



CASE STUDY



Santa Barbara City College, West Campus Center

Santa Barbara, California

The use of standard framing systems in the glazing business is quite common, but when designers use those systems in unconventional ways to create visual interest in their buildings, it can also provide some installation challenges. In this SCGMA Case Study, we look at how solving those subtle challenges led to a most remarkable glass installation.

Project Team

Architect:

*Kruger Bensen Ziemer Architects Inc. (KBZ)
Thierry H. Cassan, AIA,
Principal Architect*



Construction Manager:

*Lundgren Management
Gina De Tolve,
Senior Project Manager*



SCGMA Glazier:

Santa Barbara Glass Co



Design & Delivery

The new West Campus Center design provides a 33,000 square foot multi-story educational facility with 23 classrooms, 15 faculty offices, conference, break rooms, and featuring exterior terraces with ocean views. Designed by Kruger Bensen Ziemer Architects Inc. (KBZ) and completed in 2018, the project was built by Lundgren Management as the Construction Manager utilizing a Multi-Prime delivery method.

Following the Multi-Prime scope of work prepared by Lundgren Management, Santa Barbara Glass competitively bid the project and was awarded the project. The scope not only included furnishing and installing the glazing systems, but also a series of unique curved resin panels suspended from the structure to provide a shading system.

Unique Glass Façade Challenges

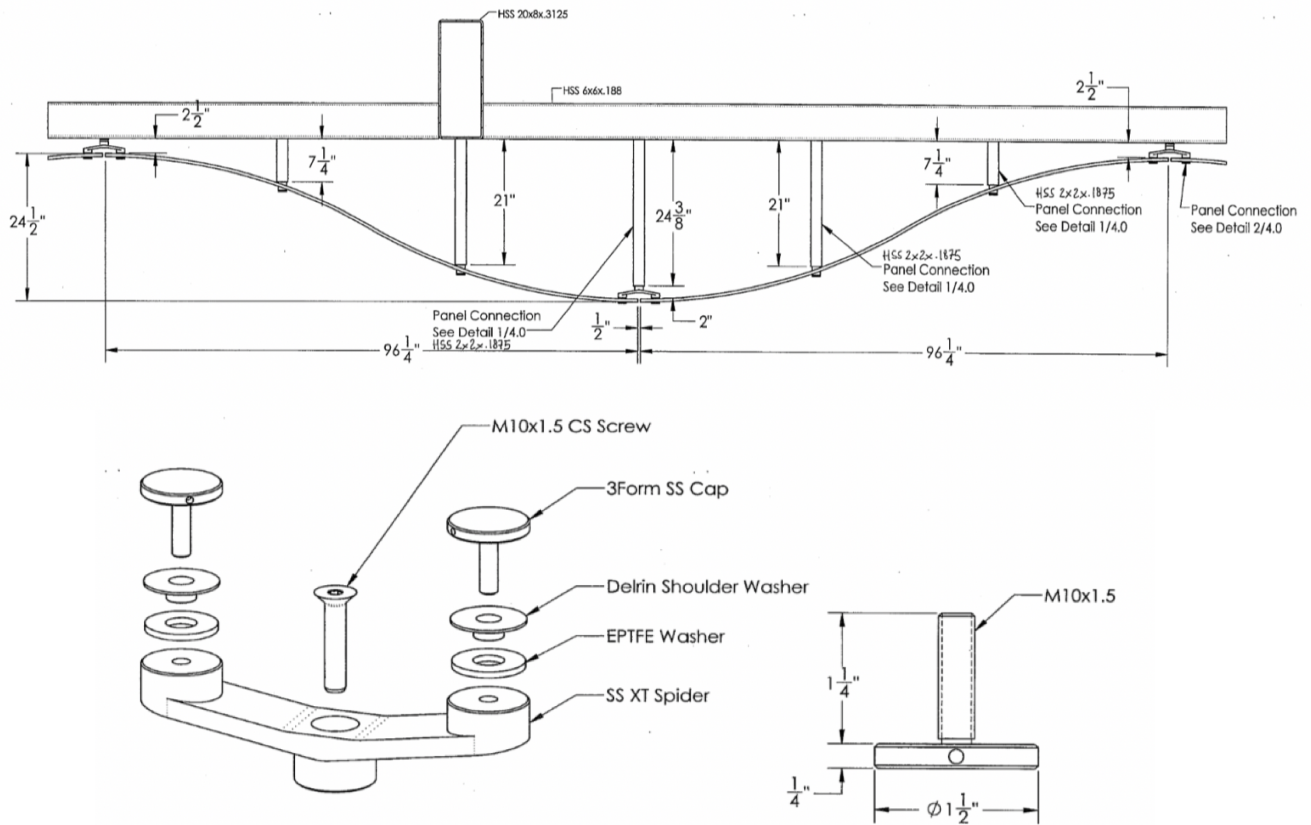
“The geometry of the window walls and curtain walls created some irregular engineering concerns”, said Santa Barbara Glass President Dan Hope. “The diagonal mullion installation obviously increased the

span between anchor points, but we also had to look at the glass deadloads as they were potentially bearing on the verticals as well as the horizontals. The layout of the curtain wall anchors was also a challenge, having to match them to the various angles of the mullions.”

“Close attention had to be paid to slight cutting angles of the horizontal joinery to insure proper fit and finish. When preparing the openings for glass, sealant application was of particular concern given these angles as to insure adequate water management. Glass was then field measured, generating a series of patterns that required close coordination with our glass fabricator.”

Some challenges can come from dealing with new suppliers. The suspended ‘S’ shaped resin canopy material, referred to as the “potato chips”, were engineered and furnished by 3Form, a leading manufacturer of architectural decorative resin and glass products. The system required an exacting layout and installation of stainless-steel stand-offs to the overhead trellis structure, followed by the installation of the ½” thick resin panels from 60 foot boom lifts.





Collaboration

Collaboration is an important element of these types of unique projects, requiring the best of our problem solving skills to benefit the project. To that end, “Santa Barbara Glass was a valued partner and provided an excellent work” said Thierry H. Cassan AIA, Principal with KBZ Architects.

“Even with Prime contracts and their defined scope of work, we really count on our key contractors to coordinate that scope and work with the overall team” said Gina De Tolve, Director of Construction Management for Lundgren. “Santa Barbara Glass met that challenge and was great partner at problem solving, providing an exceptional installation.”

Lessons Learned

“As a prime trade contractor you don’t get to pick and choose your scope or excluded anything. This was a complicated and challenging project for us but in the end it was a successful one”, said Dan Hope. Thankfully our talented Union Journeymen were up to the challenges.”

Awards and Recognition

- The West Campus Center was originally designed with a Leadership in Energy and Environmental Design (LEED) goal of Silver. However, the target goal was expanded to achieve LEED Platinum, which was accomplished.
- 2018 CCFC Professional Design Award, Award of Excellence
- 2018 AIASB Design Award, Honorable Mention for Commercial Building and Interiors

SCGMA represents a large variety of glazing firms with decades of experience and special talents for finding solutions on the most complex projects. Contact SCGMA to see how our members could provide assistance on your project.