



Evaluate Waste

Step 1 in the [10 Steps to Hazardous Waste Compliance series](#)

Every business and government agency creates waste. Improperly managed waste can create risks to human health and the environment. Certain wastes pose greater human health or environmental risks due to their chemical properties; these wastes are called *hazardous wastes*. Businesses and government agencies that create hazardous wastes are called *generators* of that waste.

In Minnesota, the Minnesota Pollution Control Agency (MPCA) and the metropolitan counties of Anoka, Carver, Dakota, Hennepin, Ramsey, Scott, and Washington (Metro Counties) regulate the management of hazardous wastes generated by businesses and government.

What is a waste?

The hazardous waste requirements apply only to wastes. A *waste* is a material that is unusable for its intended purpose, discarded, or intended to be discarded. *Products* that will be used for their intended purpose are not subject to the hazardous waste requirements.

How do I know which wastes are hazardous?

You must assume that any waste you generate that could reasonably be a hazardous waste is hazardous unless you document that the waste is *exempt* or non-hazardous.

The process of researching and documenting that a waste is non-hazardous is called *evaluation*. To evaluate a waste as non-hazardous, you must document that it is both not Listed and not Characteristic.

- **Listed** means that the chemical name of the waste or its ingredients meets the definitions found in the F, K, P, or U-list or is a regulated polychlorinated biphenyl (PCB).
- **Characteristic** means that the waste displays any of the chemical characteristics of Ignitability, Oxidizers, Corrosivity, Reactivity, Toxicity, or Lethality.

As the generator of the waste, you are responsible for evaluating the wastes. The MPCA and Metro Counties can assist with this process, but cannot perform it for you.

When do I need to evaluate my waste?

You do not have to evaluate your waste if you assume it is hazardous and manage it as a fully regulated waste. You must either make this assumption, or evaluate the waste as non-hazardous, within 60 days after the first time you generate that type of waste, and before you treat it or ship it off-site for disposal.

After you evaluate your waste, you only need to re-evaluate it if the process creating the waste or the waste itself changes.

What wastes are exempt?

You may assume wastes that would not reasonably be hazardous, such as office paper, vegetation, and uncontaminated clothing, are exempt.

The wastes in [Table 1](#) on page 2 are exempt from hazardous waste regulation under the specified conditions.

Table 1. Common wastes exempt from hazardous waste regulation

Waste	Conditions
Air emissions	Emissions allowed by an air quality permit issued by the U.S. Environmental Protection Agency (EPA) or MPCA are exempt. See https://www.pca.state.mn.us/air/about-air-permits .
Asbestos	See https://www.pca.state.mn.us/waste/asbestos-demolition-or-renovations .
Chlorofluorocarbon refrigerants	Exempt if reclaimed.
Corrective Action Management Unit (CAMU) waste	Exempt until removed from the CAMU.
Demolition debris	Exempt if disposed in a permitted solid waste landfill. Abatement wastes generated from the deliberate removal of a specific hazard, such as lead paint or PCB-containing caulk, are not exempt. See MPCA fact sheet #w-sw4-07, Pre-renovation or demolition requirements, at https://www.pca.state.mn.us/sites/default/files/w-sw4-07.pdf .
Food handling waste	
Fossil fuel combustion residuals	Includes coal fly ash, coal bottom ash, used diesel exhaust fluid (DEF) and diesel particulate filter (DPF) ash.
Fuel spill cleanup debris	Exempt if the spill has been reported to Minnesota Duty Officer; applies only to refined fuels. See MPCA fact sheet #w-hw4-19, Fuel-related Wastes, at https://www.pca.state.mn.us/sites/default/files/w-hw4-19.pdf .
Hazardous waste generated in a production process unit	Exempt until removed from the unit or until 90 days after the unit has ceased operation.
Household and farm waste	Exempt when directly and properly disposed by the household or farm. Household or farm hazardous wastes are regulated in Minnesota once collected by anyone else. Households and farms are prohibited from disposing of cathode ray tubes (CRTs), fluorescent lamps, and used oil in normal trash or in the ground.
Industrial ethyl alcohol	Exempt if reclaimed and regulated by the U. S. Alcohol and Tobacco Tax and Trade Bureau.
Infectious waste	Exempt unless a dual waste. See MPCA fact sheet #w-sw4-30, Infectious Waste, at https://www.pca.state.mn.us/sites/default/files/w-sw4-30.pdf .
Low-level mixed wastes (radioactive hazardous waste)	Exempt if managed by the generator under a license from the Minnesota Department of Health.
Ore and mineral extraction, beneficiation, and processing waste	Extraction wastes are exempt if uniquely associated with ore or mineral production. Beneficiation or processing wastes are exempt if the generating activities are specified in Minnesota Rules.
Samples of waste	Exempt until returned to the generator or disposed by the laboratory.
Sanitary sewage	Only the combined stream is exempt; each individual sewerage waste is regulated.
Scrap metal	Exempt if recycled. See MPCA fact sheet #w-hw4-27, Hazardous Scrap Metal, at https://www.pca.state.mn.us/sites/default/files/w-hw4-27.pdf .
Treated wood	Structural lumber and related waste is exempt if disposed in a permitted solid waste landfill. See MPCA fact sheet #w-hw4-67, Treated Wood, at https://www.pca.state.mn.us/sites/default/files/w-hw4-67.pdf .
Trivalent chromium	Exempt if handled in a non-oxidizing environment.
Wastewater	Discharges allowed by a National Pollutant Discharge Elimination System (NPDES) or Minnesota State Discharge System (SDS) permit are exempt. See https://www.pca.state.mn.us/water/industrial-wastewater-discharge-npdes-permits .

