



# *OFFICE OF THE ILLINOIS STATE FIRE MARSHAL*

## **New Day Care Centers**

### **Life Safety Code Requirements, Plan Review Services, and Inspection Practices of the Office of the Illinois State Fire Marshal's Fire Prevention and Technical Services Divisions**

*Effective January 1, 2020*

Revised September 2024

## **INTRODUCTION**

The Fire Prevention Division in the Office of the State Fire Marshal (OSFM) conducts fire safety inspections of day care centers at the request of the Illinois Department of Children and Family Services (DCFS), which has regulatory and licensing authority over day care centers in the state. DCFS licensing rules require that day care centers comply with the *Life Safety Code* (LSC) adopted by the OSFM before licensing can be completed. The OSFM has developed this document in an effort to assist new or potential day care center owners to understand the regulations and inspection practices of the OSFM's Fire Prevention Division. Be advised that the day care occupancy chapters in the LSC also apply to Adult Day Care Centers which are under the regulatory and licensing authority of the Illinois Department of Aging.

The OSFM has adopted the 2015 edition of National Fire Protection Association's (NFPA) *Life Safety Code*. This report not only reviews the specific requirements of the LSC particular to a new day care center, but also offers explanation of the OSFM's inspection process as well as useful information on practical application of the LSC and instruction on how owners can obtain assistance. It is important to understand that the contents of this report pertain to "new" day care centers. "New" day care centers are defined as those in buildings that were either constructed or changed occupancy classification on or after January 1, 2020 when the currently enforced edition of the LSC became effective in Illinois.

## **OFFICE OF THE ILLINOIS STATE FIRE MARSHAL (OSFM)**

The OSFM has the statutory responsibility of protecting the citizens of Illinois against the hazards associated with fire. In an effort to carry out this responsibility the OSFM operates several divisions with varied assignments. The OSFM is charged with the writing and/or adoption of statewide fire prevention regulations and the inspection of occupancies for compliance with those regulations. While the agency obviously cannot enforce regulations in every building across the state, the OSFM, concentrates its inspection efforts in state-owned and state-licensed occupancies as well as specific targeted hazards. These efforts are carried out by the OSFM's Fire Prevention Division.

While the OSFM is willing to assist potential day care center owners or operators with their understanding and application of fire safety requirements, on-site assistance in the form of inspection of proposed buildings not yet being used as licensed day care center is not performed by Fire Prevention. Therefore, this document was prepared in an effort to assist potential day care center owners or operators with understanding the necessary features that they should be looking for when deciding to open a day care center.

The OSFM Technical Services Division, working in support of the Fire Prevention Division, often conducts no cost plan reviews and code interpretations for day care centers. While this would be a valuable service to take advantage of, there are no state requirements that plans be submitted to the Technical Services Division. See the end of the document for more information.

## WHAT IS THE *LIFE SAFETY CODE*?

The regulations that are applied to day care centers are found in 41 Ill. Adm. Code 100. The OSFM has adopted the 2015 edition of NFPA 101, *Life Safety Code* (LSC). The LSC is published by the National Fire Protection Association. It is a consensus code document that is developed by a committee of experts under code-making rules which cover NFPA's standard and code development process. The members of the LSC technical subcommittee that consider changes to the LSC represent not only enforcement authorities, but also the insurance industry, architects, engineers, and representatives of the owners of regulated occupancies.

Formulated in the early part of the 1900's as a code to ensure safe exiting from buildings, the LSC was originally titled the *Buildings Exit Code*. In 1966, the title was changed to the *Code for Safety to Life from Fires in Buildings and Structures*. In 1997 the title was officially changed to the *Life Safety Code*. The LSC is updated on a three-year cycle. The LSC contains separate occupancy chapters to address specific types of building uses. Therefore, the requirements applicable to day care centers are tailored specifically for such occupancies.

## WHERE DO I GET THE *LIFE SAFETY CODE*?

The LSC is a copyrighted document and cannot be reproduced by the OSFM. The LSC is available for on-site examination at any of the OSFM's two regional offices. It may also be found at your local library or fire department. If the local library does not have a copy, ask the reference librarian to see if it can be obtained via inter-library loan. NFPA offers a free “read-only” access to all of their codes and standards. Go to [www.nfpa.org](http://www.nfpa.org) to gain access to this code list. The LSC may also be purchased from the NFPA by calling their toll-free order line at 1-800-344-3555 or going to [www.nfpa.org](http://www.nfpa.org) and clicking the “catalogue” tab. Remember to request the 2015 edition of the LSC.

