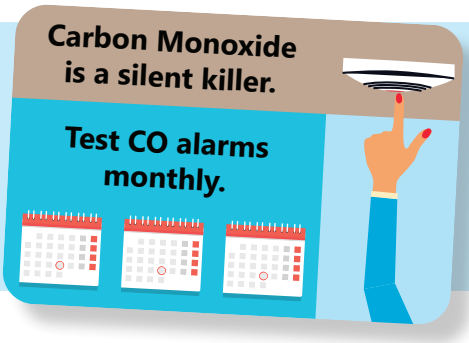
Carbon Monoxide *Safety*



Carbon monoxide (CO) poisoning is one of the leading causes of accidental poisoning deaths in the United States. CO is produced whenever fuel (gas, gasoline, kerosene or charcoal, etc.) is burned. We can't see, smell, or taste carbon monoxide. Only a CO alarm can detect it.

Carbon monoxide (CO) poisoning symptoms

CO enters the lungs and blood, where it competes with the oxygen normally transported by the red blood cells. CO attaches itself to blood cells 200 times more easily than oxygen. Without oxygen, the cells start to die.

Exposure to CO can produce symptoms similar to influenza, such as:

- Headache
- Nausea
- Dizziness
- Disorientation
- Fainting

At its highest levels, CO exposure can cause:

- Loss of consciousness
- Death

What to do if you suspect CO exposure

- Leave your house or car and get some fresh air.
- Call the fire department from a neighbor's house.
- If you have any symptoms, see a doctor immediately.

Protect your family

- Install carbon monoxide alarms on every floor of your house except in unfinished cellars or basements.
- Since 2006, state law requires carbon monoxide alarms in most houses.
- Install CO alarms near bedrooms so family members are woken up during the night.
- The alarms must be fitted away from windows or doors, areas that are excessively hot, cold or humid and spaces where there is no movement of air, such as the corners of rooms and vaulted ceilings.
- Do not install CO alarms in garages or rooms with ovens or close to stoves or fireplaces.
- Change the batteries according to the instructions.
- Change the backup batteries after any prolonged power outage.
- Know the difference between the alarm signal and the low battery signal.

Carbon Monoxide is:

- *Toxic*
- *Odorless*
- *Colorless*
- *Tasteless*

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What type of CO alarm should you buy?

- Choose alarms from well known, national brands.
- Make sure any alarm you buy is approved and certified by a recognized testing agency, such as Underwriters Laboratory (UL) or Intertek (ETL).
- Various types of alarm are allowed in Massachusetts:
  - Battery-powered with battery checker (low battery signal);
  - Plug-in units (powered by the mains power supply) with backup battery;
  - With physical conductors and backup battery (normally requires hiring an electrician);
  - Combination of smoke detectors and CO alarms with an alarm and voice alert signal;
  - Low voltage with secondary power supply
- Follow the installation instructions carefully.

CO appliances and safety

If appliances that burn fuel are adequately maintained and used, the amount of CO produced will not be dangerous. Read and follow the manufacturer's instructions that come with appliances that burn fuel.

However, if the appliances are not working properly or are used incorrectly, dangerous levels of CO can occur.

- Have a qualified service technician inspect your appliances each year before the cold season.
- Check ventilation pipes, exhaust pipes and chimneys for leaks or blockages.
- Unvented kerosene heaters are illegal in Massachusetts.
- Never use a charcoal grill indoors.
- Do not use a gas stove to heat your house.
- Never leave a vehicle running inside your garage, even if the door is open. The exhaust contains CO and can quickly accumulate inside the house.
- Snow can block car exhaust pipes outdoors.
- Never use engines that run on gasoline (generators, chainsaws, blowers, lawn trimmers, lawnmowers or snowblowers) indoors or near doors or windows.

Replace old CO alarms

- Replace old CO alarms every 5 to 7 years, according to the instructions.
- If your alarms use alkaline batteries, replace the batteries twice a year when you change your clocks.
- More recent models of CO alarms have a lithium battery that is sealed for 10 years and does not need replacing. After 10 years, the device has to be replaced.

Sources of Carbon Monoxide:

- *Ovens and water heaters*
- *Wood burning and pellet stoves*
- *Space heaters running on gas or gasoline*
- *Blocked ovens and dryer ventilation*
- *Exhaust pipes blocked by snow*
- *Generators*
- *Vehicles in operation*
- *Barbecue grills and camping stoves*
- *Gas stoves used for heating*
- *Gas-powered tools for the removal of snow and garden equipment*
- *Fireplaces*