

Co-op seeks input on energy policy standards

In 1978, the Public Utility Regulatory Policies Act (PURPA) was enacted to encourage energy conservation, the optimal efficiency of electric utility facilities and resources, and equitable rates for electric consumers. It was modified in 1992, in 2005 and, most recently, with the passage of the Energy Independence and Security Act of 2007 (EISA). EISA sets four standards and one additional issue to be considered by utilities.

Adams Electric voluntarily complied with the 2005 standards and now asks for written input from Jan. 1 until March 31, 2009, on the latest set of standards listed in the EISA. (Copies of the complete text of the EISA are available at Adams Electric's headquarters during normal business hours on weekdays, or in writing from Adams Electric Cooperative, 1338 Biglerville Road, P.O. Box 1055, Gettysburg, PA 17325-1055.)

A brief description of each standard is listed below along with a short description of Adams Electric's current corresponding activities. This is for informational purposes only and is not meant to replace the full text of the EISA. The board of directors will conduct a hearing in August 2009 to determine whether or not to implement the new standards after it considers all written input.

Box 1 Section 532 PURPA 111(d) Standards:

16. (Integrated Resource Planning)—Each electric utility shall integrate energy efficiency resources into utility, state and regional plans and adopt policies establishing cost-effective energy efficiency as a priority resource.

Current Co-op Activities: Adams Electric receives all of its power from Allegheny Electric Cooperative under an all requirements contract that runs through 2025. For that reason, Allegheny is responsible for Integrated Resource Planning. Included in the current mix of resources from Allegheny is nuclear power, hydroelectric power, market power and interruptible loads through its load management system. In recent years, Adams Electric has connected 11 solar-powered photovoltaic systems and one wind energy system, with more expected to be connected. In addition, a large landfill gas project will be connected in early 2009.

17. (Rate Design Modifications to Promote Energy Efficiency Investments)—In general, the rates allowed to be charged by any electric utility shall align utility incentives with the delivery of cost-effective energy efficiency, and promote energy efficiency investments. To comply, each state regulatory authority and each nonregulated utility shall consider removing disincentives to energy efficiency and provide incentives for the successful management of energy efficiency programs. This can include adopting energy efficiency as part of retail rate design, recognizing that energy efficiency must be balanced with other objectives, and adopting rate designs that encourage energy efficiency for each customer class. Further, consideration shall be given to allowing timely recovery of energy efficiency-related costs and offering home energy audits and demand response programs, publicizing the financial and environmental benefits associated with making home energy efficiency improvements, and educating homeowners about all existing government incentives, including the availability of low-cost loans that make energy efficiency improvements more affordable.

Current Co-op Activities: In its most recent rate change implemented in 2008, Adams Electric eliminated declining block designs and does not encourage increased use to achieve a lower rate. For many years, Adams Electric has offered time-of-day, interruptible and preferred rates for heating and cooling systems that use less energy. Helping members reduce energy use and use energy wisely has been part of the co-op's member services programs for over 30 years. Adams Electric offers energy audits, advice on energy efficiency with heating and cooling systems, and low-cost financing plans for energy-related improvements. In addition, since 1985, the co-op has implemented a demand response system that controls over 10 percent of its peak load. This system is used to reduce load during the PJM interconnection peaks and during regional transmission peaks. The co-op actively

educates consumers about new developments in energy conservation technology and promotes the use of improved lighting including compact fluorescent lightbulbs (CFLs). The cooperative distributed free CFLs at its 2008 annual meeting.

Section 1307 PURPA 111(d) Standards.

16. (Consideration of Smart Grid Investments)—In general, each state shall consider requiring that, prior to undertaking investments in nonadvanced grid technologies, a utility demonstrate that it considered an investment in a qualified smart grid system based on appropriate factors that include total costs, cost-effectiveness, improved reliability, security, system performance and benefits to society.

Current Co-op Activities: In 1999, Adams Electric deployed a Supervisory Control and Data Acquisition System (SCADA) and began building a smart grid at all of its substations. In addition, it remotely operates breakers, capacitors and switches, plus other types of equipment. For many years, the co-op has only purchased those products that can be integrated into its SCADA system. In 2007, the co-op began deploying an Automated Meter Reading (AMR) system. This system will be fully deployed in early 2009 and is another building block of a smart grid. In early 2010, the cooperative expects to begin replacing its 1980s-vintage load control system with a new, more modern version with more smart grid capabilities.

17. (Smart Grid Information)—As a standard, all electricity purchasers shall be provided (to the extent practicable and where it is cost-effective) direct access, in written or electronic form, to the following:

- ▶ Time-based electricity prices in the wholesale and retail markets;
- ▶ Purchased electricity use expressed in kilowatt-hours (kWh);
- ▶ Where available, updates on prices and use on not less than a daily basis (including hourly pricing and use) along with day-ahead price projections; and
- ▶ To the extent it can be determined and available, written information about the source of power provided, by type of generation, including greenhouse gas emissions associated with each type of generation.

Current Co-op Activities: With the successful deployment of AMR in early 2009, Adams Electric will have a platform that will allow it to extract hourly data from its meters. That data will be made available to consumers who wish to look at their electricity use. Meter readings will be taken remotely several times each day.

About 65 percent of Adams Electric's power comes from hydroelectric and nuclear sources owned by or allocated to Allegheny. The remaining 35 percent is obtained by Allegheny through market contracts, most of which is not affected by the current volatile spot market. Adams Electric does not receive time-based energy price signals.

Section 374 (Non-PURPA) Standards Subsections (a) and (b) only

Additional Incentives for Recovery, Use and Prevention of Industrial Waste Energy

In general, not later than 180 days after the receipt of a request from a project sponsor or owner or operator, the electric utility shall provide public notice and conduct a hearing, consider and make a determination whether or not it is appropriate to implement a standard to carry out the purposes of this part. The standards implemented shall provide that an owner or operator of an identified waste energy recovery project that generates net excess power shall be eligible to dispose of the net excess power in accordance with the rate conditions and limitations outlined by the utility.

Current Co-op Activities: Adams Electric is working with all consumers who wish to sell excess energy back to the grid. The largest project under way currently involves a methane-to-electricity project at the Cumberland County Landfill. This 6,000-kilowatt project is expected to begin construction in early 2010.