Department of Health
Life Safety Code
Update

Presented by:
Charlie Schlegel, Director
Division of Safety Inspection

Overview

• CMS Adoption of the 2012 Life Safety Code (LSC) and 2012 Health Care Facilities Code (HCFC)
• Building Rehabilitation
• CMS Emergency Preparedness Rule
• Major Changes to NFPA Codes
• Electronic Occupancy Survey Requests
CMS 2012 LSC Adoption

• CMS adopted the 2012 LSC and HCFC with an effective date of July 5, 2016
• The 2012 LSC replaced the 2000 edition, which has been in use since September 2003
• PADOH state licensure requirements also adopted the regulations to follow CMS for survey consistency

CMS 2012 LSC Adoption

• What is the importance of the July 5, 2016 effective date:
  – The date determines whether the building component is surveyed as new or existing
  – Those with a plan approval date on or before the effective date are considered existing
  – Those with a plan approval date after the effective date are considered new
CMS 2012 LSC Adoption

• Separate from the effective date, the implementation date was November 1, 2016
• The implementation date is the date that the state agencies and CMS Regional Offices began completing surveys of health care facilities to the 2012 code requirements

CMS 2012 LSC Adoption

• CMS made modifications to the adoption of the 2012 LSC and HCFC
  – CMS has excluded Chapters 7, 8, 12 and 13
• These can be found in the final rule:
CMS 2012 LSC Adoption

- A major change to the survey process is the organization of LSC deficiency tags
- All K-tags will be three digits and are organized by LSC section, LSC sub-section and then numerical order in that sub-section
- For example:
  - K18 ... K363
  - K29 ... K321

---

CMS 2012 LSC Adoption

- K363

19.3.6.3* Corridor Doors.

19.3.6.3.1* Doors protecting corridor openings in required enclosures of vertical openings, exits, or lobby areas shall be doors constructed to resist the passage and shall be constructed of materials such as the fol
A number of 2012 code changes were permitted to be used by CMS through the categorical waiver process.

The categorical waivers are based on the 2012 LSC and are no longer required upon adoption of the 2012 LSC.
CMS 2012 LSC Adoption

- Categorical waivers permitted by S&C 12-21:
  - Non-continuous corridor projections
  - Patient lift and transport equipment in corridors
  - Furniture in exit corridors
  - Alternative cooking facilities
  - Gas fireplaces
  - Decorations

CMS 2012 LSC Adoption

- Categorical waivers permitted by S&C 13-58:
  - Medical Gas Alarm Panels
  - Openings in Exit Enclosures
  - Emergency Generators
  - Door Locking Arrangements
  - Suites
  - Testing of Waterflow Devices and Pumps
  - Recycling Containers
Building Rehabilitation

• Chapter 43 was added to the 2012 LSC to address rehabilitation work within existing health care facilities
• Previous codes only stated that any alteration or installation of new equipment was to meet, as nearly as possible, the requirements for new construction

Building Rehabilitation

• Chapter 43 gives details on how to apply new versus existing code requirements for a project
• This chapter does not replace or define the state licensure requirements for notification or plan review, but it does provide useful guidance on when plan review is required
• First, one must classify the project according to the LSC definitions
Building Rehabilitation

• 2012 LSC classifies rehabilitation work on existing buildings as one of the following:
  – Repair
  – Renovation
  – Modification
  – Reconstruction
  – Change of use or occupancy classification
  – Addition

• Repair – Patching, restoration, or painting of materials, elements, equipment or fixtures in good or sound condition

• Examples given by 2012 LSC:
  – Chipped paint areas on doors and/or door frames receiving touch up with new paint
  – Replacement of 4 ceiling tiles damaged by a water leak
  – Repair of a small portion of a wall damaged by impact with a wheeled cart

• The work shall not make the building less conforming with the code requirements

