

## HAZARDOUS CHEMICALS / GHS / SAFETY DATA

In 2012, the Occupational Safety and Health Administration (OSHA) adopted new hazardous chemical labeling requirements. Almost all chemical manufacturers, importers, distributors, and employers in the United States are now required to use the Globally Harmonized System of classifying and labeling chemicals (GHS). This new system updated the requirements for safety data sheets (formerly Material Safety Data Sheets) and chemical labels. Integrated Water Services provides a complete list of known chemicals at the company Right to Know Center: <https://iws.support/all-sds-files>

### GHS Labeling Requirements

If a container contains hazardous chemicals, it must be properly labeled, with only a few exceptions. These labels must include signal words, pictograms, precautionary statements, product identifiers, and the supplier's contact information.

The signal word is one word that indicates the chemical's relative level of severity. The two possible signal words are "DANGER" and "WARNING." "DANGER" indicates a more extreme or immediate hazard, and "WARNING" indicates a less extreme or less immediate hazard. The precautionary statement is a short statement that describes the recommended measures that users should take to minimize adverse effects of chemical exposure. Two examples of precautionary statements are "Do not allow contact with water", "Wash hands thoroughly after handling", "Keep away from heat, hot surfaces, sparks, open flames, and other ignition sources", "No smoking", etc.

### Pictograms

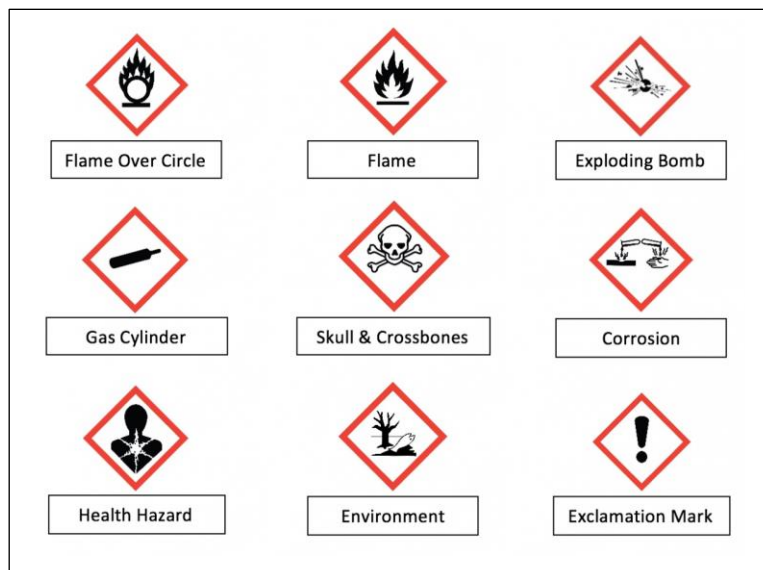
The GHS uses nine standard pictograms. These are black images surrounded by a red diamond border on a white background. The nine pictograms are:

- Chronic health hazards (such as a carcinogen or mutagen)
- Flammable materials
- Irritants
- Gases under pressure
- Corrosives
- Explosives
- Oxidizers
- Acute (or short-term) toxicants
- Environmental toxicants

### Safety Data Sheets

(SDSs) provide workers with in-depth information about a chemical. The company must have an SDS available for every hazardous chemical in our operations. If you know of a chemical that does not have a corresponding SDS in the online Right to Know Center, please fill out this [SDS Request Form](#). Each SDS contains the following (sixteen) sections:

1. Chemical identification
2. Hazard identification
3. Composition and information on ingredients
4. First-aid measures
5. Fire-fighting measures
6. Accidental release measures
7. Handling and storage
8. Exposure controls and PPE
9. Physical and chemical properties
10. Stability and reactivity
11. Toxicology information
12. Ecology information
13. Disposal considerations
14. Transport information
15. Regulatory information
16. Other information



### Chemicals at Integrated Water Services

The chemicals that are present and may be used at the company are found at the Right to Know Center located at: [www.iws.support](http://www.iws.support)

### Employee Responsibilities

Employees must be able to:

- Read and understand chemical labels
- Know where to find Safety Data Sheets
- Know how to understand Safety Data Sheets.

Before handling hazardous chemicals, you should first review the SDS for the chemicals. The SDS will provide information on the personal protective equipment (PPE) that should be worn and how to respond to an incident involving the chemicals. Certain PPE such as respiratory protection requires a medical evaluation, fit testing, and training. Failure to wear the appropriate PPE and complete the required training for handling chemicals can be a deadly mistake- don't be a victim of poor planning and poor decisions. It's better to prepare and prevent instead of repair and repent!