

Industrial machinery

UWC Holdings

Using Solid Edge helps UWC holdings improve product engineering design cycle by 50 percent

Product

Solid Edge

Business challenges

Produce high-quality, lower-cost products faster

Work seamlessly across different CAD systems

Deliver high-value, meeting or exceeding customer expectations

Keys to success

Make it fast and right the first time

Engage synchronous technology for error-free, multi-CAD file sharing, design freedom, easy handling of large assemblies and knowledge re-use

Employ built-in PDM to improve data management

Use built-in simulation to increase product quality

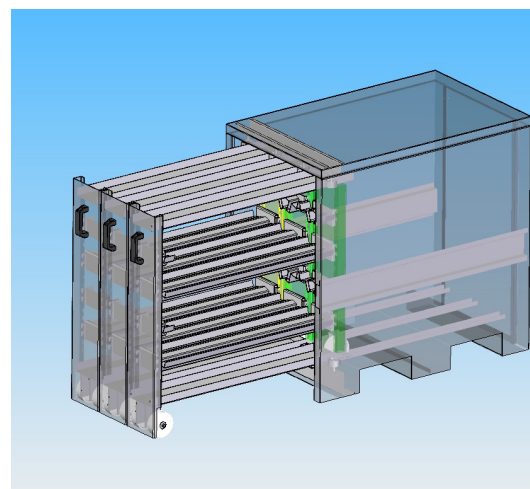
Utilize technology tools to improve collaboration with suppliers

Leading Malaysian contract manufacturer significantly reduces product manufacturing cycle time, engineering turnaround and design errors

One-Stop Center

Since its establishment in 1990, UWC Holdings Sdn. Bhd. (UWC) has been a "one-stop center," working closely with suppliers to produce top-quality solutions, improve time-to-market and lower the overall cost of production.

"Our principal activity is to help our customers by providing value-added contract manufacturing and assembly solutions," says Dato' Ng Chai Eng, CEO and co-founder of UWC. "We create complete, reliable automation solutions, building everything from simple cells with a single machine and a robot loader to large systems.



"To maintain our reputation and undertake both high-volume and customized integration activities, we use only the best equipment and the best software. Partnering with product lifecycle management (PLM) specialist Siemens Digital Industries Software allows us to maintain our exten-

"...our design time for a typical server rack has almost been halved from four weeks to two weeks..."

Dato' Ng Chai Eng
CEO and Co-founder
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Results

Reduced product development cycle time by 50 percent, including reducing design time from 4 weeks to 2 weeks

Reduced manufacturing cycle time by 15 percent

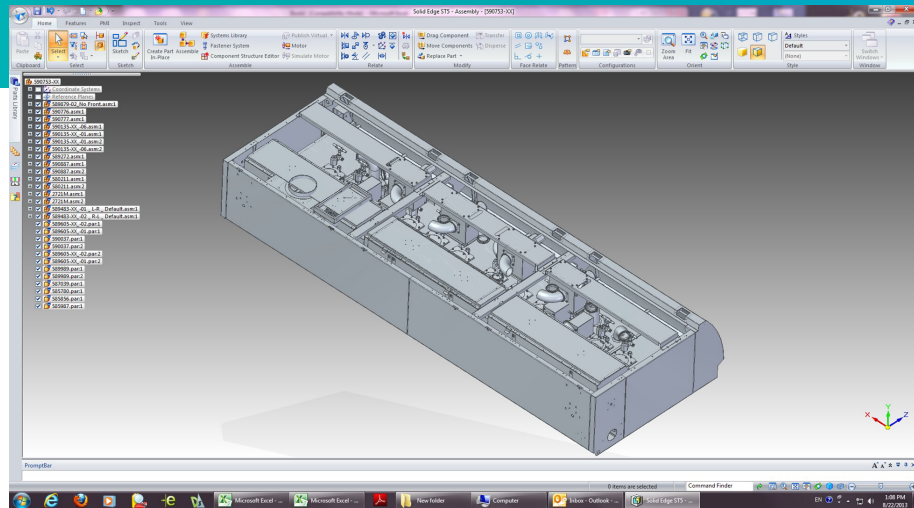
Increased efficiency across operations, including virtually eliminating errors from imported data, saving significant time in working with large assemblies and substantially increasing the use of existing data for new projects

Established best practices, including with suppliers, for continuous innovation

Delivered higher quality and value across portfolio, notably improving customer satisfaction

"Today's business environment is very demanding and challenging. To stay competitive, we have to leverage ever-evolving technology with absolute efficiency. When it comes to technology in PLM solutions, Siemens Digital Industries Software has been a natural choice for us."

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CEO and Co-founder
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sive integration experience, strengthen our production machining solutions and applications, and help our customers achieve the best possible advantages in today's competitive landscape."

UWC has a customer-focused business culture and takes steps to advance its core business processes so that they correctly define and fulfill customer requirements. Customer satisfaction hinges predominantly on the quality of UWC products.

"Where we are today is a result of close cooperation, and being able to meet and exceed customers' needs time and again," says Dato' Ng. "With assistance from Siemens Digital Industries Software, our design time for a typical server rack has almost been halved, from four weeks to two weeks. UWC has evolved to rapidly meet market needs and technological advancements. Accepting positive changes is part of our culture. The attitude and acceptance of change for continuous growth and all-around improvement are key to our success."

UWC's mission to provide quality products in all areas, with on-time delivery at the right cost, is also supported by Siemens Digital Industries Software partner Hitachi Sunway Information Systems Sdn. Bhd.

UWC has been using Solid Edge® software from Siemens Digital Industries Software for years to help the company shorten product development cycle time by accelerating the design cycle and developing products more efficiently. "Today's business environment is very demanding and challenging," says Dato' Ng. "To stay competitive, we have to leverage ever-evolving technology with absolute efficiency. When it comes to technology in PLM solutions, Siemens Digital Industries Software has been a natural choice for us."