• Plan review is not required for the above repairs
Building Rehabilitation

• **Renovation** – Replacement in kind, strengthening, or upgrading of building elements, materials, equipment, or fixtures that does not result in a reconfiguration of the building spaces within
• The work shall not make the building less conforming with the code requirements

• Examples of renovation work:
  – An existing corridor wall is wallpapered, regardless of whether or not it had been wallpapered before
  – A lay-in tile ceiling is removed and replaced in an office to modernize the aesthetics
  – Existing walls, ceilings, doors and trim materials are repainted to freshen the interior décor
• These projects would require notification to the plan review department to review and typically can be handled with the submittal of a brief narrative on facility letterhead describing the proposed work
• **Modification** – Reconfiguration of any space; the addition, relocation, or elimination of any door or window; the addition or elimination of load-bearing elements; the reconfiguration or extension of any system; or the installation of any additional equipment

• Extensive modifications throughout a building or occupancy within a building shall be considered **reconstruction** (described later)

---

**Building Rehabilitation**

• Examples of modification:
  – A second door is installed in the corridor for the convenience of the occupants (note that if this is a citation and required by existing egress requirements, it is not a modification and must comply with the cited requirement)
  – Two rooms are combined into one larger room
  – Installation of nurse call system or magnetic door locking devices
  – Any work, other than repair, to a major Life Safety Code system, such as sprinkler system, fire alarm system or emergency power (generator)

• This work would require plan review notification and typically would require the submission of plans
**Building Rehabilitation**

- **Reconstruction** – Reconfiguration of a space that affects an exit corridor shared by more than one occupant space; or the reconfiguration of a space such that the rehabilitation work area is not permitted to be occupied because existing means of egress and fire protection systems, or their equivalent, are not in place or continuously maintained.

**Examples of reconstruction:**
- A floor is gutted to the columns and exterior walls to create a new floor plan.
- A wing in a health care facility is closed to occupancy and isolated from the remainder of the building to add new elevator and other miscellaneous work.
- An existing exit passageway is extended or relocated.
- Work affecting a corridor of a health care occupancy, such as a nursing home or hospital.

- This work would require plan review notification and typically would require the submission of plans.


Building Rehabilitation

• **Change of Use** – Change in the purpose or level of activity within a structure that involves a change in the application of the LSC requirements
  
  • Examples:
    – Furniture is removed from a resident room to create an office
    – Furniture is removed from a resident room to create a hazardous storage room
    – A dining room is converted to a physical therapy room
  
  • This work would require plan review notification and would require either a brief narrative on facility letterhead or plans, depending on the extent of code requirements involved

Building Rehabilitation

• **Change of Occupancy Classification** – Change in the occupancy classification of a structure or portion of a structure
  
  • Examples:
    – Doctor office is converted to an ambulatory surgery center
    – Assisted living floor is changed to health care
  
  • This work would require plan review notification and the submission of plans
**Building Rehabilitation**

- **Addition** – An increase in the building area, aggregate floor area, building height or number of stories of a structure
  - Examples:
    - Construction of a new wing to an existing facility
    - Adding a new sunroom
  - This work would require plan review notification and the submission of plans

**Building Rehabilitation**

- Key item to remember when working within an existing building:
  - Sections 4.6.7.4 and 4.6.12.2 of the 2012 edition of NFPA 101, Life Safety Code permit existing life safety features to be decreased only to those required for new buildings
Building Rehabilitation

• Example – A building was constructed in 2009 and was built under 2000 LSC New requirements
  – The building was constructed with 10 ft corridors, which exceeded the 8 ft requirement
  – Beginning November 1, 2016, the building will be surveyed as 2012 LSC Existing
  – Can the facility build closets in the corridors to reduce corridor width to 4 ft, which is the minimum corridor width in 2012 LSC Existing?

