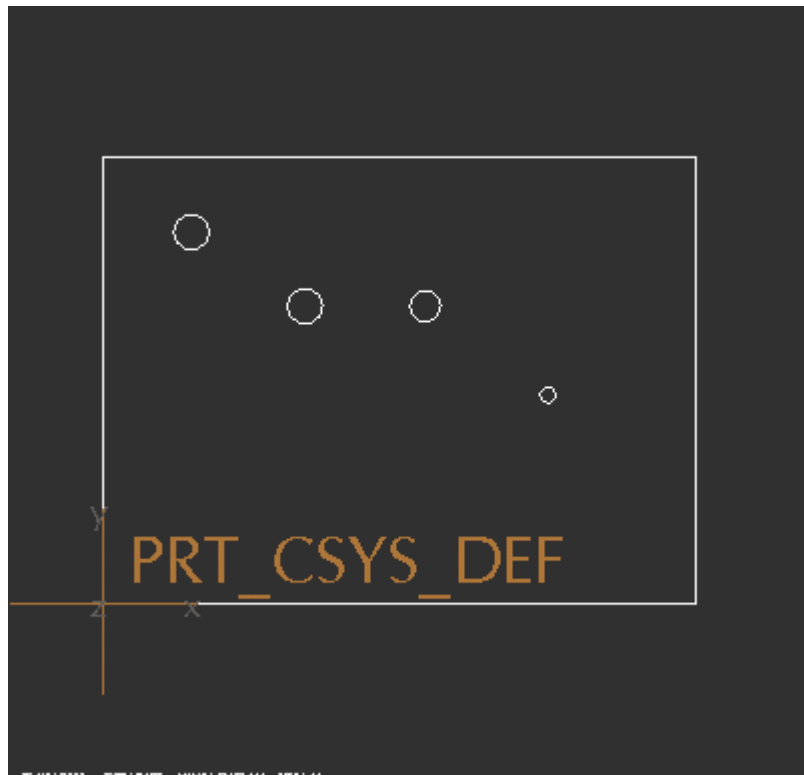


Technique for Creating Parametric Hole Charts

Functionality was added to Release 2000i² which allows for the automatic creation of tabulated dimensions. These tables parametrically reference the X and Y coordinates of holes, datum points, and datum axes. This new functionality greatly reduces the amount of time needed to obtain tabular dimensioning. The tables support both the ANSI Y14.5M-1994 and ISO129-1985 (E) standards. Hole tables can also be customized to display the proper information for each table.

Procedure

The first step in using hole tables is to create a planar view which shows the features to be displayed in the table. The view must have a coordinate system in the proper orientation, with the positive z axis normal to the screen. See Figure 1.



The next step is to setup the hole table. Click **Tools > Hole Table > Setup**. The options in the LIST SETUP menu only affect newly created tables. Click **Num Decimals** to control the number of decimal places for the coordinate dimensions. Click **Label Size** to control the size of the hole labels.

To define the naming system of the holes, click **Hole Naming** from the LIST SETUP menu. The available options are **Numerical** and **Alphanum**. **Numerical** will assign each hole a number based on

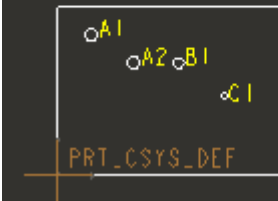
the sorting of the table. **Alphanumeric** assigns an alphanumeric name to each hole with the format A1, A2, B1, C1, etc. Each hole with the same diameter will have the same letter. This is in accordance with the ANSI standard.

To control the sorting of the information, click **Sort Setup**. The holes can be sorted by the X coordinate, the Y coordinate or by the diameter of the holes.

To add user defined parameters to the table, click **Param Column > Add**. Enter in the name of the feature parameter defined for the holes. For this example, the parameter 'depth' was entered.

Once the table has been setup, click **Create** from the HOLE TABLE menu. Select the coordinate system to be used for dimensioning. Next select the position of the table. See Figure 2 for the hole chart. Notice how a label is created for each hole on the view.

Hole No.	X	Y	Ø	DEPTH
A1	30.00	125.00	12.00	Through all
A2	68.20	100.00	12.00	20.000
B1	108.71	100.00	10.50	22.500
C1	150.00	70.00	5.50	Through all



If a change is made to the number of holes, the position of the holes, or the value of the feature parameters, click **Update** from the HOLE TABLE menu. Pro/ENGINEER will then recalculate the values and update the display of the table.