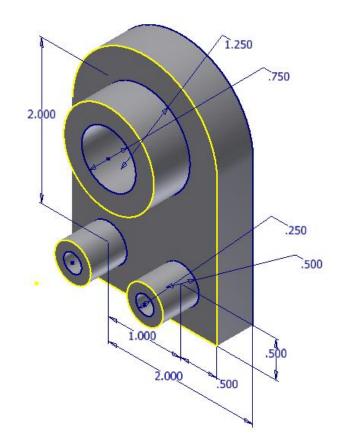
Part Modeling Intro

Using Autodesk Inventor

Basic Dimensions





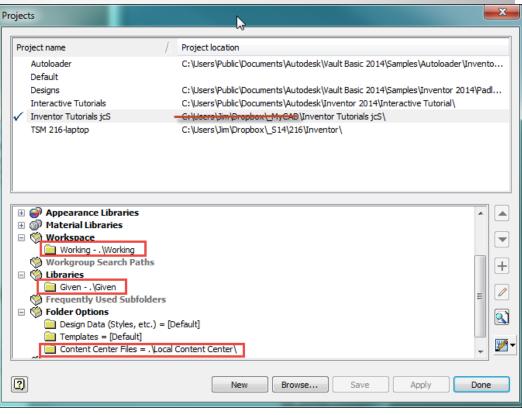
- General things to consider
- Follow specific instruction for the class

1.INITIALIZATION

- Start Inventor
- Verify project
 Selected Project
 Workspace
 Libraries
 Folder Options

a. Startup

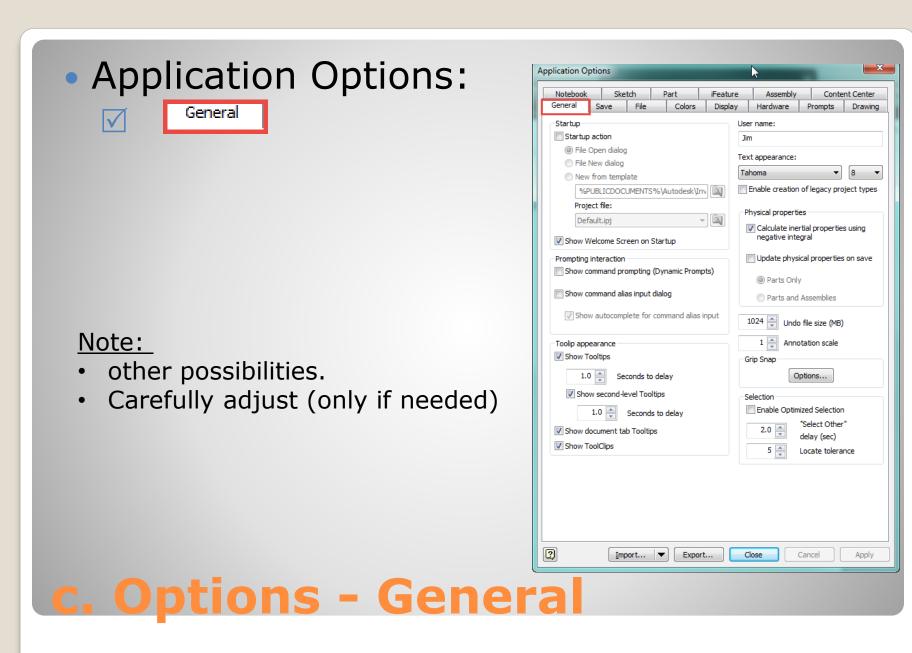








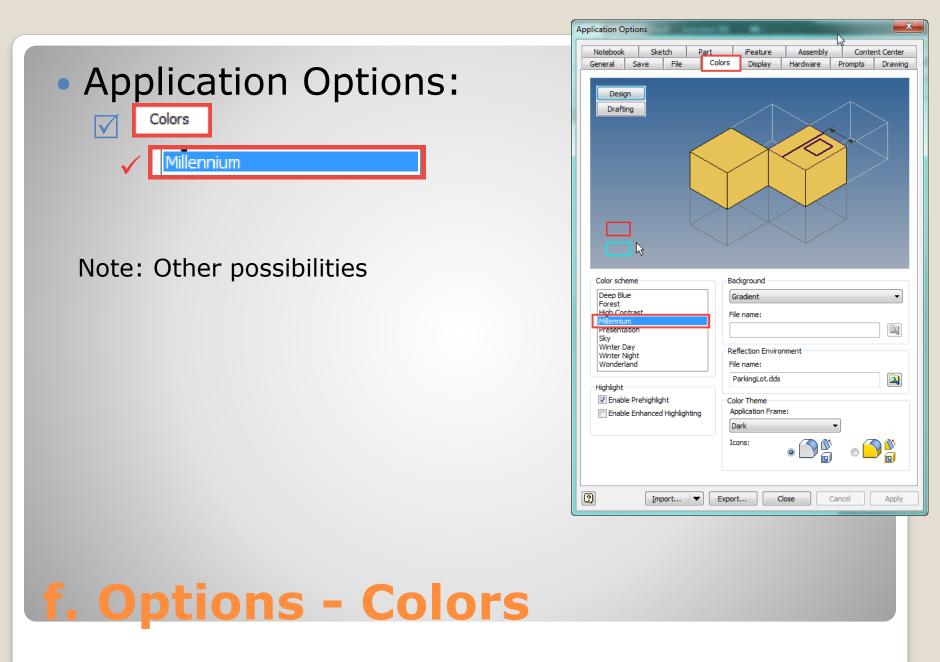
b. Application "Options"



