



Fire Safety in Educational Facilities

Statutory, Rule, and Code Requirements for Fire Alarms, Fire Drills, Egress, and Locking Mechanisms

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July 10, 2018

Main Areas/Topics

- State Fire Marshal Authority
- Authority Having Jurisdiction
- Statutory Requirements for Fire Safety in Schools
- Fire Drill Requirements
- Fire Alarms/Pull Stations
- Classroom Doors/Locking Mechanisms

STATE FIRE MARSHAL AUTHORITY

The Division of State Fire Marshal (SFM) shall adopt the most recent edition of the National Fire Prevention Association (NFPA) Fire Code (NFPA 1) and Life Safety Code (NFPA 101) by rule every three (3) years pursuant to s. 633.202, Florida Statutes.

Responsibilities of the Authority Having Jurisdiction (AHJ)

633.208, Florida Statutes mandates that “each municipality, county, and special district with firesafety responsibilities shall enforce the Florida Fire Prevention Code” (FFPC)– The local fire marshal is the AHJ for most commercial buildings in their jurisdiction.

However, in the case of public schools, s. 1013.03, Florida Statutes, mandates that the Department of Education has authority as it pertains to educational facilities of school districts. Section 1013.38, Florida Statutes, further charges district school boards with ensuring all facilities comply with the Florida Fire Prevention Code, from construction plans submittal to annual inspections.

Requirements for Fire Safety in Schools

1. Florida Statutes
2. Administrative Rule
3. Florida Fire Prevention Code, 6th Edition
4. State Requirements for Educational Facilities (SREF)

Statutory Mandates Regarding Fire Code and Emergency Drills

- Section 1006.07(4), F.S. – District school board duties relating to school safety
 - The district school board shall...
 - (a) Formulate and prescribe policies and procedures, in consultation with the appropriate public safety agencies, for emergency drills and for actual emergencies, including, but not limited to *fires*, natural disasters, active shooter and hostage situations, and bomb threats, for all students and faculty at all public schools of the district comprised of grades K-12. Drills for active shooter and hostage situations shall be conducted *at least as often* as other emergency drills. (emphasis added)

Florida Fire Prevention Code Requirements for Emergency Action Plans

- Emergency Action Plan. Emergency action plans shall be provided in accordance with section 10.8 of NFPA 1. *NFPA 1: 20.2.4.1.*
- Emergency action plans shall be provided for high-rise, health care, ambulatory health care, residential board and care, assembly, day care centers, special amusement buildings, hotels and dormitories, detention and correctional occupancies, *educational*, underground and windowless structures, facilities storing and handling materials covered by Chapter 60, or where required by the Authority Having Jurisdiction. *NFPA 1: 10.8.1.*

Florida Fire Prevention Code Requirements for Emergency Action Plans

- Plan Requirements as outlined in NFPA 1:10.8.2.1.
 - Procedures for reporting emergencies
 - Occupant and staff response to emergencies
 - Evacuation, relocation, and shelter in place procedures appropriate to the building, its occupancy, emergencies, and hazards
 - Appropriateness of the use of elevators
 - Design and conduct of fire drills
 - Type and coverage of building fire protection systems
 - Other items required by the Authority Having Jurisdiction

Emergency Egress / Fire Drill Requirements

- Emergency egress drills shall be conducted as follows:
 - 1) Not less than one emergency egress drill shall be conducted every month the facility is in session, unless both of the following criteria are met:
 - a. In climates where the weather is severe, the monthly emergency egress drills shall be permitted to be deferred.
 - b. The required number of egress drills shall be conducted, and not less than four shall be conducted before the drills are deferred.
 - 2) All occupants of the building shall participate in the drill.
 - 3) One additional emergency egress drill, other than for educational occupancies that are open on a year-round basis, shall be required within the first 30 days of operation.

NFPA 1: 20.2.4.2.3.

Emergency Egress / Fire Drill Requirements

- Approved training programs designed for education and training and for the practice of emergency egress to familiarize occupants with the drill procedure, and to establish conduct of the emergency egress as a matter of routine, shall be permitted to receive credit on a one-for-one basis for not more than four of the emergency egress drills required by 20.2.4.2.3, provided that a minimum of four emergency egress drills are completed prior to the conduct of the first such training and practice program. *NFPA 1:20.2.4.2.2.*

Why Fire Drills?

- NFPA: “The purpose of these drills is to educate participants in the fire safety features of the building, the egress facilities available, and the procedures to be followed.”
- From 2011- 2015, U.S. fire departments responded to an estimated average of 4,980 structure fires in educational properties each year. *National Fire Protection Association.*
- Nearly seven in ten of these fires occurred in nursery, elementary, middle, or high schools. *National Fire Protection Association.*

Fire Alarm Requirements in Educational Facilities

- Persons shall not fail to leave a building when a fire alarm system is activated, unless otherwise provided for in an approved building fire evacuation plan or during routine testing or maintenance. NFPA 1:10.4.3.
- Educational occupancies shall be provided with a fire alarm system.
- The above requirement does not apply to buildings meeting all of the following criteria:
 - Buildings having an area not exceeding 1,000 square feet, and
 - Buildings having a single classroom, and
 - Buildings located not less than 30 feet from another building.

