

Ohio Biomass Energy Program

Winter 2007

Promoting the development of renewable energy resources in Ohio, including wood and agricultural residues; ethanol and biodiesel biofuels; landfill gas to energy; and energy crops.

Legislation modifies Ohio's energy fund

On Jan. 4, 2007, Sub. House Bill 251 (Sub. HB 251) was signed into law by then-Governor Bob Taft. This new law changes aspects of the Energy Efficiency Revolving Loan Program that began in 2001 with Ohio's competitive retail electric service policy.

The Act renames the Energy Efficiency Revolving Loan Program and fund to the Advanced Energy Program and Advanced Energy Fund. Revenues for the fund are generated by a temporary rider on retail electric distribution service rates paid by customers of Ohio's investor-owned utilities, American Electric Power-Ohio, Dayton Power & Light, Duke Energy Ohio and FirstEnergy.

The provisions of Sub. HB 251 also redefine eligibility for advanced energy projects under the loan and grant programs. Eligible projects now include technologies, products, activities, management practices or strategies that facilitate the generation or use of electricity and that reduce energy consumption or support the production of clean, renewable energy for consumers in a variety of customer classes. The law specifies that energy sources under the program may include wind and solar power, geothermal, solar thermal, high-efficiency micro-turbines, fuel cells using renewable and biomass resources, landfill gas or hydroelectric generation.

The law also redefines some of the criteria by which ODOD may authorize loans, grants and loan participation agreements at below market rates or linked deposits. Under the new criteria, projects must create new jobs, preserve existing jobs in Ohio or use innovative technologies or materials.

To view a copy of Sub. HB 251, visit the Ohio General Assembly Web site at www.legislature.state.oh.us and search for Sub. HB 251. Additional information about the Advanced Energy Fund can be found at the ODOD Web site, www.odod.state.oh.us. ♦

Governor Strickland appoints Energy Advisor

On Jan. 17, Governor Ted Strickland signed an executive order appointing an energy advisor to the governor and outlining several energy policy objectives to promote energy conservation, use of renewable and clean coal technologies, and alternative fuels.

Mark Shanahan, executive director of the Ohio Air Quality Development Authority, was named the governor's energy advisor. As energy advisor, Shanahan will coordinate the administration energy priorities which include job development and becoming a leader in next-generation energy production.

The executive order outlines plans to reduce energy consumption in state offices and increase the use of biodiesel and ethanol fuels in state vehicles.

For more information, visit www.governor.ohio.gov and search for executive order 2007-02. ♦

The Ohio Biomass Energy Program

The Public Utilities Commission of Ohio
180 East Broad Street
Columbus, Ohio 43215-3793
(800) 686-PUCO (7826)
www.PUCO.ohio.gov/PUCO/biomass

Governor: Ted Strickland
Chairman: Alan R. Schriber
Commissioners: Ronda Hartman Fergus,
Judy A. Jones, Valerie A. Lemmie,
Donald L. Mason

Contact: Anne Goodge, Program Director
(614) 466-2871
anne.goodge@puc.state.oh.us

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Grant opportunity in forest products industry

The USDA Forest Service Wood Education and Resource Center (WERC) is accepting proposals for projects that focus on opportunities for sustained forest products production in primary and secondary hardwood industries located in the eastern hardwood forest region. The grant specifications note that priority will be given to proposals that meet the following criteria (among others):

- ◆ Increase the use of woody biomass as an economic feedstock for meeting our nation's energy needs. Examples include heating and cooling, cogeneration and liquid fuel production. Proposals focused on sustainable forest management related to biomass supply and low-impact utilization options will also be accepted.
- ◆ Maintain the economic competitiveness of the primary and secondary hardwood industries.
- ◆ Bring information and technology about processing, marketing and business-related skills to existing and emerging businesses involved in the development and manufacturing of wood products.
- ◆ Encourage the adoption of new technology to improve competitiveness and profitability.
- ◆ Address global issues such as phytosanitation of wood packaging material and assisting communities and industries facing threats from invasive species like the Emerald Ash Borer.

