

## Press Release



# U.S. Navy Funds Noran Engineering and ShipConstructor Software on Software Project for Ship Production

## Collaboration Will Provide Software Tool to Enable Damage Free Handling of Ship Components During Construction

**Westminster, CA. May 30, 2006.** Noran Engineering, Inc. ([www.NEiNastran.com](http://www.NEiNastran.com)), a leading developer of NEi Nastran finite element analysis (FEA) software announced a collaborative effort with ShipConstructor Software ([www.ShipConstructor.com](http://www.ShipConstructor.com)), a developer of 3D product modeling software for the maritime industry, to develop a program that will solve a major production problem in shipyards with safe, damage free lifting and handling of ship components during construction. The U.S. Navy will fund this effort through the Small Business Innovative Research program (SBIR).

In shipyard construction, significant costs are incurred and valuable production time is lost in repairing components that are distorted when moving material and interim products within the yard.

Lifting and handling procedures typically are the result of acquired knowledge by long time employees. This valuable information and expertise is acquired mainly through trial and error and is subject to loss through attrition or reassignment in the workforce. The new software, code-named ShipLift, will automatically calculate the proper pick up points and maintain a digital knowledge base that will always be available. A streamlined 3D product data model of the structure will be created in ShipConstructor's design software. NEi Nastran FEA will analyze the model for stresses and strains on the plates, sub-assemblies and full assemblies. Pick up points will then be



**The U.S. Navy will fund ShipLift by Noran Engineering and ShipConstructor USA. The software will automatically determine proper lifting points for ship components used in construction that avoid distortion and damage.**

identified that provide safe, distortion free lifting and handling. The lifting calculation results and operator handling instructions are then written back to the ShipConstructor product data model database utilizing the new ShipConstructor API with time stamps. Thus the product data model is the central repository for this information and changes to the model will trigger requests for redoing the NEi Nastran FEA calculations.

Patrick Cahill, President and CEO of ShipConstructor Software USA, Inc. (SSI USA), remarked on the project, "We are excited to have the opportunity to bring this tool to the shipbuilding industry. Shipyards can become more efficient, eliminate the high cost of rework, avoid expensive disruptions in their production cycles, and provide more timely delivery to customers." Dave Weinberg, CEO of Noran Engineering, added, "This project is a good illustration of how our NEiNastran FEA software can easily and economically be modified to accomplish value added tasks for the entire shipbuilding industry".

Images connected with this story can be viewed and downloaded at <http://www.nenastran.com/pressReleaseImage.php>.

**About Noran Engineering, Inc., [www.NEiNastran.com](http://www.NEiNastran.com)**

Noran Engineering, Inc. (NEi) is a leader in finite element analysis software with a complete suite of tools for structural, thermal, dynamic, fluid flow, fatigue, and optimization in the aerospace, automotive, maritime, military, medical, and consumer product industries. The core product, NEiNastran, runs on Windows, Linux, and UNIX platforms.

Telephone: 714-899-1220 Email: [info@noraneng.com](mailto:info@noraneng.com).

**About ShipConstructor Software Inc., [www.ShipConstructor.com](http://www.ShipConstructor.com)**

ShipConstructor Software Inc. (SSI Canada) provides 3D product modeling and design software for the shipbuilding and offshore structure industry worldwide, utilizing fully integrated task-based modules that produce 3D design models, production drawings, production planning, and NC coding.

Telephone: +1(888)210-7420 Email: [Info@ShipConstructor.com](mailto:Info@ShipConstructor.com)

**About ShipConstructor Software USA, Inc., [www.ShipConstructor.com](http://www.ShipConstructor.com)**

ShipConstructor Software USA, Inc. (SSI USA) is SSI CA's independent partner in the United States providing integration and consulting services to the ShipConstructor user base.

Telephone: +1(251)751-6622 Cellular Email: [Patrick.Cahill@ShipConstructor.com](mailto:Patrick.Cahill@ShipConstructor.com)

**Marketing Contact:**

Dennis Sieminski, P.E. | Noran Engineering, Inc.

5555 Garden Grove Blvd. | Suite 300 | Westminster | CA | 92683

Telephone: 714-899-1220 Ext. 207 | Email: [dennis.sieminski@noraneng.com](mailto:dennis.sieminski@noraneng.com)

Website: [www.NEiNastran.com](http://www.NEiNastran.com)

Silke Sommerfeld, Marketing Manager | ShipConstructor Software Inc.

#304-3960 Quadra Street | Victoria | BC | V8X 4A3 | Canada

Telephone: +1(250)479-3638 | Email: [Marketing@ShipConstructor.com](mailto:Marketing@ShipConstructor.com)

Website: [www.ShipConstructor.com](http://www.ShipConstructor.com)