

# ARCHITECTURE, ENGINEERING & CONSTRUCTION FAÇADE DESIGN FOR FABRICATION

Connect your façade data from concept through fabrication



## BRING THE HIGHEST PERFORMANCE TO YOUR ENCLOSURE

Construction projects see waste at levels of more than 25 percent, much of it related to the building façade. Waste comes from redundant design, unused stored materials, idle workers, installation rework, and other factors.

Most BIM technologies today disconnect the production of permit drawings from the fabrication and installation processes. This can lead to errors and requests for information.

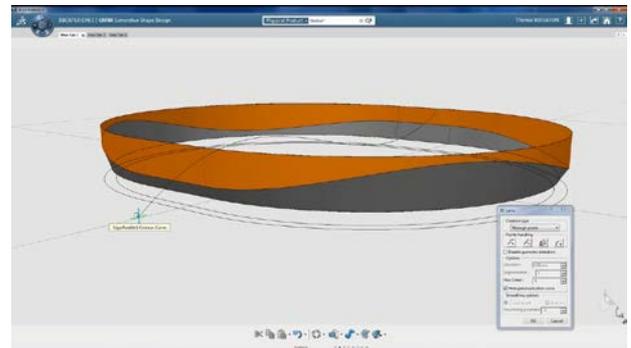
Because this software has limited capability to produce 3D design geometry direct for fabrication, façade designers are limited in achievable complexity for unique facades.

When projects call for numerous unique types and shapes of façade panels, it becomes increasingly difficult to manage delivery sequence and installation processes.

## AN END-TO-END SOLUTION FOR THE FAÇADE DESIGN PROJECT

The *Façade Design for Fabrication* Industry Process Experience, built on the cloud-based collaborative **3DEXPERIENCE**® platform efficiently and consistently covers project requirements end-to-end: from planning and design to fabrication and execution.

Design and simulate any building envelope from the conceptual level down to the profiles and fasteners. Design and document: metal panel, glazed, double curvature, pneumatic, tensile, and other cladding in the installed and unfolded patterned states.



*Free-form design made with a combined curve.*

Use integrative, parametric, associative and computational modeling methods to increase productivity and optimize project value through iterative design.

**Façade Design for Fabrication** promotes a highly collaborative approach linking the appropriate technologies. Combine talent, technique, and technology to deliver high performance, value, and efficiency while reducing waste and embodied energy.

## KEY BENEFITS OF FAÇADE DESIGN FOR FABRICATION

### The capability to design anything

Comprehensive modeling capabilities and the scalability of the cloud.

### Design for manufacturing and assembly

Achieve total project control. Reduce waste and rework by extending models into manufacturing and assembly.

### Single 3D version of the truth

“Same page” authoring tools scale to huge amounts of data, enabling coordination across all stakeholders.

## The power of 3DEXPERIENCE

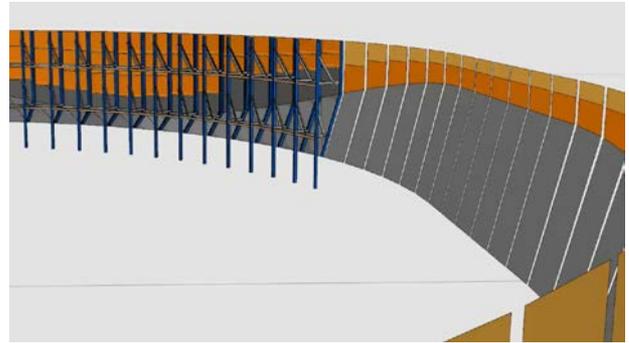
A multi-BIM approach to project development using a truly collaborative, data-centric environment. Enable simultaneous, real-time access to project data and design models across multi-disciplinary stakeholders. Integrate multiple CAD and BIM formats and data sources with the Dassault Systèmes AEC Data Model.

## IN SUMMARY

Create more unique façades when fabricators and product manufacturers work directly from design documents. Use more intelligent models to reduce construction waste through improved site logistics and less installation rework.

Use lessons learned from other industries—including automotive, aerospace, and manufacturing—on how collaborative, integrative design can boost efficiency across the project lifecycle.

Gain significant competitive advantages from concept through fabrication with **Façade Design for Fabrication**.



*Create a design assembly instance automatically.*

## Our 3DEXPERIENCE platform powers our brand applications, serving 12 industries, and provides a rich portfolio of industry solution experiences.

Dassault Systèmes, the 3DEXPERIENCE® Company, provides business and people with virtual universes to imagine sustainable innovations. Its world-leading solutions transform the way products are designed, produced, and supported. Dassault Systèmes' collaborative solutions foster social innovation, expanding possibilities for the virtual world to improve the real world. The group brings value to over 210,000 customers of all sizes in all industries in more than 140 countries. For more information, visit [www.3ds.com](http://www.3ds.com).



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