



Hazardous Waste Factsheet

What is Hazardous Waste?

Hazardous waste is any waste that because of its quantity or characteristics may pose a threat to human health or the environment. Waste that exhibits specific characteristics of ignitability, corrosivity, reactivity (tendency to explode), toxicity or is listed as hazardous waste in state or federal regulations must be managed as hazardous waste. Hazardous waste may be a liquid, sludge, solid or gas.

Different businesses may generate hazardous waste. As an example: chemical manufacturers, electroplating companies, automobile manufacturers, metal fabricators, foundries, lumber treating facilities, dry cleaners, photo processing centers, petroleum refineries, auto body shops and hospitals. Waste generated by these types of businesses may exhibit one of the characteristics of a hazardous waste and must be safely managed.

Besides industrial and commercial waste, many household wastes may also be hazardous. Certain chemicals like pesticides, cleaning agents, old paint and solvents, and even items like fluorescent light bulbs may pose a threat to human health and the environment if not disposed of properly.

Household Hazardous Waste

Household Hazardous Waste (HHW), sometimes known as domestic hazardous waste, is waste that is generated from residential households. Leftover household products that contain corrosive, toxic, ignitable, or reactive ingredients are considered to be HHW. Products, such as paints, cleaners, oils, batteries, and pesticides that contain potentially hazardous ingredients require special care when you dispose of them. HHW only applies to wastes that are the result of the use of materials that are labeled for and sold for "home use". *Wastes generated by a company or at an industrial setting are not HHW.*

Improper disposal of HHW can include pouring them down the drain, on the ground, into storm sewers, or in some cases putting them out with the trash. The dangers of such disposal methods might not be immediately obvious, but improper disposal of these wastes can pollute the environment and pose a threat to human health.

Benefits of Proper HHW Management

It is important to monitor the use, storage, and disposal of products with potentially hazardous substances in homes to help avoid potential risks associated with HHW. Below are some tips for individuals to follow:

- Reduction and recycling of HHW conserves resources and energy that would be expended in the production of more products.
- Reuse of hazardous household products can save money and reduce the need for generating hazardous substances.
- Proper disposal prevents pollution that could endanger human health and the environment.
- Use and store products containing hazardous substances carefully to prevent any accidents at home. Never store hazardous products in food containers; keep them in their original containers and never remove labels. Corroding containers, however, require special handling. Call your local hazardous materials official or fire department for instructions.
- When leftovers remain, never mix HHW with other products. Incompatible products might react, ignite, or explode, and contaminated HHW might become unrecyclable.
- Remember to follow any instructions for use and disposal provided on product labels.

Reduction at Home

Consider reducing your purchase of products that contain hazardous ingredients. Learn about the use of alternative methods or products—without hazardous ingredients—for some common household needs.

Disposal Options

Certain types of HHW have the potential to cause physical injury to sanitation workers, contaminate septic tanks or wastewater treatment systems if poured down drains or toilets, and present hazards to children and pets if left around the house. Also, read product labels for disposal directions to reduce the risk of products exploding, igniting, leaking, mixing with other chemicals, or posing other hazards on the way to a disposal facility. Even empty containers of HHW can pose hazards because of the residual chemicals that might remain. [Contact the City of Springfield's Household Chemical Collection Center](#) for instructions on proper use and disposal and to learn about local HHW drop off programs and collection days.

Businesses and Hazardous Wastes

Most manufacturers, repair businesses, laboratories, retailers, hospitals and cleaning businesses produce some form of hazardous waste. Municipalities and school districts can also be hazardous waste generators. Some generators are small businesses, such as dry cleaners, auto repair shops, gas stations and exterminators. Some are larger businesses, such as chemical manufacturers, universities, automobile factories and lumber-treating facilities.

What are some examples?

Hazardous wastes can be liquids, sludges, solids or gases. They can be wastes from manufacturing processes or discarded commercial products. Examples of hazardous waste include used solvents, electroplating chemicals, pesticides, paint, pharmaceuticals and chemicals that can no longer be used and are destined for disposal. All solid waste generated requires a hazardous waste determination. Hazardous waste listings and definitions are located in 40 *Code of Federal Regulations (CFR)* Part 261, Subparts C and D. incorporated and modified by 10 *Code of State Regulations (CSR)* 25-4,261.

Who makes the hazardous waste determination?

The hazardous waste determination is the responsibility of the hazardous waste generator. The hazardous waste generator may consult others, including the manufacturer of the material, environmental consultants and trade organizations; however, ultimately it is the generator who will be held responsible if the hazardous waste determination is incorrect.

So who can be the generator of hazardous waste?

Hazardous waste generator is defined in [40 CFR 260.10](#) as any person by site, whose act or process produces a hazardous waste identified or listed in part 261 of this chapter or whose act first causes a hazardous waste to become subject to regulation.

There are three main ways that a business may become a generator of hazardous waste. The first way is the one that most people think of when we use the term generator: the owner or operator of the manufacturing process unit, product or raw material storage tank or transport vehicle or vessel. An example of this would be a manufacturing plant that generates waste benzene from a cleaning process. The owner or operator is clearly a hazardous waste generator of benzene.

The second way a business could become a generator is if they are the owner of the product, raw material or manufacturing material being stored that may generate hazardous waste. An example of this

is when a business owns the formula and ingredients for a trademarked pesticide. This business sends their formula and ingredients to another business to mix, package and label their pesticide product. After the formulation, the leftover pesticide mixture that cannot be used is a waste and the owner of the ingredients could be a generator.

And finally, a business that removes hazardous sludges, sediments or other residues from a manufacturing process unit, tank, vehicle or vessel is the last way a business could become hazardous waste generator. For instance, a company has hazardous waste tanks at their facility. Every year they hire another business to perform a cleanout of their tanks so that they can inspect the integrity of their hazardous waste tanks. Beyond the routine pumping out of the tank, the cleaning business removes the bottom sludge that has accumulated during the year that would not have been removed during regularly scheduled hazardous waste pickups. In this situation, the cleaning business can be the generator of hazardous waste. Arrangements and agreements should be in place ahead of time to make sure each company involved is fully aware of their responsibilities.

It is important to remember that if hazardous waste is improperly managed then the Missouri Department of Natural Resources still has the authority to enforce the hazardous waste laws and regulations on any party involved in hazardous waste generation. This means that contracts between your business and another business will not shield your business from liability if violations occur. Businesses are not allowed to contract away liability in environmental cases.

Disposal Options

Businesses generating hazardous waste should contract with a licensed disposal contractor for proper removal and disposal options. See the "[Small Business Guide to Managing Hazardous Waste](#)" for more information.