

INTRODUCTION

WHY SHOULD I READ THIS GUIDANCE?

If a tank, drum, container, pipe, or other “process” at your facility contains any of the extremely hazardous toxic and flammable substances listed in the Code of Federal Regulations (CFR) at 40 CFR 68.130 in an amount above the “threshold quantity” specified for that substance, you are required to develop and implement a risk management program under a rule issued by the U.S. Environmental Protection Agency (EPA). (See Appendix A of this document for the list of substances and the threshold quantity established for each substance.) The rule, “Chemical Accident Prevention Provisions” (part 68 of Title 40 of the CFR), applies to a wide variety of facilities that handle, manufacture, store, or use toxic substances, including chlorine and ammonia and highly flammable substances such as propane (flammable substances used solely as fuel or sold by retailers are not covered). This document provides technical guidance on how to determine if you are subject to part 68 and how to comply with part 68. The original compliance deadline for part 68 was June 21, 1999, for facilities subject to the part by that date. For sources that first become subject to part 68 after June 21, 1999, you must be in compliance no later than the date on which you first have more than a threshold quantity of a listed substance in a process.

The goal of part 68 and the risk management program it requires is to prevent accidental releases of substances that can cause serious harm to the public and the environment from short-term exposures and to mitigate the severity of releases that do occur. Under the Clean Air Act (CAA), EPA was required to issue a rule specifying the types of actions to be taken by facilities (referred to in the law as stationary sources) to prevent accidental releases of such hazardous chemicals into the atmosphere and reduce their potential impact on the public and the environment. Part 68 is that rule.

In general, part 68 requires the following:

- ◆ Covered facilities must develop and implement a risk management program and maintain documentation of the program at the site. The risk management program includes an analysis of the potential offsite consequences of a worst-case accidental release, a five-year accident history, a release prevention program, and emergency planning.
- ◆ Covered facilities must develop and submit a risk management plan (RMP) to EPA no later than June 21, 1999, or the date on which the facility first has more than a threshold quantity of a listed substance in a process, whichever is later. The RMP generally describes the facility’s risk management program. The RMP is available to federal, state, and local government agencies and the public, with some restrictions on the availability of the offsite consequence analysis sections of the RMP.
- ◆ Covered facilities must implement the risk management program and update their RMPs periodically or when certain process or other changes occur, as required by the rule.

The phrase "risk management program" refers to all of the requirements of part 68, which must be implemented on an ongoing basis. The phrase "risk management plan (RMP)" refers to the document describing the risk management program that you must submit to EPA.

GUIDANCE FOR INDUSTRY-SPECIFIC RISK MANAGEMENT PROGRAMS

EPA worked with industry representatives to develop supplemental guidance for industry-specific risk management programs for the following industries:

- ◆ Propane storage facilities
- ◆ Chemical distributors
- ◆ Waste water treatment plants
- ◆ Warehouses
- ◆ Ammonia refrigeration

Industry-specific guidance is either appended to this guidance or is contained in stand-alone documents that you can obtain from EPA's website at www.epa.gov/emergencies/rmp. If an industry-specific appendix or guidance document exists for your process(es), you should consider using it because it will provide more information that is specific to your process(es), including dispersion modeling and prevention program elements.

HOW DO I USE THIS DOCUMENT?

This document is a technical guidance designed for owners and operators of sources covered by part 68. It will help you to:

- ◆ Determine if you are covered by the rule;
- ◆ Determine what level of requirements is applicable to your covered process(es);
- ◆ Understand what specific risk management program activities must be conducted;
- ◆ Select a strategy for implementing a risk management program, based on your current state of compliance with other government rules and industry standards and the potential offsite impact of releases from your process(es), and;
- ◆ Understand the reporting, documentation, and risk communication components of the rule.

This document provides guidance and reference materials to help you comply with EPA's chemical accident prevention regulations. It does not create any legally binding requirements on its own; its purpose is to help explain the requirements already established in part 68. It does not provide guidance on any other rule or part of the CAA.

STATE PROGRAMS

This guidance applies to 40 CFR part 68. You should check with your state government to determine if the state has its own accidental release prevention rules or has obtained delegation from EPA to implement and enforce an accidental release prevention program as a substitute for part 68 in your state. State rules may be more stringent than EPA's rules. They may cover more substances or cover the same substances at lower thresholds. They may also impose additional requirements. For example, California's state program requires a seismic study. See Chapter 10 for information on state implementation of part 68. Unless your state has been granted delegation, you must comply with part 68 as described in this document even if your state has different rules under state law.

WHAT DO I DO FIRST?

Before developing a risk management program, you should do five things:

(1) Determine which, if any, of your processes are covered by this program

Only sources with a threshold quantity of a "listed" or "regulated" substance (see Appendix A) in a "process" need to comply with part 68. "Process" is defined by the rule in § 68.3 and does not necessarily correspond with an engineering concept of process. The requirements apply only to covered processes. See Chapter 1 for more information on how to determine whether you have one or more "processes" subject to the rule.

(2) Determine the appropriate program level for each covered process

Depending on the specific characteristics of a covered process and the results of the offsite consequence analysis for that process, it may be subject to one of three different sets of requirements (called program levels). See Chapter 2 for more information.