Fire Alarm Requirements in Educational Facilities

- Human activation of a fire alarm system shall be by manual means. However, if the building is provided with automatic sprinkler protection and the operation of the sprinkler system automatically activates the fire alarm system, manual pull stations may be eliminated. *NFPA 101: 14.3.4.2 and 15.3.4.2.*
- Automatic occupant notification is required in all educational facilities. *NFPA 101:14.3.4.3.1.1 and 15.3.4.3.1.1.*

Fire Alarm Requirements in Educational Facilities

- Manual fire alarm boxes may also be eliminated where all of the following conditions apply:
 - Interior corridors are protected by smoke detectors meeting certain criteria.
 - For new educational facilities, the smoke detectors must comply with NFPA 101:9.6.
 - For existing educational facilities, the detectors must use an alarm verification system.
 - Auditoriums, cafeterias, and gymnasiums are protected by heat-detection devices or other approved detection devices.
 - Shops and laboratories involving dusts or vapors are protected by heat-detection devices or other approved detection devices.
 - Provision is made at a central point to manually activate the evacuation signal or to evacuate only affected areas.

Fire Alarm Requirements in Educational Facilities

- Positive alarm sequence is defined as “an automatic sequence that results in an alarm signal, even when manually delayed for investigation, unless the system is reset.” Basically, it is a manually initiated delay in the operation of an automatic alarm for a short time to permit the investigation of the alarm signal.
- Positive alarm sequence is permitted in both new and existing facilities but it must be in accordance with *NFPA 72, National Fire Alarm and Signaling Code*.

Fire Alarm Requirements in Educational Facilities

- Fire alarm systems must have positive alarm features and must be approved by the AHJ. The operation must also comply with the following:
 - The signal from any device must be acknowledged at the fire alarm control unit by trained personnel within 15 seconds of annunciation.
 - If the signal is not acknowledged within 15 seconds, the notification signals are automatically and immediately activated.
 - If the sequence is initiated, trained personnel have up to 180 seconds to evaluate the fire condition and reset the system.
 - If not reset before 180 seconds elapses, the notification signals are automatically and immediately activated.

Classroom Doors / Locking Mechanisms

- Required exit doors subject to 100 or more persons* are permitted to be provided with a latch or lock only if the latch or lock is panic hardware or fire exit hardware complying with *NFPA 101:7.2.1.7*.

*Florida Building Code mandates that exit doors subject to 50 or more persons may only be locked if they are provided with panic hardware or fire exit hardware. *FBC 1010.1.10*.



Classroom Doors / Locking Mechanisms

- Locks, if provided, shall not require the use of a key, a tool, or special knowledge or effort for operations of egress. *NFPA 101: 7.2.1.5.3.*
- A latch or other fastening device on a door leaf shall be provided with a releasing device that has an obvious method of operation and that is readily operated under all lighting conditions. *NFPA 101: 7.2.1.5.10.*

Classroom Doors / Locking Mechanisms

- The releasing mechanism shall open the door leaf with not more than one releasing operation. *NFPA 101:7.2.1.5.10.2.*
- The releasing mechanism for any latch shall be located as follows:
 1. Not less than 34 inches above the finished floor for other than existing installations.
 2. Not more than 48 inches above the finished floor.*NFPA 101:7.2.1.5.10.1.*

Classroom Doors / Locking Mechanisms

Examples of Locking Mechanisms
that meet the Requirements of the Florida Fire Prevention Code



View of both sides



Outside of door



Inside of door



Outside of door



Inside of door

Classroom Doors / Locking Mechanisms

Examples of Locking Mechanisms that are not compliant
with the Florida Fire Prevention Code



Additional Information

- In December 2014, the NFPA held a School Safety, Codes, and Security Workshop to attempt to identify and understand the objectives of fire and security safety. You can obtain more information regarding the workshop and their final report at the following link:

<https://www.nfpa.org/Public-Education/By-topic/Property-type-and-vehicles/School-fires/Codes-and-security-workshop>

ENSURING FIRE SAFETY SAVES LIVES!!



Our Lady of Angels School; Chicago, Illinois; December 1, 1958; 92 students, 3 teachers died

Closing Comments

It is critical when discussing school safety to ensure that efforts to protect students do not compromise the overall life safety of students from all threats, including all fire related emergencies.



Questions?

DEPARTMENT OF FINANCIAL SERVICES



CFO JIMMY PATRONIS