# MESSAGE FOR SOLID WASTE INDUSTRY

We encourage members of the Solid Waste Industry to review the Message for All Message for all.doc

# **OVERVIEW**

# Who is a Solid Waste Manager?

- Government and Private Solid Waste Haulers
- Solid Waste Transfer Facilities
- Municipal Solid Waste Landfills
- Municipal Refuse Facilities and Recyclers
- Contractors To This Industry
- Local Government Solid Waste Agencies

Members of the Solid Waste Industry have a significant stake in mercury lamp disposal and recycling. As a solid waste manager, you are in a position to understand the concerns for public health and the environment of disposing of mercury-containing devices in the trash. You are also in a key position to implement change through the creation and support of mercury lamp recycling programs within your organizations and with your customers. In working to effect these changes, solid waste managers need some basic information in order to persuade audiences that they would target for mercury-containing lamp collection and recycling.

## **BASIC INFORMATION**

Mercury is an essential ingredient for most energy-efficient lamps. Fluorescent lamps (including compact fluorescent) and high intensity discharge (HID) lamps are the two most common types of mercury-containing lamps. Fluorescent lamps provide lighting to most schools, hospitals, office buildings and stores. HID lamps include mercury vapor lamps, metal halide and high-pressure sodium lamps, and are used for streetlights, floodlights, parking lots, and industrial lighting.

Fluorescent and HID lamps can contain enough mercury to be considered hazardous. Since these lamps are fragile, they often break during collection and disposal. This raises issues regarding potential employee exposures to discharges from containers that store these broken lamps. Air and water quality is also a concern. It should also be noted that the mercury-containing lamps that end up in landfills due to regulatory exemptions or not recycling lamps can result in small quantities of mercury in the leachate and landfill gas.

## FEDERAL AND STATE RULES

According to the Subtitle C portion of the Resource Conservation and Recovery Act (RCRA) (Code of Federal Regulations, 40 CFR Part 260-279), it is a violation to transport and dispose of certain mercury-containing lamps in a municipal solid waste (MSW) facility (i.e. landfill, material recovery facility, waste-to-energy facility or transfer station). According to these same regulations, mercury-containing lamps can be

recycled with less stringent requirements under the Universal Waste Rule (UWR). If mercury-containing lamps are improperly disposed of in municipal solid waste systems, there are liabilities for the facility that accepts this material and for the party collecting and transporting the material.

The regulatory framework regarding recycling and disposal of mercury-containing lamps is confusing because states have different and potentially stricter regulations, and lamps contain different amounts of mercury. To review the State-by-State Stringency Comparison Table, see <u>Message re- State Stringency.doc</u>. There are also exemptions from the hazardous waste disposal requirements under the Federal law and regulations for households and Conditionally Exempt Small Quantity Generators (CESQGs). In addition, some varieties of mercury-containing lamps may not be considered hazardous under federal regulations. You should not assume that a violation has occurred just because lamps are found in a load arriving at a solid waste facility.

It is difficult to keep hazardous lamps out of MSW because enforcement is difficult, distinguishing hazardous lamps is difficult and exemptions to Subtitle C handling do exist. The easiest way to manage mercury-containing lamps is to recycle them according to the Universal Waste Rule provisions as applicable in each state.

The Universal Waste Rule makes lamp recycling easier on at least two levels. First, it creates less stringent standards for storing and reporting. Secondly, it reduces the level of regulation regarding shipments. A record of shipment like a bill of lading (BOL) and a common carrier can be used when transporting lamps to recycling facilities. **This creates an opportunity for solid waste haulers to provide a new service to existing customers.** 

## WHAT CAN THE SOLID WASTE INDUSTRY DO?

#### Solid waste haulers/collectors:

Solid waste haulers/collectors can encourage the recycling of mercury-containing lamps by establishing lamp collection services. You can collect lamps from generators and drop them off at a recycling facility. You can charge a fee for either picking up lamps or setting up a drop-off location. Once a program is established, sales representatives can be trained on how to educate customers and provide them with suggestions on how to handle lamps in their workplace. They can also provide customers with various options for recycling their lamps. For example, one option may be to provide the customers with lamp containers and a collection service that meets their schedules. In establishing a collection service, haulers need to comply with the UWR and applicable state standards, which means that they should not collect and transport lamps to municipal solid waste facilities.

### Facility Operators:

Facility operators can encourage recycling by ensuring that the facility's protocol for screening each load includes information about identifying mercury-containing lamps. The protocol should also describe what should be done if a hazardous load arrives at the facility. If it is determined that the type and quantity of lamps places the load in this

category, facility protocol should be followed. The key is to communicate to haulers who bring the materials to the facility that mercury-containing lamps are not accepted and that they should be recycled rather than brought to the solid waste facility.

#### Solid Waste Agencies:

Solid waste agencies have an obligation to make sure that the laws pertaining to mercurycontaining lamps are complied with through permit requirements and inspections. You are strongly encouraged to promote recycling. This may be done through education and outreach, or by facilitating collection of lamps for recycling, either directly or through a private company, in compliance with the UWR and applicable state standards.

We also encourage you to set up recycling programs for the spent mercury-containing lamps in your own facilities.

## SETTING UP RECYCLING SERVICES

Recycling services are provided by Association of Lighting and Mercury Recyclers (ALMR) member companies <u>anywhere</u> in the United States and its territories, Mexico and Canada. Services are available to large lamp users, small businesses, contractors, municipal government agencies and they are also available to households and the public through household waste collection programs. Either directly or through a network of transportation and solid waste contractors, material can be picked up in any U.S. community. There are also a number of lighting, maintenance, and other building contractors who will collect spent lamps and get them recycled for their customers.

Lamp collection programs can be designed for all generators:

- Small users can participate by using a "box program", where a container is provided and when full it can be sent to any recycler via ground mail shipment. This is a prepaid program and labels and shipping papers are provided.
- For larger users, recyclers can arrange milk-run pick-ups and common carriers will transport lamps to accumulation facilities throughout the country, where they are consolidated for shipment to destination facilities.
- For very large generators, materials can be picked up in trailer loads as needed.
- There are numerous collection locations around the country that ship large quantities of lamps to recycling "Destination Facilities" (state authorized recyclers) every day.
- Recyclers typically provide customer services and containers, and will also arrange all aspects of getting lamps recycled for anyone who is interested.
- Individuals and small users can also take lamps to any locally operated household waste facility in their community. For a list of community programs see <a href="https://www.earth911.org">www.earth911.org</a>.

"Lamp Recycling. The Responsible Thing To Do."© For more information visit www.swana.org, or www.lamprecycle.org, or www.almr.org