(3) Determine EPA's requirements for the facility and each covered process

Certain requirements apply to the facility as a whole, while others are process-specific. See Chapter 2 for more information.

(4) Assess your operations to identify current risk management activities

Because you probably conduct some risk management activities already (e.g., employee training, equipment maintenance, and emergency planning), you should review your current operations to determine the extent to which they meet the provisions of this rule. EPA does not expect you to redo these activities if they already meet the rule's requirements. See Chapters 5 to eight individually for guidance on how to tell if your existing practices can meet those required by EPA.

(5) Review the regulations and this guidance to develop a strategy for conducting the additional actions you need to take for each covered process. Discuss the requirements with management and staff.

The risk management program takes an integrated approach to assessing and managing risks and will involve most of the operations of covered processes. Early involvement of both management and staff will help develop an effective program.

FLEXIBLE NATURE OF REQUIREMENTS

Finally, keep in mind that many part 68 requirements do not specify exactly what you must do to meet them; instead, they provide you with flexibility to develop an approach that makes sense for your facility. This allows you to tailor your program to fit the particular conditions at your facility. The degree of complexity required in a risk management program will depend on the complexity of the facility. For example, the operating procedures for a chemical distributor are likely to be relatively brief, while those for a chemical manufacturer will be extensive. Similarly, the length of training necessary to educate employees on such procedures will be proportional to the complexity of your operating procedures. And while a facility with complex processes may benefit from a computerized maintenance tracking system, a small facility with a simpler process may be able to track maintenance activities using a logbook.

There is no one "right" way to develop and implement a risk management program. Even for the same rule elements, your program will be different from everyone else's programs (even those in the same industry) because it will be designed for your specific situation and hazards — it will reflect whether your facility is near the public and sensitive environmental areas, the specific equipment you have installed, and other relevant factors.

WHERE DO I GO FOR MORE INFORMATION?

EPA's chemical accident prevention requirements were published in the *Federal Register* on January 31, 1994 (59 FR 4478) and June 20, 1996 (61 FR 31667). EPA has amended the rules several times. A consolidated copy of these regulations is available in Appendix A.

EPA works with industry and local, state, and federal government agencies to assist sources in complying with these requirements. For more information, refer to Appendix C (Technical Assistance). Your local emergency planning committee (LEPC) also can be a valuable resource and can help you discuss issues with the public.

Finally, if you have access to the Internet, EPA has made copies of the rules, fact sheets, and other related materials available at the home page of EPA's Office of Emergency Management at: www.epa.gov/emergencies/rmp. Please check the site regularly as additional materials are posted.

GLOSSARY OF TERMS

We have tried to make this document as clear and readable as possible, but if you have rarely dealt with regulations before, some of the language may seem initially odd and confusing. All regulations have their own vocabulary. A few words and phrases have very specific meanings within the regulation. Some of these are unusual, which is to say they are not used in everyday language. Others are defined by the rule in ways that vary to some degree from their everyday meaning. The following are the major regulatory terms used in this document and a brief introduction to their meaning within the context of part 68. They are defined in § 68.3 of the rule.

“Stationary source” basically means facility. The CAA, and thus part 68, use the term “stationary source” and we explain it in Chapter 1. Generally, we use “facility” in its place in this document.

“Process” is given a broad meaning in this rule and document. Most people think of a process as the mixing or reacting of chemicals. Its meaning under this rule is much broader. It basically means any equipment, including storage vessels, and activities, such as loading, that involves a regulated substance and could lead to an accidental release. Chapter 1 discusses the definition of process under this rule in detail.

“Regulated substance” means one of the 140 chemicals listed in part 68.

“Threshold quantity” means the quantity, in pounds, of a regulated substance which, if exceeded, triggers coverage by this rule. Each regulated substance has its own threshold quantity. If you have more than a threshold quantity of a regulated substance in a process, you must comply with the rule. Chapter 1 explains how to determine whether you have a threshold quantity.

“Vessel” means any container, from a single drum or pipe to a large storage tank or sphere.

“Public receptor” generally means any place where people live, work, or gather, with the exception of roads. Buildings, such as houses, shops, office buildings, industrial facilities, the areas surrounding buildings where people are likely to be present, such as yards and parking lots, and recreational areas, such as parks, sports arenas, rivers, lakes, beaches, are considered public receptors. Chapter 2 discusses public receptors.

“Environmental receptor” means a limited number of natural areas that are officially designated by the state or federal government. Chapter 2 discusses this definition.

WHAT IS A LOCAL EMERGENCY PLANNING COMMITTEE?

Local emergency planning committees (LEPCs) were formed under the Federal Emergency Planning and Community Right-to-Know Act (EPCRA) of 1986. The committees are designed to serve as a community forum for issues relating to preparedness for emergencies involving hazardous substances. They consist of representatives from local government, local industry, transportation groups, health and medical organizations, community groups, and the media. LEPCs:

- ◆ Collect information from facilities on hazardous substances that pose a risk to the community;
- ◆ Develop a contingency plan for the community based on this information; and
- ◆ Make information on hazardous substances available to the general public.

Contact the mayor's office or the county emergency management office for more information on your LEPC.