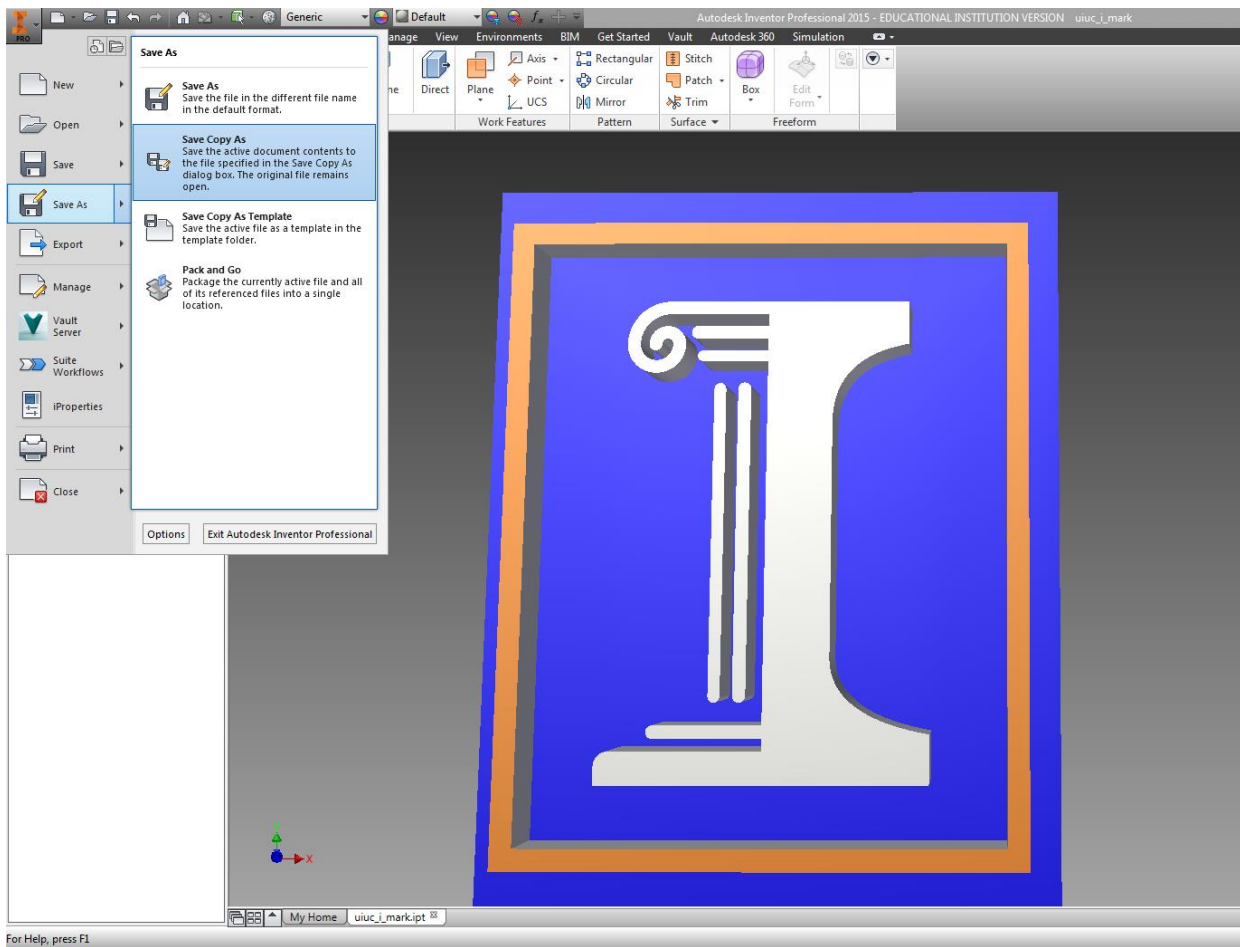


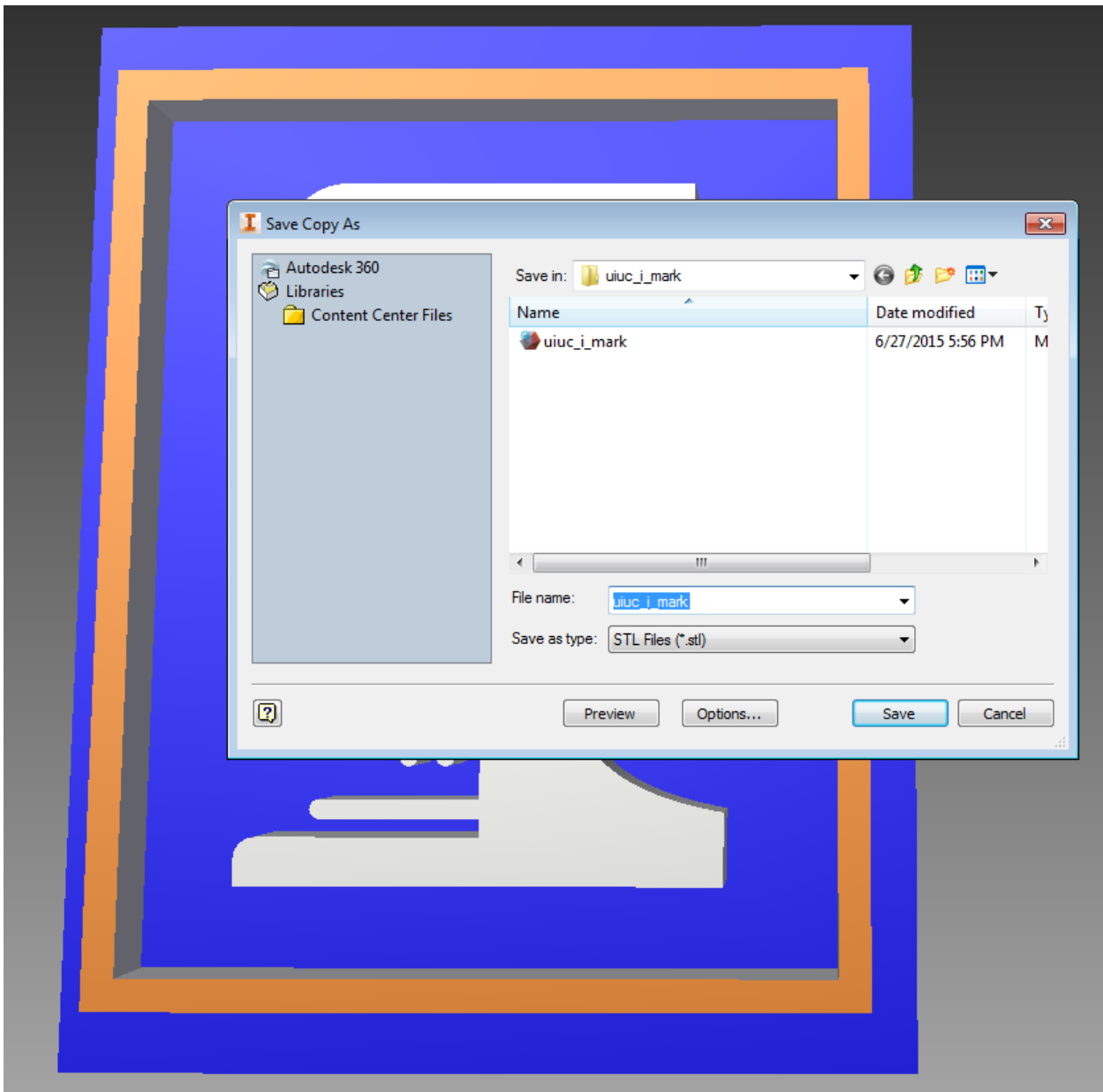
Autodesk Inventor Professional



For Help, press F1

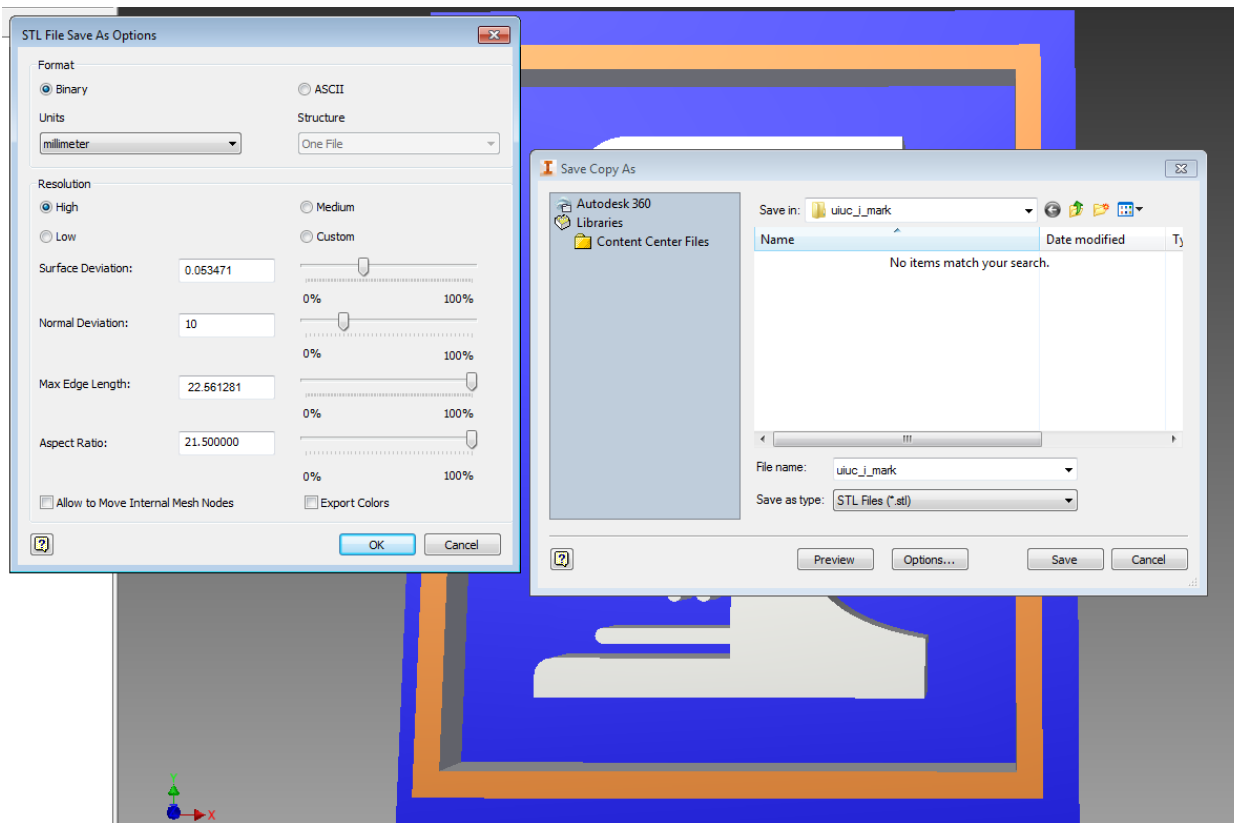


Select the **File** menu as represented by this button: . Select **Save As** and then pick **Save Copy As**.



When the **Save Copy As** dialogue box appears, select the **Save as Type** drop down menu. Select **STL Files (*.STL)** option. Provide a new file name if applicable. You are now ready to generate an STL file with the software's default settings.

It is advisable to inspect these setting before uploading the STL file to our ticket system by selecting the **Options** button.



In the **STL File Save As Options** dialogue box, first inspect the settings under the **Format** group. Select the appropriate **Units**. Select **Binary**.

In the **Resolution** group select **High**. This will typically provide good resolution at an appropriate file size. Note the maximum permissible STL file size in a ticket is 25MB

