## **7511.5704 SECTION 5704, STORAGE.**

- Subpart 1. **IFC section 5704.1.1.** IFC section 5704.1 is amended by adding a section to read:
- **5704.1.1 Application of sprinkler protection tables.** Tables 5704.3.6.3 (4) through 5704.3.6.3 (8) shall only apply to liquids stored in metal containers and tanks. For liquids stored in nonmetallic containers, nonmetallic portable tanks or rigid nonmetallic intermediate bulk containers, sprinkler protection shall be designed and installed in accordance with criteria based on full-scale fire testing conducted at an approved testing laboratory or based on other nationally recognized fire safety standards approved by the code official.
- Subp. 2. **IFC section 5704.2.11.2.** IFC section 5704.2.11.2 is amended by adding sections to read:
  - **5704.2.11.2.1 Burial depth.** The maximum burial depth for underground storage tanks shall be specified by the tank manufacturer, marked on the tank, and in accordance with NFPA 30.
  - 5704.2.11.2.2 Minimum depth of cover. Underground tanks shall be covered with not less than 24 inches (600 mm) of earth, or not less than 12 inches (300 mm) of earth on top of which shall be placed a slab of reinforced concrete not less than 4 inches (100 mm) thick. Where the tanks are subjected to traffic, they shall be protected against damage from vehicles passing over them by at least 36 inches (900 mm) of earth cover, or 18 inches (450 mm) of well-tamped earth plus either 6 inches (150 mm) of reinforced concrete or 8 inches (200 mm) of asphaltic concrete. When asphaltic or reinforced concrete paving is used as part of the protection, it shall extend at least 12 inches (300 mm) horizontally beyond the outline of the tank in all directions.
  - Subp. 3. **IFC section 5704.3.1.2.** IFC section 5704.3.1 is amended by adding a section to read:
    - **5704.3.1.2** Rigid nonmetallic intermediate bulk containers. The design, construction and capacity of rigid nonmetallic intermediate bulk containers for the storage of flammable and combustible liquids shall be in accordance with this section and NFPA 30. When inside buildings, rigid nonmetallic intermediate bulk containers containing flammable or combustible liquids shall be subjected to a standard fire test that demonstrates acceptable inside storage fire performance and shall be listed and labeled in accordance with UL 2368, Standard for Fire Exposure Testing of Intermediate Bulk Containers for Flammable and Combustible Liquids, 2014.
  - Subp. 4. **IFC section 5704.3.3.** IFC section 5704.3.3 and its subsections are amended to read:
  - **5704.3.3 Indoor storage.** Storage of flammable and combustible liquids inside buildings in containers and portable tanks shall be in accordance with Sections 5704.3.3.1 through 5704.3.3.11.

## **Exceptions:**

1. Liquids in the fuel tanks of motor vehicles, aircraft, boats, or portable or stationary engines.

2. The storage of distilled spirits and wines in wooden barrels or casks.

(Sections 5704.3.3.1 to 5704.3.3.10 remain unchanged.)

**5704.3.3.11 Fire-extinguishing systems.** Automatic sprinkler and foam-water systems provided for the protection of container, intermediate bulk container and portable tank storage shall be of the wet pipe, deluge, or preaction type. If preaction systems are used, they shall be designed so that water or foam solution discharges immediately from the sprinkler opened by heat from a fire.

**Statutory Authority:** MS s 299F.011; 326B.02 **History:** 32 SR 10; 40 SR 1437; 44 SR 610 **Published Electronically:** April 16, 2020