

# Alaska Occupational Safety and Health's

## Quick Guide to Hazard Communication



## **What do I have to do to comply?**

The essence of hazard communication is a warning. We use thousands of chemical products throughout our lives but most of us couldn't tell safe ones from hazardous ones without a warning – the familiar skull and crossbones, for example. The warning tells us the chemicals in a product can harm us if we don't use it properly.

## **Why do we have workplace hazard communication rules?**

The rules make sure workers who use hazardous chemicals know how the chemicals can harm them and how to use them safely.

## **Who's affected by the rules?**

The rules are listed in 29 CFR 1926.59 for the construction industry, 29 CFR 1910.1200 for general industry, and 8 AAC 61.1110 for additional requirements that protect workers in all industry throughout Alaska.

## **Understanding the hazard communication process**

Hazard communication is a process that involves chemical manufacturers, importers, distributors, and you.

## **Key elements of the Hazard Communication Standard**

- Written Program
- Labels and other forms of warning
- Safety Data Sheets
- Information and training

## **Preparing a Written Hazard Communication Program**

The HCS provides people the right-to-know the hazards and identities of the chemicals they are exposed to in the workplace. When employees have this information, they may effectively participate in their employers' protective programs and take steps to protect themselves.

A hazard communication program identifies the hazardous chemicals at the workplace and describes how employers will inform and train employees about the hazards.

The Hazard Communication Standard (HCS) requires all workplaces where employees are exposed to hazardous chemicals to have a written plan that describes how that facility will implement the standard. Preparation of the plan is not just a paper exercise -- all of the elements must be implemented in the workplace to comply with the rule.

The plan does not have to be lengthy or complicated. It is intended to be a blueprint for implementing the hazard communication program -- an assurance that all aspects of the requirements have been addressed.

Many trade associations and other professional groups have provided sample programs and other assistance materials to affect employers. These have been very helpful to many employers since they tend to be tailored to the particular industry involved. You may wish to investigate whether your industry's trade groups have developed such materials.

Although such general guidance may be helpful, employers must remember that the written program has to reflect what you are doing in your workplace. Therefore, if you use a generic program, you must adapt it to address the facility it covers. For example, the written plan must list the chemicals present at the site and indicate where written materials will be made available to employees. It also may indicate who is responsible for the various aspects of the program in your facility.

The written program must describe how the requirements for labels and other forms of warning, safety data sheets, and employee information and training, are going to be met in your facility.

An effective Hazard Communication program depends on the credibility of management's involvement in the program; inclusion of employees in safety and health decisions; rigorous worksite analysis to identify hazards and potential hazards, including those which could result from a change in worksite conditions or practices; stringent prevention and control measures; and thorough training. It addresses hazards whether or not they are regulated by government standards.

# How to Prepare Your Hazard Communication Program

## **Identify the chemicals that employees could be exposed to by developing a list.**

- If a chemical is hazardous and an employee could be exposed to it, put it on the list. Include hazardous chemicals in all forms – liquids, solids, gases, vapors, fumes, and mists.
- Update the list when new chemicals are introduced to the workplace.
- Make sure there is a safety data sheet for each chemical on the list.

## **Determine where you will keep safety data sheets.**

Keep safety data sheets where they are readily available to all employees. Identify the location if you store them in a paper file. Describe how employees will access them if you store them electronically.

## **Describe how you will train your employees about the chemical hazards.**

Include how employees can protect themselves from hazards associated with each chemical, what they need to know about safety data sheets and warning labels, and where they can review safety data sheets.

## **Describe how you will inform employees who do non-routine tasks about the hazardous chemicals they may be exposed to.**

Include a description of the non-routine tasks and what employees must do to minimize exposure.

## **Describe how you will inform employees about hazardous chemicals in pipes.** Focus on hazardous chemicals in pipes that run through employees' work areas.

## **Describe how you will inform contractors' employees about the hazardous chemicals they may be exposed to.**

Include where employees can find safety data sheets and how they can recognize warning labels on hazardous chemicals.