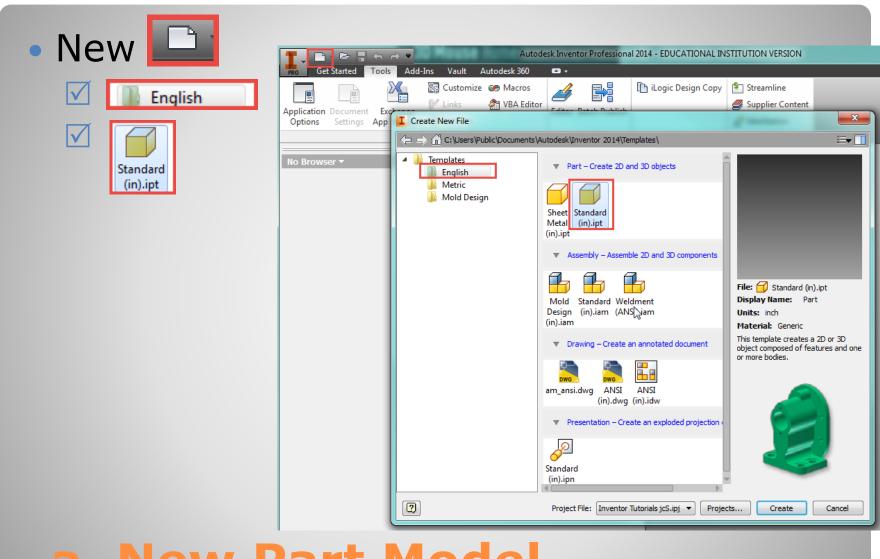
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d. Options - Part		<u>1</u>	nport	▼ Expc	ort	Close	Cancel	Apply

	Application Options			
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 Application Options: Sketch Autoproject part origin on sketch create 	2D Sketch Display Parallel and perpendicular Horizontal and vertical Display Overconstrained dimensions Image: Coordinate system indicator Apply driven dimension Display coincident constraints on creation Warn of overconstrained condition Display coincident and DOF symbol scale			
Note: • other possibilities • Selectively change • Remember what you change	Spline fit method Spline fit method Standard AutoCAD Minimum Energy - Default Tension 0 100			
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	Import Export Close Cancel Apply			
e. Options - Sketc	h			

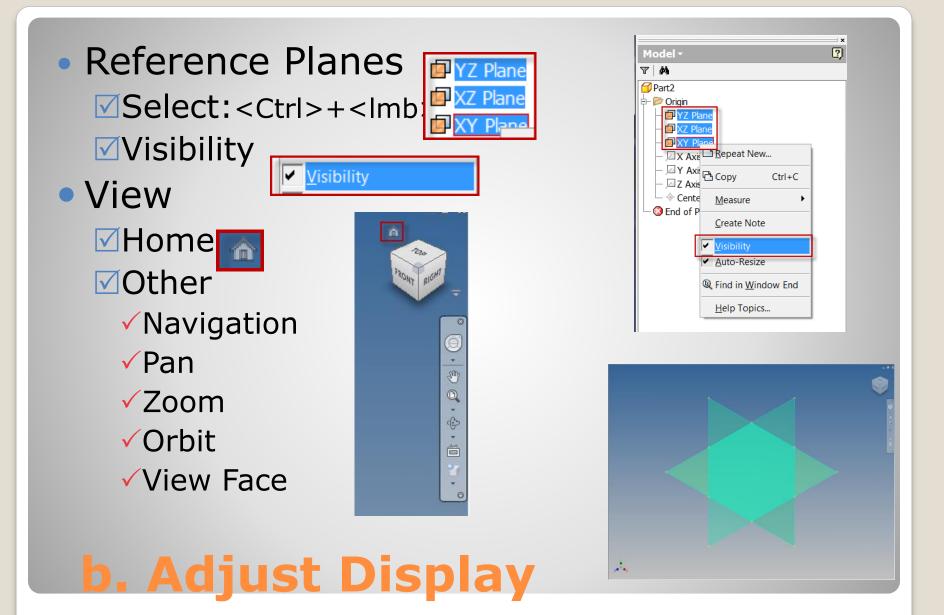
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2. NEW PART MODEL