Note: Table 1 lists only the most common exempt wastes. Contact the MPCA or your Metro County if you believe your waste may also be exempt from hazardous waste regulation. See [More information](#) on page 5.

Frequently confused with exempt wastes are hazardous wastes that are eligible for reduced management requirements if managed in certain ways, such as some recycled wastes.

A common misconception is that any waste is exempt if it is recycled. Recycled hazardous wastes are regulated in Minnesota, but may be eligible for reduced management and 'counting' requirements. Minnesota's hazardous waste definitions differ substantially from the federal regulations in this area. These hazardous wastes are discussed in MPCA fact sheet #w-hw1-02, Determine Generator Size, at <https://www.pca.state.mn.us/sites/default/files/w-hw1-02.pdf>.

What are listed wastes?

A waste is *listed* if the names of its chemical ingredients meet the definition of one of the hazardous waste lists. There are four federally-mandated lists. Minnesota also recognizes PCBs as a listed hazardous waste. Together, approximately 750 wastes are considered listed hazardous wastes in Minnesota. Find links to detailed information in Table 2.

Table 2. Hazardous waste lists

List	Fact sheet number	Fact sheet web address
F-List	w-hw2-00	https://www.pca.state.mn.us/sites/default/files/w-hw2-00.pdf
K-List	w-hw2-01	https://www.pca.state.mn.us/sites/default/files/w-hw2-01.pdf
P-List	w-hw2-02	https://www.pca.state.mn.us/sites/default/files/w-hw2-02.pdf
U-List	w-hw2-03	https://www.pca.state.mn.us/sites/default/files/w-hw2-03.pdf
PCBs	w-hw4-48a	https://www.pca.state.mn.us/sites/default/files/w-hw4-48a.pdf

What are characteristic wastes?

A waste is *characteristic* if it chemically reacts in the environment or contains toxic contaminants. There are five federally-mandated hazardous waste characteristics. Minnesota also recognizes lethality as a hazardous waste characteristic. Because any waste that displays a characteristic is hazardous, it is not possible to compile a complete catalogue of all hazardous wastes. Find links to detailed information in Table 3.

Table 3. Hazardous waste characteristics

Characteristic	Fact sheet number	Fact sheet web address
Ignitability	w-hw2-04	https://www.pca.state.mn.us/sites/default/files/w-hw2-04.pdf
Oxidizers		
Corrosivity		
Reactivity		
Toxicity	w-hw2-05	https://www.pca.state.mn.us/sites/default/files/w-hw2-05.pdf
Lethality		

How do I evaluate a waste?

Remember, you must assume any waste you generate that could reasonably be a hazardous waste is hazardous until you evaluate the waste as both not listed and not characteristic. Keep that evaluation documentation for at least three years after you stop generating the waste.

You may evaluate a waste by:

- Knowledge
- Laboratory analysis

Evaluating a waste by knowledge

Evaluating by knowledge means applying objective, documented information and scientific or industry-accepted reasoning to determine that a waste is not hazardous. Subjective opinion is not sufficient. Document the absence of each potential list or characteristic that reasonably might be present.

If the activity that produces the waste at your site reasonably precludes a particular characteristic or contaminant from being present, then you do not need to evaluate for that characteristic or contaminant.

You may use any generally accepted source documents or references, such as Safety Data Sheets (SDS), textbooks, instruction or operating manuals, or manufacturer certifications to evaluate by knowledge.

However, remember that the material you must evaluate is the waste you discard, not the original product. Use of a product at your site may change it significantly from its original specifications. Non-hazardous products frequently become hazardous wastes during use. For example, 'high-flash' parts washer solvent, aqueous detergents, and sorbents can be contaminated when they leach toxics from metals parts or are combined with organic solvents. Most SDS and manufacturer certifications apply only to the original, unused product, and cannot by themselves document that a used waste is non-hazardous.

