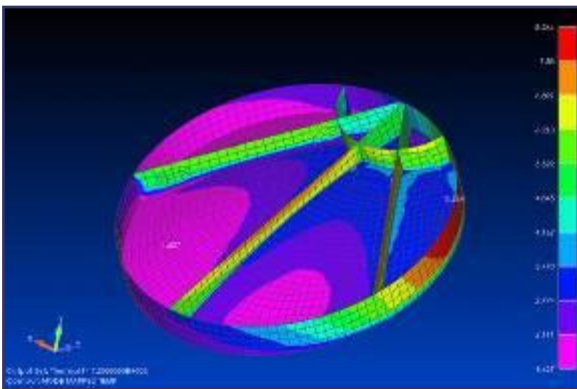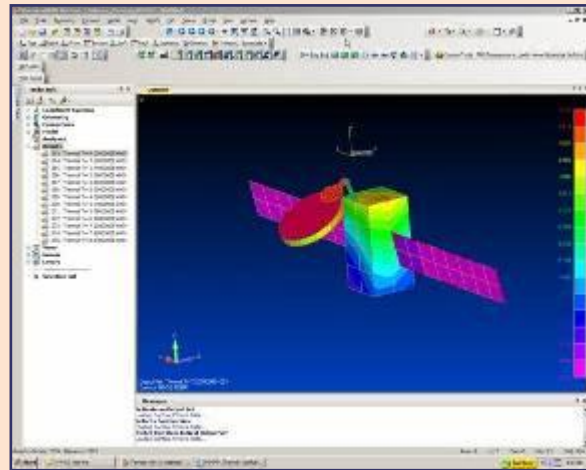# Top 5 reasons to upgrade Femap with Femap Thermal and Femap Flow solvers

1. Fully Integrated in Femap

Mesh creation, thermal and flow analysis and analysis results review can all be performed in a single environment. Meshes and analysis results can also be catalogued and shared with other members of the design team. All this is accomplished using one user interface, greatly reducing training overhead.
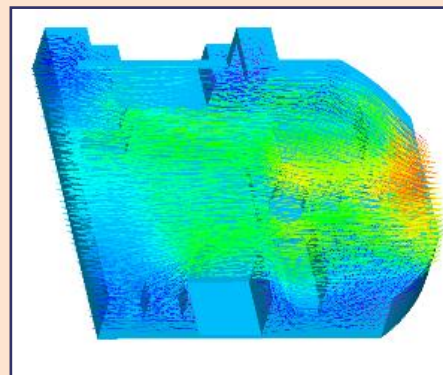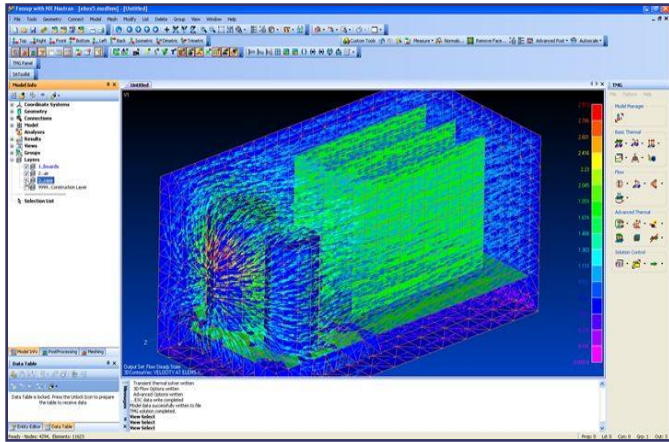
2. Comprehensive, scalable thermal analysis

Femap Thermal is a comprehensive and scalable thermal analysis tool that combines the versatility of FE-based modeling with the accuracy of a finite-volume scheme. It provides for conduction, convection, and radiation heat transfer simulation.

3. Complete flow analysis

Femap Flow is a Computational Fluid Dynamics (CFD) solver that effectively solves both steady-state and transient applications. Femap Flow transforms FEMAP into a complete flow analysis tool that is capable of accurately solving complex fluid flow problems, such as mixed flows and non-Newtonian fluids.
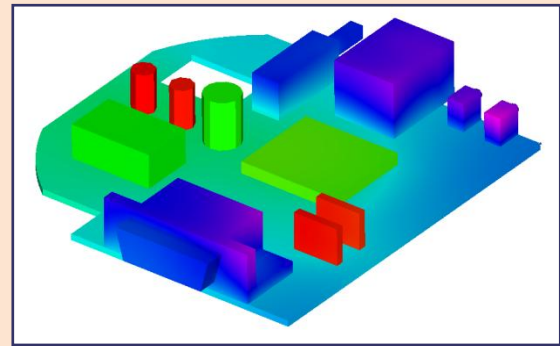
4. True multi-physics

Femap Thermal and Femap Flow are fully coupled for true multi-physics. The two solvers run simultaneously and pass thermal and flow data between them. 3D distributions of fluid/gas temperatures and heat transfer coefficients are provided to the thermal solver, eliminating the need for the user to estimate these items.

5. Powerful temperature and fluid load mapping

Femap Thermal and Femap Flow provide complete tools for mapping both temperature and pressure loads to arbitrary dissimilar structural meshes. This allows for accurate 1D, 2D, and 3D load distributions without the need for home-grown codes or approximations.

The Femap and MAYA Advantage

Femap is an advanced computer aided engineering (CAE) tool for pre- and post-processing finite element analysis (FEA) models for structural, thermal, and flow. With its powerful capabilities, Femap offers the best price/functionality ratio in the industry. The MAYA-authored Femap Thermal and Femap Flow solvers seamlessly turn Femap into a comprehensive thermal and flow analysis environment.

As an OEM developer of Femap solvers for Siemens PLM, MAYA has a comprehensive knowledge of the capabilities of Femap and its associated solvers. Together, we can evaluate your CAE analysis requirements and provide you with the Femap configuration that best suits your needs.

MAYA Simulation Technologies	www.mayasim.com
	info@mayasim.com
	800 343 6292 (toll-free)
	514 369 4200 (fax)