

**Effective 7/1/2016**

**15A-5-204 Amendments and additions to IFC related to fire protection systems.**

For IFC, Fire Protection Systems:

- (1) IFC, Chapter 9, Section 901.2, Construction Documents, is amended to add the following at the end of the section: "The code official has the authority to request record drawings ("as built") to verify any modifications to the previously approved construction documents."
- (2) IFC, Chapter 9, Section 901.4.6, Pump and Riser Room Size, is deleted and replaced with the following: "Pump and Riser Room Size. Fire pump and automatic sprinkler system riser rooms shall be designed with adequate space for all installed equipment necessary for the installation and to provide sufficient working space around the stationary equipment. Clearances around equipment shall be in accordance with manufacturer requirements and not less than the following minimum elements:

901.4.6.1 A minimum clear and unobstructed distance of 12 inches shall be provided from the installed equipment to the elements of permanent construction. 901.4.6.2 A

minimum clear and unobstructed distance of 12 inches shall be provided between all other installed equipment and appliances. 901.4.6.3 A clear and unobstructed width of

36 inches shall be provided in front of all installed equipment and appliances, to allow for inspection, service, repair or replacement without removing such elements of permanent construction or disabling the function of a required fire-resistance-rated assembly.

901.4.6.4 Automatic sprinkler system riser rooms shall be provided with a clear and unobstructed passageway to the riser room of not less than 36 inches, and openings into the room shall be clear and unobstructed, with doors swinging in the outward direction from the room and the opening providing a clear width of not less than 34 inches and a clear height of the door opening shall not be less than 80 inches. 901.4.6.5 Fire pump rooms shall be

provided with a clear and unobstructed passageway to the fire pump room of not less than 72 inches, and openings into the room shall be clear, unobstructed and large enough to allow for the removal of the largest piece of equipment, with doors swinging in the outward direction from the room and the opening providing a clear width of not less than 68 inches and a clear height of the door opening shall not be less than 80 inches."

- (3) IFC, Chapter 9, Section 903.2.1.2, Group A-2, is amended to add the following subsection: "4. An automatic fire sprinkler system shall be provided throughout Group A-2 occupancies where indoor pyrotechnics are used."
- (4) IFC, Chapter 9, Section 903.2.2, Ambulatory Health Care Facilities, is amended as follows: On line two delete the words "all fire areas floor" and replace with the word "buildings" and delete the last paragraph.
- (5) IFC, Chapter 9, Section 903.2.4, Group F-1, Subsection 2, is deleted and rewritten as follows: "A Group F-1 fire area is located more than three stories above the lowest level of fire department vehicle access."
- (6) IFC, Chapter 9, Section 903.2.7, Group M, Subsection 2, is deleted and rewritten as follows: "A Group M fire area is located more than three stories above the lowest level of fire department vehicle access."
- (7) IFC, Chapter 9, Section 903.2.8 Group R, including all subsections, is deleted and rewritten as follows: "903.2.8 Group R. An automatic sprinkler system installed in accordance with Section 903.3 shall be provided throughout all buildings with a Group R fire area.  
Exceptions: 1. Detached one- and two-family dwellings and multiple single-family dwellings (townhouses) constructed in accordance with the International Residential Code for One- and Two-Family Dwellings. 2. Single story Group R-1 occupancies with fire areas not more than 2,000 square feet that contain no installed plumbing or heating, where no

