This ordinance was amended on the floor at the November 3, 2025, City Council meeting; the amendments are annotated on page 4 of the ordinance and Section 14.04.305 of Exhibit 2.

Introduced by: _____

ORDINANCE NO._____

**AN ORDINANCE OF THE CITY OF PASADENA AMENDING TITLE 14 (BUILDING AND CONSTRUCTION) OF THE PASADENA MUNICIPAL CODE BY ADOPTING WITH CERTAIN LOCAL AMENDMENTS THE 2025 CALIFORNIA BUILDING STANDARDS CODE INCORPORATING THE 2025 CALIFORNIA ADMINISTRATIVE CODE; 2025 CALIFORNIA BUILDING CODE WITH APPENDIX CHAPTERS G, H, I, J, N, P, Q; CALIFORNIA RESIDENTIAL CODE WITH APPENDIX CHAPTERS BB, BF, BG, CH, CI, CJ; 2025 CALIFORNIA ELECTRICAL CODE WITH ANNEXES A, C, I; 2025 CALIFORNIA MECHANICAL CODE WITH APPENDIX CHAPTERS B, C, F, G, H; 2025 CALIFORNIA PLUMBING CODE WITH APPENDIX CHAPTERS A, D, G, H, I, J, M, R; 2025 CALIFORNIA ENERGY CODE; 2025 CALIFORNIA WILDLAND-URBAN INTERFACE CODE; 2025 CALIFORNIA HISTORICAL BUILDING CODE; 2025 CALIFORNIA FIRE CODE WITH LOCAL AMENDMENTS TO STATE ADOPTED CHAPTERS INCLUDING CHAPTER 1, 3, SECTION 503 OF CHAPTER 5, SECTIONS 1101 AND 1104 OF CHAPTER 11, APPENDIX CHAPTER 4 AND CERTAIN APPENDICES WITHIN APPENDIX CHAPTERS B THROUGH P; 2025 CALIFORNIA EXISTING BUILDING CODE; 2025 CALIFORNIA GREEN BUILDINGS STANDARDS CODE; 2025 CALIFORNIA REFERENCED STANDARDS CODE**

WHEREAS, the City of Pasadena is adopting the 2025 California Building Standards Code, and is making certain amendments thereto; and

WHEREAS, certain building standards and other related model codes are adopted by the State of California in the California Building Standards Code and become applicable in the City unless amended by the City pursuant to California Health and Safety Code Section 17958, et seq.; and

WHEREAS, California Health and Safety Code Section 17958.5 authorizes the City Council to make reasonably necessary changes or modifications to the State adopted building codes, including the California Building Standards Code, based on local conditions; and

WHEREAS, the City of Pasadena has determined and recommended that the modifications to the 2025 California Building Standards Code, contained herein, are reasonably necessary due to local conditions; and

WHEREAS, California Health and Safety Code permits the City to carry forward changes or modifications substantially equivalent to changes or modifications previously filed and in effect as of September 30, 2025, changes related to home hardening, and other qualifying local amendments; and

WHEREAS, California Health and Safety Code Section 17958.7 requires the City Council to make express findings of the necessity for modifications to the building standards contained in the 2025 California Building Standards Code; and

WHEREAS, in support of these modifications and changes, the City Council of the City of Pasadena hereby expressly finds that the amendments and modifications to building standards contained in the 2025 California Building Standards Code as adopted by the City are reasonably necessary due to the following local climatic, geological or topographical conditions.

Now, Therefore, the City Council of the City of Pasadena finds local justifications as follows:

**Justification: Climatic.** The presence of the San Gabriel Mountains along the foothills of the City allows winds patterns during certain climatic conditions and certain periods of the year. Further, intermittent Santa Ana wind conditions occur from September to March allowing conditions that create the potential for high velocity winds with high temperature. In addition, the region is within a climate system capable of producing major winds, fire and rain related disasters, including but limited to, those caused by the Santa Ana winds and El Nino (or La Nina) subtropical-like weather.

**Justification: Climatic.** The City of Pasadena is located within the San Gabriel Valley region of Southern California which has extreme arid conditions and periods of severe drought. These conditions can cause extremely dry brush and fauna in the Wildland Urban Interface of the San Gabriel Mountains which has been identified as Fire Hazard Severity Zones by the Office of the State Fire Marshal.

**Justification: Geological.** The Safety Element of the General Plan identifies earthquake fault risk in the City due to faults located within and nearby the City boundaries such as the Sierra Madre Fault, the Santa Monica-Hollywood-Raymond Fault and the San Andreas Fault. The close proximity of these and other faults are capable of producing earthquakes, foreshocks and aftershocks of significant magnitude and intensity that require a higher order to seismic resilience in building design and construction.

**Justification: Geological.** The County of Los Angeles region has a vast and complex network of earthquake faults. Some of these faults, like the previously unknown Northridge Fault are blind thrust faults that earth scientists believe are capable of intense ground shaking similar or greater in size than the January 17, 1994 Northridge Earthquake. The random possible location of these blind thrust faults increase the local seismic risk and poses an increasing threat to public safety.

**Justification: Geological.** Areas within the City of Pasadena may have liquefiable soils that have the potential of allowing greater damage to building structures in an earthquake. Liquefaction is a very destructive secondary effect of strong seismic shaking where a loss of bearing strength occurs along with ground oscillations in the supporting soils.

**Justification: Topographic.** Several existing buildings are located on parcels in the City of Pasadena on hilly terrain with slopes that create grading, drainage, foundation, infrastructure, utility and emergency access challenges.

**Justification: Climatic and Geological.** The greater Los Angeles region is a densely populated area having buildings and structures constructed over and near a vast array of fault systems capable of producing major earthquakes, including but not limited to the 1994 Northridge Earthquake. In addition, the region is within a climate system capable of producing major winds, fire and rain related disasters, including but not limited to those caused by the Santa Ana winds and El Nino (or La Nina) subtropical-like weather. This region is especially susceptible to more active termite and wood attacking insects and microorganisms. Prohibition of the use of wood, timber, and deep timber foundation systems, and wood in retaining and crib walls, as well as limiting prescriptive design provisions in an effort to mitigate potential problems or deficiencies due to the proliferation of wood destroying organisms and therefore needs to be incorporated into the code to assure that new buildings and structures and additions or alterations to existing buildings or structures are designed and constructed in accordance with the scope and objectives of the California Building Code and California Residential Code.

**Justification: Climatic and Geological (Intermodal Shipping Containers).** The greater Los Angeles region is a densely populated area having buildings and structures constructed over and near a vast array of fault systems capable of producing major earthquakes, including but not limited to the recent 1994 Northridge Earthquake. The region is further impacted by construction of buildings and structures utilizing tradition construction materials that impact the amount of energy, air quality, greenhouse gas emission and construction waste in the area. The proposed amendment addresses structural designs specific to intermodal shipping containers, reduce environmental impact of unused and unrecycled intermodal shipping containers, and increase sustainability by reducing consumption of traditional construction materials. The proposed modification needs to be incorporated into the code to assure that new buildings and additions to existing buildings utilizing intermodal shipping containers are designed and constructed in accordance with the scope and objectives of the California Building Code and California Green Building Standards Code.

**Justification: Topographic and Geological.** The greater Los Angeles region is a densely populated area having buildings and structures constructed over and near a vast

array of fault systems capable of producing major earthquakes, including but not limited to the recent 1994 Northridge Earthquake. Additionally, the topography within the Los Angeles region includes significant hillsides with narrow and winding access that makes timely response by fire suppression vehicles challenging and difficult. Proposed modifications based on Topographic and Geological conditions establishes design parameters to better mitigate and limit property damage that are the results of increased seismic forces which are imparted upon hillside buildings and structures and therefore need to be incorporated into the code to assure that new buildings and structures and additions or alterations to existing buildings or structures are designed and constructed in accordance with the scope and objectives of the California Building Code, California Residential Code, and California Fire Code.

The following table provides the specific justification for each code amendment listed by Municipal Code Section Number, 2025 California Code Section, Section Title, Local Justification by Climatic, Geologic, Topographical Conditions.

| No. | PMC Section Number | Administrative Section | Section Title | Justification |
|---|---|---|---|---|
| 1 | 14.03.010 | Pasadena Municipal Code | Title and Purpose | Administrative |
| 2 | 14.03.020 | Pasadena Municipal Code | Adoption and filing | Administrative |
| 3 | 14.03.030 | Pasadena Municipal Code | Duties and Powers of the Building Official | Administrative |
| 4 | 14.03.040 | Pasadena Municipal Code | Board of Appeals | Administrative |
| 5 | 14.03.050 | Pasadena Municipal Code | Violations | Administrative |
| 6 | 14.03.060 | Pasadena Municipal Code | Permits | Administrative |
| 7 | 14.03.070 | Pasadena Municipal Code | Permit Issuance | Administrative |
| 8 | 14.03.080 | Pasadena Municipal Code | Permit Expiration | ~~Administrative~~ Climatic |
| 9 | 14.03.090 | Pasadena Municipal Code | Submittal Documents | Administrative |
| 10 | 14.03.100 | Pasadena Municipal Code | Fees | Administrative |
| 11 | 14.03.110 | Pasadena Municipal Code | Inspections | Administrative |
| 12 | 14.03.120 | Pasadena Municipal Code | Posting of Construction Sign | Administrative |
| 13 | 14.03.140 | Pasadena Municipal Code | Site Maintenance | Administrative |

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|---|---|---|---|---|
| 14 | 14.03.150 | Pasadena Municipal Code | Certificate of Occupancy | Administrative |
| 15 | 14.03.160 | Pasadena Municipal Code | Connection to Service Utilities | Administrative |
| 16 | 14.03.170 | Pasadena Municipal Code | Stop Work Orders | Administrative |
| 17 | 14.03.180 | Pasadena Municipal Code | Unsafe Buildings, Structures, or Equipment | Administrative |
| **No.** | **PMC Section Number** | **2025 California Building Code Section** | **Section Title** | **Justification** |
| 18 | 14.04.010 | Pasadena Municipal Code | Adoption and filing | Administrative |
| 19 | 14.04.015 | 1.1.2 | Title | Administrative |
| 20 | 14.04.020 | 105.1.3 | Zoning Permits | Administrative |
| 21 | 14.04.025 | 903.2 | Where Required | Topographic, Climatic |
| 22 | 14.04.030 | 903.1.2 | Partial Automatic Fire Sprinklers Systems prohibited | Topographic, Climatic |
| 23 | 14.04.035 | 903.2.18 | Group U detached and attached private garages | Topographic, Climatic |
| 24 | 14.04.040 | 903.3.5 | Water Supplies | Topographic, Climatic |
| 25 | 14.04.045 | 903.3.5.2 | Residential Combination Services | Topographic, Climatic |
| 26 | 14.04.050 | 1505.1 | General | Climatic |
| 27 | 14.04.055 | 1505.6 | Fire Retardant-Treated Wood Shingles and Shakes | Climatic |
| 28 | 14.04.060 | 1507, 1507.1.3 | Roof Sheathing | Geologic |
| 29 | 14.04.065 | 1613.8, 1613.8.1 | Amendments to ASCE 7 | Geologic |
| 30 | 14.04.070 | 1613.8.2 | Wood Diaphragms | Geologic |
| 31 | 14.04.075 | 1613.8.3 | Structural Separation | Geologic |
| 32 | 14.04.080 | 1613.9 | Seismic design provisions for hillside buildings | Geologic, Topographic |
| 33 | 14.04.085 | 1613.10 | Suspended Ceilings | Geologic |
| 34 | 14.04.090 | 1704.6 | Structural Observations | Geologic |
| 35 | 14.04.095 | 1704.6.1 | Structural Observations for Structures | Geologic |
| 36 | 14.04.100 | 1705.3 | Concrete Construction | Geologic |
| 37 | 14.04.105 | 1807.1.4 | Permanent Wood Foundation Systems | Climatic, Geologic |

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| 38 | 14.04.110 | 1807.1.6 | Prescriptive Design of Concrete and Masonry Foundation Walls | Geologic |
| 39 | 14.04.115 | 1807.2 | Retaining Walls | Climatic, Geologic |
| 40 | 14.04.120 | 1807.3.1 | Limitations | Climatic, Geologic |
| 41 | 14.04.125 | 1809.3 | Stepped Footings | Geologic |
| 42 | 14.04.130 | 1809.7, Table 1809.7 | Prescriptive Footings for Light-Frame Construction | Geologic |
| 43 | 14.04.135 | 1809.12 | Timber Footings | Climatic, Geologic |
| 44 | 14.04.140 | 1810.3.2.4 | Timber | Climatic, Geologic |
| 45 | 14.04.145 | 1905.6.2 | Seismic Design Categories C, D, E, and F | Geologic |
| 46 | 14.04.150 | 1905.8-1905.10 | ACI 318, Sections 18.7.5, 18.10.4, and 18.12.6 | Geologic |
| 47 | 14.04.155 | 2304.10.2, Table 1304.10.2 | Fastener Requirements | Geologic |
| 48 | 14.04.160 | 2304.10.3.1 | Quality of Nails | Geologic |
| 49 | 14.04.165 | 2304.12.2.8 | Wood Used in Retaining Walls and Cribs | Geologic |
| 50 | 14.04.170 | 2305.4 | Hold-down Connectors | Geologic |
| 51 | 14.04.175 | 2306.2 | Wood-frame diaphragms | Geologic |
| 52 | 14.04.180 | 2306.3 | Wood-Frame Shear Walls | Geologic |
| 53 | 14.04.185 | 2307.2 | Wood-Frame Shaer Walls | Geologic |
| 54 | 14.04.190 | Table 2308.10.1 | Wall Bracing Requirements | Geologic |
| 55 | 14.04.195 | 2308.10.5.1, 2308.10.5.2 | Alternate Braced Wall (ABW) | Geologic |
| 56 | 14.04.200 | 2308.10.8.1 | Foundation Requirements | Geologic |
| 57 | 14.04.205 | 2308.10.9 | Attachment of Sheathing | Geologic |
| 58 | 14.04.210 | 3103.1.3 | Permit Required | Geologic |
| 59 | 14.04.215 | 3109.1.1 | Fencing Requirements | Topographic, Geologic |
| 60 | 14.04.220 | 3114.1 | Intermodal Shipping Container | Climatic, Geologic |
| 61 | 14.04.225 | J103.2 | Excavations | Topographic, Geologic |
| **No.** | **PMC Section Number** | **2025 California Residential Code Section** | **Section Title** | **Justification** |
| 62 | 14.04.300 | R101.1 | Title | Administrative |
| 63 | 14.04.305 | R105.1.1 | Zoning Permits | Administrative |
| 64 | 14.04.310 | R301.1.3.2 | Woodframe Structures | Geologic |

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| 65 | 14.04.315 | R301.1.5 | Seismic Design Provisions on Slopes | Geologic, Topographic |
| 66 | 14.04.320 | R301.2.2.6 | Shear Wall Offsets | Geologic |
| 67 | 14.04.325 | R301.2.2.11 | Anchorage of Components and Equipment | Geologic |
| 68 | 14.04.330 | R309.1. | Townhouse Fire Sprinklers | Topographic, Climatic |
| 69 | 14.04.335 | R309.2 | Single Family Fire Sprinklers | Topographic, Climatic |
| 70 | 14.04.340 | R309.3.1 | General Fire Sprinklers | Topographic, Climatic |
| 71 | 14.04.345 | R309.3.5 | Water Supplies | Topographic, Climatic |
| 72 | 14.04.350 | R401.1 | Application | Climatic, Geologic |
| 73 | 14.04.355 | R403.1.3.6, R403.1.5 | Isolated Concrete Footings, Slopes | Geologic |
| 74 | 14.04.360 | R404.2 | Wood Foundation Walls | Climatic, Geologic |
| 75 | 14.04.365 | R501.2 | Requirements | Geologic |
| 76 | 14.04.370 | R602.3(1) | Fastening Schedule | Geologic |
| 77 | 14.04.375 | R602.3(2) | Staples | Geologic |
| 78 | 14.04.380 | R602.3.2, Table 602.3.2 | Double Top Plate | Geologic |
| 79 | 14.04.385 | R602.10.2.3 | Minimum number of braced wall panels | Geologic |
| 80 | 14.04.390 | Table R602.10.3(3) | Bracing Requirements | Geologic |
| 81 | 14.04.395 | Table R602.10.4 | Bracing Methods | Geologic |
| 82 | 14.04.400 | Table R602.10.5 | Minimum Length of Braced Wall Panels | Geologic |
| 83 | 14.04.405 | Figure R602.10.6.1 | Panel Length | Geologic |
| 84 | 14.04.410 | Figure R602.10.6.2 | Portal Frame with Hold-Downs | Geologic |
| 85 | 14.04.415 | Figure R602.10.6.4 | Continuously Sheathed Portal Frame | Geologic |
| 86 | 14.04.420 | R606.12.2.2.3 | Reinforcement requirements for Masonry Requirements | Geologic |
| 87 | 14.04.425 | R803.2.4 | Openings in Horizontal Diaphragms | Geologic |
| 88 | 14.04.430 | R902.1.1.1 | Roofing Materials | Climatic |
| 89 | 14.04.435 | R1001.3.1 | Vertical Reinforcing | Geologic |
| 90 | 14.04.440 | AX100.1 | Swimming Pool Safety Act | Topographic, Geologic |
| **No.** | **PMC Section Number** | **2025 California Fire Code Section** | **Section Title** | **Justification** |

| | | | | |
|---|---|---|---|---|
| 91 | 14.28.010 | Pasadena Municipal Code | California Fire Code Adoption | Topographic, Climatic, Administrative |
| 92 | 14.28.020 | 101.1 | Title | Administrative |
| 93 | 14.28.030 | 105.6.4 | Cryogenic Fluids | Topographic, Climatic, Administrative |
| 94 | 14.28.040 | 113.4 | Violation Penalties | Administrative |
| 95 | 14.28.050 | 307.4.3 | Portable Outdoor Fireplaces | Topographic, Climatic |
| 96 | 14.28.060 | 508.1 | General | Topographic, Climatic |
| 97 | 14.28.070 | 903.1.2 | Existing Occupancies | Topographic, Climatic |
| 98 | 14.28.080 | 903.1.3 | Partial Automatic Fire Sprinklers Systems prohibited | Topographic, Climatic |
| 99 | 14.28.090 | 903.2 | Where Required | Topographic, Climatic |
| 100 | 14.28.100 | 903.2.18 | Group U detached and attached private garages | Topographic, Climatic |
| 101 | 14.28.110 | 903.3.5 | Water Supplies | Topographic, Climatic |
| 102 | 14.28.120 | 903.3.5.2 | Residential Combination Services | Topographic, Climatic |
| 103 | 14.28.200 | 5001.6.1 | Temporary Out of Service Facilities | Topographic, Climatic |
| 104 | 14.28.210 | 5003.2.9.3 | Minimum Testing | Topographic, Climatic |
| 105 | 14.28.220 | 5704.2.7.4 | Emergency Venting | Topographic, Climatic |
| 106 | 14.28.230 | 5704.2.7.5.8 | Overfill Prevention | Topographic, Climatic |
| 107 | 14.28.240 | 5704.2.8.14 | Emergency Vents | Topographic, Climatic |
| 108 | 14.28.250 | 5704.2.9.6.1 | Locations were above-ground tanks are prohibited | Topographic, Climatic |
| 109 | 14.28.260 | 5706.2.4.4 | Locations were above-ground tanks are prohibited | Topographic, Climatic |
| 110 | 14.28.270 | 5806.2 | Limitations | Topographic, Climatic |

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| 111 | 14.28.280 | 6101.3 | Construction Documents | Topographic, Climatic, Administrative |
| 112 | 14.28.290 | 6101.4 | Minimum Testing | Topographic, Climatic |
| 113 | 14.28.300 | Table B105.1(1) | Required Fire Flow for Single Family | Topographic, Climatic |
| 114 | 14.28.310 | Table B105.2 | Required Fire Flow other than Single Family | Topographic, Climatic |
| 115 | 14.28.400 | D103.6 | Signs | Topographic, Climatic |
| 116 | 14.28.500 | Pasadena Municipal Code | Fire Hazard Severity Zone Map | Topographic, Climatic |

For Administrative sections specified above, no express findings are required under the requirements established by sections 17958, 17958.5, and 17958.7 of the California Health and Safety Code as these amendments address matters outside the scope of the California Building Standards Code, or provide clarification of existing requirements consistent with such the California Building Standards Code.

Accordingly, the People of the City of Pasadena ordain as follows:

**SECTION 1.** This Ordinance, due to its length and corresponding publication cost, will be published by title and summary as permitted by Section 508 of the Charter of the City of Pasadena. The approved summary of this ordinance is as follows:

"**SUMMARY**

This ordinance adopts the 2025 California Building Code with Appendix Chapters G, H, I, J, N, P, Q, 2025 California Administrative Code, 2025 California Residential Code with Appendix Chapters BB, BF, BG, CH, CI, CJ, 2025 California Electrical Code with Annexes A, C, I, 2025 California Mechanical Code with Appendix Chapters B, C, F, G, H, 2025 California Plumbing Code with Appendix Chapters A, D, G, H, I, J, M, R, 2025 California Energy Code, 2025 California Wildland-Urban Interface Code, 2025 California Historical Building Code, 2025 California Fire Code with Appendix Chapter 4 and certain chapters within Appendix Chapters B, C, D, E, F, G, H, I, K, M, N, O, and P, 2025 California Existing Building Code, 2025 California Green Buildings Standards Code, and 2025 California Referenced Standards Code as required by state law. The ordinance also provides for amendments to these codes to accommodate special topographic, geological, and climactic conditions found in Pasadena consistent with

state law. This ordinance shall take effect 30 days from publication by title and summary. The full text of the ordinance is on file with the City Clerk's Office."

**SECTION 2**. The recitals in the ordinance codified herein are true and correct and incorporated herein by reference as findings of fact.

**SECTION 3.** This ordinance adopts the 2025 California Building Code with Appendix Chapters G, H, I, J, N, P, and Q, 2025 California Administrative Code, 2025 California Residential Code with Appendix Chapters BB, BF, BG, CH, CI, and CJ, 2025 California Electrical Code with Annexes A, C, and I, 2025 California Mechanical Code with Appendix Chapters A, C, F, G, and H, 2025 California Plumbing Code with Appendix Chapters A, D, G, H, I, and J, 2025 California Energy Code, 2025 California Wildland-Urban Interface Code, 2025 California Historical Building Code, 2025 California Fire Code with Chapter 1, 3, Section 503 of Chapter 5, Sections 1101 and 1104 of Chapter 11, Appendix Chapter 4 and Chapters B, C, D, E, F, G, H, I, K, M, N, O, and P, 2025 California Existing Building Code, 2025 California Green Buildings Standards Code, and 2025 California Referenced Standards Code ("California Building Standards Code") with certain local amendments adopted herein.

**SECTION 4.** Pasadena Municipal Code, Title 14, Chapter 14.03 (Administrative Code) is repealed in its entirety and is replaced as shown in Exhibit 1, attached hereto and incorporated by reference.

**SECTION 5.** Pasadena Municipal Code, Title 14, Chapter 14.04 (Building Code and Related Codes) is repealed in its entirety and is replaced as shown in Exhibit 2, attached hereto and incorporated by reference.

**SECTION 6.** Pasadena Municipal Code, Title 14, Chapter 14.28 (Fire Prevention Code) is repealed in its entirety and is replaced as shown in Exhibit 3, attached hereto and incorporated by reference.

**SECTION 7.** Nothing herein shall be interpreted to supersede the allowances of the Governor of the State of California's Executive Order ("E.O.") N-29-25 for projects to repair, restore, demolish, or replace residential structures or facilities substantially damaged or destroyed as a result of the Eaton Fire emergency. Local amendments adopted as part of the 2022 Building Standards Code shall remain applicable to qualifying projects under E.O. N-29-25.

**SECTION 9**. This ordinance shall take effect 30 days after publication.

Signed and approved this _____ day of November, 2025.

_____
Victor Gordo
Mayor of the City of Pasadena

I HEREBY CERTIFY that the foregoing ordinance was adopted by the City Council of the City of Pasadena at its meeting held this _____day of_____2025, by the following vote:

AYES:

NOES:

ABSENT:

ABSTAIN:

Date Published:

_____
MARK JOMSKY
City Clerk

Approved as to form:

_____
CAROLINE K. MONROY
Assistant City Attorney

**EXHIBIT 1**

~~**Chapter 14.03 ADMINISTRATIVE CODE**~~

~~**14.03.010 Adoption and filing.**~~
~~Except as herein provided by specific changes, the administrative, organizational and enforcement for the technical codes which regulate the site preparation, construction, alteration, moving, demolition, repair, use and occupancy of buildings, structures and building service equipment within the city shall be in accordance with the provisions and in the manner prescribed in the administrative provisions of each part of the 2022 California Building Standards Code.~~

~~**14.03.020 Section 101.1 of Chapter 1 Division II of the 2022 California Building Code and Section R101.1 of the California Residential Code.**~~
~~This ordinance shall be known and cited as the City of Pasadena Building Code for Building Construction Regulation, and will be referred to herein as this code.~~

~~**14.03.030 Chapter 1 Division II Section 103.1 of the 2022 Edition of the California**~~ ~~Building Code and Chapter 1 Division II Section R103.1 of the 2022 Edition of the California Residential Code, creation of enforcement agency, are amended as follows.~~ ~~There has been established heretofore in this jurisdiction a code enforcement agency entitled, the Planning and Community Development~~

**CHAPTER 14.03 – ADMINISTRATIVE CODE**

**14.03.010 Title and Purpose.**

This chapter shall be known as the “Building Standards Administrative Code” and may be cited as such. This chapter provides the minimum standards consistent with state law including the Parts of the California Building Standards Code and shall not be interpreted to reduce any standards in any Part of the California Building Standards Code. Section 101.1 of Chapter 1 Division II of the 2025 California Building Code and Section R101.1 of the California Residential Code are hereby amended as this ordinance may also be known and cited as the City of Pasadena Building Code for Building Construction Regulation, and will be referred to herein as this code.

**14.03.020 - Adoption and filing.**

Except as herein provided by specific changes, the administrative, organizational and enforcement for the technical codes which regulate the site preparation, construction, alteration, moving, demolition, repair, use and occupancy of buildings, structures and building service equipment within the city shall be in accordance with the provisions and in the manner prescribed in the administrative provisions of each Part of the 2025 California Building Standards Code.

**EXHIBIT 1**

## 14.03.030 Duties and Powers of the Building Official.

A. Authority:
   1. Creation of Enforcement Agency: There is hereby established in this jurisdiction a code compliance agency which shall be under the administrative and operational control of the building official. Chapter 1 Division II Section 103.1 of the 2025 Edition of the California Building Code and Chapter 1 Division II Section R103.1 of the 2025 Edition of the California Residential Code, creation of enforcement agency are amended as there has been established in this jurisdiction the code enforcement agency entitled, the Planning and Community Development Department which employs a Building Official who shall be authorized to enforce the provisions of this code.
   2. Building Official: Whenever the term or title "administrative authority," "responsible official," "building official," "chief inspector," “authority having jurisdiction” or other similar designation is used herein or in any of the technical codes, it shall be construed to mean the building official designated by the appointing authority of this jurisdiction.
   3. Fire Official: Whenever the term or title "building official" or other similar designation is used herein, it shall be construed to mean the fire official when enforcing the California Fire Code and California Wildland-Urban Interface Code.

B. General: The building official is hereby authorized and directed to enforce all of the provisions of this code and to make all inspections pursuant to such enforcement. For such purposes, the building official shall have the powers of a law enforcement officer. The building official shall have the power to render interpretations of this code and to adopt and enforce rules and supplemental regulations, policies, and procedures in order to clarify the application of its provisions. Such interpretations, rules, and supplemental regulations, policies, and procedures shall be in conformance with the intent and purpose of this code. Such policies and procedures shall not have the effect of waiving requirements specifically provided for in this code. The building official is authorized to make and enforce such guidelines and policies for the safeguarding of life, limb, health or property as may be necessary from time to time to carry out the purpose of this code. The building official is authorized to classify every building, or portion thereof, into one of the occupancies set forth in this code according to its use or the character of its occupancy. The building official is also authorized to classify every building into one of the types of construction as set forth in this code.

C. Deputies: The building official may appoint such number of technical officers, inspectors, plans examiners, assistants, and other employees as shall be authorized from time to time. Such employees shall have powers as delegated by the building official. The building official may deputize such employees as may be necessary to carry out the functions of the building department.

D. Applications and Permits: The building official shall receive applications, review construction documents and issue permits for the erection, construction, alteration, relocation, enlargement, replacement, repair, equipment, use and

occupancy, location, maintenance, grading, removal and demolition of every building or structure, inspect the premises for which such permits have been issued and enforce compliance with the provisions of this code.

E. Notices And Orders: The building official shall have the power to issue all necessary notices or orders to ensure compliance with this code.

F. Inspections: The building official shall have the power to make all of the required inspections, or the building official shall have the authority to accept reports of inspection by approved agencies or individuals. Reports of such inspections shall be in writing and be certified by a responsible officer of such approved agency or by the responsible individual. The building official is authorized to engage such expert opinion as deemed necessary to report upon unusual technical issues that arise, subject to the approval of the appointing authority. The enforcement officer shall use their discretion to determine the scope of examination conducted under this Title.

G. Identification: The building official and deputies shall carry proper identification when inspecting structures or premises in the performance of duties under this code.

H. Records: The building official shall keep official records of applications received, permits and certificates issued, fees collected, reports of inspections, and notices and orders issued. Such records shall be retained in the official records in accordance with state laws and the city's retention policy.

I. Modifications: Where there are practical difficulties involved in carrying out the provisions of this code, the building official shall have the authority to grant modifications for individual cases provided that the building official shall first find that a special individual reason makes the strict letter of this code impractical, the modification is in compliance with the intent and purpose of this code and that such modification does not lessen health, accessibility, life and fire safety or structural requirements. The details of any action granting modifications shall be recorded and entered in the files. The request for modification shall be submitted using the department's official request form accompanied by a review fee as established by city council resolution.

J. Alternative Materials, Equipment, Design and Methods of Construction: The provisions of this code are not intended to prevent the installation of any material, appliance or device, or method of construction not specifically prescribed by this code, provided that any such alternative has been approved. The building official shall have the authority to approve, upon application of the owner or the owner's authorized agent and payment of a fee, any such alternative, where the building official finds that the proposed design is satisfactory and complies with the intent of the provisions of this code, and that the material, method or work offered is, for the purpose intended, not less than the equivalent of that prescribed in this code in quality, strength, effectiveness, fire resistance, durability, and safety. The building official shall have the authority to require that sufficient evidence or proof be submitted to substantiate any claims that may be made regarding its use. Supporting data, where necessary to assist in the approval of materials or assemblies not specifically provided for in this code, shall consist of valid research reports from approved sources. The request for use of alternate

materials, methods and design shall be submitted using the department's official request form and accompanied by a review fee as established by city council resolution.

K. Tests: Whenever there is insufficient evidence of compliance with the provisions of this code or evidence that any material, any installation or any construction does not conform to the requirements of this code, or in order to substantiate claims for alternate materials or methods of construction, the building official may require tests as proof of compliance to be made at the expense of the owner or the owner's agent by an approved agency, licensed and certified firm as determined by the building official. The building official may also require tests and reports when cause exists to conclude that an installation, or electrical, gas or plumbing system, or a portion thereof, may be defective or not working property, which tests and reports shall be at the expense of the owner or the owner's agent. As used herein, "system" means and includes, without limitation, all equipment, devices, fixtures and installations. Failure of an owner to undertake a required test and to provide a report that is satisfactory to the building official constitutes a violation of this code. Test methods shall be as specified by this code for the material or installation in question. If there are no appropriate test methods specified in this code, the building official shall determine acceptance of a proposed test procedure. Reports of such tests shall be retained by the building official in accordance with the city's guidelines for the retention of public records. The results of the tests shall be submitted to the city accompanied by a review fee as established by city council resolution.

L. Emergency Powers:

1. Where the building official determines that an imminent life safety hazard exists in a building or with regard to a structure or premises, that requires immediate containment, correction or elimination, or other actions to protect public health and welfare, the building official or his/her designee may exercise any or all of the following powers in accordance with the Pasadena Municipal Code.
    a. Order the immediate vacation of all persons and prohibit the occupancy, reentry, or use of the premises until the hazard has been fully abated and all repairs and other corrective actions have been completed with all required permits and inspection approvals.
    b. Post the premises as unsafe, substandard or dangerous, and regulate or condition entries thereon by all persons until an order to vacate and/or an order to not enter is rescinded in writing.
    c. Board, fence or secure the building, or structure, or the premises.
    d. Raze and grade any portion of the building, structure, or site that involves the imminent life safety hazard to prevent further collapse in order to protect public health, safety and welfare.
    e. Make emergency repairs or undertake other actions as necessary to eliminate, correct, or contain any imminent life safety hazard.
    f. Cause any domestic water, fire water, storm water drainage, waste disposal drainage, electrical, gas, mechanical, plumbing, or other system connections or installations that are, or could possibly be,

affected by the hazard, or that could contribute to the hazard, to be disconnected or otherwise rendered inoperative.

g. Take any other action as appropriate under the circumstances.

2. The building official or his designee shall comply with the following provisions when exercising emergency powers:
   a. In determining the existence of an imminent life safety hazard, the building official or his/her designee shall conduct a personal inspection of the hazard and issue a brief written report identifying the nature, scope and condition of the hazard.
   b. The building official or his/her designee shall give notice, setting forth the imminent life safety hazard found, to the owner, occupant, other responsible person or authorized representative of the building, structure or site upon which the hazardous condition exists. If the building official or his designee determines that, under the circumstances, notice cannot first be given or it is impractical to do so because of the nature of the hazard, emergency powers may be exercised without prior notice.
   c. The nature and scope of emergency powers are to be exercised to contain, eliminate, or correct the imminent life safety hazard level, and to protect public health, safety and welfare be determined by the building official or his designee.
3. The building official or his designee may, notwithstanding the exercise of any emergency powers, alternatively or concurrently exercise any remedy to address violations of this title.
4. The building official shall have the authority under emergency declarations to extend or expire applications for permits, issued permits, temporary certificate of occupancies periods during the emergency and for a limited term beyond the lifting of the emergency declaration periods with cause demonstrated and which shall not exceed 24-months after lifting of emergency declarations.

M. Appeal From The Exercise Of Emergency Powers: An owner or occupant of premises may appeal the code official's exercise of emergency powers in accordance with the procedures set forth in the Pasadena Municipal Code for building or structures governed thereby, or in accordance with the procedures set forth in this Code or laws for buildings, structures or premises governed thereby. A timely appeal shall not stay the effectiveness of an issued order to vacate and/or an order to not enter.

**14.03.040 - Board of Appeals.**

In order to hear and decide appeals of orders, decisions and determinations of the building official, there shall be and there is hereby created a Board of Appeals, composed of the Mayor and the City Council.

The city clerk shall be the secretary to the Board. The Board may adopt reasonable rules and regulations for conducting its investigations and shall render all its decisions

and findings on contested matters, in writing to the building official, with a duplicate copy thereof to any appellant or contestant affected by any such decision of findings.

The City Council may prescribe by resolution, to employ at the cost and expense of the City, such qualified individuals as the Board, in its discretion, may deem reasonably necessary in order to assist it in its investigation and in making its findings and decisions.

**14.03.050 - Violations.**

All sections in the codes referenced in Section 14.04.010 herein pertaining to unlawful acts and violations penalties are amended in their entirety to read as follows.

It shall be unlawful for any person, firm or corporation to erect, construct, enlarge, alter, repair, move, improve, remove, convert, or demolish, equip, use, occupy, or maintain, any building or structure in the City, or cause same to be done, contrary to or in violation of any of the provisions of this chapter. Any person, firm, or corporation violating any of the provisions of this Ordinance, shall be deemed guilty of a misdemeanor, and each such person shall be deemed guilty of a separate offense for each and every day or portion thereof during which any violation of any of the provisions of this Ordinance is committed, continued, or permitted, and upon conviction of any such violation such persons shall be punished by a fine of not more than one thousand dollars ($1,000) or by imprisonment for not more than six (6) months, or by both such fine and imprisonment.

In addition to the above penalty provisions, violation of any of the provisions of this chapter may be subject to the administrative proceedings set forth in Title 1 of this code.

It shall be unlawful and a violation of this article for any person to fail to comply with an order to vacate and/or an order to not enter.

**14.03.060 Permits.**

A. Required: Except as specified in this code, no building, structure or building service equipment regulated by this code shall be erected, constructed, enlarged, altered, repaired, moved, installed, improved, removed, converted or demolished unless a separate, appropriate application has been made and permit for each building, structure or building service equipment has first been obtained from the building official. No grading shall occur without the prior procurement of a grading permit or as authorized by the building official. Unless otherwise exempted, separate plumbing, electrical, and mechanical permits will be required for actions and installations that are regulated by this code.
B. Work Exempt From Permit: A permit shall not be required for the types of work in each of the separate classes of permit as listed below. Exemption from the permit requirements of this code shall not be deemed to grant authorization for any work to be done in violation of the provisions of the building standards codes, zoning code, or any other laws or ordinances of this jurisdiction.

**EXHIBIT 1**

1. Building Permits: A building permit shall not be required for the following in addition to the requirements of the California Building Code section 105.2 and California Residential Code section R105.2:
    a. One story detached accessory buildings or structures used as tool or storage sheds, playhouses or similar uses, provided the aggregate total projected roof area for all such buildings or structures does not exceed one hundred twenty (120) square feet and the maximum roof projection does not exceed twenty-four inches (24"). Any electrical, mechanical, plumbing, solar, energy storage, or other work associated with a detached accessory building or structure is not exempt from permit requirements.
    b. Construction of block walls over 48” in exposed height require a building permit from Permit Center, prior to commencing construction. Otherwise, a zoning permit may be required.
    c. Platforms, walks and driveways not more than thirty inches (30") above adjacent grade and not over any basement or story below, or part of an accessible route, or within any front setback or on top of slopes.
    d. Movable cases, counters and partitions not over five feet nine inches (5'9") in height.
2. Electrical Permits: An electrical permit shall not be required for exempted activities in accordance with California Electrical Code Article 89.
3. Mechanical Permits: A mechanical permit shall not be required for the following in addition to the requirements of the California Mechanical Code section 104.2:
    a. A portable heating appliance.
    b. Portable ventilating equipment.
    c. A portable cooling unit.
    d. A portable evaporative cooler.
    e.
4. Plumbing Permits: A plumbing permit shall not be required for the following in addition to the requirements of the California Plumbing Code section 104.2:
    a. The stopping of leaks in drains, soil, waste or vent pipe. If any concealed trap, drainpipe, soil, waste or vent pipe become defective and it becomes necessary to remove and replace the same with new material, the same shall be considered as new work and a permit shall be procured and inspection made as provided in this code.
    b. The clearing of stoppages or the repairing of leaks in pipes, valves or fixtures, nor for the removal and reinstallation of water closets, provided such repairs do not involve or require the replacement or rearrangement of valves, pipes or fixtures.
5. Grading Permits: A grading permit shall not be required for grading work fifty (50) cubic yards or less unless required by Chapter 14.05 or by Section J103.2.

C. Emergency Repairs: Where equipment replacement and repairs must be performed in an emergency, a complete permit application shall be submitted within the next working business day to the building official.

D. Public Service Agencies: A permit shall not be required for the installation, alteration, or repair of generation, transmission, distribution or metering or other related equipment that is under the ownership and control of public service agencies by established right.

E. Demolition of Buildings and Structures: It shall be unlawful for any person to demolish any building or structure, or portion thereof, within the city without first obtaining a demolition permit from the building official. The amount of the fee for the permit shall be established by city council resolution. The permittee shall comply with the following requirements before a permit to perform demolition may be issued under this section:

1. A construction fence shall be installed to screen the site from view on public property, if required by the building official. The composition, location and effectiveness of the proposed fence for screening purposes shall meet the approval of building official, which shall be confirmed in writing.
2. Water service shall be maintained on the site for the duration of the demolition project and for any subsequent development or improvements on the subject property.
3. All utility companies shall be notified in writing by the owner of the property of the intention to demolish the building or structure.
4. A permit shall be obtained to remove and fill any basement, sump, or other depression in the surface of the lot or parcel of land.
5. A permit shall be obtained to cap the sewer and any drains connecting to the building or structure. The sewer and drains shall be capped at the property line unless otherwise approved by the building official in writing. The sewer caps shall be inspected and approved by the building official.
6. The building shall be inspected by qualified individuals for the presence of asbestos or hazardous materials. If the building is found to contain asbestos or hazardous materials. the building owner or his representative shall submit a letter to the building official so stating. If the building is found to contain asbestos or hazardous materials. then abatement shall be enacted by the applicant with all necessary documentation as required by rule 1403 of the South Coast air quality management district. Demolition permits shall not be issued prior to submittal of an asbestos and hazardous materials abatement completion certificate by qualified contractors.

F. Completion of Demolition: The demolition activities authorized by a demolition permit issued for a project required by this section shall be commenced within one (1) year of permit issuance, and thereafter shall be diligently pursued to completion, otherwise the demolition permit shall be null and void, and of no further effect whatsoever.

G. Temporary Structures And Uses: Temporary structures such as reviewing stands, bleachers, media platforms and towers, and other miscellaneous structures, tents, stages, sheds, canopies, or fences used for the protection of the public around and in conjunction with construction work may be erected by

special permit from the building official for a limited period of time. Buildings or structures erected under a special permit need not comply with the type of construction or fire resistive time periods as required by the building code. Temporary buildings or structures shall be completely removed upon the expiration of the time limit stated in the permit. It is unlawful to maintain a temporary structure without a special permit or after a special permit has expired. Temporary structures shall meet the requirements of Section 3103 of the California Building Code.

H. Application for Permit: To obtain a permit, the applicant shall first file an application on a form furnished by the city for that purpose. Every such application shall:
   1. Identify and describe the work to be covered by the permit for which application is made.
   2. Describe the land on which the proposed work is to be done by legal description, street address or similar description that will identify and locate the proposed building or work.
   3. Indicate the use or occupancy for which the proposed work is intended.
   4. Be accompanied by plans, diagrams, computations, and specifications, and other data as required by "Submittal Documents" of this chapter.
   5. State the valuation of all proposed work.
   6. Be signed by the applicant, or the applicant's authorized agent who may be required to submit evidence to indicate such authority.
   7. Give such other data and information, as well as reports, as may be required by the building official.

