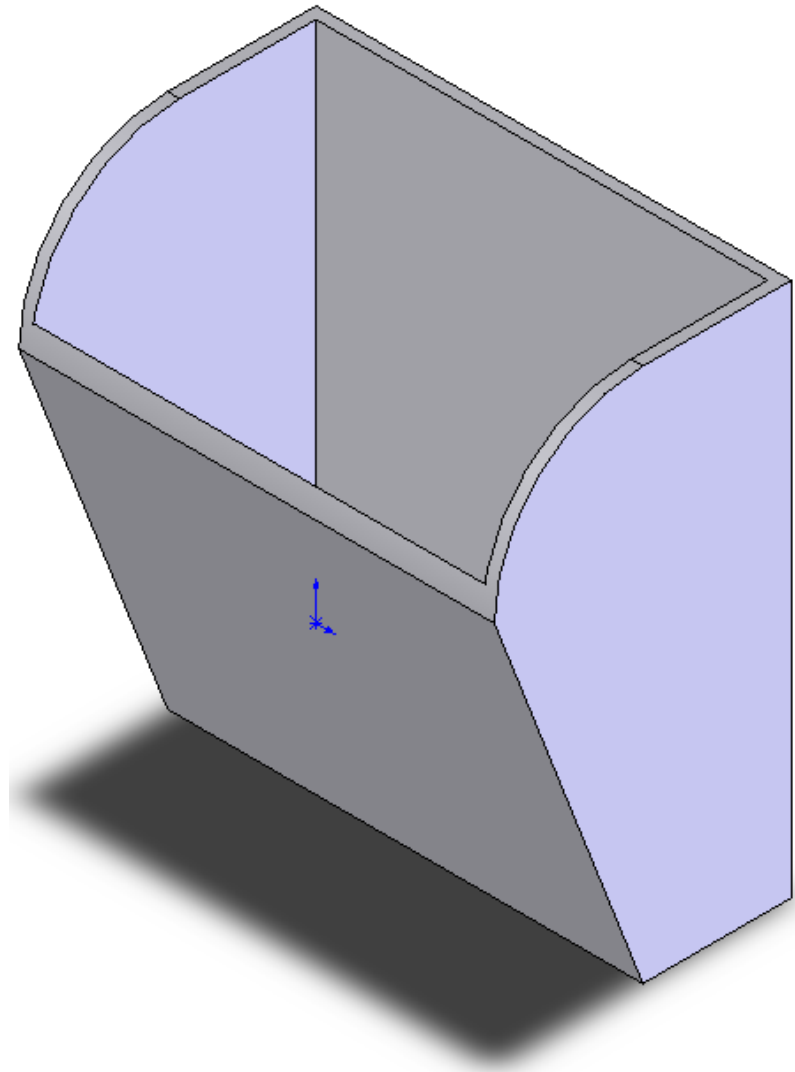


## COUPON BOX EXERCISE 2.



**Prerequisite knowledge** Students should have completed Exercise One: “The Mobile Phone Holder”

**Focus of lesson** This lesson will focus on using the following command  
**Shell.**

**Commands Used** This lesson includes *Sketching, Extruded Boss/Base, and Shell.*

**Save File**

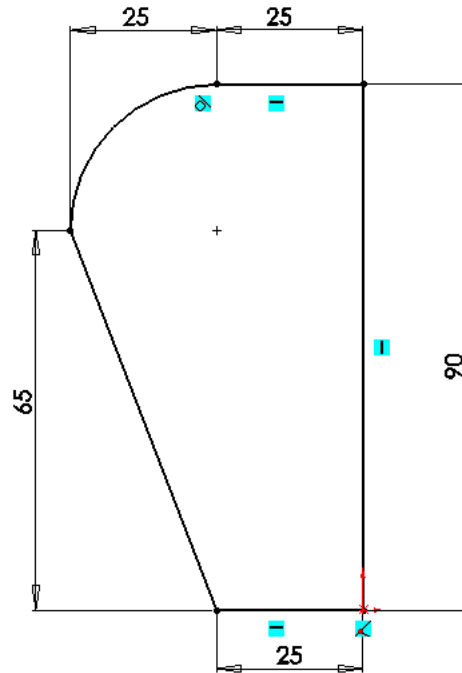
Select **File, Save As**, Coupon Box.

