

## **TOOLBOX TALK #13**

### **CARBON MONOXIDE: KNOW THE FACTS**

Detecting invisible workplace risks is always a challenge. One such hidden hazard is carbon monoxide (CO), a colorless and odorless gas. “CO is a common industrial and construction hazard resulting from the incomplete burning of material containing carbon such as natural gas, gasoline, kerosene, oil, propane, coal or wood,” OSHA states.

When inhaled, CO displaces oxygen in the blood – depriving the heart, brain and other vital organs. Exposure to CO can quickly lead to loss of consciousness, suffocation or death – large amounts of the gas can overwhelm a worker in minutes without warning.

#### **Who’s at risk?**

Welders, garage mechanics, firefighters, diesel engine operators, and forklift operators are some of the workers who may be exposed to harmful levels of CO, OSHA cautions. In construction, temporary enclosures heated by poorly performing heating equipment can put everybody at risk. In addition, workers in spaces that have a small volume of air available and little or no ventilation greatly increase the danger.

#### **What to watch for**

In addition to CO being odorless, it’s tasteless. So how will workers know if they’re exposed? Although symptoms may vary widely from person to person, initial symptoms of CO poisoning include headache, fatigue, dizziness, drowsiness or nausea, OSHA notes, adding that, “during prolonged or high exposures, symptoms may worsen and include vomiting, confusion and collapse.”

If a worker is experiencing CO poisoning, act fast. Get the victim to fresh air in an open area and call 911 for assistance. First responders who may be at risk of exposure to CO should be trained on appropriate recovery operations.

#### **What employers need to know**

OSHA recommends employers take a number of steps to help reduce the risk of workplace CO poisoning, including:

- Install ventilation systems that can remove the toxic gas from work areas.
- Keep equipment that may produce CO in good working condition.
- Switch from gasoline-powered machines to equipment powered by electricity or batteries.
- Provide potentially exposed workers with personal CO monitors equipped with audible alarms.
- Educate workers about the types of equipment and conditions that may result in CO poisoning, as well as the symptoms of exposure.
- Ensure workers know to immediately report suspected cases of CO poisoning.