## **Mercury Dangers**

Recycling Programs Will Divert Thermostats, Fluorescent Bulbs from Landfills

Courtesy of the Pennsylvania Township News

Those of you who have tried to lower your energy costs by switching to programmable thermostats or compact fluorescent light bulbs have discovered the downside to these upgrades: Finding a way to safely dispose of the old thermostats and expired CFLs, both of which contain the neurotoxin mercury.

The good news is that two programs have been initiated in the past year that will make it much easier for you to get rid of these mercury-containing devices.

## Turning up the heat on thermostat manufacturers

Mercury is highly toxic to just about every form of life on the planet. If thermostats and CFLs end up in landfills, chances are they won't remain intact for long. Once the mercury is released, it can leach into the soil and enter the groundwater, making its way to nearby creeks and streams.

According to the state Department of Environmental Protection, thermostats contain the largest amount of mercury found in ordinary household products: between three and five grams. The U.S. Environmental Protection Agency estimates that each year, six to eight tons of mercury from discarded thermostats end up in solid waste facilities and between one and two tons are released into the air. WasteCap of Massachusetts, a nonprofit group that helps businesses reduce, reuse, and recycle solid

waste, estimates that a single mercury-containing home thermostat can contaminate a 20-acre lake with enough mercury to result in a fish consumption warning.

Waterways throughout the commonwealth have been placed under such advisories over the past few years. To mitigate the problem, Gov. Ed Rendell signed Act 97 of 2008, the Mercury-Free Thermostat Law, last October. The law prohibits the sale, installation, and disposal of mercury thermostats in Pennsylvania and provides a recycling program for them.

"This law is another means of protecting the health and welfare of our most vulnerable citizens — our children," DEP's Deputy Secretary for Waste, Air, and Radiation Tom Fidler said in a press release announcing the new law. Mercury poses a risk of nerve and brain damage to developing fetuses and young children.

Legislators worked with thermostat wholesalers, retailers, and installers to create a program that asks all the groups to share the responsibility for keeping mercury out of the environment. Provisions of the Mercury-Free Thermostat Law include:

- Banning the sale, installation, and disposal of mercury thermostats as of December 8, 2009;
- Requiring thermostat manufacturers to establish and maintain a collection and recycling program for out-of-service mercury thermostats;
- Requiring thermostat retailers and contractors to collect these devices or notify customers about the new law and identify nearby collection sites, effective December 8, 2009; and

 Directing manufacturers and DEP to educate the public on the proper management of thermostats and other products containing mercury and maintain a list of approved collection sites.

Although thermostat retailers are not required to meet their responsibilities under the law until December, a number of wholesalers statewide already provide collection services through a program created by the Thermostat Recycling Corporation. This not-for-profit group was founded in the late 1990s by thermostat manufacturers Honeywell, Smith-Rodgers, and General Electric to promote the safe collection and proper disposal of mercury thermostats.

In 2008 alone, the corporation collected more than 135,000 mercury thermostats through 3,000 collection containers in 48 states, diverting nearly 1,300 pounds of mercury from landfills.

For more information about mercury thermostats and the Mercury-Free

Thermostat Act, call Glenn Mitzel at DEP at (717) 787-6239 or log onto

www.depweb.state.pa.us and click on "Mercury-Free Thermostats" under "Hot Topics."

## **Shedding light on CFL disposal**

The push for homeowners and businesses to switch from traditional light bulbs to energy-efficient CFLs has created a new problem: how to safely dispose of the fluorescent bulbs when they eventually wear out. Each CFL contains a small amount of mercury gas that would be released if the bulb were broken, making disposal in the trash an unwise choice.

The best option is recycling CFLs, and thanks to national retailer The Home

Depot, it's easier than ever. Last June, the home improvement giant rolled out an in-store

CFL recycling program in each of its more than 1,900 stores nationwide.

Consumers can simply return expired, unbroken bulbs to the returns desk at any Home Depot store, regardless of where the bulbs were purchased.

More than 75 percent of American households are located within 10 miles of a

Home Depot store, giving most residents a convenient way to recycle CFLs, Home Depot

Senior Vice President Ron Jarvis said in a press release announcing the initiative.

For more information about the CFL recycling program, call your local Home Depot store or log onto www.homedepot.com/ecooptions.