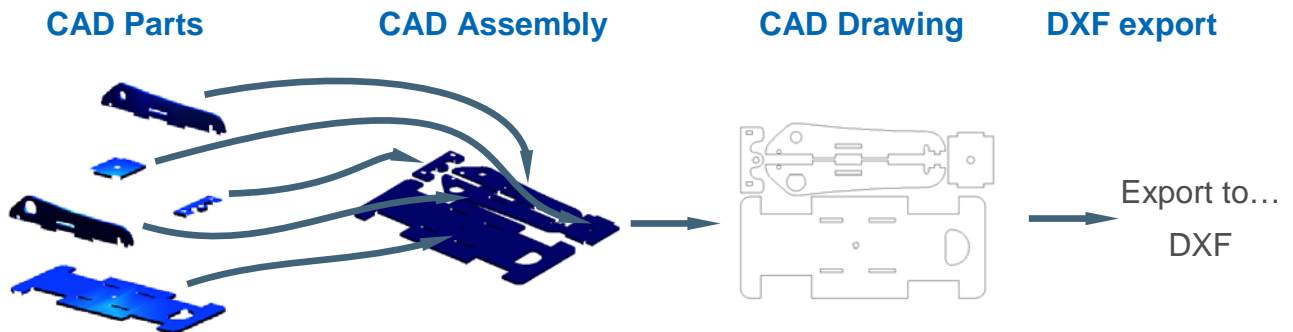


Preparing the model

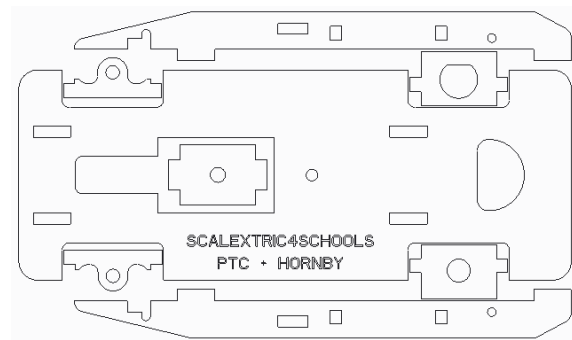
A new assembly is created and the flat components assembled nested together to make economic use of the sheet material. A drawings is created of the flat assembly and saved as a dxf file for cutting.



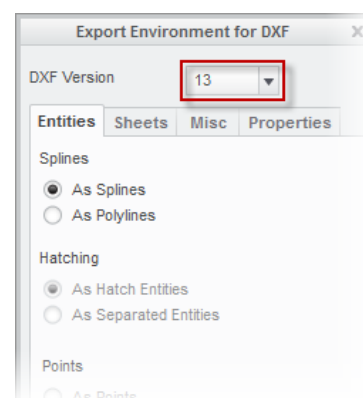
The dxf file created by Creo can now be imported into the software driving the laser or CNC cutter.

DXF export from the drawing module of Creo

1. The flat assembly should be open in a blank drawing with the view set to show the assembly flat on the page.
2. In the **File** menu tab, select **Save as** then **Save a Copy**.
3. If a menu manager appears, click **Done**.





4. Change the file **Type** to **DXF (*.dxf)**
5. Click **OK**.
6. In the Export... dialog, change the **DXF version** drop down to **13**.
7. In Splines, select the **As Polylines** option.
8. Click on **OK** to complete the DXF export.
9. The DXF file will be saved in the Working Directory.



Exporting an STL file from Creo

Here you will be shown how to export an STL file of your model configured for a fine mesh surface.


1. Open the **File** pull-down menu and  **Save as** then **Save a Copy**.
2. Change the **Type** option to **Stereolithography (*.stl)**.
3. Accept the default filename or type in a new one.
4.  on **OK** to close the dialog.

A new Export STL dialog will open.

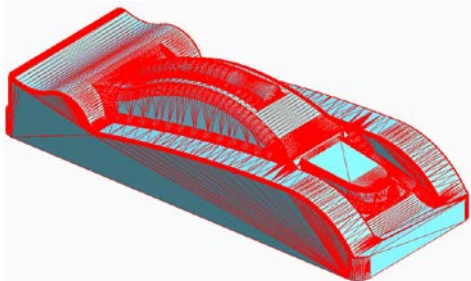
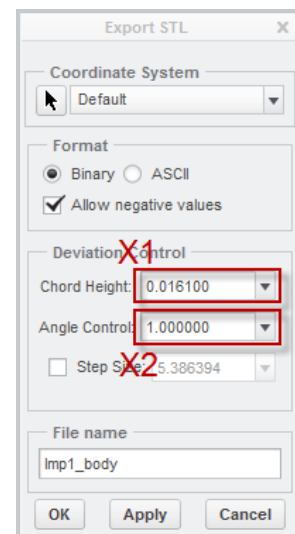
5. Change the **Chord Height** value **X1** to **0** (zero).

Note: **Creo Elements/Pro** will enter the smallest practical value for Chord Height. The resulting number is based on the size and complexity of the part.



6. Change the **Angle Control** value **X2** to **1**

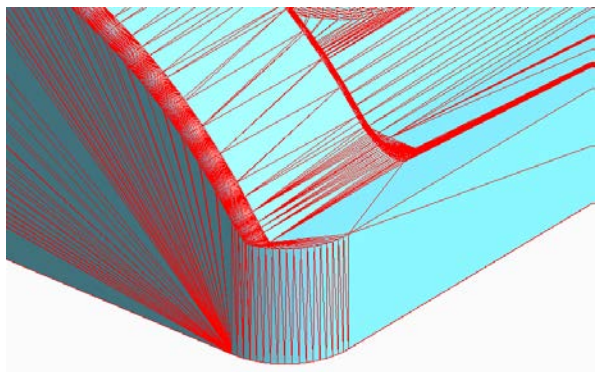
7.  On **OK** to close the dialog and the STL file will be created in the working directory

The display will change to show the faceted surface of the STL file.



8. Zoom in to a curved corner and you will see the triangular surfaces created by the STL conversion.

9.  on  to repaint the screen and return to the parametric model.



Note: A fuller description of the machining process can be found in the Scalextric4Schools 'Make – assemble – setup' document.

www.scalextric4schools.org