## Workplace Labeling

OSHA has adopted new hazardous chemical labeling requirements as a part of its recent revision of the Hazard Communication Standard, 29 CFR 1910.1200 (HCS), bringing it into alignment with the United Nations' Globally Harmonized System of Classification and Labelling of Chemicals (GHS). These changes will help ensure improved quality and consistency in the classification and labeling of all chemicals, and will also enhance worker comprehension. As a result, workers will have better information available on the safe handling and use of hazardous chemicals, thereby allowing them to avoid injuries and illnesses related to exposures to hazardous chemicals.

The revised HCS changes the existing Hazard Communication Standard (HCS/HAZCOM 1994) from a performance-based standard to one that has more structured requirements for the labeling of chemicals. The revised standard requires information about chemical hazards be conveyed on labels using quick visual notations to alert the user, providing immediate recognition of the hazards. Labels must also provide instructions on how to handle the chemical so users understand how to protect themselves.

The label provides information to the workers on the specific hazardous chemical. While labels provide important information for anyone who handles, uses, stores, and transports hazardous chemicals, they are limited by design in the amount of information they can provide. Safety Data Sheets (SDSs), which must accompany hazardous chemicals, are the more complete resource for details regarding hazardous chemicals. The revised standard also requires the use of a 16-section safety data sheet format, which provides detailed information regarding the chemical.

Employers are responsible for maintaining the labels on the containers, including, but not limited to, tanks, totes, and drums. This means labels must be maintained on chemicals in a manner which continues to be legible and the pertinent information (such as the hazards and directions for use) does not get defaced (i.e., fade, get washed off) or removed in any way.

The employer is not responsible for updating labels on shipped containers, even if the shipped containers are labeled under HazCom 1994. The employer must relabel items if the labels are removed or defaced. However, if the employer is aware of newly-identified hazards that are not disclosed on the label, the employer must ensure the workers are aware of the hazards as discussed below.

## Label Hazardous Chemical Containers

Every hazardous chemical container in the workplace must have a legible label, in English, which names the chemical and warns of its hazards. There's an exception for portable containers. Don't remove or deface the labels on containers that you receive from manufacturers, importers, or distributors.

Labels for a hazardous chemical must contain:

- Name, Address and Telephone Number
- Product Identifier
- Signal Word
- Hazard Statement(s)
- Precautionary Statement(s)
- Pictogram(s)

### **Portable containers don't need labels if their contents are used immediately**

Portable containers are intended for "immediate use." This bit of legalese means if you're an employee you must not allow anyone else to use the container and you must use the contents during your work shift.

- Immediate use means the hazardous chemical will be under the control of and used only by the person who transfers it from a labeled container and only within the work shift in which it is transferred.

Examples of portable containers:

- bags
- barrels
- bottles
- boxes
- cans
- cylinders
- drums
- reaction vessels

Manufacturers, importers, and distributors must ensure each hazardous chemical product has a label that includes the chemical's name, a hazard warning, and a contact for more information about the product.



One person should be responsible for ensuring all containers are properly labeled.

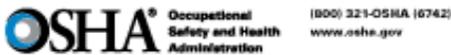
# Example Labels



## Hazard Communication Standard Labels

OSHA has updated the requirements for labeling of hazardous chemicals under its Hazard Communication Standard (HCS). As of June 1, 2015, all labels will be required to have pictograms, a signal word, hazard and precautionary statements, the product identifier, and supplier identification. A sample revised HCS label, identifying the required label elements, is shown on the right. Supplemental information can also be provided on the label as needed.

For more information:



**SAMPLE LABEL**

OSHA  
Product Name } **Product Identifier**

Company Name }  
Street Address }  
City } **Supplier Identification**  
State }  
Postal Code }  
Country }  
Emergency Phone Number }

**Hazard Pictograms**

**Signal Word**  
**Danger**

**Hazard Statements**  
Highly flammable liquid and vapor  
May cause liver and kidney damage.

**Precautionary Statements**  
Keep container tightly closed. Store in a cool, well-ventilated place that is locked.  
Keep away from heat/sparks/open flames. No smoking.  
Only use non-sparking tools.  
Use explosion-proof electrical equipment.  
Take precautionary measures against static discharge.  
Ground and bond container and receiving equipment.  
Do not breathe vapors.  
Wear protective gloves.  
Do not eat, drink or smoke when using this product.  
Wash hands thoroughly after handling.  
Dispose of in accordance with local, regional, national, or international regulations as specified.

