

Notes for using the Epilog Laser Mini/Helix 8000

Exporting your part

- Use the procedure outlined in the appendix to Project 1 to obtain a nominal part file
- If you plan to do pocketing, be sure to plan out your steps carefully. Think about alignment.

Setting up the document for cutting

- Open CorelDRAW
- Open the part document
- Select all lines that are to be cut
- Using the pen tool (left panel, 3rd from bottom) set cutting line thicknesses to "Hairline Outline"
- Leave shaded regions as they are. These will be pocketed using rastering.

Printing the document

- Click the "print" icon (upper left panel, 4th from left)
- Click "preferences" (to the right of the Printer: Epilog Engraver Win32)
- **Set Resolution to 1200**
- Job Type should be set to Combined
- Raster Settings:
 - o **Set (raster) Speed to 17%**
 - o **Set (raster) Power to 100%**
 - o Engrave Direction should be set to Top-Down
 - o **Set Image Dithering to Stucki**
- Options:
 - o **Check Outo Focus**
 - o Center Engraving should be unchecked
- Piece Size (inches):
 - o **Set Horizontal to equal the document page width**
 - o **Set Vertical to equal the document page height**
- Vector Settings:
 - o **Set Speed to 8%**
 - o **Set Power to 100%**
 - o **Set Freq to 5000 Hz (full frequency)**
 - o Vector Sorting should be checked
 - o Frequency Automatic should be unchecked
- Click OK
- Check that the Issues Tab reads "No Issues" with an empty check mark
 - o If there are issues, click the tab and try to resolve by addressing the above settings
- Make sure the Epilog Laser Mini is turned on (below)
- Click Print

Running the Job on the Epilog Laser Mini/Helix

- **Turn on** the machine by flipping the switch at the lower rear corner of the left side of the box
- Place the workpiece on the honeycomb, with its upper left corner firm against the ruler stops
 - o Be very careful not to knock the laser cutter head while inserting the workpiece
 - o If the workpiece is not blank, and you want the part to print somewhere else:
 - Press X/Y off (upper right of panel, 2nd from right), then press Go to confirm
 - Press Pointer (upper right of panel on Laser) to display the red dot
 - Move the stylus by hand to the desired origin (0,0) for the next run
 - Press Set Home (upper right of panel on Laser, 3rd from right) to set new home
 - Press Reset (upper left of panel, 3rd from left) and stylus shouldn't move
- Turn on the pressurized air by rotating the blue lever on the wall to the right of the machine
- Check that the LED screen on the Laser panel is displaying Job X: Part Name
- With one finger on the Stop button, **press the Go button** (upper left of panel on Laser)
- The laser cutter should first perform all rastering tasks, then perform all cutting tasks. The pressurized air should vent during rastering, but will flow (silently) while cutting
- Periodically check that laser is cutting part in expected regions and that no flame is visible.