



HAZARDS COMMUNICATION

IN THE WORKPLACE

Chemical exposure may cause or contribute to many serious health effects such as heart ailments, kidney and lung damage, sterility, cancer, burns, and rashes. Some chemicals may be safety hazards and have the potential to cause fires and explosions and other serious accidents.

Because of the seriousness of these safety and health problems and the lack of information available to many employees and employers, the Occupational Safety and Health Administration (OSHA) has issued a standard entitled "Hazard Communication" (29 CFR 1910.1200). The goal of the standard is to reduce the incidence of chemical source illnesses and injuries.

The purpose of the hazard communication standard is to establish uniform requirements to make sure that the hazards of all chemicals produced, imported, or used within the United States are evaluated, and that this hazard information is transmitted to affected employers and employees.

Chemical manufacturers and importers must convey hazard information to downstream employers by means of labels on containers and material safety data sheets (MSDS). In addition, all covered employers are required to have a hazard communication program to

provide the information to their employees by means of container labeling and other forms of warning, MSDS, and training.

HAZARD EVALUATION

Chemical manufacturers and importers are required to review the available scientific evidence concerning the hazards of the chemicals they produce or import, and to report the information they find to their employees and to employers who purchase their products. Downstream employers can rely on the evaluation performed by the chemical manufacturer or importer to establish their hazard communication programs.

The chemical manufacturers, importers, and employers are responsible for the quality of the hazard determinations they perform.

Each chemical is to be evaluated for its potential to cause adverse health effects and its potential to pose physical hazards, such as flammability. (Definitions of hazards covered are included in the standard.) Chemicals which are listed in one of the following sources are to be considered hazardous in all cases:

- 29 CFR, 1910, Subpart Z, Toxic and Hazardous Substances. Occupational Safety and Health Administration (OSHA), and

- Threshold Limit Values for Chemical Substances and Physical Agents in the Work Environment. American Conference of Governmental Industrial Hygienists (ACGIH).

In addition, chemicals which have been evaluated and found to be a suspect or confirmed carcinogen in the following sources are to be reported as such:

- National Toxicology Program (NTP), Annual Report on Carcinogens.
- International Agency for Research on Cancer (IARC), Monographs, and
- 29 CFR 1910, Subpart Z, Toxic and Hazardous Substances, Occupational Safety and Health Administration (OSHA).

WRITTEN HAZARD COMMUNICATION PROGRAM

Employers must establish a written, comprehensive hazard communication program which includes provisions for container labeling, material safety data sheets, and an employee training program. It must also contain a list of the hazardous chemicals in each work area, the means the employer will use to inform employees of the hazards of non-routine tasks (for example, the cleaning of reactor vessels), hazards associated with chemicals in unlabeled pipes, and the way the employer will inform contractors in manufacturing facilities of the hazards to which their employees may be exposed.

The written program must be available to employees, their designated representatives, OSHA and NIOSH.

LABELS AND OTHER FORMS OF WARNING

Chemical manufacturers, importers, and distributors must be sure that containers of hazardous chemicals leaving the workplace are labeled, tagged or marked with the identity, appropriate hazard warnings, and the name and address of the manufacturer or other responsible party.

In the workplace, each container must be labeled, tagged or marked with the identity of hazardous chemicals contained therein, and must show hazard warnings appropriate for employee protection. The hazard warning can be any type of message, words, pictures, or symbols which convey the hazards of the chemical(s) in the container. Labels must be legible, in English (plus other languages, if desired), and prominently displayed.

Several exemptions to in-plant individual container labels are given:

- Employers can post signs or placards which convey the hazard information if there are a number of stationary containers within a work area which have similar contents and hazards.
- Various types of standard operating procedures, process sheets, batch tickets, blend tickets, and similar written materials can be substituted for container labels on stationary process equipment if they contain the same information and are readily available to employees in the work area.
- Employers are not required to label portable containers, into which hazardous chemicals are transferred from labeled containers, and which are intended only for the immediate

use of the employee who makes the transfer.

