

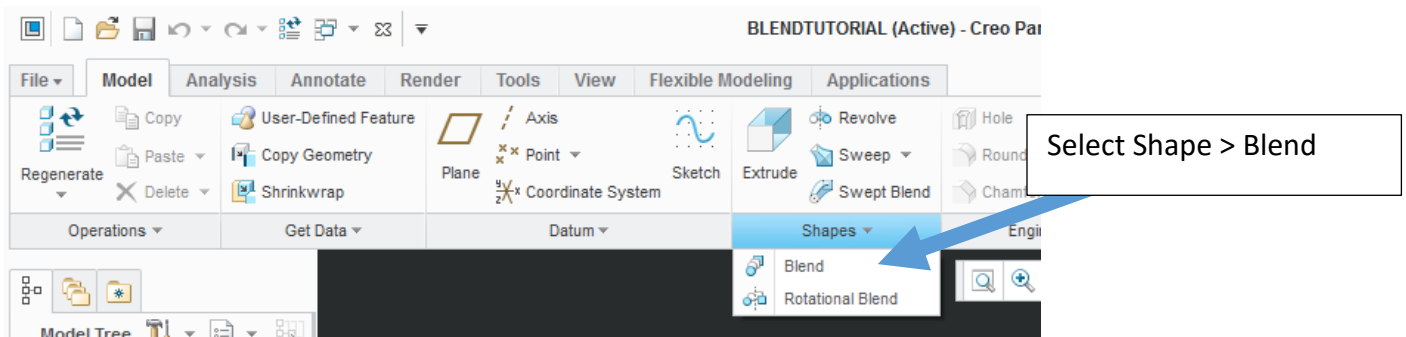
Blend Modeling Tutorial

By: Matthew Jourden

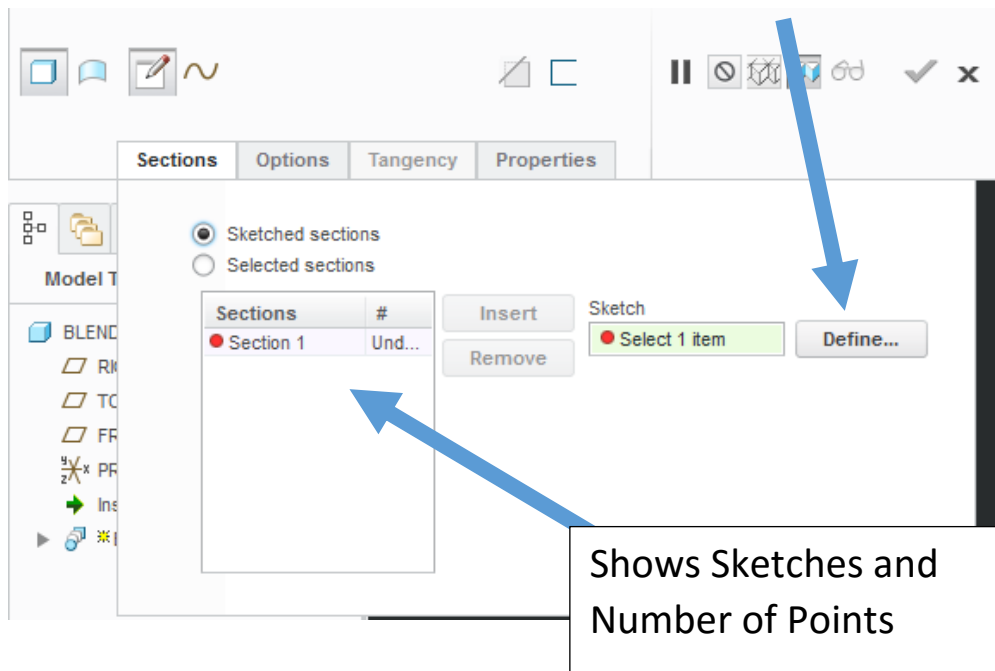
Brighton High School

Blend (Loft): Allows the user to connect multiple profiles that are spaced a linear distance from one another. The Key to a blend is to make sure each profile has the same number of points. If points differ then the software will not be able to render the object.

