



Job Performance Review

Torch Cutting Operations – General Safety Precautions

Individual Level Competency

JPR Title

Torch Cutting Operations – General Safety Precautions

JPR Number

JPR-TR-4

Reference

NFPA 1670 – Standard on Operations and Training for Technical Search and Rescue Incidents
OSHA 1910.253 Oxygen-Fuel Gas Welding and Cutting
ANSI Z49.1 Safety in Welding, Cutting and Allied Processes
IFSTA Essentials of Firefighting
ATFD Standards of Cover and Risk Analysis

Performance Criteria

Firefighter is able to articulate the various aspects of torch cutting operations and systems as identified below.

Time Parameters

Safe and efficient manner

Safety Precautions

Space allocation to prevent injury to self or others while operating
Appropriate PPE
Attention to surroundings

Procedure

- **Identify General Precautions**
 - Available sprinkler, hose streams and extinguishers are in service and good repair.
 - Have fire extinguishers available, and where practical small hoses at work site.
 - Have cutting equipment in good repair
- **Within 35 Feet of Work Area**
 - Wet down combustible floor areas – Cover damp sand or other shield.
 - Use meters to monitor atmosphere and do not perform operations if quantities exceed recommended levels.
 - Remove flammables, dusts, lint and oily deposits.

- Cover all wall and floor openings.
- Move or cover combustible materials with fire resistive barriers.
- Protect personnel from electrical shock – universal precautions of Lock Out / Tag Out.
- Shut down HVAC and conveyors that might carry sparks to other areas.

- **Work On or Near Walls and Ceilings**
 - Move combustibles away from both sides of walls.
 - When working with suspended ceilings, be sure to protect and evaluate concealed spaces.
 - Construction is non-combustible or covered with fire resistive barriers.

- **Work On Enclosed Spaces**
 - Rid area of all combustibles
 - Purge equipment of flammable vapors – perform atmospheric monitoring.
 - Remove from service, isolate or vent pressurized vessels, piping and equipment.
 - Restrict or eliminate this work activity as much as possible.

- **Fire Watch and Work Area Monitoring**
 - Fire watch should be provided during cutting activity and for 30 minutes after work is completed.
 - Fire watch may be required above, below, and in adjacent areas from where work takes place
 - Be prepared to extend watch beyond 30 minutes based on unique circumstances and conditions

Firehouse Software Evaluator Notes

Link to “General Training in the Rescue Section” of FHS

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2015