Synopsys Releases LucidShape CAA V5 Based Beta Version for Automotive Lighting Simulations

Enables Fast, Accurate Optical Simulation and Analysis of Automotive Lighting Products with Minimal Learning Curve for CATIA V5 Users

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Highlights:

- Enables CATIA V5 users to leverage powerful LucidShape features to produce automotive lighting designs that meet performance, styling, visual branding and regulatory requirements
- Supports fast, accurate simulations of automotive lighting part-level models and product-level assemblies
- Delivers a comprehensive suite of optical analysis tools
- Provides a hierarchical display of project components for easy navigation of highly complex models

Synopsys, Inc. (Nasdaq: SNPS) today announced the beta version availability of its LucidShape® CAA V5 Based software product for the design, analysis and verification of automotive exterior lighting designs. LucidShape CAA V5 Based software is an interactive tool that allows designers to perform optical simulations and analyses of automotive lighting products within the CATIA V5 environment. Because of the tool's complete integration within CATIA V5, designers who are familiar with CATIA can easily leverage LucidShape's powerful features to produce, with a minimal learning curve, automotive lighting products that meet performance, styling, visual branding and regulatory requirements.

The integration of the LucidShape tool with CATIA V5 provides designers with powerful new capabilities to ray trace and predict optical performance of complex, state-of-the-art automotive lighting products. LucidShape CAA V5 Based software's results can be evaluated for compliance with industry regulations or customer-defined performance requirements prior to physical prototyping and fabrication, resulting in cost savings and quicker time to market.

"LucidShape CAA V5 Based software can be easily integrated into CATIA users' current workflows," said George Bayz, vice president and general manager of Synopsys' Optical Solutions Group. "The software offers an abundance of optical simulations and data analyses that it performs with speed and accuracy. Automotive lighting designers can hand off their models to manufacturing with confidence that the end products will meet specifications."

Key features and benefits of LucidShape CAA V5 Based software include:

- **Rapid design verification within the CATIA V5 environment.** The software can rapidly and accurately ray trace part-level models or product-level assemblies, providing the most comprehensive CATIA-based optical simulations available. The software supports tessellated, non-uniform rational basis spline (NURBS) and GPUTrace™ simulation methods, as well as multi-core processing to further accelerate simulations.
- **Full suite of optical analysis tools.** The software delivers a comprehensive spectrum of UV data analysis tools, as well as bird's eye and driver's views. A large set of test point standards are included to ensure that your system meets both industry regulations and company specifications.
- **Easy visual navigation of complex models.** The software's highly efficient specification tree structure keeps all automotive lighting components organized and accessible from a single location.

"LucidShape CAA V5 Based software streamlines the automotive lighting design, simulation, and analysis process," said Jason Smith, optical engineering manager at Grakon, LLC. "The software's seamless integration with CATIA greatly improves my workflow efficiency by eliminating data transfers. In addition, the well-organized, consistent interface enables an easy transition from other ray tracing tools. Simulations can be performed quickly and accurately using LucidShape NURBS, tessellated, or GPUTrace methods. Overall, the software is a pleasure to use."

About Synopsys LucidShape Products

Synopsys' LucidShape products provide a complete set of design, simulation and analysis tools for automotive lighting. With dedicated algorithms tailored for automotive applications, LucidShape facilitates the design of automotive forward, rear and signal lighting reflectors and lenses. In addition, the LucidDrive® tool provides the ability to perform virtual night driving simulations that generate realistic lighting scenes in real time, which allows designers to quickly and accurately evaluate beam patterns for exterior automotive lighting applications on the road, traffic signs and surroundings prior to expensive fabrication and testing. For more information,

visit http://optics.synopsys.com/lucidshape.

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