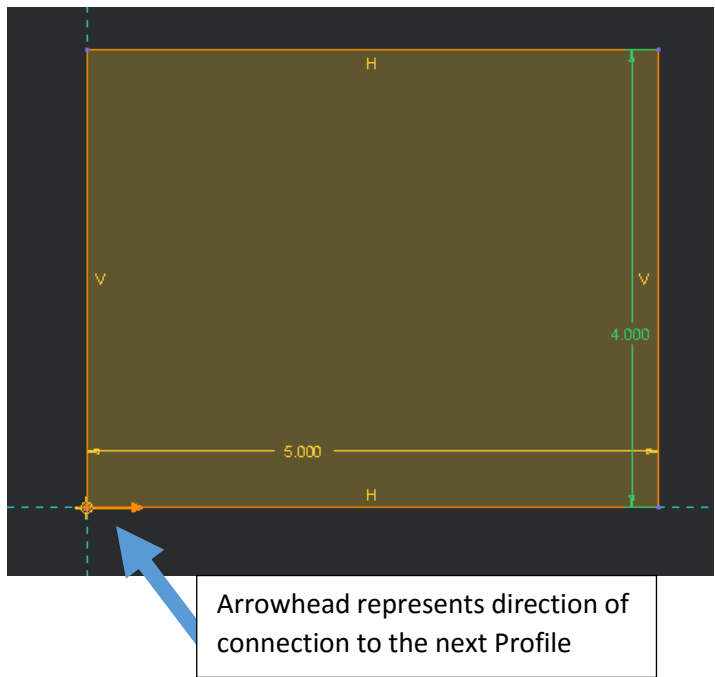
1. Open Creo > Select New > Part > Name part BlendTutorial
2. Select Model Tab > Click the Shapes Category > Select Blend



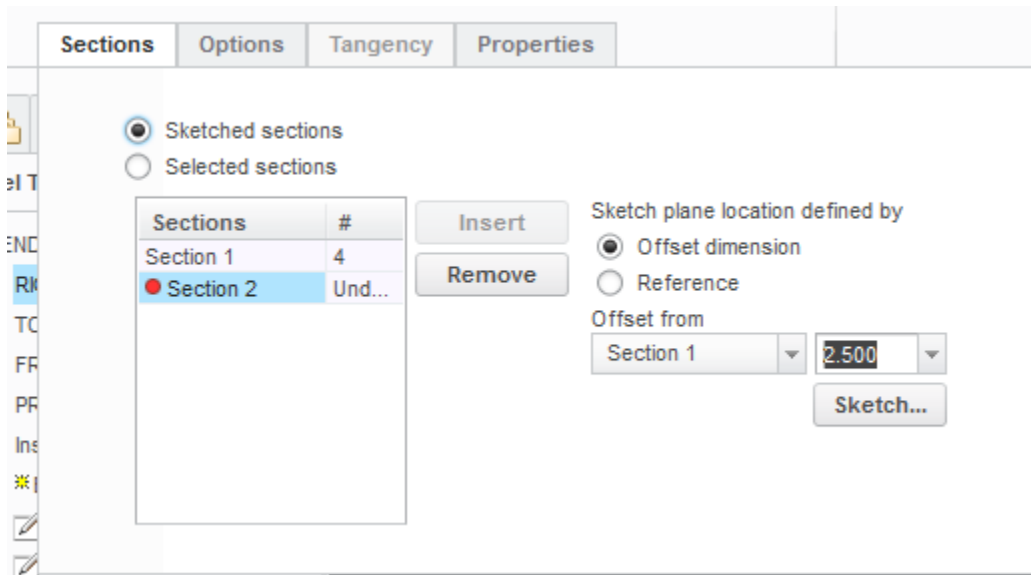
3. Select Sections Tab in the Blend Menu > Select Define