- Employers are not required to label pipes or piping systems.

MATERIAL SAFETY DATA SHEETS (MSDS)

Chemical manufacturers and importers must develop Material Safety Data Sheets for each hazardous chemical they produce or import.

Employers are responsible for obtaining or developing a MSDS for each hazardous chemical used in their workplaces.

Each MSDS must be in English and include information regarding the specific chemical identity of the hazardous chemical(s) involved and the common names; information on the physical and chemical characteristics of the hazardous chemical; known acute and chronic health effects and related health information; exposure limits; whether the chemical is considered to be a carcinogen by NTP, IARC, or OSHA; precautionary measures; emergency and first aid procedures; and the identification of the organization responsible for preparing the sheet.

Copies of the MSDS for hazardous chemicals in a given work site are to be readily accessible to employees in that area as a source of detailed information on hazards to workers and readily available to them during each work shift.

EMPLOYEE INFORMATION AND TRAINING

Employers must establish a training and information program for employees exposed to hazardous chemicals in their work area at the time of initial

assignment and whenever a new hazard is introduced into their work area.

All employees covered by the standard must have received training equivalent to the required initial assignment training.

The discussion topics must include, at least:

- The existence of the hazard communication standard and the requirements of the standard.
- The components of the hazard communication program in the employees' workplaces.
- Operations in their work area where hazardous chemicals are present.
- Where the employer will be keeping the written hazard evaluation procedures, communications program, lists of hazardous chemicals, and the required MSDS.

The employee training plan must consist of:

1. How the hazard communication program is implemented in that workplace, how to read and interpret information on labels and MSDS, and how employees can obtain and use the available hazard information.
2. The hazards of the chemicals in the work area.
3. Measures employees can take to protect themselves from the hazards.
4. Specific procedures put into effect by the employer to provide protection such as work practices and the use of personal protective equipment (PPE).

5. Methods and observations—such as visual appearance or smell—workers can use to detect the presence of a hazardous chemical they may be exposed to.

TRADE SECRETS

Chemical industry trade secrets are general formulas, process data, or a “specific chemical identity.” The latter is the type of trade secret information referred to in the hazard communication standard. The term includes the chemical name, the Chemical Abstracts Services (CAS) Registry Number, or any other specific information which reveals the precise designation. It does not include common names.

The standard strikes a balance between the need to protect exposed employees and the employer’s need to maintain the confidentiality of a bona fide trade secret.

This is done by providing for limited disclosure to health professionals who are furnishing medical or other occupational health services to exposed employees, under specified conditions of need and confidentiality.

MEDICAL EMERGENCY

The chemical manufacturer, importer, or employer must immediately disclose the specific chemical identity of a hazardous chemical to a treating physician or nurse when the information is needed for proper emergency or first aid treatment. As soon as circumstances permit, the chemical manufacturer, importer, or employer may obtain a written statement of need and a confidentiality agreement. At the time of the emergency, the professional judgment of the physician or nurse regarding the situation must

form the basis for triggering the immediate disclosure requirement.

NON-EMERGENCY SITUATION

In non-emergency situations, chemical manufacturers, importers, or employers must disclose the withheld specific chemical identity to those providing health services to exposed employees if certain conditions are met.

The request for information must be in writing and must describe with reasonable detail the medical or occupational health need for the information.

The health professional must also specify why alternative information is insufficient. The request for information must explain in detail why disclosure of the specific chemical identity is essential, and include the procedures to be used to protect the confidentiality of the information. It must include an agreement not to use the information for any purpose other than the health need stated or to release it under any circumstances, except to OSHA.

The standard further describes in detail the steps that will be followed in the event that an employer decides not to disclose the specific chemical identity requested by the health professional.

Date:	Company Name:	
Project Number/Name:	Meeting Location:	Person Conducting Meeting:

Items Discussed: _____

Problem Areas or Concerns: _____

Attendees: _____

Comments: _____