I. Expiration of Permit Application: An application for a permit for any proposed work for which no permit is issued within one (1) year following the date of application shall expire, and construction documents, plans and other data submitted for review may thereafter be returned to the applicant or destroyed by the building official per City Policy. Any expired application shall require a new application and applicable fees as determined by the building official shall be paid.

J. Permit Extension: A written request for permit extension shall be made by the permittee no later than thirty (30) days after the date of permit expiration. The building official may approve a permit extension for a period of time not exceeding one hundred eighty (180) days from the date of expiration. A permit shall not be extended more than once. A permit extension fee must be paid and an extension granted by the building official prior to the recommencing of work. If the permittee has made changes to the scope of work as shown on the approved plans and issued permit, or the building standards in effect on the date of the issuance of the original permit are no longer in effect, the building official may require the applicant to submit new plans or other forms of documentation to demonstrate compliance with some or all of the building standards requirements in effect at the time the permit extension request was received. In addition to a permit extension fee, the applicant may also be required to pay additional plan review fees to verify such compliance and inspection fees to verify the condition of the existing project, in the amount as determined by the Building Official.

K. Suspension or Revocation: The building official may, in writing, suspend or revoke a permit when the permit was issued in error or on the basis of incorrect, inaccurate, or incomplete information or it was issued in violation of any provision of the Pasadena Municipal Code.

**14.03.070 Permit Issuance.**

A. Issuance: The application, plans, specifications, computations and other information filed by an applicant for a permit shall be reviewed by the building official and city departments to verify compliance with any applicable laws under their purview. If the building official finds that the work described in an application for a permit, and the plans, specifications and other data filed therewith, conform to the requirements of this code, the technical codes and other pertinent laws and ordinances, and that the fees specified by resolution of the city council have been paid, the building official shall issue a permit therefor to the applicant.

B. Stamp: When a permit is issued when plans are required, the Building Official shall endorse in writing or stamp the plans and specifications “REVIEWED FOR CODE COMPLIANCE”. Such approved plans and specifications shall not be changed, modified or altered without authorization from the building official, and all work regulated by this code shall be done in accordance with the plans marked “REVIEWED FOR CODE COMPLIANCE”.

C. Phased Approval: The building official may issue a permit for the construction of part of a building, structure or building service equipment before the entire plans and specifications for the whole building, structure or building service equipment have been submitted or approved, provided adequate information and detailed statements have been filed complying with all pertinent requirements of the technical codes and other appropriate city conditions and/or requirements. The holder of such permit shall proceed without assurance that the permit for the entire building, structure or building service will be granted.

D. Amendments to Plans: In addition to submitting revised plans and drawings of any proposed changes to plans already checked or approved, the applicant shall submit a change list setting forth all of those changes, beyond those necessary to address the department's correction notices, for which approval is requested. Even if proposed changes are shown on the revised plans and drawings that have been approved, no change shall in itself be considered approved unless it appears on the approved change list. The change list may be included on the face of the revised plans and drawings.

E. Retention Of Plans: One set of approved plans, specifications and computations shall be submitted by the applicant, and retained by the city, in a digital format deemed acceptable by the building official and as outlined in the city's retention schedule; and one set of approved plans and specifications shall be returned to the applicant, and shall be kept on the site of the building or work at all times during which the work authorized thereby is in progress.

**EXHIBIT 1**

## 14.03.080 - Permit Expiration.

Beginning January 1, 2017, every permit applied and issued by the Building Official under the provisions of this Code shall expire by limitation and become null and void if all work by said permit is not completed within the time limits specified below from the date of issuance of the building permit:

| Construction Type | Project Completion Time |
|---|---|
| Single-Family or Duplex | 24 Months |
| Multi-Family (3+ units) | 36 Months |
| Non-residential | 36 months |

a. Before such work can be recommenced, a permit extension, as specified in Subsection A, shall be first obtained. No permit shall be extended more than twice.
b. Time limits will not be increased by issuance of subsequent building permits for the same project.
c. When a project is divided into separate permits by the applicant, the work on such permits is to be done concurrently, the time allowed to complete all work on each separate permit shall be established from the initial permit issuance date.

A. Extensions and Fees.
   a. Any permittee holding an active permit may apply in writing for an extension of the time within which work under that permit may be continued when, for good and satisfactory reasons, he or she is unable to continue work within the time required by this section due to circumstances beyond the control of the permittee. The written request must demonstrate that:
      i. Due to circumstances beyond the owner's or permittee's control, construction could not be commenced, continued or completed in the authorized time period;
      ii. If the construction has started, substantial progress has been made;
      iii. The condition of the property presents no health or safety hazard; and,
      iv. The continued delay will not create any unreasonable aesthetic impact to the neighborhood or substantial economic detriment to the neighboring property owners.
   b. The Building Official may extend the time for action by the permittee for a period not exceeding six calendar months. Payment of the building permit extension fee shall be required. The extension fee shall be calculated as the greater of two percent (2%) of the estimated total project valuation or one-thousand dollars.
   c. Building permits shall not be extended more than twice, and each extension shall not exceed six months.
   d. When a permit expires, the permit holder must first pay permit extension fees as described (b) above and reactivation fees in order to continue to complete the

project. This extension may not exceed six months to complete the project and receive finals.

B. Appeals. If the property owner feels aggrieved by the determination of the Building Official regarding the applicable time limit or by the denial of an additional six-month extension, the property owner may appeal to the Code Compliance Hearing Officer within ten days of the Building Official's decision. The appellant shall pay a hearing appeal fee at the time of filing an appeal in an amount as shall be established from time to time by resolution of the City Council. The Code Compliance Hearing Officer shall notify the appellant in writing of the date of the hearing on the appeal, and such notice shall be sent at least ten days before the date of the hearing, which shall be held no later than thirty days after the filing of the appeal.

**14.03.090 - Submittal Documents.**

A. Submittal documents consisting of construction documents, plans, specifications, engineering calculations, diagrams, soil investigation reports, geotechnical reports, special inspection and structural observation programs, a construction management plan and other data may constitute the submittal documents and when determined by the Building Official, shall be submitted in one or more sets with each application for a permit. When such plans are not prepared by an architect or engineer, the building official may require the applicant submitting such plans or other data to demonstrate that state law does not require that the plans be prepared by a licensed architect or engineer. If provided by local law, or in order to ensure quality design consistent with the standards of the Pasadena Municipal Code or to otherwise promote the public health, welfare and safety, the building official may require plans, computations and specifications to be prepared and designed by an engineer and architect licensed by the State of California.

   1. Exception: The building official is authorized to waive the submission of construction documents, plans, calculations, construction, and other data if it is found that the nature of the work applied for is such that reviewing of plans is not necessary to obtain compliance with this code.

B. Construction Documents: Construction documents shall be dimensioned and drawn to scale upon suitable material. Electronic media documents are permitted to be submitted when approved by the building official. Construction documents shall be of sufficient clarity to indicate the location, nature and extent of the work proposed and show in detail that it will conform to the provisions of this code and relevant laws, ordinances, rules, and regulations, as determined by the building official. The first sheet of each set of plans shall give the house and street address of the work and the name and address of the owner and persons who prepare them. Plans shall include a site plan showing the location of the proposed building and of every existing building on the property and shall include a directional north arrow. In lieu of detailed specifications, the building official may approve references on the plans to a specific section or part of this code or other ordinances or laws. Computations, stress diagrams and other data sufficient to show the correctness of the plans shall be submitted when required

by the building official. Where proposed construction will affect site drainage, existing and proposed drainage patterns shall be shown on the plot plan.

C. Architect or Engineer In Responsible Charge: When it is required that documents be prepared by an architect or engineer, the building official shall be authorized to require the owner to engage and designate on the building permit application a registered architect or engineer who shall act as the architect or engineer of record. If the circumstances require, the owner may designate a substitute registered architect or engineer of record who shall perform all of the duties required of the original architect or engineer of record. The building official shall be notified in writing by the owner if the architect or engineer of record is changed or is unable to continue to perform the duties. The architect or engineer of record shall be responsible for reviewing and coordinating all submittal documents prepared by others, including phased and deferred submittal items, for compatibility with the design of the building.

D. Deferred Submittals: For the purposes of this section, "deferred submittals" are defined as those portions of the design which are not submitted at the time of the application and which are to be submitted within a period specified by the building official. Deferral of any submittal items shall have prior approval of the building official. The architect or engineer of record shall list the deferred submittals on the construction documents for review by the building official. Documents for deferred submittal items shall be submitted to the architect or engineer of record who shall review them and forward them to the building official with a notation indicating that the deferred submittal documents have been reviewed and that they have been found to be in general conformance with the design of the building. The deferred submittal items shall not be installed until their design and submittal documents have been approved by the building official.

E. Inspection and Observation Program: When special inspection is required by Chapter 17 of the California Building Code, or elsewhere under the provisions of the California Building Standards Code, the architect or engineer of record shall prepare an inspection program which shall be submitted to the building official for approval prior to issuance of the building permit. The inspection program shall designate the portions of the work that require special inspection and indicate the duties of the special inspectors. The special inspector may be employed by the owner, the engineer or architect of record, or an agent of the owner, but shall not be employed by the contractor or his employees, representatives or agents, or any other person performing the work. When structural observation, the inspection program shall name the individuals or firms who are to perform structural observation and describe the stages of construction at which structural observation is to occur. The inspection program shall include samples of inspection reports and provide time limits for submission of reports.

F. Responsible Person or Contractor of Record: When required by the building official, the contractor of record or a representative responsible person shall be present at the construction site at all times during the construction process. That person shall have the authority to address the concerns of neighboring property

residents or occupants regarding the construction project. The names and telephone numbers of the contractor of record or the responsible person shall be conspicuously displayed at the construction site in a manner satisfactory to the building official.

**14.03.100 - Fees.**

A. General: Fees shall be assessed in accordance with the provisions of this section or shall be as set forth in the fee schedule adopted by resolution of the city council.
B. Permit Fees:
    1. For each and every permit issued pursuant to Title 24, California Building Standards there shall be paid to the city a permit fee. The permit fees shall be established by state or local agencies or by resolution of the city council.
    2. The determination of value or valuation under any of the provisions of these codes shall be made by the building official. The value to be used in computing any permit and plan review fees shall be the total value of all construction work for which the permit is issued as well as all finish work, painting, roofing, electrical, plumbing, heating, air conditioning, elevators, fire extinguishing systems and other permanent equipment.
    3. In addition to the permit fees, if buildings or structures are required to meet energy, sound insulation and/or seismic zone standards as mandated by the state, then the building official shall collect fee(s) in the amount established by state or local agencies or by resolution of the city council.
C. Plan Review Fees:
    1. When a plan review is required, a plan review fee shall be paid at the time of submitting plans and specifications for review. Additional review fees may be assessed for changes and revisions to the plans beyond those required to address the plan review corrections and for those changes made after issuance of the permit. Applications for extension of the plan review expiration date, which are submitted in accordance with this code, shall be accompanied by payment of fees.
    2. In addition to the plan review fee, if buildings or structures are required to meet energy, sound insulation and/or seismic zone standards as mandated by the state, then the building official shall collect fee(s) in the amount established by state or local agencies or by resolution of the city council.
D. When the building official determines that the construction or work poses a hazard or that the nature of the construction or work requires a degree of specialized knowledge, skill or experience beyond that possessed by any regular employee of the city, or when there are differences of opinions between the department staff and the project's consultants, the building official may employ a consultant or consultants. The owner, or his agents, shall pay to the city all direct and indirect costs of such consultants and shall maintain a cash

deposit with the city at all times in a sufficient amount for the purpose of paying such costs.

E. Investigation Fees; Work Without A Permit:
   1. Investigation: Whenever work for which a permit is required by this code has been commenced without first obtaining a permit, a special investigation shall be made before a permit may be issued for such work.
   2. Fee: An investigation fee, in addition to the permit fee, shall be collected whether or not a permit is then or subsequently issued. The investigation fee shall be equal to the amount of the permit fee required by this code. The payment of such investigation fee shall not exempt an applicant from compliance with all other provisions of either this code or the technical codes nor from the penalty prescribed by law.

F. Fee Refunds: The building official may authorize refunding of a fee paid hereunder which was erroneously paid or collected. The building official may authorize refunding of not more than eighty percent (80%) of the permit fee paid when no work has been done under a permit issued in accordance with this code. The building official may authorize refunding of not more than eighty percent (80%) of the plan review fee paid when an application for a permit for which a plan review fee has been paid is withdrawn or canceled within ten (10) days of submittal and before any examination time has been expended. The building official shall not authorize the refunding of any fee paid except upon written application filed by the original permittee not later than one hundred eighty (180) days after the date of fee payment.

G. Cost recovery. In addition to all other remedies available to the city, where an emergency situation is caused or exacerbated by a willful act, a negligent act, or a violation of the Fire Code, Building Code, or any other applicable law, ordinance or regulation, the cost of mitigating and securing any emergency that is within the responsibility of the Fire Chief if a charge against the person who caused the emergency or who caused the circumstances leading to the creation of the emergency. Damages and expenses incurred by any public agency providing mutual aid shall constitute debt of such person and shall be collectible by the Fire Chief for proper distribution in the same manner as in the case of an obligation under contract expressed or implied. Expenses as stated above shall include, but not limited to, equipment and personnel committed and any payments required by the public agency to outside business firms requested by the public agency to mitigate or secure the emergency, monitor remediation, and clean up.

## 14.03.110 Inspections.

A. General: Construction or work for which a permit is required shall be subject to inspection by the building official and the construction or work shall remain accessible and exposed for inspection purposes until approved by the building official. In addition, certain types of construction shall have continuous inspection as specified in this section. Approval as a result of an inspection shall not be construed to be an approval of a violation of the provisions of this code or of other ordinances or laws. Inspections presuming to give authority to violate or

cancel the provisions of this code or of other ordinances of the jurisdiction shall not be valid. It shall be the duty of the permit applicant to cause the work to remain accessible and exposed for inspection purposes. Neither the building official nor this jurisdiction shall be liable for expense entailed in the removal or replacement of any material required to allow inspection.

B. A survey of the lot may be required by the building official to verify that the structure is located in accordance with the approved plans. Neither the building official nor the city shall be liable for expense entailed in the removal or replacement of any material required to allow inspection.

C. For all new construction and when required by the city, a licensed surveyor must certify that the height of the building is in accordance with the approved plans. The surveyor must show the precise height of the building as compared with the reference elevation shown on the approved plans.

D. Approved Fabricators: Special inspections required by this section and elsewhere in this code or the technical codes shall not be required where the work is done on the premises of a fabricator registered and approved by the building official to perform such work without special inspection. The certificate of registration shall be subject to revocation by the building official if it is found that work done pursuant to the approval is in violation of the technical codes. The approved fabricator shall submit a certificate of compliance to the building official and to the engineer or architect of record stating that the work was performed in accordance with the approved plans and specifications. The approved fabricator's qualifications shall be contingent on compliance with the following:

    1. The fabricator has developed and submitted a detailed fabrication procedural manual reflecting key quality control procedures which will provide a basis for inspection control of workmanship and the fabricator plant.
    2. Verification of the fabricator's quality control capabilities, plant and personnel as outlined in the fabrication procedural manual shall be by an approved inspection or quality control agency.
    3. Periodic plant inspections shall be conducted by an approved inspection or quality control agency to monitor the effectiveness of the quality control program.
    4. It shall be the responsibility of the inspection or quality control agency to notify the approving authority in writing of any change to the procedural manual. Fabricator approval may be revoked for just cause. Reapproval of the fabricator shall be contingent on compliance with quality control procedures during the past year.

E. Structural Observation: Structural observation shall be provided in seismic design category D, E, or F as indicated in the building code.

F. Inspection Record: Work requiring a permit shall not be commenced until the permit holder or the agent of the permit holder shall have posted in a conspicuous place at the construction site a permit and inspection record such as to allow the building official conveniently to make the required entries regarding inspection of the work. The permit shall be posted in a location such

that it is visible from the street. The permit, construction documents, and plans shall remain readily available on site until final approval has been granted by the building official. The requirements for posting and location of posting may be waived or modified by the building official as deemed necessary for the particular type of work.

G. Duplicate inspection cards may be issued upon payment of fees as established by city council resolution.

H. Inspection Requests: It shall be the duty of the person doing the work authorized by a permit to notify the building official that such work is ready for inspection. Failure to do so constitutes a violation of this administrative code. The building official may require that every request for inspection be filed at least one business day before such inspection is desired. Such requests shall be made in a manner deemed acceptable by the building official. It shall be the duty of the person requesting any inspections required by this code to provide access to and means for inspection of the work. Failure of a permit holder to schedule and undergo all required progress, final or other inspections by the division is a violation of this administrative code.

I. Approval Required: Work shall not be done beyond the point indicated in each successive inspection without first obtaining the approval of the building official. The building official, upon notification, shall make the requested inspection and shall either indicate that that portion of the construction is satisfactory as completed (which is referred to as a "successful inspection") or shall notify the permit holder or an agent of the permit holder wherein the same fails to comply with this code. Any portion of work that does not comply with the code shall be corrected and such portion shall not be covered or concealed until authorized by the building official. All work and installations that are authorized by a permit shall not become lawful until a permit holder has obtained a final inspection approval from the division, which shall be in writing. There shall be a final inspection and approval of all buildings and structures when completed and ready for occupancy and use.

J. Reinspections: A reinspection fee may be assessed for each inspection or reinspection when such portion of work for which inspection is called is not complete or when corrections called for are not made. This section is not to be interpreted as requiring reinspection fees the first time a job is rejected for failure to comply with the requirements of this code, but as controlling the practice of calling for inspections before the job is ready for such inspection or reinspection. Reinspection fees may be assessed when the inspection record card is not posted or otherwise available on the work site, the approved plans are not readily available to the inspector, for failure to provide access on the date for which inspection is requested, or for deviating from plans requiring the approval of the building official. To obtain a reinspection, the applicant shall file an application therefor in writing upon a form furnished for that purpose, and pay the reinspection fee in accordance with the fee schedule adopted by this jurisdiction. In instances where reinspection fees have been assessed, additional inspection of the work will not be performed until the required fees have been paid.

**EXHIBIT 1**

## 14.03.120 - Posting of Construction Sign.

Except for single-family construction involving only minor interior remodel, minor building permits, window change outs, re-roofs or other minor building permits, one sign, visible from the street, must be posted listing project address, permit number, work description, visual rendering, name of construction company, contact name of construction company and phone number and/or if owner-builder contact name and phone number of owner, or other sign specifications as approved by the Department Director. A sign may also be required when determined by the Building Official. The sign shall also list the City's allowable construction hours and days pursuant to Pasadena Municipal Code Section 9.36.070, and clearly identify the permit expiration date. Said sign shall be white in color as background and a minimum size of 24" in height by 36" in width with 1" high legible black lettering. Posting of the required sign is the responsibility of the permittee, and such sign shall be posted and maintained at the construction site where it can be read by the public. This notice must be posted prior to the start of construction and displayed continuously until all permitted work is inspected and approved by City of Pasadena Building & Safety Division. Sign to be verified by the city upon the first inspection. Signs shall be replaced if damaged, torn, faded, or if the required information is illegible, as determined by the Building Official.

## 14.03.140 Site Maintenance.

All construction sites shall remain clean and orderly at all times during construction, including but not limited to food trash, wrappers, and garbage. All non-construction trash shall be contained in a container or bag to prevent the spreading by wind or animals.

## 14.03.150 Certificate of Occupancy.

A. Use or Occupancy: Buildings or structures shall not be used or occupied in whole or in part, nor shall a change in the existing occupancy classification of a building or structure or portion thereof be made until the building official has issued a certificate of occupancy therefor as provided herein. Issuance of a certificate of occupancy shall not be construed as an approval of a violation of the provisions of this code or of other ordinances of the City, County of Los Angeles, State of California or the United States. Certificates presuming to give authority to violate or cancel the provisions of this code or of other ordinances of the City, County of Los Angeles, State of California or the United States shall not be valid. In lieu of a certificate of occupancy, when the building shell, including all structural elements, is completed and all life safety systems are installed and functional, the building official may issue a certificate of completion to allow a limited use but not occupancy of the building prior to issuance of the certificate of occupancy. A certificate of completion is issued to signify completion of a building exclusive of interior build out.
B. Change In Use: Changes in the character or use of a building shall not be made except as specified in the building code and the residential code.
C. Certificate Issued: After the building official inspects the building or structure and finds no of the provisions of this code or other laws which are enforced by the

code enforcement agency, the building official shall issue a certificate of occupancy which shall contain the following:

1. The building permit number.
2. The address of the building.
3. The name and address of the owner.
4. A description of that portion of the building for which the certificate is issued.
5. A statement that the described portion of the building has been inspected for compliance with the requirements of this code for the group and division of occupancy and the use for which the proposed occupancy is classified.
6. The name of the building official.
7. The edition of the code under which the permit was issued.
8. The use and occupancy, in accordance with the provision of Chapter 3 of the California Building Code.
9. The type of construction as defined in Chapter 6 of the California Building Code.
10. The design occupant load.
11. Where an automatic sprinkler system is provided, whether the sprinkler system is required.
12. Any special stipulations and conditions of the building permit.

D. Temporary Certificate: If the building official finds that no substantial hazard will result from occupancy of any building or portion thereof before the same is completed, he/she may issue a temporary certificate of occupancy for the use of a portion or portions of a building or structure prior to the completion of the entire building or structure; provided a cash deposit is made Applications for a temporary certificate of occupancy shall be submitted with the required fee in accordance with city council resolution and shall be paid prior to issuance. The building official may set a deadline for the temporary certificate of occupancy to expire, as well as impose conditions thereto. A violation of a condition shall constitute cause to revoke or suspend the temporary certificate of occupancy.

E. Revocation or Suspension: The building official may, in writing, revoke or suspend a certificate of occupancy when the certificate is issued in error, or on the basis of incorrect information, or when it is determined that the building or structure or portion thereof is in violation of any provision of this chapter. Revocations or suspensions of certificates of occupancy are appealable by an owner and occupant of the subject premises in the same manner provided for appeals from notices of denial of a permit or notice of permit condition(s) that are issued pursuant to this administrative code. A timely appeal shall stay a revocation or suspension, unless the building official is concurrently exercising emergency powers as provided for in this administrative code.

F. Violation: It is unlawful and a violation of this administrative code for any person to occupy or use a building or structure, or portion thereof, that is subject to a revoked or suspended certificate of occupancy, or an expired or revoked temporary certificate.

**EXHIBIT 1**

## 14.03.160 Connection to Service Utilities

A. Energy Connections: Persons shall not make connections from a utility, source of energy, fuel or power to any building, structure, or system service equipment that is regulated by this code and for which a permit is required by this code, until approved in writing by the building official.

B. Temporary Connection: The building official shall have the authority to authorize the temporary connection of the building or system service equipment to the utility source of energy for the purpose of testing building service equipment, or for use under a temporary certificate of occupancy, provided a cash performance deposit is made. Applications for temporary connection to the utility service shall be submitted with the payment of fees as established by Council resolution.

C. Authority To Disconnect Service Utilities: The building official or the building official's authorized representative shall have the authority to authorize disconnection of utility service to the building, structure or system regulated by this Code and the referenced codes and standards in case of emergency where necessary to eliminate an immediate hazard to life or property or where such utility connection has been made without the approval of the building official. The building official shall whenever possible notify the serving utility, the owner and occupant of the building, structure or service system of the decision to disconnect prior to taking such action. If not notified prior to disconnecting, the utility, owner and occupant of the building, structure or service system shall be notified in writing, of such disconnection as soon as practical thereafter. When any building service equipment is maintained in violation of this Code and in violation of a notice issued pursuant to the provisions of this section, the building official shall institute appropriate action to prevent, restrain, correct or abate the violation. Persons shall not make connections from a utility, source of energy, fuel, or power to building service equipment which has been disconnected or ordered to be disconnected by the building official or the use of which has been ordered to be discontinued by the building official until the building official authorizes the reconnection and use of such equipment.

## 14.03.170 Stop Work Orders

A. Authority: Where the building official finds any work being performed in a manner either contrary to the provisions of this administrative code or the Pasadena Municipal Code, or other laws and ordinances, or that the work is dangerous and unsafe, the building official is authorized to issue a stop work order.

B. Issuance: The stop work order shall be in writing and shall be given to the owner of the property involved, the owner's authorized agent or the person performing the work. Upon issuance of a stop work order, the cited work shall immediately cease. No person shall continue with, or allow the continuance of, any work that is subject to an issued stop work order, unless first authorized by the building official in writing.

C. Emergencies: Where an emergency exists, the building official shall not be required to give a written notice prior to stopping the work.

D. Unlawful Continuance: Persons who disregard or violate, or who permit or allow a stop work order to be disregarded or violated, may be subject to prosecution by the City.

## 14.03.180 Unsafe Buildings, Structures, or Equipment

All buildings, structures, or building service equipment, or portions thereof, that are or hereafter become unsafe, insanitary, or deficient or which constitute a fire hazard, or are otherwise dangerous to human life, or which in relation to an existing use constitute a hazard to safety or health, or public welfare, by reason of inadequate maintenance, dilapidation, obsolescence, fire hazard, disaster damage, or abandonment as specified in this code or any other applicable ordinance of the city, are, for the purpose of this code, unsafe buildings or structures. As used herein, "abandonment" exists when a building or structure is not lawfully occupied and contains conditions that violate the Pasadena Municipal Code, and for which all required submittals and fees to repair, demolish or replace said building or structure have not been received by any division of the Community Development Department for a period of six (6) months.

Building service equipment regulated by the Code, which constitutes a fire, electrical or health hazard, or an insanitary condition, or is otherwise dangerous to human life is, for the purpose of this section, is considered to be unsafe. Use of buildings, structures or building service equipment constituting a hazard to safety, health or public welfare by reason of inadequate maintenance, dilapidation, obsolescence, fire hazard, disaster, damage or abandonment is, for the purpose of this section, an unsafe use.

Parapet walls, cornices, spires, towers, tanks, statuary and other appendages or structural members which are supported by, attached to, or a part of a building and which are in a deteriorated condition or otherwise unable to sustain the design loads which are specified in the California Building Code are hereby designated as unsafe building appendages.

Unsafe building or structures shall be taken down and removed or made safe, as the building official deems necessary and as provided for in this Code. A vacant structure that is not secured against entry shall be deemed unsafe. No person shall own, use, occupy or maintain any unsafe building. All unsafe buildings are hereby declared to be public nuisances. In addition to instituting any appropriate action to prevent, restrain, correct, or abate a violation of this section, the building official may abate an unsafe condition by repair, rehabilitation, demolition or removal in accordance with the procedure specified in any articles of this chapter.

**EXHIBIT 2**

Chapter 14.04 BUILDING CODE AND RELATED CODES

**14.04.010 Adoption and filing.**

California Building Codes adopted. California Code of Regulation Title 24 Parts 1 through 12 consisting of the: 2022 California Administrative Code; 2022 California Building Code with Appendix Chapters G, H, I, J, P; 2022 California Residential Code with Appendix Chapters AH, AK, AQ, AX, AZ; 2022 California Electrical Code with Annexes A, C, F, I; 2022 California Mechanical Code with Appendix Chapters B, C, F, G, H; 2022 California Plumbing Code with Appendix Chapters A, D, G, I, J, K, M, N; 2022 California Energy Code; 2022 California Historical Building Code; 2022 California Fire Code with Appendix Chapter 4, and Appendix Chapters A through O; 2022 California Existing Building Code; 2022 California Green Building Standards Code; 2022 California Referenced Standards Code, and amendments from specific State of California State Agencies. One copy of all of the above publications shall be on file for public inspection and is hereby adopted with the same force and effect as though set out herein in full.

**14.04.015 Section 105.2 of Chapter 1 Division II of the 2022 California Building Code and Section R105.2 of Chapter 1 Division II of the 2022 California Residential Code is amended to read as follows.**

A zoning permit may be required for items exempted from building permit requirements under Chapter 1 Division II Section 105.2 and Section R105.2. Exempted work shall not violate any provisions of this Code, Federal, State, Local laws, or regulations.

**14.04.020 Section 105.5 of the 2022 California Building Code and Section R105.5 of the 2022 California Residential Code is amended to read as follows.**

Expiration. Beginning January 1, 2017, every permit applied and issued by the Building Official under the provisions of this Code shall expire by limitation and become null and void if all work by said permit is not completed within the time limits specified below from the date of issuance of the building permit:

| Construction Type | Project Completion Time |
|---|---|
| Single-Family or Duplex | 24 Months |
| Multi-Family (3+ units) | 36 Months |
| Non-residential | 36 months |

a. Before such work can be recommenced, a permit extension, as specified in Subsection A, shall be first obtained. No permit shall be extended more than twice.

b. Time limits will not be increased by issuance of subsequent building permits for the same project.

c. When a project is divided into separate permits by the applicant, the work on such permits is to be done concurrently, the time allowed to complete all work

on each separate permit shall be established from the initial permit issuance date.

A. Extensions and Fees.

a. Any permittee holding an active permit may apply in writing for an extension of the time within which work under that permit may be continued when, for good and satisfactory reasons, he or she is unable to continue work within the time required by this section due to circumstances beyond the control of the permittee. The written request must demonstrate that:

i. Due to circumstances beyond the owner's or permittee's control, construction could not be commenced, continued or completed in the authorized time period;

ii. If the construction has started, substantial progress has been made;

iii. The condition of the property presents no health or safety hazard; and,

iv. The continued delay will not create any unreasonable aesthetic impact to the neighborhood or substantial economic detriment to the neighboring property owners.

b. The Building Official may extend the time for action by the permittee for a period not exceeding six calendar months. Payment of the building permit extension fee shall be required. The extension fee shall be calculated as the greater of two percent (2%) of the estimated total project valuation or one-thousand dollars.

c. Building permits shall not be extended more than twice, and each extension shall not exceed six months.

d. When a permit expires, the permit holder must first pay permit extension fees as described (b) above and reactivation fees in order to continue to complete the project. This extension may not exceed six months to complete the project and receive finals.

B. Appeals. If the property owner feels aggrieved by the determination of the Building Official regarding the applicable time limit or by the denial of an additional six-month extension, the property owner may appeal to the Code Compliance Hearing Officer within ten days of the Building Official's decision. The appellant shall pay a hearing appeal fee at the time of filing an appeal in an amount as shall be established from time to time by resolution of the City Council. The Code Compliance Hearing Officer shall notify the appellant in writing of the date of the hearing on the appeal, and such notice shall be sent at least ten days before the date of the hearing, which shall be held no later than thirty days after the filing of the appeal.

**14.04.022 Posting of Construction Sign.**

Except for single-family construction involving only minor interior remodel, minor building permits, window change outs, re-roofs or other minor building permits, one sign, visible from the street, must be posted listing project address, permit number, work description, visual rendering, name of construction company, contact name of

~~construction company and phone number and/or if owner-builder contact name and phone number of owner. A sign may also be required when determined by the Building Official. The sign shall also list the City's allowable construction hours and days pursuant to Pasadena Municipal Code Section 9.36.070, and clearly identify the permit expiration date. Said sign shall be white in color as background and a minimum size of 24" in height by 36" in width with 1" high legible black lettering. Posting of the required sign is the responsibility of the permittee, and such sign shall be posted and maintained at the construction site where it can be read by the public. This notice must be posted prior to the start of construction and displayed continuously until all permitted work is inspected and approved by City of Pasadena Building & Safety Division. Sign to be verified by the city upon the first inspection. Signs shall be replaced if damaged, torn, faded, or if the required information is illegible, as determined by the Building Official.~~

**~~14.04.024 Construction Site Fencing.~~**

~~Whenever a building permit is issued to construct, add or alter to a building or site, the installation of perimeter temporary fencing shall be required.~~

~~The installation of temporary fencing shall be required for the following projects:~~

~~1. Project involve grading, trenching or excavation activities.~~

~~2. The construction area is visible from the public right-of-way with the exception of roof replacement, window change-outs with no framing work.~~

~~3. There is outside storage of building materials, equipment, construction materials or equipment stored at the front of the property.~~

~~4. The property is vacant during the duration of the construction.~~

~~5. As determined by the Building Official.~~

~~The Building Official shall require the site to be temporarily fenced and screened on all sides for the duration of the construction project. The height of the fence shall be seventy-two inches (72) high with gates to access the site. The screening material shall be tightly secured to the fencing, free of holes and without advertising. The perimeter fencing may be removed when there are no remaining exterior construction activities visible from the public right-of-way and there is no longer visible outside storage of building materials, equipment or fixtures or as determined by the Building Official. An address sign shall be installed and be visible from public right of way at all perimeter points to include the street name and number of the site using minimum six-inch high letters and numbers, and shall be posted at the top of the perimeter fence or at least five feet from the ground. A "No Trespassing" sign, conforming to the requirements of California Penal Code, Section 602, shall be installed at all perimeter access points, posted at the top of the perimeter fence or at least five feet from the ground.~~

**~~14.04.030 Violations.~~**

~~All sections in the codes referenced in Section 14.04.010 herein pertaining to violations are amended in their entirety to read as follows.~~

~~It shall be unlawful for any person, firm or corporation to erect, construct, enlarge, alter, repair, move, improve, remove, convert, or demolish, equip, use, occupy, or maintain, any building or structure in the City, or cause same to be done, contrary to or in violation of any of the provisions of this chapter. Any person, firm, or corporation violating any of the provisions of this Ordinance, shall be deemed guilty of a misdemeanor, and each such person shall be deemed guilty of a separate offense for each and every day or portion thereof during which any violation of any of the provisions of this Ordinance is committed, continued, or permitted, and upon conviction of any such violation such persons shall be punished by a fine of not more than one thousand dollars ($1,000) or double the permit fee whichever is greater or by imprisonment for not more than one (1) year, or by both such fine and imprisonment.~~

~~In addition to the above penalty provisions, violation of any of the provisions of this chapter may be subject to the administrative proceedings set forth in Chapter 1.25 of this code.~~

**~~14.04.040 Board of Appeals.~~**

~~All sections in the respective codes pertaining to the Board of Appeals are hereby amended in their entirety to read as follows:~~

~~In order to hear and decide appeals or orders and determine the suitability of alternate materials and methods of construction and to provide for reasonable interpretation of the provisions of these Codes, there shall be and there is hereby created a Board of Appeals, composed of the Mayor and the City Council.~~

~~The city clerk shall be the secretary to the Board. The Board may adopt reasonable rules and regulations for conducting its investigations and shall render all its decisions and findings on contested matters, in writing to the building official, with a duplicate copy thereof to any appellant or contestant affected by any such decision of findings, and may recommend to the City Council such new legislation, if any, as is consistent therewith.~~

~~The City Council may prescribe by resolution, to employ at the cost and expense of the City, such qualified individuals as the Board, in its discretion, may deem reasonably necessary in order to assist it in its investigation and in making its findings and decisions.~~

**~~14.04.050 Fees.~~**

~~The council shall by resolution adopt a schedule of fees for the permits issued pursuant hereto.~~

**~~14.04.100 Changes and additions to the adopted codes.~~**

~~Pursuant to the Health and Safety Code Sections 17958.5 and 17958.7, the City establishes the following local modifications. The requisite findings if applicable for such requirements are set forth in the ordinance fact sheet accompanying this ordinance.~~

**EXHIBIT 2**

**~~14.04.110 Section 1505.1 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~General. Roof assemblies shall be divided into the classes defined in this section. Class A, B and C roof assemblies and roof coverings required to be listed by this section shall be tested in accordance with ASTM E108 or UL 790. In addition, fire-retardant-treated wood roof coverings shall be tested in accordance with ASTM D 2898. The minimum roof coverings installed on buildings shall comply with Table 1505.1 based on the type of construction of the building. All roof assemblies and roof coverings shall be of not less than Class B. No wood roof covering material shall be installed on any structure located in the very high, high and moderate fire hazard severity zones as identified by the Pasadena Fire Department.~~

~~Exception #1: Skylights and sloped glazing that comply with Chapter 24 or Section 2610. Installation of skylights of plastic material shall meet the requirements of the very high and high fire hazard severity zones.~~

~~Exception #2: In the moderate fire hazard severity zone, the fire code official may, upon a showing of good cause and necessity, approve the use of fire resistive wood as part of Class A listed assemblies, and may require additional mitigation as warranted, for the repair or maintenance of existing structures.~~

**~~14.04.115 Section 1505.6 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~Fire-retardant-treated wood shingles and shakes. Fire-retardant-treated wood shingles and wood shakes shall not be installed in the very high, high and moderate fire hazard severity zones. Fire-retardant-treated wood shakes and shingles are wood shakes and shingles complying with UBC Standard 15-3 or 15-4 which are impregnated by the full-cell vacuum-pressure process with fire-retardant chemicals, and which have been qualified by UBC Standard 15-2 for use on Class A, B or C roofs.~~

~~Fire-retardant-treated wood shakes and shingles shall comply with ICC-ES EG107 and with the weathering requirements contained in Health and Safety Code Section 13132.7(j). Each bundle shall bear labels from an ICC accredited quality control agency identifying their roof-covering classification and indicating their compliance with ICC-ES EGI07 and with the weathering requirements contained in Health and Safety Code Section 13132.7(j).~~

~~Health and Safety Code Section 13132.7(j). No wood roof covering materials shall be sold or applied in this state unless both of the following conditions are met:~~

~~(1) The materials have been approved and listed by the State Fire Marshal as complying with the requirements of this section.~~

~~(2) The materials have passed at least five years of the 10-year natural weathering test. The 10-year natural weathering test required by this subdivision shall be conducted in accordance with standard 15-2 of the 1994 Edition of the Uniform Building Code at a testing facility recognized by the State Fire Marshal.~~

Exception: In the moderate fire hazard severity zone, the fire code official may, upon a showing of good cause and necessity, approve the use of fire-resistive wood as part of Class A listed assemblies, and may require additional mitigation as warranted, for the repair or maintenance of existing structures.

**14.04.120 Section 1507 of the 2022 Edition of the California Building Code is amended by adding Section 1507.1.1 to read as follows.**

Roof sheathing. When finish roofing material is removed to the existing open space sheathing, a minimum of 3/8-inch thick plywood sheathing shall be installed. The new sheathing shall comply with the requirements of the California Building Code. The sheathing shall be installed such that the edges align over rafters and individual spaced sheathing boards. The sheathing shall be attached to the existing spaced sheathing with 6d common nails at 6 inches (147mm) on center at supported edges and 6d common nails at 12 inches (294mm) on center at intermediate supports.

**14.04.130 Sections 1613.5 and 1613.5.1 are added to Chapter 16 of the 2022 Edition of the California Building Code to read as follows.**

1613.5 Amendments to ASCE 7. The provisions of Section 1613.5 shall be permitted as an amendment to the relevant provisions of ASCE 7.

1613.5.1 Values for vertical combinations. Modify ASCE 7 Section 12.2.3.1 Exception 3 as follows:

3. Detached one- and two-family dwellings up to two stories in height of light frame construction.

**14.04.140 Section 1613.5.2 is added to Chapter 16 of the 2022 Edition of the California Building Code to read as follows.**

1613.5.2 Wood diaphragms. Modify ASCE 7 Section 12.11.2.2.3 as follows:

12.11.2.2.3 Wood Diaphragms. The anchorage of concrete or masonry structural walls to wood diaphragms shall be in accordance with AWC SDPWS 4.1.5.1 and this section. Continuous ties required by this section shall be in addition to the diaphragm sheathing. Anchorage shall not be accomplished by use of toenails or nails subject to withdrawal, nor shall wood ledgers or framing be used in cross-grain bending or cross-grain tension. The diaphragm sheathing shall not be considered effective for providing the ties or struts required by this section.

For structures assigned to Seismic Design Category D, E or F, wood diaphragms supporting concrete or masonry walls shall comply with the following:

1. The spacing of continuous ties shall not exceed 40 feet. Added chords of diaphragms may be used to form subdiaphragms to transmit the anchorage forces to the main continuous crossties.
2. The maximum diaphragm shear used to determine the depth of the subdiaphragm shall not exceed 75% of the maximum diaphragm shear.

