



# Fact Sheet on: Why Update to 2012 Life Safety Code?

Office of the Illinois State Fire Marshal

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## Why is the OSFM updating to the 2012 Life Safety Code?

The Office of the State Fire Marshal (OSFM) has adopted three different editions of the National Fire Protection Association's (NFPA) 101 Life Safety Code since 1988. All adoptions have been done via the JCAR rule process. Currently, the OSFM enforces the 2000 edition, which was adopted by the State of Illinois in 2002.

### ***The Code currently adopted by the OSFM is outdated...***

An updated edition of the NFPA 101 Life Safety Code is published every three years by the NFPA. Therefore, since the publication of the currently adopted 2000 edition of the Code, four updated editions have been published (2003, 2006, 2009, and 2012).

### ***An outdated Code may negatively impact the design and construction of new buildings...***

The NFPA 101 Life Safety Code references other fire protection-related codes and standards, such as those pertaining to electrical, sprinkler system, and fire alarm installations. Updating to the 2012 edition of the NFPA 101 Life Safety Code will ensure that the latest edition of these related standards guide the design and installation of important building systems and equipment.

### ***An update to the Code takes into account lessons-learned and new technologies...***

Many of the requirements for existing occupancies under the 2012 edition of the NFPA 101 Life Safety Code remain the same as those contained in the currently adopted 2000 edition. The updated edition of the Code does, however, benefit from new methods, technologies, and lessons learned from real-life incidents resulting in refined and improved life safety-related requirements.

As it relates to new buildings, the updated Code benefits not only from lessons learned but also the availability of new systems, devices and technology. The updated Code also considers evolving social concerns associated with security and accessibility.

### ***What are some of the changes in the 2012 edition of the NFPA 101 Life Safety Code?***

The updated edition of the Code considers issues not addressed by the currently adopted 2000 edition including:

- The need for physical and mental health care settings to be more homelike.
- A new chapter providing guidance during the rehabilitation and remodeling of existing occupancies.
- Carbon monoxide detection in buildings where occupants sleep.
- Electrically controlled access/egress doors.
- The use of public address speaker systems to serve as emergency mass communication systems.
- Inspection and maintenance of fire-rated and smoke-rated doors.
- Use of elevators for egress during building fires.
- Prohibitions against the locking of elevator lobby access doors.
- Expanded requirements for the development of written emergency plans.
- Placement and use of flammable alcohol-based hand rub dispensers.

***Lessons learned from real-life tragedies cannot be ignored...***

Since 2000, the following real-life tragic incidents have driven changes to the requirements of the NFPA 101 Life Safety Code:

Incident	Code Impact
The 2001 World Trade Center attack and subsequent fires and collapse.	<ul style="list-style-type: none"><li>• Wider stairway widths required for newly constructed larger high rise buildings to accommodate increased occupant egress flow simultaneous with first-responder ascent.</li><li>• Sprinkler systems required for all new high rise construction regardless of intended occupancy use.</li><li>• Increased requirements for emergency planning and occupant evacuation familiarity.</li></ul>
The 2003 Station Nightclub fire in West Warwick, Rhode Island that resulted in 100 deaths.	<ul style="list-style-type: none"><li>• Public assembly occupancies used as nightclubs, dance halls or bars with live entertainment to be protected by automatic sprinklers when newly constructed or retrofitted with automatic sprinklers if they have an occupant load of greater than 100.</li><li>• Increased exit capacity at the main exit as described below under the "E2 Nightclub" entry.</li></ul>
The 2003 Cook County Administration Building fire in downtown Chicago that resulted in 6 deaths.	<ul style="list-style-type: none"><li>• Requirement for the unlocking of stairwell doors during fire alarm activation or loss of power to allow for re-entry.</li><li>• Additional requirements for visual and tactile stairway and exit marking signs.</li></ul>
The 2003 E-2 Nightclub stampede incident in Chicago that resulted in 21 deaths.	<ul style="list-style-type: none"><li>• The main entrance/exit from specific types of new assembly occupancies (e.g., nightclubs, dance halls, and bars with live entertainment) must be sized to accommodate at least 2/3 of the total occupant load of the assembly areas regardless of how many other exits are provided.</li></ul>
Impact of residential fires.	<ul style="list-style-type: none"><li>• The 2012 NFPA 101 Life Safety Code requires the installation of automatic fire sprinkler systems in newly constructed one- and two-family dwellings. This requirement has been required by the Code since the 2006 edition. Since 2007 property loss in Illinois residential occupancy fires has exceeded \$1.4 billion with an average property loss per fire of over \$13,500. During this time, Illinois has experienced 549 citizen deaths, 7 firefighter deaths and over 5,000 citizen and firefighter injuries due to residential fires. Over 80% of all fire deaths in Illinois occur in single-family dwellings. Studies indicate that installation of sprinklers in new homes averages only \$1.38/ft<sup>2</sup> and savings on homeowner's insurance premiums range from 10% to 20% if residential sprinklers are provided.</li></ul>

**Since 2002, two of the nation's historically significant tragedies impacting code updates occurred in Illinois. This fact, along with an average of 119 Illinois fire deaths occurring each year, highlights the need for the adoption of the 2012 edition of the NFPA 101 Life Safety Code.**