In addition, SDS, formerly known as Materials Safety Data Sheets (MSDS), is governed by the employee safety standards of the U.S. Occupational Safety & Health Administration (OSHA), not the environmental protection standards of the EPA or MPCA. The SDS standards only require contaminants to be stated if present at far above hazardous waste thresholds. Therefore, you cannot assume that the absence of a contaminant from the SDS list of ingredients means that the contaminant is not present.

You may delegate anyone to evaluate your waste by knowledge for you, however you remain responsible for the evaluation regardless of who performs it. Ensure that whoever performs the evaluation applies the Minnesota hazardous waste characteristics, which are different than the federal. You must have access at your generation site to the complete documentation used to evaluate your waste – the final conclusion alone is not sufficient. Neither the MPCA nor Metro Counties can evaluate your waste for you.

Evaluating a waste by laboratory analysis

Evaluating by laboratory analysis means collecting a representative sample of the waste, running specified laboratory tests on the sample, and comparing it to hazardous waste thresholds to determine that a waste is not hazardous. You may not rely on an analysis of waste from another site or another generator, even if believed to be similar. Ensure that the representative sample of your waste is collected before any dilution, on-site treatment, or mixture of the waste with other material. If the waste to be analyzed is a spent material, such as used parts washer solvent or solution, collect the sample after the material has been used, when you would normally need to dispose of it.

You may use your own on-site laboratory, a laboratory contracted through your chosen waste vendor, or an independent laboratory to test your waste. No specific laboratory licensure or certification is required; however the Minnesota Department of Health (MDH) administers a voluntary environmental laboratory accreditation program. To locate an MDH-accredited laboratory, contact the MDH. See [More information](#) on page 5.

Ensure the laboratory tests for each list and characteristic that reasonably could be present. The MPCA, Metro Counties, and MDH cannot evaluate your waste for you.

What records must I keep?

Any evaluation showing your waste is non-hazardous must be documented. Keep these records accessible from the site where the waste is generated for at least three years after you last accumulate the waste on-site or ship it off-site for disposal.

Who else regulates hazardous wastes?

This and the other publications in the [10 Steps to Hazardous Waste Compliance series](#) are intended to provide guidance only on the requirements of the MPCA and Metro Counties. However, a hazardous waste may also be regulated as a:

- *Hazardous material* under the federal Hazardous Materials Regulations (HMR) administered by the U.S. Department of Transportation (DOT).
- *Hazardous chemical* under the federal Hazard Communication Standard (HCS) administered by OSHA.
- *Hazardous substance* under the federal Clean Water Act (CWA) or the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA, better known as SuperFund) administered by the EPA and the MPCA.

In addition to the hazardous waste requirements discussed in this and other MPCA fact sheets, the HMR, HCS, CWA, and CERCLA may also require specific labeling, packaging, employee training, documentation, and reporting when a hazardous waste is transported, released into the environment, or when employees may be exposed to it. Although this publication does not discuss these other regulations, generators of hazardous waste must meet all applicable requirements. For questions regarding these requirements, contact the applicable regulatory agency.

More information

Guidance and requirements in this fact sheet were compiled from Minnesota Rules, Chapter 7045. Visit the Office of the Revisor of Statutes at <https://www.revisor.mn.gov/pubs> to review Minnesota Rules.

Contact your Metro County or the MPCA with your questions. The MPCA's Small Business Environmental Assistance Program (SBEAP) can also provide free, confidential regulatory compliance assistance.

The Minnesota Technical Assistance Program (MnTAP) can help you reduce the amount of hazardous waste your site generates.

Metro County Hazardous Waste Offices

Anoka	763-422-7093
.....	https://www.anokacounty.us/
Carver	952-361-1800
.....	http://www.co.carver.mn.us/
Dakota	952-891-7557
.....	https://www.co.dakota.mn.us/
Hennepin	612-348-3777
.....	http://www.hennepin.us/
Ramsey	651-266-1199
.....	https://www.ramseycounty.us/
Scott	952-496-8475
.....	http://www.scottcountymn.gov/
Washington	651-430-6655
.....	https://www.co.washington.mn.us/

Minnesota Pollution Control Agency

Toll free (all offices).....	1-800-657-3864
All offices.....	651-296-6300
.....	https://www.pca.state.mn.us/

Small Business Environmental Assistance

Toll free	1-800-657-3938
Metro	651-282-6143
.....	https://www.pca.state.mn.us/sbeap/

Minnesota Technical Assistance Program

Toll free	1-800-247-0015
Metro	612-624-1300
.....	http://www.mntap.umn.edu

Minnesota Department of Health

Toll free	1-888-345-0823
Metro	651-201-5000
.....	http://www.health.state.mn.us/