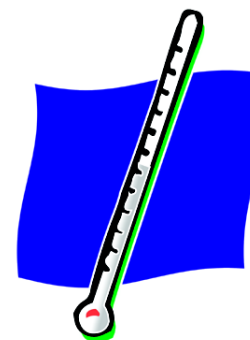




Household Mercury



Northeast Ohio Regional Sewer District

4747 East 49th St.
Cuyahoga Hts., OH 44125

Tel: 216.641.6000
mercuryprogram@neorsd.org

*Protecting your health
and environment*

Where is the mercury?

Many common household items contain small amounts of mercury. ***These items pose no threat when used properly***, however, they can be dangerous if they are misused or improperly discarded. The following is a list of a few items that ***potentially*** contain mercury.* Please remember that items on this list do not necessarily contain mercury, as many mercury-free alternatives exist. If you suspect that you have mercury-containing items, contact the manufacturer for proper disposal information when they need to be replaced or discarded.

Non-digital thermostats, including some in appliances

Stoves	Ovens
Water heaters	Clothes dryers
Furnaces	Space heaters

Some switches or relays in

Chest freezers	Washing machines
Sump pumps	Clothes irons
Electric space heaters	Silent light switches

Some types of lights

Fluorescent lamps**
High-intensity discharge (HID) bulbs

Some medicine cabinet items

Fever thermometers	Mercurochrome
Merthiolate	Saline solutions

Miscellaneous items

Button-cell batteries	Unused pre-1990 paint
Old alkaline batteries	Clock pendulums

*This list is not intended to be comprehensive.

**Fluorescent lamps are more energy-efficient than their alternatives and should continue to be used.

For more information

www.epa.state.oh.us/opp/mercury_pbt/mercury.html
www.epa.state.oh.us/dsw/fishadvisory/index.html
www.cuyahogaswd.org/hhw/mercury.shtml
www.epa.gov/mercury/

Household Mercury Item Disposal

If you have a mercury fever thermometer, you can bring it, **sealed in a zip-lock bag or plastic container**, along with this completed form to the Northeast Ohio Regional Sewer District's Environmental & Maintenance Services Center located at 4747 East 49th Street, Cuyahoga Heights, on weekdays between 9 a.m. and 4 p.m. While supplies last, you can receive a digital thermometer courtesy of the Sewer District in exchange for your mercury-containing one. (A maximum of one digital thermometer will be provided to each household.) If you have other mercury items to discard, please contact the Sewer District's Mercury Program at 216-641-6000 or mercuryprogram@neorsd.org

Date: _____

Description of Mercury Item: _____

I, (print name) _____,

certify that the waste described is derived solely from my household and that it contains only mercury and those items regularly associated with mercury.

Signature _____

Street Address _____

City, State Zip _____

Phone _____



What is Mercury ?

Mercury is a naturally-occurring, dense, silvery metal that is a liquid at room temperature. Its unique properties help it to conduct electricity, combine easily with other metals, and expand with temperature, making mercury a very useful substance for a variety of industrial, medical, and other applications.

Although mercury has many beneficial uses, it is a poison. If a mercury-containing device were to break, this liquid can separate into many small droplets and evaporate, creating mercury vapor. Mercury vapor is dangerous if inhaled, but, because it is colorless and odorless, it is impossible to detect without special monitoring equipment.

Mercury poisoning attacks the central nervous system of humans. At high enough levels of exposure, mercury can cause shortness of breath, nausea, vomiting, fever, tremors, difficulty sleeping, physiological changes, and short-term memory loss.

Even at levels not high enough to produce such obvious health effects, mercury entering the environment can be harmful. When mercury reaches the lakes and waterways, it undergoes a natural chemical process that converts it to an even more harmful form called methylmercury. In this form, it can contaminate the food chain through **bioaccumulation**.

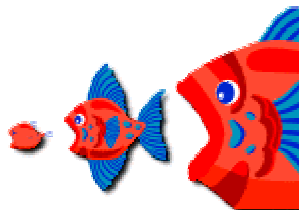
One of the ways that mercury enters the environment is the improper disposal of mercury and products that contain it. This improper disposal includes pouring mercury down the drain, putting mercury-containing products in the regular household trash, and burning mercury-containing waste.

What about small spills?

Even the tiniest of mercury spills must be properly cleaned up. Never use a vacuum cleaner to clean up spilled mercury. This would increase vaporization of the mercury. In case of a spill, isolate the area and contact the **Ohio EPA spill hotline at 1-800-282-9378**.

What is Bioaccumulation?

Bacteria in lakes and rivers can transform mercury through a process called methylation. The resulting methylmercury accumulates in algae and the small aquatic organisms that feed on the algae. Small fish then acquire the methylmercury by eating these organisms. The small fish are then eaten by larger fish. At each of these steps in the food chain, the amount of methylmercury in the organisms has increased. When the methylmercury reaches fish eaten by humans and wildlife, it can be at levels high enough to be harmful. Fetuses are especially vulnerable to such levels in fish eaten by their mothers. Later, as children, they could exhibit subtle developmental and learning problems. The FDA and the Ohio Department of Health have issued fish consumption advisories intended to prevent such effects, and they should be followed.



Mercury or Not?

Viable mercury-free alternatives to many items that traditionally contain mercury exist in the market today. Consumers may want to consider the mercury content of household items when it is time for their purchase or replacement. Information regarding mercury content may be available through contacting an item's manufacturer.

Why the Sewer District?

Mercury that is not properly discarded may end up in the wastewater stream, contaminating our wastewater treatment plants' sludge or passing through the plants to the Cuyahoga River or Lake Erie where bioaccumulation can occur.

A Little Bit Goes a Long Way

- Forty-four states now issue warnings about eating mercury-contaminated fish.
- There is between a half of a gram (0.02 oz.) and three grams (0.1 oz.) of mercury in a typical fever thermometer.
- The EPA has determined that the level of mercury safe for fish-eating wildlife in the Great Lakes is no more than 1.3 billionths of a gram of mercury per liter of water (0.17 billionths of an ounce of mercury per gallon of water). This is equivalent to a drop of mercury the size of a pencil-tip eraser in a pool of water as long, wide and deep as Cleveland Browns Stadium.