# How to Use PNC on a Zing Orbit for Already-Printed Images

By Sandy McCauley May 7, 2019

<u>Sample Situation</u>: You have some stamped images on a sheet of cardstock and you want to cut them out on the Zing Orbit. Before using this method on an actual "one copy only" printout, I recommend practicing first to make sure you have the method down pat AND you will be getting the precision you need. Most likely you won't be able to cut perfectly along the original printed lines because, as you know, even if a cut it off by 0.1mm, you will see a little bit of white. So, either plan to have a larger shadow/contour layer be cut around the shapes (which will provide some margin of error) or plan to add an inline cut. This is why testing first is recommended.

For this tutorial, I have stamped two images onto a partial sheet of cardstock:



#### **Requirements:**

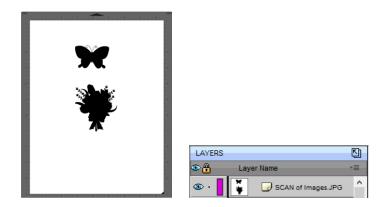
- Stamped sheet
- Scanner
- Copy Paper
- Zing Orbit already calibrated for print and cut
- Sure Cuts A Lot 4 or 5

#### Method:

- Use your scanner to scan the sheet that has the stamped images and save as a JPG or PNG file. Note that unlike some Scan 2 Cut procedures, you cannot use your cell phone or other digital camera to simply take a photo.
- 2) In SCAL, use the **Trace Image** window to import the JPG or PNG file and create a trace line:

Increase <b>Contrast</b> until shape are fully outlined	Slide to the left to better see the resulting trace lines. Also use <b>Zoom</b> tools as needed
🔏 Trace Image	×
Input Choose an image SCAN of Images.JPG (1200 x 1800) Image Settings Mode: Monochrome Contrast (0-255): Resample: x 1.0 (None)	Output Show Nodes Nodes: 1125 Stew Source Image:  C C C C C C C C C C C C C C C C C C
High Pass Filter 1	
Output Settings Smooth (0-100): 75 🚖 Detail (0-100): 20 🜩 Single Line Threshold: 0 🗣	·
☐ Break Apart Outlines	Update Preview The preview is currently showing what will be traced. Click the Update Preview button to see trace result.
Restore Settings Save as SVG	Prompt to continue tracing Cancel OK
Mark Blackout t	o eliminate any Click on <b>Update Preview</b> to see
internal cut lines	effects of settings changes

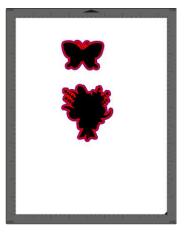
3) Note that while you do not need to mark the option for Add Image Layer, you might choose to, if you think you'll need to edit the trace lines in any way. Once you are satisfied with the trace settings, click on **OK** and then **No** to the **continue tracing** prompt. You'll now have your cut line and, if you chose to import the original scan, then also the print layer. In this tutorial the original scan is not imported:



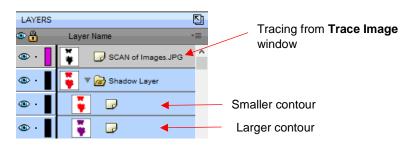
- 4) It's very important not to move the cut lines relative to one another if, for example, you have more than one shape that you're cutting. You can, however, edit the trace lines if some clean-up is needed.
- 5) The next step is to add a contour cut line and also a larger alignment cut line for the PNC overlay. Both can be created at the same time. Select the shapes and go to Effects>Shadow Layer and make the following changes:

	🔏 Shadow Layer		×	
Change to Shadow (Rounded)	Type: Shadow (Rounded)	~		Select Size of contour
	Size:		0.060 in 🔺 🛓	
		Color:	■ ←	<ul> <li>Optional: Click to change color</li> </ul>
	Inset Shadow	Outlin	e only	
	Blackout Shadow	Layer count:	2 😫 🗲	— Change Layer count to 2
	Print+Cut Outline	Layer size variance:	1.0 🜩	
	Fabric Outline	End Color:	•	Optional: Click to change color
Mark <b>Blackout</b> to eliminate any				
internal cut lines		Cancel	ОК ┥	Click <b>OK</b> when done

6) After clicking on **OK**, the black trace shapes now have two shadow layers. (Note that while a blue color was selected as the **End Color**, it ends up purple based on SCAL blending the start and end colors together.):