**Supplemental Information**  
**Directions for Use**  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
**Fill weight:** \_\_\_\_\_ **Lot Number:** \_\_\_\_\_  
**Gross weight:** \_\_\_\_\_ **Fill Date:** \_\_\_\_\_  
**Expiration Date:** \_\_\_\_\_

**First Aid**  
If inhaled: Get fresh air. If exposed: Call Poison Control. If on skin (or hair): Take off immediately any contaminated clothing. Rinse skin with water.

OSHA 34462-02 2012

## Components Of A GHS-Compliant Label

product identifier

**AMMONIA**

signal word

**DANGER**

hazard statement

**TOXIC IF INGESTED**

precautionary statements

Wash hands thoroughly after handling. Keep container tightly closed when not in use. Keep away from heat, sparks and open flames - may explode when exposed to high heat. Use in an open area that is well-ventilated. Breathing in ammonia is irritating and corrosive. Wear protective gloves and safety goggles to prevent burns and irritation.

supplier information

If swallowed: Immediately call Poison Control or doctor/physician. Drink water or milk to dilute ammonia.

**ABC Chemicals - 123 Main Street - Cincinnati, OH - www.abcchem.com - 800-733-5252**



pictograms

See Safety Data Sheet (SDS) for further details regarding safe use of this product.

# Hazard Communication Pictograms

The following pictogram files can be downloaded at <https://www.osha.gov/dsg/hazcom/pictograms/>.

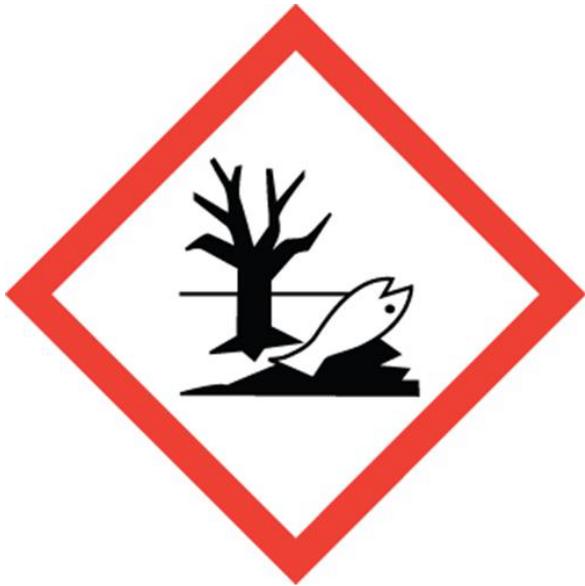
The size of each pictogram can be adjusted and will remain proportional. EPS is a standard format (vector image) for printing materials professionally or for producing materials for large projects (e.g., labels for signs, tanks, and vessels).

NOTE: Appendix C, Section C.2.3.1 of 29 CFR 1910.1200 states the following: Pictograms shall be in the shape of a square set at a point and shall include a black hazard symbol on a white background with a red frame sufficiently wide to be clearly visible. A square red frame set at a point without a hazard symbol is not a pictogram and is not permitted on the label.



Carcinogen  
Mutagenicity  
Reproductive Toxicity  
Respiratory Sensitizer  
Target Organ Toxicity  
Aspiration Toxicity

## Health Hazard



Aquatic Toxicity

**Environmental**



Acute Toxicity (Fatal or Toxic)

