

TCOM Streamlines Their Design Process with SolidWorks

Industry : Lighter-Than-Air Vehicles
Previous CAD : SolidDesigner
Website : www.tcomlp.com

TCOM

Columbia, Maryland

The Challenge

For over 35 years, TCOM has been the industry leader in the design and manufacturing of tethered aerodynamically stabilized balloons, otherwise known as aerostats. These versatile “lighter-than-air” systems can be deployed in a wide variety of environments, including arctic, tropical, and desert conditions as well as mountainous territory. Lighter-than-air vehicles are also highly adaptable in their ability to operate from fixed, transportable, or sea-based sites.

As the only company in the world that designs, manufactures, installs, and operates aerostats, TCOM faces a high demand for their services from U.S. and foreign governments, as well as private corporations. Consequently, the company knew it would be necessary to use superior CAD software to design their products in order to produce the highest quality vehicles.

The Solution

“Even after using SolidWorks for a short period of time, we saw a great number of advantages over our old CAD software.”

Han Phan
Mechanical Engineer



TCOM found their answer as a customer of TriMech Solutions. TriMech introduced the company to a leading CAD program with innovative features, SolidWorks. Making the switch from their old software to SolidWorks provided them with the change they needed. Not only did SolidWorks add more capabilities for the engineers, such as parametric functionalities, but it also offered a wide range of advantages they had never previously enjoyed.

Immediately after switching to SolidWorks, these advantages were clear. Engineers could now capture their design intent, and in the future could reuse the CAD data and models for analysis and further design. The company also observed greater unification between the software engineering and the drafting of their products. This allowed a highly streamlined design and production process, which made the company as a whole more efficient. With these clear benefits from using SolidWorks, the company knew that making the switch was a profitable decision.

Summary and Metrics:

- Significantly reduced drafting and engineering coordination time
- Increased overall production efficiency