

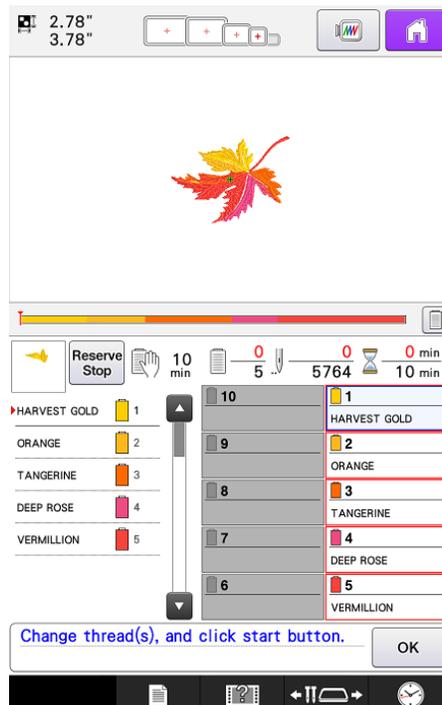
Color Assignment on a Multi-Needle Machine

A big benefit of owning a multi-needle machine is that it will continually stitch out your embroidery designs. The machine will stitch a color section of a design and change needles while trimming thread along the way. No longer do you need to monitor your embroidery design and change out the threads. This is one of the biggest differences in a multi-needle machine and a single-needle home embroidery machine. This also can be one of the biggest challenges for a new user. With the Baby Lock multi-needle machines, there are several options available for color assignment. Let's take a look at these options

Color Memory-

The Baby Lock machines have Color Memory built into them. What does this mean? Each time you stitch out a design and have assigned colors to a specific needle, it will remember that color was previously assigned to that needle. Therefore, it will limit the number of different needles that could potentially need to be re-threaded. This is an amazing feature that will help you save time and get you quickly embroidering. Here is an example of how this works.

A built-in leaf design was selected, edited and brought all the way to embroidery. When the "Embroidery" key was touched a message and screen appears that looks like this:

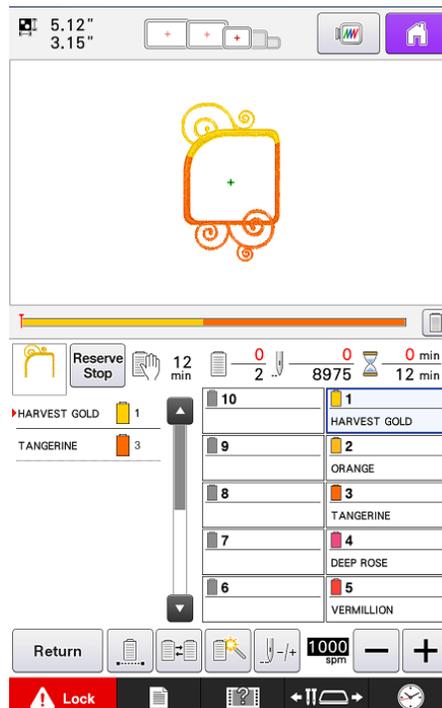


The machine is messaging you to “Change thread(s), and click the start button.” The first time a machine is used, it will place the design color segments on the needles in numeric order. The red boxes around each of these colors are telling you it is a NEW color assignment to that needle. These would be where you would want to place the appropriate color spools of thread and thread/rethread those needles with the new thread color.

As you stitch different designs, you will find different colors assigned to different needles on the bottom right section of the screen. The only colors you are concerned with are the ones that are in your selected design. Sometimes it is easier to look at the thread color sequence display on the left to see which needle is assigned. The number to the right of each color indicate the needle that that section of the design is assigned to.

HARVEST GOLD		1
ORANGE		2
TANGERINE		3
DEEP ROSE		4
VERMILLION		5

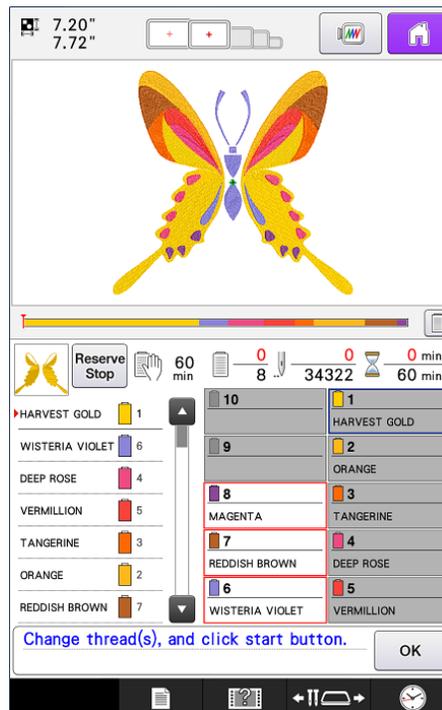
After stitching out the design, what happens when you select the next design? Let's see. The previous design was closed and a new frame design selected.



