TO:  
Local Code Enforcement Agencies  
Third-Party Agencies (FBH, MH)  
Interested Parties (SHL, FBH, MH)  
State Agencies and Departments  

FROM:  
Richard Weinert, Deputy Director  
Division of Codes and Standards  

SUBJECT:  
Emergency Housing – Adoption of Emergency Regulations  
Effective April 18, 2018  
2016 California Building Code  
2016 California Residential Code  

The purpose of this Information Bulletin is to bring attention to emergency building standards adopted by the Department of Housing and Community Development (HCD) effective April 18, 2018. These regulations include provisions related to emergency housing and amend the 2016 California Building Code (CBC) and the 2016 California Residential Code (CRC), also known as Title 24, California Code of Regulations, Parts 2 and 2.5, respectively.

During the California Building Standards Commission (CBSC) meeting on April 17, 2018, the CBSC Commissioners concurred with HCD’s finding of emergency and approved HCD’s proposed emergency building standards. These emergency regulations are now new voluntary appendices to the 2016 CBC and 2016 CRC and provide a consistent minimum standard by which local agencies may develop emergency housing or shelter ordinances. The emergency regulations also provide a codified basis for HCD to review, provide recommendations, and approve submitted local emergency housing or shelter ordinances. The formal adoption of these standards into the CBC and CRC protects HCD from use and enforcement of underground regulations not formally adopted in accordance with the Building Standards Law. See Background section for additional detail.

These emergency regulations will be effective for a six-month period ending October 15, 2018, and must be readopted to remain in effect after the expiration date. HCD anticipates at least one 90-day readoption (emergency regulations may be readopted for up to two 90-day readoption periods). In order for these regulations to become permanent in the 2016 CBC and 2016 CRC, HCD must complete a formal certifying rulemaking process in accordance with Title 24,
California Code of Regulations, Title 24, Part 1, Section 1-419(e); Government Code Section 11346.1; and Health and Safety Code Section 18938.

The approved text of both the emergency regulations (HCD-EF 01-18) and certifying rulemaking documents for the permanent adoption of these emergency regulations are available on the CBSC website at: http://www.bsc.ca.gov/Rulemaking/emergency.aspx. The text of the emergency regulations is also attached to this Information Bulletin.

HCD will be revisiting these regulations as part of the 2018 Triennial Building Standards Code Adoption Cycle for incorporation into the 2019 CBC and 2019 CRC. Please subscribe on HCD’s Email Sign Up page to receive notifications of rulemaking activities related to building standards. Please access HCD’s website at www.hcd.ca.gov and use the checkbox under “Building Standards” labeled “State Housing Law Program.”

Background
California is faced with a lack of affordable housing resulting from several natural disasters in the form of fires, floods, and mudflows; as well as a homeless population stemming from social, economic, or other circumstances. Future seismic activity may also render residents with unoccupiable homes. Although California has adopted the 2016 California Building Standards Code (Code) to ensure that residential structures meet minimal safety and health standards, the process of designing and constructing a building in full compliance with the requirements of the Code for the purpose of housing victims of a declared emergency is time-consuming and costly. Residents displaced from their homes or currently in a homeless situation need to find shelter immediately to avoid health hazards associated with the lack of protection from the weather, access to sanitary facilities, and places to sleep and eat.

Local jurisdictions often must establish and approve emergency housing in a very short timeframe; however, they also need to ensure that the housing provided is durable and safe. Relying on the Code is the routine process for permitting and approving residential housing. However, there are options for housing that are available, but not recognized in the Code. These housing options may provide a quick, cost-effective and safe shelter permanently or on a temporary basis.

Chapter 786, Statutes of 2017 (AB 932) directs HCD to review and approve draft ordinances from seven local jurisdictions to ensure they address minimum health and safety standards. This legislation became effective January 1, 2018, and there were no building standards available to specifically address emergency housing.

To address these concerns in a timely manner, instead of waiting for the January 1, 2020, effective date of the 2019 CBC and CRC, HCD proposed emergency building standards for emergency housing that become effective upon CBSC approval and filing with the Secretary of State.

If you have any questions or concerns regarding this Information Bulletin, please contact Emily Withers, Codes and Standards Administrator II, at (916) 263-2998 or Emily.Withers@hcd.ca.gov.

Attachment
ATTACHMENT A

Note: The following document includes changes for both the 2016 California Building Code and the 2016 California Residential Code. The Express Terms in this document were approved by the California Building Standards Commission on April 17, 2018; and filed with the Secretary of State on April 18, 2018. These regulations became effective on April 18, 2018.

EXPRESS TERMS
FOR
PROPOSED BUILDING STANDARDS
OF THE
DEPARTMENT OF HOUSING AND COMMUNITY DEVELOPMENT
REGARDING THE AMENDMENT OF THE
2016 CALIFORNIA BUILDING CODE AND
2016 CALIFORNIA RESIDENTIAL CODE
CALIFORNIA CODE OF REGULATIONS, TITLE 24, PARTS 2 AND 2.5

(HCD EF 01/18)

The Department of Housing and Community Development (HCD) proposes these emergency regulations to be included into the 2016 editions of the California Building Code (CBC) and the California Residential Code (CRC) as presented on the following pages.

