# *Creating a Logo*

### Auto Digitizing Method
- Open a New Blank Design.
- Switch to Artwork Canvas.
- Click on Insert Artwork.
- Navigate to the location of the saved file. Select the image BERNINA Earth. jpg. Click on Import. Press Enter.
- Select the Crop tool and drag a box around the earth.
- Adjust if necessary; double click to set the crop.
- Select the Pick tool.
- Make sure Lock Ratio is locked.
- Resize the image to 2.625" in the Property Bar. Press Enter.
- Switch to Embroidery Canvas.
- Select Auto-Digitize in the Auto-Digitize Toolbox.
- Change the number of colors to 4. Press OK.
- Click on the drop-down arrow by the black color chip and choose Omit. Repeat for the white. Click OK.
- Edit as desired. See instructions that follow.
- Save the file as Auto-Digitized.
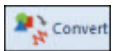


### Convert Vector to Embroidery Method
- Open a New Blank Design.
- Switch to Artwork Canvas.
- Click on Insert Artwork.
- Navigate to the location of the saved file. Select the image BERNINA Earth. eps. Click on Import.
- In the dialog box that opens, select Text for import option.
- Click OK and press Enter.
- Right click on object and select Ungroup.
- Deselect; then select the black border and delete.
- Draw a bounding box around the globe and right click and select Group. Delete the lettering.

*When drawing the circle, you can lock the earth in Object Manager if you wish.*



### Creating the Outline for the Patch
- Select the earth.
- Lock Ratio should be locked.
- Change the size of the earth to 3".
- Press P to center it in the page.
- Select the Vector Ellipse tool.
- Bring your cursor to the center of the earth.
- When you see the word, center, hold the Shift + Ctrl keys and drag to draw a circle around the earth.
- Select the Pick tool.
- Select the circle.
- With Lock Ratio locked, change the dimensions to 3.75". This will be the edge of the path.
- Save the design as Stronger Together 1.

## Convert to Embroidery

- Select the Earth and the circle.
- Click on Convert Artwork to Embroidery.
- Deselect; then right click on the circle, select Lock.
- Select Ctrl + A and change the size of the earth to 2.625".
- Press Enter.
- While the earth is still selected, select Lock.

## Manually Digitize

- Select Closed Object tool in the Digitize Toolbox.
- Right click on Step Fill.
- Leave at Step 1.
- Click on Stitch Angle. Change to 0 degrees. Press OK.
- Digitize around globe with 4 right clicks; press Enter.
- Press Esc.
- Select the fill.
- Select Effects.
    - Change Underlay 1 to Edge Walk.
    - Click OK.
- Unlock Proportional Scaling.
- Change the dimensions of the digitized fill to 2.625".
- Change the X and Y positions to 0 in the Transform Toolbar.
- Press Enter.
- Unlock original water in Color Film by right clicking and selecting Unlock. Reselect; then press Delete.
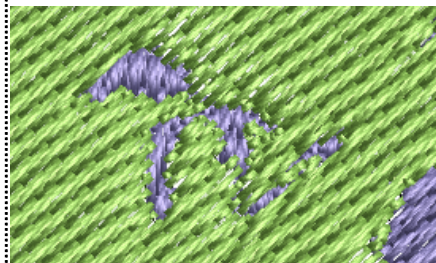
## Editing the Land

- Select the water. Click on Move to Start in Color Film.
- Select the green color chip in Color Film.
- Right click and select Unlock. Click on the land again.
- Right click on Step Fill to open Object Properties.
- Change to Step 17.
- Change Stitch Spacing to .60. Click Apply.
- Select the Stitch Angle tab; change Stitch Angle to 50 degrees. Click OK.
- Deselect, then select the land at the right edge.
- Move this green piece so there is a slight inset into the water. This was done because of pull.