**EXHIBIT 2**

**~~14.04.141 Section 1613.5.3 is added to Chapter 16 of the 2022 Edition of the California Building Code to read as follows.~~**

~~1613.5.3 Structural separation. Modify ASCE 7 Section 12.12.3 Equation 12.12-1 as follows:~~

$$\delta M = C_d \delta \text{ max} \quad (12.12\text{-}1)$$

**~~14.04.142 Section 1613.6 is added to Chapter 16 of the 2022 Edition of the California Building Code to read as follows.~~**

~~1613.6 Seismic design provisions for hillside buildings.~~

~~1613.6.1 Purpose. The purpose of this section is to establish minimum regulations for the design and construction of new buildings and additions to existing buildings when constructing such buildings on or into slopes steeper than one unit vertical in three units horizontal (33.3%). These regulations establish minimum standards for seismic force resistance to reduce the risk of injury or loss of life in the event of earthquakes.~~

~~1613.6.2 Scope. The provisions of this section shall apply to the design of the lateral-force-resisting system for hillside buildings at and below the base level diaphragm. The design of the lateral-force-resisting system above the base level diaphragm shall be in accordance with the provisions for seismic and wind design as required elsewhere in this division.~~

~~Exception: Non-habitable accessory buildings and decks not supporting or supported from the main building are exempt from these regulations.~~

~~1613.6.3 Definitions. For the purposes of this section certain terms are defined as follows:~~

~~BASE LEVEL DIAPHRAGM is the floor at, or closest to, the top of the highest level of the foundation.~~

~~DIAPHRAGM ANCHORS are assemblies that connect a diaphragm to the adjacent foundation at the uphill diaphragm edge.~~

~~DOWNHILL DIRECTION is the descending direction of the slope approximately perpendicular to the slope contours.~~

~~FOUNDATION is concrete or masonry which supports a building, including footings, stem walls, retaining walls, and grade beams.~~

~~FOUNDATION EXTENDING IN THE DOWNHILL DIRECTION is a foundation running downhill and approximately perpendicular to the uphill foundation.~~

~~HILLSIDE BUILDING is any building or portion thereof constructed on or into a slope steeper than one unit vertical in three units horizontal (33.3%). If only a portion of the building is supported on or into the slope, these regulations apply to the entire building.~~

~~PRIMARY ANCHORS are diaphragm anchors designed for and providing a direct connection as described in Sections 1613.6.5 and 1613.6.7.3 between the diaphragm and the uphill foundation.~~

~~SECONDARY ANCHORS are diaphragm anchors designed for and providing a redundant diaphragm to foundation connection, as described in Sections 1613.6.6 and 1613.6.7.4.~~

~~UPHILL DIAPHRAGM EDGE is the edge of the diaphragm adjacent and closest to the highest ground level at the perimeter of the diaphragm.~~

~~UPHILL FOUNDATION is the foundation parallel and closest to the uphill diaphragm edge.~~

~~1613.6.4 Analysis and design.~~

~~1613.6.4.1 General. Every hillside building within the scope of this section shall be analyzed, designed, and constructed in accordance with the provisions of this division. When the code-prescribed wind design produces greater effects, the wind design shall govern, but detailing requirements and limitations prescribed in this and referenced sections shall be followed.~~

~~1613.6.4.2 Base level diaphragm-downhill direction. The following provisions shall apply to the seismic analysis and design of the connections for the base level diaphragm in the downhill direction.~~

~~1613.6.4.2.1 Base for lateral force design defined. For seismic forces acting in the downhill direction, the base of the building shall be the floor at or closest to the top of the highest level of the foundation.~~

~~1613.6.4.2.2 Base shear. In developing the base shear for seismic design, the response modification coefficient (R) shall not exceed 5 for bearing wall and building frame systems. The total base shear shall include the forces tributary to the base level diaphragm including forces from the base level diaphragm.~~

~~1613.6.5 Base shear resistance-primary anchors.~~

~~1613.6.5.1 General. The base shear in the downhill direction shall be resisted through primary anchors from diaphragm struts provided in the base level diaphragm to the foundation.~~

~~1613.6.5.2 Location of primary anchors. A primary anchor and diaphragm strut shall be provided in line with each foundation extending in the downhill direction. Primary anchors and diaphragm struts shall also be provided where interior vertical lateral-force-resisting elements occur above and in contact with the base level diaphragm. The spacing of primary anchors and diaphragm struts or collectors shall in no case exceed 30 feet (9144 mm).~~

~~1613.6.5.3 Design of primary anchors and diaphragm struts. Primary anchors and diaphragm struts shall be designed in accordance with the requirements of Section 1613.6.8.~~

~~1613.6.5.4 Limitations. The following lateral-force-resisting elements shall not be designed to resist seismic forces below the base level diaphragm in the downhill direction:~~

~~1. Wood structural panel wall sheathing,~~

~~2. Cement plaster and lath,~~

3. Gypsum wallboard, and

4. Tension only braced frames.

Braced frames designed in accordance with the requirements of Section 2205.2.1.2 may be used to transfer forces from the primary anchors and diaphragm struts to the foundation provided lateral forces do not induce flexural stresses in any member of the frame or in the diaphragm struts. Deflections of frames shall account for the variation in slope of diagonal members when the frame is not rectangular.

1613.6.6 Base shear resistance-secondary anchors.

1613.6.6.1 General. In addition to the primary anchors required by Section 1613.6.5, the base shear in the downhill direction shall be resisted through secondary anchors in the uphill foundation connected to diaphragm struts in the base level diaphragm.

Exception: Secondary anchors are not required where foundations extending in the downhill direction spaced at not more than 30 feet (9144 mm) on center extend up to and are directly connected to the base level diaphragm for at least 70% of the diaphragm depth.

1613.6.6.2 Secondary anchor capacity and spacing. Secondary anchors at the base level diaphragm shall be designed for a minimum force equal to the base shear, including forces tributary to the base level diaphragm, but not less than 600 pounds per lineal foot (8.76 kN/m) based on Allowable Stress Design (ASD) levels. The secondary anchors shall be uniformly distributed along the uphill diaphragm edge and shall be spaced a maximum of 4 feet (1219 mm) on center.

1613.6.6.3 Design. Secondary anchors and diaphragm struts shall be designed in accordance with Section 1613.6.8.

1613.6.7 Diaphragms below the base level-downhill direction. The following provisions shall apply to the lateral analysis and design of the connections for all diaphragms below the base level diaphragm in the downhill direction.

1613.6.7.1 Diaphragm defined. Every floor level below the base level diaphragm shall be designed as a diaphragm.

1613.6.7.2 Design force. Each diaphragm below the base level diaphragm shall be designed for all tributary loads at that level using a minimum seismic force factor not less than the base shear coefficient.

1613.6.7.3 Design force resistance-primary anchors. The design force described in Section 1613.6.7.2 shall be resisted through primary anchors from diaphragm struts provided in each diaphragm to the foundation. Primary anchors shall be provided and designed in accordance with the requirements and limitations of Section 1613.6.5.

1613.6.7.4 Design force resistance-secondary anchors.

1613.6.7.4.1 General. In addition to the primary anchors required in Section 1613.6.7.3, the design force in the downhill direction shall be resisted through secondary anchors in

~~the uphill foundation connected to diaphragm struts in each diaphragm below the base level.~~

~~Exception: Secondary anchors are not required where foundations extending in the downhill direction, spaced at not more than 30 feet (9144 mm) on center, extend up to and are directly connected to each diaphragm below the base level for at least 70% of the diaphragm depth.~~

~~1613.6.7.4.2 Secondary anchor capacity. Secondary anchors at each diaphragm below the base level diaphragm shall be designed for a minimum force equal to the design force but not less than 300 pounds per lineal foot (4.38 kN/m) based on Allowable Stress Design (ASD) levels. The secondary anchors shall be uniformly distributed along the uphill diaphragm edge and shall be spaced a maximum of 4 feet (1219 mm) on center.~~

~~1613.6.7.4.3 Design. Secondary anchors and diaphragm struts shall be designed in accordance with Section 1613.6.8.~~

~~1613.6.8 Primary and secondary anchorage and diaphragm strut design. Primary and secondary anchors and diaphragm struts shall be designed in accordance with the following provisions:~~

1. ~~Fasteners. All bolted fasteners used to develop connections to wood members shall be provided with square plate washers at all bolt heads and nuts. Washers shall be minimum 0.229 inch by 3 inches by 3 inches (5.82 mm by 76 mm by 76 mm) in size. Nuts shall be tightened to finger tight plus one half (1/2) wrench turn prior to covering the framing.~~
2. ~~Fastening. The diaphragm to foundation anchorage shall not be accomplished by the use of toenailing, nails subject to withdrawal, or wood in cross-grain bending or cross-grain tension.~~
3. ~~Size of Wood Members. Wood diaphragm struts collectors, and other wood members connected to primary anchors shall not be less than 3 inch (76 mm) nominal width. The effects of eccentricity on wood members shall be evaluated as required per Item 9.~~
4. ~~Design. Primary and secondary anchorage, including diaphragm struts, splices, and collectors shall be designed for 125% of the tributary force.~~
5. ~~Allowable Stress Increase. The one-third allowable stress increase permitted under Section 1605.3.2 shall not be taken when the working (allowable) stress design method is used.~~
6. ~~Steel Element of Structural Wall Anchorage System. The strength design forces for steel elements of the structural wall anchorage system, with the exception of anchor bolts and reinforcing steel, shall be increased by 1.4 times the forces otherwise required.~~
7. ~~Primary Anchors. The load path for primary anchors and diaphragm struts shall be fully developed into the diaphragm and into the foundation. The foundation must be shown to be adequate to resist the concentrated loads from the primary anchors.~~

8. Secondary Anchors. The load path for secondary anchors and diaphragm struts shall be fully developed in the diaphragm but need not be developed beyond the connection to the foundation.

9. Symmetry. All lateral force foundation anchorage and diaphragm strut connections shall be symmetrical. Eccentric connections may be permitted when demonstrated by calculation or tests that all components of force have been provided for in the structural analysis or tests.

10. Wood Ledgers. Wood ledgers shall not be used to resist cross-grain bending or cross-grain tension.

1613.6.9 Lateral-force-resisting elements normal to the downhill direction.

1613.6.9.1 General. In the direction normal to the downhill direction, lateral-force-resisting elements shall be designed in accordance with the requirements of this section.

1613.6.9.2 Base shear. In developing the base shear for seismic design, the response modification coefficient (R) shall not exceed 5 for bearing wall and building frame systems.

1613.6.9.3 Vertical distribution of seismic forces. For seismic forces acting normal to the downhill direction the distribution of seismic forces over the height of the building using Section 12.8.3 of ASCE 7 shall be determined using the height measured from the top of the lowest level of the building foundation.

1613.6.9.4 Drift limitations. The story drift below the base level diaphragm shall not exceed 0.007 times the story height at strength design force level. The total drift from the base level diaphragm to the top of the foundation shall not exceed 3/4 inch (19 mm). Where the story height or the height from the base level diaphragm to the top of the foundation varies because of a stepped footing or story offset, the height shall be measured from the average height of the top of the foundation. The story drift shall not be reduced by the effect of horizontal diaphragm stiffness.

1613.6.9.5 Distribution of lateral forces.

1613.6.9.5.1 General. The design lateral force shall be distributed to lateral-force-resisting elements of varying heights in accordance with the stiffness of each individual element.

1613.6.9.5.2 Wood structural panel sheathed walls. The stiffness of a stepped wood structural panel shear wall may be determined by dividing the wall into adjacent rectangular elements, subject to the same top of wall deflection. Deflections of shear walls may be estimated by AWC SDPWS Section 4.3.2. Sheathing and fastening requirements for the stiffest section shall be used for the entire wall. Each section of wall shall be anchored for shear and uplift at each step. The minimum horizontal length of a step shall be 8 feet (2438 mm) and the maximum vertical height of a step shall be 2 feet 8 inches (813 mm).

~~1613.6.9.5.3 Reinforced concrete or masonry shear walls. Reinforced concrete or masonry shear walls shall have forces distributed in proportion to the rigidity of each section of the wall.~~

~~1613.6.9.6 Limitations. The following lateral force-resisting elements shall not be designed to resist lateral forces below the base level diaphragm in the direction normal to the downhill direction:~~

~~1. Cement plaster and lath,~~

~~2. Gypsum wallboard, and~~

~~3. Tension-only braced frames.~~

~~Braced frames designed in accordance with the requirements of Section 2205.2.1.2 of this Code may be designed as lateral-force-resisting elements in the direction normal to the downhill direction, provided lateral forces do not induce flexural stresses in any member of the frame. Deflections of frames shall account for the variation in slope of diagonal members when the frame is not rectangular.~~

~~1613.6.10 Specific design provisions.~~

~~1613.6.10.1 Footings and grade beams. All footings and grade beams shall comply with the following:~~

~~1. Grade beams shall extend at least 12 inches (305 mm) below the lowest adjacent grade and provide a minimum 24 inch (610 mm) distance horizontally from the bottom outside face of the grade beam to the face of the descending slope.~~

~~2. Continuous footings shall be reinforced with at least two No. 4 reinforcing bars at the top and two No. 4 reinforcing bars at the bottom.~~

~~3. All main footing and grade beam reinforcement steel shall be bent into the intersecting footing and fully developed around each corner and intersection.~~

~~4. All concrete stem walls shall extend from the foundation and reinforced as required for concrete or masonry walls.~~

~~1613.6.10.2 Protection against decay and termites. All wood to earth separation shall comply with the following:~~

~~1. Where a footing or grade beam extends across a descending slope, the stem wall, grade beam, or footing shall extend up to a minimum 18 inches (457 mm) above the highest adjacent grade.~~

~~Exception: At paved garage and doorway entrances to the building, the stem wall need only extend to the finished concrete slab, provided the wood framing is protected with a moisture proof barrier.~~

~~2. Wood ledgers supporting a vertical load of more than 100 pounds per lineal foot (1.46 kN/m) based on Allowable Stress Design (ASD) levels and located within 48 inches (1219 mm) of adjacent grade are prohibited.~~

~~Galvanized steel ledgers and anchor bolts, with or without wood nailers, or treated or decay resistant sill plates supported on a concrete or masonry seat, may be used.~~

~~1613.6.10.3 Sill plates. All sill plates and anchorage shall comply with the following:~~

~~1. All wood framed walls, including nonbearing walls, when resting on a footing, foundation, or grade beam stem wall, shall be supported on wood sill plates bearing on a level surface.~~

~~2. Power-driven fasteners shall not be used to anchor sill plates except at interior nonbearing walls not designed as shear walls.~~

~~1613.6.10.4 Column base plate anchorage. The base of isolated wood posts (not framed into a stud wall) supporting a vertical load of 4,000 pounds (17.8 kN) based on Allowable Stress Design (ASD) levels or more and the base plate for a steel column shall comply with the following:~~

~~1. When the post or column is supported on a pedestal extending above the top of a footing or grade beam, the pedestal shall be designed and reinforced as required for concrete or masonry columns. The pedestal shall be reinforced with a minimum of four No. 4 bars extending to the bottom of the footing or grade beam. The top of exterior pedestals shall be sloped for positive drainage.~~

~~2. The base plate anchor bolts or the embedded portion of the post base, and the vertical reinforcing bars for the pedestal, shall be confined with two No. 4 or three No. 3 ties within the top 5 inches (127 mm) of the concrete or masonry pedestal. The base plate anchor bolts shall be embedded a minimum of 20 bolt diameters into the concrete or masonry pedestal. The base plate anchor bolts and post bases shall be galvanized and each anchor bolt shall have at least 2 galvanized nuts above the base plate.~~

~~1613.6.10.5 Steel beam to column supports. All steel beam to column supports shall be positively braced in each direction. Steel beams shall have stiffener plates installed on each side of the beam web at the column. The stiffener plates shall be welded to each beam flange and the beam web. Each brace connection or structural member shall consist of at least two 5/8 inch (15.9 mm) diameter machine bolts.~~

**~~14.04.143 Section 1613.7 is added to Chapter 16 of the 2022 Edition of the California Building Code to read as follows.~~**

~~1613.7 Suspended ceilings. Minimum design and installation standards for suspended ceilings shall be determined in accordance with the requirements of Section 2506.2.1 of this Code and this section.~~

~~1613.7.1 Scope. This part contains special requirements for suspended ceilings and lighting systems. Provisions of Section 13.5.6 of ASCE 7 shall apply except as modified herein.~~

~~1613.7.2 General. The suspended ceilings and lighting systems shall be limited to 6 feet (1828 mm) below the structural deck unless the lateral bracing is designed by a licensed engineer or architect.~~

~~1613.7.3 Sprinkler heads. All sprinkler heads (drops) except fire-resistance-rated floor/ceiling or roof/ceiling assemblies, shall be designed to allow for free movement of the sprinkler pipes with oversize rings, sleeves or adaptors through the ceiling tile. Sprinkler heads and other penetrations shall have a 2 inch (50mm) oversize ring, sleeve, or adapter through the ceiling tile to allow for free movement of at least 1 inch (25mm) in all horizontal directions. Alternatively, a swing joint that can accommodate 1 inch (25 mm) of ceiling movement in all horizontal directions is permitted to be provided at the top of the sprinkler head extension.~~

~~Sprinkler heads penetrating fire-resistance-rated floor/ceiling or roof/ceiling assemblies shall comply with Section 714 of this Code.~~

~~1613.7.4 Special requirements for means of egress. Suspended ceiling assemblies located along means of egress serving an occupant load of 30 or more and at lobbies accessory to Group A Occupancies shall comply with the following provisions.~~

~~1613.7.4.1 General. Ceiling suspension systems shall be connected and braced with vertical hangers attached directly to the structural deck along the means of egress serving an occupant load of 30 or more and at lobbies accessory to Group A Occupancies. Spacing of vertical hangers shall not exceed 2 feet (610 mm) on center along the entire length of the suspended ceiling assembly located along the means of egress or at the lobby.~~

~~1613.7.4.2 Assembly device. All lay-in panels shall be secured to the suspension ceiling assembly with two hold-down clips minimum for each tile within a 4-foot (1219 mm) radius of the exit lights and exit signs.~~

~~1613.7.4.3 Emergency systems. Independent supports and braces shall be provided for light fixtures required for exit illumination. Power supply for exit illumination shall comply with the requirements of Section 1008.3 of this Code.~~

~~1613.7.4.4 Supports for appendage. Separate support from the structural deck shall be provided for all appendages such as light fixtures, air diffusers, exit signs, and similar elements.~~

**~~14.04.145 Section 1704.6 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~Section 1704.6 Structural Observations. Where required by the provisions of Section 1704.6.1, the owner or the owner's authorized agent shall employ a structural observer to perform structural observations. The structural observer shall visually observe representative locations of structural systems, details and load paths for general conformance to the approved construction documents. Structural observation does not include or waive the responsibility for the inspections in Section 110 or the special inspections in Section 1705 or other sections of this code. The structural observer shall be one of the following individuals:~~

~~1. The registered design professional responsible for the structural design, or~~

2. A registered design professional designated by the registered design professional responsible for the structural design.

Prior to the commencement of observations, the structural observer shall submit to the building official a written statement identifying the frequency and extent of structural observations.

The owner or owner's authorized agent shall coordinate and call a preconstruction meeting between the structural observer, contractors, affected subcontractors and special inspectors. The structural observer shall preside over the meeting. The purpose of the meeting shall be to identify the major structural elements and connections that affect the vertical and lateral load resisting systems of the structure and to review scheduling of the required observations. A record of the meeting shall be included in the report submitted to the building official.

Observed deficiencies shall be reported in writing to the owner or owner's authorized agent, special inspector, contractor and the building official. Upon the form prescribed by the building official, the structural observer shall submit to the building official a written statement at each significant construction stage stating that the site visits have been made and identifying any reported deficiencies which, to the best of the structural observer's knowledge, have not been resolved. A final report by the structural observer which states that all observed deficiencies have been resolved is required before acceptance of the work by the building official.

**14.04.147 Section 1704.6.1 of the 2022 Edition of the California Building Code is amended to read as follows.**

1704.6.1 Structural observations for structures seismic resistance. Structural observations shall be provided for those structures where one or more of the following conditions exist:

1. The structure is classified as Risk Category III or IV.
2. The structure is a high-rise building.
3. A lateral design is required for the structure or portion thereof.

   Exception: One-story wood framed Group R-3 and Group U Occupancies less than 2,000 square feet in area, provided the adjacent grade is not steeper than 1 unit vertical in 10 units horizontal (10% sloped), assigned to Seismic Design Category D.

4. Such observation is required by the registered design professional responsible for the structural design.
5. Such observation is specifically required by the building official.

**14.04.150 Section 1705.3 of the 2022 Edition of the California Building Code is amended to read as follows.**

1705.3 Concrete Construction. Special inspections and tests of concrete construction shall be performed in accordance with this section and Table 1705.3.

Exceptions: Special inspection and tests shall not be required for:

1. Isolated spread concrete footings of buildings three stories or less above grade plane that are fully supported on earth or rock, where the structural design of the footing is based on a specified compressive strength, f'c, no greater than 2,500 pounds per square inch (psi) (17.2 MPa) regardless of the compressive strength specified in the construction documents or used in the footing construction.
2. Continuous concrete footings supporting walls of buildings three stories or less above grade plane that are fully supported on earth or rock where:
   2.1. The footings support walls of light-frame construction;
   2.2. The footings are designed in accordance with Table 1809.7; or
   2.3. The structural design of the footing is based on a specified compressive strength, f'c, no greater than 2,500 pounds per square inch (psi) (17.2 MPa), regardless of the compressive strength specified in the construction documents or used in the footing construction.
3. Nonstructural concrete slabs supported directly on the ground, including prestressed slabs on grade, where the effective prestress in the concrete is less than 150 psi (1.03 MPa).
4. Concrete patios, driveways and sidewalks, on grade.

**14.04.160 Section 1705.13 of the 2022 Edition of the California Building Code is amended to read as follows.**

1705.13 Special inspections for seismic resistance. Special inspections for seismic resistance shall be required as specified in Sections 1705.13.1 through 1705.13.9, unless exempted by the exceptions of Section 1704.2.

Exception: The special inspections specified in Sections 1705.13.1 through 1705.13.9 are not required for structures designed and constructed in accordance with one of the following:

1. The structure consists of light-frame construction; the design spectral response acceleration at short periods, SDS, as determined in Section 1613.2.4, does not exceed 0.5; and the building height of the structure does not exceed 35 feet (10 668 mm).
2. The seismic force-resisting system of the structure consists of reinforced masonry or reinforced concrete; the design spectral response acceleration at short periods, SDS, as determined in Section 1613.2.4, does not exceed 0.5; and the building height of the structure does not exceed 25 feet (7620 mm).
3. The structure is a detached one- or two-family dwelling not exceeding two stories above grade plane, is not assigned to Seismic Design Category D, E or F, and does not have any of the following horizontal or vertical irregularities in accordance with Section 12.3 of ASCE 7:
   3.1. Torsional or extreme torsional irregularity.

3.2 Nonparallel systems irregularity.

3.3 Stiffness-soft story or stiffness-extreme soft story irregularity.

3.4 Discontinuity in lateral strength-weak story irregularity.

**14.04.165 Section 1807.1.4 of the 2022 Edition of the California Building Code is amended to read as follows.**

1807.1.4 Permanent wood foundation systems. Permanent wood foundation systems shall be designed and installed in accordance with AWC PWF. Lumber and plywood shall be treated in accordance with AWPA U1 (Commodity Specification A, Special Requirement 4.2) and shall be identified in accordance with Section 2303.1.9.1. Permanent wood foundation systems shall not be used for structures assigned to Seismic Design Category D, E or F.

**14.04.170 Section 1807.1.6 of the 2022 Edition of the California Building Code is amended to read as follows.**

1807.1.6 Prescriptive design of concrete and masonry foundation walls. Concrete and masonry foundation walls that are laterally supported at the top and bottom shall be permitted to be designed and constructed in accordance with this section. Prescriptive design of foundation walls shall not be used for structures assigned to Seismic Design Category D, E or F.

**14.04.176 Section 1807.2 of the 2022 Edition of the California Building Code is amended to read as follows.**

1807.2 Retaining walls. Retaining walls shall be designed in accordance with Section 1807.2.1 through 1807.2.4. Retaining walls assigned to Seismic Design Category D, E or F shall not be partially or wholly constructed of wood.

**14.04.177 Section 1807.3.1 of the 2022 Edition of the California Building Code is amended to read as follows.**

1807.3.1 Limitations. The design procedures outlined in this section are subject to the following limitations:

1. The frictional resistance for structural walls and slabs on silts and clays shall be limited to one-half of the normal force imposed on the soil by the weight of the footing or slab.
2. Posts embedded in earth shall not be used to provide lateral support for structural or nonstructural materials such as plaster, masonry or concrete unless bracing is provided that develops the limited deflection required.

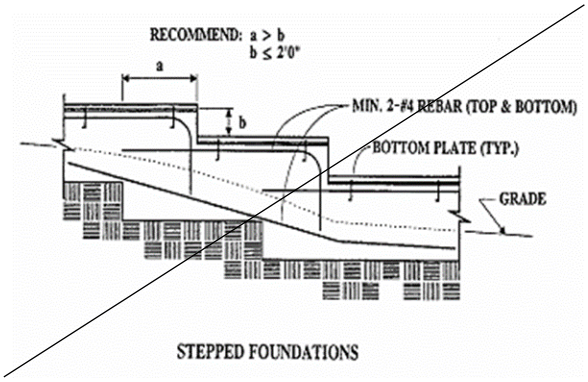
Wood poles shall be treated in accordance with AWPA U1 for sawn timber posts (Commodity Specification A, Use Category 4B) and for round timber posts (Commodity Specification B, Use Category 4B). Wood poles and posts embedded in direct contact with soil shall not be used for structures assigned to Seismic Design Category D, E or F.

~~Exception: Wood poles and posts embedded in direct contact with soil may be used to support nonhabitable, nonoccupiable structures such as fences when approved by the building official.~~

**~~14.04.178 Section 1809.3 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~1809.3 Stepped footings. The top surface of footings shall be level. The bottom surface of footings shall be permitted to have a slope not exceeding one unit vertical in 10 units horizontal (10-percent slope). Footings shall be stepped where it is necessary to change the elevation of the top surface of the footing or where the surface of the ground slopes more than one unit vertical in 10 units horizontal (10-percent slope).~~

~~For structures assigned to Seismic Design Category D, E or F, the stepping requirement shall also apply to the top surface of continuous footings supporting walls. Footings shall be reinforced with four No. 4 deformed reinforcing bars. Two bars shall be placed at the top and bottom of the footings as shown in Figure 1809.3.~~




**~~FIGURE 1809.3~~**
**~~STEPPED FOOTING~~**

**~~14.04.180 Section 1809.7 and Table 1809.7 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~1809.7 Prescriptive footings for light-frame construction. Where a specific design is not provided, concrete or masonry-unit footings supporting walls of light-frame construction shall be permitted to be designed in accordance with Table 1809.7. Light-frame construction using prescriptive footings in Table 1809.7 shall not exceed one story above grade plane for structures assigned to Seismic Design Category D, E or F.~~

~~TABLE 1809.7~~
~~PRESCRIPTIVE FOOTINGS SUPPORTING WALLS OF LIGHT-FRAME CONSTRUCTION a, b, c, d, e~~

~~Table 1809.7~~
~~Prescriptive Footings Supporting Walls of Light-Frame Construction[a, b, c, d, e]~~

**EXHIBIT 2**

| ~~Number of Floors Supported By The Footing[f]~~ | ~~Width of Footing (inches)~~ | ~~Thickness of Footing (inches)~~ |
|---|---|---|
| ~~1~~ | ~~12~~ | ~~6~~ |
| ~~2~~ | ~~15~~ | ~~6~~ |
| ~~3~~ | ~~18~~ | ~~8~~ |

~~For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm~~

~~a. Depth of footings shall be in accordance with Section 1809.4.~~

~~b. The ground under the floor shall be permitted to be excavated to the elevation of the top of the footing.~~

~~c. Not adopted.~~

~~d. See Section 1905 for additional requirements for concrete footings of structures assigned to Seismic Design Category C, D, E or F.~~

~~e. For thickness of foundation walls, see Section 1807.1.6.~~

~~f. Footings shall be permitted to support a roof addition to the stipulated number of floors. Footings supporting roof only shall be as required for supporting one floor.~~

**~~14.04.185 Section 1809.12 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~1809.12 Timber footings. Timber footings shall be permitted for buildings of Type V construction and as otherwise approved by the Building Official. Such footings shall be treated in accordance with AWPA U1 (Commodity Specification A, Use Category 4B). Treated timbers are not required where placed entirely below permanent water level, or where used as capping for wood piles that project above the water level over submerged or marsh lands. The compressive stresses perpendicular to grain in untreated timber footings supported on treated piles shall not exceed 70 percent of the allowable stresses for the species and grade of timber as specified in the ANSI/AWC NDS. Timber footings shall not be used in structures assigned to Seismic Design Category D, E or F.~~

**~~14.04.190 Section 1810.3.2.4 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~1810.3.2.4 Timber. Timber deep foundation elements shall be designed as piles or poles in accordance with ANSI/AWC NDS. Round timber elements shall conform to ASTM D 25. Sawn timber elements shall conform to DOC PS-20. Timber deep foundation elements shall not be used in structures assigned to Seismic Design Category D, E or F.~~

**EXHIBIT 2**

**~~14.04.210 Section 1905.1.7 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~1905.1.7 ACI 318, Section 14.1.4. Delete ACI 318, Section 14.1.4, and replace with the following:~~

~~14.1.4 - Plain concrete in structures assigned to Seismic Design Category C, D, E or F.~~

~~14.1.4.1 - Structures assigned to Seismic Design Category C, D, E or F shall not have elements of structural plain concrete, except as follows:~~

~~(a) Concrete used for fill with a minimum cement content of two (2) sacks of Portland cement or cementious material per cubic yard.~~

~~(b) Isolated footings of plain concrete supporting pedestals or columns are permitted, provided the projection of the footing beyond the face of the supported member does not exceed the footing thickness.~~

~~(c) Plain concrete footings supporting walls are permitted, provided the footings have at least two continuous longitudinal reinforcing bars. Bars shall not be smaller than No. 4 and shall have a total area of not less than 0.002 times the gross cross-sectional area of the footing. A minimum of one bar shall be provided at the top and bottom of the footing. Continuity of reinforcement shall be provided at corners and intersections.~~

~~Exception:~~

~~Detached one- and two-family dwellings three stories or less in height and constructed with stud-bearing walls, are permitted to have plain concrete footings with at least two continuous longitudinal reinforcing bars not smaller than No. 4 and are permitted to have a total area of longitudinal reinforcement less than 0.002 times the gross cross-sectional area of the footing.~~

**~~14.04.215 Section 1905.1 is amended and Sections 1905.1.9 through 1905.1.11 are added to Chapter 19 of the 2022 Edition of the California Building Code to read as follows.~~**

~~1905.1 General. The text of ACI 318 shall be modified as indicated in Sections 1905.1.1 through 1905.1.11.~~

~~1905.1.9 ACI 318, Section 18.7.5. Modify ACI 318, Section 18.7.5, by adding Section 18.7.5.8 and 18.7.5.9 as follows:~~

~~18.7.5.8 - Where the calculated point of contraflexure is not within the middle half of the member clear height, provide transverse reinforcement as specified in ACI 318 Sections 18.7.5.1, Items (a) through (c), over the full height of the member.~~

~~18.7.5.9 - At any section where the design strength, $\phi P_n$, of the column is less than the sum of the shears $V_e$ computed in accordance with ACI 318 Sections 18.7.6.1 and 18.6.5.1 for all the beams framing into the column above the level~~

~~under consideration, transverse reinforcement as specified in ACI 318 Sections 18.7.5.1 through 18.7.5.3 shall be provided. For beams framing into opposite sides of the column, the moment components are permitted to be assumed to be of opposite sign. For the determination of the design strength, $\phi P_n$, of the column, these moments are permitted to be assumed to result from the deformation of the frame in any one principal axis.~~

~~1905.1.10 ACI 318, Section 18.10.4. Modify ACI 318, Section 18.10.4, by adding Section 18.10.4.7 as follows:~~

~~18.10.4.7 - Walls and portions of walls with $P_u > 0.35P_o$ shall not be considered to contribute to the calculated shear strength of the structure for resisting earthquake-induced forces. Such walls shall conform to the requirements of ACI 318 Section 18.14.~~

~~1905.1.11 ACI318, Section 18.12.6. Modify ACI 318, by adding Section 18.12.6.2 as follows:~~

~~18.12.6.2 Collector and boundary elements in topping slabs placed over precast floor and roof elements shall not be less than 3 inches (76 mm) or 6 db in thickness, where db is the diameter of the largest reinforcement in the topping slab.~~

**~~14.04.216 Section 2304.10.2 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~2304.10.2 Fastener requirements. Connections for wood members shall be designed in accordance with the appropriate methodology in Section 2302.1. The number and size of fasteners connecting wood members shall not be less than that set forth in Table 2304.10.2. Staple fasteners in Table 2304.10.2 shall not be used to resist or transfer seismic forces in structures assigned to Seismic Design Category D, E or F.~~

~~Exception: Staples may be used to resist or transfer seismic forces when the allowable shear values are substantiated by cyclic testing and approved by the building official.~~

**~~14.04.217 Section 2304.10.3.1 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~2304.10.3.1 Quality of Nails. In Seismic Design Category D, E or F, mechanically driven nails used in wood structural panel shear walls shall meet the same dimensions as that required for hand-driven nails, including diameter, minimum length and minimum head diameter. Clipped head or box nails are not permitted in new construction. The allowable design value for clipped head nails in existing construction may be taken at no more than the nail-head-area ratio of that of the same size hand-driven nails.~~

**~~14.04.220 Section 2304.12.2.8 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~2304.12.2.8 Wood used in retaining walls and cribs. Wood installed in retaining or crib walls shall be preservative treated in accordance with AWPA U1 for soil and fresh~~

water use. Wood shall not be used in retaining or crib walls for structures assigned to Seismic Design Category D, E or F.

**14.04.225 Section 2305.4 is added to the 2022 Edition of the California Building Code to read as follows.**

2305.4 Hold-down connectors. In Seismic Design Category D, E or F, hold-down connectors shall be designed to resist shear wall overturning moments using approved cyclic load values or 75 percent of the allowable seismic load values that do not consider cyclic loading of the product. Connector bolts into wood framing shall require steel plate washers on the post on the opposite side of the anchorage device. Plate size shall be a minimum of 0.229 inch by 3 inches by 3 inches (5.82 mm by 76 mm by 76 mm) in size. Hold-down connectors shall be tightened to finger tight plus one half (1/2) wrench turn just prior to covering the wall framing.

**14.04.236 Section 2306.2 is added to the 2022 Edition of the California Building Code to read as follows.**

2306.2 Wood-frame diaphragms. Wood-frame diaphragms shall be designed and constructed in accordance with AWC SDPWS. Where panels are fastened to framing members with staples, requirements and limitations of AWC SDPWS shall be met and the allowable shear values set forth in Table 2306.2(1) or 2306.2(2) shall only be permitted for structures assigned to Seismic Design Category A, B, or C.

Exception: Allowable shear values where panels are fastened to framing members with staples may be used if such values are substantiated by cyclic testing and approved by the building official.

The allowable shear values in Tables 2306.2(1) and 2306.2(2) are permitted to be increased 40 percent for wind design.

Wood structural panels used to resist seismic diaphragm forces in structures assigned to Seismic Design Category D, E or F shall be applied directly to the framing members.

Exception: Wood structural panels are permitted to be fastened over solid lumber planking or laminated decking, provided the panel joints and lumber planking or laminated decking joints do not coincide.

**14.04.237 Section 2306.3 is added to the 2022 Edition of the California Building Code to read as follows.**

2306.3 Wood-frame shear walls. Wood-frame shear walls shall be designed and constructed in accordance with ANSI/AWC SDPWS. For structures assigned to Seismic Design Category D, E, or F, application of Table 4.3A of ANSI/AWC SDPWS shall include the following:

1. Wood structural panel thickness for shear walls shall not be less than 3/8 inch thick and studs shall not be spaced at more than 16 inches on center.

2. The maximum nominal unit shear capacities for 3/8 inch wood structural panels resisting seismic forces in structures assigned to Seismic Design Category D, E or F is 400 pounds per linear foot (plf).

   Exception: Other nominal unit shear capacities may be permitted if such values are substantiated by cyclic testing and approved by the building official.

3. Nails shall be placed not less than 1/2 inch in from the panel edges and not less than 3/8 inch from the edge of the connecting members for shear greater than 350 plf using ASD or 500 plf using LRFD. Nails shall be placed not less than 3/8 inch from panel edges and not less than 1/4 inch from the edge of the connecting members for shears of 350 plf or less using ASD or 500 plf or less using LRFD.

For structures assigned to Seismic Design Category D, E or F, application of Table 4.3B of ANSI/AWC SDPWS shall not be allowed.

For structures assigned to Seismic Design Category D, E or F, application of Table 4.3C of ANSI/AWC SDPWS shall not be used below the top level in a multi-level building.

Where panels are fastened to framing members with staples, requirements and limitations of AWC SDPWS shall be met and the allowable shear values set forth in Table 2306.3(1), 2306.3(2) or 2306.3(3) shall only be permitted for structures assigned to Seismic Design Category A, B, or C.

Exception: Allowable shear values where panels are fastened to framing members with staples may be used if such values are substantiated by cyclic testing and approved by the building official.

The allowable shear values in Tables 2306.3(1) and 2306.3(2) are permitted to be increased 40 percent for wind design. Panels complying with ANSI/APA PRP-210 shall be permitted to use design values for Plywood Siding in the ANSI/AWC SDPWS.

**14.04.238 Section 2307.2 is added to the 2022 Edition of the California Building Code to read as follows.**

2307.2 Wood-frame shear walls. Wood-frame shear walls shall be designed and constructed in accordance with Section 2306.3 as applicable.

**EXHIBIT 2**

**~~14.04.239 Table 2308.6.1 is added to the 2022 Edition of the California Building Code to read as follows.~~**

**TABLE 2308.6.1[a]**
**WALL BRACING REQUIREMENTS**

| SEISMIC DESIGN CATEGORY | STORY CONDITION (SEE SECTION 2308.2) | MAXIMUM SPACING OF BRACED WALL LINES | BRACED PANEL LOCATION, SPACING (O.C.) AND MINIMUM PERCENTAGE (X) | | | MAXIMUM DISTANCE OF BRACED WALL PANELS FROM EACH END OF BRACED WALL LINE |
|---|---|---|---|---|---|---|
| | | | Bracing method[b] | | | |
| | | | LIB | DWB, WSP | SFB, PBS, PCP, HPS, GB[c, d] | |
| A and B |  | 35′- 0″ | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| |  | 35′- 0″ | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| |  | 35′- 0″ | NP | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| C |  | 35′- 0″ | NP | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| |  | 35′- 0″ | NP | Each end and ≤ 25′- 0″ o.c. (minimum 25% of wall length)[e] | Each end and ≤ 25′- 0″ o.c. (minimum 25% of wall length)[e] | 12′- 6″ |
| D and E[f, g, h] |  | 25′- 0″ | NP | $S_{DS} < 0.50$: Each end and ≤ 25′- 0″ o.c. (minimum 21% of wall length)[e] | $S_{DS} < 0.50$: Each end and ≤ 25′- 0″ o.c. (minimum 43% of wall length)[e] | 8′- 0″ |
| | | | | $0.5 \le S_{DS} < 0.75$: Each end and ≤ 25′- 0″ o.c. (minimum 32% of wall length)[e] | $0.5 \le S_{DS} < 0.75$: Each end and ≤ 25′- 0″ o.c. (minimum 59% of wall length)[e] | |
| | | | | $0.75 \le S_{DS} \le 1.00$: Each end and ≤ 25′- 0″ o.c. (minimum 37% of wall length)[e] | $0.75 \le S_{DS} \le 1.00$: Each end and ≤ 25′- 0″ o.c. (minimum 75% of wall length) | |
| | | | | $S_{DS} > 1.00$: Each end and ≤ 25′- 0″ o.c. (minimum 48% of wall length)[e] | $S_{DS} > 1.00$: Each end and ≤ 25′- 0″ o.c. (minimum 100% of wall length)[e] | |

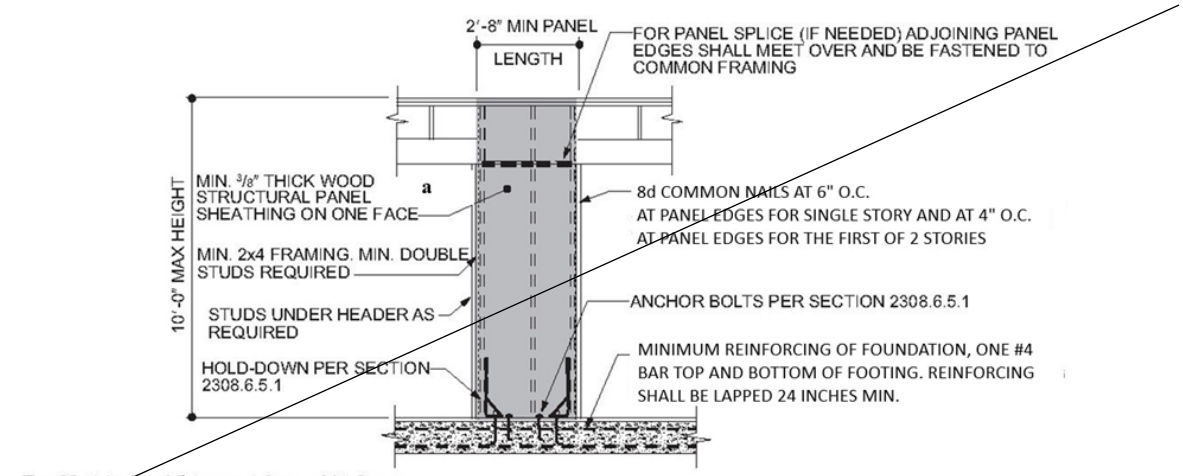
For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.
NP = Not Permitted.
a. This table specifies minimum requirements for braced wall panels along interior or exterior braced wall lines.
b. See Section 2308.6.3 for full description of bracing methods.
c. For Method GB, gypsum wallboard applied to framing supports that are spaced at 16 inches on center.
d. The required lengths shall be doubled for gypsum board applied to only one face of a braced wall panel.
e. Percentage shown represents the minimum amount of bracing required along the building length (or wall length if the structure has an irregular shape).
f. DWB, SFB, PBS and HPS wall braces are not permitted in Seismic Design Categories D or E.
g. Minimum length of panel bracing of one face of the wall for WSP sheathing shall be at least 4'-0" long or both faces of the wall for GB or PCP sheathing shall be at least 8'-0" long; h/w ratio shall not exceed 2:1. Wall framing to which sheathing used for bracing is applied shall be nominal 2 inch wide [actual 1 1/2 inch (38 mm)] or larger members and spaced a maximum of 16 inches on center. Braced wall panel construction types shall not be mixed within a braced wall line.
h. WSP sheathing shall be a minimum of 15/32" thick nailed with 8d common placed 3/8 inches from panel edges and spaced not more than 6 inches on center and 12 inches on center along intermediate framing members.

