

Carbon Monoxide Frequently Asked Questions

Background

Carbon monoxide (CO) poisoning is a serious public health and safety concern. Each year, more than 400 Americans die from unintentional CO poisoning not linked to fires; more than 20,000 visit the emergency room; and more than 4,000 are hospitalized from being exposed to CO. CO is an invisible, odorless poison that is hard to detect without an alarm. To address this safety hazard, the District of Columbia adopted new regulations, for new and existing residential and institutional buildings to install carbon monoxide alarms or carbon monoxide detection systems.

Effective March 28, 2014, all new Group I and Group R occupancies, detached single-family and two-family dwellings, and townhouses, are required to install CO alarms or detection systems in specified locations. Existing Group R and I detached single-family and dwellinas. occupancies. two-family townhouses, are required to install CO alarms or detection systems by March 28, 2017. These regulations apply broadly to all dwelling units and sleeping units, including but not limited to single-family dwellings, duplexes, lodging houses, dormitories, hotels, motels, condominiums, apartment buildings, hospitals, and nursing homes. The applicable regulations are set forth in the District of Columbia Building Code (2013), the District of Columbia Residential Code (2013), and the District of Columbia Property Maintenance Code (2013). Obligations and responsibilities are imposed on both property owners and tenants to help ensure that all District residents remain safe in their homes from the dangers of carbon monoxide poisoning.

Q. What is Carbon Monoxide (CO)?

A. Carbon Monoxide is a colorless, odorless gas that is produced from heaters, fireplaces, furnaces, and many types of appliances and cooking devices. It can also be produced from vehicles that are idling.

Q. What are the codes that mandate that dwellings have carbon monoxide (CO) alarms?

A. Single-family and two-family dwellings and townhouses regulated by the <u>District of Columbia Residential Code</u>: Section R315 of the District of Columbia Residential Code (2013) and Section 310 of the District of Columbia Property Maintenance Code (2013).

Group I and R (non IRC) occupancies: Section 908.7 of the <u>District of Columbia Building Code</u> (2013) and Section 310 of the District of Columbia Property Maintenance Code (2013).

Q. What kinds of devices comply with the regulations?

A. A CO alarm detects CO and produces a distinctive audible alert when CO is detected. It may be a stand-alone unit or part of an alarm system. There are several types of devices available that comply with the regulations:

Single station Carbon monoxide alarms. These are Carbon Monoxide alarms which are stand-alone alarms that are battery operated, hardwired to the building wiring system, or plug-in device. The hardwired and plug-in devices require battery backup. Single station carbon monoxide alarms are typically used in single family homes. Single station CO alarms shall be listed as complying with Underwriters Laboratory (UL) Standard 2034.

Combination smoke/carbon monoxide alarms. These devices receive primary power from the building's electrical wiring and must have a battery backup. The smoke alarm features of combination smoke/carbon monoxide alarms must be interconnected. Wiring must be permanent without a disconnecting switch, other than those required for over-current protection. Combination smoke/carbon monoxide alarms shall be listed as complying with Underwriters Laboratory (UL) Standard 2034.

Carbon monoxide detection systems. A carbon monoxide detection system is more typically found in a commercial setting. They system consists of a carbon monoxide detector(s) and an audible notification appliance (or emergency signaling device). Carbon monoxide detectors included in a carbon monoxide detection system shall be listed as complying with Underwriters Laboratory (UL) Standard 2075.

Q. Are carbon monoxide (CO) alarms required in private residences?

A. Yes, as of March 28, 2014, all newly constructed buildings containing residential occupancies, including single family homes, were required to install CO alarms if they have a fuel-burning appliance or an attached garage. Buildings with residential occupancies, including single family homes, that were in existence on March 28, 2014 had 36 months to come into compliance with the new CO alarm requirements; this transition period ends on March 28, 2017.

Q Are carbon monoxide (CO) alarms required in rental dwelling units?

A. Yes, if the building has a fuel-burning appliance or an attached garage, CO alarms are required in all newly constructed rental dwelling units or sleeping units. Effective March 28, 2017, landlords must provide properly functioning CO alarms for all existing dwelling units and sleeping units in residential and institutional buildings, including one-family and two-family dwellings, townhouses, or multifamily housing containing a CO source. However, in buildings where the sleeping units or dwelling units do not themselves contain a fuel-burning appliance, or have an attached garage, a common area carbon monoxide system may be allowed in certain cases.

