



## Altair Releases HyperWorks 11.0, Creating the Most Comprehensive Open-Architecture CAE Solution in Engineering

TROY, Mich. – June 22, 2011 – [Altair Engineering, Inc.](#), a leading global provider of simulation technology and [engineering services](#), today announced the release of [HyperWorks 11.0](#), the latest version of the engineering industry's most popular computer-aided engineering (CAE) software suite. Highlights of HyperWorks 11.0 include the addition of two new software products to the HyperWorks suite; [AcuSolve](#) and [solidThinking](#). It also offers a greatly extended breadth of solver solutions in [RADIOSS](#), allowing engineers to efficiently address today's complex design challenges.

HyperWorks 11.0 was officially unveiled today during Altair's opening keynote address at the 2011 Americas [HyperWorks Technology Conference](#) (#HTC2011) taking place June 22-23 at the Hyatt Regency Grand Cypress in Orlando, Fla.

"With HyperWorks 11.0, we have achieved even more extensive integration and automation of functions, freeing engineers to use their creativity and talents to innovate, rather than focusing the majority of their time on data input and management," said Altair HyperWorks Chief Technology Officer Dr. Uwe Schramm. "Our revolutionary 'pay-for-use' token-based business model allows engineers to try more types of software solutions and employ HyperWorks 11.0 for more tasks than ever before."

### **Extending the value of HyperWorks with every release**

Continuing the tradition of enriching the value of HyperWorks with every release, HyperWorks 11.0 adds two new software products to its portfolio: [AcuSolve](#), a computational fluid dynamics (CFD) flow and multi-physics solver, and [solidThinking](#), a 3D conceptual modeling and visualization software. These additions increase the already impressive suite of solutions within the HyperWorks simulation platform. Further extending HyperWorks is the growing list of partner solutions within the [HyperWorks Partner Alliance](#). The partner solutions are available to HyperWorks customers through their existing HyperWorks licenses.

### **Creating the most sophisticated multi-physics solver platform**

Altair's addition of [AcuSolve](#) expands the HyperWorks solver breadth into the CFD space, bringing a powerful CFD solution to designers and research engineers at all levels of expertise. [AcuSolve](#) enables engineers to quickly obtain quality solutions and solve the largest and most complex mission critical industrial problems, especially for transient flow and fluid-structure interaction.

The [RADIOSS](#) finite element solver in HyperWorks 11.0 can perform new analysis types, including response spectrum, complex eigenvalues and pre-stressed normal modes, as well as material and geometric non-linear implicit analysis. [RADIOSS](#) now provides a breakthrough in performance with an advanced mass-scaling technology and a new multi-domain implementation that increases the speed and accuracy of detailed explicit simulation.

### **Increasing productivity through improved usability and new HyperMesh capabilities**

HyperWorks 11.0 modernizes the CAE modeling and visualization environment by integrating the power of two industry leaders, [HyperMesh](#) and [HyperView](#), into one desktop framework solution. In addition, significant improvements to the look and feel help to create the most easy-to-use interface yet.

In HyperWorks 11.0, [HyperMesh](#) expands on its dominance in meshing technology, adding acoustic cavity meshing and extensions to mid-surface algorithms, as well as full 3D visualization of shell and beam models in the modeling environment.

### **Embedded collaboration tools new in HyperWorks**

Altair HyperWorks now includes a new set of collaboration tools, providing out-of-the-box enterprise capabilities that transform the enterprise CAE data and process management into a natural and enjoyable experience. These capabilities, tightly integrated with the HyperWorks desktop applications, bring an intuitive user-centric experience for managing personal and team CAE data and processes without leaving the familiar HyperWorks environment.

### **Design and optimization improvements**

Enhancements to [OptiStruct](#) advance the state-of-the art in design optimization—the key to simulation-driven innovation—for geometric and material non-linear problems. [OptiStruct](#) now adds multi-start point optimization to avoid becoming locked within a local solution.

### **Multi-body dynamics solution improvement**

HyperWorks 11.0 supplies a customizable end-to-end multi-body solution across many use-cases and disciplines. For example, in automotive and mechanism design, a full vehicle wizard supports HTire and FTire applications in the HyperWorks [MotionView](#) and [MotionSolve](#) solutions. In [MotionSolve](#), control systems capabilities are greatly improved.

### **Enhanced engineering and manufacturing solutions**

The new release offers more knowledge capture capabilities for vertical processes in engineering and manufacturing. It provides new user profiles for CFD and for simulation of noise and vibration, crash testing and drop tests. [Durability Director](#) becomes available for solving durability tests from load assessment to life estimation.