## LOCAL REGULATIONS

The regulations of the OSFM do not automatically supersede the regulations, ordinances or rules established by other authorities such as counties, local fire departments, or fire protection districts. However, OSFM's authority is not superseded in those jurisdictions that choose to adopt our code as well as those jurisdictions that do not have home rule or approved equivalency pursuant to Title 41 Ill. Adm. Code 100 (Part 100). Local authorities may enforce regulations concerning day care centers that are more stringent than OSFM's regulations. Therefore, the OSFM recommends that owners and operators always make contact with local authorities before finalizing day care center plans.

## INSPECTION PROCEDURES

Before a field inspection can be conducted, OSFM must receive written notice of the need for a facility inspection from the appropriate licensing agency. The OSFM conducts day care center inspections and re-inspections at the written request of DCFS. Day care center providers cannot directly request an inspection by OSFM. Only DCFS, the state licensing and regulatory authority, can request an inspection. *Providers must first contact their DCFS representative to initiate the inspection process.* When a facility is to be inspected by the OSFM, an inspector from the OSFM's Fire Prevention Division will conduct an on-site walk-through inspection of the occupancy.

All new day care centers receive an OSFM inspection prior to DCFS allowing the facility to open. Once inspected by the OSFM, day care centers are subsequently re-inspected by the OSFM at the request of DCFS for relicensing purposes. The OSFM also responds to fire code complaints received in relation to day care centers.

The OSFM realizes the security concerns of day care center operators regarding admitting outsiders into their facilities. Day care center operators and staff should know that OSFM Fire Prevention inspectors who conduct on-site fire safety inspections will always:

- Drive state vehicles that are plainly marked as representing the Office of the State Fire Marshal, and
- Carry, and present if asked, an OSFM photo-identification card.

The on-site inspection conducted by the OSFM is a "hands-off" non-destructive process. This means that although the inspector will need to examine all levels and all rooms of the day care center, they will not need to conduct actions such as dismantling equipment, activating fire alarm systems, flowing water through sprinkler systems, poking holes in walls, or other invasive procedures.

Upon completion of the inspection the inspector will conduct an "exit interview" with the on-site owner/operator or their designee. This exit interview serves to inform the owner of any LSC violations that were noticed by the inspector, and at the same time offer suggestions of possible corrective actions.

A copy of the inspection findings will be completed by the inspector and left with the facility owner or their representative at the time of the inspection. Additionally, following the inspection, the inspector will send the inspection report to their direct supervisor for review. Following this review, an official correspondence will be sent to the owner or building representative regarding the findings from the inspection. The OSFM encourages that no action be taken by the owner of the facility relative to an inspection until this official written correspondence is received by the owner. These inspection findings will also be shared with the responsible state agency licensing office that requested the inspection.

If no violations were noted in the inspection report, OSFM's Fire Prevention Division involvement is finished until the next requested licensing inspection. If violations were noted, the inspector will only conduct re-inspections when such is requested by the assigned state licensing agency representative assigned to monitor the facility's progress in correcting the violations. The owner shall contact their licensing agency with any questions regarding the inspection results, the time frame for compliance, or other related questions. OSFM can assist the licensing agency with technical support regarding correcting the inspection findings. However, OSFM will not negotiate or establish any time frame with the state licensing agency or the facility owners regarding the abatement of the cited violations.

Once the owner has corrected all violations, the owner should contact their the licensing agency representative who will then contact OSFM's Fire Prevention Division in order to place the re-inspection on the inspector's schedule. Facilities that fail to correct violations will not receive an approval inspection supplied to DCFS or other assigned state licensing agency from OSFM. Facilities that attempt to operate without correcting violations cited during the Fire Prevention inspector's

inspection or without a current state license are subject to prosecution through enforcement policies and procedures established by their state licensing agency.

## **RIGHT TO APPEAL**

Regarding appeals of violations found during a Fire Prevention Division inspector's LSC facility inspection, the owner or operator of the day care center shall contact their state licensing agency. OSFM will provide support to the state licensing agency regarding the interpretation of the violations as written, not the facility owner.

## **LIFE SAFETY CODE CLASSIFICATIONS OF DAY CARE OCCUPANCIES**

Deciding which section of the LSC chapters apply to a day care occupancies is a matter of determining two factors:

1. Whether the day care center is classified as "new" or as an "existing" facility, and
2. How many clients are being served in the day care occupancy.

Note: If the proposed facility shelter and care licensed by another state agency such as the Illinois Department of Human Services, the information in this document cannot be used. If there are 16 or less clients in this facility please see the OSFM information document for Residential Board and Care facilities. If this other facility serves more than 16 clients contact OSFM Technical Services Division for assistance. See contact information at the end of this document.