Landlords are allowed to install single station CO alarms or combination smoke/CO alarms.

The landlord must ensure that a CO detector is operable and in good repair at the beginning of each tenancy. Landlords are required to replace or repair CO detectors within 15 days of receipt of a written notification from the tenant expressing that a replacement or repair is needed.

Q. I am a tenant but my unit does not have a carbon monoxide (CO) alarm. Is this a violation of the regulations?

A. If your unit does not itself contain a fuel-burning appliance, or have an attached garage, but the building has a fuel-burning appliance, or an attached garage, the landlord is allowed to install a common area CO system. A CO alarm is not required in your unit, provided (1) your unit is located more than one story above or below any story containing a fuel-burning appliance or attached garage; and (2) your unit is not connected by ductwork or ventilation shafts to any room containing a fuel-burning appliance, or to an attached garage.

Q. What is a carbon monoxide (CO) source?

A. A heater, fireplace, appliance (i.e., furnace, dryer, or water heater), or cooking source (i.e., stove or oven) that uses coal, kerosene, petroleum products, wood, or other fuels (i.e., oil or natural gas) that emit CO as a byproduct of combustion; or an attached garage with an opening that communicates directly with a living space. Under the District of Columbia Construction Codes, in residential and institutional occupancies, an open parking garage or a properly ventilated enclosed parking garage is not considered an attached garage for purposes of the CO alarm requirements.

Q. What are my obligations as a tenant?

A. A tenant must notify the landlord in writing if replacement or repair of a CO detector is required. A tenant may not remove or tamper with a CO alarm. Tampering includes removal of working batteries.

Q. What do I do if I am renting and have a CO source, and my landlord has not provided a working CO alarm?

A. The tenant should notify the landlord, since the landlord is required to provide an operable CO detector; unless the tenant's lease provides that the tenant is responsible for maintenance of the CO alarm.

Q. Where should carbon monoxide (CO) alarms be installed?

A. Carbon monoxide alarms should be installed in the immediate vicinity of bedrooms or sleeping areas. Only one alarm is required outside each separate sleeping area or grouping of bedrooms. Depending on the type of alarm or system, the services of a licensed engineer may be required.

Q. Are carbon monoxide (CO) alarms required in bedrooms?

A. No, the Construction Codes require one alarm in the immediate vicinity outside each separate sleeping area or grouping of bedrooms, but not inside the bedrooms.

Q. May a hardwired smoke alarm be replaced with a combination carbon monoxide (CO) and smoke alarm?

A. Yes, combination smoke/CO alarms are allowed where:

- The combination smoke/CO alarm receives its primary power from the building's electrical wiring;
- There is a battery backup;
- Wiring is permanent without a disconnecting switch other than those required for over-current protection; and
- The smoke alarm features of combination smoke/carbon monoxide alarms are interconnected.

Q. Are carbon monoxide (CO) alarms required on every level?

A. No, CO alarms are required on each level containing sleeping areas or grouping of bedrooms.

Q. How often do I replace my carbon monoxide (CO) alarm?

A. As per, <u>National Fire Protection Association (NFPA) code 720</u>, CO alarms should be replaced when the end-of-life signal is activated, the manufacturer's replacement date is reached, or when they fail to respond to operability tests.

Q. How do I keep my carbon monoxide (CO) alarm working?

A. CO alarms must be maintained in accordance with NFPA 720 and the manufacturer's instructions. Free access to NFPA 720 (2012) is available on the website of the National Fire Protection Association at: http://www.nfpa.org/codes-and-standards?mode=code&code=720&tab=editions

Q. What should I do when the carbon monoxide (CO) alarm sounds?

A. Get outside to fresh air and call 9-1-1 or your local emergency number for help. If anyone is experiencing symptoms of CO poisoning, get medical attention immediately.

Q. Whom can I contact for additional information?

A. Ferdinand Gamboa
Housing Inspection Program Manager
Department of Consumer and Regulatory Affairs

Office: 202. 481.3559 Cell: 202. 439.3285

Email: ferdinand.gamboa@dc.gov