



Applied Math Modeling Releases CoolSim 4.5 Data Center Design Optimization Software

Adds New Modeling Capability and Speed Improvements

Concord, N.H., December 10th – Today Applied Math Modeling Inc., a leading provider of data center design optimization software, announced CoolSim 4.5 – the next revision of the company’s popular modeling software. As the industry’s only cloud-based solution, CoolSim 4.5 continues to add important airflow modeling features for data center design optimization.

“We continue to push forward with both CFD modeling capability and speed improvement with the release of CoolSim 4.5,” said Paul Bemis, CEO of Applied Math Modeling, “Using CoolSim 4.5, users are now able to build increasingly complex data center models faster and with greater fidelity, than ever before while leveraging the cost effectiveness of Cloud Computing to reduce simulation time and cost.”

CoolSim 4.5 adds an array of new features including:

- Upgrading to the latest revision of the ANSYS/FLUENT solver provides the ability to process much more complex data center CFD models faster and more efficiently.
- Improvements to the CoolSim Simulation Facility enable processing of multiple simulations using advanced parallel processing technology.
- Improvements in the [CoolSim Automated Report Generation System](#) allows for higher fidelity output reports that can be modified and customized by end users.
- Improved “ease of use” features including tools for unusual data center shapes, object alignment, and transparency.

These new features allow users to rapidly set up modeling scenarios and submit them to the CoolSim HPC computing system for quick turn-around. Existing CoolSim users will find these new features speed up the modeling process, while new CoolSim users will find the learning curve for CoolSim to be minimal.

“CoolSim was designed from the beginning to deliver industry leading price and performance while providing outstanding ease of use for users that don’t have the time to climb a steep learning curve,” said Bemis, “CoolSim 4.5 continues this tradition by adding features aimed at reducing model build time and the overall simulation process, allowing users to analyze many more design alternatives prior to selecting the optimal design for a given data center environment.”

CoolSim is the most cost effective CFD modeling solution in the market and was built specifically as a SaaS (Software as a Service) solution to provide users with industry leading value. Unlike its competitors that process simulations locally, the CoolSim subscription includes access to a HPC (High Performance Computing) cluster for processing the complex 3D models. This unique approach allows unprecedented benefits in cost reduction, simulation speed, and superior support.

Once built, the model is automatically submitted to a hosted high-performance computing (HPC) cluster for processing using ANSYS®/FLUENT (CFD) technology. After the simulation is complete, high fidelity HTML output reports with embedded 3D visual images are produced and delivered to the user. This mechanism allows users to perform multiple “what-if” studies of their data centers to determine the optimal placement of existing equipment, evaluate new or alternative designs, or visualize the effect of adding new equipment to an existing data center. [Read what users say about CoolSim.](#)



Industry's Only SaaS Model

Applied Math Modeling continues to reduce total cost-of-ownership (TCO) for customers by delivering CoolSim using a hosted Software as a Service (SaaS) model that includes the software and the computational capacity to perform the complex CFD calculations.

"No longer do users have to pay the high annual license fees, or invest in expensive local computer servers to use a CFD based data center modeling tool," Bemis said, "With CoolSim, users can leverage the same technology used in the aerospace and automotive markets at a fraction of the cost of 'local processing only' solutions."

By using the CoolSim 4 subscription model, occasional users can select a usage plan that meets their specific usage needs.

About Applied Math Modeling

Applied Math Modeling develops application-specific simulation tools, driven by the rich set of industry proven ANSYS simulation engines. These applications are then delivered to the market using a hosted "Software as a Service" (SaaS) model that is particularly well suited for periodic or occasional users. This unique approach reduces end user IT complexity and overall cost of ownership. Visit

www.CoolSimSoftware.com for more information or e-mail us at info@CoolSimSoftware.com.