Hot Work – Don't let a small welding job cause a major fire loss!



The supervisor, in issuing this permit, certifies that all safety factors have been considered and cared for satisfactorily. Return this permit upon completion of the job which it is to cover to the authorizing supervisor. The supervisor will write "complete", date and initial across the face of the permit.

AREA OF HOT WOR

			YES	NO	N//
1	Read the Hot Work Permit Procedure				
2	Work area and equipment has been r free of flammable, combustible, and hazardous materials.	nade			
3	Gas Test taken.				
4	Is a fire extinguisher on the job?				
5	Smoke alarms covered?				
6	Lines disconnected and/or blanked?				
7	Is a fire watch provided?				
8	Adjoining equipment and operations considered ok from standpoint of po effect on the job.	ssible			
9	Other necessary precautions SPECIFY				
haspe	PROVAL ave personally checked the conditions scified I authorize this "Hot" work to be	necess gin.	ary and as		



The National Fire Incident Reporting System reported that \$255 million in property damage, 10 deaths, and 210 injuries were caused by hot work operations from 2006-2010. Hot work is among one of the top causes of property loss for many insurance carriers. Not only does hot work cause an increased frequency of fires, hot work losses tend to be very severe. Hot work is a serious fire hazard because it produces a temporary ignition source in an area not designed for it. Using common sense precautions and having a well-organized hot work program can prevent costly fires.

Hot Work Permit

A hot work permit helps reduce the risk of fire in the building. A permit is required when hot work is performed in areas not designated for welding. For example, a permit isn't required in welding shops, but if welding is being done in other parts of the building, like the loading dock, equipment area, or shipping area, a hot work permit is necessary. A permit requires that adequate safety precautions are followed before, during, and after the work is completed. It's recommended that a designated person, referred to as the PAI (Permit Authorizing Individual), be responsible for completing the hot work permit. A hot work permit should be completed and approved by the PAI before any hot work begins, including when work is done by outside contractors. A recently-released study showed that 67% of all hot work fires were caused by contractors.

The hot work permit should include this information:

- Name of employee or contractor performing the hot work;
- Location of hot work;
- Nature of work to be completed;
- Issue date and expiration date; and
- Signature of PAI.

Hot work permits should be posted on highly-visible paper in the hot work area to notify employees and contractors about the hot work in that area.

Precautions – It's important that safety precautions are followed when completing hot work. The PAI is responsible for ensuring that all hazards have been controlled in the area before any hot work begins. Some of the precautions that should be evaluated before starting hot work are:

- Availability of sprinklers, fire extinguishers, or hoses that are in good working order;
- Hot work equipment in good repair;



- Within 35 feet of the work area, verify that:
 - Combustibles and flammable liquids are removed from the area.
 - Floors are swept clean and combustible floors are wet down.
 - Wall and floor openings are covered with non-combustible material such as welding blankets, flame proof covers, and metal or non-asbestos guards or curtains.
 - All doors and fire doors are closed.
- If working on walls or ceilings, verify that:
 - Construction is non-combustible and there are no combustible coverings or insulation.
 - Combustibles on the other side of the wall or ceiling are moved.
- If working on enclosed equipment, verify that:
 - Equipment is cleaned of flammable liquids, residue, and combustible dust.
 - No flammable vapors are located in the equipment.



Fire Watch: While hot work is performed and for 30 minutes after the work is completed, a designated person should be assigned to the hot work area to provide a fire watch. This person(s) should not be given any other tasks during the fire watch and should not leave for any reason, unless relieved by another person. The hot work area should be inspected 30 minutes after the job is completed. The fire watch personnel must thoroughly understand the inherent hazards of the work site and how workers are affected by the hot work. Here are additional important responsibilities of the fire watch personnel:

- Ensure that safe conditions are maintained during hot work operations.
- Maintain fire-extinguishing equipment, make sure it's readily available and be trained in its use. Know the procedures for sounding an alarm in the event of a fire.
- Stop the hot work operations if unsafe conditions develop.
- Watch for fires in all exposed areas and adjoining areas where fires may occur.
- Sign the hot work permit after both the hot work and the 30-minute watch are complete. The permit should stay posted in the hot work area.
- The hot work area should be monitored for four hours after the work is completed. The monitoring does not have to be continuous.
- Once the monitoring period is over, the PAI should complete a final inspection and sign the hot work permit. Permits should be kept on file to ensure proper procedures are followed.

Employee Training – All employees involved in the hot work operation should receive initial training of the policies and procedures. All hot work procedures should be reviewed at least annually. Maintain training records for all employees who have completed hot work training.

Resources: OSHA 39, NFPA 51B and ANSI