LEGEND FOR EXPRESS TERMS:
1. New California amendments: All such language is shown in Arial 9 point; underlined and in italics.
2. Notation: Authority and Reference citations are provided at the end of each section.

SUMMARY OF REGULATION ACTION

Adopt Appendix N on an emergency basis into the 2016 California Building Code.

Adopt Appendix X on an emergency basis into the 2016 California Residential Code.
1. HCD proposes to adopt a voluntary Appendix N in the 2016 CBC as follows:

APPENDIX N
EMERGENCY HOUSING

The provisions contained in this appendix are not mandatory unless specifically adopted by a state agency, or referenced in the adopting ordinance.

SECTION N101
GENERAL

N101.1 Scope. This appendix shall be applicable to emergency housing and emergency housing facilities, as defined in Section N102.

SECTION N102
DEFINITIONS

N102.1 General. The following words and terms shall, for the purposes of this appendix, have the meanings shown herein. Refer to Chapter 2 of this code for general definitions.

DECLARATION OF SHELTER CRISIS. The duly proclaimed existence of a situation in which a significant number of persons are without the ability to obtain shelter, resulting in a threat to their health and safety. (See Government Code Section 8698)

DEPENDENT UNIT. Emergency housing not equipped with a kitchen area, toilet, and sewage disposal system. Recreational vehicles that are not self-contained and without utility service connections shall be considered dependent units.

EMERGENCY HOUSING. Housing in a permanent or temporary structure(s), occupied during a declaration of state of emergency, local emergency, or shelter crisis. Emergency housing may include, but is not limited to, buildings and structures constructed in accordance with the California Building Standards Code; and emergency sleeping cabins, emergency transportable housing units, and tents constructed and/or assembled in accordance with this appendix.

EMERGENCY HOUSING FACILITIES. On-site common use facilities supporting emergency housing. Emergency housing facilities include, but are not limited to, kitchen areas, toilets, showers and bathrooms with running water. The use of emergency housing facilities is limited exclusively to the occupants of the emergency housing, personnel involved in operating the housing, and other emergency personnel.

EMERGENCY HOUSING SITE. A site containing emergency housing and emergency housing facilities supporting the emergency housing.

EMERGENCY SLEEPING CABIN. Relocatable hard-sided structure constructed in accordance with this appendix, which may be occupied only for emergency housing if allowed by the authority having jurisdiction.

EMERGENCY TRANSPORTABLE HOUSING UNIT. A single or multiple section prefabricated structure that is transportable by a vehicle and that can be installed on a permanent or temporary site in response to a need for emergency housing. Emergency transportable housing unit include, but is not limited to, manufactured homes, mobilehomes, multifamily manufactured homes, recreational vehicles, and park trailers. For the purposes of this appendix, emergency transportable housing units do not include factory-built housing as defined in the Health and Safety Code Section 19971.

LANDING PLATFORM. A landing provided as the top step of a stairway accessing a loft.

LOCAL EMERGENCY. Local Emergency as defined in the Government Code, Section 8558.

LOFT. A floor level located more than 30 inches (762 mm) above the main floor and open to it on at least one side with a ceiling height of less than 6 feet 8 inches (2032 mm), used as a living or sleeping space.

MANUFACTURED HOME. A structure designed to be used as a single-family dwelling, as defined in the Health and Safety Code, Section 18007.
**MOBILEHOME.** A structure designed to be used as a single-family dwelling, as defined in the Health and Safety Code, Section 18008.

**MULTIFAMILY MANUFACTURED HOME.** A structure designed to contain not less than two dwelling units, as defined in the Health and Safety Code, Section 18008.7.

**PARK TRAILER.** A trailer designed for human habitation that meets all requirements in the Health and Safety Code, Section 18009.3.

**RECREATIONAL VEHICLE.** A motor home, travel trailer, truck camper, or camping trailer, with or without motive power, designed for human habitation, that meets all requirements in the Health and Safety Code, Section 18010.

**STATE OF EMERGENCY.** State of Emergency as defined in the Government Code, Section 8558.

### SECTION N103

**EMERGENCY HOUSING**

**N103.1 General.** Emergency sleeping cabins, emergency transportable housing units, and tents constructed and/or assembled in accordance with this appendix, shall be occupied only during declaration of state of emergency, local emergency, or shelter crisis.

Buildings and structures constructed in accordance with the California Building Standards Code, used as emergency housing, shall be permitted to be permanently occupied.

**N103.2 Existing buildings.** Existing residential and nonresidential buildings or structures shall be permitted to be used as emergency housing and emergency housing facilities provided such buildings or structures comply with the building code provisions and/or other regulations in effect at the time of original construction and/or alteration. Existing buildings or structures used as emergency housing shall not become or continue to be substandard buildings, as determined by the Authority Having Jurisdiction.

**N103.2.1 New additions, alterations, and change of occupancy.** New additions, alterations, and change of occupancy to existing buildings shall comply with the requirements of the California Building Standards Code effective at the time of addition, alteration, or change of occupancy. The requirements shall apply only to and/or within the specific area of the addition, alteration, or change of occupancy.

**Exception:** Existing buildings and structures used for emergency housing and emergency housing facilities may not be required to comply with the California Energy Code, as determined by the Authority Having Jurisdiction.