The WERC mission is to facilitate interaction and information exchange with the forest products industry and enhance opportunities for sustained forest products production in the eastern hardwood forest region of the United States. WERC primarily serves the primary and secondary hardwood manufacturing industries located in 35 states, including Ohio.

The anticipated funding amount is expected to be \$1 million for cost-share projects. An average-size grant is anticipated to be \$50,000 and may vary from \$10,000 to \$100,000 per project. Each project will require a one-to-one match of nonfederal funds.

Completed applications are due on or before Feb. 15, 2007. The 2007 application form and instructions can be viewed and downloaded from the WERC Web site at www.na.fs.fed.us/werc. ◆

Be sure to check out these grant opportunities from the USDA Forest Service Wood Education and Resource Center and the Northeast Regional Biomass Program. For more information about grant opportunities, visit the Ohio Biomass Energy Program Web site at www.PUCO.ohio.gov/puco/biomass.

Bioheat grant solicitations offered by Northeast Regional Biomass Program

The Northeast Regional Biomass Program (NRBP) has issued two Requests for Proposals related to bioheat. An example of this technology is biodiesel blended with heating oil.

One project will develop a bioheat consumer education and outreach program. The other will identify laws, regulations and policies that may act as potential impediments to the distribution, use or sale of bioheat in the Northeast.

The NRBP believes if all heating oil users in the 11-state NRBP region were to use a 5 percent blend of biodiesel in all heating oil, it could displace more than 300 million gallons of imported petroleum, reduce greenhouse gases and help to spur regional biodiesel production. A goal of the NRBP is for the 11-state region to displace 5 percent of heating oil with biodiesel in five years.

The Northeast states have a large heating oil market, making up nearly 70 percent of the 7 billion gallon heating oil market in the U.S. In addition, there is a large heating oil marketing and delivery infrastructure with nearly 7,000 heating oil dealers, many of which are interested in learning about bioheat. These dealers believe that bioheat will help them retain or add new customers because it is environmentally preferable to heating oil, reduces dependency on imported oil and requires no change to customers' current heating equipment.

Proposals for both projects are due Feb. 9, 2007. Organizations within the U.S. are eligible. To review the proposals, to the NRBP Web site at www.nrbp.org. For additional information please contact NRBP Director Rick Handley at (518) 899-9572 or rhandley@nycap.rr.com. ◆

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You can receive the latest Ohio Biomass Energy Program newsletter and announcements by e-mail. To sign up, send an e-mail to listserv@lists.puc.state.oh.us with a blank subject line and the following in the body of the message:
subscribe ohio_biomass yourfirstname yourlastname.



Kids solve energy challenges through FIRST LEGO® League

Energy issues will be highlighted in 2007 for Ohio students involved in FIRST Lego® League (FLL), an innovative program to engage students ages nine to 14 in math, science and technology.

FLL is a result of an alliance between the nonprofit group *FIRST* and the Lego® Group. Guided by adult mentors, FLL students solve real-world engineering challenges, develop life skills and learn to make positive contributions to society.

Alternative Energy Resources - Meeting the Global Demand was recently announced to be the challenge for the 2007 program. Students will be challenged to explore how personal energy choices such as heating homes, fueling cars and powering appliances impact the global environment and economy.

The theme for the 2006 season was nanotechnology. In addition to conducting research in this rapidly emerging field, the students learned to design, build and program robots using LEGO MIND-STORMS technologies.

A total of 9,250 FLL teams with a total of 92,500 students from 45 countries participated in the FLL program in 2006. In Ohio, 193 teams involving 1,700 students participated. From Jan. 14-17, 2007, 48 Ohio FLL teams participated in the FLL Ohio State Championship held at Wright State University and sponsored by Wright-Patterson Air Force Base, Wright State University, Battelle, The American Society of Mechanical Engineers and Universal Technology Corporation. The winners of the Ohio championship were the "Mindstorm Troopers" from Westerville. This team will go on to compete in the international *FIRST* Championship in Atlanta, GA from April 12-14, 2007.

