



## Hualapai Indian Nation Grand Canyon West, Arizona

### Design/Build Solar Photovoltaic Installation

The Hualapai Indian Nation, located predominantly along the Western edge of the Grand Canyon in Northern Arizona, partnered with APS Energy Services to design and construct a solar hybrid project to provide power to this remote region. The Tribe received a grant from the U.S. Department of Agriculture Rural Utilities Service to build electric generation and distribution infrastructure at Grand Canyon West. The project consisted of a 17 kW solar system at the air terminal and a 16 kW solar system at the residential area.



APS Energy Services installed one thousand feet of 4" underground conduit at the residential area of the Grand Canyon West site. This conduit run was installed for present and future distribution of electrical power. Three hundred feet of the distribution line furnishes electric power to a small trailer park, a dorm type building, for employees and the maintenance building. This electrical line is powered by 16 kW of solar, a 100 KVA inverter with battery back-up along with a 155 kW generator to switch between the solar and the generator to charge the 240 batteries on line.