~~Sections 2308.6.5.1 and 2308.6.5.2 and Figures 2308.6.5.1 and 2308.6.5.2 of the 2022 Edition of the California Building Code are amended to read as follows:~~

~~2308.6.5.1 Alternate braced wall (ABW). An ABW shall be constructed in accordance with this section and Figure 2308.6.5.1. In one-story buildings, each panel shall have a length of not less than 2 feet 8 inches (813 mm) and a height of not more than 10 feet (3048 mm). Each panel shall be sheathed on one face with 3/8-inch (3.2 mm) minimum-thickness wood structural panel sheathing nailed with 8d common or galvanized box nails in accordance with Table 2304.10.1 and blocked at wood structural panel edges. For structures assigned to Seismic Design Category D or E, each panel shall be sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing nailed with 8d~~

~~common nails spaced 3 inches on panel edges, 3 inches at intermediate supports. Two anchor bolts installed in accordance with Section 2308.3.1 shall be provided in each panel. Anchor bolts shall be placed at each panel outside quarter points. Each panel end stud shall have a hold-down device fastened to the foundation, capable of providing an approved uplift capacity of not less than 1,800 pounds (8006 N). The hold-down device shall be installed in accordance with the manufacturer's recommendations. The ABW shall be supported directly on a foundation or on floor framing supported directly on a foundation that is continuous across the entire length of the braced wall line. This foundation shall be reinforced with not less than one No.4 bar top and bottom. Where the continuous foundation is required to have a depth greater than 12 inches (305 mm), a minimum 12-inch by 12-inch (305 mm by 305 mm) continuous footing is permitted at door openings in the braced wall line. This continuous footing shall be reinforced with not less than one No. 4 bar top and bottom. This reinforcement shall be lapped 24 inches (610 mm) with the reinforcement required in the continuous foundation located directly under the braced wall line.~~

~~Where the ABW is installed at the first story of two-story buildings, the wood structural panel sheathing shall be provided on both faces, three anchor bolts shall be placed at one-quarter points and tie-down device uplift capacity shall be not less than 3,000 pounds (13 344 N).~~




For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

a. For structures assigned to Seismic Design Category D or E, sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing.

**~~FIGURE 2308.6.5.1~~**
**~~ALTERNATE BRACED WALL PANEL (ABW)~~**

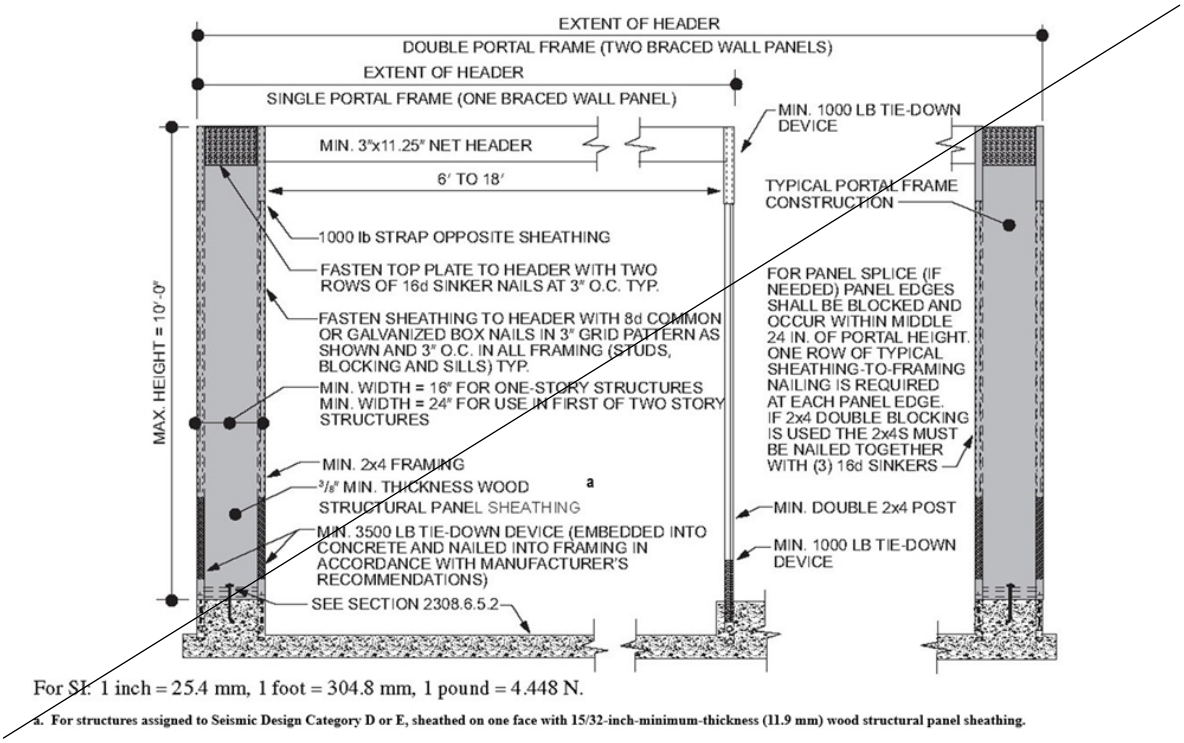
~~2308.6.5.2 Portal frame with hold-downs (PFH). A PFH shall be constructed in accordance with this section and Figure 2308.6.5.2. The adjacent door or window opening shall have a full-length header.~~
~~In one-story buildings, each panel shall have a length of not less than 16 inches (406 mm) and a height of not more than 10 feet (3048 mm). Each panel shall be sheathed on one face with a single layer of 3/8-inch (9.5 mm) minimum-thickness wood structural panel sheathing nailed with 8d common or galvanized box nails in accordance with Figure 2308.6.5.2. For structures assigned to Seismic Design Category D or E. each~~

~~panel shall be sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing nailed with 8d common nails spaced 3 inches on panel edges, 3 inches at intermediate supports and in accordance with Figure 2308.6.5.2. The wood structural panel sheathing shall extend up over the solid sawn or glued-laminated header and shall be nailed in accordance with Figure 2308.6.5.2. A built-up header consisting of at least two 2-inch by 12-inch (51 mm by 305 mm) boards, fastened in accordance with Item 24 of Table 2304.10.1 shall be permitted to be used. A spacer, if used, shall be placed on the side of the built-up beam opposite the wood structural panel sheathing. The header shall extend between the inside faces of the first full-length outer studs of each panel. The clear span of the header between the inner studs of each panel shall be not less than 6 feet (1829 mm) and not more than 18 feet (5486 mm) in length. A strap with an uplift capacity of not less than 1,000 pounds (4,400 N) shall fasten the header to the inner studs opposite the sheathing. One anchor bolt not less than 5/8 inch (15.9 mm) diameter and installed in accordance with Section 2308.3.1 shall be provided in the center of each sill plate. The studs at each end of the panel shall have a hold-down device fastened to the foundation with an uplift capacity of not less than 3,500 pounds (15 570 N).~~

~~Where a panel is located on one side of the opening, the header shall extend between the inside face of the first full-length stud of the panel and the bearing studs at the other end of the opening. A strap with an uplift capacity of not less than 1,000 pounds (4400 N) shall fasten the header to the bearing studs. The bearing studs shall also have a hold-down device fastened to the foundation with an uplift capacity of not less than 1,000 pounds (4400 N). The hold-down devices shall be an embedded strap type, installed in accordance with the manufacturer's recommendations. The PFH panels shall be supported directly on a foundation that is continuous across the entire length of the braced wall line. This foundation shall be reinforced with not less than one No. 4 bar top and bottom. Where the continuous foundation is required to have a depth greater than 12 inches (305 mm), a minimum 12-inch by 12-inch (305 mm by 305 mm) continuous footing is permitted at door openings in the braced wall line. This continuous footing shall be reinforced with not less than one No. 4 bar top and bottom. This reinforcement shall be lapped not less than 24 inches (610 mm) with the reinforcement required in the continuous foundation located directly under the braced wall line.~~

~~Where a PFH is installed at the first story of two-story buildings, each panel shall have a length of not less than 24 inches (610 mm).~~

**EXHIBIT 2**




For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm, 1 pound = 4.448 N.

a. For structures assigned to Seismic Design Category D or E, sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing.

**~~FIGURE 2308.6.5.2~~**
**~~PORTAL FRAME WITH HOLD-DOWNS (PFH)~~**

**~~14.04.241 Section 2308.6.8.1 is added to the 2022 Edition of the California Building Code to read as follows.~~**

~~2308.6.8.1 Foundation requirements. Braced wall lines shall be supported by continuous foundations.~~

~~Exception: For structures with a maximum plan dimension not more than 50 feet (15 240 mm), continuous foundations are required at exterior walls only for structures assigned to Seismic Design Category A, B, or C.~~

~~For structures in Seismic Design Categories D and E, exterior braced wall panels shall be in the same plane vertically with the foundation or the portion of the structure containing the offset shall be designed in accordance with accepted engineering practice and Section 2308.1.1.~~

**~~14.04.250 Section 2308.6.9 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~2308.6.9 Attachment of sheathing. Fastening of braced wall panel sheathing shall not be less than that prescribed in Tables 2308.6.1 or 2304.10.2. Wall sheathing shall not be attached to framing members by adhesives. Staple fasteners in Table 2304.10.2 shall not be used to resist or transfer seismic forces in structures assigned to Seismic Design Category D, E or F.~~

Exception: Staples may be used to resist or transfer seismic forces when the allowable shear values are substantiated by cyclic testing and approved by the building official.

All braced wall panels shall extend to the roof sheathing and shall be attached to parallel roof rafters or blocking above with framing clips (18 gauge minimum) spaced at maximum 24 inches (6096 mm) on center with four 8d nails per leg (total eight 8d nails per clip minimum). Braced wall panels shall be laterally braced at each top corner and at intervals not to exceed 24 inches (6096 mm) intervals along the top plate of discontinuous vertical framing.

**14.04.251 Section 3109.1.1 to the 2022 Edition of the California Building Code to read as follows.**

In addition to the requirements of Section 3109 in the California Building Code, a swimming pool, pool, spa or any body of water over 18 inches deep shall have an enclosure consisting of a fence, wall, portions of a building or other approved durable material, that isolates all bodies of water from the private building or structure. The enclosure shall be installed around the perimeter of the bodies of water, or at the perimeter of the property.

**14.04.252 Exception #6 of Section 3115.1 to Chapter 31 of the 2022 Edition of the California Building Code to read as follow:**

6. Single-unit stand-alone intermodal shipping containers used as temporary storage or construction trailer on active construction sites. Construction support facilities for uses and activities not directly associated with the actual processes of construction, including but not limited to, offices, meeting rooms, plan rooms, other administrative or support functions shall not be exempt from Section 3115.

**14.04.253 Section 3115.8.1 and Section 3115.8.1.2 of the 2022 Edition of the California Building Code are amended to read as follows.**

3115.8.1 Foundations and supports. Intermodal shipping containers repurposed for use as a permanent building or structure shall be supported on foundations or other supporting structures designed and constructed in accordance with Chapters 16 through 23.

3115.8.1.2 Stacking. Intermodal shipping containers used to support stacked units shall comply with Section 3115.8.4.

**14.04.254 Section 3115.8.2 of the 2022 Edition of the California Building Code is amended to read as follows.**

3115.8.2 Welds. The strength of new welds and connections shall be no less than the strength provided by the original connections. All new welds and connections shall be designed and constructed in accordance with Chapters 16, 17 and 22.

**EXHIBIT 2**

**~~14.04.255 Section 3115.8.4 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~3115.8.4 Detailed structural design procedure. A structural analysis meeting the requirements of this section shall be provided to the building official to demonstrate the structural adequacy of the intermodal shipping containers.~~

~~Exception: Structures using an intermodal shipping containers designed in accordance with Section 3115.8.5.~~

**~~14.04.256 Sections 3115.8.4.1, 3115.8.4.2, and 3115.8.4.3 of the 2022 Edition of the California Building Code are amended to read as follows.~~**

~~3115.8.4.1 Material properties. Structural material properties for existing intermodal shipping container steel components shall be established by Section 2202.~~

~~3115.8.4.2 Seismic design parameters. The seismic force-resisting system shall be designed and detailed in accordance with ASCE 7 and one of the following:~~

1. ~~Where all or portions of the profiled steel panel elements are considered to be the seismic force-resisting system, design and detailing shall be in accordance with AISI S100 and ASCE 7, Table 12.2-1 requirements for steel systems not specifically detailed for seismic resistance, excluding cantilevered column systems.~~
2. ~~Where all or portions of the profiled steel panel elements are not considered to be part of the seismic force-resisting system, an independent seismic force-resisting system shall be selected, and detailed in accordance with ASCE 7, Table 12.2-1, or~~
3. ~~Where all or portions of the profiled steel panel elements are retained and integrated into a seismic force-resisting system other than as permitted by Section 3115.8.4.2 Item 1, seismic design parameters shall be developed from testing and analysis in accordance with Section 104.11 and ASCE 7, Section 12.2.1.1 or 12.2.1.2.~~

~~3115.8.4.3 Allowable shear value. The allowable shear values for the profiled steel panel side walls and end walls shall be determined in accordance with the design approach selected in Section 3115.8.4.2. Where penetrations are made in the side walls or end walls designated as part of the lateral force-resisting system, the penetrations shall be substantiated by rational analysis.~~

**~~14.04.257 Section 3115.8.5.2 of the 2022 Edition of the California Building Code is amended to read as follows.~~**

~~3115.8.5.2 Simplified structural design assumptions. Where permitted by Section 3115.8.5.1, single-unit stand-alone, intermodal shipping containers shall be designed using the following assumptions for the profiled steel panel side walls and end walls:~~

1. ~~The appropriate detailing requirements contained in Chapters 16 through 23.~~
2. ~~Response modification coefficient, $R$ = 2.~~

3. Over strength factor, $\Omega_0 = 2.5$.

4. Deflection amplification factor, $C_d = 2$.

5. Limits on structural height, $h_n = 9.5$ feet (2900 mm).

**14.04.258 Section 3115.8.5.3 and Table 3115.8.5.3 of the 2022 Edition of the California Building Code are amended to read as follows.**

3115.8.5.3 Allowable shear value. The allowable shear values for the profiled steel panel side walls (longitudinal) and end walls (transverse) for wind design and seismic design using the coefficients of Section 3115.8.5.2 shall be in accordance with Table 3115.8.5.3, provided that all of the following conditions are met:

1. The total linear length of all openings in any individual side walls or end walls shall be limited to not more than 50 percent of the length of that side walls or end walls, as shown in Figure 3115.8.5.3(1).

2. Any full height wall length, or portion thereof, less than 4 feet (305 mm) long shall not be considered as a portion of the lateral force-resisting system, as shown in Figure 3115.8.5.3(2).

3. All side walls or end walls used as part of the lateral force-resisting system shall have an existing or new boundary element on all sides to form a continuous load path, or paths, with adequate strength and stiffness to transfer all forces from the point of application to the final point of resistance, as shown in Figure 3115.8.5.3(3). The existing door interlocking mechanism shall not be considered as a component of the required load path.

4. Where openings are made in container walls, floors or roofs, for doors, windows and other openings:

   4.1 The opening shall be framed with steel elements that are designed in accordance with Chapters 16 and 22.

   4.2 The cross section and material grade of any new steel element shall be equal to or greater than the steel element removed.

5. A maximum of one penetration not greater than a 6-inch (152 mm) diameter hole for conduits, pipes, tubes or vents, or not greater than16 square inches (10 322$mm^2$) for electrical boxes, is permitted for each individual 8 feet (2438 mm) length of lateral force-resisting wall. Penetrations located in walls that are not part of the wall lateral force resisting system shall not be limited in size or quantity. Existing intermodal shipping container's vents shall not be considered a penetration, as shown in Figure 3115.8.5.3(4).

6. End wall door or doors designated as part of the lateral force-resisting system shall be intermittently welded closed around the full perimeters of the door panels.

TABLE 3115.8.5.3
ALLOWABLE SHEAR VALUES FOR PROFILED STEEL PANEL SIDE WALLS AND END WALLS FOR WIND OR SEISMIC LOADING

**EXHIBIT 2**

| CONTAINER DESIGNATION [b] | CONTAINER DIMENSION (Nominal Length) | CONTAINER DIMENSION (Nominal Height) | ALLOWABLE SHEAR VALUES (PLF)[a,c] | |
|---|---|---|---|---|
| | | | Side Wall | End Wall |
| 1EEE | 45 feet (13.7 M) | 9.5 feet (2896 mm) | 75 | 843 |
| 1EE | | 8.6 feet (2591 mm) | | |
| 1AAA | 40 feet (12.2 M) | 9.5 feet (2896 mm) | 84 | |
| 1AA | | 8.5 feet (2592 mm) | | |
| 1A | | 8.0 feet (2438 mm) | | |
| 1AX | | <8.0 feet (2483 mm) | | |
| 1BBB | 30 feet (9.1 M) | 9.5 feet (2896 mm) | 112 | |
| 1BB | | 8.5 feet (2591 mm) | | |
| 1B | | 8.0 feet (2438 mm) | | |
| 1BX | | <8.0 feet (2438 mm) | | |
| 1CC | 20 feet (9.1 M) | 8.5 feet (2591 mm) | 168 | |
| 1C | | 8.0 feet (2438 mm) | | |
| 1CX | | <8.0 feet (2438 mm) | | |

a. The allowable shear values for the side walls and end walls of the intermodal shipping containers are derived from ISO 1496-1 and reduced by a factor of safety of 5.

b. Container designation type is derived from ISO 668.

c. Limitations of Sections 3115.8.5.1 and 3115.8.5.3 shall apply.

**14.04.259 Section J103.2 of the 2022 Edition of the California Building Code is amended to read as follows.**

8. An excavation that does not exceed 50 cubic yards (38.3 m3) and complies with (a) or (b) as follows:

(a) Is less than 2 feet (0.6 m) in depth.

(b) Does not create a cut slope greater than 5 feet (1.5 m) measured vertically upward from the cut surface to the surface of the natural grade and is not steeper than 2 units horizontal to 1 unit vertical (50 percent slope).

**14.04.260 Section R301.1.3.2 of the 2022 Edition of the California Residential Code is amended to read as follows.**

R301.1.3.2 Woodframe structures. The building official shall require construction documents to be approved and stamped by a California licensed architect or engineer for all dwellings of woodframe construction more than two stories and basement in height located in Seismic Design Category A, B or C. Notwithstanding other sections of

law; the law establishing these provisions is found in Business and Professions Code Sections 5537 and 6737.1.

The building official shall require construction documents to be approved and stamped by a California licensed architect or engineer for all dwellings of woodframe construction more than one story in height or with a basement located in Seismic Design Category D 0, D 1, or D 2.

**14.04.265 Section R301.1.5 is added to the 2022 Edition of the California Residential Code to read as follows.**

R301.1.5 Seismic design provisions for buildings constructed on or into slopes steeper than one unit vertical in three units horizontal (33.3 percent slope). The design and construction of new buildings and additions to existing buildings when constructed on or into slopes steeper than one unit vertical in three units horizontal (33.3 percent slope) shall comply with Section 1613.6 of the California Building Code.

**14.04.266 Items 1, 3, and 5 of Section R301.2.2.6 of the 2022 Edition of the California Residential Code are amended to read as follows.**

1. Shear wall or braced wall offsets out of plane. Conditions where exterior shear wall lines or braced wall panels are not in one plane vertically from the foundation to the uppermost story in which they are required.
3. Shear wall or braced wall offsets in plane. Conditions where the end of a braced wall panel occurs over an opening in the wall below.
5. Floor level offset. Conditions where portions of a floor level are vertically offset.

**14.04.267 Section R301.2.2.11 is added to the 2022 Edition of the California Residential Code to read as follows.**

R301.2.2.11 Anchorage of mechanical, electrical, or plumbing components and equipment. Mechanical, electrical, or plumbing components and equipment shall be anchored to the structure. Anchorage of the components and equipment shall be designed to resist loads in accordance with the California Building Code and ASCE 7, except where the component is positively attached to the structure and flexible connections are provided between the component and associated ductwork, piping, and conduit; and either

1. The component weighs 400 lb (1,780 N) or less and has a center of mass located 4 ft (1.22 m) or less above the supporting structure; or
2. The component weighs 20 lb (89N) or less or, in the case of a distributed system, 5 lb/ft (73 N/m) or less.

**EXHIBIT 2**

**14.04.270 Section R401.1 of the 2022 Edition of the California Residential Code is amended to read as follows.**

R401.1 Application. The provisions of this chapter shall control the design and construction of the foundation and foundation spaces for buildings. In addition to the provisions of this chapter, the design and construction of foundations in flood hazard areas as established by Table R301.2 shall meet the provisions of Section R322. Wood foundations shall be designed and installed in accordance with AWC PWF.

Exception: The provisions of this chapter shall be permitted to be used for wood foundations only in the following situations:

1. In buildings that have no more than two floors and a roof.
2. When interior basement and foundation walls are constructed at intervals not exceeding 50 feet (15 240 mm).

Wood foundations in Seismic Design Category $D_0$, $D_1$, or $D_2$ shall not be permitted.

Exception: In non-occupied, single-story, detached storage sheds and similar uses other than carport or garage, provided the gross floor area does not exceed 200 square feet, the plate height does not exceed 12 feet in height above the grade plane at any point, and the maximum roof projection does not exceed 24 inches.

**14.04.275 Sections R403.1.2, R403.1.3.6, R403.1.5 of the 2022 Edition of the California Residential Code are amended to read as follows.**

R403.1.2 Continuous footing in Seismic Design Categories $D_0$, $D_1$, or $D_2$. Exterior walls of buildings located in Seismic Design Categories $D_0$, $D_1$ and $D_2$ shall be supported by continuous solid or fully grouted masonry or concrete footings. Required interior braced wall panels in buildings located in Seismic Design Categories $D_0$, $D_1$, or $D_2$ shall be supported on continuous foundations.

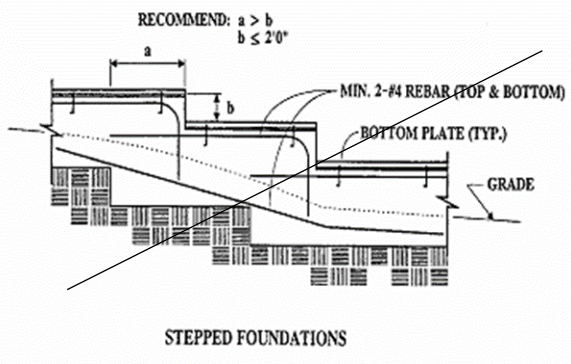
R403.1.3.6 Isolated concrete footings. In detached one- and two-family dwellings located in Seismic Design Category A, B, or C, that are three stories or less in height, and constructed with stud bearing walls, isolated plain concrete footings supporting columns or pedestals are permitted.

R403.1.5 Slope. The top surface of footings shall be level. The bottom surface of footings shall not have a slope exceeding one unit vertical in 10 units horizontal (10-percent slope). Footings shall be stepped where it is necessary to change the elevation of the top surface of the footings or where the slope of the bottom surface of the footings will exceed one unit vertical in 10 units horizontal (10-percent slope).

For structures assigned to Seismic Design Categories $D_0$, $D_1$, or $D_2$, stepped footings shall be reinforced with four No. 4 rebar. Two bars shall be place at the top and bottom of the footings as shown in Figure R403.1.5.

**EXHIBIT 2**

**~~FIGURE R403.1.5 STEPPED FOOTING~~**




**~~14.04.280 Section R404.2 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

~~R404.2 Wood foundation walls. Wood foundation walls shall be constructed in accordance with the provisions of Sections R404.2.1 through R404.2.6 and with the details shown in Figures R403.1(2) and R403.1(3). Wood foundation walls shall not be used for structures located in Seismic Design Category $D_0$, $D_1$, or $D_2$.~~

**~~14.04.282 Section R501.2 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

~~R501.2 Requirements. Floor construction shall be capable of accommodating all loads in accordance with Section R301 and of transmitting the resulting loads to the supporting structural elements. Mechanical or plumbing fixtures and equipment shall be attached or anchored to the structure in accordance with Section R301.2.2.11.~~

**~~14.04.285 Lines 20, 21, 24, and 34-37 of Table R602.3(1) of the 2022 Edition of the California Residential Code are amended to read as follows.~~**

~~TABLE R602.3(1)—continued FASTENING SCHEDULE~~

| ~~ITEM~~ | ~~DESCRIPTION OF BUILDING ELEMENTS~~ | ~~NUMBER AND TYPE OF FASTENER[a, b, c]~~ | ~~SPACING AND LOCATION~~ |
|---|---|---|---|
| ~~20[k]~~ | ~~1" × 6" sheathing to each bearing~~ | ~~3-8d box (2½" × 0.113"); or 2-8d common (2½" × 0.131"); or 2-10d box (3" × 0.128"); or 2 staples, 1" crown, 16 ga., 1¾" long~~ | ~~Face nail~~ |
| ~~21[k]~~ | ~~1" × 8" and wider sheathing to each bearing~~ | ~~3-8d box (2½" × 0.113"); or 3-8d common (2½" × 0.131"); or 3-10d box (3" × 0.128"); or 3 staples, 1" crown, 16 ga., 1¾" long~~ | ~~Face nail~~ |

**EXHIBIT 2**

| | | | | |
|---|---|---|---|---|
| | | Wider than 1" × 8"<br>4-8d box (2½" × 0.113"); or<br>3-8d common (2½" × 0.131"); or<br>3-10d box (3" × 0.128"); or<br>4 staples, 1" crown, 16 ga., 1¾" long | | |
| **Floor** | | | | |
| 24[k] | 1" × 6" subfloor or less to each joist | 3-8d box (2½" × 0.113"); or<br>2-8d common (2½" × 0.131"); or<br>3-10d box (3" × 0.128"); or<br>2 staples, 1" crown, 16 ga., 1¾" long | Face nail | |
| **Other wall sheathing**[g] | | | | |
| 34[k] | ½" structural cellulosic fiberboard sheathing | 1½" × 0.120" galvanized roofing nail, 7/16" head diameter, or 1¼" long 16 ga. staple with 7/16" or 1" crown | 3 | 6 |
| 35[k] | 25/32" structural cellulosic fiberboard sheathing | 1¾" × 0.120" galvanized roofing nail, 7/16" head diameter, or 1¼" long 16 ga. staple with 7/16" or 1" crown | 3 | 6 |
| 36[k] | ½" gypsum sheathing[d] | 1½" × 0.120" galvanized roofing nail, 7/16" head diameter, or 1¼" long, 16 ga.; staple galvanized, 1½" long; 7/16" or 1" crown or 1¼" screws, Type W or S | 7 | 7 |
| 37[k] | ⅝" gypsum sheathing[d] | 1¾" galvanized roofing nail, 7/16" head diameter, or 1¼" long, 16 ga.;<br>staple galvanized, 1½" long; 7/16" or 1" crown or 1¼" screws, Type W or S | 7 | 7 |

TABLE R602.3(1) - continued FASTENING SCHEDULE

k. Use of staples in roof, floor, and braced wall panels shall be prohibited in Seismic Design Category $D_0$, $D_1$, or $D_2$.

**14.04.290 Footnote "b" of Table R602.3(2) of the 2022 Edition of the California Residential Code is amended to read as follows.**

b. Staples shall have a minimum crown width of 7/16-inch on diameter except as noted.

~~Use of staples in roof, floor, subfloor, and braced wall panels shall be prohibited in Seismic Design Category D0, D1, or D2.~~

**~~14.04.291 Section R602.3.2, Exception and Table R602.3.2 of the 2022 Edition of the California Residential Code are amended to read as follows.~~**

~~Exception: In other than Seismic Design Category D0, D1 or D2, a single top plate used as an alternative to a double top plate shall comply with the following:~~

1. ~~The single top plate shall be tied at corners, intersecting walls, and at in-line splices in straight wall lines in accordance with Table R602.3.2.~~
2. ~~The rafters or joists shall be centered over the studs with a tolerance of not more than 1 inch (25 mm).~~
3. ~~Omission of the top plate is permitted over headers where the headers are adequately tied to adjacent wall sections in accordance with Table R602.3.2.~~

TABLE R602.3.2
SINGLE TOP-PLATE SPLICE CONNECTION DETAILS

| CONDITION | TOP-PLATE SPLICE LOCATION | | | |
|---|---|---|---|---|
| | Corners and intersecting walls | | Butt joints in straight walls | |
| | Splice plate size | Minimum nails each side of joint | Splice plate size | Minimum nails each side of joint |
| Structures in SDC A-C | 3″ × 6″ × 0.036″ galvanized steel plate or equivalent | (6) 8d box ($2^1/_2$″ × 0.113″) nails | 3′ × 12″ × 0.036″ galvanized steel plate or equivalent | (12) 8d box ($2^1/_2$″ × 0.113″) nails |

For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

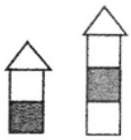
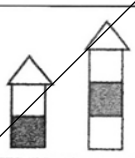
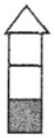
**~~14.04.292 Section R602.10.2.3 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

~~R602.10.2.3 Minimum number of braced wall panels. Braced wall lines with a length of 16 feet (4877 mm) or less shall have not less than two braced wall panels of any length or one braced wall panel equal to 48 inches (1219 mm) or more. Braced wall lines greater than 16 feet (4877 mm) shall have not less than two braced wall panels. In Seismic Design Category D0, D1, or D2, no braced wall panel shall have a contributing length less than 48 inches in length or as required in Section R602.10.3, whichever is greater.~~

**EXHIBIT 2**

**~~14.04.293 Table R602.10.3(3) of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

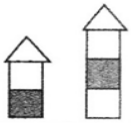
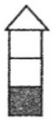
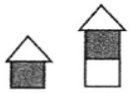
TABLE R602.10.3(3)
BRACING REQUIREMENTS BASED ON SEISMIC DESIGN CATEGORY

| • WALL HEIGHT = 10 FEET<br>• 10 PSF FLOOR DEAD LOAD<br>• 15 PSF ROOF/CEILING DEAD LOAD<br>• BRACED WALL LINE SPACING ≤ 25 FEET | | | MINIMUM TOTAL LENGTH (FEET) OF BRACED WALL PANELS REQUIRED ALONG EACH BRACED WALL LINE[a, g] | | | | |
|---|---|---|---|---|---|---|---|
| Seismic Design Category[b] | Story Location | Braced Wall Line Length (feet)[c] | Method LIB[d] | Method GB | Methods DWB, SFB, PBS, PCP, HPS, CS-SFB[e] | Methods WSP, ABW[f], PFH[f] and PFG[e, f] | Methods CS-WSP, CS-G, CS-PF |
| C (townhouses only) |  | 10 | 2.5 | 2.5 | 2.5 | 1.6 | 1.4 |
| | | 20 | 5.0 | 5.0 | 5.0 | 3.2 | 2.7 |
| | | 30 | 7.5 | 7.5 | 7.5 | 4.8 | 4.1 |
| | | 40 | 10.0 | 10.0 | 10.0 | 6.4 | 5.4 |
| | | 50 | 12.5 | 12.5 | 12.5 | 8.0 | 6.8 |
| |  | 10 | NP | 4.5 | 4.5 | 3.0 | 2.6 |
| | | 20 | NP | 9.0 | 9.0 | 6.0 | 5.1 |
| | | 30 | NP | 13.5 | 13.5 | 9.0 | 7.7 |
| | | 40 | NP | 18.0 | 18.0 | 12.0 | 10.2 |
| | | 50 | NP | 22.5 | 22.5 | 15.0 | 12.8 |
| |  | 10 | NP | 6.0 | 6.0 | 4.5 | 3.8 |
| | | 20 | NP | 12.0 | 12.0 | 9.0 | 7.7 |
| | | 30 | NP | 18.0 | 18.0 | 13.5 | 11.5 |
| | | 40 | NP | 24.0 | 24.0 | 18.0 | 15.3 |
| | | 50 | NP | 30.0 | 30.0 | 22.5 | 19.1 |
| $D_0$ |  | 10 | NP | 5.6 | 5.6 | 1.8 | 1.6 |
| | | 20 | NP | 11.0 | 11.0 | 3.6 | 3.1 |
| | | 30 | NP | 16.6 | 16.6 | 5.4 | 4.6 |
| | | 40 | NP | 22.0 | 22.0 | 7.2 | 6.1 |
| | | 50 | NP | 27.6 | 27.6 | 9.0 | 7.7 |
| |  | 10 | NP | NP | NP | 3.8 | 3.2 |
| | | 20 | NP | NP | NP | 7.5 | 6.4 |
| | | 30 | NP | NP | NP | 11.3 | 9.6 |
| | | 40 | NP | NP | NP | 15.0 | 12.8 |
| | | 50 | NP | NP | NP | 18.8 | 16.0 |
| |  | 10 | NP | NP | NP | 5.3 | 4.5 |
| | | 20 | NP | NP | NP | 10.5 | 9.0 |
| | | 30 | NP | NP | NP | 15.8 | 13.4 |
| | | 40 | NP | NP | NP | 21.0 | 17.9 |
| | | 50 | NP | NP | NP | 26.3 | 22.3 |

*(continued)*

**EXHIBIT 2**

TABLE R602.10.3(3)—continued
BRACING REQUIREMENTS BASED ON SEISMIC DESIGN CATEGORY

| • WALL HEIGHT = 10 FEET<br>• 10 PSF FLOOR DEAD LOAD<br>• 15 PSF ROOF/CEILING DEAD LOAD<br>• BRACED WALL LINE SPACING ≤ 25 FEET | | | MINIMUM TOTAL LENGTH (FEET) OF BRACED WALL PANELS REQUIRED ALONG EACH BRACED WALL LINE[a, g] | | | | |
|---|---|---|---|---|---|---|---|
| Seismic Design Category[b] | Story Location | Braced Wall Line Length (feet)[c] | Method LIB[d] | Method GB | Methods DWB, SFB, PBS, PCP, HPS, CS-SFB[e] | Methods WSP, ABW[f], PFH[f] and PFG[e, f] | Methods CS-WSP, CS-G, CS-PF |
| $D_1$ |  | 10 | NP | 6.0 | 6.0 | 2.0 | 1.7 |
| | | 20 | NP | 12.0 | 12.0 | 4.0 | 3.4 |
| | | 30 | NP | 18.0 | 18.0 | 6.0 | 5.1 |
| | | 40 | NP | 24.0 | 24.0 | 8.0 | 6.8 |
| | | 50 | NP | 30.0 | 30.0 | 10.0 | 8.5 |
| |  | 10 | NP | NP | NP | 4.5 | 3.8 |
| | | 20 | NP | NP | NP | 9.0 | 7.7 |
| | | 30 | NP | NP | NP | 13.5 | 11.5 |
| | | 40 | NP | NP | NP | 18.0 | 15.3 |
| | | 50 | NP | NP | NP | 22.5 | 19.1 |
| |  | 10 | NP | NP | NP | 6.0 | 5.1 |
| | | 20 | NP | NP | NP | 12.0 | 10.2 |
| | | 30 | NP | NP | NP | 18.0 | 15.3 |
| | | 40 | NP | NP | NP | 24.0 | 20.4 |
| | | 50 | NP | NP | NP | 30.0 | 25.5 |
| $D_2$[h] |  | 10 | NP | 8.0 | 8.0 | 2.5 | 2.1 |
| | | 20 | NP | 16.0 | 16.0 | 5.0 | 4.3 |
| | | 30 | NP | 24.0 | 24.0 | 7.5 | 6.4 |
| | | 40 | NP | 32.0 | 32.0 | 10.0 | 8.5 |
| | | 50 | NP | 40.0 | 40.0 | 12.5 | 10.6 |
| |  | 10 | NP | NP | NP | 5.5 | 4.7 |
| | | 20 | NP | NP | NP | 11.0 | 9.4 |
| | | 30 | NP | NP | NP | 16.5 | 14.0 |
| | | 40 | NP | NP | NP | 22.0 | 18.7 |
| | | 50 | NP | NP | NP | 27.5 | 23.4 |
| | Three-story dwelling | 10 | NP | NP | NP | NP | NP |
| | | 20 | NP | NP | NP | NP | NP |
| | | 30 | NP | NP | NP | NP | NP |
| | | 40 | NP | NP | NP | NP | NP |
| | | 50 | NP | NP | NP | NP | NP |
| | Cripple wall below one- or two-story dwelling | 10 | NP | NP | NP | 7.5 | 6.4 |
| | | 20 | NP | NP | NP | 15.0 | 12.8 |
| | | 30 | NP | NP | NP | 22.5 | 19.1 |
| | | 40 | NP | NP | NP | 30.0 | 25.5 |
| | | 50 | NP | NP | NP | 37.5 | 31.9 |

*(continued)*

~~a. Linear interpolation shall be permitted.~~

~~b. Interpolation of bracing length between the $S_{ds}$ values associated with the seismic design categories shall be permitted when a site-specific $S_{ds}$ value is determined in accordance with Section 1613.2 of the California Building Code.~~

~~c. Where the braced wall line length is greater than 50 feet, braced wall lines shall be permitted to be divided into shorter segments having lengths of 50 feet or less, and the amount of bracing within each segment shall be in accordance with this table.~~

~~d. Method LIB shall have gypsum board fastened to not less than one side with nails or screws in accordance with Table R602.3(1) for exterior sheathing or Table R702.3.5 for interior gypsum board. Spacing of fasteners at panel edges shall not exceed 8 inches.~~

~~e. Methods PFG and CS-SFB do not apply in Seismic Design Categories $D_0$, $D_1$ and $D_2$.~~

**EXHIBIT 2**

~~f. Methods PFH, PFG and ABW are only permitted on a single story or a first of two stories.~~

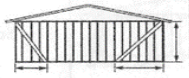
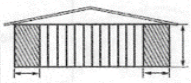
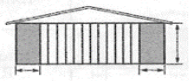
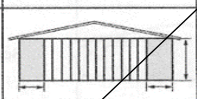
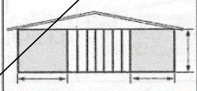
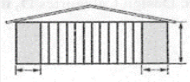
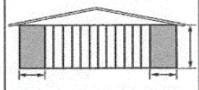
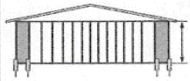
~~g. Where more than one bracing method is used, mixing methods shall be in accordance with Section R602.10.4.1.~~

~~h. One- and two-family dwellings in Seismic Design Category $D_2$ exceeding two stories shall be designed in accordance with accepted engineering practice.~~

~~i. Methods GB and PCP braced wall panel h/w ratio shall not exceed 1:1 in SDC $D_0$, $D_1$ and $D_2$. Methods DWB, SFB, PBS, HPS, and CS-SFB are not permitted in $D_0$, $D_1$ and $D_2$.~~

**~~14.04.294 Table R602.10.4 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

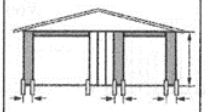
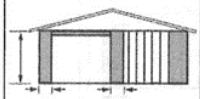
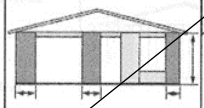
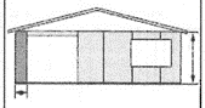
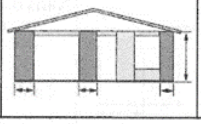
**TABLE R602.10.4**
**BRACING METHODS**

| | METHODS, MATERIAL | MINIMUM THICKNESS | FIGURE | CONNECTION CRITERIA[a] | |
|---|---|---|---|---|---|
| | | | | Fasteners | Spacing |
| Intermittent Bracing Methods | **LIB** Let-in-bracing | 1 × 4 wood or approved metal straps at 45° to 60° angles for maximum 16″ stud spacing |  | Wood: 2-8d common nails or 3-8d ($2^1/_2$″ long × 0.113″ dia.) nails | Wood: per stud and top and bottom plates |
| | | | | Metal strap: per manufacturer | Metal: per manufacturer |
| | **DWB** Diagonal wood boards | $^3/_4$″ (1″ nominal) for maximum 24″ stud spacing |  | 2-8d ($2^1/_2$″ long × 0.113″ dia.) nails or 2-$1^3/_4$″ long staples | Per stud |
| | **WSP** Wood structural panel (See Section R604) | $^3/_8$″ |  | 8d common (2 1/2" x 0.131) nails 3/8" edge distance to panel edge | 6″ edges 12″ field |
| | | | | 8d common (2 1/2" x 0.131) nails 3/8" edge distance to panel edge | Varies by fastener |
| | **BV-WSP**[e] Wood structural panels with stone or masonry veneer (See Section R602.10.6.5) | $^7/_{16}$″ | See Figure R602.10.6.5.2 | 8d common ($2^1/_2$″ × 0.131) nails | 4″ at panel edges 12″ at intermediate supports 4″ at braced wall panel end posts |
| | **SFB** Structural fiberboard sheathing | $^1/_2$″ or $^{25}/_{32}$″ for maximum 16″ stud spacing |  | $1^1/_2$″ long × 0.12″ dia. (for $^1/_2$″ thick sheathing) $1^3/_4$″ long × 0.12″ dia. (for $^{25}/_{32}$″ thick sheathing) galvanized roofing nails | 3″ edges 6″ field |
| | **GB** Gypsum board | $^1/_2$″ |  | Nails or screws per Table R602.3(1) for exterior locations | For all braced wall panel locations: 7″edges (including top and bottom plates) 7″ field |
| | | | | Nails or screws per Table R702.3.5 for interior locations | |
| | **PBS** Particleboard sheathing (See Section R605) | $^3/_8$″ or $^1/_2$″ for maximum 16″stud spacing |  | For $^3/_8$″, 6d common (2″ long × 0.113″ dia.) nails; For $^1/_2$″, 8d common ($2^1/_2$″ long × 0.131″ dia.) nails | 3″ edges 6″ field |
| | **PCP** Portland cement plaster | See Section R703.6 for maximum 16″ stud spacing |  | $1^1/_2$″ long, 11 gage, 0.120″ dia., $^7/_{16}$″ dia. head nails or $^7/_8$″ long, 16 gage staples | 6″ o.c. on all framing members |
| | **HPS** Hardboard panel siding | $^7/_{16}$″ for maximum 16″ stud spacing |  | 0.092″ dia., 0.225″ dia. head nails with length to accommodate $1^1/_2$″ penetration into studs | 4″ edges 8″ field |
| | **ABW** Alternate braced wall | $^3/_8$″ |  | See Section R602.10.6.1 | See Section R602.10.6.1 |

*(continued)*

**EXHIBIT 2**

**TABLE R602.10.4—continued**
**BRACING METHODS**

| | METHODS, MATERIAL | MINIMUM THICKNESS | FIGURE | CONNECTION CRITERIA[a] | |
|---|---|---|---|---|---|
| | | | | Fasteners | Spacing |
| Intermittent Bracing Methods | **PFH** Portal frame with hold-downs | 3/8" |  | See Section R602.10.6.2 | See Section R602.10.6.2 |
| | **PFG** Portal frame at garage | 7/16" |  | See Section R602.10.6.3 | See Section R602.10.6.3 |
| Continuous Sheathing Methods | **CS-WSP** Continuously sheathed wood structural panel | 3/8" |  | 8d common (2 1/2" x 0.131) nails 3/8" edge distance to panel edge | 6" edges 12" field |
| | | | | 8d common (2 1/2" x 0.131) nails 3/8" edge distance to panel edge | Varies by fastener |
| | **CS-G**[b,c] Continuously sheathed wood structural panel adjacent to garage openings | 3/8" |  | See Method CS-WSP | See Method CS-WSP |
| | **CS-PF** Continuously sheathed portal frame | 7/16" |  | See Section R602.10.6.4 | See Section R602.10.6.4 |
| | **CS-SFB**[d] Continuously sheathed structural fiberboard | 1/2" or 25/32" for maximum 16" stud spacing |  | 1 1/2" long × 0.12" dia. (for 1/2" thick sheathing) 1 3/4" long × 0.12" dia. (for 25/32" thick sheathing) galvanized roofing nails | 3" edges 6" field |

For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm, 1 degree = 0.0175 rad, 1 pound per square foot = 47.8 N/m$^2$, 1 mile per hour = 0.447 m/s.

a. Adhesive attachment of wall sheathing, including Method GB, shall not be permitted in Seismic Design Categories C, $D_0$, $D_1$ and $D_2$.

b. Applies to panels next to garage door opening where supporting gable end wall or roof load only. Shall only be used on one wall of the garage. In Seismic Design Categories $D_0$, $D_1$ and $D_2$, roof covering dead load shall not exceed 3 psf.

c. Garage openings adjacent to a Method CS-G panel shall be provided with a header in accordance with Table R602.7(1). A full-height clear opening shall not be permitted adjacent to a Method CS-G panel.

d. Method CS-SFB does not apply in Seismic Design Categories $D_0$, $D_1$ and $D_2$.

e. Method applies to detached one- and two- family dwellings in Seismic Design Categories $D_0$ through $D_2$ only.

f. Methods GB and PCP braced wall panel h/w ratio shall not exceed 1:1 in SDC $D_0$, $D_1$ and $D_2$. Methods LIB, DWB, SFB, PBS, HPS, and PFG are not permitted in SDC $D_0$, $D_1$ and $D_2$.

g. Use of stapes in braced wall panels shall be prohibited in SDC $D_0$, $D_1$ and $D_2$.