**Getting Started:**

Select the **Right Plane**.

**Sketch:**


Create a sketch and dimension as shown.



Exit Sketch

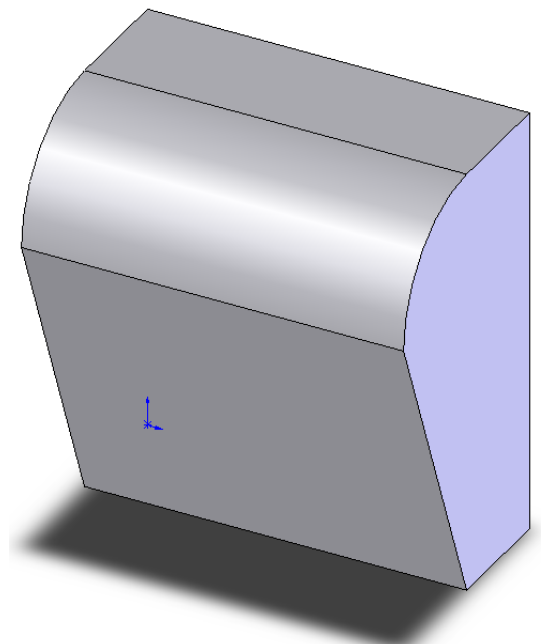


**Extrude the Model**

On the features toolbar select  
Extrude Boss/Base. 

Change the depth of the extrusion  
From 10mm to 80mm in the  
Dialogue box which appears on the  
Left hand pane.

**Rename as Coupon Box**



### Introducing Shell

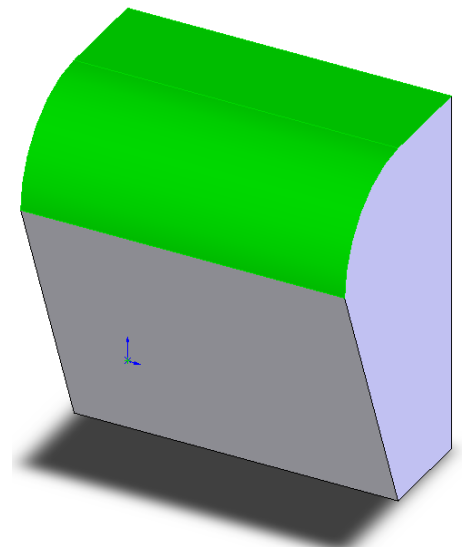
Shell is always added to the solid rather than the sketch and is hence referred to as an **applied feature**. It allows you to create a thin walled model.

### Where to find it

Select the **Shell tool** from **Insert** menu, select **Features/Shell...**

### Apply Shell

Select the Surface you wish to shell from, in this case we will select the **Top Edges** by left clicking on them. The Surface you select will be the open side of the coupon box, this is why we select the **Top** surfaces.



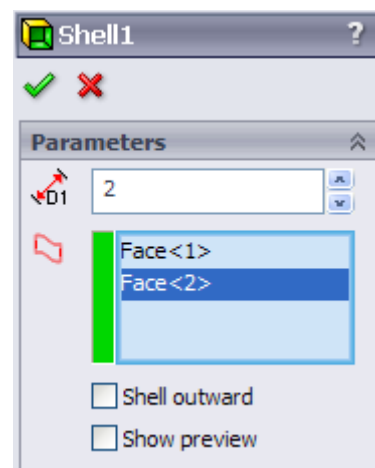
Having selected **Shell**, the Shell options appear in the property manager.

Select **2.00mm** as D1 (Wall thickness)

Face 1 and Face 2 are already selected

Click **OK**  to Shell the Container.

**Rename as Coupon Shell**



**Add Colour to  
the Coupon Box**

From the feature manager,  
Right click on **Coupon Box** and  
Select “**Appearance**”.

Apply a chosen colour as in Exercise One.

**Finished Model:**

