Cost $0.35/min. maintenance fee (filter, lens, /laser tube, bed) plus normal Engineering Electronics Shop hourly rate.

Materials (up to 1/4" or 6mm)
➤ Wood, Plywood, pressboard, Acrylic, cardboard, corrugated plastic, silicon gasket (< 1mm)
➤ Other material may be cut, please ask.
➤ As of now, NO PVC or plastics with chlorine base, Lexan, unknown plastics, metals, latex,

Files
➤ Cutting
  o Max size is 23.95" or 608mm by 11.95 "or 303mm, Top right corner being 0,0
  o Need to be in vector format with line thickness of 0.05mm
  o Always cut inner holes first then next outer hole, ending with outside cuts

  o colour of line is cutting order,

1.	Red (255,0,0)	6.	Ivy Green (0,153,51)	11.	Purple (102,0,102)
2.	Blue (0,0,255)	7.	Forest Green (0,102,51)	12.	Violet (153,0,204)
3.	Navy (51,102,153)	8.	Brass (153,153,51)	13.	Magenta (255,0,255)
4.	Cyan (0,255,255)	9.	Tan (153,102,51)	14.	Orange (255,102,0)
5.	Green (0,255,0)	10.	Brown (102,51,0)	15.	Yellow (255,255,0)

➤ Engraving
  o Colour is black and is a raster format

To create a laser file- Solidworks.

1. If one part, then skip to #3
2. Move your multiple parts to an assembly making sure all parts are on the same plane and there is a maximum gap of 1 mm and minimum gap of 0.5mm between parts.
3. Make a drawing from your assembly.
4. Use a custom sheet size, no larger than 608mm x 303mm.
5. Within the drawing file make sure your part is: 1:1 scale, Dimension type – "True".
6. Turn off sketches (view- Sketches) and delete all center marks, labels etc. you don't want etched
7. Select one line then Ctrl A. This will select all lines. Right click over one of the lines and pick the paint brush Icon. Select the red (double check it is the correct colour by comparing the "Define Custom Color" RGB with the above chart)
8. Using Ctrl Left Click select lines that you need to change colours. (leaving inner holes/cuts red then next outer holes blue ..., ending with outside cuts.) Example if your drawing has a hole inside a second hole with an outside cut, the first hole should be red, second hole blue and outside cut Navy.
9. Tools - Options - Document Properties - Line Thickness - Thin = 0.05mm
10. Select one line then Ctrl A. Right Click on the line and pick Line Thickness and set to Thin (0.05mm)
11. File name convection: "NN – M T – GG"
    a. NN - number of times /quantity of file cut.
    b. M – material
    c. T – thickness of material
    d. GG – group designation ie MSE2202 group # or 1050 studio # team #
12. Email, drawing(s), to eporter@eng.uwo.ca. with the message: What this is for, speed code (if warranted), and required date.

To create a laser file- OnShape.

1. As of September 2017, OnShape doesn't allow you to change Drawing attributes, like line thickness and colour. So file needs outside program.
2. In OnShape, Right-click on the Drawing tab
3. Select Export, specify a name for the export file, select the DWG export format.
4. Select "Download" the export file.
5. Open Solidworks, then "File – Open" as DWG, browse to your file – Click "open"
6. Accept defaults in DXF/DWG import dialog box – click "Next"
7. In DXF/DWG Import – Drawing Layer Mapping: check "White Background" – click "Next"
8. In DXF/DWG Import – Document Settings: Data Units – Millimeter, Paper Size – A3-Landscape, Drawing Sheet Scale – 1:1
9. Click "Finish"
10. Goto - To create a laser file- Solidworks. Continue from step 6.