**EXHIBIT 2**

**~~14.04.295.1 Table R602.10.5 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

**TABLE R602.10.5**
**MINIMUM LENGTH OF BRACED WALL PANELS**

| METHOD (See Table R602.10.4) | | MINIMUM LENGTH[a] (inches) Wall Height 8 feet | 9 feet | 10 feet | 11 feet | 12 feet | CONTRIBUTING LENGTH (inches) |
|---|---|---|---|---|---|---|---|
| DWB, WSP, SFB, PBS, PCP, HPS, BV-WSP | | 48 | 48 | 48 | 53 | 58 | Actual[b] |
| GB | | 48 | 48 | 48 | 53 | 58 | Double sided = Actual<br>Single sided = 0.5 × Actual |
| LIB | | 55 | 62 | 69 | NP | NP | Actual[b] |
| ABW | SDC A, B and C, ultimate design wind speed < 140 mph | 28 | 32 | 34 | 38 | 42 | 48 |
| | SDC $D_0$, $D_1$ and $D_2$, ultimate design wind speed < 140 mph | 32 | 32 | 34 | NP | NP | |
| CS-G | | 24 | 27 | 30 | 33 | 36 | Actual[b] |
| CS-WSP, CS-SFB | Adjacent clear opening height (inches) | | | | | | |
| | ≤ 64 | 24 | 27 | 30 | 33 | 36 | Actual[b] |
| | 68 | 26 | 27 | 30 | 33 | 36 | |
| | 72 | 27 | 27 | 30 | 33 | 36 | |
| | 76 | 30 | 29 | 30 | 33 | 36 | |
| | 80 | 32 | 30 | 30 | 33 | 36 | |
| | 84 | 35 | 32 | 32 | 33 | 36 | |
| | 88 | 38 | 35 | 33 | 33 | 36 | |
| | 92 | 43 | 37 | 35 | 35 | 36 | |
| | 96 | 48 | 41 | 38 | 36 | 36 | |
| | 100 | — | 44 | 40 | 38 | 38 | |
| | 104 | — | 49 | 43 | 40 | 39 | |
| | 108 | — | 54 | 46 | 43 | 41 | |
| | 112 | — | — | 50 | 45 | 43 | |
| | 116 | — | — | 55 | 48 | 45 | |
| | 120 | — | — | 60 | 52 | 48 | |
| | 124 | — | — | — | 56 | 51 | |
| | 128 | — | — | — | 61 | 54 | |
| | 132 | — | — | — | 66 | 58 | |
| | 136 | — | — | — | — | 62 | |
| | 140 | — | — | — | — | 66 | |
| | 144 | — | — | — | — | 72 | |
| METHOD (See Table R602.10.4) | | Portal header height 8 feet | 9 feet | 10 feet | 11 feet | 12 feet | |
| PFH | Supporting roof only | 24 | 24 | 24 | Note c | Note c | 48 |
| | Supporting one story and roof | 24 | 24 | 24 | Note c | Note c | |
| PFG | | 24 | 27 | 30 | Note d | Note d | 1.5 × Actual[b] |
| CS-PF | SDC A, B and C | 16 | 18 | 20 | Note e | Note e | 1.5 × Actual[b] |
| | SDC $D_0$, $D_1$ and $D_2$ | 24 | 24 | 24 | Note e | Note e | Actual[b] |

~~For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm, 1 mile per hour = 0.447 m/s.~~
~~NP = Not Permitted.~~

~~a. Linear interpolation shall be permitted.~~

~~b. Use the actual length where it is greater than or equal to the minimum length.~~

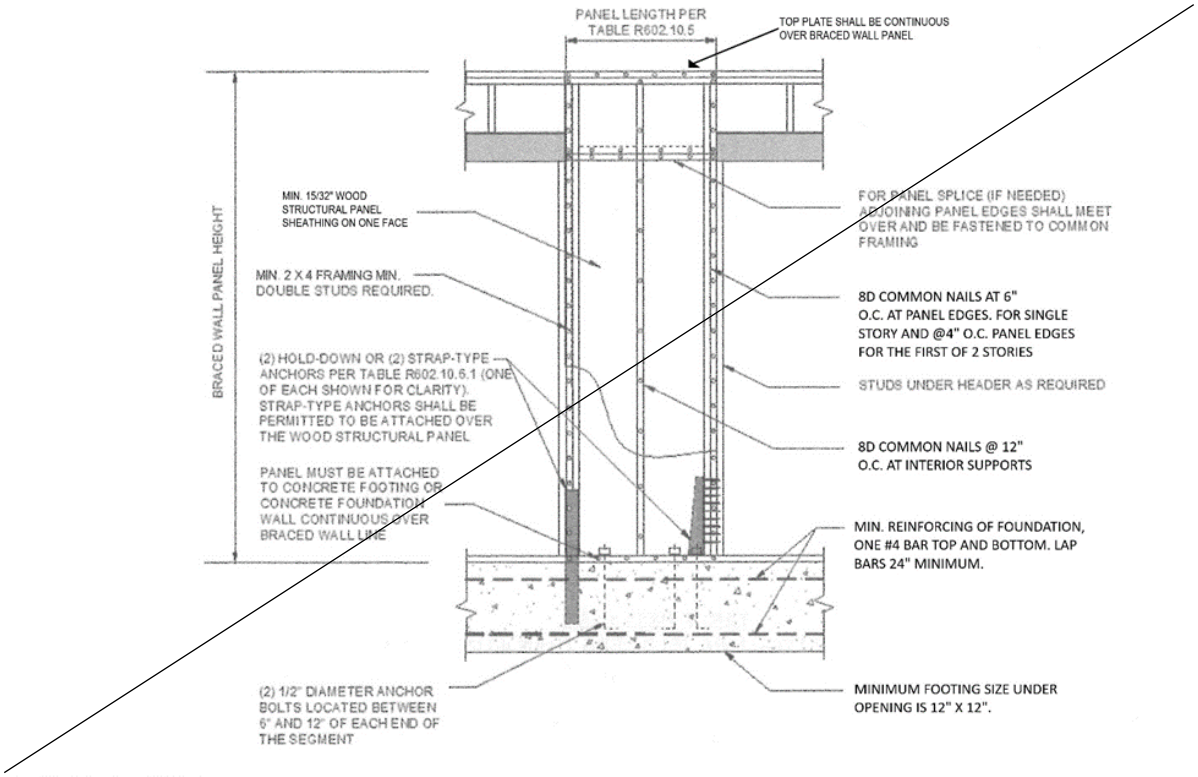
~~c. Maximum header height for PFH is 10 feet in accordance with Figure R602.10.6.2, but wall height shall be permitted to be increased to 12 feet with pony wall.~~

~~d. Maximum header height for PFG is 10 feet in accordance with Figure R602.10.6.3, but wall height shall be permitted to be increased to 12 feet with pony wall.~~

~~e. Maximum header height for CS-PF is 10 feet in accordance with Figure R602.10.6.4, but wall height shall be permitted to be increased to 12 feet with pony wall.~~

**EXHIBIT 2**

**~~14.04.295.2 Figure R602.10.6.1 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

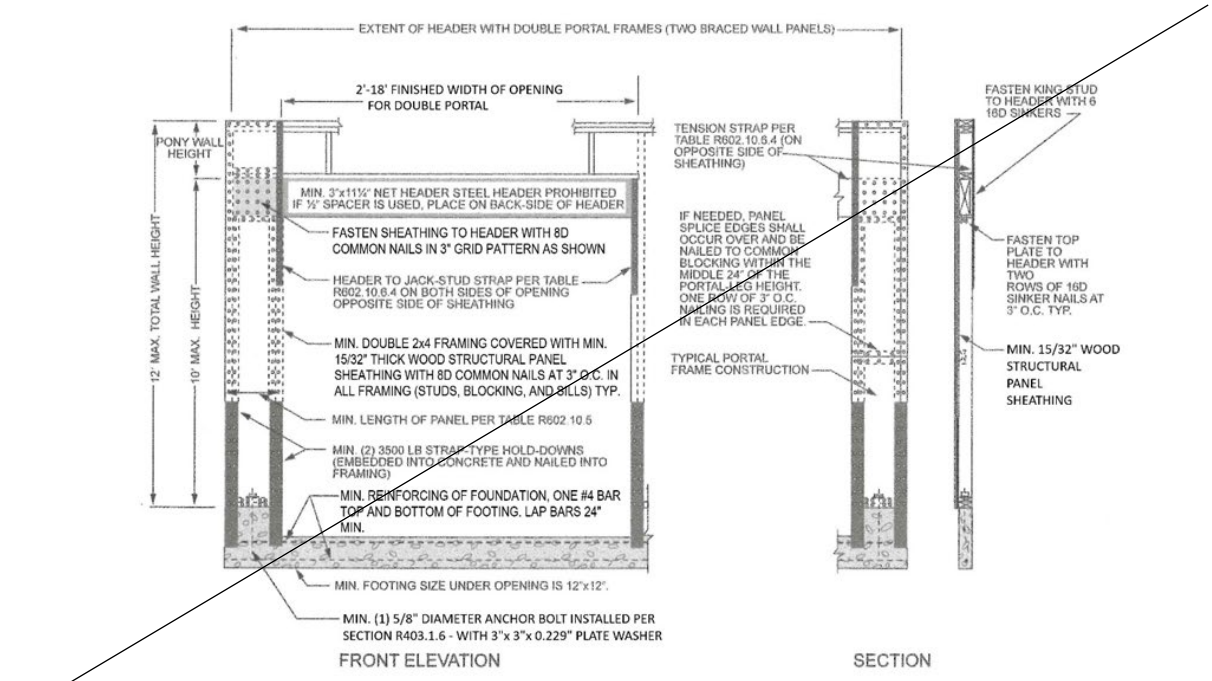



For SI: 1 inch = 25.4 mm.

**~~FIGURE R602.10.6.1~~**
**~~METHOD ABW—ALTERNATE BRACED WALL PANEL~~**

~~14.04.295.3 Figure R602.10.6.2 of the 2022 Edition of the California Residential Code is amended to read as follows.~~

**EXHIBIT 2**

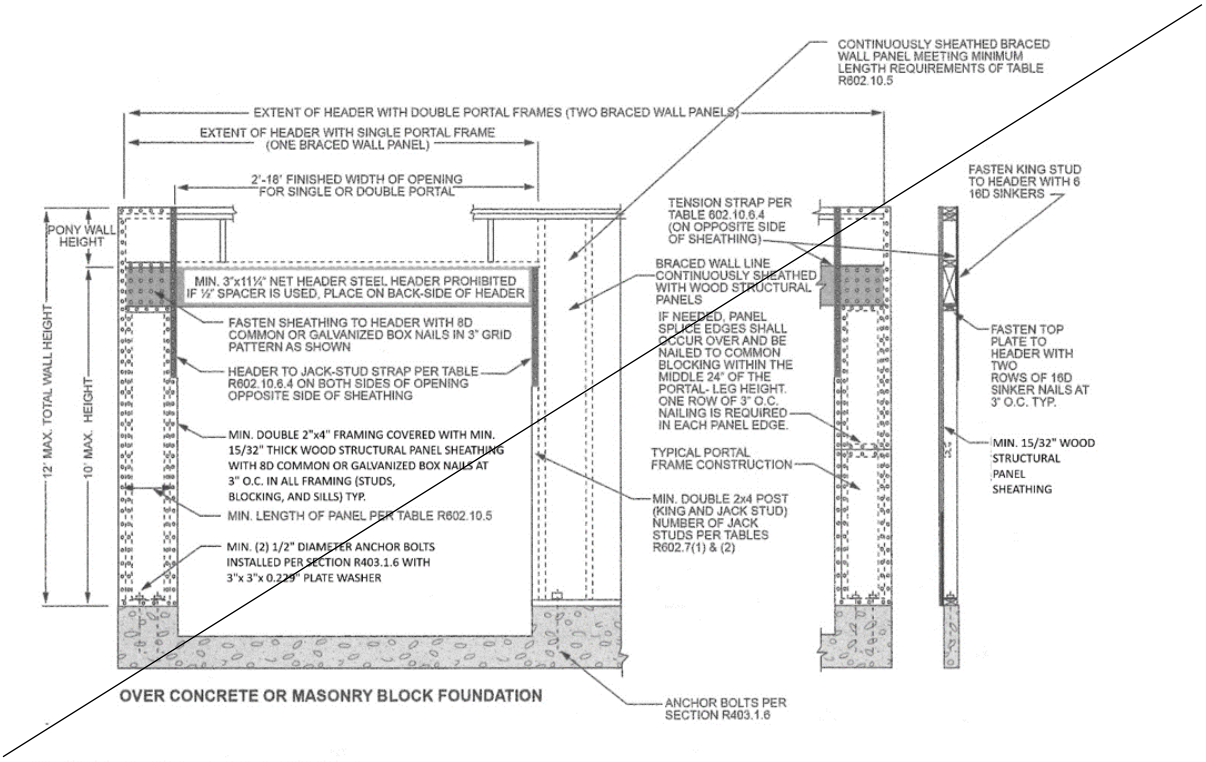



For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

**~~FIGURE R602.10.6.2~~**
**~~METHOD PFH—PORTAL FRAME WITH HOLD-DOWNS AT DETACHED GARAGE DOOR OPENINGS~~**

**EXHIBIT 2**

**~~14.04.295.4 Figure R602.10.6.4 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**




For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

**~~FIGURE R602.10.6.4~~**
**~~METHOD CS-PF—CONTINUOUSLY SHEATHED PORTAL FRAME PANEL CONSTRUCTION~~**

**~~14.04.300 Section R606.4.4 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

~~R606.4.4 Parapet walls. Unreinforced solid masonry parapet walls shall not be less than 8 inches (203 mm) thick and their height shall not exceed four times their thickness. Unreinforced hollow unit masonry parapet walls shall be not less than 8 inches (203 mm) thick, and their height shall not exceed three times their thickness. Masonry parapet walls in areas subject to wind loads of 30 pounds per square foot (1.44 kPa) or located in Seismic Design Category $D_0$, $D_1$ or $D_2$, or on townhouses in Seismic Design Category C shall be reinforced in accordance with Section R606.12.~~

**~~14.04.305 Section R606.12.2.2.3 of the 2022 Edition of the California Residential Code is amended to read as follows.~~**

~~R606.12.2.2.3 Reinforcement requirements for masonry elements. Masonry elements listed in Section R606.12.2.2.2 shall be reinforced in either the horizontal or vertical direction as shown in Figure R606.11(2) and in accordance with the following:~~

1. Horizontal reinforcement. Horizontal joint reinforcement shall consist of not less than one No. 4 bar spaced not more than 48 inches (1219 mm). Horizontal reinforcement shall be provided within 16 inches (406 mm) of the top and bottom of these masonry elements.

2. Vertical reinforcement. Vertical reinforcement shall consist of not less than one No. 4 bar spaced not more than 48 inches (1219 mm). Vertical reinforcement shall be within 8 inches (203 mm) of the ends of masonry walls.

**14.04.310 Section R803.2.4 is added to Chapter 8 of the 2022 Edition of the California Residential Code to read as follows.**

R803.2.4 Openings in horizontal diaphragms. Openings in horizontal diaphragms shall conform with Section R503.2.4.

**14.04.315 Section R902.1.1.1 is added to the 2022 Edition of the California Residential Code to read as follows.**

All roofing material in the very-high and moderate fire hazard severity zone must be Class A. No wood roof covering material shall be installed on any structure located in the very high, high and moderate fire hazard severity zones as identified by the Pasadena Fire Department. All other roof covering materials in other zones shall be Class A or B.

Exception: In the moderate fire hazard severity zone, the fire code official may, upon a showing of good cause and necessity, approve the use of fire-resistive wood as part of Class A listed assemblies, and may require additional mitigation as warranted, for the repair or maintenance of existing structure.

**14.04.320 Section R1001.3.1 of the 2022 Edition of the California Residential Code is amended to read as follows.**

R1001.3.1 Vertical reinforcing. For chimneys up to 40 inches (1016 mm) wide, four No. 4 continuous vertical bars adequately anchored into the concrete foundation shall be placed between wythes of solid masonry or within the cells of hollow unit masonry and grouted in accordance with Section R606. Grout shall be prevented from bonding with the flue liner so that the flue liner is free to move with thermal expansion. For chimneys more than 40 inches (1016 mm) wide, two additional No. 4 vertical bars adequately anchored into the concrete foundation shall be provided for each additional flue incorporated into the chimney or for each additional 40 inches (1016 mm) in width or fraction thereof.

**14.04.400 Section AX100.1 is added to the 2022 Edition of the California Residential Code to read as follows.**

In addition to the requirements of Appendix AX, the Swimming Pool Safety Act, of the 2022 California Residential Code, a swimming pool, pool, spa or any body of water over 18 inches deep shall have an enclosure consisting of a fence, wall, portions of a building or other approved durable material, that isolates all bodies of water from the

~~private single family dwelling and/or Accessory Dwelling Unit. The enclosure shall be installed around the perimeter of the bodies of water, or at the perimeter of the property.~~

**~~14.04.510 Sections 4.106.4.2.1 and 4.106.4.2.2 of the 2022 Edition of the California Green Building Standards Code are amended to read as follows.~~**

~~4.106.4.2.1 Multifamily development projects with less than 20 dwelling units; and hotels and motels with less than 20 sleeping units or guest rooms. The number of dwelling units, sleeping units or guest rooms shall be based on all buildings on a project site subject to this section.~~

~~1. EV Capable. Ten (10) percent of the total number of parking spaces on a building site, provided for all types of parking facilities, shall be electric vehicle charging spaces (EV spaces) capable of supporting future Level 2 EVSE. Electrical load calculations shall demonstrate that the electrical panel service capacity and electrical system, including any on-site distribution transformer(s), have sufficient capacity to simultaneously charge all EVs at all required EV spaces at a minimum of 40 amperes.~~

~~The service panel or subpanel circuit directory shall identify the overcurrent protective device space(s) reserved for future EV charging purposes as "EV CAPABLE" in accordance with the California Electrical Code.~~

~~Exceptions:~~

~~1. When EV chargers (Level 2 EVSE) are installed in a number equal to or greater than the required number of EV capable spaces.~~

~~2. When EV chargers (Level 2 EVSE) are installed in a number less than the required number of EV capable spaces, the number of EV capable spaces required may be reduced by a number equal to the number of EV chargers installed.~~

~~3. Areas of parking facilities served by parking lifts or parking spaces accessible only by automated mechanical car parking systems.~~

~~Notes:~~

~~a. Construction documents are intended to demonstrate the project's capability and capacity for facilitating future EV charging.~~

~~b. There is no requirement for EV spaces to be constructed or available until receptacles for EV charging or EV chargers are installed for use.~~

~~2. EV Ready. Twenty-five (25) percent of the total number of parking spaces shall be equipped with low power Level 2 EV charging receptacles. For multifamily parking facilities, no more than one receptacle is required per dwelling unit when more than one parking space is provided for use by a single dwelling unit.~~

~~Exception: Areas of parking facilities served by parking lifts or parking spaces accessible only by automated mechanical car parking systems.~~

4.106.4.2.2 Multifamily development projects with 20 or more dwelling units, hotels and motels with 20 or more sleeping units or guest rooms. The number of dwelling units, sleeping units or guest rooms shall be based on all buildings on a project site subject to this section.

1. EV Capable. Ten (10) percent of the total number of parking spaces on a building site, provided for all types of parking facilities, shall be electric vehicle charging spaces (EV spaces) capable of supporting future Level 2 EVSE. Electrical load calculations shall demonstrate that the electrical panel service capacity and electrical system, including any on-site distribution transformer(s), have sufficient capacity to simultaneously charge all EVs at all required EV spaces at a minimum of 40 amperes.

   The service panel or subpanel circuit directory shall identify the overcurrent protective device space(s) reserved for future EV charging purposes as "EV CAPABLE" in accordance with the California Electrical Code.

   Exceptions:

   1. When EV chargers (Level 2 EVSE) are installed in a number greater than five (5) percent of parking spaces required by Section 4.106.4.2.2, Item 3, the number of EV capable spaces required may be reduced by a number equal to the number of EV chargers installed over the five (5) percent required.
   2. Areas of parking facilities served by parking lifts or parking spaces accessible only by automated mechanical car parking systems.

   Notes:

   a. Construction documents shall show locations of future EV spaces.
   b. There is no requirement for EV spaces to be constructed or available until receptacles for EV charging or EV chargers are installed for use.

2. EV Ready. Twenty-five (25) percent of the total number of parking spaces shall be equipped with low power Level 2 EV charging receptacles. For multifamily parking facilities, no more than one receptacle is required per dwelling unit when more than one parking space is provided for use by a single dwelling unit.

   Exception: Areas of parking facilities served by parking lifts or parking spaces accessible only by automated mechanical car parking systems.

3. EV Chargers. Five (5) percent of the total number of parking spaces shall be equipped with Level 2 EVSE. Where common use parking is provided, at least one EV charger shall be located in the common use parking area and shall be available for use by all residents or guests.

When low power Level 2 EV charging receptacles or Level 2 EVSE are installed beyond the minimum required, an automatic load management system (ALMS) may be used to reduce the maximum required electrical capacity to each space served by the ALMS. The electrical system and any on-site distribution transformers shall have sufficient

~~capacity to deliver at least 3.3 kW simultaneously to each EV charging station (EVCS) served by the ALMS. The branch circuit shall have a minimum capacity of 40 amperes and installed EVSE shall have a capacity of not less than 30 amperes. ALMS shall not be used to reduce the minimum required electrical capacity to the required EV capable spaces.~~

~~Exception: Areas of parking facilities served by parking lifts or parking spaces accessible only by automated mechanical car parking systems.~~

**~~14.04.520 Section 5.106.5.3 of the 2022 Edition of the California Green Building Standards Code is amended to read as follows.~~**

~~5.106.5.3 Electric vehicle (EV) charging. [N] Construction to provide electric vehicle infrastructure and facilitate electric vehicle charging shall comply with Section 5.106.5.3 and shall be provided in accordance with regulations in the California Building Code and the California Electrical Code.~~

~~Exceptions:~~

1. ~~On a case by case basis where the local enforcing agency has determined compliance with this section is not feasible based upon one of the following conditions:~~
   a. ~~Where there is no local utility power.~~
   b. ~~Where the local utility is unable to supply adequate power.~~
   c. ~~Where there is evidence suitable to the local enforcement agency substantiating that additional local utility infrastructure design requirements, directly related to the implementation of Section 5.106.5.3, may adversely impact the construction cost of the project.~~
2. ~~Areas of parking facilities served by parking lifts or parking spaces accessible only by automated mechanical car parking systems are not required to comply with this code section.~~

**EXHIBIT 2**

## CHAPTER 14.04 – BUILDING CODE AND RELATED CODES

### 14.04.010 - Adoption and filing.

California Building Codes adopted. California Code of Regulation Title 24 Parts 1 through 12 consisting of the: 2025 California Administrative Code; 2025 California Building Code with Appendix Chapters G, H, I, J, N, P, and Q; 2025 California Residential Code with Appendix Chapters BB, BF, BG, CH, CI, and CJ; 2025 California Electrical Code with Annexes A, C, I; 2025 California Mechanical Code with Appendix Chapters B, C, F, G, H; 2025 California Plumbing Code with Appendix Chapters A, D, G, H, I, J, M, R; 2025 California Energy Code; 2025 California Wildland-Urban Interface Code, 2025 California Historical Building Code; 2025 California Fire Code including Chapters 1,3, Section 503 of Chapter 5, Sections 1101 and 1104 of Chapter 11, Appendix Chapter 4 and Appendices B, C, D, E, F, G, H, I, K, M, N, O, and P; 2025 California Existing Building Code; 2025 California Green Building Standards Code; 2025 California Referenced Standards Code, and amendments from specific State of California State Agencies. One copy of all of the above publications shall be on file for public inspection and is hereby adopted with the same force and effect as though set out herein in full.

### 14.04.015 – Section 1.1.1 of the California Building Code is amended to read as follows.

1.1.1 Title. These regulations shall be known as the California Building Code, may be cited as such and will be referred to herein as "this code." The California Building Code is Part 2 of thirteen parts of the official compilation and publication of the adoption, amendment and repeal of building regulations to the California Code of Regulations, Title 24, also referred to as the California Building Standards Code. This part incorporates by adoption the 2024 International Building Code of the International Code Council with necessary California amendments.

For the City of Pasadena, these regulations shall be known as the Pasadena Building Code. The provisions contained in the California Building Code of the (compiled) California Building Standards Code as defined in section 18910, Health and Safety Code, may be cited as such and are referred to hereafter as "these regulations" or "these building standards" or "this code". These regulations shall also be collectively known as the "California Building Code" as amended by the Pasadena Municipal Code.

### 14.04.020 - Section 105.1.3 of Chapter 1 Division II of the 2025 California Building Code is added to read as follows.

[A]105.1.3 Zoning Permits
A zoning permit may be required for items exempted from building permit requirements under Chapter 1 Division II Section 105.2. Exempted work shall not violate any provisions of this Code, Federal, State, Local laws, or regulations.

**EXHIBIT 2**

**14.04.025 - Section 903.2 of the 2025 California Building Code titled "Where required" is amended to read as follows.**

**903.2 Where required.**

All new construction of buildings and structures shall be provided with an approved automatic fire sprinkler system.

**Exception:** The following types of construction may be exempt from this section when approved by the fire code official.

1. Detached private garages, utility sheds, and similar structures 500 square feet or less, accessory to a R-3 occupancy, provided no portion of the structure is located more than 150 feet (45,720 mm) from an approved fire department access road.
2. Detached Carports, detached gazebos, pergolas, and similar shade structures open on all sides constructed of non-combustible material 500 square feet or less, accessory to a R-3 occupancy.
3. Other similar structures as deemed appropriate by the fire code official.

**14.04.030 - Section 903.1 of the 2025 California Building Code is amended by adding Section 903.1.2 titled "Partial automatic fire sprinkler system prohibited" to read as follows.**

**903.1.2 Partial automatic fire sprinkler system prohibited.**

Whenever an automatic fire sprinkler system is installed for any portion of any building or structure, an automatic fire sprinkler system shall be installed for the entire building or structure.

**14.04.035 - Section 903.2.18 of the 2025 California Building Code titled "Group U private garages and carports accessory to Group R-3 occupancies" is amended to read as follows.**

**903.2.18 Group U detached and attached private garages, carports, and similar structures accessory to Group R-3 occupancies.**

Carports with habitable space above and attached garages, accessory to Group R-3 occupancies, shall be protected by residential fire sprinklers in accordance with this section. When an automatic fire sprinkler system is required in accordance with sections 903.1.2 and 903.2, carports without habitable space above, detached garages, and similar attached and detached structures, accessory to R-3 occupancies, shall be protected by residential fire sprinklers in accordance with this section. Residential fire sprinklers shall be connected to, and installed in accordance with, an automatic residential fire sprinkler system that complies with Section R309 of the California Residential Code or with NFPA 13D. Fire sprinklers shall be residential sprinklers or quick-response sprinklers,

designed to provide a minimum density of 0.05 gpm/ft2 (2.04 mm/min) over the area of the garage, carport, and/or similar structure, but not to exceed two sprinklers for hydraulic calculation purposes. Garage doors shall not be considered obstructions with respect to sprinkler placement.

**14.05.040- Section 903.3.5 of the 2025 California Building Code titled "Water supplies" is amended to read as follows. Subsection 903.3.5.1 adopted as published.**

**903.3.5 Water supplies.**

Water supplies for automatic sprinkler systems shall comply with this section and the standards referenced in Section 903.3.1. The potable water supply shall be protected against backflow in accordance with *Health and Safety Code 13114.7*. For connections to public waterworks systems, the water supply test used for design of fire protection systems shall be adjusted to account for seasonal and daily pressure fluctuations based on information from the water supply authority and as approved by the fire code official. Hydraulic calculations shall include a 10% safety margin.

**14.04.045 - Section 903.3.5.2 of the 2025 California Building Code titled "Residential combination services" is amended to read as follows.**

**903.3.5.2 Residential combination services.**

A single combination water supply shall not be allowed for NFPA 13R systems.

**14.04.050 - Section 1505.1 of the 2025 California Building Code is amended to read as follows.**

**[BF] 1505.1 General.**

Fire classification of roof assemblies shall be in accordance with Section 1505. The minimum fire classification of roof assemblies installed on buildings shall comply with Table 1505.1 based on type of construction of the building. Class A- and B roof assemblies and roof coverings required to be listed by this section shall be tested in accordance with ASTM E108 or UL 790. In addition, fire-retardant-treated wood roof coverings shall be tested in accordance with ASTM D 2898. The minimum roof coverings installed on buildings shall comply with Table 1505.1 based on the type of construction of the building. All roof assemblies and roof coverings shall be of not less than Class B. No wood roof covering material shall be installed on any structure located in the very high, high and moderate fire hazard severity zones as identified by the Pasadena Fire Department.

**Exception 1**: Skylights and sloped glazing that comply with Chapter 24 or Section 2610. Installation of skylights of plastic material shall meet the requirements of the very high and high fire hazard severity zones.

**Exception 2:** In the moderate fire hazard severity zone, the fire code official may, upon a showing of good cause and necessity, approve the use of fire resistive wood as part of Class A listed assemblies, and may require additional mitigation as warranted, for the repair or maintenance of existing structures.

**[BF] TABLE 1505.1—MINIMUM ROOF ASSEMBLY CLASSIFICATION FOR TYPES OF CONSTRUCTION[a,]**

| IA | IB | IIA | IIB | IIIA | IIIB | IV | VA | VB |
|---|---|---|---|---|---|---|---|---|
| B | B | B | B[c] | B | B[c] | B | B | B[c] |

For SI: 1 foot = 304.8 mm, 1 square foot = 0.0929 $m^2$.

a. Unless otherwise required in accordance with the California Wildland-Urban Interface Code or due to the location of the building within a fire district in accordance with Appendix D.

c. Buildings that are not more than two stories above grade plane and having not more than 6,000 square feet of projected roof area and where there is a minimum 10-foot fire-separation distance from the leading edge of the roof to a lot line on all sides of the building, except for street fronts or public ways and is not located in a fire hazard severity zones, shall be permitted to have roofs of No. 1 cedar or redwood shakes and No. 1 shingles constructed in accordance with Section 1505.7.

**14.04.055 - Section 1505.6 of the 2025 Edition of the California Building Code is amended to read as follows:**

**[BF] 1505.6 Fire-retardant-treated wood shingles and shakes.**

Fire-retardant-treated wood shingles and wood shakes shall not be installed in the very high, high and moderate fire hazard severity zones. Fire-retardant-treated wood shakes and shingles are wood shakes and shingles complying with UBC Standard 15-3 or 15-4 which are impregnated by the full-cell vacuum-pressure process with fire-retardant chemicals, and which have been qualified by UBC Standard 15-2 for use on Class A, B roofs.

*Fire-retardant-treated wood shakes and shingles shall comply with ICC-ES EG107 and with the weathering requirements contained in Health and Safety Code Section 13132.7(j). Each bundle shall bear labels from an ICC accredited quality control agency identifying their roof-covering classification and indicating their compliance with ICC-ES EGI07 and with the weathering requirements contained in Health and Safety Code Section 13132.7(j).*

*Health and Safety Code Section 13132.7(j). No wood roof covering materials shall be sold or applied in this state unless both of the following conditions are met:*

*(1) The materials have been approved and listed by the State Fire Marshal as complying with the requirements of this section.*

*(2) The materials have passed at least five years of the 10-year natural weathering test. The 10-year natural weathering test required by this subdivision shall be conducted in accordance with standard 15-2 of the 1994 Edition of the Uniform Building Code at a testing facility recognized by the State Fire Marshal.*

Exception: In the moderate fire hazard severity zone, the fire code official may, upon a showing of good cause and necessity, approve the use of fire-resistive wood as part of Class A listed assemblies, and may require additional mitigation as warranted, for the repair or maintenance of existing structures.

**14.04.060 - Section 1507 of the 2025 California Building Code is amended by adding Section 1507.1.3 to read as follows.**

**1507.1.3 Roof Sheathing.**
When finish roofing material is removed to the existing open space sheathing, a minimum of 3/8-inch thick plywood sheathing shall be installed. The new sheathing shall comply with the requirements of the California Building Code. The sheathing shall be installed such that the edges align over rafters and individual spaced sheathing boards. The sheathing shall be attached to the existing spaced sheathing with 6d common nails at 6 inches (147mm) on center at supported edges and 6d common nails at 12 inches (294mm) on center at intermediate supports.

**14.04.065 - Sections 1613.8 and 1613.8.1 are added to Chapter 16 of the 2025 Edition of the California Building Code to read as follows.**

**1613.8 Amendments to ASCE 7**. The provisions of Section 1613.8 shall be permitted as an amendment to the relevant provisions of ASCE 7.

**1613.8.1 Values for vertical combinations**. Modify ASCE 7 Section 12.2.3.1 Exception 3 as follows:

3. Detached one- and two-family dwellings up to two stories in height of light frame construction.

**14.04.070 - Section 1613.8.2 is added to Chapter 16 of the 2025 Edition of the California Building Code to read as follows.**

**1613.8.2 Wood diaphragms.** Modify ASCE 7 Section 12.11.2.2.3 as follows:

**12.11.2.2.3 Wood Diaphragms**. The anchorage of concrete or masonry structural walls to wood diaphragms shall be in accordance with AWC SDPWS 4.1.5.1 and this section. Continuous ties required by this section shall be in addition to the diaphragm sheathing. Anchorage shall not be accomplished by use of toenails or nails subject to withdrawal, nor shall wood ledgers or framing be used in cross-grain bending or

cross-grain tension. The diaphragm sheathing shall not be considered effective for providing the ties or struts required by this section.

For structures assigned to Seismic Design Category D, E or F, wood diaphragms supporting concrete or masonry walls shall comply with the following:

1. The spacing of continuous ties shall not exceed 40 feet. Added chords of diaphragms may be used to form subdiaphragms to transmit the anchorage forces to the main continuous crossties.

2. The maximum diaphragm shear used to determine the depth of the subdiaphragm shall not exceed 75% of the maximum diaphragm shear.

**14.04.075 - Section 1613.8.3 is added to Chapter 16 of the 2025 Edition of the California Building Code to read as follows:**

**1613.8.3 Structural separation**. Modify ASCE 7 Section 12.12.3 Equation 12.12-1 as follows:

$$\delta_{SS} = \sqrt{(\delta_{DE1})^2 + (\delta_{DE2})^2} \qquad (12.12\text{-}2)$$

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Where δDE1 and δDE2 are the Design Earthquake Displacements of the adjacent structures at their adjacent edges. Where a structure adjoins a property line not common to a public way, the structure shall be set back from the property line by at least the displacement δDE of that structure.

**14.04.080 – Section 1613.9 is added to Chapter 16 of the 2025 Edition of the California Building Code to read as follows.**

**1613.9 Seismic design provisions for hillside buildings**.

**1613.9.1 Purpose.** The purpose of this section is to establish minimum regulations for the design and construction of new buildings and additions to existing buildings when constructing such buildings on or into slopes steeper than one unit vertical in three units horizontal (33.3%). These regulations establish minimum standards for seismic force resistance to reduce the risk of injury or loss of life in the event of earthquakes.

**1613.9.2 Scope.** The provisions of this section shall apply to the design of the lateral-force-resisting system for hillside buildings at and below the base level diaphragm. The design of the lateral-force-resisting system above the base level

diaphragm shall be in accordance with the provisions for seismic and wind design as required elsewhere in this division.

**Exception:** Non-habitable accessory buildings and decks not supporting or supported from the main building are exempt from these regulations.

**1613.9.3 Definitions.** For the purposes of this section certain terms are defined as follows:

BASE LEVEL DIAPHRAGM is the floor at, or closest to, the top of the highest level of the foundation.

DIAPHRAGM ANCHORS are assemblies that connect a diaphragm to the adjacent foundation at the uphill diaphragm edge.

DOWNHILL DIRECTION is the descending direction of the slope approximately perpendicular to the slope contours.

FOUNDATION is concrete or masonry which supports a building, including footings, stem walls, retaining walls, and grade beams.

FOUNDATION EXTENDING IN THE DOWNHILL DIRECTION is a foundation running downhill and approximately perpendicular to the uphill foundation.

HILLSIDE BUILDING is any building or portion thereof constructed on or into a slope steeper than one unit vertical in three units horizontal (33.3%). If only a portion of the building is supported on or into the slope, these regulations apply to the entire building.

PRIMARY ANCHORS are diaphragm anchors designed for and providing a direct connection as described in Sections 1613.9.5 and 1613.9.7.3 between the diaphragm and the uphill foundation.

SECONDARY ANCHORS are diaphragm anchors designed for and providing a redundant diaphragm to foundation connection, as described in Sections 1613.9.6 and. 1613.9.7.4.

UPHILL DIAPHRAGM EDGE is the edge of the diaphragm adjacent and closest to the highest ground level at the perimeter of the diaphragm.

UPHILL FOUNDATION is the foundation parallel and closest to the uphill diaphragm edge.

**EXHIBIT 2**

**1613.9.4 Analysis and design.**

**1613.9.4.1 General.** Every hillside building within the scope of this section shall be analyzed, designed, and constructed in accordance with the provisions of this division. When the code-prescribed wind design produces greater effects, the wind design shall govern, but detailing requirements and limitations prescribed in this and referenced sections shall be followed.

**1613.9.4.2 Base level diaphragm-downhill direction.** The following provisions shall apply to the seismic analysis and design of the connections for the base level diaphragm in the downhill direction.

**1613.9.4.2.1 Base for lateral force design defined.** For seismic forces acting in the downhill direction, the base of the building shall be the floor at or closest to the top of the highest level of the foundation.

**1613.9.4.2.2 Base shear.** In developing the base shear for seismic design, the response modification coefficient (R) shall not exceed 5 for bearing wall and building frame systems. The total base shear shall include the forces tributary to the base level diaphragm including forces from the base level diaphragm.

**1613.9.5 Base shear resistance-primary anchors.**

**1613.9.5.1 General.** The base shear in the downhill direction shall be resisted through primary anchors from diaphragm struts provided in the base level diaphragm to the foundation.

**1613.9.5.2 Location of primary anchors.** A primary anchor and diaphragm strut shall be provided in line with each foundation extending in the downhill direction. Primary anchors and diaphragm struts shall also be provided where interior vertical lateral-force-resisting elements occur above and in contact with the base level diaphragm. The spacing of primary anchors and diaphragm struts or collectors shall in no case exceed 30 feet (9144 mm).

**1613.9.5.3 Design of primary anchors and diaphragm struts.** Primary anchors and diaphragm struts shall be designed in accordance with the requirements of Section 1613.6.8.

**1613.9.5.4 Limitations.** The following lateral-force-resisting elements shall not be designed to resist seismic forces below the base level diaphragm in the downhill direction:

1. Wood structural panel wall sheathing,
2. Cement plaster and lath,

3. Gypsum wallboard, and
4. Tension only braced frames.

Braced frames designed in accordance with the requirements of Section 2206.2.1.2 may be used to transfer forces from the primary anchors and diaphragm struts to the foundation provided lateral forces do not induce flexural stresses in any member of the frame or in the diaphragm struts. Deflections of frames shall account for the variation in slope of diagonal members when the frame is not rectangular.

**1613.9.6 Base shear resistance-secondary anchors.**

**1613.9.6.1 General.** In addition to the primary anchors required by Section 1613.9.5 the base shear in the downhill direction shall be resisted through secondary anchors in the uphill foundation connected to diaphragm struts in the base level diaphragm.

**Exception:** Secondary anchors are not required where foundations extending in the downhill direction spaced at not more than 30 feet (9144 mm) on center extend up to and are directly connected to the base level diaphragm for at least 70% of the diaphragm depth.

**1613.9.6.2 Secondary anchor capacity and spacing.** Secondary anchors at the base level diaphragm shall be designed for a minimum force equal to the base shear, including forces tributary to the base level diaphragm, but not less than 600 pounds per lineal foot (8.76 kN/m) based on Allowable Stress Design (ASD) levels. The secondary anchors shall be uniformly distributed along the uphill diaphragm edge and shall be spaced a maximum of 4 feet (1219 mm) on center.