a. New Part Model



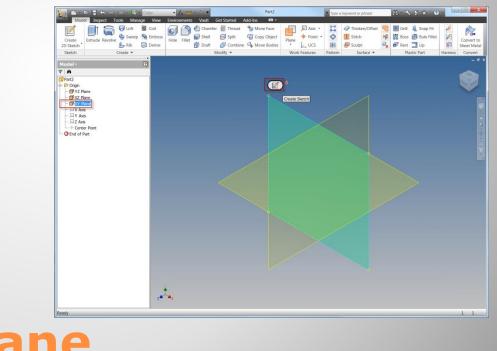
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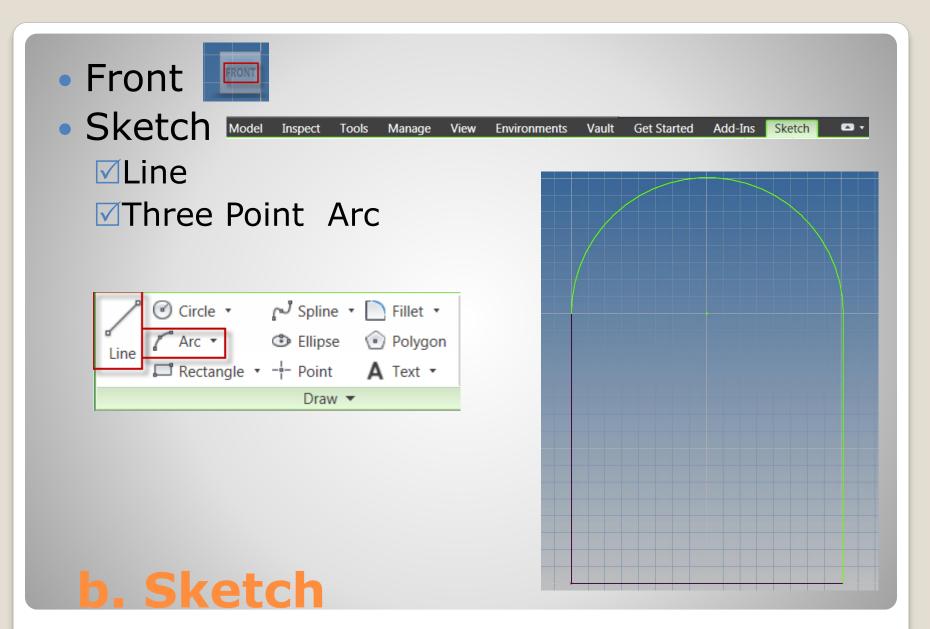
3. BASE FEATURE

