

2016 IHS Green Champion Award Winners

Energy & Fleet Management Award

Kotzebue Hospital Wind-to-Heat Energy Project

The Maniilaq Association, in cooperation with the Alaska Native Tribal Health Consortium and Kotzebue Electric Association, recently completed work on a unique renewable energy project, a wind-to-heat energy system, at the Maniilaq Health Center, a small rural hospital in Kotzebue, Alaska. The new system utilizes excess wind energy from KEA's 3-megawatt wind turbine farm and directs this extra energy to a 450-kilowatt electric boiler in the hospital. The boiler provides space heating at a discount and reduces the hospital's consumption of fuel oil. The project was jointly funded by grants from the Indian Health Service Environmental Steering Committee and the Alaska Energy Authority Renewable Energy Fund. In 2012, the hospital spent over \$2 million on energy costs and over \$1 million alone for fuel oil. The hospital consumes approximately 164,000-gallons of fuel oil annually. The new system is expected to cut the hospital's heating oil consumption by 20 percent and will save approximately 32,000 gallons of fuel annually.

Sustainable Design & Facilities Award

Southern California Youth Regional Treatment Center Project Team

The Southern California Youth Regional Treatment Center (SCYRTC) is a 35,455 square foot facility that provides residential substance abuse treatment services for American Indian/Alaska Native youth ages 12-17. The project achieved a LEED-HC 2009 Gold Certification even though only a Silver was required. Amongst other sustainable design features, the project achieved a 37% energy efficiency rate, 58% reduction in potable water consumption, and a diversion of 89% of construction waste from landfills. The DES Project Team worked collaboratively with the Designer of Record and the Construction Contractor to identify and overcome obstacles related to the implementation of sustainable design principles. Hence, each member of the team contributed in some way towards the successful implementation of sustainable design principles and LEED-HC 2009 Gold Certification. The team consisted of Bruce Kemmet (Project Manager), James Aberle (Architect), Nick Lu (Structural Engineer), Paul Ninomura (Mechanical Engineer), Samuel Vega-Cotto (Electrical Engineer), Michael Young (IHS Sustainability Coordinator), Leslie Thomas (Architect/Designer of Record), Michele Gargaon (LEED Coordinator) and Adam Heihn (Contractor Quality Control Manager).

Energy & Fleet Management Honorable Mention

Billings Area and Northern Cheyenne Service Unit Facilities Department

The scope of the project consists of replacing or upgrading existing light fixtures from current fluorescent and high pressure sodium lights to Light-Emitted Diodes (LED's) in both interior and exterior of the building. In addition, occupancy sensors for the lighting controls was installed at various work spaces. The improvements will directly reduce the consistent electrical base load consumption. The project cost was approximately \$330K with an eight year anticipated payback.