**Skull & Crossbones**



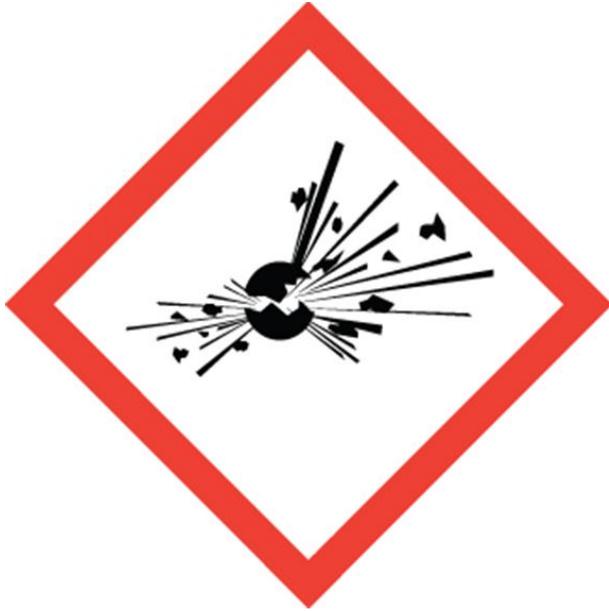
Gases Under Pressure

### **Gas Cyliner**



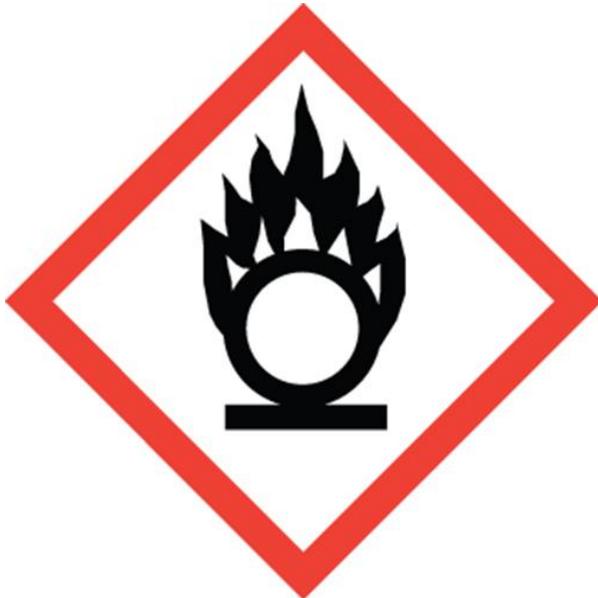
Skin Corrosion/Burns  
Eye Damage  
Corrosive to Metals

### **Corrosion**



Explosives  
Self-Reactive  
Organic Peroxides

### **Exploding Bomb**



Oxidizers

### **Flame Over Circle**



Flammables  
Pyrophoric  
Self-Heating  
Emits Flammable Gas  
Self-Reactive  
Organic Peroxides

### **Flame**

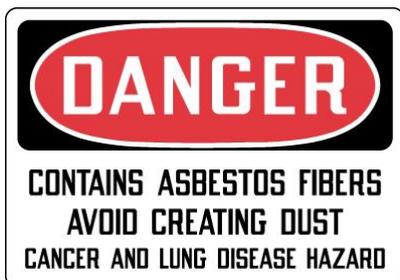


Irritant (skin and eye)  
Skin Sensitizer  
Acute Toxicity  
Narcotic Effects  
Respiratory Tract Irritant  
Hazardous to Ozone Layer  
(Non-Mandatory)

### **Exclamation Mark**

## Label Pipes That Contain Hazardous Substances

If the workplace has pipes containing hazardous substances or is insulated with asbestos-containing material, place warning labels on the pipes or use other methods, such as process sheets or written procedures, to warn employees.



### Hazardous substances include:

- Physical hazards such as combustible liquids or compressed gas
- Health hazards such as toxic, carcinogenic, or corrosive chemicals

- The method you use must clearly identify the location of the pipes and the substances in the pipes.
- Process sheets or written procedures must be readily available to employees in their work areas.
- Apply labels at the beginning and at the end of continuous pipe runs (at least every 75 feet on pipes insulated with asbestos-containing material).
- The warning label on pipes insulated with asbestos-containing material must identify the location of the pipes and include these words: **Danger-Contains asbestos fiber. Avoid creating dust. Cancer and lung disease hazard.**
- If a pipe is above or below the normal line of vision, apply the label above or below the horizontal centerline of the pipe so employees can see it.