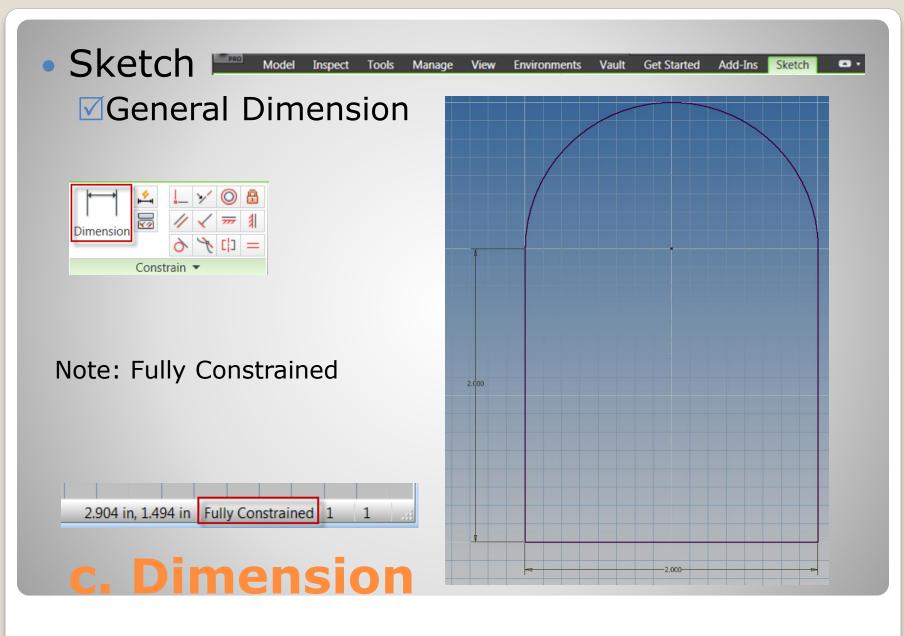


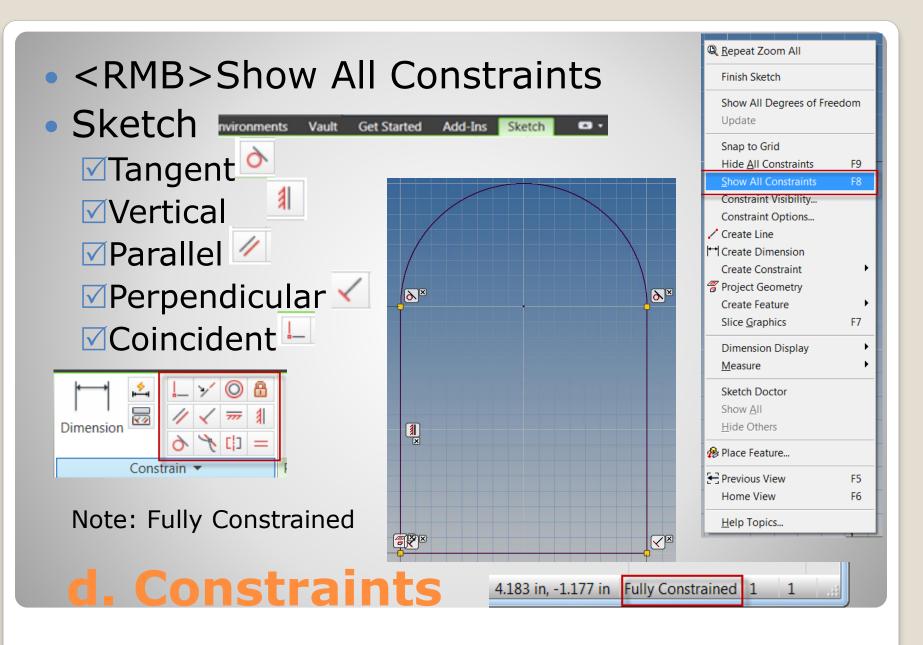
Pick: Create Sketch



a. Sketch Plane

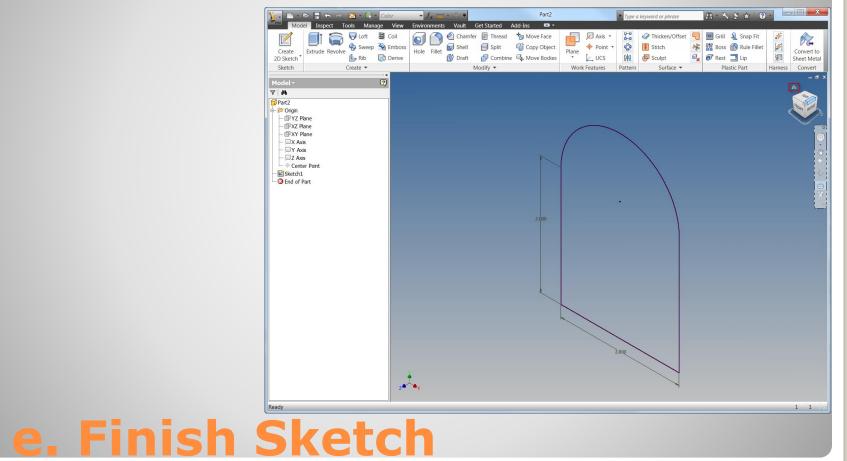


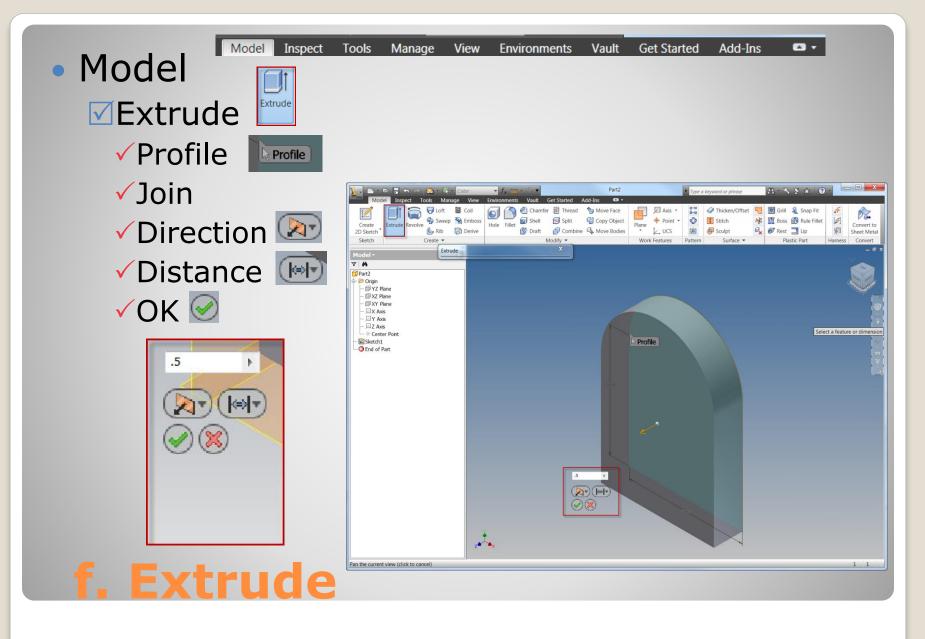




Finish Sketch
 Home View

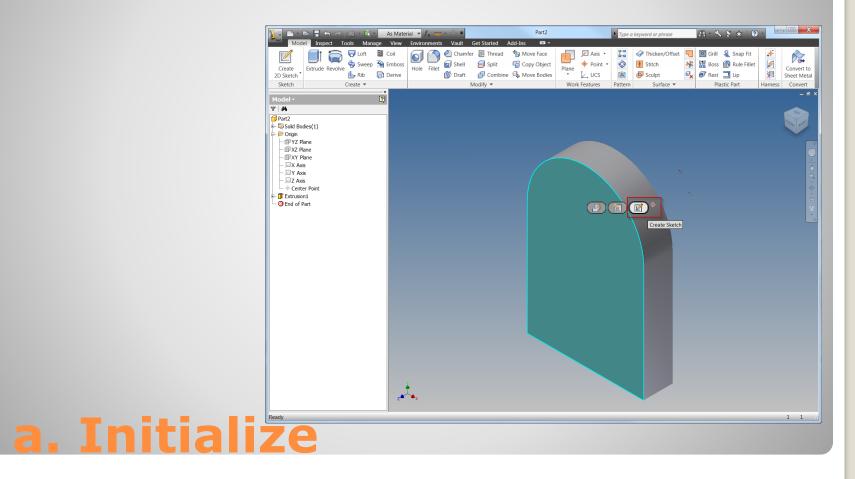


