

2019 CALIFORNIA BUILDING STANDARDS CODE OF REGULATIONS TITLE 24

Wildland-Urban Interface (WUI)

**CBC Chapter 7A and CRC Section R337
Wildland-Urban Interface (WUI) Fire Conformance Checklist**

(The use of paints, coatings, stains, or other surface treatments are not an approved method of protection as required in this chapter.)
Check the boxes applicable to your project to show how you are meeting compliance.

APPLICABILITY:

- Detached Residential building.
- Detached Commercial buildings.
- Detached accessory structures within 50' of an applicable building. Exception 2 – Buildings of an accessory character classified as Group U occupancy less than 500 sq. ft. and located at least 50 feet from an applicable building.
- Detached Group U occupancy not exceeding 120 square feet in floor area when located less than 30 ft. from an applicable building.
- Additions and alterations to buildings that were permitted and constructed on or after July 1, 2008.

CERTIFICATION OF COMPLIANCE: CBC 701A.4 and R337.1.4 *"The local building official shall, prior to construction, provide the owner or applicant a certification that the building as proposed to be built complies with... all WUI materials and construction methods for wildfire exposure." Plans "Approved" by the Building Division demonstrate compliance with this requirement.*

PLEASE COMPLETE AND INCORPORATE THE FOLLOWING CHECKLIST INTO CONSTRUCTION DOCUMENTS TO DEMONSTRATE PROPOSED MATERIALS COMPLY WITH THESE REQUIREMENTS.

*Where required (All materials shall bear identification showing the fire performance rating thereof. That identification shall be issued by ICC-ES or a testing facility recognized by the State Fire Marshall having a service for inspection of materials at the factory. **Field inspector to verify identification prior to it being covered and/or concealed**)*

VEGETATION MANAGEMENT COMPLIANCE: 701A.5 and R337.1.5

Provide documentation (on plot plan, or landscape plan) of compliance with PRC 4291. *(Suggest scheduling design/pre-construction meeting with the local fire authority to review/clarify what their requirements will be for your particular parcel/project.)*

- Plans shall specify and demonstrate requirement to maintain fire break
- Remove and clear away all flammable vegetation or combustible growth for 30' from each side of building.
- Remove any tree limbs within 10 feet of chimney outlet.
- Eliminate any dead wood from trees overhanging building. Maintain the roof to be free of leaves, needles or dead vegetation.
- Inspection and written approval by the local fire department shall be obtained prior to final of the building permit (Fire department to sign inspection card)

ROOFING: 705A and R337.5

Roof Coverings: 705A.2, R337.5.2

Is space proposed between the roof covering and roof decking? Yes No

If yes, the spaces shall be constructed to prevent the intrusion of flames and embers, and be fire-stopped with approved materials. Or have one layer of No. 72 ASTM cap sheet installed over the combustible decking. Provide detail for method of compliance, incorporate into plans and provide reference to detail location: _____.

Roof Valleys: 705A.3, R337.5.3

Assume shingle overlap proposed in valleys – Please verify. Yes No

Or if metal flashing will be incorporated in valleys, it shall be not less than 0.019-inch (0.48 mm)(No. 26 galvanized sheet gage) corrosion-resistant metal installed over a minimum 36-inch wide underlayment consisting of one layer of No. 72 ASTM cap sheet running the full length of the valley. Provide detail and/or notation on section drawing(s) of plans and provide reference to detail/specification location: _____.

Roof Gutters: 705A.4, R337.5.4

Roof gutters shall be provided with the means to prevent the accumulation of leaves and debris in the gutter. Indicate where specification has been incorporated into drawings: _____.

VENTS: 706A.1 and R337.6.3

706A.3 Eave or Cornice Vents shall not be installed on the underside of eaves and cornices, unless they resist the intrusion of flame and burning embers into the attic area of the structure.

If vented roof system is proposed:

- Plans shall define and detail how attic and/or rafter bays will be vented, i.e. gable end vents, eave vents, ridge vent(s).
- Detail/indicate how proposed eave/cornice vents will resist the intrusion of flame and embers into attic/rafter bay area of the structure.

(Specify product Company Name/ Description _____). Listed by SFM

Approved by Building Official, Or

The vents are located more than 12 feet from the ground or walking surface of a deck, porch, patio or similar surface; the vent materials are noncombustible, corrosion resistant and the dimensions of the openings are min. 1/16-inch and do not exceed 1/8-inch. The exterior wall covering and exposed underside of the eave are of noncombustible material, or ignition-resistant material (per SFM Standard 12-7A-5 Ignition Resistant material), Or

The attic space being ventilated is fully protected by an automatic sprinkler system installed in accordance with Section 903.3.1.1. (Document on plans and provide notation to sprinkler designer of requirement).