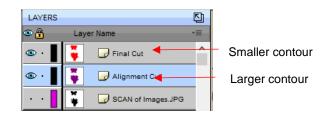
7) You'll also now see two new additional layers on the Layers Panel:



8) With the Shadow Layer selected, go to Object>Ungroup so that they will now be on separate layers. They will also be moved above the original trace line, but since you no longer need that layer you can either delete it or hide it:



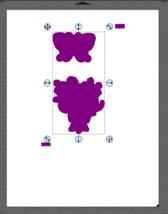
9) Rename the layers by double clicking each one and providing an appropriate name so that you won't mix them up later. The smaller red contour is renamed *Final Cut* and the larger purple one is renamed *Alignment Cut*:



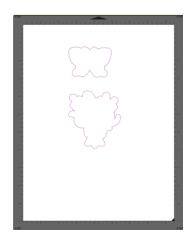
- 10) Hide the *Final Cut* layer. To save on ink, you may wish to make the *Alignment Cut* layer a pale gray or even white for printing. It doesn't matter because you won't be needing the cut shapes, but rather the "holes" that will be cut in the outside sheet. It is recommended that you leave a **Stroke Color** assigned so that you'll know which directly to place your printout on the cutting mat.
- 11) The next steps will depend on whether you are using SCAL4 or SCAL5. If you are using SCAL5, make sure you are on version 5.012 or newer.

## If using SCAL4:

• You need to add two shapes that will control the locations of the registration marks so that they do not move between the two cuts that you will be performing. The shapes need to be located outside the bounding box of your *Alignment Cut* layer. Thus, in this example, two little rectangles are added as shown:



• Change the **Fill** color and **Stroke Color** of those two shapes to white so that they will not print and possibly interfere with the optic eye finding the registration marks later. Again, you can also recolor the *Alignment Shapes* layer to save on ink. In this case, they have been made white and the **Stroke Color** left at purple:



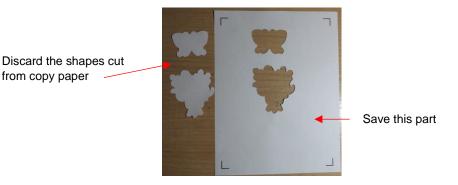
Proceed to Step 12).

### If using SCAL5:

• Go to Cutter>Cutter Settings. Make sure Mark inset from print bounds is selected and click on Save:

🔏 Cutter Settings	×
Settings Units: inch v X Resolution: 1.000 Y Resolution: 1.000 Baud: 57600 v	Registration Marks Mark type: 4 (TL,TR,BL,BR) Mark size: 1.25 cm Mark thickness: 1.00 mm Mark inset from print bounds 1.25 cm 1.25 cm
	Jog Distance Normal: 0.05 Fast: 0.30
Set Defaults Update Firmware	Cancel Save Click on Save.

- 12) Go to the Cut Settings window and enter settings you use for cutting copy paper.
- 13) Click on the Print + Cut button. Print the project (with the registration marks option marked) on copy paper. Place the printout onto the cutting mat, align the blade holder over the lower right registration mark and proceed with the scan and then the cut. As mentioned earlier, the cut shapes can be discarded, leaving you with a template sheet. Remove this template sheet carefully as it will be used again but with your original stamped sheet underneath:



- 14) On the **Layers Panel**, hide the **Alignment Cut** layer and show the **Final Cut** layer. If using SCAL4, the two additional alignment shapes should be left on.
- 15) Place your original stamped sheet on the cutting mat. Align the template sheet over the original sheet making sure the border around the stamped images is as even as possible. Make sure the alignment sheet is also pressed down to the mat or taped down, if needed. Note: if using SCAL4 and there is no paper beneath the two rectangle shape holes, place some paper scraps beneath as they will be cut a second time and you won't want the blade cutting into the mat.



Place original stamped sheet onto the cutting mat



Place template sheet from Step 13) over the original stamped sheet. Shift, as needed, so that there is an even space around the printed images.

- 16) Go to the **Cut Settings** window and enter settings use for cutting whatever material was used for the original stamped images. Adjust the blade exposure on the blade holder to suit the material you'll now be cutting.
- 17) Click on the **Print + Cut** button. Align the blade holder over the lower right registration mark and proceed with the scan and then the cut.