Building Rehabilitation

• **No**
  • The facility may only reduce the existing corridor width to 8 ft wide, which is the requirement for new construction
  • The same applies to building construction type and all other requirements
  • It is not the intent of the LSC for facilities to decrease the level of safety within the building to that which is lower than when it was built, with the exception of when it exceeds the requirements for new
Renovations and Construction

• 28 Pa Code § 205.4. Building plans.

• (a) There may be no new construction of a facility without the Department’s approval of final plans. There may be no alterations or additions to an existing building or conversion of a building or facility made prior to the Department’s approval of final plans.

Renovations and Construction

• 28 Pa Code § 205.4. Building plans (continued)

• (b) Plans, including architectural, mechanical and electrical plans, shall include requested changes and shall be submitted to the Department for final approval before construction, alterations or remodeling begins.
Renovations and Construction

• The health care facility is ultimately responsible for any renovation or construction project
• Extremely important to ensure that the architect, engineer and/or contractor receive plan approval from DOH prior to the start of any work
• Highly recommended that facilities use individuals with PA health care experience

Renovations and Construction

• If any changes are made to the plans approved by DOH, revisions must be sent in for review
• This is in addition to the review process of the local municipality, and per the Uniform Construction Code, must be completed prior to their review
Renovations and Construction

- What happens when you are unsure if a project would require plan review by DOH?
- Call the Central Office of the Division of Safety Inspection at 717 787-1911
- Health Facility Plan Reviewers are available daily to field these questions

Renovations and Construction

- Plan reviewers will request a short narrative describing the proposed project
- If it is determined that the scope of work does not require a full plan review, the plan reviewer will respond to the facility with a letter
CMS Emergency Preparedness Rule

- CMS Survey & Certification Letter 16-38-All
- Final Rule posted on September 8, 2016 in the Federal Register
- Health care providers must comply and implement all regulations one year after the effective date, on November 16, 2017
- 42 CFR § 483.73 – Emergency Preparedness
- LTC facility must establish and maintain an emergency preparedness plan
- Must be reviewed and updated annually
CMS Emergency Preparedness Rule

• The plan must do the following:
  – Be based on and include a documented, facility-based and community-based risk assessment, utilizing an all-hazards approach, including missing residents
  – Include strategies for addressing emergency events identified by the risk assessment
  – Address resident population, including, but not limited to, persons at-risk, the types of services the LTC facility has the ability to provide in an emergency; and continuity of operations, including delegations of authority and succession plans

CMS Emergency Preparedness Rule

• The plan must do the following:
  – Include a process for cooperation and collaboration with local, tribal, regional, State and Federal emergency preparedness officials’ efforts to maintain an integrated response during a disaster or emergency situation, including documentation of the LTC facility’s efforts to contact such officials and, when it applies, of its participation in collaborative planning efforts
CMS Emergency Preparedness Rule

• The LTC facility must develop and implement emergency preparedness policies and procedures, based on the emergency plan
• The policies and procedures must be reviewed and updated at least annually

The policies and procedures must address the following:
– Provision of subsistence needs for staff and residents, whether they evacuate or shelter in place, to include:
  • Food, water, medical and pharmaceutical supplies
  • Alternate sources of energy to maintain:
    – Temperatures to protect resident health and safety and for the safe and sanitary storage of provisions
    – Emergency lighting
    – Fire detection, extinguishing and alarm systems
    – Sewage and waste disposal
– A system to track the location of on-duty staff and sheltered residents in the LTC facility’s care during an emergency
– If on-duty staff or sheltered patients are relocated during the emergency, the LTC facility must document the specific name and location of the receiving facility or other location
CMS Emergency Preparedness Rule

• The policies and procedures must address the following:
  – Safe evacuation from the LTC facility, to include:
    • Consideration of care and treatment of needs of evacuees
    • Staff responsibilities
    • Transportation
    • Identification of evacuation location(s)
    • Primary and alternate means of communication with external sources of assistance