**N103.3 Occupant load.** Except otherwise stated in this appendix, the maximum occupant load allowed in buildings and structures used as emergency housing shall be determined by the Authority Having Jurisdiction, but the interior floor area shall not be less than 70 square feet (6.5 m²) for one occupant. Where more than one person occupies the building/structure, the required floor area shall be increased at the rate of 50 square feet (4.65 m²) for each occupant in excess of one.

**Exceptions:**

1. Tents.
2. Recreational vehicles and park trailers designed for human habitation that meet the requirements in the Health and Safety Code, Sections 18009.3 and 18010, as applicable.

**N103.4 Fire and life safety requirements not addressed in this appendix.** If not otherwise addressed in this appendix, fire and life safety measures, including, but not limited to, means of egress, fire separation, fire sprinklers, smoke alarms, and carbon monoxide alarms, shall be determined and enforced by the Authority Having Jurisdiction.

**N103.5 Privacy.** Emergency housing shall be provided with a privacy lock on each entrance door and all windows for use by the occupants.

**N103.6 Heating.** All sleeping areas shall be provided with adequate heating as determined by the Authority Having Jurisdiction.
SECTION N104
EMERGENCY SLEEPING CABINS

N104.1 General. Emergency sleeping cabins shall have an interior floor area of not less than 70 square feet (6.5 m²) for one occupant. Where more than one person occupies the cabin, the required floor area shall be increased at the rate of 50 square feet (4.65 m²) for each occupant in excess of one. The interior floor area shall not exceed 400 square feet (37 m²), excluding lofts.

N104.2 Live loads. Emergency sleeping cabins shall be designed to resist intrusion of wind, rain, and to support the following live loads:

1. Floor live loads not less than 40 pounds per square foot (1.92 kPa) of floor area.
2. Horizontal live loads not less than 15 pounds per square foot (718 Pa) of vertical wall and roof area.
3. Roof live loads not less than 20 pounds per square foot (958 Pa) of horizontal roof area.
4. In areas where snow loads are greater than 20 pounds per square foot (958 Pa), the roof shall be designed and constructed to resist these additional loads.

N104.3 Minimum ceiling height. Habitable space and hallways in emergency sleeping cabins shall have a ceiling height of not less than 80 inches (2032 mm). Bathrooms, toilet rooms, and kitchens, if provided, shall have a ceiling height of not less than 76 inches (1930 mm). Obstructions shall not extend below these minimum ceiling heights including beams, girders, ducts, lighting and other obstructions.

Exception: Ceiling heights in lofts constructed in accordance with Section N108 are permitted to be less than 80 inches (2032 mm).

N104.4 Means of egress. Emergency sleeping cabins shall be provided with at least two forms of egress placed remotely from each other. One form of egress may be an egress window complying with Section N104.4.1. When a loft is provided, one form of egress shall be an egress window complying with Section N104.4.1, provided in the loft space.

N104.4.1 Egress window. The bottom of the clear opening of the egress window shall not be more than 44 inches (1118 mm) above the floor. The egress window shall have a minimum net clear opening height of 24 inches (610 mm), and a minimum net clear opening width of 20 inches (508 mm). The egress window shall have a minimum net clear opening area of 5 square feet (0.465 m²).

N104.5 Plumbing and gas service. If an emergency sleeping cabin contains plumbing or gas service, it shall comply with all applicable requirements of the California Plumbing Code and the California Mechanical Code.

N104.6 Electrical. Emergency sleeping cabins shall be provided with all of the following installed in compliance with the California Electrical Code:

1. Continuous source of electricity
   
   Exception: The source of electricity may be solar power or emergency generator.

2. At least one interior lighting fixture.

3. Electrical heating equipment listed for residential use, and a dedicated receptacle outlet for the electrical heating equipment.

4. At least one GFCI-protected receptacle outlet for use by the occupant(s).

N104.7 Ventilation. Emergency sleeping cabins shall be provided with means of ventilation (natural and/or mechanical) allowing for adequate air replacement, as determined by the Authority Having Jurisdiction.

N104.8 Smoke alarms. Emergency sleeping cabins shall be provided with at least one smoke alarm installed in accordance with the California Residential Code, Section R314.

N104.9 Carbon Monoxide Alarms. If an emergency sleeping cabin contains a fuel-burning appliance(s) or a fireplace(s), a carbon monoxide alarm shall be installed in accordance with the California Residential Code, Section R315.
SECTION N105
EMERGENCY TRANSPORTABLE HOUSING UNITS

N105.1 General. Manufactured homes, mobile homes, multifamily manufactured homes, recreational vehicles, and park trailers used as emergency transportable housing, shall comply with all applicable requirements in the Health and Safety Code, Division 13, Part 2; and Title 25, Division 1, Chapter 3, Subchapter 2.

SECTION N106
TENTS

N106.1 General. Tents shall not be used to house occupants for more than 7 days unless such tents are maintained with tight wooden floors raised at least 4 inches (101.6 mm) above the ground level and are equipped with baseboards on all sides to a height of at least 6 inches (152.4 mm). Tents may be maintained with concrete slabs with the finished surface at least 4 inches (101.6 mm) above grade and equipped with curbs on all sides at least 6 inches (152.4 mm) high.

A tent shall not be considered a suitable sleeping place when it is found necessary to provide heating facilities in order to maintain a minimum temperature of 50 degrees Fahrenheit (10 degrees Celsius) within such tent during the period of occupancy.