Because this design has two colors that were also used in the previously stitched design, the machine has automatically assigned those colors to the needles 1 and 3. This is color memory at work!! THE MACHINE IS GOING TO USE THE COLOR MEMORY AND DO IT'S BEST TO FIND THAT COLOR IF IT WAS ASSIGNED TO A NEEDLE FROM A PREVIOUS DESIGN. So, let the machine do its best to put the colors where they need to go. A little later we will tell you of some ways to switch colors assignments around.

Once you have the appropriate color thread on those needles, you are ready to stitch out your design.

What happens if your colors are not all the same? Let's check that out:



The machine has used the color memory and has placed the colors where they need to go. In this case, it could match up most from the previous stitched designs but added three new colors not previously stitched. The red boxes around needle 6, 7 & 8 are indicating that those are newly assigned colors and where those colored threads would need to be placed. Again, it is important to look at the color assignment by each color section of the design in the thread sequence display. This gives you the true indication of which color is assigned to which needle



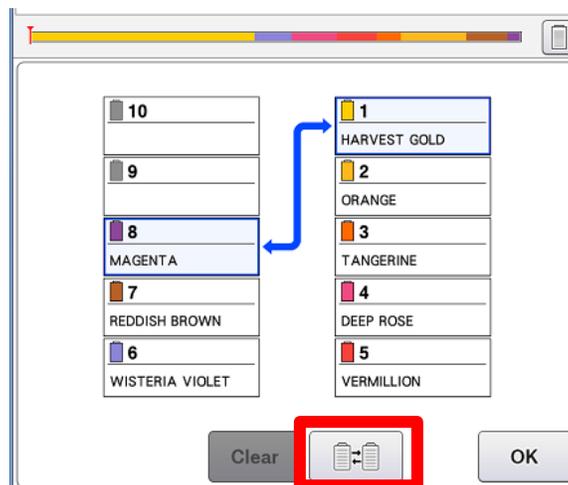
Color Swap-Switch Spool Key

Color Swap allows you to change thread colors on the screen. There are times where the design may call for a specific color, but you have a color thread on the spool stand and different needle that you want to use for that section of the embroidery design. When the thread color on the spool stand is different from the needle position thread color on the screen, the thread colors can easily be switched.

Select the switch spool key at the bottom of the screen

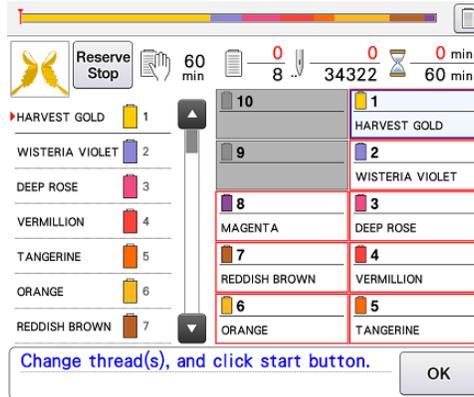
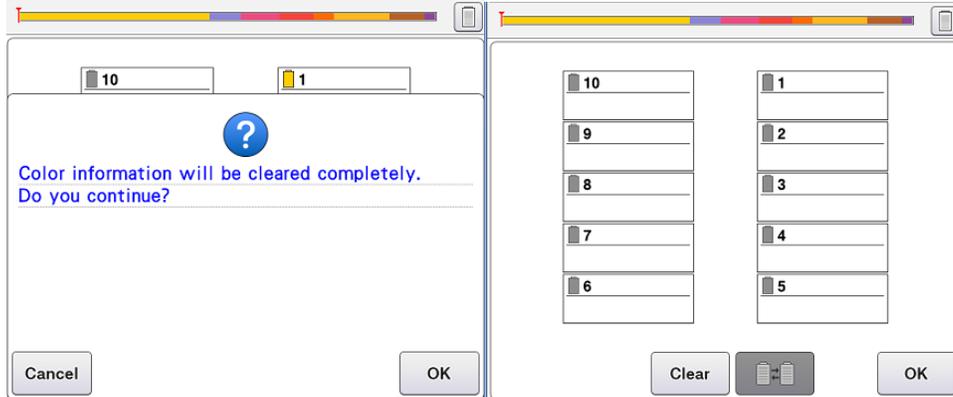


Touch the number of the first needle bar that will be switched. Then touch the number of the second needle bar that will be switched. The two needle numbers will be connected by an arrow.



