Mission Verde Center @ Cooper retrofit project

During the tenure of Mayor Phil Hardberger, former Chief of Staff Larry Zinn was charged with the task of producing a vision that would place San Antonio as the leading city in green technology, sustainability, and energy conservation as it relates to the economy of the city. The result from this initiative was presented in January 2009 with the title of Mission Verde: Building a 21st Century Economy. The document is comprised of the following eleven initiatives:

#1 - Build a 21st Century urban energy infrastructure in San Antonio with distributed energy.
#2 - Create a multi-tech venture capital fund in San Antonio.
#3 - Create a Green Jobs Program in San Antonio.
#4 - Use the City’s economic development strategies to foster development of a 21st Century sustainable economy.
#5 - Adopt a green, high-performance building code for new residential and commercial construction.
#6 - Build a Green retrofit Program for existing homes and buildings.
#7 - Create an integrated, efficient multi-modal transportation system for San Antonio.
#8 - Create new sustainable real estate development that is mixed-use, mixed income, walkable, and transit-oriented.
#9 - Create a Green One-Stop Center to coordinate sustainability efforts and to provide information to residents and businesses.
#10 - Address sustainability and resource efficiency across City facilities and departments.
#11 - Maximize the Energy Efficiency of all City Facilities.

Since then, the decommissioned Cooper Middle School, on the West Side of San Antonio, has been identified as the new home of the Mission Verde Center offices. In January 2010 newly appointed Mayor Julian Castro held the official opening for the Mission Verde Center @ Cooper. “Under the leadership of Mayor Julian Castro, Mission Verde Center @ Cooper will become a multipurpose education, training and research center for renewable and energy efficient technologies and water management and conservation demonstration.” The Center’s core partners include San Antonio ISD, Alamo Colleges, San Antonio Youth Centers, Texas A&M System Texas Engineering Experiment Station (TEES), City of San Antonio, CPS Energy, and San Antonio Water System (SAWS).

In the effort of envisioning the sustainable retrofit ideas incorporated into the existing building, Skip Mills and Dr. Matt Koch of TEES and Larry Zinn approached the UTSA College of Architecture to explore ideas for a future image of the building. Paul Whiteman and Brett Davidson, both Master of Architecture students, volunteered for this independent study opportunity under the guidance of Associate Dean Taeg Nishimoto. Through meetings with participating parties of the Mission Verde Center, Bob Shemwell, one of the partners at Overland Partners, agreed to take on the role of special advisor to the graduate students.

Whiteman and Davidson met regularly with TEES, who acted as “managing clients”, to discuss feasibility and various ideas on how to make the existing building architecturally better suited for the core mission of the center. The resulting design incorporates the array of photovoltaic panels on the roof where visitors can climb and view the panels up close. A rain water harvesting mechanism. The west sunlight preventing device on the west elevation of the building now works also a unique identity to the Center. “For the graduate students, it was an incredible opportunity to be involved in a project that makes a great impact on the sustainability and energy direction of the city of San Antonio”, said Associate Dean Nishimoto.