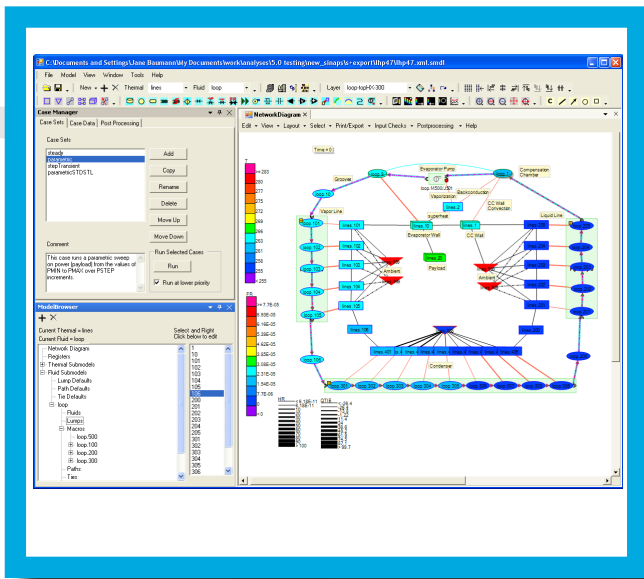


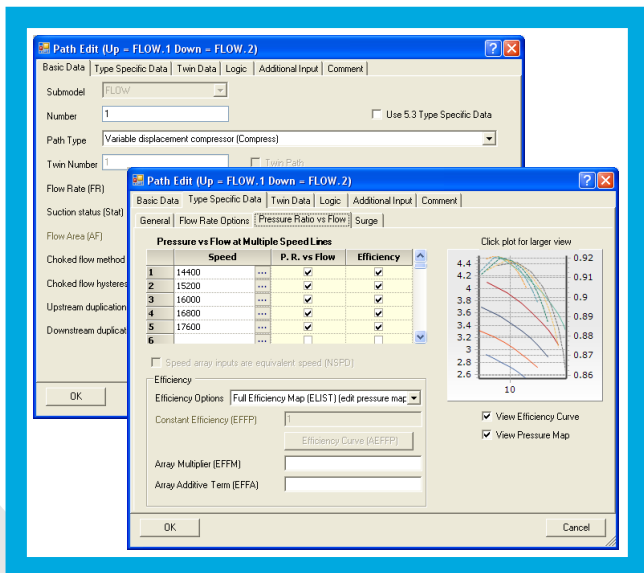


# C&R TECHNOLOGIES®



Sketch networks on the screen...  
...then post-process directly on your diagram

Work space includes built-in spreadsheet for fast model changes, easy parametric analyses and sensitivity studies



Smart forms provide guidance for object creation by providing pull down menus, color coding, data plotting, and initialization wizards.

Sinaps® is a graphical user interface for developing SINDA/FLUENT models and for viewing and reporting the results. Sinaps provides a 2D sketch environment for thermal and flow modeling analysis allowing abstraction and simplification of complex systems, commonly required when modeling fluid systems.

Sinaps allows the user to work with a SINDA/FLUENT model visually, reducing the learning curve and speeding the model building process. Because it is a complete pre and post-processor, it facilitates the reporting of results and the sharing of models between engineers. SINDA/FLUENT networks are sketched on the screen using pop-up menus and fill-in forms to quickly build and maintain complex models. Models can be validated, SINDA/FLUENT runs can be launched, and results can be displayed directly on your sketch via coloring and other postprocessing operations, all without leaving the Sinaps environment.

