**Economic Matters** 

# **Department of Legislative Services**

Maryland General Assembly 2009 Session

### FISCAL AND POLICY NOTE Revised

Senate Bill 771

(Senator Edwards)

Finance

Wind-Powered Electric Generating Facilities and Solar Generating Systems -Performance Standards and Decommissioning and Restoration Studies

This bill requires the Power Plant Research Program (PPRP) in the Department of Natural Resources to conduct two studies regarding wind-powered electric generating facilities and solar generating systems. PPRP must study the development of general performance standards for wind turbines located in the State. PPRP must also study how to ensure that adequate funds exist to decommission wind-powered and solar generating systems and restore the site of such facilities to pre-operating conditions once they cease to operate.

The bill takes effect July 1, 2009.

## **Fiscal Summary**

**State Effect:** General fund expenditures increase by \$30,000 in FY 2010 for contractual services needed to complete the studies. Revenues are not affected.

(in dollars)	FY 2010	FY 2011	FY 2012	FY 2013	FY 2014
Revenues	\$0	\$0	\$0	\$0	\$0
GF Expenditure	30,000	0	0	0	0
Net Effect	(\$30,000)	\$0	\$0	\$0	\$0

Note:() = decrease; GF = general funds; FF = federal funds; SF = special funds; - = indeterminate effect

Local Effect: None.

Small Business Effect: Minimal.

#### **Analysis**

Bill Summary: In studying the development of general performance standards, PPRP must determine whether general performance standards should be developed on a statewide, regional, or a project-basis and must consider the types of standards that could reasonably be included. These standards may include individual turbine electricity generating capacity, turbine type or model, tower height, number and size of blades, rotor diameter, noise, lighting on and near turbines, and setbacks. In conducting the study, PPRP must consider standards adopted in other states and review other resources relating to performance standards. PPRP must seek input, as appropriate from the Public Service Commission (PSC), the Department of the Environment (MDE), the Department of Natural Resources (DNR), the Maryland Energy Administration (MEA), the Maryland Department of Agriculture (MDA), owners of wind turbines and wind-powered generating facilities, electric companies, and any other person PPRP considers appropriate.

PPRP must also study ways to ensure that adequate funds exist to decommission wind-powered electric generating facilities and solar generating facilities in the State once they cease to operate and to restore the sites to pre-operating condition. PPRP may consider (1) the imposition of a surcharge on a facility or system based on the output or production capacity or (2) requiring a facility to post a bond, hold funds in escrow, or obtain other security. PPRP must seek input, as appropriate from PSC, MDE, DNR, MEA, MDA, owners of wind turbines and wind-powered generating facilities, solar panels and solar generating systems, electric companies, and any other person PPRP considers appropriate.

**Current Law:** State law does specify performance standards for wind-powered electric generating turbines. For wind-powered generating facilities with a capacity over 70 megawatts the performance standards of the turbines are reviewed during the certificate of public convenience and necessity (CPCN) application process. If a facility is granted a CPCN the generating facility may be constructed without regard to local zoning rule, regulation, law, or ordinance. For turbines that are exempt from the CPCN requirement, local zoning ordinances may determine the maximum tower height, noise, setback, and other specifications.

Local zoning restrictions for wind turbines vary by jurisdiction. MEA provides a model zoning ordinance for small wind energy systems (less than 100 kilowatts), which has been adopted by some counties and municipalities. As advised by the Maryland Energy Administration, six counties (Calvert, Carroll, Kent, Queen Anne's, St. Mary's, and Talbot) allow wind turbines by law.

Wind-power generating facilities with a capacity under 70 megawatts may request an exemption from CPCN requirements. PSC may grant an exemption from CPCN requirements as long as certain conditions are met: (1) the wind-powered facility is land-based; (2) the generating capacity is 70 megawatts or less; (3) the excess electricity is sold on the wholesale market pursuant to an interconnection, operation, and maintenance agreement with the local electric company; and (4) PSC provides an opportunity for public comment at a public hearing. The Code of Maryland Regulations (COMAR 20.79.01.02) specifies that a small generating facility under 373 kilowatts does not need prior approval of PSC.

**Background:** PPRP was created in 1971 to conduct research on the impacts of existing and proposed power plants in each county. PPRP is required to undertake a continuing research program for electric power plant site evaluation and related environmental and land use considerations. DNR and MEA institute procedures for coordinating environmental research assignments to prevent dissipation of money, time, and effort. Program components include:

- environmental evaluation of all electric power plant sites proposed for future development and expansion and their relationship to the waters and air of the State;
- monitoring operations of current electric power facilities located in the State to determine environmental, human health, and welfare effects;
- evaluation of new electric power generation technologies designed to minimize environmental effects;
- research and development of prediction and modeling tools; and
- analyses of the socioeconomic impact of current and proposed electric power plant generation facilities in Maryland.

Activities under PPRP have evolved over the years to reflect the many changes in the utility industry. Recent federal legislation and policy decisions are having a profound effect on the way in which electricity is produced and sold in the country. Although these federal actions are primarily aimed at the electricity sales at the wholesale level, actions in a number of states, including Maryland, have established the deregulation of retail sales. Like other electric consumers, Marylanders now face a change in the way they will be purchasing electricity; however, the impacts of the generation and transmission of electricity will continue to affect the health, safety, and welfare of the public. In order to balance the potentially conflicting issues associated with the licensing and permitting process for proposed power plants, PPRP provides this oversight through a detailed and impartial evaluation of proposed sites.

In addition to assessing the impact of proposed power plants, PPRP leads ongoing environmental assessment projects including: (1) assessing the environmental aspects of major new transmission lines as well as the expansion of the Calvert Cliffs Nuclear Plant; (2) projects to demonstrate the prevention of acid mine drainage from abandoned coal mines in Western Maryland; (3) analyzing the sources and effects of nutrients on the bay watershed; and (4) studying the impacts of toxic substances related to power generation on ground water quality and generally upon aquatic life in the Chesapeake Bay.

**State Fiscal Effect:** The bill requires PPRP to develop appropriate standards for the construction and decommissioning of wind turbines and the decommissioning of solar generating facilities. As advised by PPRP, contractual services will be required to complete these studies and develop standards. Based on similar studies conducted by PPRP, general fund expenditures for DNR - PPRP will increase by \$30,000 in fiscal 2010 for contractual services.

#### **Additional Information**

**Prior Introductions:** None.

Cross File: HB 750 (Delegate Beitzel) - Economic Matters.

**Information Source(s):** Allegany and Garrett counties, Maryland Department of the Environment, Maryland Energy Administration, Public Service Commission, Department of Legislative Services

**Fiscal Note History:** First Reader - March 11, 2009

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