

Designer 40

- 2D Draughting
- 3D Modelling
- Incorporation of existing drawings
- Non graphical properties data management
- Parametrics

Computer-aided design

Designer 40 is a 2D/3D design and draughting system that has been designed for draughtsmen. It provides all the capabilities of a conventional drawing board but with the productivity improvements that computer-aided design systems bring. It has been developed specifically for use on a high-performance single user workstation, and thus takes full advantage of the environment which that provides.

Designer 40 is equally suited to Mechanical Engineering, Civil Engineering or Architectural applications.

3D Modelling

Designer 40 3D option is a true modelling system based on a Solid Geometry kernel which allows quick construction of the model which may then be manipulated in either a 'wire frame' or 'solid' form.

As well as supporting a series of geometric primitives, 2D shapes can be 'swept' out either linearly or rotationally to create prismatic solids. This combination approach results in extremely fast construction of the model.

Ease of Use

The use of on-screen menus means that the user's attention need never be diverted away from the screen. The style of drawing has been kept deliberately similar to that used on a conventional drawing board, resulting in a ready acceptance of the system by new users.

Using existing drawings

Existing drawings held on paper can be captured in digital form using the Advent image capture system, and used in Designer 40 as a backcloth. This means that they can be used either for reference purposes against a new drawing, or modified using Designer 40, enabling new drawings to be created which are a mixture of paper and digital forms.

Features

- symbol and macro definition
- comprehensive dimensioning
- fast cross-hatching in various styles
- 256 drawing layers
- drawing management system
- bill of materials function
- parametric design modules
- English, German or French language options

Mixed raster and vector

To cope with the need to plot on top of a printed background, for example pipelines onto a map, Designer 40 allows the combination of raster and vector data. Using the Advent image capture system the map, in digital form, can be displayed as one of the 256 drawing layers in Designer 40. The pipelines can then be added using traditional vector drawing methods, and the composite drawing output on an electrostatic plotter.

Annotation and Information

Dimensioning is to BS308, DIN, ANSI, or JIS, and allows linear, radial diametrial and angular selection. Dimensioning is fully automatic, thus the geometric entity, i.e. line or arc, need only be indicated for the associated dimension to be drawn. A point to point mode exists for linear dimensioning. A measure facility displays co-ordinate, length, angular and radial information about chosen geometry. Measure area returns information on perimeter, area, moments and product of inertia, centroids and principal and major areas.

Access to stored drawings

A whole library of drawings can be created by Designer 40. Using the system's powerful networking facilities it is possible to share such libraries and to transmit selected drawings to remote workstations.