SECTION N107
ACCESSIBILITY

N107.1 General. Emergency housing shall comply with the applicable requirements in Chapter 11B and/or the US Access Board Final Guidelines for Emergency Transportable Housing.

Note: The Architectural and Transportation Barriers Compliance Board (US Access Board) issued the Final Guidelines for Emergency Transportable Housing on May 7, 2014. The final guidelines amended the 2004 ADA Accessibility Guidelines (2004 ADAAG) and the 2004 Architectural Barriers Act (ABA) Accessibility Guidelines (2004 ABAAG) to specifically address emergency transportable housing units provided to disaster survivors by entities subject to the ADA or ABA. The final rule ensures that the emergency transportable housing units are readily accessible to and usable by disaster survivors with disabilities.

SECTION N108
LOFTS IN EMERGENCY HOUSING

N108.1 Minimum loft area and dimensions. Lofts used as a sleeping or living space shall meet the minimum area and dimension requirements of Sections N108.1.1 through N108.1.3.

N108.1.1 Minimum area. Lofts shall have a floor area of not less than 35 square feet (3.25 m²).

N108.1.2 Minimum dimensions. Lofts shall be not less than 5 feet (1524 mm) in any horizontal dimension.

N108.1.3 Height effect on loft area. Portions of a loft with a sloping ceiling measuring less than 3 feet (914 mm) from the finished floor to the finished ceiling shall not be considered as contributing to the minimum required area for the loft.

Exception: Under gable roofs with a minimum slope of 6:12, portions of a loft with a sloping ceiling measuring less than 16 inches (406 mm) from the finished floor to the finished ceiling shall not be considered as contributing to the minimum required area for the loft.

N108.2 Loft access. The access to and primary egress from lofts shall be any type described in Sections N108.2.1 through N108.2.4.

N108.2.1 Stairways. Stairways accessing lofts shall comply with the California Residential Code or with Sections N108.2.1.1 through N108.2.1.6.

N108.2.1.1 Width. Stairways accessing a loft shall not be less than 17 inches (432 mm) in clear width at or above the handrail. The minimum width below the handrail shall be not less than 20 inches (508 mm).
N108.2.1.2 Headroom. The headroom in stairways accessing a loft shall be not less than 80 inches1 (1880 mm), as measured vertically, from a sloped line connecting the tread or landing platform nosings in the middle of their width.

N108.2.1.3 Treads and risers. Risers for stairs accessing a loft shall be not less than 7 inches (178 mm) and not more than 12 inches (305 mm) in height. Tread depth and riser height shall be calculated in accordance with one of the following formulas:

1. The tread depth shall be 20 inches (508 mm) minus 4/3 of the riser height, or
2. The riser height shall be 15 inches (381 mm) minus 3/4 of the tread depth.

N108.2.1.4 Landing platforms. The top step of stairways accessing lofts shall be constructed as a landing platform where the loft ceiling height is less than 80 inches2 (1880 mm). The landing platform shall be 18 inches (457 mm) to 22 inches (559 mm) in depth measured from the nosing of the landing platform to the edge of the loft, and 16 inches (406 mm) to 18 inches (457 mm) in height measured from the landing platform to the loft floor.

N108.2.1.5 Handrails. Handrails shall comply with the California Residential Code, Section R311.7.8.

N108.2.1.6 Stairway guards. Guards at open sides of stairways shall comply with the California Residential Code, Section R312.1.

N108.2.2 Ladders. Ladders accessing lofts shall comply with Sections N108.2.2.1 and N108.2.2.2.

N108.2.2.1 Size and capacity. Ladders accessing lofts shall have a rung width of not less than 12 inches (305 mm), and 10 inches (254 mm) to 14 inches (356 mm) spacing between rungs. Ladders shall be capable of supporting a 200 pound (90.7 kg) load on any rung. Rung spacing shall be uniform within 3/8-inch (9.5 mm).

N108.2.2.2 Incline. Ladders shall be installed at 70 to 80 degrees from horizontal.

N108.2.3 Alternating tread devices. Alternating tread devices are acceptable as allowed by the Authority Having Jurisdiction.

N108.2.4 Loft Guards. Loft guards shall be located along the open side of lofts. Loft guards shall not be less than 36 inches (914 mm) in height or one-half of the clear height to the ceiling, whichever is less. Loft guards shall not have openings from the walking surface to the required guard height that allow passage of a sphere 4 inches (102 mm) in diameter.

SECTION N109 LOCATION, MAINTENANCE AND IDENTIFICATION

N109.1 Maintenance. Emergency housing and emergency housing facilities shall be maintained in a safe and sanitary condition, and free from vermin, vectors and other matter of an infectious or contagious nature. The grounds within emergency housing sites shall be kept clean and free from accumulation of debris, filth, garbage and deleterious matter. Emergency housing and emergency housing facilities shall not be occupied if a substandard conditions exist, as determined by the Authority Having Jurisdiction.

N109.1.1 Fire Hazards. Dangerous materials or materials that create a fire hazard, as determined by the Authority Having Jurisdiction, shall not be allowed on the grounds within emergency housing sites.

