

## Chapter 11. Other EPA Regulations

There are other EPA programs or regulations that require facilities to submit information that LEPCs and TEPCs may use to plan for chemical emergencies. The Tier II form requires facilities to indicate if they are subject to regulations under the RMP and TRI. Some facilities in your planning district may also have to comply with federal or state hazardous waste regulations. You may reach out to facilities in your planning areas for more information on the chemicals handled at these facilities. This chapter will briefly detail other existing regulations.

### 11.1 Risk Management Program

When Congress passed the CAA Amendments of 1990, Section 112(r) required EPA to publish regulations and guidance for chemical accident prevention at facilities using substances that posed the greatest risk of harm from accidental releases. These regulations, found at [40 CFR Part 68](#), were built upon existing industry codes and standards and require companies of all sizes that use certain listed regulated flammable and toxic substances to develop a Risk Management Program, a program of activities designed to prevent an accidental chemical release from occurring. By June 21, 1999, a summary of the facility's Risk Management Program (known as a "Risk Management Plan" or "RMP") was to be submitted to EPA. The plans must be updated and resubmitted at least every five years. There are other circumstances described in the RMP regulations (and below), however, that may require a more frequent submission. New facilities must submit an RMP as soon as they have a covered chemical above the threshold quantity. Approximately 12,000 facilities are subject to Risk Management Program regulations.

#### 11.1.1 Who Is Covered?

Owners and operators of a facility (stationary source) that manufactures, uses, stores or otherwise handles more than a threshold quantity of a listed regulated substance in a process must implement a Risk Management Program.

"Process" means any activity involving a listed regulated substance, including any use, storage, manufacturing, handling or on-site movement of such substances—or a combination of these activities.

#### 11.1.2 What Chemicals Must Be Reported Under an RMP?

The regulation includes a list of regulated substances, including their synonyms and threshold quantities (in pounds) to help assess if a process is subject to the Risk Management Program rule. The regulated substances are listed in four tables at [40 CFR 68.130](#), two of which list the regulated toxic substances (alphabetically and by CAS number) and two of which list the regulated flammable substances (alphabetically and by CAS number). The substances can also be found in the [List of Lists](#), which is a consolidated list of chemicals subject to:

- EPCRA.
- CERCLA.
- Section 112(r) of the CAA.

Thresholds for toxic substances range from 500 to 20,000 pounds. The threshold for all flammable substances is 10,000 pounds.

Where the CAA Section 112(r) program has been delegated to a state, that state may have additional requirements for the federally-listed chemicals and/or additional listed chemicals.

### **11.1.3 What Information Must an RMP Include?**

Each facility's program should address three areas:

- Hazard assessment that details the potential effects of an accidental release, an accident history of the last five years, and an evaluation of worst-case and alternative accidental releases.
- Prevention program that includes safety precautions and maintenance, monitoring and employee training measures.
- Emergency response program that describes emergency health care, employee training measures and procedures for informing the public and response agencies (e.g., the fire department) should an accident occur.

### **11.1.4 How Is RMP Information Used?**

The RMP information required from facilities helps local fire, police and emergency response personnel prepare for and respond to chemical emergencies. Making RMPs available to the public also fosters communication and awareness to improve accident prevention and emergency response practices at the local level.

### **11.1.5 What Are RMP Program Levels?**

The rule defines three [program levels](#) based on processes' relative potential for public impacts and the level of effort needed to prevent accidents. For each program level, the rule defines requirements that reflect the level of risk and prevention requirements associated with the processes at that level. The program levels are as follows:

- **Program Level 1:** Processes that would not affect the public in the event of a worst-case release and with no accidents with specific offsite consequences within the past five years. Program 1 imposes limited hazard assessment requirements and minimal accident prevention and emergency response requirements.
- **Program Level 2:** Processes not eligible for Program 1 or subject to Program 3. Program 2 imposes streamlined accident prevention program requirements, as well as additional hazard assessment, management and emergency response requirements.
- **Program Level 3:** Processes that are not eligible for Program 1 and are either subject to OSHA's Process Safety Management (PSM) standard under federal or state OSHA programs or classified in one of 10 specified North American Industrial Classification System (NAICS) codes. Program 3 imposes OSHA's PSM standard as the accident prevention program, as well as additional hazard assessment, management and emergency response requirements.

Based on their limited potential for serious offsite consequences, facilities are not required to implement a prevention program, an emergency response program, or a management system for Program 1 processes. Facilities with processes in Program 2 and Program 3 must address each of the three RMP elements described above for those processes.