### **1. "New" Has a Variety of Meanings Under the LSC**

The requirements of the "new" occupancy chapters of the 2015 edition of the LSC are applicable to "new" day care centers, which are facilities constructed on or after January 1, 2020. This often causes potential day care center operators to seek a building that was constructed prior to January 1, 2020 in an effort to avoid the "new" LSC requirements. However, it must be understood that, depending upon the occupancy classification of the building constructed prior to January 1, 2020, the requirements of "new" may still apply. If a day care center was constructed on or after January 1, 2002 it was considered a new day care center under OSFM's previous adoption of the 2000 edition of the LSC. Under the new 2015 edition of the LSC this same day care center would be considered an existing day care facility because it was in existence prior to January 1, 2020. But it is very important to understand that the LSC does not permit the reduction of existing life safety and fire protection systems. Therefore, the day care center is required to maintain their facility, at a minimum, in accordance with Chapter 16 of the 2000 edition of the LSC. The requirements of Chapter 17 of the 2015 LSC edition would also apply, including the requirement to maintain the facility's existing life safety and fire protection system requirements from the 2000 LSC edition.

### **2. Subclassification of Day Care Occupancies**

The LSC subclassifies day care occupancies as "day care centers", "group day care homes", or "family day care homes" based upon the number of clients being served. However, Title 41 Ill. Adm. Code 100.7(c)(3)(A)(i) requires the OSFM to classify day care occupancies according to the same methods used by DCFS. DCFS classifies day care occupancies as "day care centers," "group day care homes," and "day care homes." Therefore, if DCFS classifies a facility "day care center", the OSFM applies

the “day care center” section of the LSC. If DCFS classifies a day care home as a “day care home” the OSFM applies the “family day care home” section of the LSC.

Additionally, it is important to note that DCFS requires the owner of the day care home facility to live in the same building that houses that day care home facility. If this is not the case, then the classification will be a “day care center” no matter the number of clients identified in the license. Comparison of the subclassifications of day care homes (LSC vs. DCFS) are provided in the table below:

LSC	DCFS
Family Day Care Homes >3 but < 7 clients	Day Care Homes 1-12* clients
Group Day Care Homes ≥7 but ≤ 12 clients	Group Day Care Homes 12 to ≤ 16 clients
Day Care Center > 12 clients	Day Care Center > 16 clients

\*Double check with DCFS to determine classification if the license will be for up to 12 clients

**CODE REQUIREMENTS**

The remaining pages of this document offer a review of the major requirements of the LSC for a new day care center.

**1. Means of Egress Design**

- Number of Exits. Every story of a day care center is required to have two code-compliant exits or exit stairways.
- Dead-End Corridors. Dead-end corridors are not permitted to exceed 20 ft. in length in either new or existing day care centers. In existing day care centers protected by an automatic sprinkler system, the dead end corridor may be 50 ft. in length.
- Travel Distance. Travel distance from a room door to the exit cannot exceed 100 ft. Travel distance within the room to a room door cannot exceed 50 ft. Total travel distance from within the room to the exit cannot exceed 150 ft. The presence of complete automatic sprinkler systems allows each of these travel distances to be increased by 50 ft.
- Emergency Lighting. Emergency lighting, “battery packs” or other methods of emergency lighting during power failure shall be provided: for all interior stairs and corridors; for all flexible and open plan buildings; and for all windowless portions of the building. Emergency lighting is not required in classrooms, administrative areas, or storage rooms.
- Exit Signs. Illuminated exit signs are required to identify travel to exits and to the outside of the building.
- Windows for Rescue. Every room or space normally subject to client occupancy, other than bathrooms, shall have at least one outside window for emergency rescue or ventilation. Such window shall be able to be opened from the inside without the use of tools and shall provide a clear opening that complies with three independent size criteria

- i. The first of the three size criteria is the width of the window shall be of not less than 20 in.
- ii. The second size criteria requires the window to be not less than 24 in. in height.
- iii. The third size criteria requires the window to be at least 5.7 ft<sup>2</sup> in area.
- iv. Also, the bottom of the opening shall be not more than 44 in. above the floor.

Windows are not required if the building containing the day care center is protected throughout by an automatic sprinkler system, or if the room has a door leading directly to the outside of the building or to a properly designed exit. Please note that both the minimum dimensions of 20 in. x 24 in. as well as the requirement for 5.7 ft<sup>2</sup> must be met. A 20 in. x 24 in. window will not result in 5.7 ft<sup>2</sup> but rather only 3.3 ft<sup>2</sup>. Therefore, all three measurement criteria must be in compliance.