For **Assemblies**, You will have the option to select the **Structure** of the file(s) you export. You may choose to export the assembly to be printed en-bloc by selecting **One File** or an individual file for each component by selecting **One File Per Part Instance** or an Individual file for each selected component by selecting **One File Per Selection**. Note that you may only submit a single file with each ticket.

STL files are unit-less. Please note the units used in designing this part and make the appropriate selection when creating a Ticket for your part.

Advanced Instructions

- **Surface Deviation** is the maximum deviation between the designed part and the STL representation of the part. This deviation is measured in the native units of our (very oversized!) part, so the maximum absolute deviation in the above file is about 1.1mm. Since an STL file approximates your part's surface geometry using tessellated triangles, there is a tradeoff between accurate representation of curves and the number of triangles used. The larger the number of triangles, the larger the file size.
- **Normal Deviation** controls the maximum angle between the normal vectors of each triangle. The smaller this value, the more dense the tessellation in curved surfaces. Increases both resolution and file size
- **Max Edge Length** and **Aspect Ratio** governs maximum triangle edge length in mm and aspect ratio.

- **Allow to Move Internal Mesh Nodes** allows for the nodes of the tessellation to be moved to provide a smoother surface for parts that have highly twisted features.
- **Export colors** allows color data to be encoded in to each triangle. Please leave this unchecked.
- If you are trying to print an **Assembly** en-bloc, it is especially important ensure your assembly is fully regenerated by clicking the **Rebuild All** button in the manage tab and that the configuration of your assembly is according to your design intent. Interfering components will be printed conjoined into one piece and moving components require the appropriate allowance with other.