#### **11.1.6 Have There Been Major Changes to the RMP Rule?**

EPA conducted a multi-year review of potential improvements to the RMP rule, which culminated in 2019 in a set of enhancements to the emergency response provisions and other changes. These enhancements ensure first responders have access to all necessary safety information and resolve important security concerns. In short, the new requirements include:

- Conducting public meetings within 90 days of a qualifying accident with offsite impacts.
- Performing annual coordination activities with local emergency responders.
- Developing emergency response exercise plans and schedules.
- Conducting emergency response notification drills.
- Conducting emergency response tabletop exercises.
- Conducting emergency response field exercises.

Details of the new requirements and their corresponding compliance dates can be found [here](#).

#### **11.1.7 How Should Facilities Coordinate with Emergency Response Officials on Their Emergency Response Plans?**

Once a facility determines that they have at least one RMP-covered process, they must have open communications with local emergency planning and response officials, including their local emergency planning committee (LEPC) if one exists, to ensure that response actions for an accidental release have been coordinated.

For facilities with Program 2- or 3- covered processes, per [40 CFR 68.93](#), emergency response coordination with local officials must occur at least annually—and more frequently if necessary—to address changes at the facility, in the emergency response plan or emergency action plan, and in the community emergency response plan. The purpose of the annual coordination is to allow facilities to update and discuss the information being provided to local authorities and to allow local authorities to provide facilities with updated information on how the source is addressed in the community emergency response plan.

Additionally, for facilities with Program 2- or 3- covered processes, per [40 CFR 68.96](#), emergency response exercises are required in order to increase chemical accident emergency response readiness for facility owners and operators and local responders. The required RMP emergency response exercise activities can be divided into two categories:

- Notification exercises:
  - Annual notification exercise of the facility’s emergency response notification mechanisms; written record is prepared following the exercise.

- Emergency response exercise program:
  - Field exercises scheduled and conducted in consultation with local emergency response officials; evaluation report is prepared following the exercise.
  - Tabletop exercises scheduled and conducted in consultation with local emergency response officials at least every three years; evaluation report is prepared following the exercise.

These exercises can increase emergency readiness by ensuring that local public responders and facility response personnel know what actions to take during various chemical accident scenarios.

### **11.1.8 How Does the LEPC or Its Members Get Access to an RMP?**

In addition to the required coordination and sharing of prepared chemical emergency response plans, a facility's RMP will be available through EPA's secure data system, the Central Data Exchange (CDX), to state and local officials involved in planning for and responding to chemical emergencies. Contact your [regional EPA RMP representative](#) to get access to RMPs for facilities under your jurisdiction.

However, the simplest way to identify an RMP facility in your state is look at a facility's Tier II form. That form will indicate whether the facility is an RMP facility and will have some information on the chemicals. The actual RMP report will include hypothetical accident scenarios and some information on past accidents and accident prevention efforts that may be useful for community preparedness.

## **11.2 Toxic Chemical Release Inventory**

The TRI tracks the management of certain toxic chemicals that may pose a threat to human health and the environment. U.S. facilities in different industry sectors must report annually how much of each chemical is released to the environment and/or managed through recycling, energy recovery and treatment. (A "release" of a chemical means that it is emitted into the air or water or placed in some type of land disposal.)

The information submitted by facilities is compiled in the TRI. The TRI helps support informed decision-making by companies, government agencies, non-governmental organizations and the public. Section 313 of EPCRA created the TRI program.

### **11.2.1 What Are Classified as TRI Toxic Chemicals?**

In general, chemicals covered by the TRI program are those that cause:

- Cancer or other chronic human health effects.
- Significant adverse acute human health effects.
- Significant adverse environmental effects.

The TRI program currently covers over 770 individually-listed chemicals and 33 chemical categories. Facilities that manufacture, process or otherwise use these chemicals in amounts above established levels must submit annual TRI reports on each chemical. The TRI chemical list does not include all toxic chemicals used in the United States.

### **11.2.2 What Types of Industries Are Included in TRI?**

Facilities that report to TRI are typically larger facilities involved in manufacturing, metal mining, electric power generation, chemical manufacturing and hazardous waste treatment. Not all industry sectors are covered by the TRI program, and not all facilities in covered sectors are required to report to TRI.