If a non-vented roof system is proposed:

Provide manufacturer's specifications and detailing for non-vented system, including air and water permeability testing data.

EXTERIOR COVERINGS 707A and R337.7

707A.3, R337.7.3 Exterior Walls: Exterior wall coverings or wall assemblies shall comply with **one** of the following: **Check all that apply.**

- Noncombustible material (Verify and document compliance with definition per CBC 202 – ASTM 136)
- Heavy Timber exterior wall assembly
- Log Wall Construction
- Ignition –Resistant Material (per CBC 702A and R337.2)
- Standard SFM 12-7A-1 (**Specify product Company Name, Description, Test Protocol and Flame Spread** _____.) Listed in SFM Handbook? Yes No (provide test data)

- One layer of 5/8" Type X gypsum sheathing applied behind the exterior covering or cladding on the exterior side of the framing
- The exterior portion of a 1-hour fire resistive exterior wall assembly designed for exterior fire exposure including assemblies using the gypsum panel and sheathing products listed in the Gypsum Association Fire Resistance Design Manual

707A.3.1, R337.7.3.1 Exterior wall coverings shall extend from the top of the foundation to the roof, and terminate at 2-inch nominal solid wood blocking between rafters at all roof overhangs, or in the case of enclosed eaves, terminate at the enclosure

Specify where notation has been detailed/noted on plans: _____

707A.4, R337.7.4 Open roof eaves (Solid wood rafter tails on the exposed underside of open roof eaves having a min. nominal dimension of 2", solid wood blocking installed between rafter tails on the exposed underside of open roof eaves having a minimum nominal dimension of 2", gable end overhangs and roof assembly projections beyond an exterior wall other than at the lower end of the rafter tails, fascia and other architectural trim boards are exempt from requirements).

Proposing open roof eaves? Yes No

If yes, identify roof eave compliance method. The exposed roof deck on the underside of unenclosed roof eaves shall consist of the following: **Check all that apply.**

- Noncombustible material
- Ignition-resistant material
- One layer of 5/8" Type X gypsum sheathing applied behind an exterior covering on the underside exterior of the roof deck
- The exterior portion of a 1-hour fire resistive exterior wall assembly applied to the underside of the roof deck designed for exterior fire exposure including assemblies using the gypsum panel and sheathing products listed in the Gypsum Association Fire Resistance Design manual.

Enclosed roof eaves and roof eave soffits 707A.5, R337.7.5 (Gable end overhangs and roof assembly projections beyond an exterior wall other than at the lower end of the rafter tails and fascia and other architectural trim boards are exempt from requirement).

Proposing enclosed eaves? Yes No

If yes, the exposed underside of enclosed roof eaves having either a boxed-in roof eave soffit with a horizontal underside, or sloping rafter tails with an exterior covering applied to the underside of the rafter tails, shall be protected by **one** of the following:

- Non-combustible material
- Ignition-resistant material
- One layer of 5/8" Type X gypsum sheathing applied behind an exterior covering on the underside of the rafter tails or soffit
- The exterior portion of a 1-hour fire resistive exterior wall assembly applied to the underside of the rafter tails or soffit including assemblies using the gypsum panel and sheathing products listed in the Gypsum Association Fire Resistance Design Manual
- Boxed-in roof eave soffit assemblies with a horizontal underside that meet the performance criteria in accordance with the test procedures set forth in SFM Standard 12-7A-3.

EXTERIOR PORCH CEILINGS: 707A.6, R337.7.6 (Except architectural trim boards)

The exposed underside of exterior porch ceilings shall be protected by **one** of the following:

- Noncombustible material
- Ignition-resistant material
- One layer of 5/8" Type X gypsum sheathing applied behind the exterior covering on the underside of the ceiling.
- The exterior portion of a 1-hour fire resistive exterior wall assembly applied to the underside of the ceiling assembly including assemblies using the gypsum panel and sheathing products listed in the Gypsum Association Fire Resistance Design manual.
- Porch ceiling assemblies with a horizontal underside that meet the performance criteria in accordance with the test procedures set forth in SFM Standard 12-7A-3.

FLOOR PROJECTIONS: 707A.7, R337.7.7 (except architectural trim boards)

The exposed underside of a cantilevered floor projection where a floor assembly extends over and exterior wall shall be protected by **one** of the following

- Noncombustible material
- Ignition-resistant material
- One layer of 5/8" Type X gypsum sheathing applied behind an exterior covering on the underside of the floor projection.
- The exterior portion of a 1-hour fire resistive exterior wall assembly applied to the underside of the floor projection including assemblies using the gypsum panel and sheathing products listed in the Gypsum Association Fire Resistance Design manual.
- The underside of a floor projection assembly that meet the performance criteria in accordance with the test procedures set forth in SFM Standard 12-7A-3.

