Safety Meeting Outline

SMO 07-0301

ARGON

By SeaBright Insurance Loss Control

The Hazard Communication Standard has made it a requirement that users of hazardous materials understand the properties and the hazards of these materials. They must also know how to protect themselves from the dangers these materials present. Regulations have made Material Safety Data Sheets (MSDS) the primary source of information. However, many people have recognized that MSDSs are not understood by the average worker. This information will attempt to supplement the MSDS by providing key information about the primary hazards of frequently used materials in a form that can be understood by a layperson.

It doesn't ignite, so it won't burn you. It's not considered toxic, so it won't poison you. It won't clog your lungs with dust and bring on disease. But it will kill you. What is it? Argon.

Argon is what is known as an inert gas and a simple asphyxiant. It is commonly used to shield a weld from oxygen when TIG welding. Sometimes, it is used to displace the oxygen in a container that has held a combustible so hot work can be performed safely. This is how argon kills. It displaces oxygen. If we remove oxygen from the air we breathe, very quickly we start experiencing the adverse effects that can lead to death. The early symptoms may be experienced when the argon concentration reaches 33%. Symptoms may include rapid breathing, loss of muscular coordination, decrease in mental alertness, impairment of judgment, loss of consciousness, and convulsions. At concentrations of 75% you die in minutes. Knowing and following a few good safety rules can keep you alive.

Never store or use argon in a space that is not well ventilated. You must exercise the utmost caution when argon is used indoors. A leaky valve, hose, or connection can lead to dangerous concentrations of the gas within an area. Whenever possible, store and use argon outside.

As a rule, welding using inert gases like argon, should not be done in any confined or enclosed space. If at all possible, the work piece should be removed and the work performed in a safer area. If the work must be performed in the confined or enclosed space, then additional precautions must be taken. Be certain that fresh air is being blown into the space. Mechanical ventilation must be provided throughout the duration of the work. Argon is not consumed or converted to an oxygen carrying gas during the welding process. It remains inert and an asphyxiant. Your senses cannot be relied on to warn you of an oxygen deficiency. You must have a continuous reading oxygen meter with an audible alarm. This alarm must be set to sound when the oxygen level drops below 19.5%. If the alarm sounds, you must leave the space immediately. If you are in a confined space, you must be secured to a lifeline and rescue gear should be ready at the access hole.

This may sound like a lot of extra effort. However, your life could be at stake. If you become incapacitated, others may also die trying to rescue you. Don't take a chance.

SeaBRIGHT INSURANCE COMPANY

SAFETY MEETING AGENDA

DEPARTMENT/JOB SITE: _____ **MEETING DATE:** _____

1. **Open Meeting & Present safety topic:** _____
2. Read minutes from previous meeting.
3. **Persons present:**

_____ _____

_____ _____

_____ _____

_____ _____

4. **Old Business –** Status of previous recommendations. Discuss pending old business if any.

5. **Accidents –** Discuss accidents and near misses that have occurred since the last meeting. Brief summary of accidents to date by number and type. Note any trends. Discuss corrective action taken, or needed. Concentrate on accident causes to make everyone more aware.

6. **Inspection Reports –** Report on findings and recommendations of any inspection reports made since last meeting.

7. **New Business –** Solicit employee suggestions. Discuss new procedures, changes to company safety policy, etc.

TIME MEETING STARTED: _____ TIME FINISHED: _____

MEETING CHAIRED BY: _____ TITLE: _____