**1613.9.6.3 Design.** Secondary anchors and diaphragm struts shall be designed in accordance with Section 1613.9.8.

**1613.9.7 Diaphragms below the base level-downhill direction.** The following provisions shall apply to the lateral analysis and design of the connections for all diaphragms below the base level diaphragm in the downhill direction.

**1613.9.7.1 Diaphragm defined.** Every floor level below the base level diaphragm shall be designed as a diaphragm.

**1613.9.7.2 Design force.** Each diaphragm below the base level diaphragm shall be designed for all tributary loads at that level using a minimum seismic force factor not less than the base shear coefficient.

**1613.9.7.3 Design force resistance-primary anchors.** The design force described in Section 1613.9.7.2 shall be resisted through primary anchors

from diaphragm struts provided in each diaphragm to the foundation. Primary anchors shall be provided and designed in accordance with the requirements and limitations of Section 1613.9.5.

**1613.9.7.4 Design force resistance-secondary anchors.**

**1613.9.7.4.1 General.** In addition to the primary anchors required in Section 1613.9.7.3 the design force in the downhill direction shall be resisted through secondary anchors in the uphill foundation connected to diaphragm struts in each diaphragm below the base level.

**Exception:** Secondary anchors are not required where foundations extending in the downhill direction, spaced at not more than 30 feet (9144 mm) on center, extend up to and are directly connected to each diaphragm below the base level for at least 70% of the diaphragm depth.

**1613.9.7.4.2 Secondary anchor capacity.** Secondary anchors at each diaphragm below the base level diaphragm shall be designed for a minimum force equal to the design force but not less than 300 pounds per lineal foot (4.38 kN/m) based on Allowable Stress Design (ASD) levels. The secondary anchors shall be uniformly distributed along the uphill diaphragm edge and shall be spaced a maximum of 4 feet (1219 mm) on center.

**1613.9.7.4.3 Design.** Secondary anchors and diaphragm struts shall be designed in accordance with Section 1613.9.8.

**1613.9.8 Primary and secondary anchorage and diaphragm strut design.** Primary and secondary anchors and diaphragm struts shall be designed in accordance with the following provisions:

1. Fasteners. All bolted fasteners used to develop connections to wood members shall be provided with square plate washers at all bolt heads and nuts. Washers shall be minimum 0.229 inch by 3 inches by 3 inches (5.82 mm by 76 mm by 76 mm) in size. Nuts shall be tightened to finger tight plus one half (1/2) wrench turn prior to covering the framing.

2. Fastening. The diaphragm to foundation anchorage shall not be accomplished by the use of toenailing, nails subject to withdrawal, or wood in cross-grain bending or cross-grain tension.

3. Size of Wood Members. Wood diaphragm struts collectors, and other wood members connected to primary anchors shall not be less than

3 inch (76 mm) nominal width. The effects of eccentricity on wood members shall be evaluated as required per Item 9.

4. Design. Primary and secondary anchorage, including diaphragm struts, splices, and collectors shall be designed for 125% of the tributary force.

5. Allowable Stress Increase. The one-third allowable stress increase permitted under Section 1605.2 shall not be taken when the working (allowable) stress design method is used.

6. Steel Element of Structural Wall Anchorage System. The strength design forces for steel elements of the structural wall anchorage system, with the exception of anchor bolts and reinforcing steel, shall be increased by 1.4 times the forces otherwise required.

7. Primary Anchors. The load path for primary anchors and diaphragm struts shall be fully developed into the diaphragm and into the foundation. The foundation must be shown to be adequate to resist the concentrated loads from the primary anchors.

8. Secondary Anchors. The load path for secondary anchors and diaphragm struts shall be fully developed in the diaphragm but need not be developed beyond the connection to the foundation.

9. Symmetry. All lateral force foundation anchorage and diaphragm strut connections shall be symmetrical. Eccentric connections may be permitted when demonstrated by calculation or tests that all components of force have been provided for in the structural analysis or tests.

10. Wood Ledgers. Wood ledgers shall not be used to resist cross-grain bending or cross-grain tension.

**1613.9.9 Lateral-force-resisting elements normal to the downhill direction.**

**1613.9.9.1 General.** In the direction normal to the downhill direction, lateral-force-resisting elements shall be designed in accordance with the requirements of this section.

**1613.9.9.2 Base shear.** In developing the base shear for seismic design, the response modification coefficient (R) shall not exceed 5 for bearing wall and building frame systems.

**1613.9.9.3 Vertical distribution of seismic forces.** For seismic forces acting normal to the downhill direction the distribution of seismic forces over the height of the building using Section 12.8.3 of ASCE 7 shall be

determined using the height measured from the top of the lowest level of the building foundation.

**1613.9.9.4 Drift limitations.** The story drift below the base level diaphragm shall not exceed 0.007 times the story height at strength design force level. The total drift from the base level diaphragm to the top of the foundation shall not exceed 3/4 inch (19 mm). Where the story height or the height from the base level diaphragm to the top of the foundation varies because of a stepped footing or story offset, the height shall be measured from the average height of the top of the foundation. The story drift shall not be reduced by the effect of horizontal diaphragm stiffness.

**1613.9.9.5 Distribution of lateral forces.**

**1613.9.9.5.1 General.** The design lateral force shall be distributed to lateral-force-resisting elements of varying heights in accordance with the stiffness of each individual element.

**1613.9.9.5.2 Wood structural panel sheathed walls.** The stiffness of a stepped wood structural panel shear wall may be determined by dividing the wall into adjacent rectangular elements, subject to the same top of wall deflection. Deflections of shear walls may be estimated by AWC SDPWS Section 4.3.2. Sheathing and fastening requirements for the stiffest section shall be used for the entire wall. Each section of wall shall be anchored for shear and uplift at each step. The minimum horizontal length of a step shall be 8 feet (2438 mm) and the maximum vertical height of a step shall be 2 feet 8 inches (813 mm).

**1613.9.9.5.3 Reinforced concrete or masonry shear walls.** Reinforced concrete or masonry shear walls shall have forces distributed in proportion to the rigidity of each section of the wall.

**1613.9.9.6 Limitations.** The following lateral force-resisting-elements shall not be designed to resist lateral forces below the base level diaphragm in the direction normal to the downhill direction:

1. Cement plaster and lath,
2. Gypsum wallboard, and
3. Tension-only braced frames.

Braced frames designed in accordance with the requirements of Section 2202.2.1.2 of this Code may be designed as lateral-force-resisting elements in the direction normal to the downhill direction, provided lateral forces do not induce flexural stresses in any member of

the frame. Deflections of frames shall account for the variation in slope of diagonal members when the frame is not rectangular.

**1613.9.10 Specific design provisions.**

**1613.9.10.1 Footings and grade beams.** All footings and grade beams shall comply with the following:

1. Grade beams shall extend at least 12 inches (305 mm) below the lowest adjacent grade and provide a minimum 24 inch (610 mm) distance horizontally from the bottom outside face of the grade beam to the face of the descending slope.

2. Continuous footings shall be reinforced with at least two No. 4 reinforcing bars at the top and two No. 4 reinforcing bars at the bottom.

3. All main footing and grade beam reinforcement steel shall be bent into the intersecting footing and fully developed around each corner and intersection.

4. All concrete stem walls shall extend from the foundation and reinforced as required for concrete or masonry walls.

**1613.9.10.2 Protection against decay and termites.** All wood to earth separation shall comply with the following:

1. Where a footing or grade beam extends across a descending slope, the stem wall, grade beam, or footing shall extend up to a minimum 18 inches (457 mm) above the highest adjacent grade.

**Exception:** At paved garage and doorway entrances to the building, the stem wall need only extend to the finished concrete slab, provided the wood framing is protected with a moisture proof barrier.

2. Wood ledgers supporting a vertical load of more than 100 pounds per lineal foot (1.46 kN/m) based on Allowable Stress Design (ASD) levels and located within 48 inches (1219 mm) of adjacent grade are prohibited. Galvanized steel ledgers and anchor bolts, with or without wood nailers, or treated or decay resistant sill plates supported on a concrete or masonry seat, may be used.

**1613.9.10.3 Sill plates.** All sill plates and anchorage shall comply with the following:

1. All wood framed walls, including nonbearing walls, when resting on a footing, foundation, or grade beam stem wall, shall be supported on wood sill plates bearing on a level surface.

2. Power-driven fasteners shall not be used to anchor sill plates except at interior nonbearing walls not designed as shear walls.

**1613.9.10.4 Column base plate anchorage.** The base of isolated wood posts (not framed into a stud wall) supporting a vertical load of 4,000 pounds (17.8 kN) based on Allowable Stress Design (ASD) levels or more and the base plate for a steel column shall comply with the following:

1. When the post or column is supported on a pedestal extending above the top of a footing or grade beam, the pedestal shall be designed and reinforced as required for concrete or masonry columns. The pedestal shall be reinforced with a minimum of four No. 4 bars extending to the bottom of the footing or grade beam. The top of exterior pedestals shall be sloped for positive drainage.

2. The base plate anchor bolts or the embedded portion of the post base, and the vertical reinforcing bars for the pedestal, shall be confined with two No. 4 or three No. 3 ties within the top 5 inches (127 mm) of the concrete or masonry pedestal. The base plate anchor bolts shall be embedded a minimum of 20 bolt diameters into the concrete or masonry pedestal. The base plate anchor bolts and post bases shall be galvanized and each anchor bolt shall have at least 2 galvanized nuts above the base plate.

**1613.9.10.5 Steel beam to column supports.** All steel beam to column supports shall be positively braced in each direction. Steel beams shall have stiffener plates installed on each side of the beam web at the column. The stiffener plates shall be welded to each beam flange and the beam web. Each brace connection or structural member shall consist of at least two 5/8 inch (15.9 mm) diameter machine bolts.

**14.04.085 - Section 1613.10 is added to Chapter 16 of the 2025 Edition of the California Building Code to read as follows.**

**1613.10 Suspended ceilings**. Minimum design and installation standards for suspended ceilings shall be determined in accordance with the requirements of Section 2506.2.1 of this Code and this section.

**EXHIBIT 2**

**1613.10.1 Scope.** This part contains special requirements for suspended ceilings and lighting systems. Provisions of Section 13.5.6 of ASCE 7 shall apply except as modified herein.

**1613.10.2 General.** The suspended ceilings and lighting systems shall be limited to 6 feet (1828 mm) below the structural deck unless the lateral bracing is designed by a licensed engineer or architect.

**1613.10.3 Sprinkler heads.** All sprinkler heads (drops) except fire-resistance-rated floor/ceiling or roof/ceiling assemblies, shall be designed to allow for free movement of the sprinkler pipes with oversize rings, sleeves or adaptors through the ceiling tile. Sprinkler heads and other penetrations shall have a 2 inch (50mm) oversize ring, sleeve, or adapter through the ceiling tile to allow for free movement of at least 1 inch (25mm) in all horizontal directions. Alternatively, a swing joint that can accommodate 1 inch (25 mm) of ceiling movement in all horizontal directions is permitted to be provided at the top of the sprinkler head extension.

Sprinkler heads penetrating fire-resistance-rated floor/ceiling or roof/ceiling assemblies shall comply with Section 714 of this Code.

**1613.10.4 Special requirements for means of egress.** Suspended ceiling assemblies located along means of egress serving an occupant load of 30 or more and at lobbies accessory to Group A Occupancies shall comply with the following provisions.

**1613.10.4.1 General.** Ceiling suspension systems shall be connected and braced with vertical hangers attached directly to the structural deck along the means of egress serving an occupant load of 30 or more and at lobbies accessory to Group A Occupancies. Spacing of vertical hangers shall not exceed 2 feet (610 mm) on center along the entire length of the suspended ceiling assembly located along the means of egress or at the lobby.

**1613.10.4.2 Assembly device.** All lay-in panels shall be secured to the suspension ceiling assembly with two hold-down clips minimum for each tile within a 4-foot (1219 mm) radius of the exit lights and exit signs.

**1613.10.4.3 Emergency systems.** Independent supports and braces shall be provided for light fixtures required for exit illumination. Power supply for exit illumination shall comply with the requirements of Section 1008.3 of this Code.

**1613.10.4.4 Supports for appendage.** Separate support from the structural deck shall be provided for all appendages such as light fixtures, air diffusers, exit signs, and similar elements.

**EXHIBIT 2**

## 14.04.090 - Section 1704.6 of the 2025 Edition of the California Building Code is amended to read as follows.

### 1704.6 Structural Observations.

Where required by the provisions of Section 1704.6.1, the owner or the owner's authorized agent shall employ a registered design professional to perform structural observations. The structural observer shall visually observe representative locations of structural systems, details and load paths for general conformance to the approved construction documents. Structural observation does not include or waive the responsibility for the inspections in Section 110 or the special inspections in Section 1705 or other sections of this code. Prior to the commencement of observations, the structural observer shall submit to the building official a written statement identifying the frequency and extent of structural observations. At the conclusion of the work included in the permit, the structural observer shall submit to the building official a written statement that the site visits have been made and identify any reported deficiencies that, to the best of the structural observer's knowledge, have not been resolved.

The structural observer shall be one of the following individuals:

1. The registered design professional responsible for the structural design, or
2. A registered design professional designated by the registered design professional responsible for the structural design.

The owner or owner's authorized agent shall coordinate and call a preconstruction meeting between the structural observer, contractors, affected subcontractors and special inspectors. The structural observer shall preside over the meeting. The purpose of the meeting shall be to identify the major structural elements and connections that affect the vertical and lateral load resisting systems of the structure and to review scheduling of the required observations. A record of the meeting shall be included in the report submitted to the building official.

Observed deficiencies shall be reported in writing to the owner or owner's authorized agent, special inspector, contractor and the building official. Upon the form prescribed by the building official, the structural observer shall submit to the building official a written statement at each significant construction stage stating that the site visits have been made and identifying any reported deficiencies which, to the best of the structural observer's knowledge, have not been resolved. A final report by the structural observer which states that all observed deficiencies have been resolved is required before acceptance of the work by the building official.

**EXHIBIT 2**

**14.04.095 – Section 1704.6.1 of the 2025 Edition of the California Building Code is amended to read as follows.**

**1704.6.1 Structural observations for structures.**

Structural observations shall be provided for those structures where one or more of the following conditions exist:

1. The structure is classified as Risk Category III or IV.
2. The structure is a high-rise building.
3. The structure is assigned to Seismic Design Category E, and is greater than two stories above grade plane.
4. Such observation is required by the registered design professional responsible for the structural design.
5. Such observation is specifically required by the building official.
6. A lateral design is required for the structure or portion thereof.

**Exception:** One-story wood framed Group R-3 and Group U Occupancies less than 2,000 square feet in area, provided the adjacent grade is not steeper than 1 unit vertical in 10 units horizontal (10% sloped), assigned to Seismic Design Category D.

**14.04.100 - Section 1705.3 of the 2025 Edition of the California Building Code is amended to read as follows.**

**1705.3 Concrete construction.**

Special inspections and tests of concrete construction shall be performed in accordance with this section and Table 1705.3.

Exceptions: Special inspections and tests shall not be required for: [OSHPD 1R, 2 & 5] Exceptions 1 through 4 are not permitted by OSHPD.

1. Isolated spread concrete footings of buildings three stories or less above grade plane that are fully supported on earth or rock, where the structural design of the footing is based on a specified compressive strength, f'c, no greater than 2,500 pounds per square inch (psi) (17.2 MPa) regardless of the compressive strength specified in the construction documents or used in the footing construction.
2. Continuous concrete footings supporting walls of buildings three stories or less above grade plane that are fully supported on earth or rock where:
    2.1. The footings support walls of light-frame construction.
    2.2. The footings are designed in accordance with Table 1809.7.
    2.3. The structural design of the footing is based on a specified compressive strength, $f'_c$, not more than 2,500 pounds per square inch (psi) (17.2 MPa), regardless of the compressive strength specified in the approved construction documents or used in the footing construction.
3. Nonstructural concrete slabs supported directly on the ground, including prestressed slabs on grade, where the effective prestress in the concrete is less than 150 psi (1.03 MPa).

4. Reserved.
5. Concrete patios, driveways and sidewalks, on grade.

**14.04.105 - Section 1807.1.4 of the 2025 Edition of the California Building Code is amended to read as follows:**

**1807.1.4 Permanent wood foundation systems**
[OSHPD 1R, 2 & 5] Not permitted by OSHPD. Permanent wood foundation systems shall be designed and installed in accordance with AWC PWF. Lumber and plywood shall be preservative treated in accordance with AWPA U1 (Commodity Specification A, Special Requirement 4.2) and shall be identified in accordance with Section 2303.1.9.1. Permanent wood foundation systems shall not be used for structures assigned to Seismic Design Category D, E or F.

**14.04.110 - Section 1807.1.6 of the 2025 Edition of the California Building Code is amended to read as follows, subsections adopted as published:**

**1807.1.6 Prescriptive design of concrete and masonry foundation walls.**
***[OSHPD 1R, 2 & 5]*** *Not permitted by OSHPD.* Concrete and masonry foundation walls that are laterally supported at the top and bottom shall be permitted to be designed and constructed in accordance with this section. Prescriptive design of foundation walls shall not be used for structures assigned to Seismic Design Category D, E or F.

**14.04.115 - Section 1807.2 of the 2025 Edition of the California Building Code is amended to read as follows, subsections adopted as published.**

**1807.2 Retaining walls.**
Retaining walls shall be designed in accordance with Section 1807.2.1 through 1807.2.4. Retaining walls assigned to Seismic Design Category D, E or F shall not be partially or wholly constructed of wood.

**14.04.120 - Section 1807.3.1 of the 2025 Edition of the California Building Code is amended to read as follows:**

**1807.3.1 Limitations.** The design procedures outlined in this section are subject to the following limitations:

1. The frictional resistance for structural walls and slabs on silts and clays shall be limited to one-half of the normal force imposed on the soil by the weight of the footing or slab.

2. Posts embedded in earth shall not be used to provide lateral support for structural or nonstructural materials such as plaster, masonry or concrete unless bracing is provided that develops the limited deflection required.

Wood poles shall be treated in accordance with AWPA U1 for sawn timber posts (Commodity Specification A, Use Category 4B) and for round timber posts (Commodity Specification B, Use Category 4B). Wood poles and posts embedded in direct contact with soil shall not be used for structures assigned to Seismic Design Category D, E or F.

**Exception:** Wood poles and posts embedded in direct contact with soil may be used to support nonhabitable, nonoccupiable structures such as fences when approved by the building official.

**14.04.125 - Section 1809.3 of the 2025 Edition of the California Building Code is amended to read as follows.**

**1809.3 Stepped footings**. The top surface of footings shall be level. The bottom surface of footings shall be permitted to have a slope not exceeding one unit vertical in 10 units horizontal (10-percent slope). Footings shall be stepped where it is necessary to change the elevation of the top surface of the footing or where the surface of the ground slopes more than one unit vertical in 10 units horizontal (10-percent slope).

***[OSHPD 1R, 2 & 5]*** *Individual steps in continuous footings shall not exceed 18 inches (457 mm) in height and the slope of a series of such steps shall not exceed 1 unit vertical to 2 units horizontal (50-percent slope) unless otherwise recommended by a geotechnical report. The steps shall be detailed on the drawings. The local effects due to the discontinuity of the steps shall be considered in the design of the foundation.*

For structures assigned to Seismic Design Category D, E or F, the stepping requirement shall also apply to the top surface of continuous footings supporting walls. Footings shall be reinforced with four No. 4 deformed reinforcing bars. Two bars shall be placed at the top and bottom of the footings as shown in Figure 1809.3.

**EXHIBIT 2**

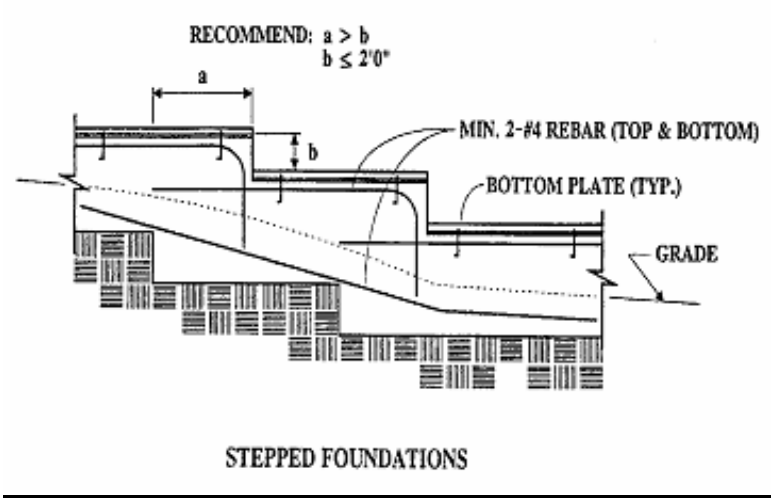



FIGURE 1809.3
STEPPED FOOTING

**14.04.130 - Section 1809.7 and Table 1809.7 of the 2025 Edition of the California Building Code is amended to read as follows.**

**1809.7 Prescriptive footings for light-frame construction**.
***[OSHPD 1R, 2 & 5]*** *Not permitted by OSHPD.* Where a specific design is not provided, concrete or masonry-unit footings supporting walls of light-frame construction shall be permitted to be designed in accordance with Table 1809.7. Light-frame construction using prescriptive footings in Table 1809.7 shall not exceed one story above grade plane for structures assigned to Seismic Design Category D, E or F.

**TABLE 1809.7**
**PRESCRIPTIVE FOOTINGS SUPPORTING WALLS OF LIGHT-FRAME CONSTRUCTION** [a, b, c, d, e]

| NUMBER OF FLOORS SUPPORTED BY THE FOOTING [f] | WIDTH OF FOOTING (inches) | THICKNESS OF FOOTING (inches) |
|---|---|---|
| 1 | 12 | 6 |
| 2 | 15 | 6 |
| 3 | 18 | 8 |

For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm

a. Depth of footings shall be in accordance with Section 1809.4.
b. The ground under the floor shall be permitted to be excavated to the elevation of the top of the footing.
c. Not adopted.
d. See Section 1905 for additional requirements for concrete footings of structures assigned to Seismic Design Category C, D, E or F.
e. For thickness of foundation walls, see Section 1807.1.6.
f. Footings shall be permitted to support a roof addition to the stipulated number of floors. Footings supporting roof only shall be as required for supporting one floor.

**14.04.135 - Section 1809.12 of the 2025 Edition of the California Building Code is amended to read as follows.**

**1809.12 Timber footings**.

***[OSHPD 1R, 2 & 5]*** *Not permitted by OSHPD.* Timber footings shall be permitted for buildings of Type V construction and as otherwise approved by the Building Official. Such footings shall be treated in accordance with AWPA U1 (Commodity Specification A, Use Category 4B). Treated timbers are not required where placed entirely below permanent water level, or where used as capping for wood piles that project above the water level over submerged or marsh lands. The compressive stresses perpendicular to grain in untreated timber footings supported on treated piles shall not exceed 70 percent of the allowable stresses for the species and grade of timber as specified in the ANSI/AWC NDS. Timber footings shall not be used in structures assigned to Seismic Design Category D, E or F.

**14.04.140 - Section 1810.3.2.4 of the 2025 Edition of the California Building Code is amended to read as follows.**

**1810.3.2.4 Timber**.
***[OSHPD 1R, 2 & 5]*** *Not permitted by OSHPD.* Timber deep foundation elements shall be designed as piles or poles in accordance with ANSI/AWC NDS. Round timber elements shall conform to ASTM D 25. Sawn timber elements shall conform to DOC PS-20. Timber deep foundation elements shall not be used in structures assigned to Seismic Design Category D, E or F.

**1810.3.2.4.1 Preservative treatment.**
Timber deep foundation elements used to support permanent structures shall be treated in accordance with this section unless it is established that the tops of the untreated timber elements will be below the lowest ground-water level assumed to exist during the life of the structure. Preservative and minimum final retention shall be in accordance with AWPA U1 (Commodity Specification E, Use Category 4C) for round timber elements and AWPA U1 (Commodity Specification A, Use Category 4B) for sawn timber elements. Preservative-treated timber elements shall be subject to a quality control program administered by an approved agency. Element cutoffs shall be treated in accordance with AWPA M4.

**14.04.145 - Section 1905.6.2 of the 2025 Edition of the California Building Code is amended to read as follows.**

**1905.6.2 Seismic design categories C, D, E, and F.**

1. Structural plain concrete basement, foundation or other walls below the base as defined in ASCE/SEI 7 are permitted in detached one-and-two-family dwellings three stories or less in height constructed with stud-bearing walls. In dwellings assigned to Seismic Design Category D or E, the height of the wall shall not exceed 8 feet (2438 mm), the thickness shall be not less than 71/2 inches (190 mm), and the wall shall retain not more than 4 feet (1219 mm) of unbalanced fill. Walls shall have reinforcement in accordance with Section 14.6.1 of ACI 318.

2. Isolated footings of plain concrete supporting pedestals or columns are permitted, provided that the projection of the footing beyond the face of the supported member does not exceed the footing thickness.
   **Exception**: In detached one-and-two-family dwellings three stories or less in height, the projection of the footing beyond the face of the supported member is permitted to exceed the footing thickness.
3. Plain concrete footings supporting wall are permitted, provided that the footings have not fewer than two continuous longitudinal reinforcing bars. Bars shall not be smaller than No. 4 and shall have a total area of not less than 0.002 times the gross cross-sectional area of the footing. For footings that exceed 8 inches (203 mm) in thickness, not fewer than one bar shall be provided at the top and bottom of the footing. Continuity of reinforcement shall be provided at corners and intersections.
   **Exceptions:**
   a. Where assigned to Seismic Design Category C, detached one-and-two-family dwellings three stories or less in height constructed with stud-bearing walls are permitted to have plain concrete footings without longitudinal reinforcement.
   b. For foundation systems consisting of a plain concrete footing and a plain concrete stemwall, not fewer than one bar shall be provided at the top of the stemwall and at the bottom of the footing.,
   c. Footings cast monolithically with a slab-on-grade shall have not fewer than one No. 4 bar at the top and bottom of the footing or one No. 5 bar or two No. 4 bars in the middle third of the footing depth.

Structures assigned to Seismic Design Category C, D, E, or F shall not have elements of structural plain concrete except where concrete used for fill with a minimum cement content of two (2) sacks of Portland cement or cementitious material per cubic yard.

**14.04.150 - Subsections 1905.8 through 1905.10 are added to Chapter 19 of the 2025 California Building Code to read as follows**:

**1905.8 ACI 318, Section 18.7.5.** Modify ACI 318, Section 18.7.5, by adding Section 18.7.5.8 and 18.7.5.9 as follows:

18.7.5.8 – Where the calculated point of contraflexure is not within the middle half of the member clear height, provide transverse reinforcement as specified in ACI 318 Sections 18.7.5.1, Items (a) through (c), over the full height of the member.

18.7.5.9 – At any section where the design strength, $\varphi P_n$, of the column is less than the sum of the shears $V_e$ computed in accordance with ACI 318 Sections 18.7.6.1 and 18.6.5.1 for all the beams framing into the column above the level under consideration, transverse reinforcement as specified in ACI 318 Sections 18.7.5.1 through 18.7.5.3 shall be provided. For beams framing into opposite sides of the column, the moment

components are permitted to be assumed to be of opposite sign. For the determination of the design strength, $\varphi P_n$, of the column, these moments are permitted to be assumed to result from the deformation of the frame in any one principal axis.

**1905.9 ACI 318, Section 18.10.4.** Modify ACI 318, Section 18.10.4, by adding Section 18.10.4.7 as follows:

18.10.4.7 – Walls and portions of walls with $P_u > 0.35P_o$ shall not be considered to contribute to the calculated shear strength of the structure for resisting earthquake-induced forces. Such walls shall conform to the requirements of ACI 318 Section 18.14.

**1905.10 ACI318, Section 18.12.6**. Modify ACI 318, by adding Section 18.12.6.2 as follows:

18.12.6.2 Collector and boundary elements in topping slabs placed over precast floor and roof elements shall not be less than 3 inches (76 mm) or 6 $d_b$ in thickness, where $d_b$ is the diameter of the largest reinforcement in the topping slab.

**14.04.155 – Section 2304.10.2 of the 2025 Edition of the California Building Code is amended to read as follows, Table 2304.10.2 is adopted as published:**

**2304.10.2 Fastener requirements**. Connections for wood members shall be designed in accordance with the appropriate methodology in Section 2302.1. The number and size of fasteners connecting wood members shall not be less than that set forth in Table 2304.10.2. Staple fasteners in Table 2304.10.2 shall not be used to resist or transfer seismic forces in structures assigned to Seismic Design Category D, E or F.

**Exception**: Staples may be used to resist or transfer seismic forces when the allowable shear values are substantiated by cyclic testing and approved by the building official.

**14.04.160 – Section 2304.10.3.1 of the 2025 Edition of the California Building Code is amended to read as follows.**

**2304.10.3.1 Quality of Nails**. In Seismic Design Category D, E or F, mechanically driven nails used in wood structural panel shear walls shall meet the same dimensions as that required for hand-driven nails, including diameter, minimum length and minimum head diameter. Clipped head or box nails are not permitted in new construction. The allowable design value for clipped head nails in existing construction may be taken at no more than the nail-head-area ratio of that of the same size hand-driven nails.

**EXHIBIT 2**

**14.04.165 – Section 2304.12.2.8 of the 2025 Edition of the California Building Code is amended to read as follows.**

**2304.12.2.8 Wood used in retaining walls and cribs**. Wood installed in retaining or crib walls shall be preservative treated in accordance with AWPA U1 for soil and fresh water use. Wood shall not be used in retaining or crib walls for structures assigned to Seismic Design Category D, E or F.

**14.04.170 - Section 2305.4 is added to the 2025 Edition of the California Building Code to read as follows.**

**2305.4 Hold-down connectors**. In Seismic Design Category D, E or F, hold-down connectors shall be designed to resist shear wall overturning moments using approved cyclic load values or 75 percent of the allowable seismic load values that do not consider cyclic loading of the product. Connector bolts into wood framing shall require steel plate washers on the post on the opposite side of the anchorage device. Plate size shall be a minimum of 0.229 inch by 3 inches by 3 inches (5.82 mm by 76 mm by 76 mm) in size. Hold-down connectors shall be tightened to finger tight plus one half (1/2) wrench turn just prior to covering the wall framing.

**14.04.175 - Section 2306.2 is added to the 2025 Edition of the California Building Code to read as follows.**

**2306.2 Wood-frame diaphragms.** Wood-frame diaphragms shall be designed and constructed in accordance with AWC SDPWS. Where panels are fastened to framing members with staples, requirements and limitations of AWC SDPWS shall be met and the allowable shear values set forth in Table 2306.2(1) or 2306.2(2) shall only be permitted for structures assigned to Seismic Design Category A, B, or C.

**Exception:** Allowable shear values where panels are fastened to framing members with staples may be used if such values are substantiated by cyclic testing and approved by the building official.

The allowable shear values in Tables 2306.2(1) and 2306.2(2) are permitted to be increased 40 percent for wind design.

Wood structural panels used to resist seismic diaphragm forces in structures assigned to Seismic Design Category D, E or F shall be applied directly to the framing members.

**Exception:** Wood structural panels are permitted to be fastened over solid lumber planking or laminated decking, provided the panel joints and lumber planking or laminated decking joints do not coincide.

**EXHIBIT 2**

**14.04.180 – Section 2306.3 is added to the 2025 Edition of the California Building Code to read as follows.**

**2306.3 Wood-frame shear walls.** Wood-frame shear walls shall be designed and constructed in accordance with AWC SDPWS. For structures assigned to Seismic Design Category D, E, or F, application of Table 4.3A of ANSI/AWC SDPWS shall include the following:

1. Wood structural panel thickness for shear walls shall not be less than 3/8 inch thick and studs shall not be spaced at more than 16 inches on center.

2. The maximum nominal unit shear capacities for 3/8 inch wood structural panels resisting seismic forces in structures assigned to Seismic Design Category D, E or F is 400 pounds per linear foot (plf).

**Exception:** Other nominal unit shear capacities may be permitted if such values are substantiated by cyclic testing and approved by the building official.

3. Nails shall be placed not less than 1/2 inch in from the panel edges and not less than 3/8 inch from the edge of the connecting members for shear greater than 350 plf using ASD or 500 plf using LRFD. Nails shall be placed not less than 3/8 inch from panel edges and not less than 1/4 inch from the edge of the connecting members for shears of 350 plf or less using ASD or 500 plf or less using LRFD.

For structures assigned to Seismic Design Category D, E or F, application of Table 4.3B of ANSI/AWC SDPWS shall not be allowed.

For structures assigned to Seismic Design Category D, E or F, application of Table 4.3C of ANSI/AWC SDPWS shall not be used below the top level in a multi-level building.

Where panels are fastened to framing members with staples, requirements and limitations of AWC SDPWS shall be met and the allowable shear values set forth in Table 2306.3(1), 2306.3(2) or 2306.3(3) shall only be permitted for structures assigned to Seismic Design Category A, B, or C.

**Exception:** Allowable shear values where panels are fastened to framing members with staples may be used if such values are substantiated by cyclic testing and approved by the building official.

The allowable shear values in Tables 2306.3(1) and 2306.3(2) are permitted to be increased 40 percent for wind design. Panels complying with

ANSI/APA PRP-210 shall be permitted to use design values for Plywood Siding in the AWC SDPWS.

**14.04.185 – Section 2307.2 is added to the 2025 Edition of the California Building Code to read as follows.**

**2307.2 Wood-frame shear walls**. Wood-frame shear walls shall be designed and constructed in accordance with Section 2306.3 as applicable.

**14.04.190 – Table 2308.10.1 is added to the 2025 Edition of the California Building Code to read as follows.**

## EXHIBIT 2

**TABLE 2308.6.1[a]**
**WALL BRACING REQUIREMENTS**

| SEISMIC DESIGN CATEGORY | STORY CONDITION (SEE SECTION 2308.2) | MAXIMUM SPACING OF BRACED WALL LINES | BRACED PANEL LOCATION, SPACING (O.C.) AND MINIMUM PERCENTAGE (X) | | | MAXIMUM DISTANCE OF BRACED WALL PANELS FROM EACH END OF BRACED WALL LINE |
|---|---|---|---|---|---|---|
| | | | Bracing method[b] | | | |
| | | | LIB | DWB, WSP | SFB, PBS, PCP, HPS, GB[c,d] | |
| A and B |  | 35′- 0″ | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| |  | 35′- 0″ | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| |  | 35′- 0″ | NP | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| C |  | 35′- 0″ | NP | Each end and ≤ 25′- 0″ o.c. | Each end and ≤ 25′- 0″ o.c. | 12′- 6″ |
| |  | 35′- 0″ | NP | Each end and ≤ 25′- 0″ o.c. (minimum 25% of wall length)[e] | Each end and ≤ 25′- 0″ o.c. (minimum 25% of wall length)[e] | 12′- 6″ |
| D and E[f,g,h] |  | 25′- 0″ | NP | $S_{DS}$ < 0.50: Each end and ≤ 25′- 0″ o.c. (minimum 21% of wall length)[e] | $S_{DS}$ < 0.50: Each end and ≤ 25′- 0″ o.c. (minimum 43% of wall length)[e] | 8′- 0″ |
| | | | | 0.5 ≤ $S_{DS}$ < 0.75: Each end and ≤ 25′- 0″ o.c. (minimum 32% of wall length)[e] | 0.5 ≤ $S_{DS}$ < 0.75: Each end and ≤ 25′- 0″ o.c. (minimum 59% of wall length)[e] | |
| | | | | 0.75 ≤ $S_{DS}$ ≤ 1.00: Each end and ≤ 25′- 0″ o.c. (minimum 37% of wall length)[e] | 0.75 ≤ $S_{DS}$ ≤ 1.00: Each end and ≤ 25′- 0″ o.c. (minimum 75% of wall length) | |
| | | | | $S_{DS}$ > 1.00: Each end and ≤ 25′- 0″ o.c. (minimum 48% of wall length)[e] | $S_{DS}$ > 1.00: Each end and ≤ 25′- 0″ o.c. (minimum 100% of wall length)[e] | |

For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

NP = Not Permitted.

a. This table specifies minimum requirements for braced wall panels along interior or exterior braced wall lines.

b. See Section 2308.6.3 for full description of bracing methods.

c. For Method GB, gypsum wallboard applied to framing supports that are spaced at 16 inches on center.

d. The required lengths shall be doubled for gypsum board applied to only one face of a braced wall panel.

e. Percentage shown represents the minimum amount of bracing required along the building length (or wall length if the structure has an irregular shape).

f. DWB, SFB, PBS and HPS wall braces are not permitted in Seismic Design Categories D or E.

g. Minimum length of panel bracing of one face of the wall for WSP sheathing shall be at least 4′-0″ long or both faces of the wall for GB or PCP sheathing shall be at least 8′-0″ long; h/w ratio shall not exceed 2:1. Wall framing to which sheathing used for bracing is applied shall be nominal 2 inch wide [actual 1 1/2 inch (38 mm)] or larger members and spaced a maximum of 16 inches on center. Braced wall panel construction types shall not be mixed within a braced wall line.

h. WSP sheathing shall be a minimum of 15/32″ thick nailed with 8d common placed 3/8 inches from panel edges and spaced not more than 6 inches on center and 12 inches on center along intermediate framing members.

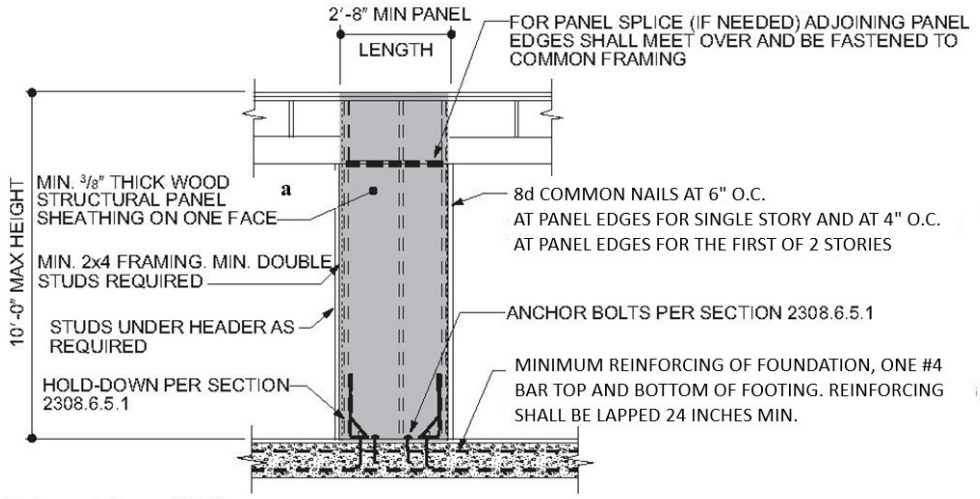
**EXHIBIT 2**

**14.04.195 - Sections 2308.10.5.1 and 2308.10.5.2 and Figures 2308.10.5.1 and 2308.10.5.2 of the 2025 Edition of the California Building Code are amended to read as follows.**

**2308.10.5.1 Alternate braced wall (ABW).** An ABW shall be constructed in accordance with this section and Figure 2308.10.5.1. In one-story buildings, each panel shall have a length of not less than 2 feet 8 inches (813 mm) and a height of not more than 10 feet (3048 mm). Each panel shall be sheathed on one face with 3/8-inch (3.2 mm) minimum-thickness wood structural panel sheathing nailed with 8d common or galvanized box nails in accordance with Table 2304.10.2 and blocked at wood structural panel edges. For structures assigned to Seismic Design Category D or E, each panel shall be sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing nailed with 8d common nails spaced 3 inches on panel edges, 3 inches at intermediate supports. Two anchor bolts installed in accordance with Section 2308.7.1 shall be provided in each panel. Anchor bolts shall be placed at each panel outside quarter points. Each panel end stud shall have a hold-down device fastened to the foundation, capable of providing an approved uplift capacity of not less than 1,800 pounds (8006 N). The hold-down device shall be installed in accordance with the manufacturer's recommendations. The ABW shall be supported directly on a foundation or on floor framing supported directly on a foundation that is continuous across the entire length of the braced wall line. This foundation shall be reinforced with not less than one No.4 bar top and bottom. Where the continuous foundation is required to have a depth greater than 12 inches (305 mm), a minimum 12-inch by 12- inch (305 mm by 305 mm) continuous footing is permitted at door openings in the braced wall line. This continuous footing shall be reinforced with not less than one No. 4 bar top and bottom. This reinforcement shall be lapped 15 inches (381 mm) with the reinforcement required in the continuous foundation located directly under the braced wall line.

Where the ABW is installed at the first story of two-story buildings, the wood structural panel sheathing shall be provided on both faces, three anchor bolts shall be placed at one-quarter points and tie-down device uplift capacity shall be not less than 3,000 pounds (13 344 N).

**EXHIBIT 2**




For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

a. For structures assigned to Seismic Design Category D or E, sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing.