## Editing the Water

- Select the water in Color Film, click on Outlines & Offsets in the Edit Toolbox.
    - Place a check mark by Object Outlines; uncheck Offset.
    - Change the stitch to Backstitch.
    - Choose the matching color at the end of the color list.
    - Click OK.
- Double click on the Backstitch.
- Change the Stitch Thickness to 0.25 mm. Press OK.
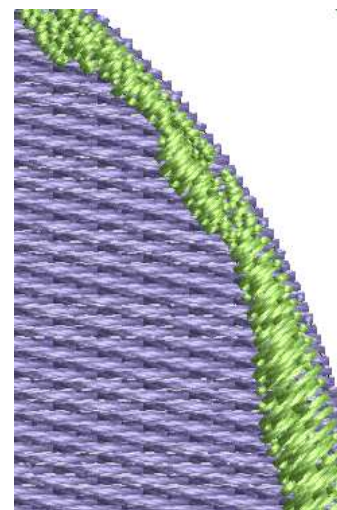- Deselect. Save the design as Stronger Together 2.

*NOTES:*

*With the vector image, the software converted the earth so that the Great Lakes stitched with the water in the background.*



*To have more control over the way an object stitches, digitize a new object to take the automatically digitized object.*

*Step # 17 was chosen because it is a rough vs smooth fill; I wanted to portray texture. Decreased spacing to lighten the overall density of the layers.*



*Changing the Stitch Thickness to 0.25 mm will give the border more emphasis.*

## Editing the Water

- Select the water on the screen. Select Copy; Paste. Change the color.
- Select Paste again; change to another contrast color.
- Move the copies to stitch right before the blue water by clicking and dragging and dropping in Color Film.
- Select the first copy and open Object Properties.
    - ♦ Change the Stitch Spacing to 3.0.
    - ♦ Change the Stitch Length to 3.5 mm. Click Apply.
    - ♦ Change the Stitch Angle to 10 degrees in the Stitch Angle tab. Press Apply.
- Click on Underlay in Effects to remove the underlay.
- Select the second copy in Color Film.
    - ♦ Change the Stitch Angle to 100 degrees. Click Apply.
    - ♦ Change the Stitch Spacing to 3.0 mm.
    - ♦ Change the Stitch Length to 3.5 mm. Click Apply.
- Click on Underlay in Effects to remove the underlay.
- Select the original water.
    - ♦ Change the Stitch Spacing to .55 mm.
    - ♦ Change the Stitch Length to 3.5 mm.
    - ♦ Change the Stitch Angle to 165 degrees.
    - ♦ Click OK. Deselect.

## Digitize the Great Lakes

- Right click on Satin Fill.
- Place a dot in front of Manual spacing. Change to .50 mm. Click OK.
- Press T on the keyboard to switch to Design View.
- Select the Block tool in the Digitize Toolbox.
- Select a different blue than the water.
- Zoom in. Begin with Lake Michigan and digitize from the tip to the top. Press Enter.
- Select the Open Object tool and digitize from the top of Lake Michigan to the left tip of Lake Superior. Press Enter.
- Reselect the Block tool and the Satin Fill and digitize across the rest of the lakes.
- Press Enter.
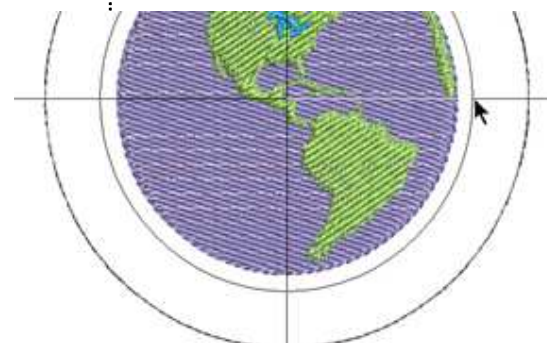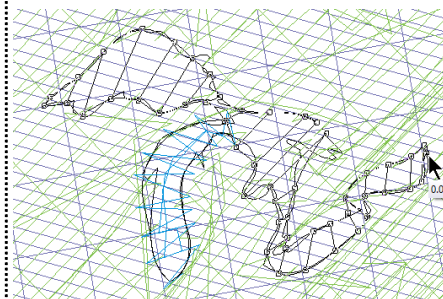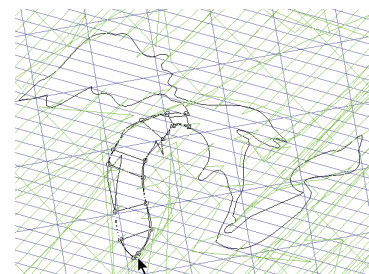- Select the lakes, click on Remove Overlaps.

