

Otay Mesa Land Port of Entry Modernization and Expansion

CMAA Sustainability Project Spotlight submitted by: Luis Espinosa, Senior Director of Projects, Hill International, Inc.

Project Team

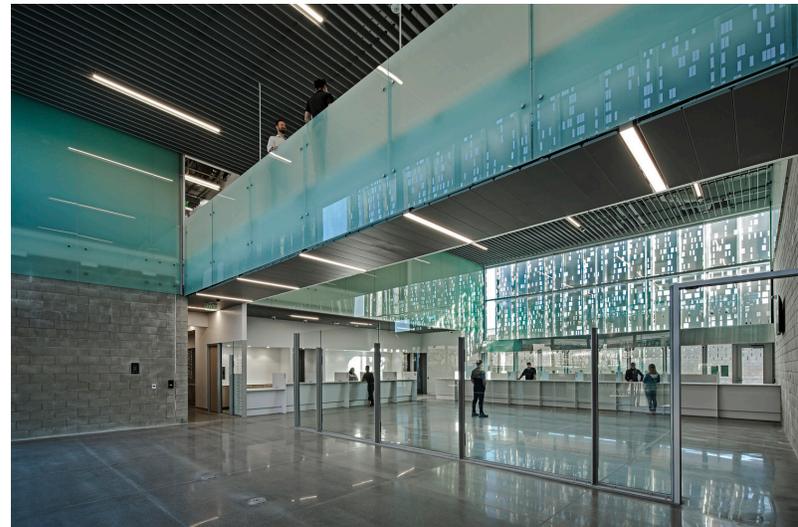
- » **OWNER:** [U.S. General Services Administration \(GSA\)](#)
- » **OWNER'S REPRESENTATIVE:** Hill International, Inc.
- » **AE:** Gruen Associates, Jones Studio
- » **BUILDER:** Clark Construction, Guy F. Atkinson Construction

Project Statistics

- » **USE:** U.S. Land Port of Entry (LPOE)
- » **SIZE:** More than 130,000 sq. ft. of new construction plus landscaping and paving over nearly 10 acres
- » **CONSTRUCTION VALUE:** \$141 Million
- » **CERTIFICATION(S):** LEED Gold, SITES Silver, Net Zero Energy (Commercial Annex Building), Net Zero Energy Ready (all other new buildings)

What is the most exciting sustainable feature of your project?

The Otay Mesa Land Port of Entry (LPOE) Modernization and Expansion project features an array of sustainable features,



such as energy efficient envelopes and glazing; reused or sustainably sourced building materials; canopies covered with solar panels to capture solar energy and provide shade to pedestrians; a bio-retention and stormwater filtration system and facilities to treat all surface water run-off from the project site; and infrastructure for future electric vehicle (EV) improvements.

The most exciting and visible sustainable features are the LPOE's new native, drought-tolerant plantings. Complete with signage to help pedestrians identify the flora, these plantings generally replace concrete, asphalt, or gravel, contributing to reduced temperatures across the site, supporting local biodiversity, and helping to manage stormwater. The plantings will also provide constant phytoremediation for the site, a process by which plants remove heavy metals and other contaminants, such as crude oil, solvents, and polyaromatic

hydrocarbons from soil, sediment, and water. This will help reduce long-term remediation costs associated with pollutants from motor vehicles passing through the LPOE.

What was the biggest challenge your team faced and how did you overcome it?

The Otay Mesa LPOE Modernization and Expansion project was a complex, multi-phase undertaking comprising new construction and renovations on an active, heavily secured federal facility used by multiple federal agencies, including U.S. Customs and Border Protection, the U.S. Department of Agriculture, the U.S. Food and Drug Administration, the Federal Motor Carrier Safety Administration, and U.S. Immigration and Customs Enforcement. Civilian construction workers had to coexist with federal agents and the tens of thousands of people passing through the LPOE every day, while meeting tight schedule deadlines and a complex set of scope requirements.

Plus, the renovated facilities often had undocumented conditions that were discovered only after construction had already commenced, leading to many time-sensitive and challenging decisions. To overcome these challenges, Hill maintained site security through security screening for different levels of clearances, badging protocols, and constant supervision, and created detailed checklists as verification tools to keep the scope in compliance with all relevant requirements from GSA and other tenant agencies.

What was the most interesting sustainable feature that didn't make it into the final project?

Though GSA originally planned to install 18 EV charging stations into the LPOE's new, two-story garage structure, the project team opted instead to incorporate only the infrastructure for the 18 charging stations. The team made this decision due to GSA's ongoing nationwide EV charging station Blanket Purchase Agreement (BPA) program. By waiting to install the charging stations through the BPA program, GSA will be able to take advantage of quantity discounts, save on administrative time, and reduce paperwork. 📄



South side of CAB for I-94 permit applications, featuring pedestrian canopies with solar panels and native plantings



Commercial Import lot queue for truck inspections, featuring native plantings and other lot improvements



Installation of below-grade stormwater storage - stored water will be used to irrigate the landscape as needed

About the Project

CMAA has created the Sustainability Project Spotlight as a regular focus given to member projects nationwide that are building the way to a better future.

[The Otay Mesa LPOE Modernization and Expansion](#) is a 130,000 square-foot project that built out an adjacent 9.9-acre lot adding new buildings along the port perimeter and renovated some existing facilities and was delivered via Design-Build contract.

The CMAA Sustainability Subcommittee is actively seeking to spotlight your projects! Please email us at communications@cmaanet.org with a project name and person to contact.

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