### **11.2.3 What Does the TRI Program Provide for Communities?**

Since the creation of the TRI program, TRI information has provided a way for citizens to better understand possible sources of pollution in their communities. This better understanding can be the basis for actions, such as communications with facilities releasing chemicals to the environment and with regulatory authorities that have oversight responsibilities. This concept of citizen empowerment is summed up by the slogan “A right to know, a basis to act.”

Information that is often helpful to citizens in addition to TRI quantity information includes the health effects of the chemical in question, how the chemical is managed, and whether a relevant human exposure is likely. Additionally, many parties, including industry, are often interested in whether releases of a chemical can be minimized, reduced or eliminated at the source. The TRI program is committed to presenting as much of this information as possible to help inform the public. Please visit the TRI website at [www.epa.gov/tri](http://www.epa.gov/tri).

## **11.3 RCRA: Hazardous & Non-Hazardous Solid Waste**

RCRA is the public law that creates the framework for the proper management of hazardous and non-hazardous solid waste. The law describes the waste management program mandated by Congress that gave EPA authority to develop the RCRA program. The term “RCRA” is often used interchangeably to refer to the law, regulations, and EPA policy and guidance.

### **11.3.1 How does RCRA work?**

RCRA establishes the framework for a national system of solid waste control. [Subtitle D](#) of the Act is dedicated to non-hazardous solid waste requirements, and [Subtitle C](#) focuses on hazardous solid waste. Solid waste includes solids, liquids and contained gases and must be discarded to be considered waste.

### **11.3.2 Opportunities for Public Participation**

The general public plays a key role in RCRA by providing input and comments during almost every stage of the program’s development and implementation through rulemaking participation

and comments on treatment, storage and disposal facility permits. ([Resources on Public Participation and the Hazardous Waste Permitting Process.](#))

States play the lead role in implementing non-hazardous waste programs under Subtitle D. EPA has developed regulations to set minimum national technical standards for how disposal facilities should be designed and operated. States can also take the lead role in implementing the hazardous waste program through the state authorization process. [State authorization](#) is a rulemaking process whereby EPA delegates the primary responsibility of implementing the RCRA hazardous waste program to individual states. This process ensures national consistency and minimum standards while providing flexibility to states in implementing rules, which can be more stringent than the federal program. States issue permits to ensure compliance with EPA and state regulations.

The regulated community is a large, diverse group that must understand and comply with RCRA regulations. These groups can include hazardous waste generators, government agencies and small businesses, and gas stations with underground petroleum tanks.

### **11.3.3 Subtitle C—Hazardous Waste**

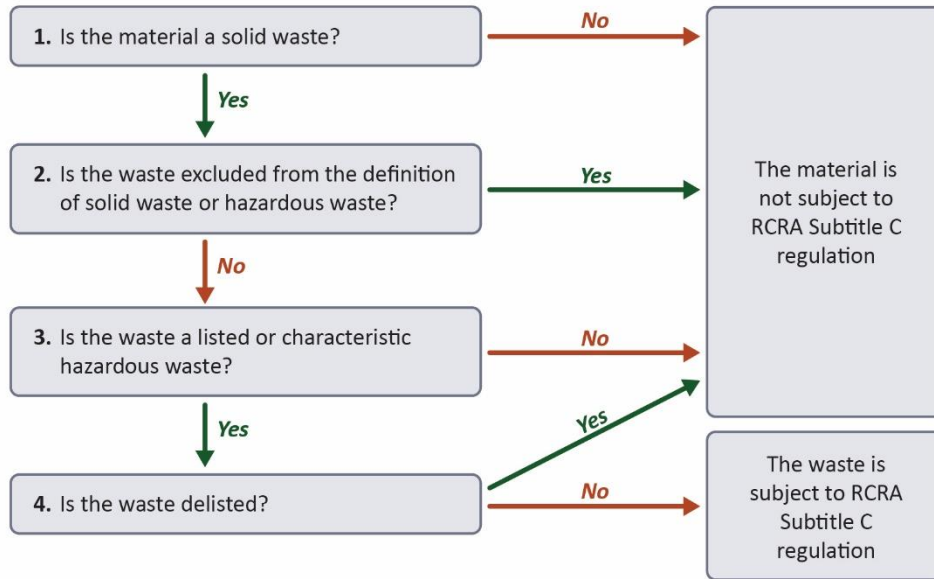
Hazardous waste is regulated under Subtitle C of RCRA. EPA has developed a comprehensive program to ensure that hazardous waste is managed safely from the moment it is generated to its final disposal (cradle-to-grave). Subtitle C regulations set criteria for hazardous waste generators; transporters; and treatment, storage and disposal facilities. This includes permitting requirements, enforcement, and corrective action or cleanup.