## Lettering

- Activate Show Hoop.
- Right click on the Lettering icon in the Digitize Toolbox.
    - ♦ Type #BERNINAStrongerTogether.
    - ♦ Select Mplus 1p.
    - ♦ Change the height to .25.
    - ♦ Change width to 95.
    - ♦ Select Circle CCW. Click OK.
- Click at the hoop center; drag to the right about 1/4 beyond the earth; click again; then press Enter.
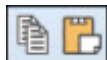
*NOTES:*

*To lighten the density, yet maintain a nice cover, you can substitute three layers of stitching for one layer.*

*The first two layers act as underlay. They are stitched in opposite directions. There is less distortion in the circle shape due to pull.*

- Change the color of the letters to red.
- Open Effects; change the Underlay to center walk. Click OK.
- Double click on the lettering to open Object Properties.
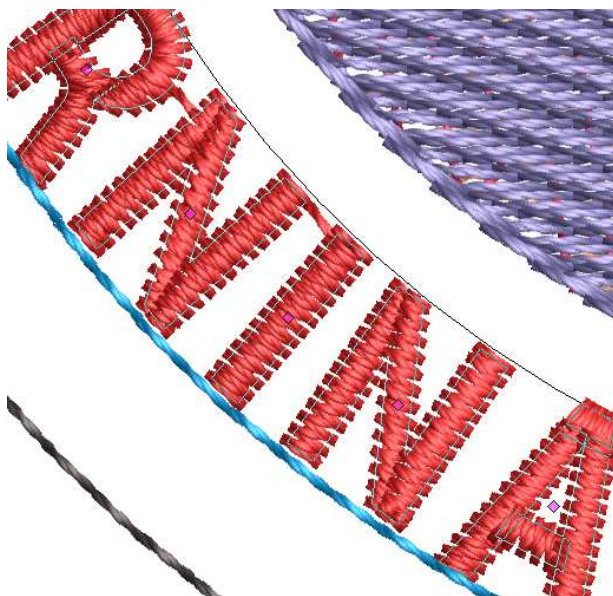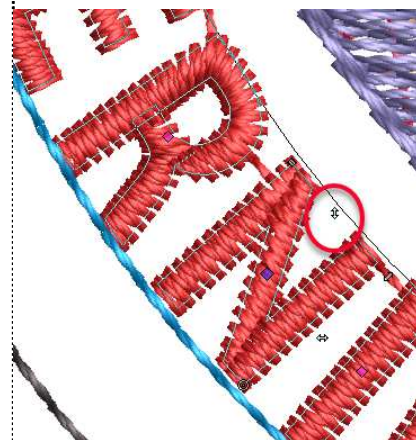  - Change the Width to 85%.
  - Click OK.
- Select the circle in Color Film; right click and select Unlock.
- Select Copy; then Paste.
- Change the color of the copy. Blue was used in the sample.
- Hold the Shift key and resize the circle so it is just underneath the lettering baseline.