CMS Emergency Preparedness Rule

• The policies and procedures must address the following:
  – A means to shelter in place for residents, staff, and volunteers who remain in the LTC facility
  – A system of medical documentation that does the following:
    • Preserves resident information
    • Protects confidentiality of resident information
    • Secures and maintains the availability of records
CMS Emergency Preparedness Rule

• The policies and procedures must address the following:
  – The use of volunteers in an emergency and other staffing strategies, including the process and role for integration of State and Federally designated health care professionals to address surge needs during an emergency
  – Development of arrangements with other LTC facilities and other providers to receive residents in the event of limitations or cessation of operations to maintain continuity of services
  – The role of the LTC facility under a waiver declared by the Secretary, in accordance with section 1135 of the Act, in the provision of care and treatment at an alternate care site identified by emergency management officials

CMS Emergency Preparedness Rule

• The LTC facility must develop and maintain an emergency preparedness communication plan that complies with Federal, State and local laws and must be reviewed and updated at least annually
CMS Emergency Preparedness Rule

• The emergency preparedness communication plan must include:
  – Names and contact information for the following:
    • Staff
    • Entities providing services under arrangement
    • Residents’ physicians
    • Other LTC facilities
    • Volunteers
  – Contact information for the following:
    • Federal, State, tribal, regional, and local emergency preparedness staff
    • Other sources of assistance

CMS Emergency Preparedness Rule

• The emergency preparedness communication plan must include:
  – Primary and alternate means for communicating with the following:
    • LTC facility’s staff
    • Federal, State, tribal, regional or local emergency management agencies
  – A method for sharing information and medical documentation for residents under the LTC facility’s care, as necessary, with other health care providers to maintain the continuity of care
  – A means, in the event of evacuation, to release resident information as permitted under 45 CFR 164.510(b)(1)(ii)
The emergency preparedness communication plan must include:

- A means of providing information about the general condition and location of residents under the facility’s care as permitted under 45 CFR 164.510(b)(4)
- A means of providing information about the LTC facility’s occupancy, needs, and its ability to provide assistance, to the authority having jurisdiction, the Incident Command Center, or designee
- A method for sharing information from the emergency plan that the facility has determined is appropriate with residents and their families or representatives

The LTC facility must develop and maintain an emergency preparedness training and testing program that is based on the emergency plan and policies and procedures.

The training and testing program must be reviewed and updated at least annually.
CMS Emergency Preparedness Rule

• Training Program – The LTC facility must do all of the following:
  – Initial training in emergency preparedness policies and procedures to all new and existing staff, individuals providing services under arrangement, and volunteers, consistent with their expected roles
  – Provide emergency preparedness training at least annually
  – Maintain documentation of all emergency preparedness training
  – Demonstrate staff knowledge of emergency procedures

CMS Emergency Preparedness Rule

• Testing – The LTC facility must conduct exercises to test the emergency plan at least annually, including unannounced staff drills of all of the following:
  – Participate in a full-scale exercise that is community-based or when a community-based exercise is not accessible, individual, facility-based. If the LTC facility experiences an actual natural or man-made emergency that requires activation of the emergency plan, the facility is exempt from engaging in a community-based or individual, facility-based full-scale exercise for 1 year following the onset of the actual event
CMS Emergency Preparedness Rule

• Testing continued:
  – Conduct an additional exercise that may include, but is not limited to the following:
    • A second full-scale exercise that is individual, facility-based
    • A tabletop exercise that includes a group discussion led by a facilitator, using a narrated, clinically-relevant emergency scenario, and a set of problem statements, directed messages, or prepared questions designed to challenge an emergency plan
    • Analyze the LTC facility’s response to and maintain documentation of all drills, tabletop exercises, and emergency events and revise the facility’s emergency plan as needed