For more information, visit the FLL Web site at www.firstlegoleague.org. Businesses who are interested in being a sponsor for FLL Ohio State Championship, should contact the Ohio FIRST Lego League Director, Kathy Levine of Wright Patterson Air Force Base Education Outreach at (937) 255-5259 or Kathleen.levine@wpafb.af.mil. ♦



Students from across Ohio participated in the First Lego League Ohio State Championship held at Wright State University from Jan. 14-17, 2007. The students worked to build robots using Legos while learning about nanotechnology.



EPA issues guidelines for converting livestock waste to biogas

The U.S. Environmental Protection Agency (EPA) recently issued guidelines to help farmers manage livestock waste by producing biogas, which can reduce greenhouse gases and generate electricity.

When livestock manure is processed under controlled conditions, biogas comprised of methane and carbon dioxide is produced. The ability of biogas to reduce greenhouse gases has significant environmental benefits. Additionally, the biogas can be used to produce electricity for on-site use or to be sold to a local electric utility, creating an economic benefit for farmers.

These biogas guidelines were developed with EPA's AgStar program, the Association of State Energy Research and Technology Transfer Institution and the U.S. Department of Agriculture. The guidance will provide a standardized method that will allow farm operators and investors to compare the effectiveness of available waste methane recovery systems.

For more information, visit www.epa.gov/agstar/resources/protocol.html. ♦

Federal renewable energy incentives extended

The U.S. EPA Landfill Methane Outreach Program (LMOP) recently announced that the placed-in-service dates have been extended for facilities eligible for Section 45 Renewable Electricity Production Credit, and bond-issuance dates have been extended for the Clean Renewable Energy Bond Program.

The Tax Relief and Health Care Act of 2006 was signed by President Bush on Dec. 20, 2006, extending the Renewable Electricity Production Credit (REPC) through Dec. 31, 2008. This credit is available for electricity produced from renewable energy resources, including landfill gas. The credit is claimed on IRS Form 8835.

The Tax Relief and Health Care Act also increased the available Clean Renewable Energy Bonds (CREBs) from \$800 million to \$1.2 billion and extended the period to issue bonds through Dec. 31, 2008. CREBs may be issued by electrical cooperatives and government units that own renewable energy facilities including landfill gas energy.

For more information on the Tax Relief and Health Care Act of 2006, visit www.waysandmeans.house.gov. Specific information on the REPC and CREB programs can be found in the Energy Policy Act of 2005 at www.energycommerce.house.gov. ♦

Save the Date: Upcoming Biomass Events

Waste to Energy Workshop for Livestock and Food Processing Industries

Presented by: Midwest Combined Heat and Power
Jan. 31, 2007
Wooster, OH
www.chpcentermw.org/home/html

11th Annual Energy Management and Restructuring Conference

Presented by: The Manufacturers' Education Council
Feb. 27-28, 2007
Columbus, OH
www.mecseminars.com

Ohio Wind Working Group Meeting

Presented by: The Ohio Wind Working Group and Green Energy Ohio
March 2, 2007
Columbus, OH
www.ohiowind.org/ohiowind

Sustainable Energy Festival

Presented by: The Wilderness Center and Green Energy Ohio
March 3, 2007
Wilmot, OH
www.wildernesscenter.org/GreenEnergyFestival.html

National Solar Energy Conference 2007

Presented by: American Solar Energy Society
July 7-12, 2007
Cleveland, OH
www.ases.org/solar2007

Tax credits for energy efficiency improvements

Consumers who made home energy efficiency improvements or purchased a hybrid vehicle in 2006 may be eligible for a tax credit on their 2006 federal income tax return. The Energy Policy Act of 2005 established these federal tax credits for consumers and businesses. Home improvements such as energy-efficient windows, insulation, roofs and heating and cooling equipment can earn consumers a tax credit of up to \$500. Tax credits for hybrid vehicles vary by vehicle. For more information about the tax credits and applicable home energy improvements and hybrid vehicles, visit www.irs.gov or www.energy.gov. ♦

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ADDRESS CORRECTION REQUESTED

