

## **Process Simulation Software**



VMGSim provides accurate, robust and cost-effective Process Simulation Software to predict the behavior of process units and manufacturing plants. New innovations streamline development and use of models. Create schematics using the integrated Visio™ graphics engine. Seam-lessly embed Excel™ spreadsheets as unit

operations in your flowsheet model in a Completely Interactive simulation environment. For more information visit our website at www.virtualmaterials.com

#### Reader Service Number # 150

# New -100°C Cryogenic Transfer Fluid

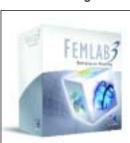


Paratherm Corp. introduces a new alternative to low temperature siliconebased fluids. Paratherm CR™ (Patent Pending) cryogenic-range heat transfer fluid provides predictable, repeatable performance in cryogenically-driven

processes. 100% synthetic, its consistent properties provide improved productivity while eliminating quality-robbing runaway coil freeze-ups. 10-cP viscosity @-88°C (20-cP @-96°C) brings higher efficiency at lower temperatures. These properties, coupled with the fluid's unusually low freeze point (<-120°C), can lead to substantially improved production quality and yields over d-limonene and silicone-based fluids. Paratherm Corporation, Conshohocken, PA Tel:610-941-4900; Fax:610-941-9191; info@paratherm.com; www.paratherm.com

Reader Service Number # 152

### Chemical Engineering Modeling Tool

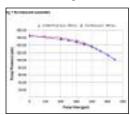


COMSOL, Inc.'s FEMLAB puts you on the front line! FEMLAB Chemical Engineering comprises a powerful, unique environment for modeling momentum, heat and mass transport coupled to chemical reactions. Now you can model fluid flow, gas flow and incompressible turbulent flow using a single tool. FEMLAB's key features include: simultaneous solving of an arbitrary number of coupled nonlinear PDEs and state-of-the-art solvers for lin-

ear and nonlinear stationary and time-dependent problems in 1D, 2D, and 3D. www.comsol.com

Reader Service Number # 154

# Third-Party Test Pump Case History



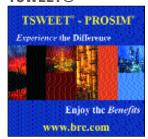
Third-party technical case history describes how cantilevered-style, openimpeller, vertical centrifugal test pump met performance specifications for unusually demanding conditions in research facility's closed mercury process loop. Two-page document, including pump curve and photos of unit, details full-scale test conditions and operation, and design criteria to be

met by final installation. Laboratory's remote systems group leader reported test pump curve showed very good correlation to manufacturer's certified curve, with most extreme deviation at only 2.6%.

LaBour Pump, 901 Ravenwood Drive, Selma, AL 36701 Phone 334-875-4100 Fax 334-875-4102 labourtaber@peerlesspump.com www.labourtaber.com

Reader Service Number # 151

### $\mathsf{TSWEET} \mathbb{R}$



Process simulation software makes plant operations, troubleshooting and optimization easier - Experience the difference of the TSWEET®- PROSIM® package and enjoy the power our software can offer your company. · Amine Sweetening, Sulfur Recovery, Tail Gas Clean-up, Sour Water Strippers, Exchanger Rating/Sizing • Gas Processing, Refining, Petro-

chemical, Glycol Dehydration and Hydrate Inhibition. Bryan Research & Engineering, Inc. Tel: 979-776-5220 www.bre.com

#### Reader Service Number # 153

## Piping Design Software



Chemstations has released **CC-SAFETY NET for piping** networks and safety relief systems, including two phase venting. These systems can be studied in a steady state or dynamic mode. The calculations use

the core components of the CHEMCAD simulator: a full physical property database and set of thermodynamic options for calculating phase equilibrium; this sets CC-SAFETY NET apart and gives users distinct, bottom-line advantages.

Visit us, http://www.chemstations.net, or call us, 800-243-6223.

Reader Service Number # 155