

Purpose: To provide guidance and recommended defenses for the safe use temporary of air compressor systems.



WARNING: Compressed air for the purpose of breathing air is excluded. See Breathing Air Systems Canada HSE Guideline.

Operating Air Compressors

When operating air compressors ensure the following:

- Only use manufacturer approved attachments.
- Hazards are removed from the location when possible.
- The location or position of the air compressor does not present an additional hazard.
- Guard all moving parts.
- Compressor is appropriately sized for its intended use.
- Cool air compressors for 10 minutes prior to refueling.

Maintenance Requirements

Ensure the following maintenance requirements are followed with the manufacture recommendations:

- Maintain hydraulic, engine oil and coolant systems to prevent leaks.
- Use properly sized relief valves that are inspected and tested within the last 12 months.
- Ensure compressor supplies air that is clean and dry.
- Ensure tank testing is done as per manufactures specifications.

Air Hose Selection

When selecting air hoses ensure they are:

- Designed for compressed air use as per manufacturer's specification.
- Rated for a minimum working pressure of 1035 kPa (150 psig); or
- Rated for 150% of the maximum pressure produced by the system.

Prior to use inspect hoses for bulges, tears, punctures, cuts, soft spots and abrasion.

Connecting Air Hoses

When connecting hoses ensure the following:

Continued on next page ...

Continued from previous page ...

- Connect air hoses per manufacturer specifications including using approved hose clamps and bands.
- Inspect the hose for abrasions/cracks and validate pressure rating.
- Never adapt couplings.
- Never connect an air hose directly to a pipe or pipe nipple.
- Install whip checks at each hose coupling (1379 kPa (200 psig) 5 to 1 safety factor, 2068 kPa (300 psig) 3 to 1 safety factor)
- Install an excess flow valve on the branch line for all hoses exceeding 1cm (0.5 in.) inside diameter.
- Use adequate support above and below each connection for vertical runs longer than 15 m (50 ft.).

Air Hose in Use

When an air hose is in use and pressurized never:

- Crimp the air hose.
- Couple or uncouple the air hose.

Unless the hose coupling is a quick release type with internal check valve, shut off the air at the supply valve before:

- Adjusting
- Disconnecting the hose or changing accessories.
- Bleeding the hose.

Cleaning with Compressed Air

Compressed air may be used for cleaning activities if:

- The line pressure is 207 kPa (30 psig) or lower; or
- The outlet is fitted with a device restricting pressure to 207 kPa (30 psig) or lower.
- The device is equipped with a chip guard.

Compressed air at outlet pressures greater than 207 kPa (30 psig) may be used for cleaning concrete forms, blowing mill scale etc. if:

- The appropriate CPC representative has approved the activity
- Hazards and defenses have been identified and discussed through the work permit and/or hazard assessment process.



WARNING: Never use compressed air to clean material from one's body and never point an open-air hose at another person.