Windows located below the adjacent ground level and provided with window wells must meet the following criteria:

- i. The window well should have horizontal dimensions that allow the window to be fully opened.
  - ii. The window well should have an accessible net clear opening of not less than 9 ft<sup>2</sup> with a length and width of not less than 36 in. in each direction.
  - iii. A window well with a vertical depth of more than 44 in. should be equipped with an approved permanently-affixed ladder or with steps meeting the following criteria:
  - iv. The ladder or steps should not encroach more than 6 in. into the required dimensions of the window well.
  - v. The ladder or steps should not be obstructed by the window.
- Amendments to the OSFM's adoption of the *Life Safety Code* permits the construction of a permanent ramp or staircase so the window sill will be within 44 in. of grade. The stair or ramp shall be at least the width of the window or a minimum of 36 in. in width, whichever is greater.
  - Additional amendments to the OSFM's adoption of the *Life Safety Code* permit travel directly from one room through an adjoining room without entering a corridor to reach a window for rescue as long as the travel distance to the window does not exceed 75 ft, doors located between the rooms are not locked or obstructed, and other applicable requirements found in the *Life Safety Code* regarding means of egress are met.
  - The *Life Safety Code* permits travel directly from one room through an adjoining room without entering a corridor to reach a door leading to a properly designed exit or to the exterior. This would permit the elimination of windows for rescue in rooms with access to this direct exit. Doors located between the rooms cannot be locked or obstructed, and other applicable requirements found in the *Life Safety Code* regarding means of egress shall be met.
  - The minimum height of ceilings is required to be 7 ft 6 in. with no projection from the ceiling protruding so as to allow less than 6 ft 8 in. of headroom in all areas.
  - The required minimum width of an exit door opening is 32 in.
  - The required minimum width of all exit access corridors is 36 in.

- The minimum width of stairways is required to be 44 in. unless the stairway serves a total occupant load of less than 50 occupants, in which case the stairway may be 36 in. in clear width. Clear width is measured at and below the handrail height and allows for a handrail projection of 4½ in.

## 2. Doors

Below are some of the major requirements related to doors found within a day care center:

- Any door in a required means of egress from an area having an occupant load of greater than 100 people must be equipped with panic hardware if those doors are capable of locking or latching.
- Every door latch to closets, storage areas, kitchens, and other similar spaces or areas shall be such that clients can open the door from the inside of the space or area.
- Every bathroom door lock shall be designed to permit opening of the locked door from the outside by an opening device that shall be readily accessible to the staff.
- Normally no more than one motion is permitted to unlock and unlatch doors. But for purposes of security to prevent unwanted entry, the OSFM amended their adoption of the Life Safety Code to permit an additional code compliant locking device that would permit up to two motions to unlock and unlatch the door. This amendment applies only to existing buildings. See Title 41 Ill. Adm. Code 100.7(c)(10).

## 3. Heating Equipment and Utilities

Utilities and electrical installation must comply with codes and standards identified in the LSC.

- Protective Covers for Electrical Outlets. Special protective covers for all electrical receptacles shall be installed in areas occupied by clients. Examples include the simple plastic plugs or inserts found at a hardware store or tamper-proof outlets.
- Unvented Fuel-Fired Heaters. Unvented fuel-fired heaters shall not be permitted unless they comply with NFPA 54, *National Fuel Gas Code*.
- Protection from Heating Equipment. Any heating equipment in spaces occupied by clients shall be provided with partitions, screens, or other means to protect clients from hot surfaces and open flames. (Also see 16.3.2 above for requirements pertaining to protection of hazardous areas).

## 4. Minimum Building Construction Requirements

Day care centers are restricted to certain levels within a building dependent upon construction type and whether or not an automatic sprinkler system is present. Be advised that new day care centers are not permitted in basements or stories below the level of exit discharge unless the entire building housing the day care center is protected throughout with sprinklers. A summary of day care center construction requirements are as follows:

- A building of any construction type classification, without sprinkler protection, is permitted if the day care center is located only on the first floor (grade level).



- Most construction types will require that a day care center located on the second floor or higher shall be located in a building protected throughout with an automatic sprinkler system. Fire resistive and 2-hour fire-rated protected non-combustible construction types will not require sprinklers except in high rise buildings.

The "Construction Type Limitations" table is provided below for reference and may be useful to owners, but is more appropriately used by your architect, engineer, or construction contractor.

**Table 16.1.6.1 Construction Type Limitations**

Construction Type	Sprinklered <sup>b</sup>	One Story Below <sup>a</sup>	Stories in Height <sup>a</sup>				High-Rise
			1	2	3-4	>4 but Not High-Rise	
I (442)	Yes	X	X	X	X	X	X
	No	NP	X	X	X	NP	NP
I (332)	Yes	X	X	X	X	X	X
	No	NP	X	X	X	NP	NP
II (222)	Yes	X	X	X	X	X	X
	No	NP	X	X	X	NP	NP
II (111)	Yes	X	X	X	X	X	NP
	No	NP	X	NP	NP	NP	NP
II (000)	Yes	X	X	X	X	NP	NP
	No	NP	X	NP	NP	NP	NP
III (211)	Yes	X	X	X	X	NP	NP
	No	NP	X	NP	NP	NP	NP
III (200)	Yes	NP	X	X	NP	NP	NP
	No	NP	X	NP	NP	NP	NP
IV (2HH)	Yes	X	X	X	NP	NP	NP
	No	NP	X	NP	NP	NP	NP
V (111)	Yes	X	X	X	X	NP	NP
	No	NP	X	NP	NP	NP	NP
V (000)	Yes	NP	X	X	NP	NP	NP
	No	NP	X	NP	NP	NP	NP

X: Permitted. NP: Not Permitted.