**Adjusting Letters for Pull Compensation**

- With the lettering selected, click on the Reshape.
- The N-I-N in BERNINA will be adjusted in height and position on the baseline to adjust for pull.
- Select the N.
- Select the double-pointed arrow at the top of the letter and change the height of the letters slightly to make the letters shorter.
- Hold the Shift key and move the letter so it is slightly above the baseline.
- The goal is to have the letter slightly above the baseline and slightly below the black reference line above the letters.
- Repeat for the I and the other N.
- Press Esc.
- Technically, this could be done for the small h as well as the t's, but they weren't as noticeable as the N-I-N in the test sew out.
- Save the design as Stronger Together 3.
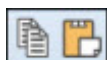
## Creating the Patch

- Select the pasted circle that was used for the lettering baseline.
- Make sure Proportional Lock is locked.
- Change the size of the circle to 3.75".
- Press Enter.
- Select Copy; then Paste.
- Change the % size in the Transform Toolbar to 97%.
- Press Enter.
- Select the original circle.
- Select Copy; then Paste.
- Right click on the Satin Outline.
- Change the width to 3.25 mm.
- Press OK.
- Select Copy; then Paste.
- Change the copy to a Triple Stitch.
- Change the size to 3.625. Press Enter.

## Changing the Stitch Sequence

- Move the original circle (black) to first in the sequence by selecting it and clicking on Move to Start in Color Film. This is the placement line for the fabric.
- Select the two blue outlines and click on Back One Color to move them right after the placement line.
- Select the satin outline and the triple stitch. Change them to the same color as the Great Lakes.
- Select the Great Lakes and click on Forward One Color so that it combines with the patch satin stitch..
- Change the two lighter density fills to the same color as the water.
- Save the design as Stronger Together 4.
- Click on Stitch Player and watch the design stitch out.
- Assign the colors you want to use.
- The design can be stitched out successfully at this point, but tie-ins and tie-offs can be decreased by inserting travel stitches in the water and by changing starts and stops.

*NOTES:*

*The first placement line shows where to place the fabric on the wash-away stabilizer.*

*A double placement line was used next for the cutting line of the fabric.*

*Colors uses in sample:*
- *Border:      Isacord 4103*
- *Water:        Isacord 3620*
- *Land:          Isacord 5613*
- *Lettering:  Isacord 1903*

# Improving the Design
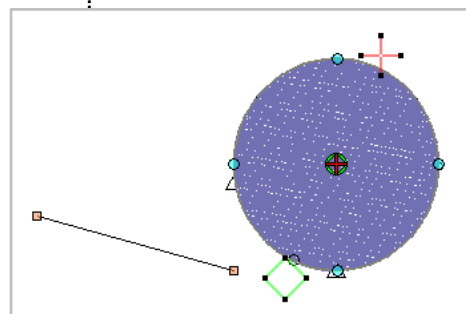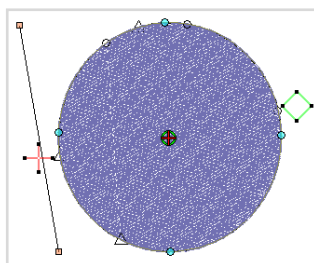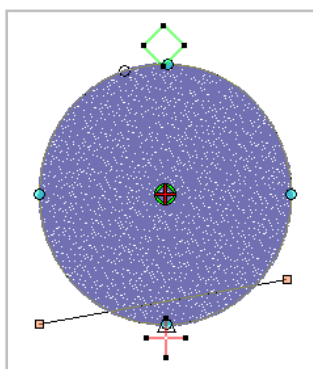
**Tie-Ins & Tie-Offs in Land**



- Switch to Design View by pressing T on the keyboard.
- Deactivate Show Objects in Color Film.
- Right click on the land and select Hide Others.
- Some of these tie-ins and tie-offs cannot be avoided in the land, but improvements can be made by changing the stitch order and by deleting small areas in the Caribbean Islands.
- Zoom in on the Caribbean and delete the tiny islands by selecting them with the Ctrl key and pressing Delete. These are details that don't need to be included.
- Change the stitch order by holding down the Ctrl key and selecting the land from upper left to lower right; then up the right side of the globe; then the Caribbean Islands left to right.
- Select Sequence as Selected in Color Film.
- Right click on a color chip in Color Film; select Unhide All.
- Select Stitch Player and watch the design stitch out.
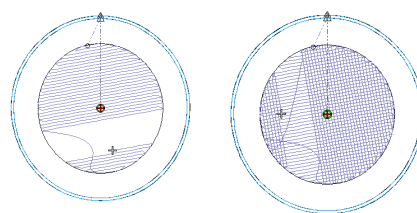
**Changing Starts & Stops**