Select the switch key to switch the two threads and then touch OK.

You also have an option on this page to **CLEAR** out the color memory. If you select the Clear key and then OK, the color memory will be cleared out. Then the design color sequence will be assigned to the needle bars order 1, 2, 3 etc. This is an option available to you at any time.



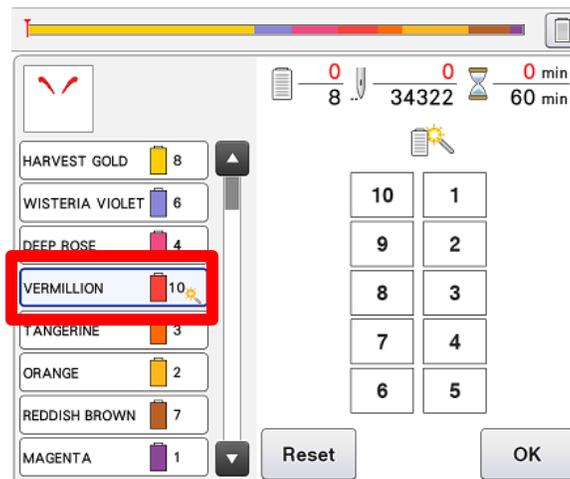
Magic Wand Key

Another tool to help assist you with color assignment is the Magic Wand Key. This feature enables the needle bar setting to be manually specified. This can be changed at the beginning of embroidery, by selecting the specific color in the embroidery sequence or during embroidery. NOTE: A thread color/needle change can't be changed in the middle of an area being sewn. Just simply go back to the beginning of that color section and then apply the new needle assignment.



Select the Magic Wand Key

Access the section of the design that you want to manually select a specific needle. Select the needle on the keypad to the right and that needle number and a magic wand image will appear next to that color in the design sequence.



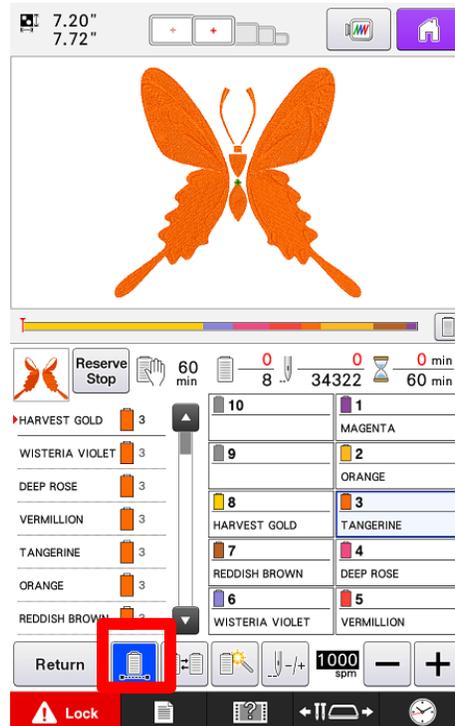
Once a design has been stitched out, **the needle assignment will go back to the previous needle assignment**. So, think of the magic wand like a fairy godmother that has waved a magic wand and changed the color for that color section, but when the clock chimes midnight (aka the embroidery design stitches out) everything goes back to the way it was!

This is a great tool if you discover in the middle of stitching that you meant to assign a color to a different needle. You can do this to correct the needle used for a specific color section without having to completely back out of the design and re-assign colors. This is also a way for you to use the same color thread for different sections of your design. You could assign one color to a needle and use the Magic Wand for the other.

If you find that you want more control over assigning specific colors to needles, see the **Manual Color Sequence** section.

Monochromatic Sewing

A pattern can also be stitched out in one color instead of multi-color by selecting the monochromatic button. On some machines, this key maybe under the Magic Wand selection. Once this is selected, a specific needle can be selected for the color.



