric.	Check the information about the needle and thread to be used.	B-
	While embroidering, the thread became knotted or tangled.	Rethread upper and lower thread.	B-
	A bobbin designed specifically for this machine is not used.	Incorrect bobbins will not work properly. Only use a bobbin designed specifically for this machine.	B-
The thread is tangled on the wrong side of the fabric.	Upper threading is incorrect.	Check the steps for threading the machine and rethread the machine. Be sure that the embroidery foot is in the raised position when threading the machine so that the upper thread sets properly in the upper tension.	B-
	Using improper needle or thread for the selected fabric.	Check the information about the needle and thread to be used.	B-
The upper thread is too tight.	The bobbin thread is incorrectly installed.	Correctly install the bobbin thread.	B-
Bobbin thread breaks.	Bobbin is set incorrectly.	Reset the bobbin correctly.	B-
	Bobbin thread is incorrectly wound.	Use a correctly wound bobbin.	B-



	There are scratches on the bobbin or it doesn't rotate properly.	Replace the bobbin.	B-
	Thread is tangled.	Use scissors, etc. to cut the tangled thread and remove it from the race, etc.	A-
	A bobbin designed specifically for this machine is not used.	Incorrect bobbins will not work properly. Only use a bobbin designed specifically for this machine.	B-
Fabric puckers.	There is a mistake in the upper or bobbin threading.	Check the steps for threading the machine and rethread it correctly.	B-
	Spool cap is set incorrectly.	Check the method for attaching the spool cap, then reattach the spool cap.	B-
	Needle is turned, bent or the point is dull.	Replace the needle.	B-
Skipped stitches	Machine is threaded incorrectly.	Check the steps for threading the machine and rethread it correctly.	B-
	Needle is turned, bent or the point is dull.	Replace the needle.	B-
	Needle is installed incorrectly.	Reinstall the needle correctly.	B-
	The needle is worn/damaged.	Replace the needle.	B-
	Dust or lint has collected under the needle plate.	Remove the dust or lint with the brush.	A-
No stitching	Needle is turned, bent or the point is dull.	Replace the needle.	B-

	Bobbin is set incorrectly.	Reset the bobbin correctly.	B-
	Upper threading is incorrect.	Check the steps for threading the machine and rethread the machine.	B-
High-pitched sound while sewing	Pieces of thread are caught in the race.	Clean the race.	A-
	Upper threading is incorrect.	Check the steps for threading the machine and rethread the machine.	B-
	A bobbin designed specifically for this machine is not used.	Incorrect bobbins will not work properly. Only use a bobbin designed specifically for this machine.	B-
	There are needle holes or friction scratches in the bobbin case.	Replace the bobbin case, or consult your authorized Brother dealer.	A-
The needle contacts the needle plate.	The needle clamp screw is loose.	Firmly tighten the needle clamp screw. If the needle is bent or blunt, replace it with a new one.	B-
	Needle is turned, bent or the point is dull.	Replace the needle.	B-
The handwheel feels sluggish when it is turned.	Thread is tangled in the bobbin case.	Remove the tangled thread from the bobbin case. Re-install the bobbin case so it is correctly positioned.	A-

After embroidering



Symptom	Probable Cause	Remedy	F
Thread tension is incorrect.	Upper threading is incorrect.	Check the steps for threading the machine and rethread the machine.	B-
	Bobbin is set incorrectly.	Reset the bobbin.	B-
	Using improper needle or thread for the selected fabric.	Check the information about the needle and thread to be used.	B-
	Thread tension is set incorrectly.	Adjust the thread tension.	E-
	Bobbin thread is incorrectly wound.	Use a correctly wound bobbin.	B-
	Needle is turned, bent or the point is dull.	Replace the needle.	B-
	A bobbin designed specifically for this machine is not used.	Incorrect bobbins will not work properly. Only use a bobbin designed specifically for this machine.	B-
Embroidery pattern does not sew out correctly.	Thread is twisted.	Use scissors, etc., to cut the twisted thread and remove it from the bobbin case, etc.	-
	Thread tension is set incorrectly.	Adjust the thread tension.	E-
	Fabric was not inserted into the frame correctly (fabric was loose, etc.).	If the fabric is not taut in the frame, the pattern may turn out poorly or there may be shrinkage of the pattern. Set the fabric into the frame correctly.	B-
	Stabilizing material was not attached.	Always use stabilizing material, especially with stretch fabrics, lightweight fabrics, fabrics with a coarse weave, or fabrics that often cause pattern shrinkage. See your	B-



		authorized Brother dealer for the proper stabilizer.	
	There was an object placed near the machine, and the carriage or embroidery frame hit the object during sewing.	If the frame bumps something during sewing, the pattern will turn out poorly. Do not place anything in the area where the frame may bump it during sewing.	B-
Embroidery pattern does not sew out correctly.	Fabric outside the frame edges interferes with the sewing arm, so the embroidery unit cannot move.	Reinsert the fabric in the embroidery frame so that the excess fabric is away from the sewing arm, and rotate the pattern 180 degrees.	B-
	Fabric is too heavy, so the embroidery unit cannot move freely.	Place a large thick book or similar object under the arm head to lightly lift the heavy side and keep it level.	—
	Fabric is hanging off the table.	If the fabric is hanging off the table during embroidery, the embroidery unit will not move freely. Place the fabric so that it does not hang off the table or hold the fabric to keep it from dragging.	B-
	Fabric is snagged or caught on something.	Stop the machine and place the fabric so that it does not get caught or snagged.	-
	Embroidery frame was removed during sewing (for example, to reset the bobbin). The embroidery foot was bumped or moved while removing or attaching the embroidery frame, or the embroidery unit was moved.	If the embroidery foot is bumped or the embroidery unit is moved during sewing, the pattern will not turn out. Be careful when removing or reattaching the embroidery frame during sewing.	B-