N109.3 Identification. Emergency housing shall be designated by address numbers, letters, or other suitable means of identification. The identification shall be in a conspicuous location facing the street or driveway fronting the building or structure. Each identification character shall be not less than 4 inches (102 mm) in height and not less than 0.5 inch (12.7 mm) in width, installed/painted on a contrasting background.

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1 Section N108.2.1.2: The headroom reference needs correction to read 74 inches, which is consistent with the 1880 mm height. This correction will be proposed for permanent adoption during the certifying rulemaking process.

2 Section N108.2.1.4: The ceiling height reference needs correction to read 74 inches, which is consistent with the 1880 mm height. This correction will be proposed for permanent adoption during the certifying rulemaking process.
SECTION N110
EMERGENCY HOUSING FACILITIES

N110.1 Drinking Water. Potable drinking water shall be provided for all occupants of emergency housing.

N110.2 Kitchens. Where occupants of dependent units are permitted or required to cook for themselves, a separate area shall be equipped and maintained as a common use kitchen. Refrigerated storage shall be provided for safe storage of food.

N110.3 Toilet and bathing facilities. When dependent units are used as emergency housing, the emergency housing site shall be provided with one toilet and one bathing facility for every 15 occupants of each gender. The Authority Having Jurisdiction may permit different types and ratios of toilet and bathing facilities. The approval shall be based upon a finding that the type and ratio of toilet and bathing facilities are sufficient to process the anticipated volume of sewage and waste water, while maintaining sanitary conditions for the occupants of the emergency housing.

Bathing facilities shall be provided with heating equipment which shall be capable of maintaining a temperature of 70 degrees F (21.0 degrees Celsius) within such facilities.

Lavatories with running water shall be installed and maintained in the toilet facilities or adjacent to the toilet facilities.

N110.4 Garbage, waste and rubbish disposal. All garbage, kitchen waste and rubbish shall be deposited in approved covered receptacles, which shall be emptied when filled and the contents shall be disposed of in a sanitary manner acceptable to the Authority Having Jurisdiction.

NOTE:
Authority Cited: Health and Safety Code Sections 17040, 17050, 17920.9, 17921, 17921.5, 17921.6, 17921.10, 17922, 17922.6, 17922.12, 17922.14, 17927, 17928, 18300, 18552, 18620, 18630, 18640, 18670, 18690, 18691, 18865, 18871.3, 18871.4, 18873, 18873.1 through 18873.5, 18938.3, 18944.11, and 19990; and Government Code Section 12955.1.

Reference: Health and Safety Code Sections 17000 through 17062.5, 17910 through 17995.5, 18200 through 18700, 18860 through 18874, and 19960 through 1997; Civil Code Sections 1101.4 and 1101.5; and Government Code Sections 12955.1 and 12955.1.1.

2. HCD proposes to adopt a voluntary Appendix X in the 2016 CRC as follows:

APPENDIX X
EMERGENCY HOUSING

The provisions contained in this appendix are not mandatory unless specifically adopted by a state agency, or referenced in the adopting ordinance.

SECTION AX101
GENERAL

AX101.1 Scope. This appendix shall be applicable to emergency housing and emergency housing facilities, as defined in Section AX 102.

SECTION AX102
DEFINITIONS

AX102.1 General. The following words and terms shall, for the purposes of this appendix, have the meanings shown herein. Refer to Chapter 2 of this code for general definitions.

DECLARATION OF SHELTER CRISIS. The duly proclaimed existence of a situation in which a significant number of persons are without the ability to obtain shelter, resulting in a threat to their health and safety. (See Government Code Section 8698).
**DEPENDENT UNIT.** Emergency housing not equipped with a kitchen area, toilet, and sewage disposal system. Recreational vehicles that are not self-contained and without utility service connections shall be considered dependent units.

**EMERGENCY HOUSING.** Housing in a permanent or temporary structure(s), occupied during a declaration of state of emergency, local emergency, or shelter crisis. Emergency housing may include, but is not limited to, buildings and structures constructed in accordance with the California Building Standards Code; and emergency sleeping cabins, emergency transportable housing units, and tents constructed in accordance with this appendix.

**EMERGENCY HOUSING FACILITIES.** On-site common use facilities supporting emergency housing. Emergency housing facilities include, but are not limited to, kitchen areas, toilets, showers and bathrooms with running water. The use of emergency housing facilities is limited exclusively to the occupants of the emergency housing, personnel involved in operating the housing, and other emergency personnel.

**EMERGENCY HOUSING SITE.** A site containing emergency housing and emergency housing facilities supporting the emergency housing.

**EMERGENCY SLEEPING CABIN.** Relocatable hard-sided structure constructed in accordance with this appendix, which may be occupied only for emergency housing if allowed by the Authority Having Jurisdiction.

**EMERGENCY TRANSPORTABLE HOUSING UNIT.** A single or multiple section prefabricated structure that is transportable by a vehicle and that can be installed on a permanent or temporary site in response to a need for emergency housing. Emergency transportable housing unit include, but is not limited to, manufactured homes, multifamily manufactured homes, recreational vehicles, and park trailers. For the purposes of this appendix, emergency transportable housing units do not include factory-built housing as defined in the Health and Safety Code Section 19971.