Accelerating design while reducing errors

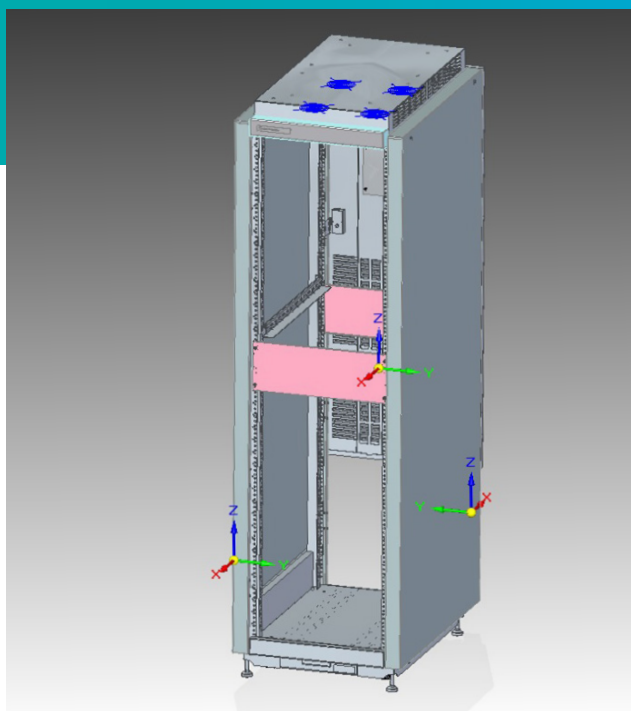
The engineering department was determined to make its daily processes more efficient. "Before Solid Edge, we used SolidWorks, and engineers were spending

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too much time with changes using parametric-based design,” says Y.B. Chong, engineering manager at UWC. “This software did not feature synchronous technology, which meant the time spent to execute engineering changes increased exponentially, especially when it involved a large assembly. The amount of time that we lost was significant. The synchronous technology provided by Solid Edge helps us eliminate time-wasting activities.”

The use of Solid Edge also helps UWC eliminate the need to pre-plan new designs and enables time for innovation, because engineers and designers no longer need to spend time studying design history and dealing with previous errors. Solid Edge enables UWC to easily edit foreign data and cut down time spent redrawing parts, especially those involving modifications on 3D models. Taking advantage of synchronous technology, a tool that supports bulk data migration across platforms, UWC has realized a 15 percent faster production rate, something that UWC engineers say was not possible prior to using Solid Edge.

Chong notes that using Solid Edge enables UWC to deliver continuous improvements to its machinery, optimizing design integration and supply chain collaboration to turn out products with exceptional value. The software’s built-in simulation capability helps improve design integrity, while enhanced visual tools help engineers readily understand complex data.



The use of Solid Edge has also enabled UWC to accelerate its engineering process, make faster revisions and substantially improve data re-use. In addition, the software enables UWC to use fewer resources on each project, which results in the increased the efficiency of each design engineer.

Working natively with CAD data from multiple systems

Solid Edge merges design management capabilities with the advanced computer-aided design (CAD) technology that designers use every day. Many of UWC’s customers work with different CAD

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“Partnering with Siemens Digital Industries Software allows us to maintain our extensive integration experience...”

Solutions/Services

Solid Edge

siemens.com/solidedge

Customer's primary business

UWC is one of the largest contract manufacturers in Northern Malaysia, specializing in producing precision components, electromechanical parts, sheet metal fabrication and machine assemblies. UWC's capabilities and infrastructure have positioned the company to support major equipment makers in the region, including original equipment manufacturers (OEMs) across diverse industries: automation and engineering, elevators and escalators, healthcare and medicine, security, semiconductors and telecommunications. www.uwcholdings.com

Customer location

Penang
Malaysia

Solution Provider Partner

Hitachi Sunway Information Systems
www.hitachi-sunway-is.com

“Redrawing entire CAD models is no longer necessary. This feature of Solid Edge alone has saved us hours of re-work, making our processes more streamlined and productive.”

YB Chong

Manager of Engineering Department
UWC Holdings

systems. It is not cost-effective for UWC to use multiple CAD solutions, and Solid Edge enables the company to eliminate this expense. Moreover, Solid Edge provides scalable product data management (PDM) technology to manage design data and improve collaboration, while eliminating the errors that typically result from data import from various systems.

“Solid Edge is the choice for UWC when it comes to dealing with CAD data from different systems,” says Chong. “Solid Edge enables our engineers to re-use the data provided by customers. We can open up the CAD data and edit it as if it is native data created using Solid Edge. Redrawing entire CAD models is no longer necessary. This feature of Solid Edge alone has saved us hours of re-work, making our processes more streamlined and productive.”

Chong points out that before using Solid Edge, UWC spent more than twice as many hours importing and manipulating data than it does today. He notes,

“Changes are made in response to requests from customers, but they can also be initiated by the designers themselves to continuously improve products. Solid Edge with synchronous technology is exceptionally easy-to-use, providing our engineers the freedom and flexibility to create and modify designs in a timely manner.”

High quality, high value and high returns

UWC has reduced the time it spent on the product development 50 percent. A significant part of the time-savings was realized by reducing design errors and by accelerating the modification and updating of large assemblies. These improvements have helped deliver higher quality and value across the company's product portfolio, notably improving customer satisfaction and enhancing the company's strong market reputation.

Siemens Digital Industries Software

Americas +1 314 264 8499
Europe +44 (0) 1276 413200
Asia-Pacific +852 2230 3333

siemens.com/software

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