### **11.3.4 What Is a Hazardous Waste?**

The hazardous waste management program uses the term “solid waste” to denote something that is a waste. EPA developed hazardous waste regulations that define in more detail [what materials are solid waste](#) for the purposes of RCRA Subtitle C (hazardous waste) regulation.

Simply defined, a hazardous waste is a waste with properties that make it dangerous or capable of having a harmful effect on human health or the environment. Hazardous waste is generated from many sources, ranging from industrial manufacturing process wastes to batteries, and may come in many forms, including liquids, solids, compressed gases and sludges.

EPA developed a regulatory definition and process that identifies specific substances known to be hazardous and provides objective criteria for including other materials in the regulated hazardous waste universe. This identification process can be very complex, so EPA encourages generators of wastes to approach the issue using the series of questions described below:



**Figure 27. The hazardous waste identification process.**

In order for a material to be classified as a hazardous waste, it must first be a solid waste. Therefore, the first step in the hazardous waste identification process is determining if a material is a solid waste.

The second step in this process examines whether or not the waste is specifically excluded from regulation as a solid or hazardous waste.

Once a generator determines that their waste meets the definition of a solid waste, they investigate whether or not the waste is a listed or characteristic hazardous waste. Finally, it is important to note that some facilities have petitioned EPA to delist their wastes from RCRA Subtitle C regulation. You can research the facilities that successfully petitioned EPA for a delisting in [Appendix IX of Title 40 of the Code of Federal Regulations part 261](#).

### 11.3.5 EPA’s Cradle-to-Grave Hazardous Waste Management Program

State regulatory requirements for generators may be more stringent than those in the federal program. Be sure to [check your state's policies](#).

[RCRA](#) set up a framework for the proper management of hazardous waste. From this authority, EPA established a comprehensive regulatory program to ensure that hazardous waste is managed safely from “cradle to grave,” meaning from the time it is created; while it is transported, treated and stored; and until disposal.

#### 11.3.5.1 Hazardous Waste Generation

Under RCRA, hazardous waste generators are the first link in the hazardous waste management system. All generators must determine if their waste is hazardous and must oversee the ultimate fate of the waste. Furthermore, generators must ensure and fully document that the hazardous



waste they produce is properly identified, managed, and treated prior to recycling or disposal. The degree of regulation that applies to each generator depends on the amount of waste that a generator produces.

EPA provides [detailed online information about the regulations applicable to generators of hazardous wastes](#).

#### ***11.3.5.2 Hazardous Waste Transportation***

After generators produce a hazardous waste, transporters may move the waste to a facility that can recycle, treat, store or dispose of the waste. Since such transporters are moving regulated wastes on public roads, highways, rails and waterways, [United States Department of Transportation hazardous materials regulations](#), as well as EPA's hazardous waste regulations, apply.

For more information on requirements pertaining to this issue, [visit EPA's webpage on hazardous waste transportation](#).

#### ***11.3.5.3 Hazardous Waste Recycling, Treatment, Storage and Disposal***

To the extent possible, EPA tried to develop hazardous waste regulations that balance the conservation of resources, while ensuring the protection of human health and environment. Many hazardous wastes can be recycled safely and effectively, while other wastes will be treated and disposed of in landfills or incinerators.

Recycling hazardous waste has a variety of benefits, including reducing the consumption of raw materials and the volume of waste materials that must be treated and disposed. However, improper storage of those materials might cause spills, leaks, fires, and contamination of soil and drinking water. To encourage hazardous waste recycling while protecting health and the environment, [EPA developed regulations](#) to ensure recycling would be performed in a safe manner.

Treatment Storage and Disposal Facilities (TSDFs) provide temporary storage and final treatment or disposal for hazardous wastes. Since they manage large volumes of waste and conduct activities that may present a higher degree of risk, TSDFs are stringently regulated. The TSDF requirements establish generic facility management standards, specific provisions governing hazardous waste management units, and additional precautions designed to protect soil, ground water and air resources.

Comprehensive information on the final steps in EPA's hazardous waste management program is available online, including webpages and resources related to:

- [Hazardous waste recycling](#).
- [Regulations that apply to treatment, storage and disposal facilities](#).
- [Descriptions of land disposal restrictions](#).