CMS Emergency Preparedness Rule

• Emergency and standby power systems – The LTC facility must implement emergency and standby power systems based on the emergency plan, to include:
  – Generator location per HCFC (2012 edition of NFPA 99)
  – Emergency power system inspection, testing and maintenance requirements of the HCFC
  – Onsite fuel source to power emergency generators and plan for how to keep emergency power systems operational during the emergency, unless the facility evacuates
CMS Emergency Preparedness Rule

  - Provides resources and a link to answers of Frequently Asked Questions
- CMS Survey & Certification Letter 17-21-All Information to Assist Providers and Suppliers in Meeting the Testing and Training Requirements of the Emergency Preparedness Requirements
  - Clarification that facilities are to conduct community-based exercises and not wait for CMS to provide interpretive guidelines

---

CMS Emergency Preparedness Rule

- If the community-based exercise is not possible by November 15, 2017, it is recommended that a facility-based exercise be conducted and document the circumstances as to why the community-based exercise was not completed.
- Providers found to have not completed the exercises, or any other requirement of the Final Rule will be cited.
- CMS Questions and Answers on Final Rule:
2012 LSC Code Changes

• There are numerous changes to the 2012 codes that were not emphasized by the categorical waiver process
• Some are changes that facilities may find advantageous but others may be found to be more stringent or an increase in workload compared to previous requirements

Fire-Retardant-Treated Wood (FRT)

• Clarification of use of fire-retardant-treated (FRT) wood
  – Sections 18/19.1.6.6 permits FRT that serves as support for the installation of fixtures and equipment when the FRT is installed behind noncombustible or limited-combustible sheathing
  – Examples would be wall mounted computer kiosks, handrails, etc.
Annual Fire Door Inspection/Testing

- Inspection and testing requirements for fire-rated door assemblies in accordance with NFPA 80
- This is an item that initially became part of the survey process beginning July 5, 2017, but this date was extended to January 1, 2018 per CMS Survey and Certification Letter 17-38-LSC, dated July 28, 2017
- The letter also clarifies that the requirement is specific to fire-rated doors and not smoke doors that are non-rated
Annual Fire Door Inspection/Testing

• Fire-rated door assemblies
  – Applies to new and existing installations
  – Inspected and tested not less than annually
  – Written record shall be signed and kept for inspection by the AHJ – This is a comprehensive document
  – Functional testing by knowledgeable individuals
    • Not required to hold a certification although there are classes that are becoming available to obtain a certification
  – Repairs shall be made “without delay”

Annual Fire Door Inspection/Testing

• Fire-rated door assemblies – Swinging doors
  – Prior to testing, a visual inspection of both sides must be performed, to include the following:
    • No holes or breaks in surfaces of door or frame
    • Glazing, vision light frames and glazing beads
    • No visible signs of damage to the door, frame, hinges, and hardware
    • No parts are missing or broken
    • Door clearances are appropriate
    • Self-closing device operating properly
Annual Fire Door Inspection/Testing

• Fire-rated door assemblies – Swinging doors
  – Visual inspection continued:
    • If installed, the coordinator is working
    • Latching hardware operates
    • No auxiliary hardware installed that would interfere with proper door operation
    • No field modifications that would void the label
    • Gasketing and edge seals, if required, are inspected

Annual Fire Door Inspection/Testing

• Similar requirements for horizontal sliding, vertically sliding and rolling doors
• Recommend that facilities begin preparing for the door testing and inspection requirements – do not wait to get cited first
NFPA 10 – Fire Extinguishers

• 2010 NFPA 10 – Inspection, Maintenance, and Recharging of Portable Fire Extinguishers
  • Persons performing maintenance and recharging of extinguishers must be certified
    – The test shall at a minimum be based upon knowledge of NFPA 10
    – Persons passing the test must be issued a document or certificate made available to the AHJ stating that the person was certified based upon NFPA 10 principles.
    – This does not apply to individuals performing the monthly inspections