**LANDING PLATFORM.** A landing provided as the top step of a stairway accessing a loft.

**LOCAL EMERGENCY.** Local Emergency as defined in the Government Code, Section 8558.

**LOFT.** A floor level located more than 30 inches (762 mm) above the main floor and open to it on at least one side with a ceiling height of less than 6 feet 8 inches (2032 mm), used as a living or sleeping space.

**MANUFACTURED HOME.** A structure designed to be used as a single-family dwelling, as defined in the Health and Safety Code, Section 18007.

**MOBILEHOME.** A structure designed to be used as a single-family dwelling, as defined in the Health and Safety Code, Section 18008.

**MULTIFAMILY MANUFACTURED HOME.** A structure designed to contain not less than two dwelling units, as defined in the Health and Safety Code, Section 18008.7.

**PARK TRAILER.** A trailer designed for human habitation that meets all requirements in the Health and Safety Code, Section 18009.3.

**RECREATIONAL VEHICLE.** A motor home, travel trailer, truck camper, or camping trailer, with or without motive power, designed for human habitation, that meets all requirements in the Health and Safety Code, Section 18010.

**STATE OF EMERGENCY.** State of Emergency as defined in the Government Code, Section 8558.

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**SECTION AX103**

**EMERGENCY HOUSING**

**AX103.1 General.** Emergency sleeping cabins, emergency transportable housing units, and tents constructed in accordance with this appendix, shall be occupied only during declaration of state of emergency, local emergency, or shelter crisis.

Buildings and structures constructed in accordance with the California Building Standards Code, used as emergency housing, shall be permitted to be permanently occupied.
**AX103.2 Existing buildings.** Existing residential and nonresidential buildings or structures shall be permitted to be used as emergency housing and emergency housing facilities provided such buildings or structures comply with the building code provisions and/or other regulations in effect at the time of original construction and/or alteration. Existing buildings or structures used as emergency housing shall not become or continue to be substandard buildings, as determined by the Authority Having Jurisdiction.

**AX103.2.1 New additions, alterations, and change of occupancy.** New additions, alterations, and change of occupancy to existing buildings shall comply with the requirements of the California Building Standards Code effective at the time of addition, alteration, or change of occupancy. The requirements shall apply only to and/or within the specific area of the addition, alteration, or change of occupancy.

_exception:_ Existing buildings and structures used for emergency housing and emergency housing facilities may not be required to comply with the California Energy Code, as determined by the Authority Having Jurisdiction.

**AX103.3 Occupant load.** Except otherwise stated in this appendix, the maximum occupant load allowed in buildings and structures used as emergency housing shall be determined by the Authority Having Jurisdiction, but the interior floor area shall not be less than 70 square feet (6.5 m²) for one occupant. Where more than one person occupies the building/structure, the required floor area shall be increased at the rate of 50 square feet (4.65 m²) for each occupant in excess of one.

**Exceptions:**

1. Tents.
2. Recreational vehicles and park trailers designed for human habitation that meet the requirements in the Health and Safety Code, Sections 18009.3 and 18010, as applicable.

**AX103.4 Fire and life safety requirements not addressed in this appendix.** If not otherwise addressed in this appendix, fire and life safety measures, including, but not limited to, means of egress, fire separation, fire sprinklers, smoke alarms, and carbon monoxide alarms, shall be determined and enforced by the Authority Having Jurisdiction.

**AX103.5 Privacy.** Emergency housing shall be provided with a privacy lock on each entrance door and all windows for use by the occupants.

**AX103.6 Heating.** All sleeping areas shall be provided with adequate heating as determined by the Authority Having Jurisdiction.

**SECTION AX104
EMERGENCY SLEEPING CABINS**

**AX104.1 General.** Emergency sleeping cabins shall have an interior floor area of not less than 70 square feet (6.5 m²) for one occupant. Where more than one person occupies the cabin, the required floor area shall be increased at the rate of 50 square feet (4.65 m²) for each occupant in excess of one. The interior floor area shall not exceed 400 square feet (37 m²), excluding lofts.

**AX104.2 Live loads.** Emergency sleeping cabins shall be designed to resist intrusion of wind, rain, and to support the following live loads:

1. Floor live loads not less than 40 pounds per square foot (1.92 kPa) of floor area.
2. Horizontal live loads not less than 15 pounds per square foot (718 Pa) of vertical wall and roof area.
3. Roof live loads not less than 20 pounds per square foot (958 Pa) of horizontal roof area.
4. In areas where snow loads are greater than 20 pounds per square foot (958 Pa), the roof shall be designed and constructed to resist these additional loads.

**AX104.3 Minimum ceiling height.** Habitable space and hallways in emergency sleeping cabins shall have a ceiling height of not less than 80 inches (2032 mm). Bathrooms, toilet rooms, and kitchens, if provided, shall have a ceiling height of not less than 76 inches (1930 mm). Obstructions shall not extend below these minimum ceiling heights including beams, girders, ducts, lighting and other obstructions.
**Exception:** Ceiling heights in lofts constructed in accordance with Section AX108 are permitted to be less than 80 inches (2032 mm).

**AX104.4 Means of egress.** Emergency sleeping cabins shall be provided with at least two forms of egress placed remotely from each other. One form of egress may be an egress window complying with Section AX104.4.1. When a loft is provided, one form of egress shall be an egress window complying with Section AX104.4.1, provided in the loft space.