- cooking occurs, and constructed of Type I-A, I-B, II-A, or II-B construction. 3. Group R-4 fire areas not more than 4,500 gross square feet and not containing more than 16 residents, provided the building is equipped throughout with an approved fire alarm system that is interconnected and receives its primary power from the building wiring and a commercial power system. 903.2.8.1 Group R-4 Condition 2. An automatic sprinkler system installed in accordance with Section 903.3.1.2 shall be permitted in Group R-4 Condition 2 occupancies. Attics shall be protected in accordance with Section 903.2.8.1.1 or 903.2.8.1.2.
- 903.2.8.1.1 Attics used for living purposes, storage, or fuel-fired equipment. Attics used for living purposes, storage, or fuel-fired equipment shall be protected throughout with an automatic sprinkler system installed in accordance with Section 903.3.1.2. 903.2.8.1.2 Attics not used for living purposes, storage, or fuel-fired equipment. Attics not used for living purposes, storage, or fuel-fired equipment shall be protected in accordance with one of the following:
1. Attics protected throughout by a heat detector system arranged to activate the building fire alarm system in accordance with Section 907.2.10.
  2. Attics constructed of noncombustible materials.
  3. Attics constructed of fire-retardant-treated wood framing complying with Section 2303.2 of the International Building Code.
  4. The automatic sprinkler system shall be extended to provide protection throughout the attic space."
- (8) IFC, Chapter 9, Section 903.2.9, Group S-1, Subsection 2, is deleted and rewritten as follows: "A Group S-1 fire area is located more than three stories above the lowest level of fire department vehicle access."
- (9) IFC, Chapter 9, Section 903.3.5, Water supplies, is amended as follows: On line six, after the word "Code", add "and as amended in Utah's State Construction Code".
- (10) IFC, Chapter 9, Section 903.5 is amended to add the following subsection: "903.5.1 Tag and Information. A tag shall be attached to the riser indicating the date the antifreeze solution was tested. The tag shall also indicate the type and concentration of antifreeze solution by volume with which the system is filled, the name of the contractor that tested the antifreeze solution, the contractor's license number, and a warning to test the concentration of the antifreeze solutions at yearly intervals."
- (11) IFC, Chapter 9, Section 904.11, Commercial cooking systems, is deleted and rewritten as follows: "The automatic fire extinguishing system for commercial cooking systems shall be of a type recognized for protection of commercial cooking equipment and exhaust systems. Pre-engineered automatic extinguishing systems shall be tested in accordance with UL300 and listed and labeled for the intended application. The system shall be installed in accordance with this code, its listing and the manufacturer's installation instructions. The exception in Section 904.11 is not deleted and shall remain as currently written in the IFC."
- (12) IFC, Chapter 9, Section 904.12.3, Carbon dioxide systems, and Section 904.12.3.1, Ventilation system, are deleted and rewritten as follows: "904.12.3 existing automatic fire extinguishing systems used for commercial cooking.
- Existing automatic fire extinguishing systems used for commercial cooking that use dry chemical are prohibited and shall be removed from service. 904.12.3.1 UL300 listed and labeled existing wet chemical fire extinguishing system. Existing wet chemical fire extinguishing systems used for commercial cooking that are not UL300 listed and labeled are prohibited and shall be either removed or upgraded to a UL300 listed and labeled system."
- (13) IFC, Chapter 9, Section 904.12.4, Special provisions for automatic sprinkler systems, is amended to add the following subsection: " 904.12.4.2 Existing automatic fire sprinkler systems protecting commercial cooking equipment, hood, and exhaust systems that generate appreciable depth of cooking oils shall be replaced with a UL300 system that is listed and labeled for the intended application."

