



SAFETY UNLIMITED, INC.

# Weekly Safety Meeting

## Workplace – Fire Safety

Fire can be one of our deadliest enemies. It can mutilate us, kill us, and destroy in a few minutes what took a lifetime to build. Fire can take away our workplaces and our jobs. How can fires be stopped? The answer is prevention. However, to prevent fires, we must understand them and know how to deal with them.

You are responsible for fire prevention at work for your safety and that of your co-workers. The best way to prevent workplace fires is to be aware of, and on the lookout for, potential fire [hazards](#). All hazardous situations should be reported to your supervisor. Know the location of fire extinguishers and other emergency equipment that is available to you. During an actual emergency, protect yourself. Do not get involved if it is not safe.

If you ever discover a fire, keep your cool, but think fast and act with caution. Size it up fast; knowing when to attempt extinguishing the fire yourself and when to call for help is essential.

Sound the alarm and evacuate the area. Call the emergency numbers you've been given and give the details about the fire (location, how it started etc.). Never hesitate to call the fire department, even if the fire seems minor and you manage to put it out before firefighters arrive.

The quicker the alarm is sounded, the sooner firefighters can attempt to get it under control. Have someone meet the firefighters to tell them where the fire is. They can lose valuable minutes if they have to find it themselves.

You are responsible for preventing fires, but not to put out major fires. Fight the fire only if you can do it safely with proper extinguishing materials. In general, never battle the blaze unless the firefighters request your help.

Fire needs three elements to exist--fuel, oxygen, and heat. To understand the relationships, think of each as separate sides of a triangle. Fire needs all three elements in the proper proportions to exist. If one side of the triangle is removed, the fire will go out. For fuel to ignite, oxygen must be present; then heat must be applied until the combustion point is reached.

When this point is reached, the fuel will ignite with the oxygen, consuming both fuel and oxygen and giving off heat. If the oxygen is removed, the fire is smothered. If the fuel is removed, there's nothing left to burn. Oxygen by itself, will not burn. If the heat is lowered below the combustion point, the fuel and oxygen will not unite, and the fire will go out.

## **Classes of Fires and Fire Extinguishers:**

1. Class "A" Involves ordinary combustibles such as paper, wood, cloth, rubber or plastics. The common extinguishing media are water or dry chemical.
2. Class "B" involves flammable liquids, grease, or gases. Common extinguishing media are foam, carbon dioxide or dry chemical.
3. Class "C" are live electrical fires. CO2 or dry chemical extinguishers should be used. However, the actual burning product may be class "A" items.
4. Class "D" burning materials include combustible metals such as magnesium and sodium. Special extinguishing agents, approved by recognized testing laboratories, are needed when working with these metals.
5. Class "K" are fires with substances such as the animal and vegetable fats present in commercial cooking oils and greases. A Class K fire extinguisher uses a fine wet mist consisting of an alkaline mixture, such as potassium acetate, potassium carbonate, or potassium citrate that forms a soapy foam as it is applied to the cooking oil or other substance, quenching the steam, vapors, and the fire's risk of re-ignition.

There are several types of fire extinguishers: foam, carbon dioxide, soda acid, pump tank, gas cartridge, and multipurpose dry chemical and ordinary dry chemical. Most extinguishers have labels that list the type of fires for which they can be used.

The most common extinguisher is the multipurpose dry chemical type. It can be used for any class of fire. However, if the tag on the extinguisher is not labeled ABC, you must know the type of fire on which the extinguisher can be used.

## **Use Your Judgment:**

When you see smoke or fire you should use your own good judgment before you decide to extinguish the blaze. Ask yourself these questions:

- Is the fire limited in size and spread?
- Will you have an escape route if something goes wrong?
- Do you know the location of the nearest fire extinguisher?

If you are confident the fire is controllable and your safety is ensured, attempt to put it out. If the answer to any of these questions is no, evacuate the area immediately.

## **Responding to Fires:**

Sound the fire alarm and call the local fire department immediately if a fire breaks out.

Once you have decided to extinguish the blaze, attempt to fight the fire only if:

- You know the type of combustible material burning.
- You have been trained to use the fire extinguisher correctly.

- The fire is still in the incipient (beginning) stage.

**If the fire gets too large or out of control, evacuate immediately!!**

**Remember...P-A-S-S When Using an Extinguisher:**

Be sure to remember the PASS operating technique for portable fire extinguishers. PASS stands for:

- P - Pull the pin. Pulling the pin unlocks the operating lever or button so you can discharge the extinguisher. Stand at least 6 to 8 feet from the fire.
- A - Aim low, pointing the extinguisher nozzle or hose at the base of the fire.
- S - Squeeze the lever below the handle. Squeezing the lever discharges the contents of the extinguisher. When you release the lever, the discharge stops. Some models have a button to press rather than a lever.
- S - Moving carefully toward the fire, keep the extinguisher aimed at the base of the fire and sweep from side to side until the flames appear to be out.

Most extinguishers will only allow about 10 seconds of extinguishing media. Prevention is the key when it comes to firefighting. Good housekeeping, proper storage procedures, and safe work practices will go a long way toward reducing the likelihood that a fire will destroy valuable property or injure either you or a fellow employee.

**Summary:**

It is important to know more than just where the fire extinguishers are located in your work area. Make sure you know how to properly use them in case the time comes where you need to extinguish a fire. Always make sure the fire extinguishers in your work areas are in good condition through thorough inspections.

**FIRE PREVENTION IS EVERYBODY'S JOB!!**