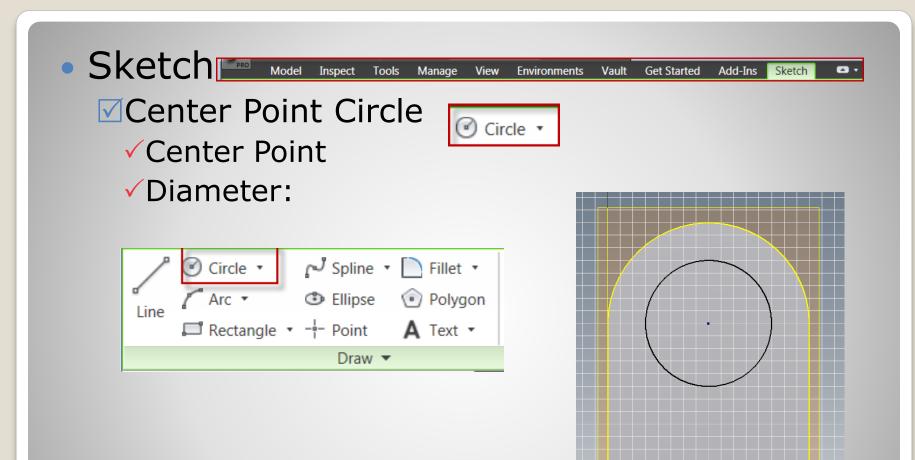




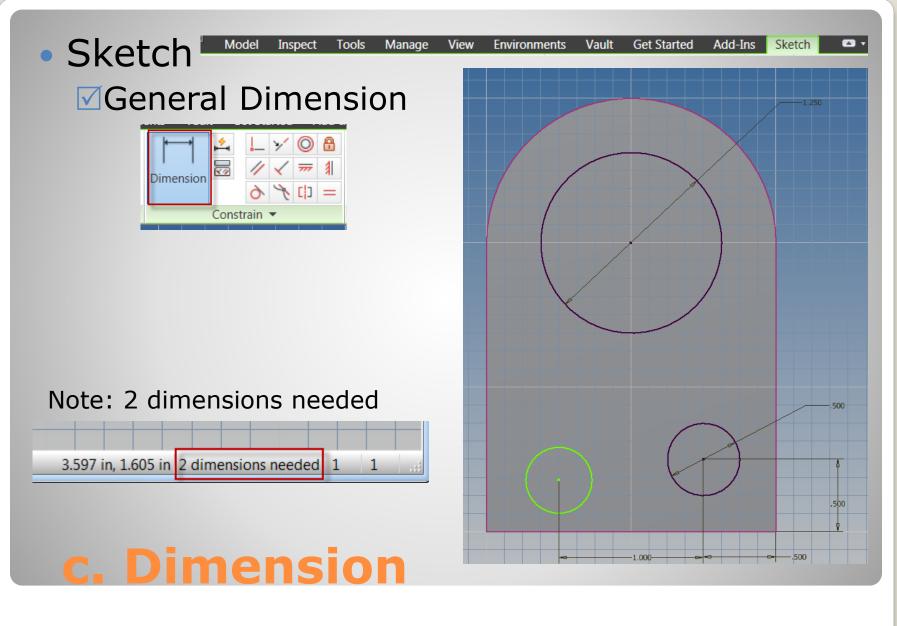
4. SECOND FEATURE

Pick: Front FacePick: Create Sketch





b. Sketch



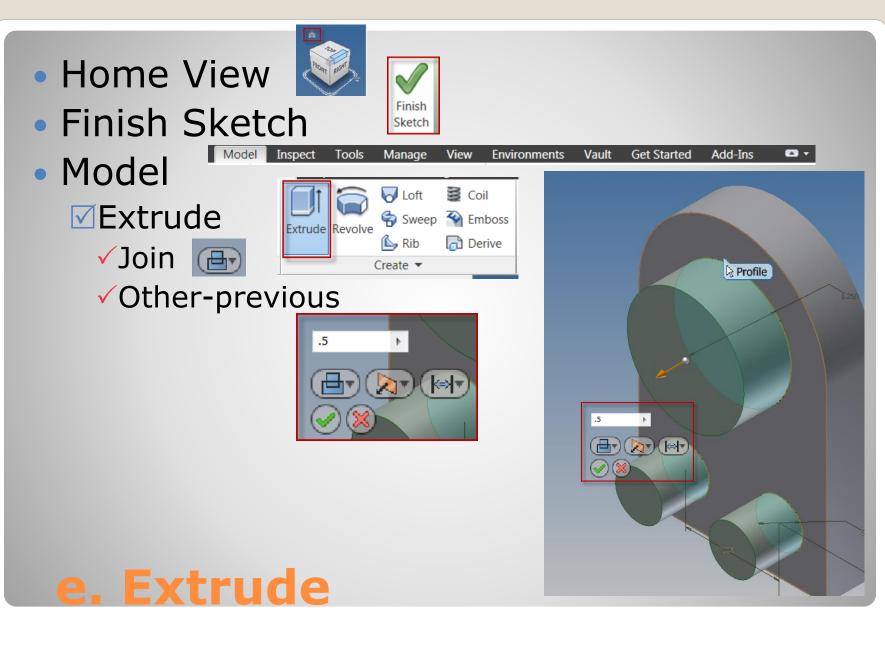
<RMB>Show all Constraints Sketch Model Inspect Tools Manage Environments Add-Ins Sketch View Vault Get Started 📥 v ✓Equal Z× Horizontal = Repeat Equal × // Finish Sketch Dimension Show All Degrees of Freedom Update Constrain 3 Snap to Grid Hide All Constraints F9 Constraint Visibility... Constraint Options... X ***** Create Line ++ Create Dimension Create Constraint ۲ Project Geometry m ۲ Create Feature Slice Graphics F7