- Notice the travel runs in the light density fill stitches.
- The design could be improved by changing the starts and stops of these and inserting travel stitches to eliminate jumps.
- Right click on the water color chip in Color Film and select Hide Others.
- Click on Show Objects in Color Film.
- Select the first layer of the water.
- Click on Reshape.
- Move the Start & Stop so they stitch at right angles to the angle of the water.
- Notice that the travel stitches are gone.
- Press the Tab key.
- For the second layer, place the Start & Stop as pictured.
- Press the Tab key.
- For the third layer, place the Start & Stop as pictured below.
- Press Esc.
- Right click on a color chip in Color Film and select Unhide All.

*Your pictures may not look like those below, but you can remove your travel stitches by following the steps.*



*The goal in changing Starts & Stops is to eliminate the travel stitches in the low density fill. By placing the Starts and Stops perpendicular to the stitch angle, the fill stitches smoothly from one edge to the opposite edge.*

## Adding Travel Stitches

- In Options, uncheck Apply Closest Join While Digitizing; click OK.
- Select Design> Background.
- Change the color of the Unsewn Stitches to yellow. Click OK.
- In the Travel Toolbar, select Jump to Start & End.
- Click on Travel Backward.
- The design changes to yellow.

- Select Jump by Color.
- Click Travel Forward two times. This brings you to the start of the water.
- Select Jump by Object.
- Click on Travel Forward two times.
- The first blue layer is complete.
- The white + sign that you see is the current needle position and is where the travel stitch needs to start.
- A travel stitch will be inserted between the + and the start point of the second layer of fill.
- The start point of the second layer of fill is the tie-in circle.
- Select the Open Object tool and digitize a travel stitch between the + sign and the tie-in.
- Press Enter to activate.
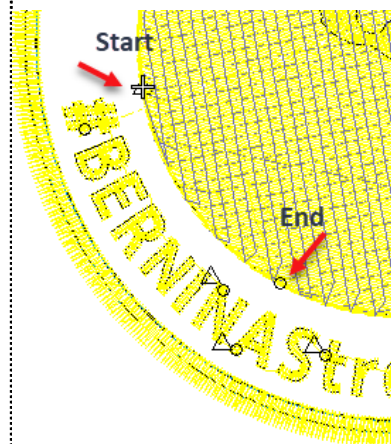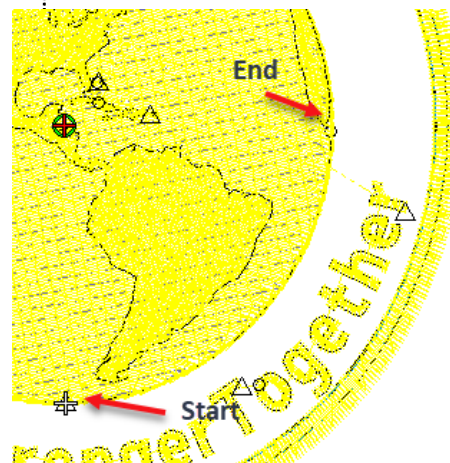
## Second Travel Stitch

- Click on Travel Forward.
- Select the Open Object tool and digitize a travel stitch between the + sign and the tie-in.
- Press Enter to activate.
- Select the backstitch outline.
- Select Reshape.
- Move both the start and stop so they end at the end of the third layer of fill.
- Select Esc> End.
- Select the first object in the stitch order through Color Film.
- Click on Reshape.
- Press Tab to check all starts and stops.
- Edit as needed.
- Select File> Save As and name the file Stronger Together 5.

*Remember to switch Options back to Apply Closest Join.*