	Stabilizer is incorrectly attached, for example, it is smaller than the embroidery frame.	Attach the stabilizer correctly.	B-
Loops appear on the surface of the fabric when embroidering.	The thread tension is incorrectly set.	Adjust the thread tension.	E-
	The combination of the bobbin case and bobbin thread is incorrect.	Change the bobbin case or bobbin thread so that the correct combination is used.	B-



Error messages

When erroneous operations are performed messages and advice on operation will be displayed on the LCD. Follow what is displayed. If you press or do the operation correctly while the error message is displayed, the message disappears.



	Error messages	Cause/solution
1	A malfunction occurred. Turn the machine off, then on again.	This message is displayed if some malfunction occurs. Turn the machine off, then back on again. If this message continues to appear, the machine may be malfunctioning. Please contact your authorized Brother dealer or the nearest Brother authorized service center.
2	Cannot change the configuration of the characters.	This message is displayed when there are too many characters and the curved character configuration is impossible.
3	Cannot change the font since some letters are not included to the selected font.	This message appears when the font of the embroidered character pattern is changed to one that does not include characters used in the pattern.
4	Cannot recognize the data for the selected pattern. The data may be corrupted. Please turn off the power and turn on again.	This message appears when you try to retrieve pattern data that is invalid. Since any of the following may be the cause, check the pattern data. <ul style="list-style-type: none"> • The pattern data is damaged. • The data that you tried to retrieve was created using another manufacturer's data design system. Turn the machine off, then on again to return it to its normal condition.
5	Check and rethread the upper thread.	This message is displayed when the upper thread is broken or not threaded correctly, and the "Start/Stop" button, or the Start button, is pressed.
6	Data volume is too large for this pattern.	This message is displayed when the patterns you are editing take up too much memory, or if you are editing too many patterns for the memory.
7	Lower the presser foot lever.	This message is displayed when a button, such as the "Start/Stop" button, was pressed while the presser foot was raised.

8	Not enough available memory to save.	This message is displayed when the memory is full and a pattern cannot be saved.
9	Not enough available memory to save the pattern. Delete another pattern?	This message is displayed when the memory is full and a pattern cannot be saved.
10	OK to recall and resume previous memory?	<p>This message appears if the machine is turned off while embroidering, then turned on again.</p> <p>Press  to return the machine to the condition (pattern position and number of stitches) when it was turned off. Follow the procedure described in "If the thread breaks during sewing" on page E-24 to align the needle position and embroider the remainder of the pattern.</p>
11	Pattern extends to the outside of embroidery frame.	This message appears when the embroidery character pattern is edited, for example, rotated, so that it no longer fits within the embroidery frame.
12	Pattern extends to the outside of embroidery frame. Add no additional characters.	This message appears when the embroidery character pattern is edited by adding a line feed so that it no longer fits within the embroidery frame.
13	Pattern extends to the outside of embroidery frame. This function cannot be used at this time.	This message appears when the embroidery character pattern is resized or switched between written vertically and horizontally so that it is too large for the embroidery frame.
14	Preventive maintenance is recommended.	This message is displayed when the machine needs to be maintained. (page A-3)
15	Selected pattern field extends to the outside of the embroidery frame.	<p>This message appears when the selected embroidery pattern is larger than the large embroidery frame. Reduce the pattern size, or select a different pattern.</p> <p>This message appears when the selected embroidery pattern is larger than the embroidery frame selected. "Embroidery Frame Identification View" is set to "ON".</p>

16	The bobbin thread is almost empty.	This message is displayed when the bobbin thread is running out. Follow the procedure described in "If the bobbin runs out of thread" on page E-23.
17	The bobbin winder safety device has activated. Is the thread tangled?	This message is displayed when the bobbin is being wound and the motor locks because the thread is tangled, etc.
18	 The carriage of the embroidery unit will move. Keep your hands etc. away from the carriage.	This message appears before embroidery unit moves.
19	The pockets are full. Delete a pattern.	This message is displayed when the memory is full and a pattern must be deleted.
20	 The safety device has been activated. Is the thread tangled? Is the needle bent?	This message is displayed when the motor locks due to a tangled thread or for other reasons related to thread d
21	There is a pattern included that cannot be saved to USB media. Save the pattern in the machine's memory.	Depending on the pattern, it may not be possible to save a pattern to a USB flash drive.
22	This pattern cannot be used.	This message appears when you try to retrieve a pattern that cannot be used with this machine.
23	This USB media cannot be used.	This message is displayed when you try to use incompatible USB media.
24	USB media error	This message is displayed when an error occurs with the USB flash drive.
25	USB media is not loaded. Load USB media.	This message is displayed when you try to recall or save a pattern while no USB flash drive is loaded.
26	F**	If error message "F**" appears in the LCD while the machine is being used, the machine may be malfunctioning. Co

your authorized dealer or the nearest Brother authorized service center.

Warning

This content is compiled from multiple sources and is provided for reference purposes only. It may not be complete or fully applicable to all situations. If you are unable to resolve your issue, please contact the product manufacturer or an authorized service provider for official support.

Document generated by [ManualsFile](#)