d. Constraint

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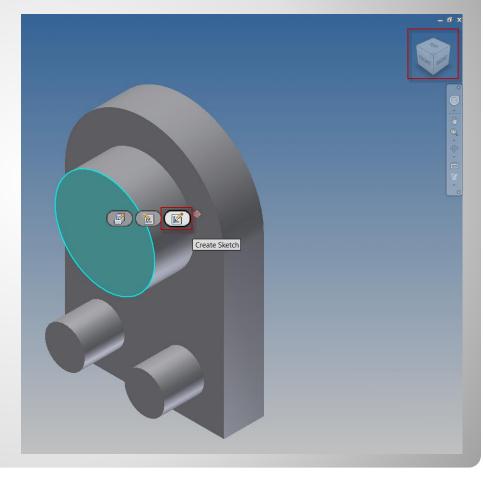
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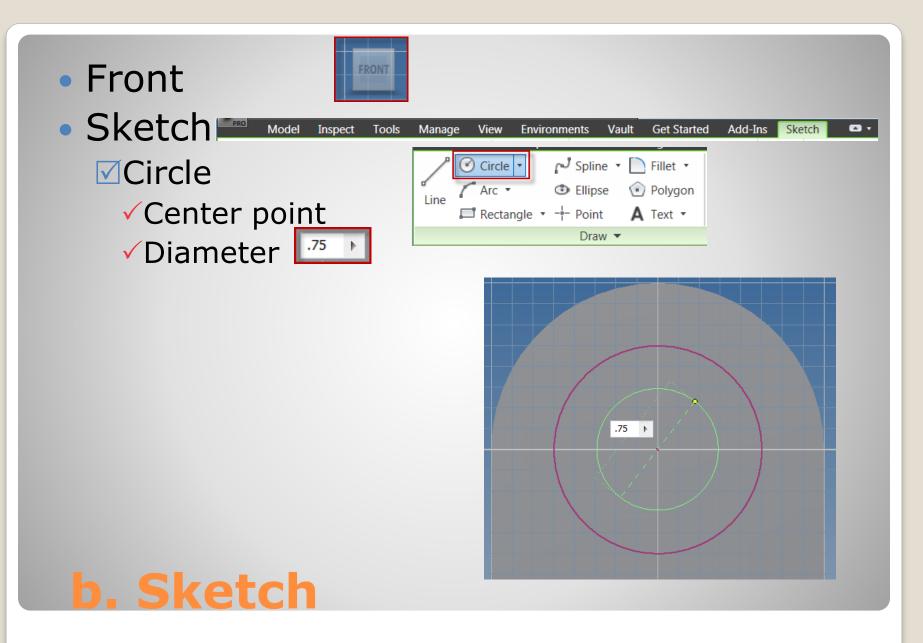
5. THIRD FEATURE





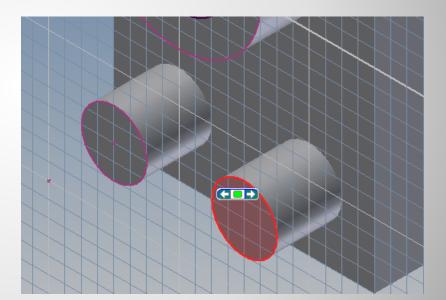




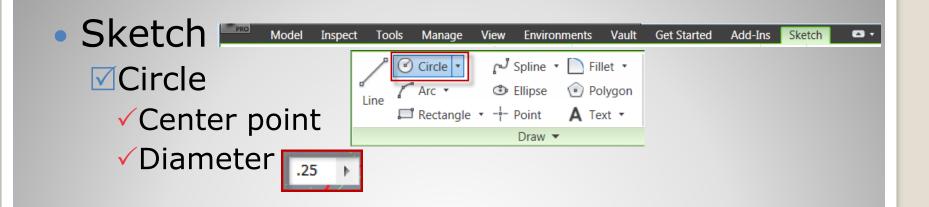




Important: Project Geometry allows the edges to be used in the sketch. This will be used to make new features concentric to the edges.



c. Sketch (Cont)

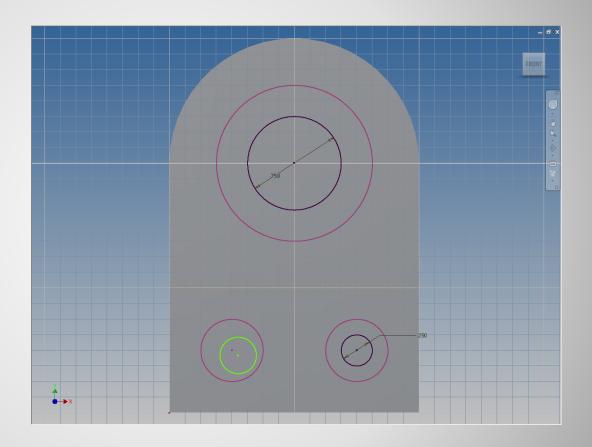


Important: Project Geometry allows the edges to be used in the sketch. This will be used to make new features concentric to the edges.