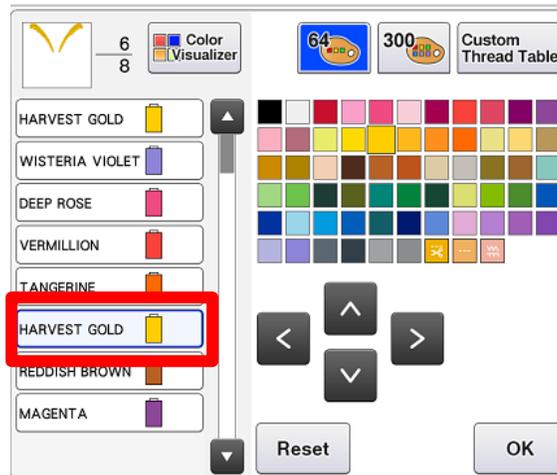
Color Palette

There may be times when stitching out a design where you want to use the same color thread for two different color sections of your design. One way to override this is to use the Magic Wand key mentioned above. Another way is to adjust the colors on the Embroidery Editing page using the Color Palette key.

Select the Color Palette key on the Embroidery Edit page.



Scroll to the color section in the design sequence and then select the same color chip. The machine will now assign both of those section to the same needle when you go to embroidery.



This is also a way if you want to match your design colors to the thread color you have chosen for your design. If you like to see exactly what your design is going to stitch out using the thread colors you have picked, the Color Palette will allow you to see a preview of this on screen.

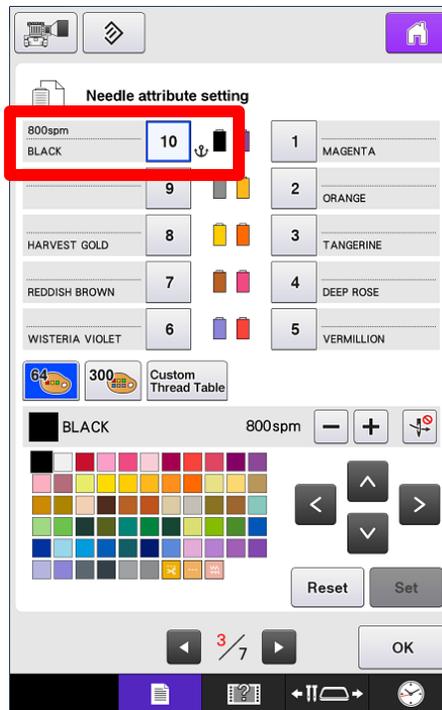
Reserving Needles-Sewing Speed Settings

With color memory, the machine will automatically assign thread colors to the needle bars. However, there is a way to RESERVE a specific needle for use with only ONE color. This is a benefit if for example; the color black is used on a lot of your designs. You could reserve a needle for that specific color. This gives you security to know that black will always be assigned this this needle. You can also adjust the sewing speed of a specific needle when it is reserved. This option may be desired when stitching with metallic or specialty threads.

To reserve a needle, you would select your Settings Key



Advance to the page of settings in your machine for reserving (or anchoring) needles. Refer to your Instruction and Reference Guide for how to reserve needles on your machine.



One down side to reserving needles is that it can limit you from assigning any other colors to this needle. So, depending on the type of embroidery you do, color memory may be sufficient to remember where black was located and assigning the color there. This can be overused at times and cause issues for owners. So, make smart decisions when reserving needles. It is not always necessary!

Manual Color Sequence

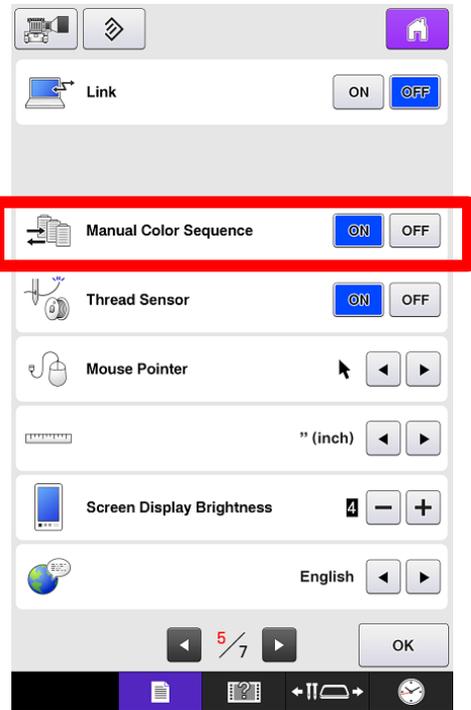
Manual Color Sequence is available on the 10 needle machines. If you own a 6 needle, this option will NOT be available for color assignment.