**AX104.4.1 Egress window.** The bottom of the clear opening of the egress window shall not be more than 44 inches (1118 mm) above the floor. The egress window shall have a minimum net clear opening height of 24 inches (610 mm), and a minimum net clear opening width of 20 inches (508 mm). The egress window shall have a minimum net clear opening area of 5 square feet (0.465 m²).

**AX104.5 Plumbing and gas service.** If an emergency sleeping cabin contains plumbing or gas service, it shall comply with all applicable requirements of the California Plumbing Code and the California Mechanical Code.

**AX104.6 Electrical.** Emergency sleeping cabins shall be provided with all of the following installed in compliance with the California Electrical Code:

1. Continuous source of electricity

   **Exception:** The source of electricity may be solar power or emergency generator.

2. At least one interior lighting fixture.

3. Electrical heating equipment listed for residential use, and a dedicated receptacle outlet for the electrical heating equipment.

4. At least one GFCI-protected receptacle outlet for use by the occupant(s).

**AX104.7 Ventilation.** Emergency sleeping cabins shall be provided with means of ventilation (natural and/or mechanical) allowing for adequate air replacement, as determined by the Authority Having Jurisdiction.

**AX104.8 Smoke alarms.** Emergency sleeping cabins shall be provided with at least one smoke alarm installed in accordance with Section R314.

**AX104.9 Carbon Monoxide Alarms.** If an emergency sleeping cabin contains a fuel-burning appliance(s) or a fireplace(s), a carbon monoxide alarm shall be installed in accordance with Section R315.

### SECTION AX105
**EMERGENCY TRANSPORTABLE HOUSING UNITS**

**AX105.1 General.** Manufactured homes, mobilehomes, multifamily manufactured homes, recreational vehicles, and park trailers used as emergency transportable housing, shall comply with all applicable requirements in the Health and Safety Code, Division 13, Part 2; and Title 25, Division 1, Chapter 3, Subchapter 2.

### SECTION AX106
**TENTS**

**AX106.1 General.** Tents shall not be used to house occupants for more than 7 days unless such tents are maintained with tight wooden floors raised at least 4 inches (101.6 mm) above the ground level and are equipped with baseboards on all sides to a height of at least 6 inches (152.4 mm). Tents may be maintained with concrete slabs with the finished surface at least 4 inches (101.6 mm) above grade and equipped with curbs on all sides at least 6 inches (152.4 mm) high.

A tent shall not be considered a suitable sleeping place when it is found necessary to provide heating facilities in order to maintain a minimum temperature of 50 degrees Fahrenheit (10 degrees Celsius) within such tent during the period of occupancy.
SECTION AX107
ACCESSIBILITY

AX107.1 General. Emergency housing shall comply with the applicable requirements in the California Building Code, Chapter 11B, and/or the US Access Board Final Guidelines for Emergency Transportable Housing.

Note: The Architectural and Transportation Barriers Compliance Board (US Access Board) issued the Final Guidelines for Emergency Transportable Housing on May 7, 2014. The final guidelines amended the 2004 ADA Accessibility Guidelines (2004 ADAAG) and the 2004 Architectural Barriers Act (ABA) Accessibility Guidelines (2004 ABAAG) to specifically address emergency transportable housing units provided to disaster survivors by entities subject to the ADA or ABA. The final rule ensures that the emergency transportable housing units are readily accessible to and usable by disaster survivors with disabilities.

SECTION AX108
LOFTS IN EMERGENCY HOUSING

AX 108.1 Minimum loft area and dimensions. Lofts used as a sleeping or living space shall meet the minimum area and dimension requirements of Sections AX108.1.1 through AX108.1.3.

AX108.1.1 Minimum area. Lofts shall have a floor area of not less than 35 square feet (3.25 m²).

AX108.1.2 Minimum dimensions. Lofts shall be not less than 5 feet (1524 mm) in any horizontal dimension.

AX108.1.3 Height effect on loft area. Portions of a loft with a sloping ceiling measuring less than 3 feet (914 mm) from the finished floor to the finished ceiling shall not be considered as contributing to the minimum required area for the loft.

Exception: Under gable roofs with a minimum slope of 6:12, portions of a loft with a sloping ceiling measuring less than 16 inches (406 mm) from the finished floor to the finished ceiling shall not be considered as contributing to the minimum required area for the loft.

AX108.2 Loft access. The access to and primary egress from lofts shall be any type described in Sections AX108.2.1 through AX108.2.4.

AX108.2.1 Stairways. Stairways accessing lofts shall comply with this code or with Sections AX108.2.1.1 through AX108.2.4.

AX108.2.1.1 Width. Stairways accessing a loft shall not be less than 17 inches (432 mm) in clear width at or above the handrail. The minimum width below the handrail shall be not less than 20 inches (508 mm).

AX108.2.1.2 Headroom. The headroom in stairways accessing a loft shall be not less than 80 inches³ (1880 mm), as measured vertically, from a sloped line connecting the tread or landing platform nosings in the middle of their width.

AX108.2.1.3 Treads and risers. Risers for stairs accessing a loft shall be not less than 7 inches (178 mm) and not more than 12 inches (305 mm) in height. Tread depth and riser height shall be calculated in accordance with one of the following formulas:

1. The tread depth shall be 20 inches (508 mm) minus 4/3 of the riser height, or
2. The riser height shall be 15 inches (381 mm) minus 3/4 of the tread depth.

