

LEVEL 3: HIGH HAZARD

Confined Space, Do Not Enter

CONTRACTORS: Contractors working in crawlspaces on divisional property must be informed of the dangers, be trained in confined space entry and comply with the requirements of the entry system. It is the responsibility of the supervisor who contacted the contractor to notify, verify training, brief, and provide a copy of this safe work procedure to any contractor working in a crawlspace in the division. It is the contractor's responsibility to ensure all their staff are trained in CSE, inform all workers under his control and any subcontractors of specific crawlspace hazards. Briefings must be documented and records maintained.

Note: Contractors or trades staff will require a separate pre-entry hazard evaluation form to be completed and submitted to the Pembina Trails supervisor/safety officer prior to entry.

IDENTIFIED HAZARDS: : Certain confined spaces at Pembina Trails are particularly hazardous and are subject to stricter requirements that prohibit entry into the spaces except under very specific conditions. These confined spaces are called "high hazard confined spaces". Examples of this at Pembina Trails would include partial drains for the sewer or other Level 2 confined spaces where contractor work has introduced atmospheric hazards and may contain an immediately dangerous to life and health (IDLH) atmosphere. An IDLH confined space may be entered only by qualified, trained and authorized personnel and rescue procedures and equipment must be in place. **Pembina Trails staff are not allowed to enter these spaces.** A separate entry permit is required. Contractors must obtain an entry permit from their company supervisor. Once completed a copy must be submitted to the Divisional Safety Officer.

PERSONAL PROTECTIVE EQUIPMENT REQUIREMENTS:

Hard hat/bumper cap, full body harness, safety footwear, safety glasses, work gloves, ventilation equipment, coveralls or tyvek suit, multi gas detector, tri-pod or davit arm, supplied air respirator, rescue procedures, entry permit, and rescue team.

TWO PERSON ENTRY IS MANDATORY:

An entry supervisor must be stationed outside the hatch and must remain there until all work has been completed. The entry supervisor must have a means of communication with the person entering the crawl space. Communication must be maintained at all times. You will be required to wear a harness and lifeline. If radio contact is not possible then voice contact must be maintained. Rescue team is required to be on site and located at the entry point.

ENTRY PROCEDURE:

1. Set up the tri-pod or davit arm.
2. Fill out your company's entry permit and have all staff sign off on the permit.
3. Test the air quality with the multi gas detector directly above the hatch. Document the information on the entry permit.
4. If air quality is normal then open the hatch and secure the access hatch/door to prevent accidental closing.
5. Set up the ventilation equipment and ventilate the space. Ventilation must be continuous.
6. Don your PPE and harness. Ensure that your lifeline is long enough that it will reach from the hatch opening to your work area. Attach the tri-pod or davit arm's life line to the back of your harness. The entry supervisor is required to operate the tri-pod or davit arm while the worker enters the space.
7. Test the air quality with the multi gas detector by lowering it into the space. Document the information on the entry permit. If no alarm sounds the worker may enter but must have the gas detector on his person at all times. If the gas detector shows signs of hazardous atmospheric contaminants then the worker must evacuate the space. An additional hazard assessment and or ventilation will be required. Please contact the Divisional Safety Officer prior to proceeding.
8. A second gas monitor must be at the hatch with the entry supervisor. The entry supervisor will be tasked with periodically monitoring the air quality at the hatch entrance. Document all information directly onto the entry permit.
9. Take a flashlight (intrinsic) or other type of portable illumination. Conduct the required work. Remove all debris and garbage. No combustible materials are allowed to be left / stored in crawlspace
10. If the alarm sounds at any time the worker **MUST** leave the space immediately and call their supervisor. If the alarm sounds and the worker does not exit, the entry supervisor must initiate the rescue plan. The entry supervisor **MUST NOT ENTER** at any time.
11. After work has been completed, lock access hatch / door to prevent unauthorized entry.
12. Complete the entry permit and return it to the Safety Officer.

Note: separate rescue procedures must be created prior to entering.

The level of risk may increase due to the task being performed in the space. This may be due to fugitive emissions from sewer gases, welding, the displacement of oxygen, etc. A confined space may be entered only by qualified and authorized personnel.