<sup>a</sup>See 4.6.3.

<sup>b</sup>Sprinklered throughout by an approved, supervised automatic sprinkler system in accordance with Section 9.7.

## 5. Location within a Building and Defining a Story Within a Building

- Mixed Occupancies. Day care centers are often located within buildings that also contain other occupancy classifications—such as in a business or mercantile complex. While this arrangement is allowed by the LSC, special provisions apply. Included amongst the special requirements are that the day care center be separated from the other occupancies by the requirements found in Table 6.1.14.4.1 of the LSC. When inspecting day care centers located in buildings that also contain other occupancies, the OSFM Fire Prevention inspector shall inspect not only the rooms used for day care center purposes, but also the corridors, stairways, and any other components of the means of egress from the center. Any building systems that serve the day care center area are also subject to code compliance. Such systems include heating, ventilating and air conditioning systems, fire alarm systems, and automatic sprinkler systems.
- Defining a Story Within a Building. See Title 41 Ill. Adm. Code 100.7(c)(7) to see options for defining the level of exit discharge or to define a story within a building.
- Day Care Centers Located in Multi-Story Buildings. The LSC does not prohibit the establishment of a day care center above the first floor, or even in a high rise building. The LSC does impose more stringent fire safety requirements for centers located above the ground level, and such centers are allowed only if all fire safety requirements are met. These requirements include means of egress for clients incapable of self-preservation (which the LSC describes as those clients unable to exit on their own, including children up to 24 months age). The LSC also imposes more stringent construction classification and automatic sprinkler requirements on day care centers located above the ground level. It should be noted that the licensing standards of DCFS do restrict the location of day care centers, especially when serving infants and toddlers. It must be understood that compliance with an OSFM inspection is not the only criteria for locating a day care center above the ground level of a building. The licensing state agency authority's requirements must also be met.

## 6. Protection of Vertical Openings

Fire and smoke travel upward in a fire building via vertical paths, primarily stairwells. The purpose of requiring a fire-rated door, with a self-closing device, is to provide time for occupants, alerted by required smoke detection, to exit the center before a fire jeopardizes escape paths allowing them to fill with smoke.

Vertical protection requirements for day care centers are as follows:

- Any vertical opening (e.g., stairways, elevator shafts, laundry chutes) shall be enclosed.
- Vertical openings serving three stories or less shall be enclosed by 1-hour fire-rated construction using 1-hour self-closing and self-latching fire doors.
- Those serving more than three floors shall require 2-hour fire-rated construction using 1½-hour self-closing and self-latching fire doors.

Buildings that have unprotected openings in accordance with Section 8.6.6 are required to be protected throughout by an automatic sprinkler system.

## 7. Interior Finish

Interior finish refers to the treatments and coverings applied to interior wall and ceiling surfaces in an occupancy. Interior finish pertains to such items as paneling, suspended ceiling tiles, multiple layers of wall paper, and plasticized sheet goods that may be installed in an occupancy. Such materials contribute to the spread of fire and generation of deadly smoke in fire incidents. The classification of an interior finish material as Class A, B, or C identifies different degrees of flame spread and smoke developed ratings as determined by standardized tests. Materials such as paneling and ceiling tile are usually labeled by the manufacturer relative to their interior finish rating. Normal thickness of paint, drywall, or masonry walls are not considered interior finish and not subject to restriction.

Requirements for interior finish are important to guard against conditions such as untreated wood paneling in stairways, plasticized ceiling and wall material, and other questionable interior finish products that would rapidly spread fire throughout a day care center.

If carpeting is applied to vertical surfaces (walls and/or ceilings), it then becomes subject to interior finish requirements but has separate requirements to be permitted to be installed on walls or ceilings. Carpeting that is designed, tested, and approved for floor application may not qualify for application to walls and ceilings. The application of carpeting on interior walls and ceilings is therefore not recommended and often will present a code violation.

Interior finish for walls and ceilings in stairways, corridors, and lobbies shall only be rated Class A. Interior finish for walls and ceilings in all other areas shall be rated Class A or Class B (See the separate explanation of "interior finish" offered in this report).