~~FIGURE 2308.6.5.1~~
**ALTERNATE BRACED WALL PANEL (ABW)**

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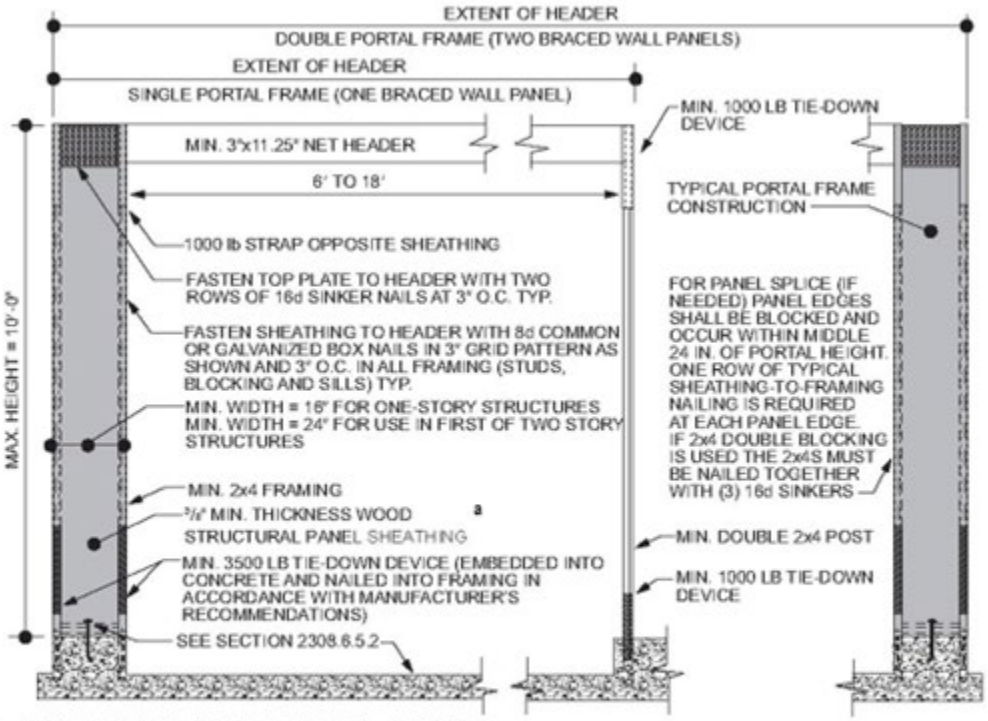
**2308.10.5.2 Portal frame with hold-downs (PFH).** A PFH shall be constructed in accordance with this section and Figure 2308.10.5.2. The adjacent door or window opening shall have a full-length header.

In one-story buildings, each panel shall have a length of not less than 16 inches (406 mm) and a height of not more than 10 feet (3048 mm). Each panel shall be sheathed on one face with a single layer of 3/8-inch (9.5 mm) minimum-thickness wood structural panel sheathing nailed with 8d common or galvanized box nails in accordance with Figure 2308.10.5.2. For structures assigned to Seismic Design Category D or E. each panel shall be sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing nailed with 8d common nails spaced 3 inches on panel edges, 3 inches at intermediate supports and in accordance with Figure 2308.10.5.2. The wood structural panel sheathing shall extend up over the solid sawn or glued-laminated header and shall be nailed in accordance with Figure 2308.10.5.2. A built-up header consisting of at least two 2-inch by 12-inch (51 mm by 305 mm) boards, fastened in accordance with Item 24 of Table 2304.10.2 shall be permitted to be used. A spacer, if used, shall be placed on the side of the built-up beam opposite the wood structural panel sheathing. The header shall extend between the inside faces of the first full-length outer studs of each panel. The clear span of the header between the inner studs of each panel shall be not less than 6 feet (1829 mm) and not more than 18 feet (5486 mm) in length. A strap with an uplift capacity of not less than 1,000 pounds (4,400 N) shall fasten the header to the inner studs opposite the sheathing. One anchor bolt not less than 5/8 inch (15.9 mm) diameter and installed in accordance with Section 2308.7.1 shall be provided in the center of each sill plate. The studs at each end of the panel shall have a hold-down device fastened to the foundation with an uplift capacity of not less than 3,500 pounds (15 570 N).

**EXHIBIT 2**

Where a panel is located on one side of the opening, the header shall extend between the inside face of the first full-length stud of the panel and the bearing studs at the other end of the opening. A strap with an uplift capacity of not less than 1,000 pounds (4400 N) shall fasten the header to the bearing studs. The bearing studs shall also have a hold-down device fastened to the foundation with an uplift capacity of not less than 1,000 pounds (4400 N). The hold-down devices shall be an embedded strap type, installed in accordance with the manufacturer's recommendations. The PFH panels shall be supported directly on a foundation that is continuous across the entire length of the braced wall line. This foundation shall be reinforced with not less than one No. 4 bar top and bottom. Where the continuous foundation is required to have a depth greater than 12 inches (305 mm), a minimum 12-inch by 12-inch (305 mm by 305 mm) continuous footing is permitted at door openings in the braced wall line. This continuous footing shall be reinforced with not less than one No. 4 bar top and bottom. This reinforcement shall be lapped not less than 15 inches (381 mm) with the reinforcement required in the continuous foundation located directly under the braced wall line.

Where a PFH is installed at the first story of two-story buildings, each panel shall have a length of not less than 24 inches (610 mm).




For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm, 1 pound = 4.448 N.

a. For structures assigned to Seismic Design Category D or E, sheathed on one face with 15/32-inch-minimum-thickness (11.9 mm) wood structural panel sheathing.

~~FIGURE 2308.6.5.2~~
**PORTAL FRAME WITH HOLD-DOWNS (PFH)**

**FIGURE 2308.10.5.2**

**EXHIBIT 2**

**14.04.200 - Section 2308.10.8.1 is added to the 2025 Edition of the California Building Code to read as follows.**

**2308.10.8.1 Foundation requirements.** Braced wall lines shall be supported by continuous foundations.

**Exception**: For structures with a maximum plan dimension not more than 50 feet (15 240 mm), continuous foundations are required at exterior walls only for structures assigned to Seismic Design Category A, B, or C.

For structures in Seismic Design Categories D and E, exterior braced wall panels shall be in the same plane vertically with the foundation or the portion of the structure containing the offset shall be designed in accordance with accepted engineering practice and Section 2308.3.

**14.04.205 – Section 2308.10.9 of the 2025 Edition of the California Building Code is amended to read as follows:**

**2308.10.9 Attachment of sheathing**. Fastening of braced wall panel sheathing shall not be less than that prescribed in Tables 2308.10.1 or 2304.10.2. Wall sheathing shall not be attached to framing members by adhesives. Staple fasteners in Table 2304.10.2 shall not be used to resist or transfer seismic forces in structures assigned to Seismic Design Category D, E or F.

**Exception**: Staples may be used to resist or transfer seismic forces when the allowable shear values are substantiated by cyclic testing and approved by the building official.

All braced wall panels shall extend to the roof sheathing and shall be attached to parallel roof rafters or blocking above with framing clips (18 gauge minimum) spaced at maximum 24 inches (6096 mm) on center with four 8d nails per leg (total eight 8d nails per clip minimum). Braced wall panels shall be laterally braced at each top corner and at intervals not to exceed 24 inches (6096 mm) intervals along the top plate of discontinuous vertical framing.

**14.04.210 - Section 3103.1.3 of the 2025 Edition of the California Building Code is amended to read as follows.**

**3103.1.3 Permit required.**
Temporary structures that cover an area greater than 120 square feet (11.16 $m^2$), including connecting areas or spaces with a common means of egress or entrance that are used or intended to be used for the gathering together of 10 or more persons, shall not be erected, operated or maintained for any purpose without obtaining a permit from the building official.

Temporary tent and membrane structures for special events**.** A permit is required to operate an air-supported temporary membrane structure, a temporary special event tent having an area in excess of 400 square feet (37 $m^2$). The aggregate area of multiple tents placed side by side without a fire break clearance of not less than 12 feet (3658 mm) shall not exceed 400 square feet (37 $m^2$) total. A minimum clearance of 12 feet (3658 mm) to structures and other tents shall be provided.

**14.04.215 - Section 3109.1.1 to the 2025 Edition of the California Building Code is added to read as follows.**

In addition to the requirements of Section 3109 in the California Building Code, a swimming pool, pool, spa or any body of water over 18 inches deep shall have an enclosure consisting of a fence, wall, portions of a building or other approved durable material, that isolates all bodies of water from the private building or structure. The enclosure shall be installed around the perimeter of the bodies of water, or at the perimeter of the property.

**14.04.220 - Exception #6 of Section 3114.1 to Chapter 31 of the 2025 Edition of the California Building Code is added to read as follow.**

6. Single-unit stand-alone intermodal shipping containers used as temporary storage or construction trailer on active construction sites. Construction support facilities for uses and activities not directly associated with the actual processes of construction, including but not limited to, offices, meeting rooms, plan rooms, other administrative or support functions shall not be exempt from Section 3114.

**14.04.225 – Section J103.2 of the 2025 Edition of the California Building Code is amended to read as follows:**

8. An excavation that does not exceed 50 cubic yards (38.3 $m^3$) and complies with (a) or (b) as follows:
   (a) Is less than 2 feet (0.6 m) in depth.
   (b) Does not create a cut slope greater than 5 feet (1.5 m) measured vertically upward from the cut surface to the surface of the natural grade and is not steeper than 2 units horizontal to 1 unit vertical (50 percent slope).

**14.04.300 – Section R101.1 of the California Residential Code is amended to read as follows.**

**R101.1 Title.** For the city of Pasadena, these regulations shall be known as the Pasadena Residential Code. The provisions contained in the California Residential Code of the (compiled) California Building Standards Code as defined in section 18910, Health and Safety Code, may be cited as such and are

referred to hereafter as 'these regulations' or 'these building standards' or 'this code.' These regulations shall also be collectively known as the 'California Residential Code' as amended by the Pasadena Municipal Code.

**14.04.305 - Section R105.1.1 of Chapter 1 Division II of the 2025 California Residential Code is added to read as follows:**

**[A]R105.1.1 Zoning Permits**
A zoning permit may be required for items exempted from building permit requirements under Chapter 1 Division II Section 105.2. Exempted work shall not violate any provisions of this Code, Federal, State, Local laws, or regulations.

**14.04.310– Section R301.1.3.2 of the 2025 Edition of the California Residential Code is amended to read as follows:**

**R301.1.3.2 Woodframe structures.** The building official shall require construction documents to be approved and stamped by a California licensed architect or engineer for all dwellings of woodframe construction more than two stories and basement in height located in Seismic Design Category A, B or C. Notwithstanding other sections of law; the law establishing these provisions is found in Business and Professions Code Sections 5537 and 6737.1.

The building official shall require construction documents to be approved and stamped by a California licensed architect or engineer for all dwellings of woodframe construction more than one story in height or with a basement located in Seismic Design Category $D_0$, $D_1$, or $D_2$.

**14.04.315 – Section R301.1.5 is added to the 2025 California Residential Code to read as follows:**

**R301.1.5** Seismic design provisions for buildings constructed on or into slopes steeper than one unit vertical in three units horizontal (33.3 percent slope). The design and construction of new buildings and additions to existing buildings when constructed on or into slopes steeper than one unit vertical in three units horizontal (33.3 percent slope) shall comply with Section 1613.6 of the California Building Code.

**14.04.320 – Items 1, 3, and 5 of Section R301.2.2.6 of the 2025 Edition of the California Residential Code are amended to read as follows:**

1. **Shear wall or braced wall offsets out of plane**. Conditions where exterior shear wall lines or braced wall panels are not in one plane vertically from the foundation to the uppermost story in which they are required.

**3. Shear wall or braced wall offsets in plane.** Conditions where the end of a braced wall panel occurs over an opening in the wall below.

**5. Floor level offset.** Conditions where portions of a floor level are vertically offset.

**14.04.325 – Section R301.2.2.11 is added to the 2025 Edition of the California Residential Code to read as follows:**

**R301.2.2.11 Anchorage of mechanical, electrical, or plumbing components and equipment.** Mechanical, electrical, or plumbing components and equipment shall be anchored to the structure. Anchorage of the components and equipment shall be designed to resist loads in accordance with the California Building Code and ASCE 7, except where the component is positively attached to the structure and flexible connections are provided between the component and associated ductwork, piping, and conduit; and either

1. The component weighs 400 lb (1,780 N) or less and has a center of mass located 4 ft (1.25 m) or less above the supporting structure; or
2. The component weighs 20 lb (89N) or less or, in the case of a distributed system, 5 lb/ft (73 N/m) or less.

**14.04.330 - Section R309.1 of the 2025 Edition of the California Residential Code is amended to read as follows.**

**R309.1 Townhouse automatic sprinkler systems.**

An automatic sprinkler system shall be installed in townhouses. All new construction of buildings and structures shall be provided with an approved automatic fire sprinkler system.

**Exception:** An automatic sprinkler system shall not be required where additions or alterations are made to existing townhouses that do not have an automatic sprinkler system installed.

**R309.1.1 Design and installation.**

Automatic sprinkler systems for townhouses shall be designed and installed in accordance with Section *R309* or NFPA 13D.

**14.04.335 - Section R309.2 of the 2025 Edition of the California Residential Code is amended to read as follows.**

**R309.2 One- and two-family dwellings automatic sprinkler systems.**

An automatic sprinkler system shall be installed in one- and two-family dwellings. All new construction of buildings and structures shall be provided with an approved automatic fire sprinkler system.

Exceptions:

**EXHIBIT 2**

1. An automatic sprinkler system shall not be required for alterations to existing buildings that are not already provided with a sprinkler system.

   Whenever additions result in an additional level above or below grade, or a total increase of more than 1000 square feet (92.9 m $^{2)}$ or more, or an increase of more than fifty percent (50%) of the existing floor area including mezzanines and additional stories, whichever is less, regardless of ownership. Additions shall be cumulative with each application for a building permit from January 1, 2008 to present day. R-3 occupancies shall not be required to comply with this section solely due to the addition of an additional level, unless the criteria for an increase of existing floor area is also exceeded or if the addition exceeds a combined total floor area of 3,600 square feet and fire flow requirements are not met.

2. Accessory Dwelling Unit, provided that all of the following are met:

   2.1. The unit meets the definition of an Accessory Dwelling Unit as defined in the Government Code Section 65852.2.

   2.2. The existing primary residence does not have automatic fire sprinklers.

   2.3. The accessory detached dwelling unit does not exceed 1,200 square feet in size.

   2.4. The unit is on the same lot as the primary residence.

   2.5. All portions of exterior walls are within 150 feet from fire access road as measured by an approved route approved by the Fire Official.

   2.6. All portions of exterior walls within 400 feet of a fire hydrant as measured by an approved route approved by the Fire Official.

3. Detached private garages, utility sheds, and similar structures 500 square feet or less, accessory to a R-3 occupancy, provided no portion of the structure is located more than 150 feet (45,720 mm) from an approved fire department access road.

4. Detached Carports, detached gazebos, pergolas, and similar shade structures open on all sides constructed of non-combustible material 500 square feet or less, accessory to a R-3 occupancy.

5. Other similar structures as deemed appropriate by the fire code official.

**14.04.340 - Section R309.3.1 of the 2025 Edition of the California Residential Code is amended to read as follows and subsections are to be adopted as published by the State.**

**R309.3.1 General.**

The design and installation of automatic sprinkler systems shall be in accordance with NFPA 13D or Section R309.3, which shall be considered to be equivalent to NFPA 13D. Partial automatic sprinkler systems shall not be permitted to be installed only in buildings not required to be equipped with an automatic sprinkler

system. Section R309.3 shall apply to standalone and multipurpose wet-pipe sprinkler systems that do not include the use of antifreeze. A multipurpose automatic sprinkler system shall provide domestic water to both fire sprinklers and plumbing fixtures. A stand-alone automatic sprinkler system shall be separate and independent from the water distribution system.

**14.04.345 - Section R309.3.5 of the 2025 Edition of the California Residential Code is amended to read as follows and subsections are to be adopted as published by the State:**

**R309.3.5 Water supply.**

The water supply shall provide not less than the required design flow rate for sprinklers in accordance with Section R309.3.4.2 at a pressure not less than that used to comply with Section R309.3.6. Where a water supply serves both domestic and fire sprinkler systems, 5 gpm (19 L/min) shall be added to the sprinkler system demand at the point where the systems are connected, to determine the size of common piping and the size of the total water supply requirements where no provision is made to prevent flow into the domestic water system upon operation of a sprinkler. For multipurpose piping systems, the 5 gpm (19 L/min) demand shall be added at the domestic connection nearest the design area. This demand may be split between two domestic connections at 2.5 gpm (10 L/min) each. Hydraulic calculations shall include a 10% safety margin.

**14.04.350 – Section R401.1 of the 2025 Edition of the California Residential Code is amended to read as follows**.

**R401.1 Application.** The provisions of this chapter shall control the design and construction of the foundation and foundation spaces for buildings. In addition to the provisions of this chapter, the design and construction of foundations in flood hazard areas as established by Table R301.2 shall meet the provisions of Section R306. Wood foundations shall be designed and installed in accordance with AWC PWF.

**Exception**: The provisions of this chapter shall be permitted to be used for wood foundations only in the following situations:

1. In buildings that have no more than two floors and a roof.

2. When interior basement and foundation walls are constructed at intervals not exceeding 50 feet (15 240 mm).

Wood foundations in Seismic Design Category $D_0$, $D_1$, or $D_2$ shall not be permitted.

**EXHIBIT 2**

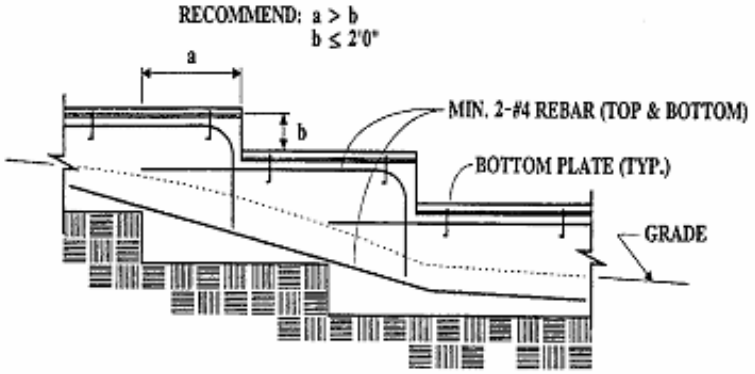
**14.04.355 – Sections R403.1.3.6, R403.1.5 of the 2025 Edition of the California Residential Code are amended to read as follows.**

**R403.1.3.6 Isolated concrete footings**. In detached one- and two-family dwellings located in Seismic Design Category A, B, or C, that are three stories or less in height, and constructed with stud bearing walls, isolated plain concrete footings supporting columns or pedestals are permitted.

**R403.1.5 Slope**. The top surface of footings shall be level. The bottom surface of footings shall not have a slope exceeding 1 unit vertical in 10 units horizontal (10-percent slope). Footings shall be stepped where it is necessary to change the elevation of the top surface of the footings or where the slope of the bottom surface of the footings will exceed one unit vertical in 10 units horizontal (10-percent slope).

For structures assigned to Seismic Design Categories $D_0$, $D_1$, or $D_2$, stepped footings shall be reinforced with four No. 4 rebar. Two bars shall be place at the top and bottom of the footings as shown in Figure R403.1.5.

**FIGURE R403.1.5**
**STEPPED FOOTING**




STEPPED FOUNDATIONS

**14.04.360 – Section R404.2 of the 2025 Edition of the California Residential Code is amended to read as follows.**

**R404.2 Wood foundation walls**. Wood foundation walls shall be constructed in accordance with the provisions of Sections R404.2.1 through R404.2.6 and with the details shown in Figures R403.1(2) and R403.1(3). Wood foundation walls shall not be used for structures located in Seismic Design Category $D_0$, $D_1$, or $D_2$.

**EXHIBIT 2**

## 14.04.365 – Section R501.2 of the 2025 Edition of the California Residential Code is amended to read as follows.

**R501.2 Requirements.** Floor construction shall be capable of accommodating all loads in accordance with Section R301 and of transmitting the resulting loads to the supporting structural elements. Mechanical or plumbing fixtures and equipment shall be attached or anchored to the structure in accordance with Section R301.2.2.11.

## 14.04.370 – Lines 20, 21, 24, and 34-37 of Table R602.3(1) of the 2025 Edition of the California Residential Code are amended to read as follows.

**TABLE R602.3(1)—continued FASTENING SCHEDULE**

| ITEM | DESCRIPTION OF BUILDING ELEMENTS | NUMBER AND TYPE OF FASTENER[a, b, c] | SPACING AND LOCATION | |
|---|---|---|---|---|
| 20 [k] | 1″ × 6″ sheathing to each bearing | 3-8d box ($2^1/_2$″ × 0.113″); or<br>2-8d common ($2^1/_2$″ × 0.131″); or<br>2-10d box (3″ × 0.128″); or<br>2 staples, 1″ crown, 16 ga., $1^3/_4$″ long | Face nail | |
| 21 [k] | 1″ × 8″ and wider sheathing to each bearing | 3-8d box ($2^1/_2$″ × 0.113″); or<br>3-8d common ($2^1/_2$″ × 0.131″); or<br>3-10d box (3″ × 0.128″); or<br>3 staples, 1″ crown, 16 ga., $1^3/_4$″ long | Face nail | |
| | | Wider than 1″ × 8″<br>4-8d box ($2^1/_2$″ × 0.113″); or<br>3-8d common ($2^1/_2$″ × 0.131″); or<br>3-10d box (3″ × 0.128″); or<br>4 staples, 1″ crown, 16 ga., $1^3/_4$″ long | | |
| **Floor** | | | | |
| 24 [k] | 1″ × 6″ subfloor or less to each joist | 3-8d box ($2^1/_2$″ × 0.113″); or<br>2-8d common ($2^1/_2$″ × 0.131″); or<br>3-10d box (3″ × 0.128″); or<br>2 staples, 1″ crown, 16 ga., $1^3/_4$″ long | Face nail | |
| **Other wall sheathing[g]** | | | | |
| 34 [k] | $^1/_2$″ structural cellulosic fiberboard sheathing | $1^1/_2$″ x 0.120” galvanized roofing nail, $^7/_{16}$″ head diameter, or $1^1/_4$″ long 16 ga. staple with $^7/_{16}$″ or 1″ crown | 3 | 6 |
| 35 [k] | $^{25}/_{32}$″ structural cellulosic fiberboard sheathing | $1^3/_4$″ x 0.120” galvanized roofing nail, $^7/_{16}$” head diameter, or 1 ¼” long 16 ga. Staple with $^7/_{16}$” or 1” crown | 3 | 6 |
| 36 [k] | $^1/_2$” gypsum sheathing[d] | $1^1/_2$” x 0.120” galvanized roofing nail, $^7/_{16}$” head diameter, or 1¼” long, 16 ga.;<br>staple galvanized, $1^1/_2$″ long; $^7/_{16}$” or 1” crown or $1^1/_4$″ screws, Type W or S | 7 | 7 |
| 37 [k] | $^5/_8$″ gypsum sheathing[d] | $1^3/_4$″ galvanized roofing nail, $^7/_{16}$” head diameter, or 1¼” long, 16 ga.;<br>staple galvanized, $1^1/_2$″ long; $^7/_{16}$” or 1” crown or $1^1/_4$″ screws, Type W or S | 7 | 7 |

k. Use of staples in roof, floor, and braced wall panels shall be prohibited in Seismic Design Category $D_0$, $D_1$, or $D_2$.

**EXHIBIT 2**

**14.04.375 – Footnote "b" of Table R602.3(2) of the 2025 Edition of the California Residential Code is amended to read as follows**.

b. Staples shall have a minimum crown width of 7/16-inch on diameter except as noted.

Use of staples in roof, floor, subfloor, and braced wall panels shall be prohibited in Seismic Design Category $D_0$, $D_1$, or $D_2$.

**14.04.380 - Section R602.3.2, Exception and Table R602.3.2 of the 2025 Edition of the California Residential Code are amended to read as follows.**

**Exception:** In other than Seismic Design Category $D_0$, $D_1$ or $D_2$, a single top plate used as an alternative to a double top plate shall comply with the following:

1. The single top plate shall be tied at corners, intersecting walls, and at in-line splices in straight wall lines in accordance with Table R602.3.2.
2. The rafters or joists shall be centered over the studs with a tolerance of not more than 1 inch (25 mm).
3. Omission of the top plate is permitted over headers where the headers are adequately tied to adjacent wall sections in accordance with Table R602.3.2.

TABLE R602.3.2
SINGLE TOP-PLATE SPLICE CONNECTION DETAILS

| CONDITION | TOP-PLATE SPLICE LOCATION | | | |
|---|---|---|---|---|
| | Corners and intersecting walls | | Butt joints in straight walls | |
| | Splice plate size | Minimum nails each side of joint | Splice plate size | Minimum nails each side of joint |
| Structures in SDC A-C | 3″ × 6″ × 0.036″ galvanized steel plate or equivalent | (6) 8d box ($2^1/_2$″ × 0.113″) nails | 3′ × 12″ × 0.036″ galvanized steel plate or equivalent | (12) 8d box ($2^1/_2$″ × 0.113″) nails |

For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

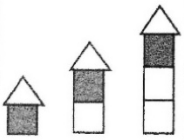
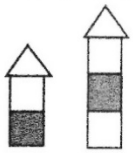
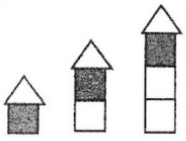
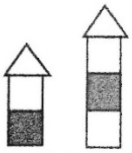
**14.04.385 – Section R602.10.2.3 of the 2025 Edition of the California Residential Code is amended to read as follows.**

**R602.10.2.3 Minimum number of braced wall panels.** Braced wall lines with a length of 16 feet (4877 mm) or less shall have not less than two braced wall panels of any length or one braced wall panel equal to 48 inches (1219 mm) or more. Braced wall lines greater than 16 feet (4877 mm) shall have not less than two braced wall panels.

**EXHIBIT 2**

## 14.04.390 – Table R602.10.3(3) of the 2025 Edition of the California Residential Code is amended to read as follows.

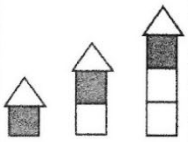
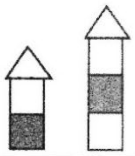
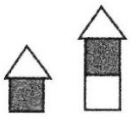
TABLE R602.10.3(3)
BRACING REQUIREMENTS BASED ON SEISMIC DESIGN CATEGORY

| • WALL HEIGHT = 10 FEET<br>• 10 PSF FLOOR DEAD LOAD<br>• 15 PSF ROOF/CEILING DEAD LOAD<br>• BRACED WALL LINE SPACING ≤ 25 FEET | | | MINIMUM TOTAL LENGTH (FEET) OF BRACED WALL PANELS REQUIRED ALONG EACH BRACED WALL LINE[a, g] | | | | |
|---|---|---|---|---|---|---|---|
| Seismic Design Category[b] | Story Location | Braced Wall Line Length (feet)[c] | Method LIB[d] | Method GB | Methods DWB, SFB, PBS, PCP, HPS, CS-SFB[e] | Methods WSP, ABW[f], PFH[f] and PFG[e, f] | Methods CS-WSP, CS-G, CS-PF |
| C (townhouses only) |  | 10 | 2.5 | 2.5 | 2.5 | 1.6 | 1.4 |
| | | 20 | 5.0 | 5.0 | 5.0 | 3.2 | 2.7 |
| | | 30 | 7.5 | 7.5 | 7.5 | 4.8 | 4.1 |
| | | 40 | 10.0 | 10.0 | 10.0 | 6.4 | 5.4 |
| | | 50 | 12.5 | 12.5 | 12.5 | 8.0 | 6.8 |
| |  | 10 | NP | 4.5 | 4.5 | 3.0 | 2.6 |
| | | 20 | NP | 9.0 | 9.0 | 6.0 | 5.1 |
| | | 30 | NP | 13.5 | 13.5 | 9.0 | 7.7 |
| | | 40 | NP | 18.0 | 18.0 | 12.0 | 10.2 |
| | | 50 | NP | 22.5 | 22.5 | 15.0 | 12.8 |
| |  | 10 | NP | 6.0 | 6.0 | 4.5 | 3.8 |
| | | 20 | NP | 12.0 | 12.0 | 9.0 | 7.7 |
| | | 30 | NP | 18.0 | 18.0 | 13.5 | 11.5 |
| | | 40 | NP | 24.0 | 24.0 | 18.0 | 15.3 |
| | | 50 | NP | 30.0 | 30.0 | 22.5 | 19.1 |
| $D_0$ |  | 10 | NP | 5.6 | 5.6 | 1.8 | 1.6 |
| | | 20 | NP | 11.0 | 11.0 | 3.6 | 3.1 |
| | | 30 | NP | 16.6 | 16.6 | 5.4 | 4.6 |
| | | 40 | NP | 22.0 | 22.0 | 7.2 | 6.1 |
| | | 50 | NP | 27.6 | 27.6 | 9.0 | 7.7 |
| |  | 10 | NP | NP | NP | 3.8 | 3.2 |
| | | 20 | NP | NP | NP | 7.5 | 6.4 |
| | | 30 | NP | NP | NP | 11.3 | 9.6 |
| | | 40 | NP | NP | NP | 15.0 | 12.8 |
| | | 50 | NP | NP | NP | 18.8 | 16.0 |
| |  | 10 | NP | NP | NP | 5.3 | 4.5 |
| | | 20 | NP | NP | NP | 10.5 | 9.0 |
| | | 30 | NP | NP | NP | 15.8 | 13.4 |
| | | 40 | NP | NP | NP | 21.0 | 17.9 |
| | | 50 | NP | NP | NP | 26.3 | 22.3 |

*(continued)*

## EXHIBIT 2

TABLE R602.10.3(3)—continued
BRACING REQUIREMENTS BASED ON SEISMIC DESIGN CATEGORY

| • WALL HEIGHT = 10 FEET<br>• 10 PSF FLOOR DEAD LOAD<br>• 15 PSF ROOF/CEILING DEAD LOAD<br>• BRACED WALL LINE SPACING ≤ 25 FEET | | | MINIMUM TOTAL LENGTH (FEET) OF BRACED WALL PANELS REQUIRED ALONG EACH BRACED WALL LINE[a, g] | | | | |
|---|---|---|---|---|---|---|---|
| Seismic Design Category[b] | Story Location | Braced Wall Line Length (feet)[c] | Method LIB[d] | Method GB | Methods DWB, SFB, PBS, PCP, HPS, CS-SFB[e] | Methods WSP, ABW[f], PFH[f] and PFG[e, f] | Methods CS-WSP, CS-G, CS-PF |
| $D_1$ |  | 10 | NP | 6.0 | 6.0 | 2.0 | 1.7 |
| | | 20 | NP | 12.0 | 12.0 | 4.0 | 3.4 |
| | | 30 | NP | 18.0 | 18.0 | 6.0 | 5.1 |
| | | 40 | NP | 24.0 | 24.0 | 8.0 | 6.8 |
| | | 50 | NP | 30.0 | 30.0 | 10.0 | 8.5 |
| |  | 10 | NP | NP | NP | 4.5 | 3.8 |
| | | 20 | NP | NP | NP | 9.0 | 7.7 |
| | | 30 | NP | NP | NP | 13.5 | 11.5 |
| | | 40 | NP | NP | NP | 18.0 | 15.3 |
| | | 50 | NP | NP | NP | 22.5 | 19.1 |
| |  | 10 | NP | NP | NP | 6.0 | 5.1 |
| | | 20 | NP | NP | NP | 12.0 | 10.2 |
| | | 30 | NP | NP | NP | 18.0 | 15.3 |
| | | 40 | NP | NP | NP | 24.0 | 20.4 |
| | | 50 | NP | NP | NP | 30.0 | 25.5 |
| $D_2$[h] |  | 10 | NP | 8.0 | 8.0 | 2.5 | 2.1 |
| | | 20 | NP | 16.0 | 16.0 | 5.0 | 4.3 |
| | | 30 | NP | 24.0 | 24.0 | 7.5 | 6.4 |
| | | 40 | NP | 32.0 | 32.0 | 10.0 | 8.5 |
| | | 50 | NP | 40.0 | 40.0 | 12.5 | 10.6 |
| |  | 10 | NP | NP | NP | 5.5 | 4.7 |
| | | 20 | NP | NP | NP | 11.0 | 9.4 |
| | | 30 | NP | NP | NP | 16.5 | 14.0 |
| | | 40 | NP | NP | NP | 22.0 | 18.7 |
| | | 50 | NP | NP | NP | 27.5 | 23.4 |
| | Three-story dwelling | 10 | NP | NP | NP | NP | NP |
| | | 20 | NP | NP | NP | NP | NP |
| | | 30 | NP | NP | NP | NP | NP |
| | | 40 | NP | NP | NP | NP | NP |
| | | 50 | NP | NP | NP | NP | NP |
| | Cripple wall below one- or two-story dwelling | 10 | NP | NP | NP | 7.5 | 6.4 |
| | | 20 | NP | NP | NP | 15.0 | 12.8 |
| | | 30 | NP | NP | NP | 22.5 | 19.1 |
| | | 40 | NP | NP | NP | 30.0 | 25.5 |
| | | 50 | NP | NP | NP | 37.5 | 31.9 |

*(continued)*

a. Linear interpolation shall be permitted.
b. Interpolation of bracing length between the $S_{ds}$ values associated with the seismic design categories shall be permitted when a site-specific $S_{ds}$ value is determined in accordance with Section 1613.2 of the *California Building Code*.
c. Where the braced wall line length is greater than 50 feet, braced wall lines shall be permitted to be divided into shorter segments having lengths of 50 feet or less, and the amount of bracing within each segment shall be in accordance with this table.
d. Method LIB shall have gypsum board fastened to not less than one side with nails or screws in

accordance with Table R602.3(1) for exterior sheathing or Table R702.3.5 for interior gypsum board. Spacing of fasteners at panel edges shall not exceed 8 inches.

e. Methods PFG and CS-SFB do not apply in Seismic Design Categories $D_0$, $D_1$ and $D_2$.

f. Methods PFH, PFG and ABW are only permitted on a single story or a first of two stories.

g. Where more than one bracing method is used, mixing methods shall be in accordance with Section R602.10.4.1.

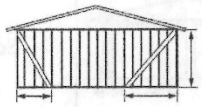
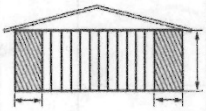
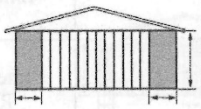
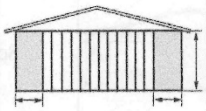
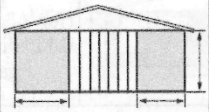
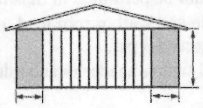
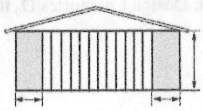
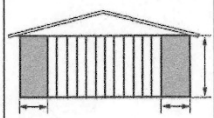
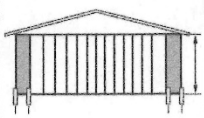
h. One- and two- family dwellings in Seismic Design Category $D_2$ exceeding two stories shall be designed in accordance with accepted engineering practice.

i. Methods GB and PCP braced wall panel h/w ratio shall not exceed 1:1 in SDC $D_0$, $D_1$ and $D_2$. Methods DWB, SFB, PBS, HPS, and CS-SFB are not permitted in $D_0$, $D_1$ and $D_2$.

**EXHIBIT 2**

## 14.04.395 – Table R602.10.4 of the 2025 Edition of the California Residential Code is amended to read as follows.

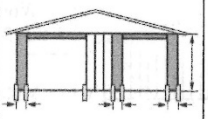
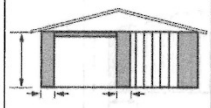
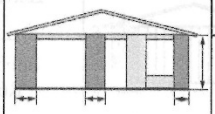
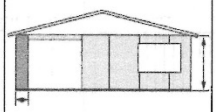
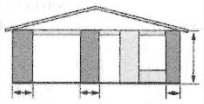
**TABLE R602.10.4**
**BRACING METHODS**

| | METHODS, MATERIAL | MINIMUM THICKNESS | FIGURE | CONNECTION CRITERIA[a] | |
|---|---|---|---|---|---|
| | | | | Fasteners | Spacing |
| Intermittent Bracing Methods | **LIB** Let-in-bracing | 1 × 4 wood or approved metal straps at 45° to 60° angles for maximum 16″ stud spacing |  | Wood: 2-8d common nails or 3-8d ($2^1/_2$″ long × 0.113″ dia.) nails | Wood: per stud and top and bottom plates |
| | | | | Metal strap: per manufacturer | Metal: per manufacturer |
| | **DWB** Diagonal wood boards | $^3/_4$″ (1″ nominal) for maximum 24″ stud spacing |  | 2-8d ($2^1/_2$″ long × 0.113″ dia.) nails or 2-$1^3/_4$″ long staples | Per stud |
| | **WSP** Wood structural panel (See Section R604) | $^3/_8$″ |  | 8d common (2 1/2" x 0.131) nails 3/8" edge distance to panel edge | 6″ edges 12″ field |
| | | | | 8d common (2 1/2" x 0.131) nails 3/8" edge distance to panel edge | Varies by fastener |
| | **BV-WSP**[e] Wood structural panels with stone or masonry veneer (See Section R602.10.6.5) | $^7/_{16}$″ | See Figure R602.10.6.5.2 | 8d common ($2^1/_2$″ × 0.131) nails | 4″ at panel edges 12″ at intermediate supports 4″ at braced wall panel end posts |
| | **SFB** Structural fiberboard sheathing | $^1/_2$″ or $^{25}/_{32}$″ for maximum 16″ stud spacing |  | $1^1/_2$″ long × 0.12″ dia. (for $^1/_2$″ thick sheathing) $1^3/_4$″ long × 0.12″ dia. (for $^{25}/_{32}$″ thick sheathing) galvanized roofing nails | 3″ edges 6″ field |
| | **GB** Gypsum board | $^1/_2$″ |  | Nails or screws per Table R602.3(1) for exterior locations | For all braced wall panel locations: 7″edges (including top and bottom plates) 7″ field |
| | | | | Nails or screws per Table R702.3.5 for interior locations | |
| | **PBS** Particleboard sheathing (See Section R605) | $^3/_8$″ or $^1/_2$″ for maximum 16″stud spacing |  | For $^3/_8$″, 6d common (2″ long × 0.113″ dia.) nails; For $^1/_2$″, 8d common ($2^1/_2$″ long × 0.131″ dia.) nails | 3″ edges 6″ field |
| | **PCP** Portland cement plaster | See Section R703.6 for maximum 16″ stud spacing |  | $1^1/_2$″ long, 11 gage, 0.120″ dia., $^7/_{16}$″ dia. head nails or $^7/_8$″ long, 16 gage staples | 6″ o.c. on all framing members |
| | **HPS** Hardboard panel siding | $^7/_{16}$″ for maximum 16″ stud spacing |  | 0.092″ dia., 0.225″ dia. head nails with length to accommodate $1^1/_2$″ penetration into studs | 4″ edges 8″ field |
| | **ABW** Alternate braced wall | $^3/_8$″ |  | See Section R602.10.6.1 | See Section R602.10.6.1 |

*(continued)*

**EXHIBIT 2**

**TABLE R602.10.4—continued**
**BRACING METHODS**

| | METHODS, MATERIAL | MINIMUM THICKNESS | FIGURE | CONNECTION CRITERIA[a] | |
|---|---|---|---|---|---|
| | | | | Fasteners | Spacing |
| Intermittent Bracing Methods | **PFH** Portal frame with hold-downs | 3/8″ |  | See Section R602.10.6.2 | See Section R602.10.6.2 |
| | **PFG** Portal frame at garage | 7/16″ |  | See Section R602.10.6.3 | See Section R602.10.6.3 |
| Continuous Sheathing Methods | **CS-WSP** Continuously sheathed wood structural panel | 3/8″ |  | 8d common (2 1/2″ x 0.131) nails 3/8″ edge distance to panel edge | 6″ edges 12″ field |
| | | | | 8d common (2 1/2″ x 0.131) nails 3/8″ edge distance to panel edge | Varies by fastener |
| | **CS-G**[b, c] Continuously sheathed wood structural panel adjacent to garage openings | 3/8″ |  | See Method CS-WSP | See Method CS-WSP |
| | **CS-PF** Continuously sheathed portal frame | 7/16″ |  | See Section R602.10.6.4 | See Section R602.10.6.4 |
| | **CS-SFB**[d] Continuously sheathed structural fiberboard | 1/2″ or 25/32″ for maximum 16″ stud spacing |  | 1 1/2″ long × 0.12″ dia. (for 1/2″ thick sheathing) 1 3/4″ long × 0.12″ dia. (for 25/32″ thick sheathing) galvanized roofing nails | 3″ edges 6″ field |

For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm, 1 degree = 0.0175 rad, 1 pound per square foot = 47.8 N/m$^2$, 1 mile per hour = 0.447 m/s.

a. Adhesive attachment of wall sheathing, including Method GB, shall not be permitted in Seismic Design Categories C, $D_0$, $D_1$ and $D_2$.
b. Applies to panels next to garage door opening where supporting gable end wall or roof load only. Shall only be used on one wall of the garage. In Seismic Design Categories $D_0$, $D_1$ and $D_2$, roof covering dead load shall not exceed 3 psf.
c. Garage openings adjacent to a Method CS-G panel shall be provided with a header in accordance with Table R602.7(1). A full-height clear opening shall not be permitted adjacent to a Method CS-G panel.
d. Method CS-SFB does not apply in Seismic Design Categories $D_0$, $D_1$ and $D_2$.
e. Method applies to detached one- and two- family dwellings in Seismic Design Categories $D_0$ through $D_2$ only.
f. Methods GB and PCP braced wall panel h/w ratio shall not exceed 1:1 in SDC $D_0$, $D_1$ and $D_2$. Methods LIB, DWB, SFB, PBS, HPS, and PFG are not permitted in SDC $D_0$, $D_1$ and $D_2$.
g. Use of staples in braced wall panels shall be prohibited in SDC $D_0$, $D_1$ and $D_2$.