AX108.2.1.4 Landing platforms. The top step of stairways accessing lofts shall be constructed as a landing platform where the loft ceiling height is less than 80 inches⁴ (1880 mm). The landing platform shall be 18 inches (457 mm) to 22 inches (559 mm) in depth measured from the nosing of the landing platform to the

³ Section AX108.2.1.2: The headroom reference needs correction to read 74 inches which is consistent with the 1880 mm height. This correction will be proposed for permanent adoption during the certifying rulemaking process.

⁴ Section AX108.2.1.4: The ceiling height reference needs correction to read 74 inches which is consistent with the 1880 mm height. This correction will be proposed for permanent adoption during the certifying rulemaking process.
edge of the loft, and 16 inches (406 mm) to 18 inches (457 mm) in height measured from the landing platform to the loft floor.

**AX108.2.1.5 Handrails.** Handrails shall comply with Section R311.7.8.

**AX108.2.1.6 Stairway guards.** Guards at open sides of stairways shall comply with Section R312.1.

**AX108.2.2 Ladders.** Ladders accessing lofts shall comply with Sections AX108.2.1 and AX108.2.2.

**AX108.2.2.1 Size and capacity.** Ladders accessing lofts shall have a rung width of not less than 12 inches (305 mm), and 10 inches (254 mm) to 14 inches (356 mm) spacing between rungs. Ladders shall be capable of supporting a 200 pound (90.7 kg) load on any rung. Rung spacing shall be uniform within 3/8-inch (9.5 mm).

**AX108.2.2.2 Incline.** Ladders shall be installed at 70 to 80 degrees from horizontal.

**AX108.2.3 Alternating tread devices.** Alternating tread devices are acceptable as allowed by the Authority Having Jurisdiction.

**AX108.2.4 Loft Guards.** Loft guards shall be located along the open side of lofts. Loft guards shall not be less than 36 inches (914 mm) in height or one-half of the clear height to the ceiling, whichever is less. Loft guards shall not have openings from the walking surface to the required guard height that allow passage of a sphere 4 inches (102 mm) in diameter.

**SECTION AX109 LOCATION, MAINTENANCE AND IDENTIFICATION**

**AX109.1 Maintenance.** Emergency housing and emergency housing facilities shall be maintained in a safe and sanitary condition, and free from vermin, vectors and other matter of an infectious or contagious nature. The grounds within emergency housing sites shall be kept clean and free from accumulation of debris, filth, garbage and deleterious matter. Emergency housing and emergency housing facilities shall not be occupied if a substandard conditions exist, as determined by the Authority Having Jurisdiction.

**AX109.1.1 Fire Hazards.** Dangerous materials or materials that create a fire hazard, as determined by the Authority Having Jurisdiction, shall not be allowed on the grounds within emergency housing sites.

**AX109.3 Identification.** Emergency housing shall be designated by address numbers, letters, or other suitable means of identification. The identification shall be in a conspicuous location facing the street or driveway fronting the building or structure. Each identification character shall be not less than 4 inches (102 mm) in height and not less than 0.5 inch (12.7 mm) in width, installed/painted on a contrasting background.

**SECTION AX110 EMERGENCY HOUSING FACILITIES**

**AX110.1 Drinking Water.** Potable drinking water shall be provided for all occupants of emergency housing.

**AX110.2 Kitchens.** Where occupants of dependent units are permitted or required to cook for themselves, a separate area shall be equipped and maintained as a common use kitchen. Refrigerated storage shall be provided for safe storage of food.

**AX110.3 Toilet and bathing facilities.** When dependent units are used as emergency housing, the emergency housing site shall be provided with one toilet and one bathing facility for every 15 occupants of each sex. The Authority Having Jurisdiction may permit different types and ratios of toilet and bathing facilities. The approval shall be based upon a finding that the type and ratio of toilet and bathing facilities are sufficient to process the anticipated volume of sewage and waste water, while maintaining sanitary conditions for the occupants of the emergency housing.

Bathing facilities shall be provided with heating equipment which shall be capable of maintaining a temperature of 70 degrees F (21.0 degrees Celsius) within such facilities.

Lavatories with running water shall be installed and maintained in the toilet facilities or adjacent to the toilet facilities.
**AX110.4 Garbage, waste and rubbish disposal.** All garbage, kitchen waste and rubbish shall be deposited in approved covered receptacles, which shall be emptied when filled and the contents shall be disposed of in a sanitary manner acceptable to the Authority Having Jurisdiction.

**NOTE:**
Authority Cited: Health and Safety Code Sections 17040, 17050, 17920.9, 17921, 17921.5, 17921.6, 17921.10, 17922, 17922.6, 17922.12, 17922.14, 17927, 17928, 18300, 18552, 18554, 18620, 18630, 18640, 18670, 18690, 18691, 18865, 18871.3, 18871.4, 18873, 18873.1 through 18873.5, 18938.3, 18944.11, and 19990; and Government Code Section 12955.1.

Reference: Health and Safety Code Sections 17000 through 17062.5, 17910 through 17995.5, 18200 through 18700, 18860 through 18874, and 19960 through 19997; Civil Code Sections 1101.4 and 1101.5; and Government Code Sections 12955.1 and 12955.1.1.