



PSE&G – BJ'S WHOLESALE CLUB® CASE STUDY

Wholesale Solar Success

BJ's® in Deptford Installs First Large Solar System Built With New Jersey Clean Energy Program™ Support

Switching to solar power is analogous to quitting a high-fat diet – it's the right thing to do, but it's rarely done. Then there's BJ's Wholesale Club®, a leading wholesale chain with 131 Club stores in 15 eastern states, and winner of the ENERGY STAR® 2002 Partner of the Year award. The reputation of BJ's as an environmentally conscious corporate citizen stems largely from its commitment to solar electric power, an effort that has now extended to the Garden State with the installation of New Jersey's first large solar electric system atop BJ's in Deptford.

The New Jersey Clean Energy Program™ helped BJ's in Deptford make the conversion to photovoltaic (PV) or solar electric power by funding 60% of the up-front capital and installation costs. In addition to New Jersey Clean Energy Program incentives, businesses installing solar systems receive a New Jersey sales tax exemption and are eligible for a 10% federal income tax credit and federal five-year accelerated depreciation.



Photograph courtesy of the Conservation Services Group.

"BJ's has reduced energy costs, but the greater benefit is promoting a cleaner environment," said Sara Dill, Energy Manager, BJ's Wholesale Club. "Because of the

positive publicity BJ's has received for its PV program, we are now well known as a company that supports solar electric power."

Standardization Saves Money

Conservation Services Group (CSG) has implemented four solar electric systems for BJ's: a 15 kilowatt (kW) system in Dartmouth, MA; a 51 kW system in Conshohocken, PA; a 43 kW system in Middletown, RI; and now the BJ's Deptford facility, a 62.2 kW system. (Four additional systems are now being installed on BJ's Clubs on Long Island.)



Photograph courtesy of the Conservation Services Group.

On May 16, 2002, BJ's Wholesale Club dedicated the first large solar electric facility built with funding from the New Jersey Clean Energy Program. New Jersey Board of Public Utilities President Jeanne M. Fox joined BJ's and its partner, Conservation Services Group, on the roof of BJ's in Deptford, NJ, to unveil 1,330 solar electric modules and a special public education display at the store's entrance.



PSEG

We make things work for you.



BJ's and CSG have standardized the design and installation. Each new installation essentially duplicates its predecessor, so that each new system costs less to develop and install than the previous one. Their goal is to make each new installation as economic and efficient as possible using these design principles:

- Target states that provide incentives.
- Target areas with an existing green power marketer.
- Standardize the system design and installation process.
- Improve product and installation costs with each new installation.
- Leverage any other incentives, discounts, and special programs available.

BJ's in Deptford, which followed this model, went live May 16, 2002. It consists of 1,330 solar panels manufactured by BP Solar and should generate approximately 81,350 kilowatt-hours (kWhs) of electricity per year. Over its lifetime, this installation will prevent approximately 6,600 pounds of nitrogen oxide, which produces smog; 9,060 pounds of sulfur dioxide, which creates acid rain; and 3,567,300 pounds of carbon dioxide, which contributes to global warming.



Also part of the May 16 dedication festivities were more than 60 fourth-grade students, who were adorned in gold sun masks, from the Sewell Elementary School, the "adopted" school of BJ's.

Interconnection Made Easy in NJ

Interconnection with local utilities can be difficult in some states, but not in New Jersey, especially if a company understands the process. BJ's and CSG applied for interconnection to PSE&G's electric grid prior to the beginning of installation, providing a complete set of engineering drawings to support the application.



Photograph courtesy of the Conservation Services Group.



"It was a very thorough design documentation package," said Bill Labos of PSE&G's Delivery Asset Management Department. "We are not used to seeing all of the installation details, and the BJ's package made the evaluation and comments very easy. Because of their professionalism and thorough documentation, we were able to approve their interconnection before they began installing the system."

According to Jaya Pichumani, Project Manager, Conservation Services Group, who coordinated closely with PSE&G during the installation and interconnection process, "The New Jersey Clean Energy Program has succeeded in combining financial incentives with a quick but thorough interconnection process to facilitate and encourage the use of renewable energy in the commercial sector. Because of the efficiency in PSE&G's application review process, the program will result in a significant increase in clean energy generation in the state of New Jersey. This program could be used as a model for other states."

Since BJ's in Deptford went solar in May 2002, an additional 2.5 megawatts (MWs) of clean solar electric systems are lined up to take advantage of the New Jersey Clean Energy Program and the benefits of solar. And thanks to the New Jersey Board of Public Utilities' extension of the 60% level of incentives for commercial solar electric systems, the solar industry estimates that an additional 1.8 MWs of new solar electric projects will be approved by the end of 2002.

For more information about the New Jersey Clean Energy Program and to learn how to take the first steps toward solar electric power conversion, go to www.njcep.com or call your local electric utility.



Photograph courtesy of the Conservation Services Group.