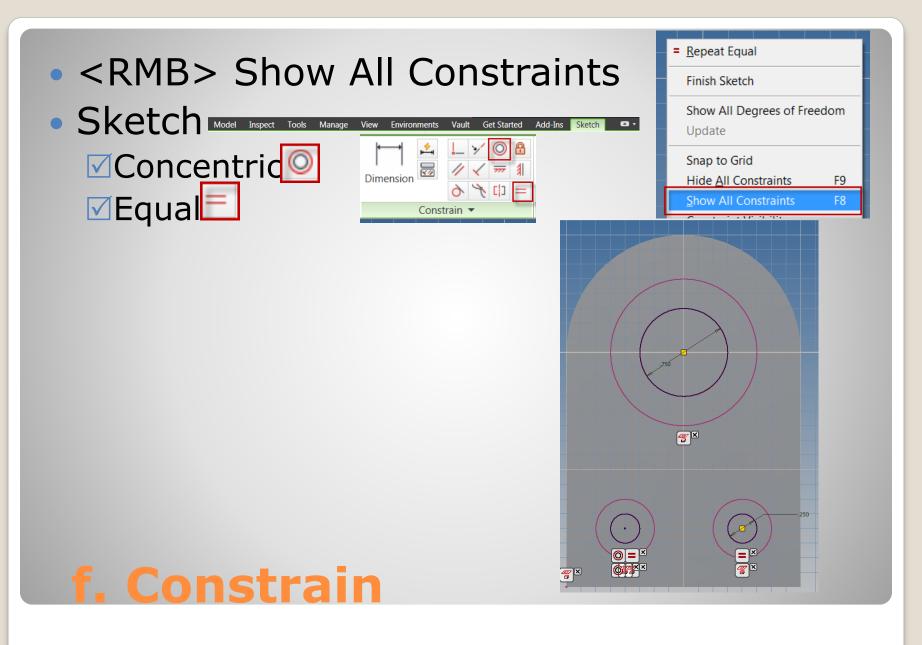


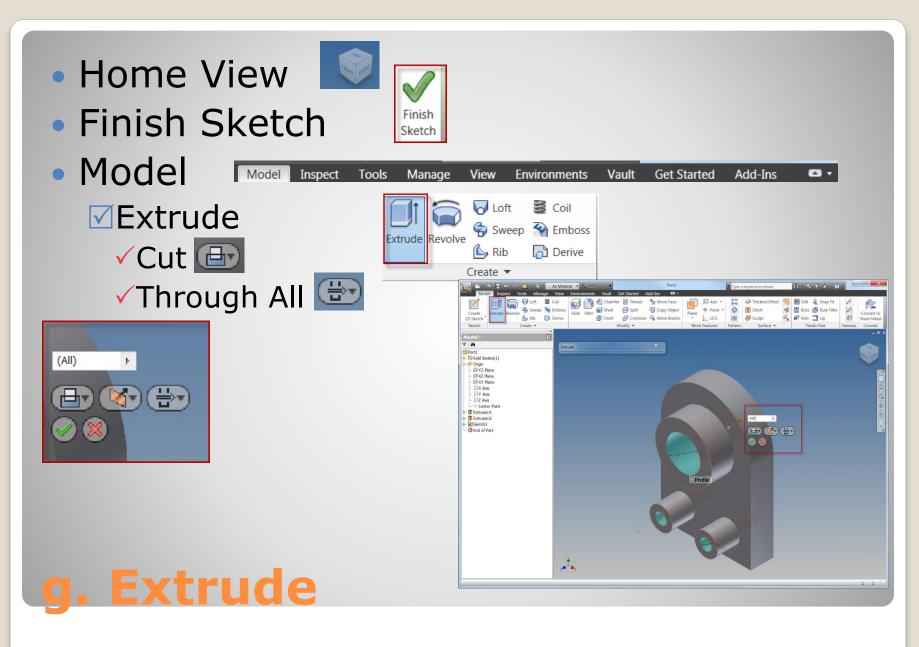
d. Sketch (Cont)

No additional dimensions required



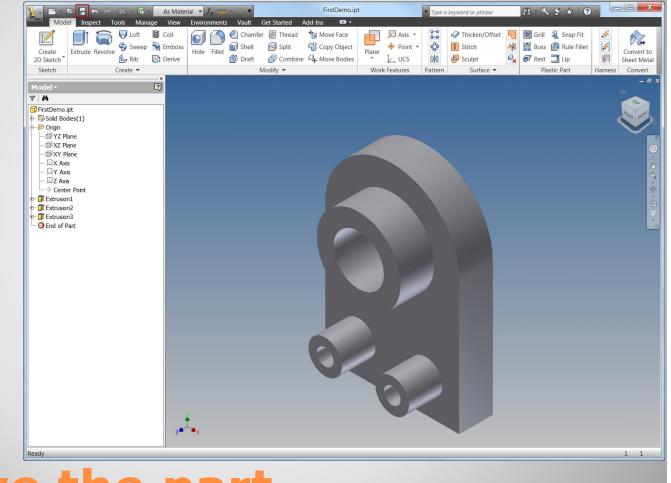
e. Dimension





5. FINISH THE PART





a. Save the part