## 8. Separation of Hallways or Corridors

Every interior corridor shall be constructed of fire barriers having not less than a 1-hour fire-rated construction resistance rating including the protection of openings in corridor walls with doors, frames, and hardware (including door closing devices) which have a 20-minute fire rating. Such corridor protection is not required if every room subject to client occupancy has a door leading directly to the outside. Also, in buildings protected throughout by an automatic sprinkler system, corridor walls need not be fire rated, but only resist the passage of smoke. This means that while totally unprotected openings are not allowed, items such as hollow-core doors and glass partitions may be located in corridor walls. Doors are still required to be self-closing in these situations. Bathrooms are not subject to having rated doors on their openings into corridors if the walls separating the bathrooms from the other spaces have a 1-hour fire-rating.

## 9. Hazardous Areas

- Furnace, Mechanical, Storage, and Laundry Areas. Hazardous areas, including boiler and furnace rooms and rooms used for storage of combustibles, are required to be separated from the day care center by 1-hour fire-rated resistive construction including a  $\frac{3}{4}$ -hour self-closing and self-latching fire door; *or* the areas must be protected by automatic fire sprinklers. Laundry rooms that use commercial laundry equipment must be separated from the day care center by 1-hour fire-rated resistive construction and provided with sprinkler protection, as well as with a  $\frac{3}{4}$ -hour self-closing and self-latching fire door.

- **Kitchens and Cooking.** Kitchens containing listed domestic stoves used for food warming only and not used for any cooking that creates grease-laden vapors are not required to comply with NFPA 96, *Standard for Ventilation Control and the Fire Protection of Commercial Cooking Operations*. A kitchen with a single stove, listed as a residential stove, and used for meal warming or limited cooking, does not require separation as a hazardous area. However, the presence of commercially-listed stove, multiple stoves, or the performance of cooking that creates grease-laden vapors from frying, requires compliance with NFPA 96. This is achieved by either one-hour fire resistant separation of the kitchen or protection of the day care center by automatic fire sprinklers. Also, commercial cooking surfaces require the installation of a wet chemical fire suppression system over the cooking surfaces.

Note: In accordance with Section 16.3.2.4, openings between commercial cooking areas and dining areas are not required to be protected as long as these commercial cooking areas comply with NFPA 96. Kitchens may still need to have a fire-rated door if they have any openings into corridors.

## **10. Fire Alarm Systems and Smoke Detection**

Day care centers shall be provided with a fire alarm system. The system shall consist of manual means of initiation (pull boxes) and any required smoke detectors. The alarm system must alert the occupants of the center when it is activated, as well as automatically notify the local fire department. Occupant warning must be accomplished by both audio and visual signals. The exception to needing a fire alarm system are day care centers which are housed entirely in one room.

In addition to the fire alarm system required above, smoke detection (connected and interfaced with the fire alarm control panel for the fire alarm system) shall be installed in each story in front of doors to the stairways and in corridors of all floors occupied by the center. Detectors shall also be installed in lounges, recreation areas, and sleeping rooms of the day care center. DCFS considers all day care centers as having “sleeping” clients unless their license specifically states otherwise. Centers housed entirely in one room are exempted from installing these required detectors. Heat detectors are not recognized by the LSC or the OSFM as suitable replacements for smoke detectors, unless specifically permitted by the LSC.

Amendments to the OSFM’s adoption of the LSC permits travel to be considered to be within a single room (and therefore the possible classification as a one-room day care center) if two or more rooms are connected using openings that are at least 60 in. in clear width without any doors. Other applicable requirements found in the LSC regarding means of egress shall still be met.

## **11. Carbon Monoxide Detection**

There are no requirements in the LSC for the provision of carbon monoxide detection in day care centers. However, Illinois has passed the Carbon Monoxide Alarm Detector Act that is independent of the LSC. Additionally, DCFS has their own agency regulatory requirements for carbon monoxide detectors that must be met. Day care center owners are encouraged to check with DCFS and local authorities concerning any additional requirements pertaining to the installation of carbon monoxide detection above and beyond requirements in the LSC.

## 12. Automatic Sprinkler Systems

As reviewed in the code requirements section of this document, the installation of an automatic fire sprinkler system is not always mandatory in a new day care center. The provision of automatic sprinklers is dependent upon the construction type of the building as well as the floor level on which the day care center will be located. However, the installation of automatic sprinklers, even when not required, results in several benefits to a day care center owner including design options and possible fire insurance cost savings.

Design options that are allowed to be taken advantage of if the day care center is protected throughout by automatic sprinklers include:

- Allowance for increased travel distance to reach an exit.
- Higher story levels if the day care center is located in a multistory building.
- Elimination of requirements for rescue and ventilation windows in each room.
- Elimination of fire-rated room enclosure construction for hazardous areas.
- Less stringent interior finish rating requirements.
- Reduction of fire-rated construction for corridor enclosures to only enclosures that only prevent the spread of smoke.
- Upholstered seating furniture needs to comply with Federal regulations (16 CFR 1640).