UNDERFLOOR PROTECTION: 707A.8, R337.7.8 (heavy timber structural columns and beams do not require protection)

The underfloor area of elevated or overhanging buildings shall be enclosed to grade in accordance with the requirements of this chapter or the underside of the exposed underfloor shall consist of **one** of the following:

- Noncombustible material
- Ignition-resistant material
- One layer of 5/8" Type X gypsum sheathing applied behind an exterior covering on the underside of the floor projection.
- The exterior portion of a 1-hour fire resistive exterior wall assembly applied to the underside of the floor including assemblies using the gypsum panel and sheathing products listed in the Gypsum Association Fire Resistance Design manual.
- The underside of a floor assembly that meets the performance criteria in accordance with the test procedures set forth in SFM Standard 12-7A-3.

UNDERSIDE OF APPENDAGES: 707A.9, R327.7.9

When required by the enforcing agency the underside of overhanging appendages shall be enclosed to grade in accordance with the requirements of this chapter or the underside of the exposed underfloor shall consist of **one** of the following:

- Noncombustible material
- Ignition-resistant material
- One layer of 5/8" Type X gypsum sheathing applied behind an exterior covering on the underside of the floor projection.
- The exterior portion of a 1-hour fire resistive exterior wall assembly applied to the underside of the floor including assemblies using the gypsum panel and sheathing products listed in the Gypsum Association Fire Resistance Design manual.
- The underside of a floor assembly that meets the performance criteria in accordance with the test procedures set forth in SFM Standard 12-7A-3.

EXTERIOR WINDOWS AND DOORS: 708A and R337.8 (Exterior windows; exterior glazed doors; glazed openings within exterior doors; glazed openings within exterior garage doors; exterior structural glass veneer)

Exterior windows and exterior glazed door assemblies 708A.2.1, R337.8.2.1

Exterior windows and exterior glazed door assemblies shall comply with **one** of the following:

- Constructed of multi-pane glazing with a minimum of one tempered pane meeting the requirements of CBC 2406.
- Constructed of glass block units, or
- Have a fire-resistance rating of not less than 20 minutes when tested according to NFPA 257, or
- Tested to meet the performance requirements of SFM Standard 12-7A-2
- 708A.2.2 - Operable skylights shall be protected by a noncombustible mesh screen where the dimensions of the openings in the screen shall not exceed 1/8 inch (3.2 mm). R337.8.2.2

Structural glass veneer 708A.2.3, R337.8.2.3

The wall assembly behind the structural glass veneer shall comply with Sections 707A.3 and R337.7.3.

Exterior doors 708A.3, R337.8.3

Exterior doors shall comply with **one** of the following:

- Exterior surface or cladding shall be of noncombustible or ignition-resistant material, or
- Constructed of solid core wood that complies with the following
 - Stiles and rails shall not be less than 1 3/8 inches thick
 - Raised panels shall not be less than 1 1/4 inches thick, except for the exterior perimeter of the raised panel that may taper to a tongue not less than 3/8 inch thick
- Fire-resistance rating of not less than 20 minutes when tested according to NFPA 252.
- The exterior surface or cladding shall be tested to meet the performance requirements of Section R337.7.3.1 when tested in accordance with ASTM E2707.
- Tested to meet the performance requirements of SFM Standard 12-7A-1.

Exterior door glazing 708A.3.1, R337.8.3.1

Glazing in exterior doors shall comply with Sections 708A.2.1 and R337.8.2.1.

DECKING: 709A and R337.9

Where required 709A.1, R337.9.1.

The walking surface material of decks, porches, balconies and stairs shall comply with the requirements of this section when any portion of such surface is within 10 feet of the building

Decking Surfaces 709A.3, R337.9.3

The walking surface material of decks, porches, balconies and stairs shall be constructed with one of the following materials: (Identify proposed product: _____ and define compliance method below.)

- Ignition-resistant material compliant with performance requirements of both SFM Standard 12-7A-4 and 12-7A-5.
- Exterior fire retardant treated wood
- Noncombustible material
- Any material compliant with performance requirements of SFM Standard 12-7A-4A when attached exterior wall covering is also either noncombustible or ignition-resistant material

PLACER COUNTY POLICY:

This policy is established to develop and maintain consistency for interpretation and application of the provisions of CBC Chapter 7A.

1. The Building Department will have the responsibility of enforcing the provisions of this section that apply to building materials, systems and/or assemblies used in the exterior design and construction of new buildings within an SRA Wildland-Urban Interface Fire Area regardless of the Fire Hazard Severity Rating.

The Local Fire Authority will be responsible for the application and enforcement of those provisions that pertain to defensible space as prescribed in the California Public Resources Code 4291 Government Code Section 51182.