4. Select Top Datum to Sketch on > Click Sketch in the Sketcher Menu > Draw the following Rectangle

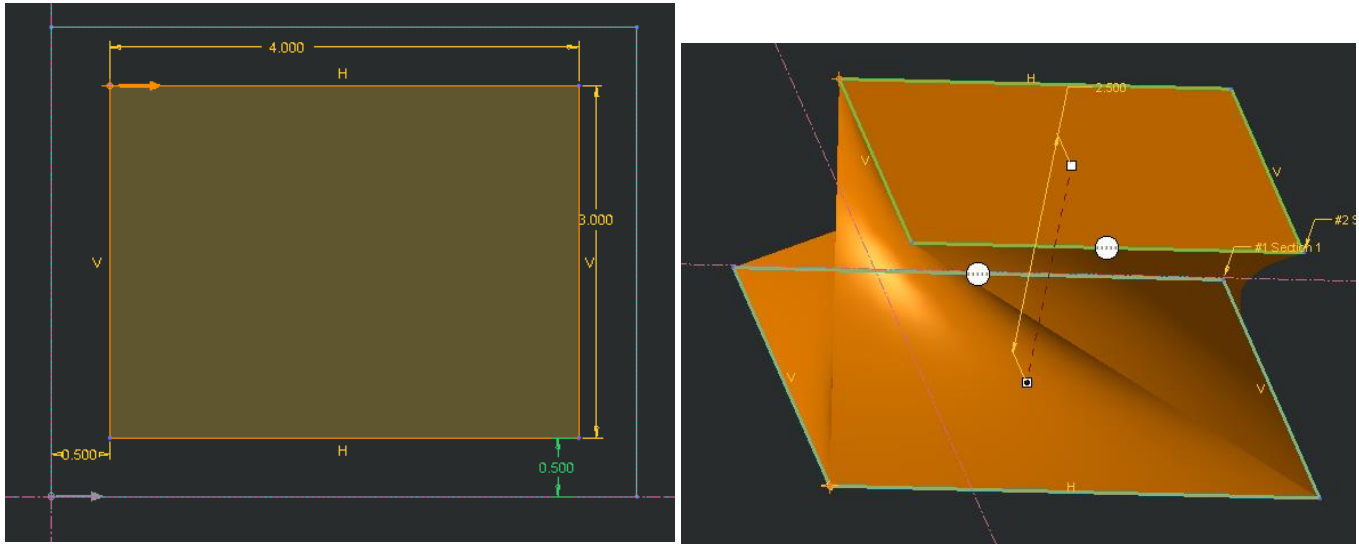


5. Select Green Check
6. In the Sections Tab > Set the Distance from Profile 1 to 2.500 > Click Sketch

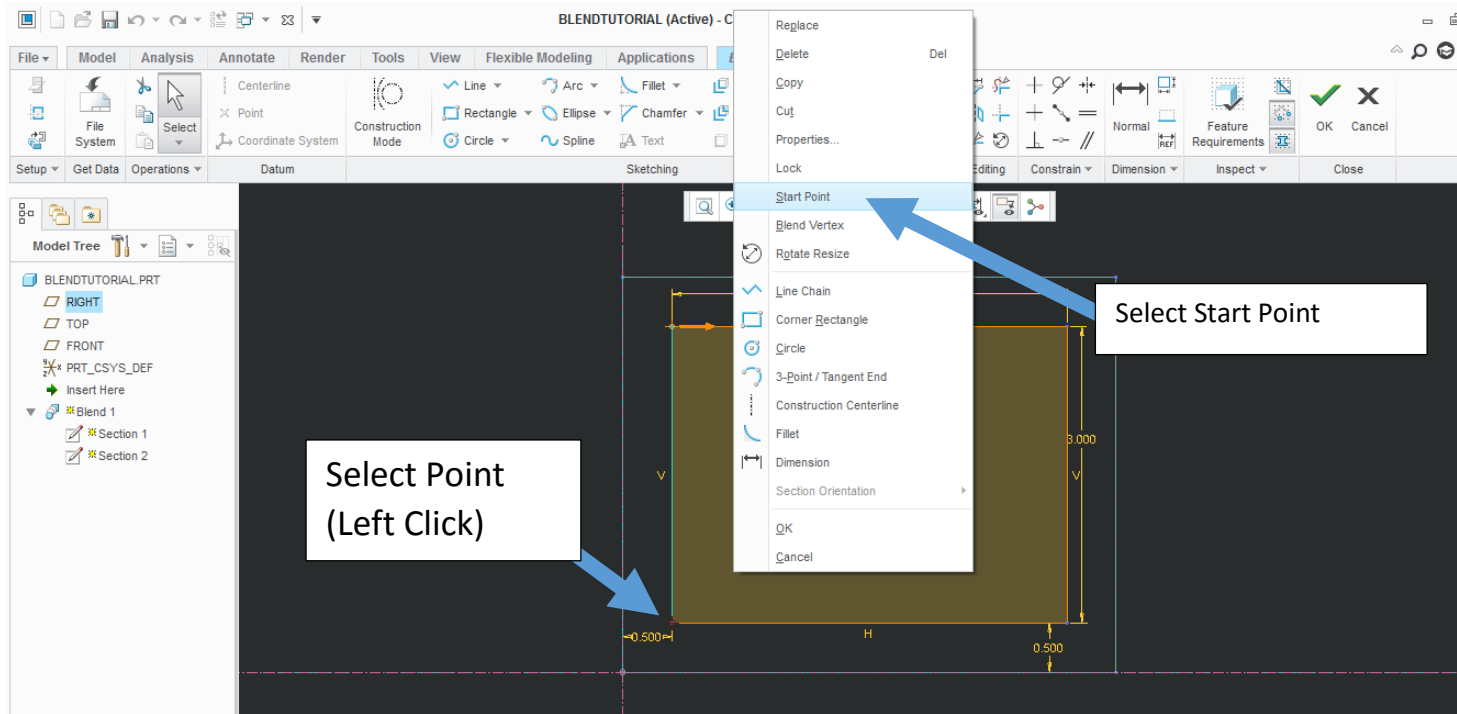


7. Draw the following Rectangle > Set Sizes as shown. (NOTE: The first left click will place the arrowhead direction. It is desired to have the arrowhead at