## **Safety Data Sheets (SDS)**

The Hazard Communication Standard (29 CFR 1910.1200(g)), revised in 2012, requires that the chemical manufacturer, distributor, or importer provide Safety Data Sheets (SDSs) (formerly MSDSs or Material Safety Data Sheets) for each hazardous chemical to downstream users to communicate information on these hazards. The information contained in the SDS is largely the same as the MSDS, except now the SDSs are required to be presented in a consistent user-friendly, 16-section format. This brief provides guidance to help workers who handle hazardous chemicals to become familiar with the format and understand the contents of the SDSs.

The SDS includes information such as the properties of each chemical; the physical, health, and environmental health hazards; protective measures; and safety precautions for handling, storing, and transporting the chemical. The information contained in the SDS must be in English (although it may be in other languages as well). In addition, OSHA requires SDS preparers provide specific minimum information as detailed in Appendix D of 29 CFR 1910.1200. The SDS preparers may also include additional information in various section(s).

Sections 1 through 8 contain general information about the chemical, identification, hazards, composition, safe handling practices, and emergency control measures (e.g., firefighting). This information should be helpful to those that need to get the information quickly.

Sections 9 through 11 and 16 contain other technical and scientific information, such as physical and chemical properties, stability and reactivity information, toxicological information, exposure control information, and other information including the date of preparation or last revision. The SDS must also state that no applicable information was found when the preparer does not find relevant information for any required element.

The SDS must also contain Sections 12 through 15, to be consistent with the UN Globally Harmonized System of Classification and Labeling of Chemicals (GHS), but OSHA will not enforce the content of these sections because they concern matters handled by other agencies.

Employers must ensure the SDSs are readily accessible to employees for all hazardous chemicals in their workplace. This may be done in many ways. For example, employers may keep the SDSs in a binder or on computers as long as the employees have immediate access to the information without leaving their work area when needed and a back-up is available for rapid access to the SDS in the case of a power outage or other emergency. Furthermore, employers may want to designate a person(s) responsible for obtaining and maintaining the SDSs. If the employer does not have an SDS, the employer or designated person(s) should contact the manufacturer to obtain one.

## Make Sure Safety Data Sheets Are Current and Readily Available For Employees to Use

- There must be a current safety data sheet (SDS) for each hazardous chemical product employees use or may be exposed to.
- Employees must be able to review safety data sheets in their work area at any time.
- It's OK to keep safety data sheets in a notebook or on a computer, but employees must be able to get the information immediately in an emergency.
- Make sure the list of hazardous chemicals is current, there's a safety data sheet for each chemical on the list, and incoming hazardous-chemical containers have safety data sheets.
- In addition to SDS requirements, an employer must have a Physical Agent Data Sheet (PADS) for each physical agent present in the workplace.

A safety data sheet has detailed information about a hazardous chemical's health effects, physical and chemical characteristics, and safe practices for using it.

Chemical manufacturers and importers must prepare a safety data sheet for each hazardous chemical product they ship to you. Distributors must make sure you have a safety data sheet for each hazardous chemical product they sell to you.

## Record Keeping

You don't need to keep safety data sheets for hazardous chemicals you're no longer using. However, you must keep records of the chemicals, where they were used, and the years they were used for at least 30 years.

For information about keeping records, see "Access to employee exposure and medical records" 29 CFR 1910.1020(d)(ii)(B).

If possible, only one person should be responsible for managing all the safety data sheets at the workplace.

## **Additional Alaska Requirements**

8 AAC 61.1110(a) In addition to the requirements set out in 29 C.F.R 1910.1200, as amended, an employer shall have a physical agent data sheet for each physical agent present in the employer's workplace.

“Physical Agent” means heat stress, cold stress, hand-arm (segmented) vibration, ionizing radiation, lasers, noise, radio frequency and microwave radiation, or ultra violet radiation which exceeds the threshold established in the 1995-96 edition of Threshold Limit Values for chemical Substances and Physical Agents and Biological Exposure Indices in the Work Environment, published by The American Conference of Governmental Industrial Hygienists (ACGIH).

The following Physical Agent Data Sheets (PADS) are available through the AKOSH website.