NFPA 10 – Fire Extinguishers

• Formal Interpretations (FI) to Sections 5.5.5 and 6.6.1
  – Fire extinguishers provided for the protection of cooking appliances that use combustible cooking media shall be listed and labeled for Class K fires
  – FI No. 10-02-2:
    • Class K extinguishers are also required to be installed to protect cooking via a griddle or stove top frying pan
    • All cooking kitchen locations, where either a griddle or stove top frying pan is used, must have a Class K extinguisher. This extends from the main kitchen to satellite cooking kitchens
• Key change from the 1999 edition to the 2010 edition of NFPA 13 with regard to privacy curtains

• Section 8.6.5.2.2.1 – Privacy curtains shall not be considered obstructions where:
  – The curtains are supported by fabric mesh of ceiling track
  – Openings in the mesh are equal to 70 percent or greater
  – The mesh extends to a minimum of 22 inches down from the ceiling
• Note that a minimum ½ diagonal mesh opening is considered meeting 70% or greater
• Section 19.3.5.11 of 2012 LSC states:
  – Newly introduced cubicle curtains in sprinklered areas shall be installed in accordance with NFPA 13
• Is the 18 inch rule now the 22 inch rule?
• No, the 18 inch rule still applies to other obstructions
NFPA 99 Risk Assessment

• NFPA 99 requirements changed from Occupancy-Based to Risk-Based in 2012, covered under Chapter 4
• Building systems in health care facilities shall be designed to meet system Category 1 though Category 4 requirements

Categories – Based on impact to patients and caregivers

• Category 1: System failure likely to cause major injury or death
• Category 2: System failure likely to cause minor injury
• Category 3: System failure not likely to cause injury (can cause discomfort)
• Category 4: System failure would have no impact
NFPA 99 Risk Assessment

- The facility is responsible to have a “professional” perform a risk assessment for each building system specified in Chapters 5-11 of this code to determine the risk category
- Per CMS Central Office, this risk assessment only applies to new work and new facilities
  - Examples: new replacement generator, addition, renovation of a nursing home wing, etc.

NFPA 99 Receptacle Testing

- NFPA 99, 2012 edition details receptacle testing at patient bed locations
- A technical question was submitted to NFPA to determine whether or not this applied to nursing home resident bed locations, and NFPA responded that it does apply

6.3.4.1 Maintenance and Testing of Electrical System.
6.3.4.1.1 Where hospital-grade receptacles are required at patient bed locations and in locations where deep sedation or general anesthesia is administered, testing shall be performed after initial installation, replacement, or servicing of the device.
6.3.4.1.2 Additional testing of receptacles in patient care rooms shall be performed at intervals defined by documented performance data.
6.3.4.1.3 Receptacles not listed as hospital-grade, at patient bed locations and in locations where deep sedation or general anesthesia is administered, shall be tested at intervals not exceeding 12 months.
NFPA 99 Receptacle Testing

- Receptacle testing includes the following:
  - 6.3.3.2 Receptacle Testing in Patient Care Rooms.
  - 6.3.3.2.1 The physical integrity of each receptacle shall be confirmed by visual inspection.
  - 6.3.3.2.2 The continuity of the grounding circuit in each electrical receptacle shall be verified.
  - 6.3.3.2.3 Correct polarity of the hot and neutral connections in each electrical receptacle shall be confirmed.
  - 6.3.3.2.4 The retention force of the grounding blade of each electrical receptacle (except locking-type receptacles) shall be not less than 115 g (4 oz).

Occupancy Surveys

- Requests for occupancy surveys has officially went electronic
- All requests are submitted electronically through the DOH website – no exceptions
  - Provides consistency
  - Eliminates confusion on requests
  - Better tracking of occupancies
  - Streamlines the process
- [http://www.health.pa.gov/facilities/Licensees/Building%20Safety/Pages/default.aspx#WPe7-qPD-JD](http://www.health.pa.gov/facilities/Licensees/Building%20Safety/Pages/default.aspx#WPe7-qPD-JD)
Occupancy Surveys

Questions?