## OPERATING FEATURES

Operating Features are requirements found in each LSC occupancy chapter that provides requirements for ongoing fire safety operations, such as fire drills, emergency planning, furnishings, and decorations. Operating features for a day care center are as follows:

- The facility shall have a comprehensive written fire emergency response plan. Copies of the plan shall be made available to employees. All employees shall be periodically instructed on the plan and kept informed with respect to the duties of their position under the plan.
- Emergency egress and relocation drills shall be conducted. These shall be done at least monthly and all occupants shall participate. If the facility is not open year-round, then an additional drill shall be conducted during the first 30 days of operation each year to familiarize occupants with drill procedures.
- Fire prevention inspections shall be conducted monthly by a trained senior staff member. A copy of the latest inspection report shall be posted in a conspicuous place in the day care facility.
- It shall be the duty of administrators and staff members to inspect all facility exits daily to ensure that all stairways, doors, and other exits are in proper condition.
- Clothing and personal effects shall not be stored in corridors.
- Artwork and teaching materials shall be permitted to be attached directly to the walls but shall not exceed 20 percent of the wall area. This can be increased to 50 percent if the building is protected throughout with sprinklers.

- Adequate adult staff shall be on duty, alert, awake, and in the facility at all times when the clients are present.
- Title 41 Ill. Adm. Code 100.7(c)(3)(A)(ii) requires the OSFM to defer to DCFS licensing standard requirements for staff-to-client ratios.
- Alcohol-based hand-rub dispensers are required to comply with Section 16.4.4.

## **PLAN REVIEW SERVICES**

The Technical Services Division of the Office of the State Fire Marshal will conduct a plan review of a proposed day care center at no charge to the owner, contractor, architect, or the local fire department. The plans are reviewed for compliance with applicable requirements of the LSC, its referenced standards, and any other applicable state fire prevention requirements. OSFM plan review does not ensure compliance with either the licensing agency standards or local regulations which may differ from the rules and policies of the OSFM. OSFM plan review is not mandatory for construction, renovation, or additions to a day care center, but it is strongly recommended. As OSFM does not issue construction permits, our plan review should be considered as guidance for the owner, contractor, or design professional toward compliance and successful final inspection by our Fire Prevention Division.

If you have questions about available plan review services of the OSFM, please contact the OSFM's Technical Services Division in the Chicago Office.

Office of the State Fire Marshal Technical Services Section  
555 W. Monroe Street, Suite 1300N  
Chicago, IL 60661  
312-814-8960  
[SFM.Techservices@illinois.gov](mailto:SFM.Techservices@illinois.gov)

## **CONTACTS AND QUESTIONS**

If you have questions pertaining to day care centers, contact your DCFS representative or one of the regional offices of the OSFM Fire Prevention Division at [SFM.FirePrevention@illinois.gov](mailto:SFM.FirePrevention@illinois.gov) or use the contact information below:

**Chicago Office**  
555 W. Monroe Street  
Suite 1300N  
Chicago, IL 60661  
312-814-2693

**Springfield Office**  
1035 Stevenson Drive  
Springfield, IL 62703  
217-524-2174

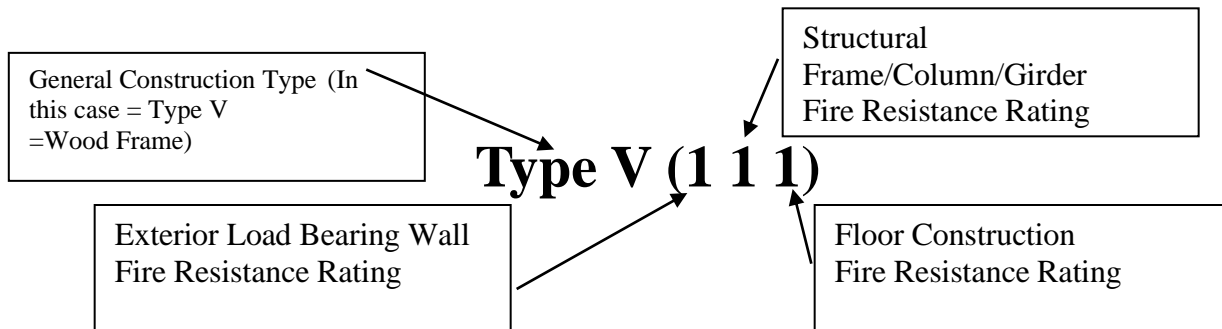
**APPENDIX A–IDENTIFYING CONSTRUCTION TYPES**

The requirements of the LSC reviewed earlier in this report include references to the type of construction of the building. The construction type classification is directly related to the need for an automatic sprinkler system in the occupancy. Therefore, it is important to have a basic understanding of how construction types are classified.