2. These requirements will apply to all new buildings (both residential and commercial) determined to be located in an SRA and that are determined to be classified as a Moderate, High, or Very High Fire Hazard Severity Zone. Commercial buildings may be exempted on a case-by-case basis, for special circumstances due to location and anticipated exposure, but only with approval of the Local Fire Authority as identified in #3 below.

3. Under certain conditions a commercial and industrial building may be exempted from these provisions by the Local Fire Authority having jurisdiction. Some, but not all of the conditions considered might be the location of the building, the amount of paving around the building, the buildings primary construction type, and/or location in relation to other development, or wildland area around the proposed building. In all cases the Fire Authority shall have the sole discretion and non-residential buildings shall not be plan checked or constructed without meeting the provisions of this chapter without the express approval of exemption by the Fire Authority having jurisdiction.

4. Plancheck certification required by this chapter shall be in the form of the Building Departments plan approval stamp. For buildings required to meet the provisions of this chapter, and not expressly exempted by the Local Fire Authority, the approval stamp shall certify, as defined herein, that the plans were checked for compliance with the provisions of Chapter 7A along with the other requirements of the code.

5. Field certification required by this chapter shall be in the form of the Building Departments issuance of a Certificate of Occupancy. For buildings required to meet the provisions of this chapter, and not expressly exempted by the Local Fire Authority, the Certificate of Occupancy shall certify, as defined herein, that the building, as constructed, is in compliance with the provisions of Chapter 7A along with the other requirements of the code. No Certificate of Occupancy shall be issued without first obtaining approval of the Fire Authority that the defensible space requirements have been met as required by the chapter, and to the Fire Authority's satisfaction.

6. The enforcement of the defensible space requirements of this chapter shall be the responsibility of the Local Fire Authority. Defensible space requirements are a provision of this chapter and as such it is the Building Departments responsibility to verify these requirements have been satisfied prior to the issuance of a Certificate of Occupancy. It shall also be the responsibility of the Building Department to inform customers, at the time of plancheck and permit issuance, of defensible space requirements and the potential of being unable to final or occupy the building if these requirements are not met. It shall also be the duty of the field inspector to follow-up with reminders while conducting routine field inspections.

7. The requirements of Chapter 7A, as it applies to ancillary buildings and structures, are at the discretion of the building department authority. For this purpose the following shall be required for detached ancillary buildings or structures. Attached ancillary buildings shall be considered additions for the purpose of imposing these requirements.

a. Buildings falling under the provisions of the CBC and local amendments for permit exempt structures shall not be required to meet the provisions of Chapter 7A.

b. Detached ancillary buildings that exceed 500 square feet, other than permitted qualified agricultural buildings, shall be made to meet the provisions of Chapter 7A, and the requirement for the first 30-foot of defensible space as prescribed in California Public Resources Code 4291, unless specifically exempted by the Local Fire Authority.

8. Plans submitted for a permit for an addition and/or remodel work on buildings not originally built or required to be built under the provision of Chapter 7A need not comply with the building material requirements or defensible space provisions. By contrast, plans submitted for a permit for an addition and/or remodel work on buildings that were originally required to be built under Chapter 7A provisions shall be subject to the material provisions of this chapter and the defensible space requirements.

9. Decks that require permits, regardless of whether the deck is associated with a building built under the provisions of this chapter or not, shall meet the construction requirements of Chapter 7A, and will be required to meet the defensible space provisions for the first 30 feet.

10. Re-roofs shall comply with the provisions of Placer County Code Chapter 15.

11. "Rebuilding" of existing buildings, especially residential structures, are of particular concern. In some cases a "remodel" reaches the point of replacing most, if not all, of the existing structure to the point where essentially a new building is the final product. Where these types of projects are submitted for a building permit and the proposed scope of work includes the replacement all of these components in their entirety: replacement of the roof covering, exterior siding, windows, and doors; for the purposes of applying the provisions of Chapter 7A, these types of projects will be required to meet the requirements of 7A as they apply to each of those components. Eave venting installed with the original construction that are not being altered can remain as originally installed.

Where the proposed scope of work includes replacement of the roof covering, exterior siding, and windows, but it is difficult to determine if the overall project can be justified as a "Rebuild" the following test will be used.

a. Determine the valuation of the building as it exists before proposed work, as you would for new. Calculate the valuation based on the current Building Department Valuation Table rates for living area, garage (if attached), porches, decks, etc.

b. Determine the valuation of the proposed work using the current Building Department Valuation Table and Supplemental Valuation Table. If the valuation calculated exceeds the valuation established in Step A above by more than 50% then the proposed project for the purposes of applying the requirements of Chapter 7A shall be considered a "new building"

12. Existing permitted buildings, where a building permit is required due to a proposed change of occupancy, will not be subject to 7A requirements. This includes permit exempt agricultural buildings (setback permit) when converted to another use or occupancy requiring a building permit.