the same (or relative location as the previous profile; otherwise the object will be twisted. See below for example.)

Example: Twisted Shape

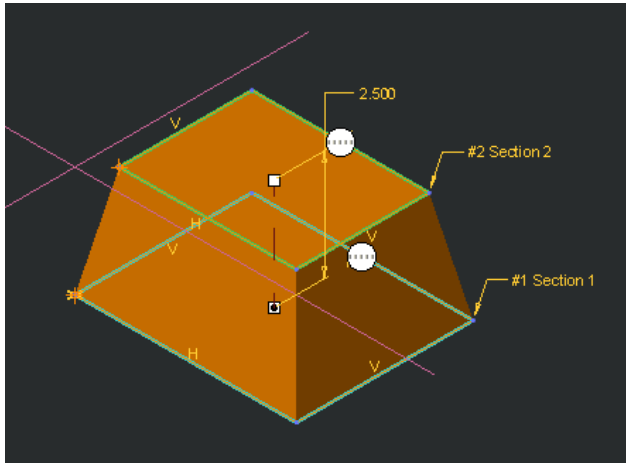


Modify the Start Point by Left Click on desired point to be Start Point > Select Start Point

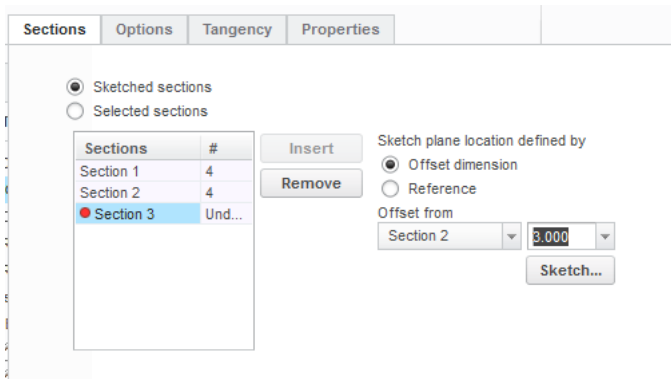


NOTE: If Start Point is still going the wrong direction Click on Point a Second Time > Right Mouse Button > Select Start Point