Manual Color Sequence allows you to manually assign colors to specific needle bars. This function is similar to how you can manually over-ride the color assignment using the Magic Wand, but this time you select the needle for each part of the color sequence AND once you stitch out the design, this color assignment will be retained. This is great if you are stitching multiples of the same design.

To turn on the Manual Color Sequence go to the Settings Page.



Advance to the page of settings in your machine for Manual Color Sequence and turn it ON. Touch OK.



Once Manual Color Sequence is turned on, you will see a ghosted image on the design page.

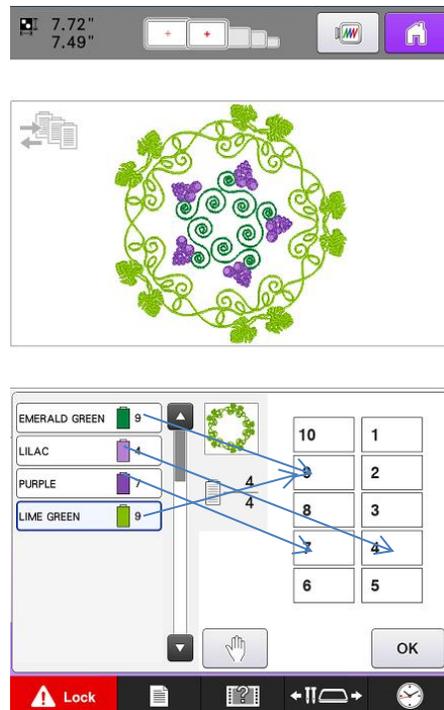


When you are in the Embroidery Settings page you now have a new key for Manual Color Sequence. Also, you no longer have the Switch Spool Key on the embroidery page. With Manual Color Sequence you also no longer have color memory that we have been talking about. You are now **manually** assigning all the colors so you will only see the needles selected for the color assignment on the thread color set-up display.

To assign the colors, you would select the Manual Color Sequence Key on the Embroidery Settings page.



Then you will manually select a needle for each color in the design sequence. If you have two similar colors that you want to pull from the same needle, you can select the same needle. The machine does not care if the color names are the same. You are in control of the colors because the machine no longer is keeping the color memory. If you would forget to manually assign the colors, it assigns them needles 1, 2, 3...in order.



If you save a design to memory, the color assignments will not save as part of the design. The color assignment will be cleared once you close out of the design by going to the home Key.

What method to use?

There are times when one color assigning method may be preferred over another.

Using the machine memory is great while you are learning the machine. Having the machine assist you with the color assignment can make life easier. Remember that you have the switch spool, magic wand and color palette as work arounds with getting the right needle assigned to each color segment. This method works well with Jumbo Hoop designs and Pattern Connection because it will keep that color memory. If you are stitching designs in the same color palette or you have a lot of color changes in your embroidery, the color memory will aid you in keeping colors properly assigned. Some designs that have 10+ color in the color sequence will benefit from this method.

Manual color sequence tends to be a more commercial format for assigning designs. Since commercial customers use .DST file format, those files do not include color information, so manually assigning your colors becomes desired. If someone does a lot of single color embroidery, like monogramming or personalization, Manual Color Sequences makes it easy to just select the color of threads on their spool stand for their project. This feature is not available if using the Linking function with the Palette software.

Some commercial users will assign their colors in software and then reserve the design colors to the needles so they are ensured that the correct colors are being used. This ensures consistency if they are using multiple machines for production style work.

Regardless of the type of embroidery you do; be it commercially or just for fun, the machine gives you options for your color assigning. Picking the one that makes the most sense to the end user will allow for a productive, successful embroidery experience.

A Few Important Notes about Color Assignment-

Your machine is only concerned about which needle is selected for each color in the embroidery sequence. It does not really KNOW what color thread you have on the spool stand! It is not smart enough to realize if it is stitching Hot Pink thread when the color sequence of the design is saying Purple So, if you are happy with the thread color that is on the spool stand for the assigned needle, that is what is important!!! EVERYONE thinks about color assignment, differently so find a method that works best for you!

Have fun and get the most out of your Baby Lock multi-needle!!