- (14) IFC, Chapter 9, Section 906.12.6.2, Extinguishing system service, is amended to add the following: "Exception: Automatic fire extinguishing systems located in occupancies where usage is limited and less than six consecutive months may be serviced annually if the annual service is conducted immediately before the period of usage, and approval is received from the AHJ."
- (15) IFC, Chapter 9, Section 905.3.9 is a new subsection as follows: "Open Parking Garages. Open parking garages shall be equipped with an approved Class I manual standpipe system when fire department access is not provided for firefighting operations to within 150 feet of all portions of the open parking garage as measured from the approved fire department vehicle access. Class I manual standpipe shall be accessible throughout the parking garage such that all portions of the parking structure are protected within 150 feet of a hose connection. Exception: Open parking garages equipped throughout with an automatic sprinkler system in accordance with Section 903.3.1.1."
- (16) IFC, Chapter 9, Section 905.8, Dry Standpipes, Exception is deleted and rewritten as follows: "Where subject to freezing conditions and approved by the fire code official."
- (17) IFC, Chapter 9, Section 905.11, Existing buildings, and IFC, Chapter 11, Section 1103.6, Standpipes, are deleted.
- (18) In IFC, Chapter 9, Section 906.1, Where Required, insert an additional exception as follows: "Exception: In new and existing Group E occupancies equipped with quick response sprinklers, portable fire extinguishers shall be required only in locations specified in items 2 through 6."
- (19) IFC, Chapter 9, Section 907.2.3 Group E:
- (a) The first sentence is deleted and rewritten as follows: "A manual fire alarm system that activates the occupant notification system in accordance with Section 907.5 and installed in accordance with Section 907.6, and with rules made by the Utah Fire Prevention Board in accordance with Title 63G, Chapter 3, Utah Administrative Rulemaking Act, shall be installed in Group E occupancies."
  - (b) Exception 2, delete entirely.
  - (c) Exception number 4.2, on line five, delete the words, "emergency voice/alarm communication system" and replace with "fire alarm."
- (20) IFC, Chapter 9, 907.8, Inspection, testing, and maintenance, is amended to add the following sentences at the end of the section: "Increases in nuisance alarms shall require the fire alarm system to be tested for sensitivity. Fire alarm systems that continue after sensitivity testing with unwarranted nuisance alarms shall be replaced as directed by the AHJ."
- (21) IFC, Chapter 9, Section 915, Carbon Monoxide Detection, is deleted and rewritten as follows: "915. Carbon Monoxide Detection. 915.1 Where required. Group I-1, I-2, I-4, and R occupancies located in a building containing a fuel-burning appliance or in a building that has an attached garage shall be equipped with single-station carbon monoxide alarms. The carbon monoxide alarms shall be listed as complying with UL 2034 or UL 2075 and be installed and maintained in accordance with NFPA 720 and the manufacturer's instructions. An open parking garage, as defined in Chapter 2, or an enclosed parking garage, ventilated in accordance with Section 404 of the International Mechanical Code, shall not be considered an attached garage. A minimum of one carbon monoxide alarm shall be installed on each habitable level. 915.2 Interconnection. Where more than one carbon monoxide alarm is required to be installed within Group I-1, I-2, I-4, or R occupancies, the carbon monoxide alarm shall be interconnected in such a manner that the activation of one alarm will activate all of the alarms. Physical interconnection of carbon monoxide alarms shall not be required where listed wireless alarms are installed and all alarms sound upon activation of one

alarm. The alarm shall be clearly audible in all bedrooms over background noise levels with all intervening doors closed.

915.3 Power source. In new construction, required carbon monoxide alarms shall receive their primary power from the building wiring where such wiring is served from a commercial source and shall be equipped with a battery backup. Carbon monoxide alarms with integral strobes that are not equipped with battery backup shall be connected to an emergency electrical system. Carbon monoxide alarms shall emit a signal when the batteries are low. Wiring shall be permanent and without a disconnecting switch other than as required for overcurrent protection.

Exceptions.

1. Carbon monoxide alarms are not required to be equipped with battery backup where they are connected to an emergency electrical system.
2. Hard wiring of carbon monoxide alarms in existing areas shall not be required where the alterations or repairs do not result in the removal of interior wall or ceiling finishes exposing the structure. Unless there is an attic, crawl space, or basement available that could provide access for hard wiring, without the removal of interior finishes.

915.4 Group E. A carbon monoxide detection system shall be installed in new buildings that contain Group E occupancies in accordance with this section. A carbon monoxide detection system shall be installed in existing buildings that contain Group E occupancies in accordance with IFC, Chapter 11, Section 1103.9.

915.4.1 Where required. In Group E occupancies, a carbon monoxide detection system shall be provided where a fuel-burning appliance, a fuel-burning fireplace, or a fuel-burning forced air furnace is present.

915.4.2 Detection equipment. Each carbon monoxide detection system shall be installed in accordance with NFPA 720 and the manufacturer's instructions, and be listed, for single station detectors, as complying with UL 2034, and for system detectors, as complying with UL 2075.

915.4.3 Combination detectors. A combination carbon monoxide/smoke detector is an acceptable alternative to a carbon monoxide detection system if the combination carbon monoxide/smoke detector is listed in accordance with UL 2075 and UL 268.

915.4.4 Power source. Each carbon monoxide detection system shall receive primary power from the building wiring if the wiring is served from a commercial source. If primary power is interrupted, each carbon monoxide detection system shall receive power from a battery. Wiring shall be permanent and without a disconnecting switch other than that required for over-current protection.

915.4.5 Maintenance. Each carbon monoxide detection system shall be maintained in accordance with NFPA 720. A carbon monoxide detection system that becomes inoperable or begins to produce end-of-life signals shall be replaced."

Amended by Chapter 216, 2016 General Session