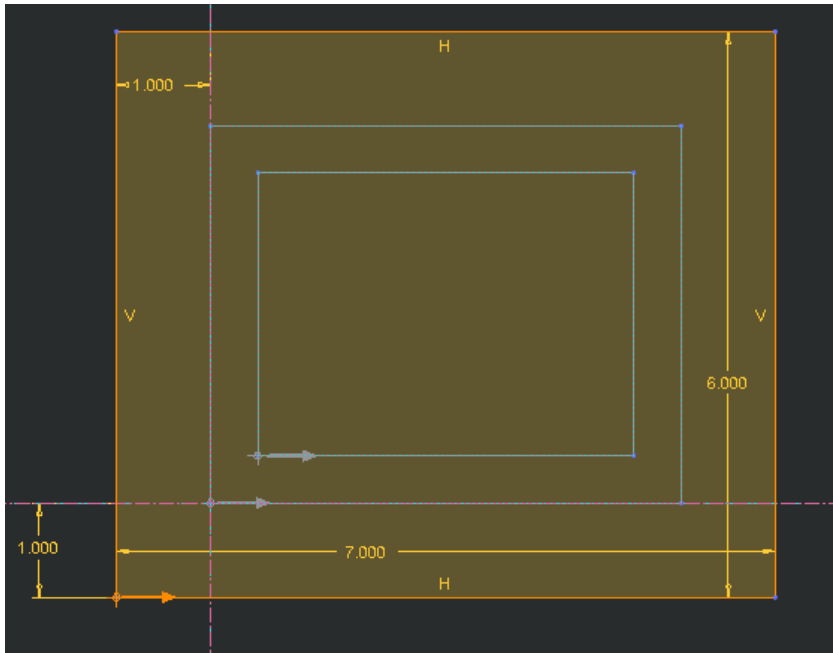
8. Green Check Sketch Profile > See Below for Part



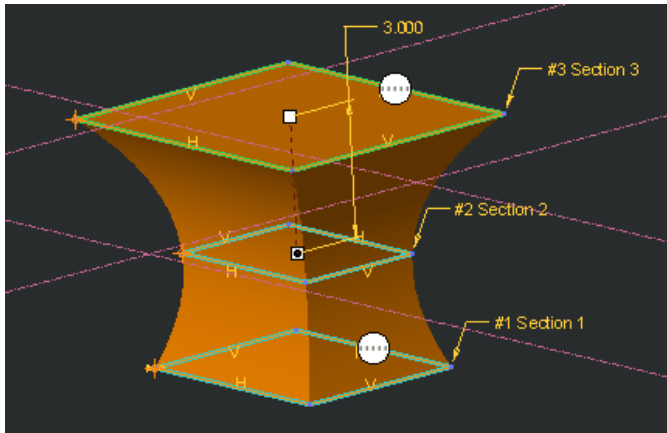
9. Add a Third Profile: Select Sections Tab > Insert > Distance From Profile 2 = 3 > Define



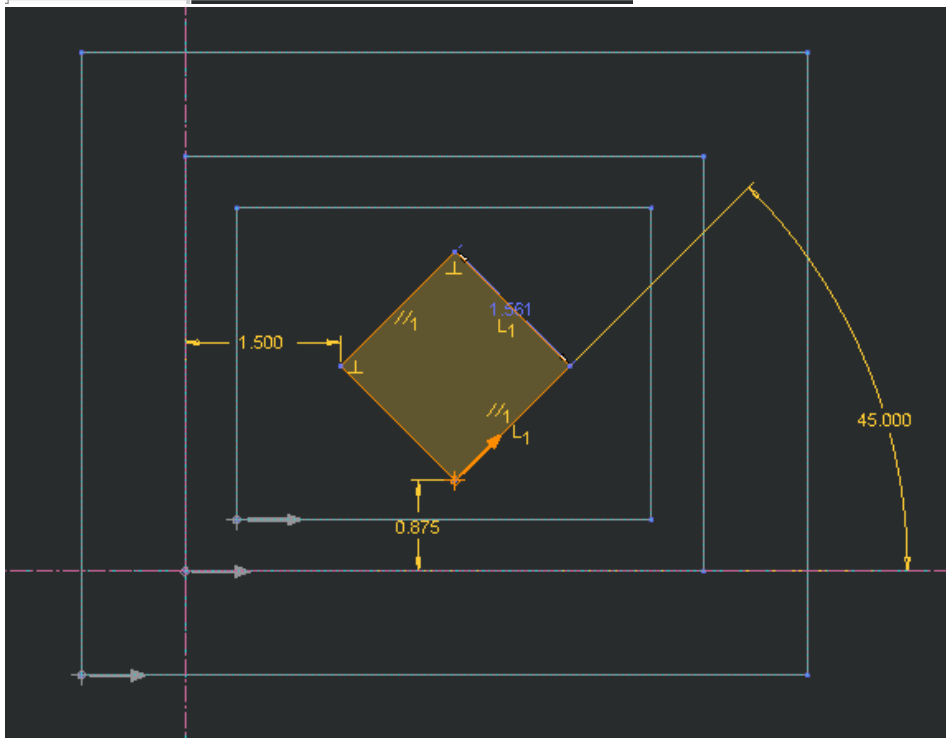
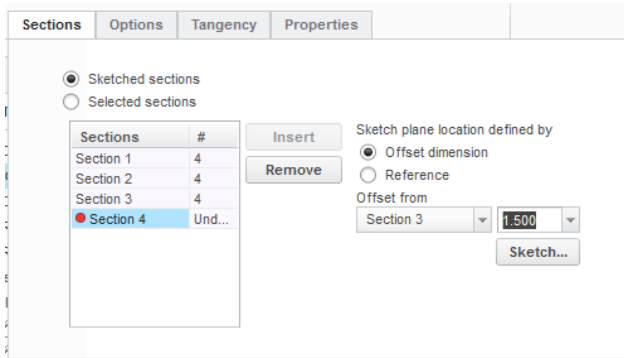
10. Sketch the Following Profile as shown



