JOB HAZARD ANALYSIS (JHA)

Business name

Document: JHA-001 Rev 1
Prepared: Nov 9, 2026
Review by: Dec 9, 2026
Highest risk after controls: Medium

1. BUSINESS AND JOB DETAILS

Job	Gas fitting and appliance connection	**Start date**	Nov 9, 2026
Working hours	7:00 am to 3:30 pm	**Trade**	Plumbing

2. JOB STEPS, HAZARDS AND CONTROLS

#	Job step	Hazards	Risk before	Controls	Risk after	Responsible
1	Only a licensed gas fitter does this work. Tell occupants and remove ignition sources	Gas and fuel lines Working in an occupied home or building	**High Unlikely / Fatality**	1.1 Isolate and purge the line before work, with the owner's approval. [Elimination] 1.2 Lock off and tag the isolation valve. [Engineering (guarding)] 1.3 Check for leaks with a gas detector before and during work, and ventilate the area. [Engineering] 1.4 Only licensed gas fitters work on gas lines. [Administrative] 1.5 Remove ignition sources: no smoking, no hot work and no sparking tools near the line. [Administrative] 1.6 Know where the shut-off valve is and what to do if a leak happens. [Administrative] 1.7 Wear safety glasses and gloves, and keep a fire extinguisher close by. [PPE] 1.8 Plan noisy, dusty or risky work for when the building is empty. [Elimination] 1.9 Close off the work area with barriers, plastic sheeting or locked doors, and put up signs. [Engineering (guarding)] 1.10 Keep fire exits and paths clear at all times. [Administrative] 1.11 Tell occupants before you turn off power, water or gas, and before noisy or dusty work. [Administrative] 1.12 Lock away tools, chemicals and materials each day, out of reach of children. [Administrative] 1.13 Clean up dust and debris at the end of each day. [Administrative]	**Medium Rare / Fatality**	Site supervisor
2	Isolate gas at the meter, apply lockout/tagout, and purge the line	Gas and fuel lines Stored energy Fire and emergencies Rules: 29 CFR 1926 Subpart F	**High Unlikely / Fatality**	2.1 Gas and fuel lines: see step 1 for the full controls [Administrative] 2.2 Release or block all stored energy before work: release the pressure in pipes, tanks and hoses, bleed hydraulics, release springs, lower loads. [Elimination] 2.3 Lock out and tag all energy sources with personal locks. [Engineering (guarding)] 2.4 Put mechanical blocks or props under raised parts like	**Medium Rare / Fatality**	Site supervisor

#	Job step	Hazards	Risk before	Controls	Risk after	Responsible
				buckets, tipper bodies and doors. [Engineering] 2.5 Test that the system is dead and nothing can move before you start. [Administrative] 2.6 Follow the maker's procedure, for example for garage door and roller door springs. [Administrative] 2.7 Provide fire extinguishers suited to the site, checked and easy to reach. [Engineering] 2.8 Keep exits and escape routes clear and signed. [Engineering] 2.9 Have a site emergency plan: alarm, exits, assembly point and emergency contacts. [Administrative] 2.10 Keep a stocked first aid kit and at least one trained first aider on site. [Administrative] 2.11 Know the site address and how emergency services get in. Call 911. [Administrative]		
3	Run and join new pipe, checking there are no electrical cables in the way	Electric shock from live wiring Injury from power tools Tight spaces: attics and crawl spaces Rules: 29 CFR 1926 Subpart K; 29 CFR 1926 Subpart I	**Critical Possible / Fatality**	3.1 Isolate the power before any work. Do not work live. [Elimination] 3.2 Lock out and tag the disconnecting means with your own personal lock and tag so the circuit cannot be energized (29 CFR 1926.417). [Engineering (guarding)] 3.3 Test before you touch: prove dead at the point of work with a tested voltage tester. [Engineering] 3.4 Only qualified persons work on or near exposed energized parts. [Administrative] 3.5 Check for back feeds from solar, batteries and generators that can keep a circuit live after the main switch is off. [Administrative] 3.6 Keep all guards fitted and working. Never tie back or remove a guard. [Engineering] 3.7 Clamp or secure the work piece. Do not hold it by hand. [Engineering] 3.8 Only trained, competent people use power tools, following the maker's instructions. [Administrative] 3.9 Check tools before use. Unplug or remove the battery before changing blades or bits. [Administrative] 3.10 No loose clothing, jewelry or long hair near spinning parts. [Administrative] 3.11 Do as much of the work as you can from outside the tight space. [Elimination] 3.12 Turn the power off at the panel before entering where you can, as damaged wiring may be live. [Engineering (guarding)] 3.13 Lay crawl boards across the joists so you cannot step through the ceiling. [Engineering] 3.14 Set up ventilation and lighting in the space. [Engineering] 3.15 Limit time in hot attics and take breaks somewhere cool. [Administrative]	**Medium Unlikely / Recordable / lost time**	Site supervisor

