Refresher Guide: Zortrax 3D Printer

This guide should remind you how to go from a SolidWorks model to a 3D-printed part using the Zortrax.
For further details, see the Zortrax User Guide.
Questions? Need help? Ask a mentor or e-mail mw-3dprinter@mit.edu

1. You must have an .stl or obj. file in order to use the Zortrax software:
   a. For STL: In SolidWorks, Save As…> Save as type: STL

2. Start Z-Suite

3. Add model:
   a. Click ⊞ and select file or drag-and-drop.
   b. Copy by selecting object and using CTRL + C.

4. Change view:
   a. Use to rotate the view, to pan, or to select a standard view.
   b. Use mouse wheel to zoom in and out.

5. Choose model placement and orientation:
   a. Select object. Use Tools to Rotate, to Move, and to Scale.
   b. Use (Auto-Arrange) to let the program choose the orientation
   c. Use to split a large object.

6. Slice (generate .zcode file to prepare to send to printer):
   a. Click PRINT. Select the Printing Profile (filament type), Layer Thickness, Speed, Infill, Support Angle, Cooling Speed. (Advanced options include Seam, Surface layers, Offset, and Advanced Infill.) Click Prepare to print!
   b. Hit "Yes" to display .zcode. If desired, add pauses to printing (schedule material swap during print).
   c. Click Save to SD card.

7. Move SD card to printer. On printer, navigate menu to start print:
   a. Turn dial to scroll through options, press dial to select Models.
   b. Select your file. Printing begins.
   c. Platform will heat, while waiting: **Fill out Print Job Summary form.**

8. Stay for beginning of print to watch out for early errors.
   a. Carefully remove filament that leaks onto build platform.
   b. If necessary, cancel, pause, or have a mentor change filament during a print by pressing in the dial for 10 seconds and selecting an option.

9. Clean-up:
   a. Wear safety gloves.
   b. Use scraper to remove part and raft from platform. If necessary, platform can be removed after disconnecting connectors.