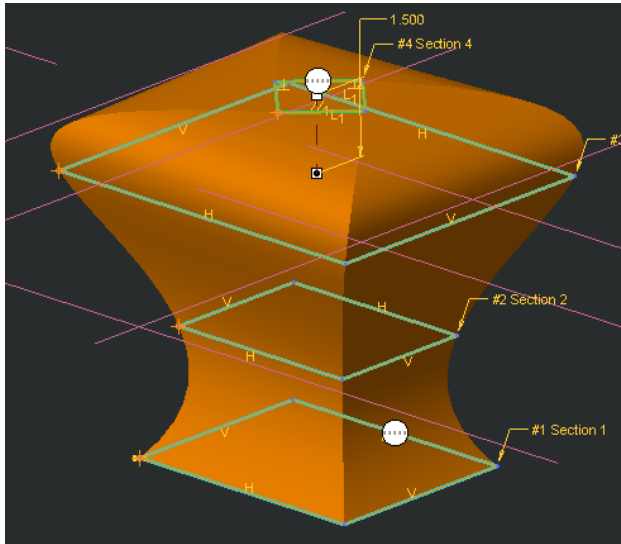
11.Green Check Sketch Profile



12.Add a Fourth Profile: Sketch and Set Dimensions for the following profile



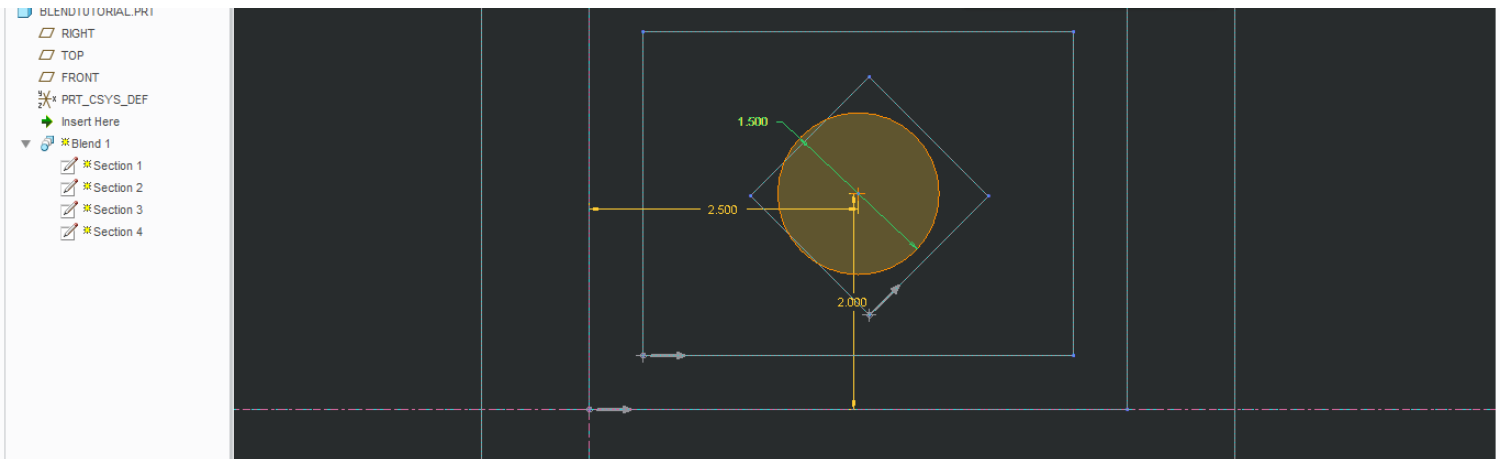
13.Green Check Sketch Profile



14.Adding a Fifth Profile: Circle

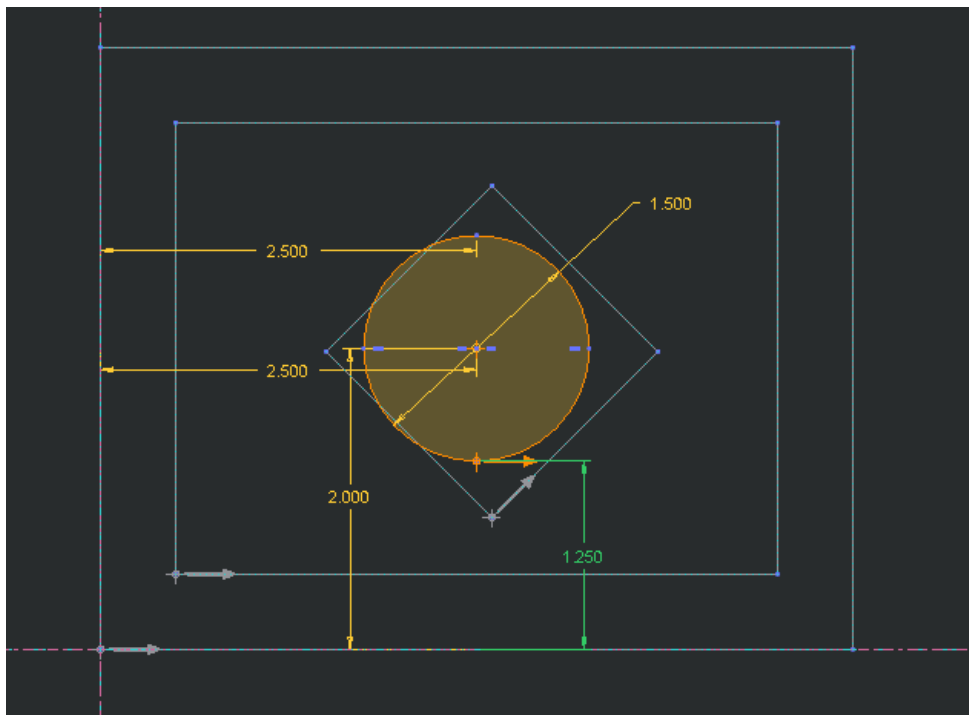
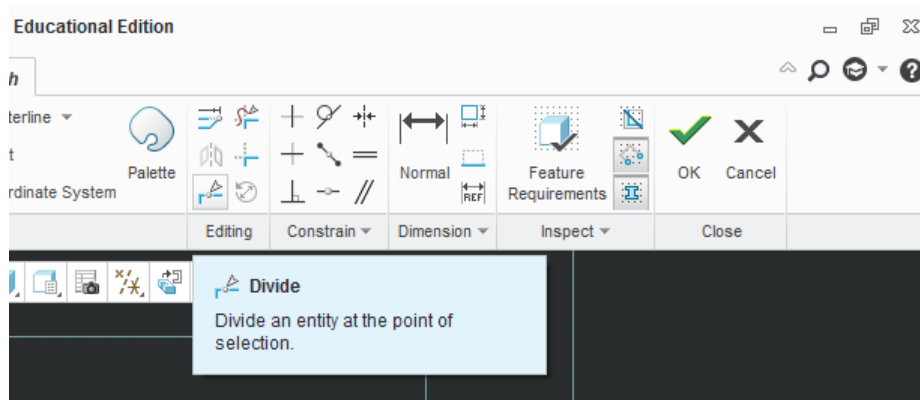
Circle is considered two points (Centerpoint, Radius). The circle needs to be converted into four points (Four Arcs) in order for the software to render the image.

Add a fifth Sketch > Set Distance from Profile 4 to 2.25 > draw a circle at the center of Profile 1



15. Dividing Circle Up to 4 Points.

Select Divide Tool From Editing Menu > Click on the circle as shown to form points. (Circle will be divided into 4 Arcs; Points of the arcs become the quadrilateral needed to connect with Profiles 1-4)



16. Green Check Profile Sketch > Green Check Blend

