

Solar Gen 2 Solar Facility



Location

IMPERIAL COUNTY,
CALIFORNIA

Capacity

163 MEGAWATTS

Fuel Resource

PHOTOVOLTAIC SOLAR

Ownership

SOUTHERN POWER
FIRST SOLAR

Southern Power, a subsidiary of Southern Company, is a leading U.S. wholesale energy provider meeting the electricity needs of municipalities, electric cooperatives and investor-owned utilities. Southern Power and its subsidiaries own or have rights to 35 facilities operating or under construction in nine states with more than 10,500 MW of generating capacity in Alabama, California, Florida, Georgia, Nevada, New Mexico, North Carolina, Oklahoma and Texas.

Atlanta-based Southern Company is the premier energy company serving the Southeast, through its subsidiaries, and a leading U.S. producer of clean, safe, reliable and affordable electricity. With more than 4.5 million customers and approximately 46,000 megawatts of generating capacity, Southern Company owns electric utilities in four states and a growing competitive generation company, as well as fiber optics and wireless communications.



Through a partnership arrangement, Southern Power and First Solar own the 163-megawatt Solar Gen 2 Solar Facility consisting of three projects: Arkansas, Alhambra and Sonora. Commercial operation began in November 2014.

First Solar developed the project and was the contractor for engineering, procurement and construction. First Solar is also the operation and maintenance contractor for the facility.

Electricity generated by the plant serves a 25-year power purchase agreement with San Diego Gas & Electric (SDG&E), a regulated public utility that provides energy service to 3.4 million people through 1.4 million electric meters and 860,000 natural gas meters in San Diego and southern Orange counties. SDG&E's service area spans 4,100 square miles.

Size

Solar Gen 2 Solar Facility is a 163-megawatt facility located on three sites totaling 1,451 acres in Imperial County, California.

Technology

The facility consists of more than one million of First Solar's thin-film photovoltaic (PV) solar modules mounted on single-axis tracking tables.

PV modules generate electricity directly from sunlight through an electronic process that occurs naturally in certain types of material known as semiconductors. Solar energy frees electrons in these materials to travel through an electrical circuit, powering devices or sending electricity to the grid. Tracking systems produce more energy because they track the sun's movement throughout the day.