Noise

Lasers

Cold Stress

Heat Stress

Ionizing Radiation

Hand-Arm Vibration

Ultraviolet Radiation

Radio Frequency/Microwave Radiation

<http://labor.alaska.gov/lss/pads/pads.htm>

## Training Requirements

Each employee who may be "exposed" to hazardous chemicals when working must be provided information and be trained prior to initial assignment to work with a hazardous chemical, and whenever the hazard changes. "Exposure" or "exposed" under the rule means an employee is subjected to a hazardous chemical in the course of employment through any route of entry (inhalation, ingestion, skin contact, or absorption) and includes potential (e.g., accidental or possible) exposure. See 1910.1200 (h) of the standard for specific requirements.

Information and training may be done either by individual chemical, or by categories of hazards (such as flammability or carcinogenicity). If there are only a few chemicals in the workplace, then you may want to discuss each one individually. Where there are a large number of chemicals, or the chemicals change frequently, you will probably want to train generally based on the hazard categories (e.g., flammable liquids, corrosive materials, carcinogens). Employees will have access to the substance-specific information on the labels and SDSs. Employers must ensure, however, employees are made aware of which hazard category a chemical falls within.

Information and training are a critical part of the hazard communication program. Workers obtain information regarding hazards and protective measures through written labels and safety data sheets. It is through effective information and training, however, that workers will learn to read and understand such information, determine how to acquire and use it in their own workplace, and understand the risks of exposure to the chemical in their workplaces as well as the ways to protect themselves.

A properly conducted training program will ensure comprehension and understanding. It is not sufficient to either just read material to the workers or simply hand them material to read. You want to create a climate where workers feel free to ask questions. This will help you to ensure the information is understood. You must always remember the underlying purpose of the HCS is to reduce the incidence of chemical source illnesses and injuries. This will be accomplished by modifying behavior through the provision of hazard information and information about protective measures.

If your program works, you and your workers will better understand the chemical hazards within the workplace. The procedures you establish, regarding, for example, purchasing, storage, and handling of these chemicals will improve, and thereby reduce the risks posed to employees exposed to the chemical hazards involved. Furthermore, your workers' comprehension also will be increased, and proper work practices will be followed in your workplace.

# Train Employees When You Hire Them and Whenever They Are Exposed To a New Chemical Hazard or Process

## Cover the following topics:

- Where to find and how to read the hazard communication plan, the list of hazardous chemicals, and safety data sheets
- Jobs and processes in which hazardous chemicals are used
- The chemicals' physical and health hazards
- The meaning of warning labels on chemical containers and on pipes that contain hazardous substances
- How to recognize emergencies involving hazardous chemicals
- The procedures, equipment, and work practices that control exposure



## Who can train employees?

### ANSWER:

Choose a person who understands the topics and knows how to do the training. Forms such as those on the following pages help you document when employees have received hazard communication training.

If you would like more assistance with establishing a hazardous communication program or with other aspects of your workplace safety and health system, contact AKOSH Consultation and Training at (800) 656-4972.



## Example Training Acknowledgement Form

Use a form such as this one to document that an employee has been trained about hazardous chemicals used in the workplace as required by Alaska OSHA hazard communication rules.

I have been informed about the hazardous chemicals that I may be exposed to during my work and I have received training on the following topics:

- ❖ An overview of the requirements in Alaska OSHA's hazard communication rules
- ❖ Hazardous chemicals present in the workplace
- ❖ The written hazard communication program
- ❖ How to read labels and review safety data sheets
- ❖ Physical and health hazards associated with chemicals in the workplace
- ❖ Methods to determine the presence or release of hazardous chemicals in the work area
- ❖ How to reduce or prevent exposure to these hazardous chemicals through use of exposure controls/work practices and personal protective equipment
- ❖ Steps we have taken to reduce or prevent exposure to these chemicals
- ❖ Emergency procedures to follow if exposed to these chemicals

**Note to employee:** This form becomes part of your personnel file; read and understand it before signing.

Employee: \_\_\_\_\_ Date: \_\_\_\_\_

Trainer: \_\_\_\_\_ Date: \_\_\_\_\_

## **Hazard Communication for Contracted or Temporary Employees**

Both the temporary agency and the host employer are responsible for ensuring employees are effectively informed and trained regarding exposure to hazardous chemicals. The directive titled Inspection Procedures for the Hazard Communication (HAZCOM) Standard, 29 CFR § 1910.1200, CPL 02-02-038, specifically discuss this issue:

- [Hazard Communication Standard] training of temporary employees is a responsibility that is shared between the temporary agency and the host employer. The host-employer holds the primary responsibility for training since the host employer uses or produces chemicals, creates and controls the hazards, and is, therefore, best suited to inform employees of the chemical hazards specific to the workplace environment. The temporary agency, in turn, maintains a continuing relationship with its employees, and would be, at a minimum, expected to inform employees of the requirements of the standard. (CPL 02-02-38, Appendix A, Section h, March 20, 1998)

OSHA considers temporary employment agencies that send their own employees to work at other facilities to be employers whose employees may be exposed to hazards. Since it is your company, which maintains a continuing relationship with its employees, but another employer (the client) who creates and controls the hazards, there is a shared responsibility for assuring employees are protected from the workplace hazards. The client has the primary responsibility of such protection. The "lessor employer" likewise has a responsibility under the Occupational Safety and Health Act. In meeting the requirements of OSHA's Hazard Communication standard the lessor employer would, for example, be expected to provide the training and information requirements specified by the Hazard Communication Standard section (h)(1). Client employers would then be responsible for providing site-specific training and would have the primary responsibility to control potential exposure conditions. The client, of course, may specify what qualifications are required for supplied personnel, including training in specific chemicals or personal protective equipment (PPE). Contracts with your client employer and your employees should clearly describe the responsibilities of both parties in order to ensure all requirements of the regulation are met. Client employers would be responsible for providing PPE for site-specific hazards to which employees may be exposed. However, the client may specify the services that it wants the lessor employer to supply, including provision of PPE for the placed employees.

# **AKOSH Services**

**The Alaska Occupational Safety and Health program (AKOSH) offers a wide variety of safety and health services to employers and employees:**

## **Consultative Services**

- Offers no-cost, on-site safety and health assistance to help Alaska employers recognize and correct workplace safety and health problems. For assistance contact AKOSH Consultation and Training at (800) 656-4972 or (907) 269-4955
- Provides consultations in the areas of occupational safety, industrial hygiene, occupational safety and health programs, assistance to new businesses, the Safety and Health Achievement Recognition Program (SHARP), and the Voluntary Protection Program (VPP)

## **Enforcement**

- Offers pre-job conferences for mobile employers in industries such as logging and construction
- Inspects places of employment for occupational safety and health hazards and investigates workplace complaints and accidents
- Provides abatement assistance to employers who have received citations and provides compliance and technical assistance by phone

## **Standards and Technical Resources**

- Develops, interprets, and provides technical advice on safety and health standards
- Provides copies of all AKOSH occupational safety and health standard

## **Public Education and Conferences**

- Conducts conferences, seminars, workshops, and rule forums
- Coordinates and provides technical training on topics such as confined space, ergonomics, lockout/tagout, and excavations
- Provides workshops covering management of basic safety and health programs, safety committees, accident investigation, and job safety analysis

**For more information call the AKOSH office nearest you.**

**Anchorage Office**

1251 Muldoon Road, Suite 109

Anchorage, AK 99504

**Phone:** (907) 269-4955

**Toll-free:** (800) 656-4972

**Fax:** (907) 269-4950

**Web site:** <http://www.labor.state.ak.us/lss/oshhome.htm>

**Juneau Office**

1111 W 8<sup>th</sup> Street, Suite 304

Juneau, AK 99801

**Phone:** (907) 465-4855

**Fax:** (907) 465-6012

**Fairbanks Office**

675 7<sup>th</sup> Avenue, Station J1

Fairbanks, AK 99701-4596

**Phone:** (907) 451-2888

**Fax:** (907) 451-2885

**Wasilla Office**

877 W. Commercial

Drive Wasilla, AK

99654

**Phone:** (907) 352-4180

**Fax:** (907) 352-4182



***ALASKA DEPARTMENT OF LABOR  
& WORKFORCE DEVELOPMENT***