The LSC refers to another NFPA standard, NFPA 220, *Standard on Types of Building Construction*, for construction type definitions. It is normally not necessary to purchase this standard as the type of construction can easily be determined. The standard first defines five different general "types" of construction. It should be noted that OSFM staff will not determine construction classification. This classification must come from existing architectural drawings, an architect, engineer, or contractor. OSFM has the right to not accept third-party classification:

Type	Common Name	Description
Type I	Fire Resistive	Usually masonry and concrete construction. No wood or unexposed steel members are used as means of support. Fire resistive construction is commonly used in high-rise building construction.
Type II	Non-Combustible	Masonry or other noncombustible exterior support walls with steel (usually bar joists or steel beams and columns) supporting floors and roofs.
Type III	Ordinary	Masonry exterior support walls with wooden floor and roof joists.
Type IV	Heavy Timber	Masonry exterior support walls with large dimension wood timbers used as columns, as well as floor and roof supports.
Type V	Wood Frame	Wooden exterior support walls and wooden floor and roof joists.

**NFPA 220 Example**



## APPENDIX B—INTERIOR FINISH AND USE OF FIRE RETARDANT TREATMENTS

The LSC requirements reviewed on the preceding pages included references to interior finish requirements. Interior finish is defined within the LSC as "the exposed surfaces of buildings, including but not limited to, fixed or movable walls and partitions, columns, and ceilings." In plain English, "interior finish" refers to materials that are applied to walls, ceilings, columns, and even movable partitions, over the structural components. Paint, drywall, and masonry is not considered interior finish. However, other materials, such as woven or tufted products, banners and paper products, wooden trim exceeding 10 percent of the wall and ceiling area in a space, and multiple layers of wallpaper are examples of interior finishes that can present problems. Of special concern is the presence of carpeting or carpet-like materials affixed to walls or ceilings. Non-code-complying materials used as interior finish not only add fuel to a fire, but also may cause a fire to spread with unusual speed across rooms, through corridors, and up stairwells. Ceiling tiles and other ceiling finishes must also comply with interior finish requirements.

Interior finish is classified according to two separate components: The flame spread rating, which indicates how fast fire will spread across the material, and the amount of smoke developed, which predicts how quickly smoke will obscure things like exit signs. Consideration of standardized fire test data of these two components results in the classification of materials as either Class A, B, or C interior finish materials. While most modern interior finish components encountered by OSFM inspectors in day care centers comply with LSC requirements, owners are cautioned to obtain manufacturer's specifications for any unusual materials applied to walls or ceilings. The installation of a complete automatic sprinkler system allows materials of lower rated interior finish classifications to be used as prescribed in the LSC.

Caution is needed when a day care center considers making modifications to noncompliant interior finishes through applied materials or coverings. The application of fire retardant coatings to surfaces having higher flame spread ratings than that permitted by the LSC may be a solution. The application of such products, usually sold in the form of a paint-like material, requires strict adherence to the manufacturer's application specifications, as well as periodic re-application, as well as testing requirements found in the LSC.

Interior floor finish includes coverings applied over a normal finished floor or stair treads and risers. The *Life Safety Code* has minimum requirements for fire resistance of floor finishes that are installed in corridors, exit stairs, exit passageways, and sometimes rooms. The installation of a complete automatic sprinkler system allows materials of lower-rated interior floor finish classification to be used. Interior floor finish is classified by the LSC as Class I or Class II. Be advised that while any carpet manufactured for use in the U.S. will have a minimum fire resistance established by the "pill" test (16 CFR 1630, *The Standard for the Surface Flammability of Carpets and Rugs*), interior floor finish requirements found in the *Life Safety Code* are established by a different test and are more stringent than the pill test.



## **APPENDIX C—FIRE EQUIPMENT LICENSING**

The LSC does not require day care centers to have portable fire extinguishers available. However, DCFS and many local jurisdictions may require that portable fire extinguishers be available to staff in the day care center. All companies and personnel who install and service these portable fire extinguishers must be licensed by the OSFM. Such extinguishers, if installed, are required to be maintained as evidenced by a current "tag" that is affixed to the extinguisher by an OSFM-licensed fire extinguisher service company's technician. Licensing requirements also applies to companies and personnel who service fire suppression systems protecting kitchen cooking surfaces. Whether or not a fire equipment company is properly licensed by OSFM can be checked by contacting the Springfield regional office of the OSFM's Division of Fire Prevention-Licensing Section at 217-558-0328 or on the OSFM website.