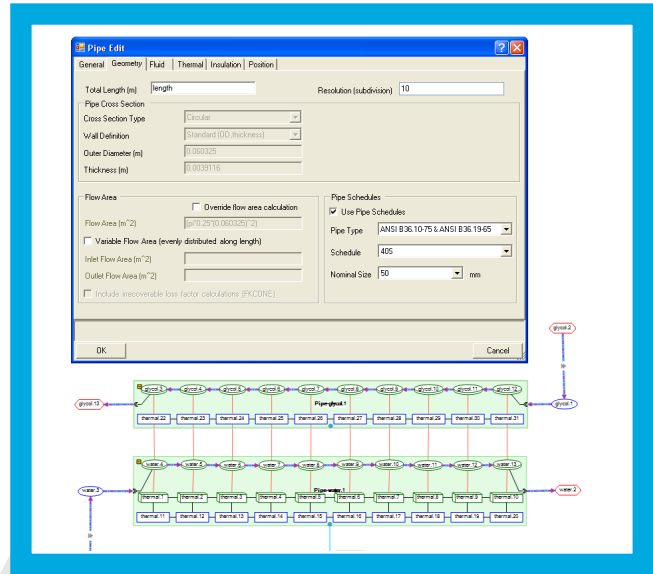
The Case Manager in Sinaps supports system modeling by streamlining the creation and management of multiple design cases for a master model. The Case Manager provides direct access to control parameters for convergence criteria along with various solution options, case-specific user-definable logic blocks, and post processing options.

## FEATURES

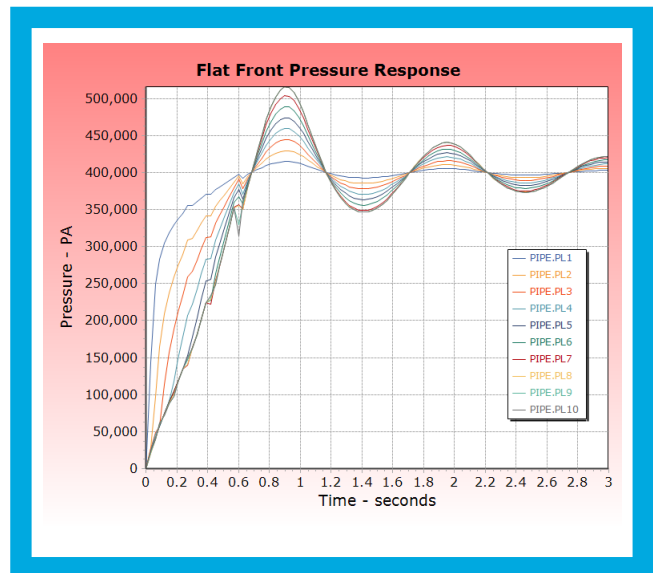
- Read in existing SINDA/FLUENT input files.
- Import older SinapsPlus® models; requires installation of export patch on SinapsPlus.
- User-defined registers and expressions facilitate design changes and parametric analyses.
- Model Browser provides easy navigation for network object locating and editing.
- Use advanced tools to organize and maintain large, complicated diagrams including:
  - multiple copies of any node or lump ("clones")
  - super-imposable drawing layers
  - temporarily collapsed subnetworks ("collections").



- Case Manager: provides multi-case data management • directly launches SINDA/FLUINT • post-processing • provides access to SINDA/FLUINT logic blocks.
- Thermophysical property database manager supports temperature-dependent material properties.
- Sinaps Tables provide management and rapid creation of SINDA/FLUINT arrays.
- Sinaps Pipes allow rapid thermal and fluid network generation for piping systems.
- User-definable libraries for turbomachines and Sinaps Pipes.
- Pipe fill/purge options support flat front modeling.
- Provides full access to SINDA/FLUINT's Advanced Design Moduel for design optimization, model correlation, goal seeking and more.
- Easy-to-use tool bars and object edit forms facilitate model building.
- Color/shade nodes and lumps and thicken connections (conductors, ties, etc.) to visualize flow rates, temperatures, pressures, heat flows, pressure drops, vapor/gas qualities, etc.
- Post processing tools such as customizable meters and gauges
- Create X-Y plots and apply extensive customizations, including:
  - legend, title,
  - labels, colors
  - compare results of multiple runs
  - rescale axes and apply unit conversions
  - add user lines generated by algebraic manipulations of other data series.
- Print or export plots and network diagrams for report generation.
- Export a traditional input file to transfer to other SINDA/FLUINT users.
- Convenient user comment fields provide model documentation.



Sinaps Pipes facilitate the modeling of large piping systems and heat exchnagers. Options include outside insulation, buit in standard pipe schedules, and user-definable pipe libraries.



Highly customizable X-Y, bar, and energy balance plotting of virtually any entity