

Welding Galvanized or Stainless Steel

TRADE: WELDING & FABRICATION

LEADER GUIDE: 8-12 MINUTES

USE WHAT FITS TODAY

LEADER NOTE

Do not read this sheet word-for-word. Pick the sections that match today's task, point to the actual equipment/work area, and get the crew to answer the questions out loud.

WHY THIS MATTERS

Today's topic is Welding Galvanized or Stainless Steel. Focus on metal-specific fumes and coatings, then walk the crew through the actual setup, work area and stop-work conditions. Hot work creates more than a burn hazard. Sparks and heat can travel through openings, ignite hidden combustibles and start fires after the crew has moved on. Gas cylinders, hoses, ventilation and fire-watch coverage all matter.

A SCENARIO TO DISCUSS

During Welding Galvanized or Stainless Steel, sparks or heat begin reaching farther than expected through an opening, joint, penetration, or onto material outside the original fire-watch area. What needs to be stopped, moved, shielded, or re-permitted before work resumes?

BEFORE WORK STARTS

- Remove or protect combustibles and inspect the area on both sides of walls/floors where sparks or heat can travel.
- Verify permits, ventilation, fire extinguishers and fire-watch responsibilities before ignition.
- Inspect cylinders, regulators, hoses/leads, torches and connections before use.
- Identify the base metal/coating before hot work begins.
- Use ventilation and exposure controls appropriate to the material.

SAFE WORK SEQUENCE / CONTROLS

- Identify the base metal/coating before hot work begins.
- Use ventilation and exposure controls appropriate to the material.
- Remove coatings only using an approved method that does not create an uncontrolled exposure.
- Stop if workers experience unusual irritation, metallic taste or symptoms and report the condition.

QUESTIONS THAT SHOULD CHANGE THE JOB

1. What combustibles, coatings, penetrations, or hidden spaces can sparks/heat reach from this exact work position?
2. What fire protection/fire-watch coverage is required, and who is responsible for the post-work check?
3. What metal, coating, ventilation, or enclosure condition could change the fume-control/PPE plan?

COMMON FAILURE POINTS

- Missing combustibles hidden on the other side of a wall, floor or penetration.
- Allowing sparks/heat to travel beyond the fire-watch area.
- Working with damaged hoses/leads or inadequate ventilation because the weld/cut is short.

STOP AND RESET IF...

- Combustibles cannot be removed or protected, or required fire-watch coverage is not available.
- Ventilation is inadequate or fumes/coatings create an exposure not covered by the plan.
- Torches, leads, hoses, regulators, cylinders or hot-work equipment are damaged or improperly set up.

4. What defect in the torch, hose, lead, regulator, cylinder, grounding, or hot-work setup stops the job before ignition?
5. What needs to be stopped, moved, shielded, or re-permitted before work resumes?

MAKE IT REAL ON THE JOB

Trace where sparks/heat can travel and physically inspect the fire-watch area and extinguisher location.

BEFORE YOU RELEASE THE CREW

Before the crew starts, everyone should be able to explain the hazard, point to the control being used today, and name the condition that would make the work stop.

ATTENDANCE & SIGN-OFF

Welding Galvanized or Stainless Steel

Project / Job:		Date:	
Talk leader:		Location:	

CREW ACKNOWLEDGMENT

By signing, attendees confirm they participated in this toolbox talk and had the opportunity to raise job-specific questions. Signatures do not replace required training, qualifications, permits or certifications.

#	Name	Company / Trade	Signature
1			
2			
3			
4			
5			
6			
7			
8			
9			
10			

QUESTIONS / CONDITIONS / CORRECTIVE ACTIONS

END-OF-TALK CHECK

☐ Crew can point to the main hazard.	☐ Critical control is in place and usable.
☐ The responsible person/check is clear.	☐ Stop/re-brief conditions were discussed.