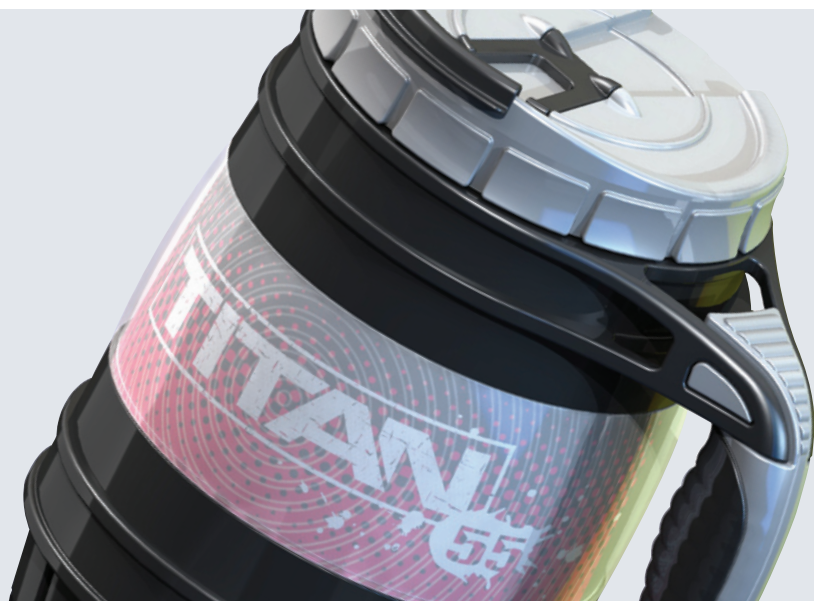


Cool Gear International Inc.

EXPANDING BOTTLE AND FOOD STORAGE CONTAINER DEVELOPMENT WITH SOLIDWORKS



Using SolidWorks software, Cool Gear has more control over its designs when working with overseas manufacturing partners, saving time and improving quality in the process.

- Increased new product development by 25 percent
- Compressed design cycles
- Improved design visualization
- Reduced costs related to prototyping, scrap, and rework

Cool Gear International Inc. designs, manufactures, and markets an innovative line of freezer bottles, storage containers, and entertaining products that use a reusable “freezer gel” to keep drinks and food cold longer. The company’s fun, colorful product line grew out of the imagination of a talented team of artists and product designers. As Cool Gear’s product line expanded and its manufacturing operations moved offshore, however, the Adobe® Photoshop® and Illustrator® graphics packages it used to create design concepts could not provide the degree of accuracy or automation required to support large-scale manufacturing operations, according to Cool Gear Designer John Mason.

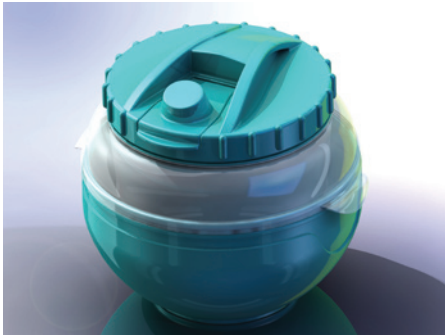
“We did not use a CAD system because the product development team has a strong graphic design background and could create conceptual 2D designs using graphics packages,” Mason recalls. “When we began having some issues working with overseas manufacturers, we realized the need for a 3D CAD system. In addition, we had encountered data translation problems and difficulties in communicating our ideas solely in 2D. We believed that a 3D CAD system not only would provide greater accuracy, but also would give us greater control over the final design, resulting in less variability and creating the efficiencies we needed to support an expanding product line.”

Cool Gear representatives spoke with resellers for the AutoCAD®, Pro/ENGINEER®, and SolidWorks® 3D CAD systems, and quickly narrowed their choice to SolidWorks Professional software. The company chose SolidWorks software because of its ease of use, advanced surfacing capabilities, photorealistic rendering functionality, broad data compatibility, and superior service and support.

“As soon as we looked at SolidWorks, we recognized it was the best fit. SolidWorks provides the perfect bridge between creative design and CAD modeling,” Mason explains. “We also liked the FeatureManager® because it provides an easy-to-learn method for going back and modifying designs when necessary.”

“The improved visualization we enjoy with SolidWorks helped us to do a better job on that design. As a result, we were able to create a higher-quality product, while reducing the design cycle and minimizing scrap at the same time.”

John Mason, Designer



With SolidWorks software, Cool Gear can support its own rapid prototyping process, handling more than 90 percent of its rapid prototyping needs in-house.

Gaining design control saves time, improves quality

By implementing SolidWorks software, Cool Gear gained a firmer command of final product geometry. Rather than relying on a manufacturer's interpretation of a 2D drawing, the company could create complex surfaces and shapes in 3D. In addition to realizing greater control over the look of its products, the company streamlined the process of resolving production issues, which resulted in shorter design cycles and improved quality, as well as less scrap and rework.

“The aesthetic look, overall form, and actual function of a design does not translate as well in 2D as it does in 3D,” Mason explains. “More of our products involve multiple pieces, such as our large-capacity Cereal on the Go container, which was the first product we developed in SolidWorks. The improved visualization we enjoy with SolidWorks helped us to do a better job on that design. As a result, we were able to create a higher-quality product, while reducing the design cycle and minimizing scrap at the same time.”

Rapid prototyping reduces development costs

The move to SolidWorks also enabled Cool Gear to support an internal rapid prototyping capability, which gives the company greater flexibility and minimizes external prototype development costs. Cool Gear uses SolidWorks 3D CAD models and its Dimension SST1200 3D printer to produce plastic prototypes quickly and easily.

“With SolidWorks and our 3D printer, we have been able to speed up the prototyping process and now handle more than 90 percent of our prototyping in-house,” notes Mason. “There is just no substitute to holding the physical design in your hand. Before implementing 3D CAD, we had to wait on prototypes, which often did not match what we envisioned. Generating rapid prototypes from SolidWorks models allows us to refine designs and produce physical models as needed.”

Boosting new product development

As a result of choosing SolidWorks software, Cool Gear increased new product development by 25 percent in just one year. Mason, who had never used a CAD system before, says he was able to realize the benefits of 3D quickly due to the intuitive nature of SolidWorks and the high-quality training and support provided by Computer-Aided Products, Inc., Cool Gear's SolidWorks reseller.

“As a graphic artist moving into the realm of engineering software, I needed a CAD system that was easy to use, accurate, and powerful,” Mason stresses. “SolidWorks has met our needs at every step, enabling us to generate more ideas, creative concepts, and prototypes. The move to SolidWorks has energized our new concept development to the extent that we are now pushing our manufacturing partners to keep up.”



Dassault Systèmes SolidWorks Corp.
300 Baker Avenue
Concord, MA 01742 USA
Phone: 1 800 693 9000
Outside the US: +1 978 371 5011
Email: info@solidworks.com
www.solidworks.com



Cool Gear International Inc.
10 Cordage Park Circle
Plymouth, MA 02360 USA
Phone: 1 508 830 3440
www.coolgearinc.com
VAR: Computer-Aided Products, Inc.,
Peabody, Massachusetts