#	Job step	Hazards	Risk before	Controls	Risk after	Responsible
4	Connect the appliance and seal all joints	Gas and fuel lines Lifting and carrying heavy loads	**High Likely / Recordable / lost time**	4.1 Gas and fuel lines: see step 1 for the full controls [Administrative] 4.2 Plan to avoid carrying: have materials delivered, and old items picked up, as close as possible to where they are used. [Elimination] 4.3 Use lighter or smaller loads: order smaller bags and shorter lengths, and drain or break down old items before moving them. [Substitution] 4.4 Use trolleys, pallet jacks, hoists, vacuum lifters or plant instead of carrying by hand. [Engineering] 4.5 Use a two-person lift for anything heavy, long or awkward. Plan the route first and clear it. [Administrative] 4.6 Keep the load close, back straight and no twisting. Turn with your feet. [Administrative] 4.7 Rotate tasks and take breaks on long lifting jobs. [Administrative] 4.8 Wear gloves for grip and safety boots to protect your feet. [PPE]	**Medium Unlikely / Recordable / lost time**	Site supervisor
5	Pressure and leak test, then light and commission the appliance	Pressure testing Gas and fuel lines Fire from hot works Rules: 29 CFR 1926.352 and NFPA 51B (35 ft rule also in 1910.252(a))	**Critical Possible / Fatality**	5.1 Test with water instead of air or gas where the system allows it. Never put water in refrigerant pipework, which is tested with dry nitrogen. [Substitution] 5.2 Keep people out of the test area with signs and barriers. [Engineering (guarding)] 5.3 Use a calibrated gauge and a relief valve set to protect the system. [Engineering] 5.4 Test to the pressure the system calls for and hold it for the set time. Never go over. [Administrative] 5.5 Release the pressure fully before tightening anything or fixing leaks. [Administrative] 5.6 Gas and fuel lines: see step 1 for the full controls [Administrative] 5.7 Use cold work methods where you can, such as bolting, press fittings or cutting with a saw instead of a torch. [Elimination] 5.8 Move anything that can burn at least 35 feet away, or cover it with fire blankets. [Engineering (guarding)] 5.9 Use fire-resistant screens to stop sparks reaching people or gaps in walls and floors. [Engineering] 5.10 Get a hot work permit before starting. [Administrative] 5.11 Keep a charged fire extinguisher and fire blanket at the work spot. [Administrative]	**Medium Rare / Fatality**	Site supervisor
6	Issue the compliance certificate and clean up	Poor housekeeping and waste	**Medium Likely / Minor injury**	6.1 Order materials to size and send packaging back where you can. [Elimination] 6.2 Put dumpsters and waste chutes close to the work. [Engineering] 6.3 Clean as you go, and do a full clean up at the end of each day. [Administrative] 6.4 Keep exits, stairs and walkways clear at all times.	**Low Unlikely / Minor injury**	Site supervisor

#	Job step	Hazards	Risk before	Controls	Risk after	Responsible
				[Administrative] 6.5 Stack materials neatly on level ground, away from edges. [Administrative] 6.6 Wear gloves when handling waste. [PPE]		

Risk key: risk = likelihood x consequence on a 5 x 5 matrix. Low, Medium, High, Critical. Work must not start while the risk after controls is high or above. Controls are listed in order of the hierarchy of controls: Elimination, Substitution, Engineering (guarding), Engineering, Administrative, PPE.

3. PPE AND PERMITS

Required PPE	Permits and plans
Safety-toe boots (ASTM F2413) Safety glasses (ANSI Z87.1) Work gloves N95 respirator Hearing protection (earmuffs or plugs) Knee pads Hard hat (ANSI Z89.1) Face shield (ANSI Z87.1) Welding gloves Coveralls	Lockout/tagout (1926.417) Hot work permit (fire watch at least 60 minutes after, NFPA 51B)

4. PLANT AND EQUIPMENT

Plant / equipment	License or training needed	Inspection needed	Rego / ID	Last inspected	Certificate / report
Hand tools					
ProPress tool					
Electrical test meter		Rated for the voltage and category (CAT III or IV), inspected before each use, and checked on a known source before and after testing (NFPA 70E)			
Power drill		Visual check of cord, plug and guards before each day's use; if you run an assured equipment grounding program instead of GFCIs, test every 3 months (29 CFR 1926.404(b)(1))			

5. TRAINING REQUIRED FOR THIS WORK

- Qualified person training for work on or near exposed energized parts (29 CFR 1926.416, NFPA 70E)

6. CREW TRAINING AND CERTIFICATIONS

Crew listed at sign-on below, with ticket and licence numbers.

7. EMERGENCY ARRANGEMENTS

Emergency number	911	**First aid kit**	In the work vehicle
Fire extinguisher	In the work vehicle	**Alarm and evacuation**	Shout for help and stop work. Make the area safe and go to the assembly point. Call the emergency number and send someone to meet the ambulance.
Reporting incidents	Report a fatality to OSHA within 8 hours, and an in-patient hospitalization, amputation or eye loss within 24 hours.		

8. MONITORING, REVIEW AND LEGAL BASIS

A competent person inspects the job site, materials and equipment before work each day and as conditions change (29 CFR 1926.20(b)(2)). Any time this JHA is revised, the affected crew is re-briefed and signs again.

Legal basis: OSH Act Section 5(a)(1) and 29 CFR 1926, Safety and Health Regulations for Construction (incl. 1926.20 and 1926.21). OSHA requires employers to find and fix hazards and to train workers on them. A JHA breaks the job into steps, lists the hazards in each step and the controls that protect the crew. General contractors often require one before you start.

Keep this JHA on site during the job, and keep it with the training and inspection records for at least 1 year after the job (longer if your state plan or general contractor requires it). OSHA does not set a retention period for JHAs themselves.

9. REVISION HISTORY

Rev	Date	By	What changed
1	Nov 9, 2026		First issue

10. SIGN-OFF

	Name	Signature	Date	
Prepared by				
Supervisor				
General contractor review				Accepted for use: Yes / No

By signing below, each crew member confirms they were trained on the hazards and controls in this JHA before work started, and will follow it. Stop work and tell the supervisor if conditions change.

Name	Role / company	Tickets / licences	Signature	Date

Name	Role / company	Tickets / licences	Signature	Date