**EXHIBIT 2**

**14.04.400 – Table R602.10.5 of the 2025 Edition of the California Residential Code is amended to read as follows:**

## EXHIBIT 2

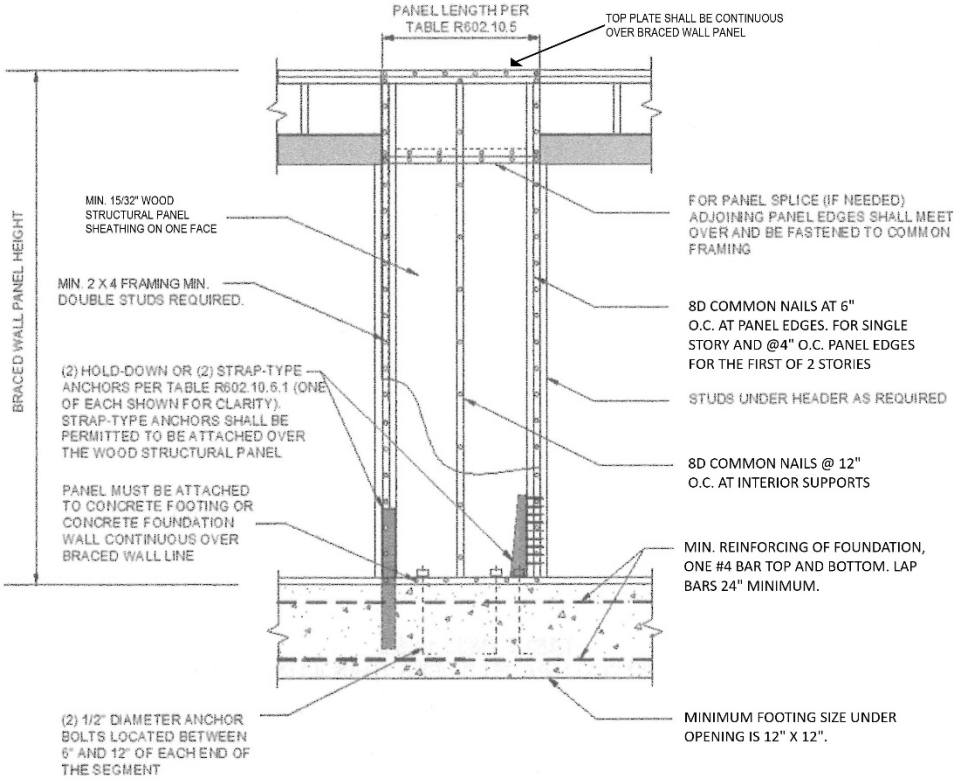
**TABLE R602.10.5**
**MINIMUM LENGTH OF BRACED WALL PANELS**

| METHOD (See Table R602.10.4) | | MINIMUM LENGTH[a] (inches) | | | | | CONTRIBUTING LENGTH (inches) |
|---|---|---|---|---|---|---|---|
| | | Wall Height | | | | | |
| | | 8 feet | 9 feet | 10 feet | 11 feet | 12 feet | |
| DWB, WSP, SFB, PBS, PCP, HPS, BV-WSP | | 48 | 48 | 48 | 53 | 58 | Actual[b] |
| GB | | 48 | 48 | 48 | 53 | 58 | Double sided = Actual<br>Single sided = 0.5 × Actual |
| LIB | | 55 | 62 | 69 | NP | NP | Actual[b] |
| ABW | SDC A, B and C, ultimate design wind speed < 140 mph | 28 | 32 | 34 | 38 | 42 | 48 |
| | SDC $D_0$, $D_1$ and $D_2$, ultimate design wind speed < 140 mph | 32 | 32 | 34 | NP | NP | |
| CS-G | | 24 | 27 | 30 | 33 | 36 | Actual[b] |
| CS-WSP, CS-SFB | Adjacent clear opening height (inches) | | | | | | |
| | ≤ 64 | 24 | 27 | 30 | 33 | 36 | Actual[b] |
| | 68 | 26 | 27 | 30 | 33 | 36 | |
| | 72 | 27 | 27 | 30 | 33 | 36 | |
| | 76 | 30 | 29 | 30 | 33 | 36 | |
| | 80 | 32 | 30 | 30 | 33 | 36 | |
| | 84 | 35 | 32 | 32 | 33 | 36 | |
| | 88 | 38 | 35 | 33 | 33 | 36 | |
| | 92 | 43 | 37 | 35 | 35 | 36 | |
| | 96 | 48 | 41 | 38 | 36 | 36 | |
| | 100 | — | 44 | 40 | 38 | 38 | |
| | 104 | — | 49 | 43 | 40 | 39 | |
| | 108 | — | 54 | 46 | 43 | 41 | |
| | 112 | — | — | 50 | 45 | 43 | |
| | 116 | — | — | 55 | 48 | 45 | |
| | 120 | — | — | 60 | 52 | 48 | |
| | 124 | — | — | — | 56 | 51 | |
| | 128 | — | — | — | 61 | 54 | |
| | 132 | — | — | — | 66 | 58 | |
| | 136 | — | — | — | — | 62 | |
| | 140 | — | — | — | — | 66 | |
| | 144 | — | — | — | — | 72 | |
| PFH | Supporting roof only | 24 | 24 | 24 | Note c | Note c | 48 |
| | Supporting one story and roof | 24 | 24 | 24 | Note c | Note c | |
| PFG | | 24 | 27 | 30 | Note d | Note d | 1.5 × Actual[b] |
| CS-PF | SDC A, B and C | 16 | 18 | 20 | Note e | Note e | 1.5 × Actual[b] |
| | SDC $D_0$, $D_1$ and $D_2$ | 24 | 24 | 24 | Note e | Note e | Actual[b] |

For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm, 1 mile per hour = 0.447 m/s.
NP = Not Permitted.

a. Linear interpolation shall be permitted.
b. Use the actual length where it is greater than or equal to the minimum length. The actual length of Methods CS-G, CS-WSP, CS-SFB, PFH, PFG and CS-PF is the length of the full-height sheathed section.
c. Maximum header height for PFH is 10 feet in accordance with Figure R602.10.6.2, but wall height shall be permitted to be increased to 12 feet with pony wall.
d. Maximum header height for PFG is 10 feet in accordance with Figure R602.10.6.3, but wall height shall be permitted to be increased to 12 feet with pony wall.
e. Maximum header height for CS-PF is 10 feet in accordance with Figure R602.10.6.4, but wall height shall be permitted to be increased to 12 feet with pony wall.

## 14.04.405 – Figure R602.10.6.1 of the 2025 Edition of the California Residential Code is amended to read as follows.

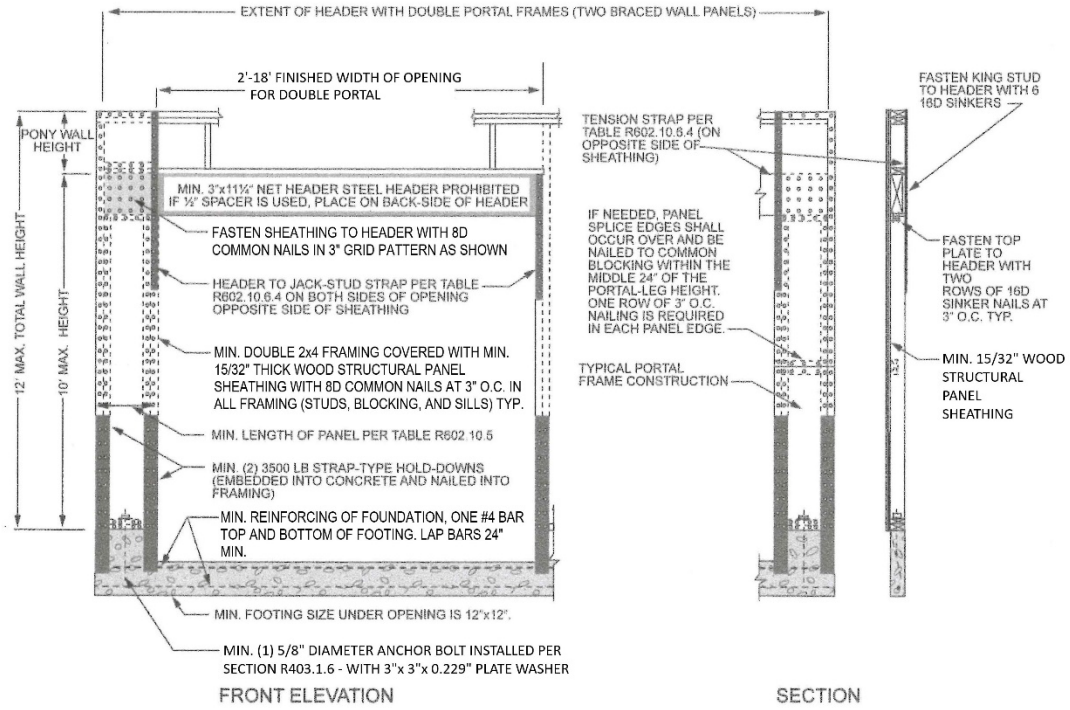



For SI: 1 inch = 25.4 mm.

**FIGURE R602.10.6.1**
**METHOD ABW—ALTERNATE BRACED WALL PANEL**

**EXHIBIT 2**

## 14.04.410 - Figure R602.10.6.2 of the 2025 Edition of the California Residential Code is amended to read as follows.

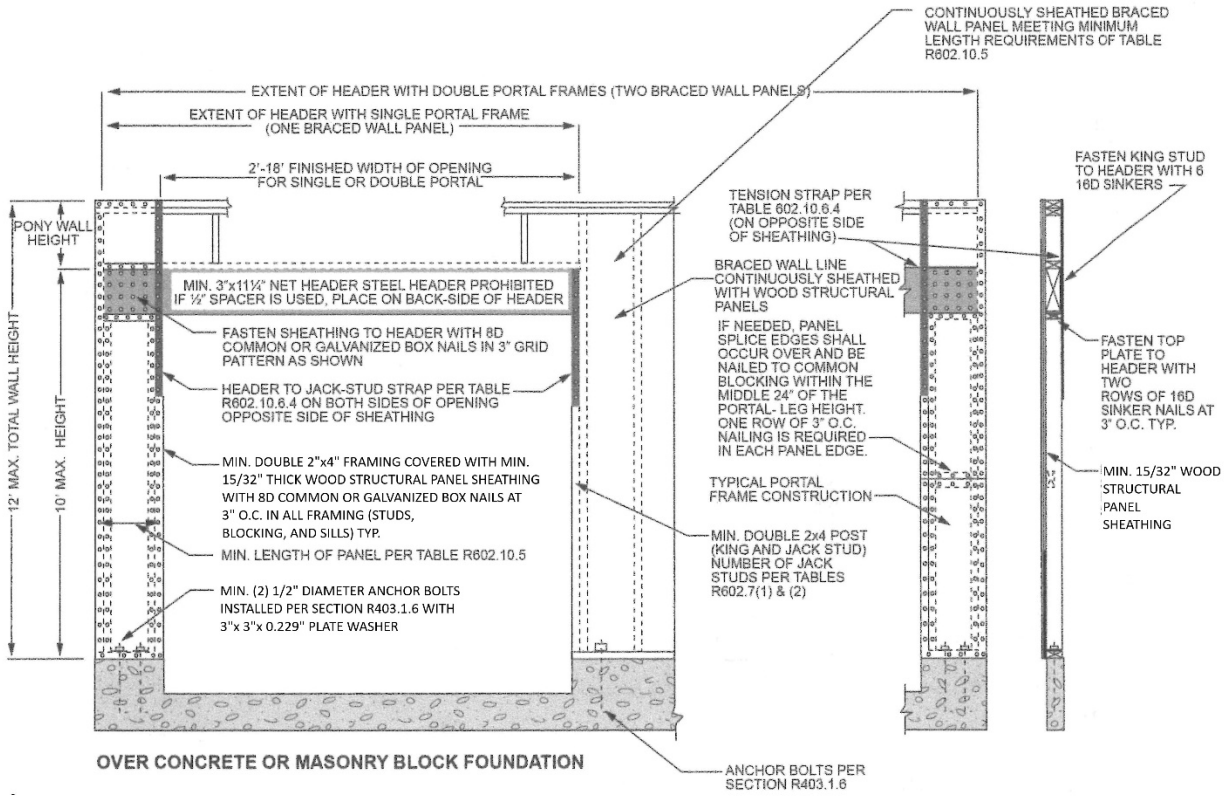



For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

**FIGURE R602.10.6.2**
**METHOD PFH—PORTAL FRAME WITH HOLD-DOWNS**
**AT DETACHED GARAGE DOOR OPENINGS**

**EXHIBIT 2**

## 14.04.415 – Figure R602.10.6.4 of the 2025 Edition of the California Residential Code is amended to read as follows:




For SI: 1 inch = 25.4 mm, 1 foot = 304.8 mm.

**FIGURE R602.10.6.4**
**METHOD CS-PF—CONTINUOUSLY SHEATHED PORTAL FRAME PANEL CONSTRUCTION**

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## 14.04.420 – Section R606.12.2.2.3 of the 2025 Edition of the California Residential Code is amended to read as follows:

**R606.12.2.2.3 Reinforcement requirements for masonry elements.** Masonry elements listed in Section R606.12.2.2.2 shall be reinforced in either the horizontal or vertical direction as shown in Figure R606.11(2) and in accordance with the following:

1. Horizontal reinforcement. Horizontal joint reinforcement shall consist of not less than one No. 4 bar spaced not more than 48 inches (1219 mm). Horizontal reinforcement shall be provided within 16 inches (406 mm) of the top and bottom of these masonry elements.

2. Vertical reinforcement. Vertical reinforcement shall consist of not less than one No. 4 bar spaced not more than 48 inches (1219 mm). Vertical

reinforcement shall be within 8 inches (406 mm) of the ends of masonry walls.

**14.04.425 – Section R803.2.4 is added to Chapter 8 of the 2025 Edition of the California Residential Code to read as follows.**

**R803.2.4 Openings in horizontal diaphragms.** Openings in horizontal diaphragms shall conform with Section R503.2.4.

**14.04.430 – Section R902.1.1.1 is added to the 2025 Edition of the California Residential code to read as follows.**

All roofing material in the very-high and moderate fire hazard severity zone must be Class A. No wood roof covering material shall be installed on any structure located in the very high, high and moderate fire hazard severity zones as identified by the Pasadena Fire Department. All other roof covering materials in other zones shall be Class A or B.

**Exception**: In the moderate fire hazard severity zone, the fire code official may, upon a showing of good cause and necessity, approve the use of fire-resistive wood as part of Class A listed assemblies, and may require additional mitigation as warranted, for the repair or maintenance of existing structure.

**14.04.435 – Section R1001.3.1 of the 2025 Edition of the California Residential Code is amended to read as follows.**

**R1001.3.1 Vertical reinforcing.** For chimneys up to 40 inches (1016 mm) wide, four No. 4 continuous vertical bars adequately anchored into the concrete foundation shall be placed between wythes of solid masonry or within the cells of hollow unit masonry and grouted in accordance with Section R606. Grout shall be prevented from bonding with the flue liner so that the flue liner is free to move with thermal expansion. For chimneys more than 40 inches (1016 mm) wide, two additional No. 4 vertical bars adequately anchored into the concrete foundation shall be provided for each additional flue incorporated into the chimney or for each additional 40 inches (1016 mm) in width or fraction thereof.

**14.04.440 – Section AX100.1 is added to the 2025 Edition of the California Residential Code to read as follows.**

In addition to the requirements of Appendix AX, the Swimming Pool Safety Act, of the 2025 California Residential Code, a swimming pool, pool, spa or any body of water over 18 inches deep shall have an enclosure consisting of a fence, wall, portions of a building or other approved durable material, that isolates all bodies of water from the public right of way, private single family dwelling, and

Accessory Dwelling Unit. The enclosure shall be installed around the perimeter of the bodies of water, or at the perimeter of the property.

**EXHIBIT 3**

## ~~Chapter 14.28 FIRE PREVENTION CODE~~

### ~~14.28.010 California Fire Code adopted.~~

~~Except as otherwise provided for in the chapter by specific provision, the minimum standards, provisions, and requirements for the safe construction and maintenance of property, facilities, conditions, materials, equipment, fire prevention and alarms systems, and the general supervision thereof for the purpose of combating and control of fire and fire hazard and abatement same within the corporate limits of the city shall be in accordance with the provisions and in the manner prescribed by the California Fire. Code, 2022 edition (California Fire Code) in its entirety, as published by the International Code Council. This adoption of the code also includes adoption by reference of the 2021 International Fire Code Chapters 1, 3, Appendix Chapter 4 and Appendices B through I, K, M, N, O and Sections 1101 and 1104, all as compiled, adopted, and subsequently amended by the International Code Council, California State Fire Marshal's Office, California Building Standards Commission, or city of Pasadena. One copy of the above publication is on file for public inspection and they are adopted and incorporated herein as if fully set forth in this chapter.~~

### ~~14.28.020 Section 101.1 of the 2022 California Fire Code titled "Title" is amended to read as follows.~~

~~101.1 Title. These regulations shall be known as the Fire Code of the City of Pasadena hereinafter referred to as "this code."~~

### ~~14.28.030 Section 104 of the 2022 California Fire Code is amended by adding new Section 104.13 titled "Cost recovery" to read as follows.~~

~~104.13 Cost recovery. Where an emergency situation is caused or exacerbated by a willful act, a negligent act, or a violation of the Fire Code, Building Code, or any other applicable law, ordinance or regulation, the cost of mitigating and securing any emergency that is within the responsibility of the Fire Chief if a charge against the person who caused the emergency or who caused the circumstances leading to the creation of the emergency. Damages and expenses incurred by any public agency providing mutual aid shall constitute debt of such person and shall be collectible by the Fire Chief for proper distribution in the same manner as in the case of an obligation under contract expressed or implied. Expenses as stated above shall include, but not limited to, equipment and personnel committed and any payments required by the public agency to outside business firms requested by the public agency to mitigate or secure the emergency, monitor remediation, and clean up.~~

### ~~14.28.140 Section 105.6.3 of the 2022 California Fire Code titled "Cryogenic fluids" is amended to read as follows.~~

~~105.6.3 Cryogenic fluids. A construction permit is required for installation, alteration, or closure to outdoor stationary cryogenic fluid storage systems where the system capacity exceeds the amounts listed in Table 105.5.11. Maintenance performed in accordance with this code is not considered to be an alteration and does not require a construction permit.~~

**EXHIBIT 3**

**~~14.28.150 Section 111 of Chapter 1 of the California Fire Code titled "MEANS OF APPEALS" is deleted in its entirety.~~**

**~~14.28.160 Section 112.4 of the 2022 California Fire Code titled "Violation penalties" is amended to read as follows.~~**

~~112.4 Violation penalties. Persons who violate a provision of this code or shall fail to comply with any of the requirements thereof or who shall erect, install, alter, repair or do work in violation of the approved construction documents or directive of the fire code official, or of a permit or certificate used under provisions of this code, shall be guilty of a misdemeanor and subject to the penalties specified in Chapter 1.24 of the Pasadena Municipal Code.~~

**~~14.28.170 Section 113.4 of the 2022 California Fire Code titled "Failure to comply" is amended to read as follows.~~**

~~113.4 Failure to comply. Any person who continues any work after having been served with a stop work order, except such work as that person is directed to perform to remove a violation or unsafe condition, shall be guilty of a misdemeanor and subject to the penalties specified in Chapter 1.24 of the Pasadena Municipal Code.~~

**~~14.28.172 Section 307.4.3 of the 2021 International Fire Code titled "Portable outdoor fireplaces" is added and amended to read as follows.~~**

~~307.4.3 Portable outdoor fireplaces. Portable outdoor fireplaces shall be used in accordance with the manufacturer's instructions and shall not be operated within 15 feet (3048 mm) of a structure or combustible materials.~~

~~Exception:~~

~~1. Portable outdoor fireplaces used at one-and two-family dwellings.~~

~~2. Portable outdoor fireplaces as approved by the fire code official for Fire Department staffed special events within the parameters established by the fire code official~~

**~~14.28.174 Section 308.1.4 of the 2021 International Fire Code titled "Open-flame cooking devices" is added and amended to read as follows.~~**

~~308.1.4 Open-flame cooking devices. Charcoal burners and other open-flame cooking devices shall not be operated on combustible balconies or within 10 feet of combustible construction.~~

~~Exceptions:~~

~~1. One-and two-family dwellings.~~

~~2. Where buildings, balconies and decks are protected by an automatic sprinkler system.~~

~~3. LP-gas cooking devices having LP-gas container with a water capacity not greater than 20 pounds.~~

**EXHIBIT 3**

**~~14.28.200 Section 903.1 of the 2022 California Fire Code is amended by adding Section 903.1.2 titled "Approved automatic sprinkler system in all new construction" to read as follows.~~**

~~903.1.2 Minimum fire sprinkler system protection for new construction. All new construction shall be provided with an approved automatic fire sprinkler system throughout the building, without regard to the criteria listed in Section 903.2 et. seq.~~

~~Exception: The following types of construction may be exempt from this section when approved by the fire code official.~~

1. ~~Private garages and carports, and similar structures provided no portion of the structure is located more than 150 feet (45720 mm) from approved fire department access.~~
2. ~~Utility sheds, gazebos and similar structures of less than 120 square feet (11.15 $m^2$) provided no portion of the structure is located more than 150 feet from (45720 mm) approved fire department access.~~
3. ~~Fences and open trellises.~~
4. ~~Solar photovoltaic power systems and panel structures with no use underneath as per CFC 903.3.1.1.3~~
5. ~~Other similar structures as deemed appropriate by the fire code official.~~

**~~14.28.210 Section 903.1 of the 2022 California Fire Code is amended by adding Section 903.1.3 titled "Existing occupancies" to read as follows.~~**

~~903.1.3 Existing occupancies. Existing occupancies, with the exception of R-3.1 and R-4 occupancies, shall comply with Section 903.1.2 where one of the following conditions exists:~~

1. ~~Whenever additions result in an additional level above or below grade, or a total increase of more than 1000 square feet (92.9 $m^2$) or an increase of more than fifty percent (50%) in the total floor area including mezzanines and additional stories, whichever is less, regardless of ownership. Additions shall be cumulative with each application for a building permit from January 1, 2008. R-3 occupancies shall not be required to comply with this condition solely due to the addition of an additional level, unless one of the criteria for an increase of total floor area is also exceeded.~~
2. ~~Whenever the value of alterations exceed fifty percent (50%) of the replacement value of the structure, excluding the value of property and contents, as determined by the Building Official. Alteration values shall be cumulative with each application for a building permit from January 1, 2008. Expenditures for maintenance and repairs such as interior and exterior painting, carpeting, interior window coverings, drapes, movable partitions, surface re-roofing or plumbing, mechanical and electrical repairs shall not be considered when calculating the percentage of alterations.~~

3. Whenever there is a change of occupancy to a more hazardous use, as determined by the fire code official.

4. Whenever any existing Group R Division 1 occupancy is subdivided to a condominium or any nonresidential occupancy is converted, in part or whole, to a residential occupancy.

**14.28.220 Section 903.1 of the 2022 California Fire Code is amended by adding Section 903.1.4 titled "Partial automatic fire sprinkler system prohibited" to read as follows.**

903.1.4 Partial automatic fire sprinkler system prohibited. Whenever an automatic fire sprinkler system is installed for any portion of any building or structure, an automatic fire sprinkler system shall be installed for the entire building or structure.

**14.28.222 Section 903.3.1.1 of the 2022 California Fire Code titled "NFPA 13 sprinkler systems" is amended to read as follows.**

903.3.1.1 NFPA 13 sprinkler systems. Where the provisions of this code require that a building or portion thereof be equipped throughout with an automatic sprinkler system in accordance with this section, sprinklers shall be installed throughout in accordance with NFPA 13 *as amended in Chapter 80* except as provided in Sections 903.3.1.1.1 *through* 903.3.1.1.3 and in accordance with NFPA 13 Appendix A and B.

**14.28.230 Section 903.3.5 of the 2022 California Fire Code titled "Water supplies" is amended by adding a sentence at the end of the paragraph to read as follows.**

903.3.5 Water supplies. Water supplies for automatic sprinkler systems shall comply with this section and the standards referenced in Section 903.3.1. The potable water supply shall be protected against backflow in accordance with *Health and Safety Code 13114.7*. For connections to public waterworks systems, the water supply test used for design of fire protection systems shall be adjusted to account for seasonal and daily pressure fluctuations based on information from the water supply authority and as approved by the fire code official. Hydraulic calculations shall include a 10% reduction from the source.

**14.28.240 Section 903.3.5.2 of the 2022 California Fire Code titled "Residential combination services" is amended to read as follows.**

903.3.5.2 Residential combination services. Single combination water supply services are not allowed for NFPA 13R systems.

**14.28.242 Section 903.4.2 of the 2022 California Fire Code is amended by adding Section 903.4.1.1 titled "Valves for Hood and Duct Systems" to read as follows.**

903.4.1.1 Valves for Hood and Duct Systems. Valves for hood and duct systems shall be electrically supervised when the building has a monitoring fire alarm control unit.

**EXHIBIT 3**

**14.28.244 Section 903.4.2 of the 2022 California Fire Code is amended by adding Section 903.4.2.1 titled "Audible Notification Device" to read as follows.**

903.4.2.1 Audible Notification Device. One interior approved audible notification device shall be installed for monitoring systems. Valves for hood and duct systems shall be electrically supervised when the building has a monitoring fire alarm control unit.

**14.28.250 Section 907.2 of the 2022 California Fire Code titled "Where required—buildings and structures" is amended to read as follows.**

907.2 Where required - buildings and structures. An approved fire alarm system installed in accordance with the provisions of this code and NFPA 72 shall be provided in new buildings and structures in accordance with Sections 907.2.1 through 907.2.29 and provide occupant notification in accordance with Section 907.5, unless other requirements are provided by another section of this code.

Not fewer than one manual fire alarm box shall be provided in an approved location to initiate a fire alarm signal for fire alarm systems employing automatic fire detectors or waterflow detection devices. Where other sections of this code allow elimination of fire alarm boxes due to sprinklers or automatic fire alarm systems, a single fire alarm box shall be installed at a location approved by the enforcing agency.

For new construction of 10,000 square feet (929 $m^2$) or more, an approved automatic fire alarm system shall be installed in compliance with this code and NFPA 72. At a minimum, smoke detectors, or other listed and approved detection devices, shall be installed in all electrical, mechanical, storage, conference or similar rooms. Listed and approved alarm notification appliances providing both audible and visual notification shall be installed throughout the building in compliance with this code and NFPA 72.

The requirements of this section shall also apply to existing buildings and occupancies with a floor area greater than 10,000 gross square feet where one of the following conditions exists:

1. Whenever the value of alterations exceed fifty percent (50%) of the replacement value of the structure, excluding the value of property and contents.
2. Whenever there is a change of occupancy.

For existing buildings, an alternate type of fire detection device may be approved by the fire code official in isolated areas or in special situations where the fire code official determines that the type of detection is suitable for that environment.

**14.28.260 Section 908 of the 2022 California Fire Code is amended by adding Section 908.5 titled "Requirements" to read as follows.**

908.5 Requirements. All emergency alarm control panels shall be UL 2017 or UL 864 listed. All sensors shall be UL 2075 listed. All detection and alarm systems shall be powered and supervised as required for fire alarm systems per NFPA 72. Secondary power supplies shall be calculated for 24-hour equipment standby time plus emergency standby duration calculated for the longest modeled release rate or 5-minutes,

~~whichever is the longest duration. Visual alarms shall be a color approved by the fire code official.)~~

**~~14.28.270 Section 914.9 of the 2022 California Fire Code titled "Application of flammable finishes" is amended to read as follows.~~**

~~914.9 Application of flammable finishes. An automatic sprinkler system or fire-extinguishing system shall be provided in all spray rooms, spray booths, dip and immersing spaces and storage rooms, and shall be installed in accordance with Chapter 9.~~

**~~14.28.272 Section 1207 of the 2022 California Fire Code is amended by adding Section 1207.1.1.2 "Design" to read as follows:~~**

~~1207.1.1.2 Design. Electrical Energy Storage Systems (ESS) shall comply with the requirements of NFPA 855 and UL 9540.~~

**~~14.28.300 Section 3106.3.1 of the 2022 California Fire Code titled "Occupant load" is amended to read as follows.~~**

~~3106.3.1 Occupant load. The fire code official has the authority to establish an occupant load for the event site.~~

**~~14.28.320 Section 4905.2 of the 2022 California Fire Code is amended by adding Section 4905.2.1 titled "Additions or Alterations" to read as follows.~~**

~~4905.2.1 Additions or alterations shall be permitted to be made to any building or structure without requiring the existing building or structure to comply with the requirements of Section 4905.2, provided that the addition or alteration conforms to that required for a new building or structure as per Section 4905.2, including the following:~~

~~1. California Building Code, Chapter 7A,~~

~~2. California Residential Code, Section R337~~

~~3. California Referenced Standards Code, Chapter 12-7A~~

~~Exception: Reasonably equivalent alternatives as approved by the fire code official and building official when dealing with qualified historical buildings and districts, in accordance with the California Historical Building Code.~~

**~~14.28.330 Section 4907.2 of the 2022 California Fire Code titled "Application" is amended to read as follows.~~**

~~4907.2 Application. Buildings and structures located in the following areas shall maintain the required hazardous vegetation and fuel management as prescribed in this code and Chapter 14.29 of the Pasadena Municipal Code:~~

~~1. All unincorporated lands designated by the State Board of Forestry and Fire Protection as State Responsibility Area (SRA) including:~~

~~1.1. Moderate Fire Hazard Severity Zones.~~

1.2. High Fire Hazard Severity Zones.

1.3. Very-high Fire Hazard Severity Zones.

2. Land designated in ordinance by local agencies as a Moderate, High or Very-High Fire Hazard Severity Zone (pursuant to Government Code Section 51179).

3. Land designated as a Very High Fire Hazard Severity Zone by the Director.

**14.28.340 Section 5001 of the 2022 California Fire Code is amended by adding Section 5001.6.1.1 titled "Temporary facility closure" to read as follows.**

5001.6.1.1 Temporary facility closure. Unless otherwise specified, a temporary facility closure shall last not more than 180 calendar days. The fire code official may authorize one 180-day extension.

**14.28.350 Section 5003 of the 2022 California Fire Code is amended by adding Section 5003.2.9.3 titled "Minimum testing" to read as follows.**

5003.2.9.3 Minimum testing. At a minimum, all tanks, primary storage, secondary containment, monitoring systems, release prevention and mitigation systems, and other safety equipment or systems for the storage, use or handling of any hazardous material shall be tested for proper function as described by manufacturer's or design specifications, whichever is more stringent, prior to the introduction of a hazardous material.

**14.28.360 Section 5704.2.7.4 of the 2022 California Fire Code titled "Emergency venting" is amended to read as follows.**

5704.2.7.4 Emergency venting. Stationary, above-ground tanks shall be equipped with additional venting that will relieve excessive internal pressure caused by exposure to fires. Emergency venting devices shall be listed and approved. Emergency vents for Class I, II and IIIA liquids shall not discharge inside buildings. This requirement shall also apply to each compartment of a compartmentalized tank, the interstitial space (annulus) of a secondary containment type tank, and the enclosed space of tanks of closed-top dike construction. Additionally, this requirement shall apply to spaces or enclosed volumes, such as those intended for insulation, membranes or weather shields that can contain liquid because of a leak from the primary vessel and can inhibit venting during fire exposure. The insulation, membrane or weather shield shall not interfere with emergency venting. The venting shall be installed and maintained in accordance with Section 22.7 of NFPA 30.

**14.28.370 Section 5704.2.7.5.8 of the 2022 California Fire Code titled "Overfill prevention" is amended to read as follows.**

5704.2.7.5.8 Overfill prevention. An approved means or method in accordance with Section 5704.2.9.7.5 shall be provided to prevent the overfill of all Class I, II and IIIA liquid storage tanks. Storage tanks in refineries, bulk plants or terminals regulated by Section 5706.4 or 5706.7 shall have overfill protection in accordance with API 2350.

An approved means or method in accordance with Section 5704.2.9.7.5 shall be provided to prevent overfilling of Class IIIB liquid storage tanks connected to fuel-burning equipment inside buildings.

**14.28.380 Section 5704.2.8.14 of the 2022 California Fire Code titled "Emergency vents" is amended to read as follows.**

5704.2.8.14 Emergency vents. Emergency vents shall be vapor tight and shall not be allowed to discharge inside the vault. Long-bolt manhole covers shall not be allowed for this purpose.

**14.28.390 Section 5704.2.9.6.1 of the 2022 California Fire Code titled "Locations where above ground tanks are prohibited" is amended to read as follows.**

5704.2.9.6.1 Locations where above ground tanks are prohibited. Storage of Class I and II liquids in above-ground tanks outside of buildings is prohibited within the limits established by law as the limits of districts in which such storage is prohibited in the City of Pasadena.

**14.28.400 Section 5706.2.4.4 of the 2022 California Fire Code titled "Locations where above ground tanks are prohibited" is amended to read as follows.**

5706.2.4.4 Location where above-ground tanks are prohibited. Storage of Class I and II liquids in above-ground tanks is prohibited within the limits established by law as the limits of districts in which such storage is prohibited in the City of Pasadena.

**14.28.410 Section 5806.2 of the 2022 California Fire Code titled "Limitations" is amended to read as follows.**

5806.2 Limitations. Storage of flammable cryogenic fluids in stationary containers outside of buildings is prohibited within the limits established by law as the limits of districts in which such storage is prohibited in the City of Pasadena.

**14.28.420 Section 6101.3 of the 2022 California Fire Code titled "Construction documents" is amended to read as follows.**

6101.3 Construction documents. Where a single LP-gas container is more than 20 gallons (75.7 L) in water capacity, or the aggregate water capacity of LP-gas containers is more than 40 gallons (151 L) in water capacity, the installer shall submit construction documents of such installation.

**14.28.430 Section 6101 of the 2022 California Fire Code titled "Minimum testing" is amended by adding Section 6101.4 to read as follows.**

6101.4 Minimum testing. At a minimum, all tanks, primary storage, secondary containment, monitoring systems, release prevention and mitigation systems, and other safety equipment or systems for the storage, use or handling of any hazardous material shall be tested for proper function as described by manufacturer's or design specifications, whichever is more stringent, prior to the introduction of a hazardous material.

**EXHIBIT 3**

**~~14.28.450 Table B105.1(1) of Appendix B of the 2022 California Fire Code titled "Buildings one- and two-family dwellings, Group R3 and R-4 buildings and townhouses" is amended as follows.~~**

| ~~TABLE B105.1(1) REQUIRED FIRE-FLOW FOR ONE- AND TWO-FAMILY DWELLINGS, GROUP R-3 AND R-4 BUILDINGS AND TOWNHOUSES~~ | | | |
|---|---|---|---|
| ~~Fire Flow Calculation Area (square feet)~~ | ~~AUTOMATIC SPRINKLER SYSTEM (Design Standard)~~ | ~~MINIMUM FIRE FLOW (gallons per minute)~~ | ~~FLOW DURATION (hours)~~ |
| ~~0—3,600~~ | ~~No automatic sprinkler system~~ | ~~1,000~~ | ~~1~~ |
| ~~3,601 and greater~~ | ~~No automatic sprinkler system~~ | ~~Value in Table B105.1(2)~~ | ~~Duration in Table B105.1(2) at the required fire flow rate~~ |
| ~~0—3,600~~ | ~~Section 903.3.1.3 of the California Fire Code or Section 313.3 of the California Residential Code~~ | ~~1,000~~ | ~~½~~ |
| ~~3,601 and greater~~ | ~~Section 903.3.1.3 of the California Fire Code or Section 313.3 of the California Residential Code~~ | ~~1,500~~ | ~~1~~ |

~~For SI: 1 square foot = 0.0929 $m^2$, 1 gallon per minute = 3.875 L/m.~~

**~~14.28.460 Table B105.2 of Appendix B of the 2022 California Fire Code titled "REQUIRED FIRE-FLOW FOR BUILDINGS OTHER THAN ONE- AND TWO-FAMILY DWELLINGS, GROUP R-3 AND R-4 BUILDINGS AND TOWNHOUSES" is amended as follows.~~**

| ~~TABLE B105.2 REQUIRED FIRE-FLOW FOR BUILDINGS OTHER THAN ONE- AND TWO-FAMILY DWELLINGS, GROUP R-3 AND R-4 BUILDINGS AND TOWNHOUSES~~ | | |
|---|---|---|
| ~~AUTOMATIC SPRINKLER SYSTEM (Design Standard)~~ | ~~MINIMUM FIRE FLOW (gallons per minute)~~ | ~~FLOW DURATION (hours)~~ |
| ~~No automatic sprinkler system~~ | ~~Value in Table B105.1(2)~~ | ~~Duration in Table B105.1(2)~~ |

| | | |
|---|---|---|
| ~~Section 903.3.1.1 of the California Fire Code~~ | ~~50% of the value in Table B105.1(2)~~ | ~~Duration in Table B105.1(2) at the reduced required fire flow rate~~ |
| ~~Section 903.3.1.2 of the California Fire Code~~ | ~~50% of the value in Table B105.1(2)~~ | ~~Duration in Table B105.1(2) at the reduced required fire flow rate~~ |

~~For SI: 1 gallon per minute = 3.785 L/m.~~

~~a. The reduced fire-flow shall be not less than 1,000 gallons per minute.~~

~~b. The reduced fire-flow shall be not less than 1,500 gallons per minute.~~

**~~14.28.470 Section B105.2 of Appendix B of the 2022 California Fire Code titled "Buildings other than one- and two-family dwellings, Group R-3 and R-4 buildings and townhouses" is amended to read as follows.~~**

~~B105.2 Buildings other than one- and two-family dwellings, Group R-3 and R-4 buildings and townhouses. The minimum fire-flow and flow duration for buildings other than one- and two-family dwellings, Group R-3 and R-4 buildings and townhouses shall be as specified in Tables B105.2 and B105.1(2).~~

~~Exception: [SFM] Group B, S-2 and U occupancies having a floor area not exceeding 1,000 square feet, primarily constructed of noncombustible exterior walls with wood or steel roof framing, having a Class A roof assembly, with uses limited to the following or similar uses:~~

1. ~~California State Parks buildings of an accessory nature (restrooms).~~
2. ~~Safety roadside rest areas (SRRA), public restrooms.~~
3. ~~Truck inspection facilities, (TIF), CHP office space and vehicle inspection bays.~~
4. ~~Sand/salt storage buildings, storage of sand and salt.~~
5. ~~A reduction in required fire-flow of up to 50 percent, as approved, is allowed when the building is provided with an approved automatic sprinkler system installed in accordance with section 903.3.1.1 or 903.3.1.2. The resulting fire-flow shall not be less than 1,500 gallons per minute (5678 L/min) for the prescribed duration as specified in Table B105.1(1). Table B105.2 is amended by replacing "25%" with "50%" wherever "25%" appears in the Table.~~

**~~14.28.480 Section D103.6 of Appendix D of the 2022 California Fire Code titled "Signs" is amended to read as follows.~~**

~~D103.6 Signs. Where required by the fire code official, fire apparatus access roads shall be marked with permanent NO PARKING—FIRE LANE signs complying with the current specifications maintained by the Pasadena Department of Public Works.~~

**EXHIBIT 3**

**~~14.28.490 Fees.~~**

~~The council shall by resolution adopt a schedule of fees for the permits issued pursuant hereto.~~

~~A. Work commencing before permit issuance.~~

~~Any person who commences any work requiring a permit under this Code before obtaining the necessary permits, unless otherwise approved by the fire code official in writing or as part of an approved phased permit approval process, shall be subject to double the adopted permit and inspection fees.~~

**~~14.28.500 Fire hazard severity zone map.~~**

~~The map entitled "City of Pasadena Fire Hazard Severity Zone Map" dated July 1, 2008 is adopted and incorporated in this chapter by this reference. Such map shall be used by the fire chief in administering this chapter.~~

**~~14.28.510 Board of appeals.~~**

~~All sections in the respective 2022 codes pertaining to the board of appeals are hereby amended in their entirety to read as follows:~~

~~In order to hear and decide appeals or orders and determine the suitability of alternative material and methods of construction and to provide for reasonable interpretation of the provisions of these codes, there shall and there is hereby created a board of appeals composed of the mayor and the city council. The city clerk shall be the secretary to the board. The board may adopt reasonable rules and regulations for conducting the investigations and shall render all its decisions and findings on contested matters in writing to the building fire code official with a duplicate copy thereof to any appellant or contestant affected by any such decision or findings, and may recommend to the city council such new legislation, if any, as is consistent therewith.~~

~~The city council may prescribe by resolution to employ at the cost and expense of the city such qualified individuals as the board, in its discretion, may reasonably find necessary in order to assist it in its investigation and in making its findings and decisions.~~

**EXHIBIT 3**

## Chapter 14.28 - FIRE PREVENTION CODE

### 14.28.010 - California Fire Code adopted.

Except as otherwise provided for in the chapter by specific provision, the minimum standards, provisions, and requirements for the safe construction and maintenance of property, facilities, conditions, materials, equipment, fire prevention and alarms systems, and the general supervision thereof for the purpose of combating and control of fire and fire hazard and abatement same within the corporate limits of the City shall be in accordance with the provisions and in the manner prescribed by the California Fire. Code, 2025 edition (California Fire Code) in its entirety, as published by the International Code Council. This adoption of the code also includes adoption by reference of the 2024 International Fire Code Chapters 1, 3, Section 503 of Chapter 5, Sections 1101 and 1104 of Chapter 11, Appendix Chapter 4 and Appendices B through I, K, M, N, O, P, all as compiled, adopted, and subsequently amended by the International Code Council, California State Fire Marshal's Office, California Building Standards Commission, or City of Pasadena. One copy of the above publication is on file for public inspection and they are adopted and incorporated herein as if fully set forth in this chapter.

### 14.28.020 - Section 101.1 of the 2025 California Fire Code titled "Title" is amended to read as follows.

**101.1 Title.** These regulations shall be known as the Fire Code of the City of Pasadena hereinafter referred to as "this code."

### 14.28.030 - Section 105.6.4 of the 2025 California Fire Code titled "Cryogenic fluids" is amended to read as follows.

**[A] 105.6.4 Cryogenic fluids.**
A construction permit is required for installation, alteration, or closure to outdoor stationary cryogenic fluid storage systems where the system capacity exceeds the amounts listed in Table 105.5.11. Maintenance performed in accordance with this code is not considered to be an alteration and does not require a construction permit.

### 14.28.040 - Section 113.4 of the 2025 California Fire Code titled "Violation penalties" is amended to read as follows.

**[A] 113.4 Violation penalties.**
Persons who violate a provision of this code or fail to comply with any of the requirements thereof or who erect, install, alter, repair or do work in violation of the approved construction documents or directive of the fire code official, or of a permit or certificate used under provisions of this code, shall be guilty of a

misdemeanor and subject to the penalties specified in Chapter 1.24 of the Pasadena Municipal Code.

**14.28.050 - Section 307.4.3 of the 2024 International Fire Code titled "Portable outdoor fireplaces" is added and amended to read as follows.**

**307.4.3 Portable outdoor fireplaces.**

Portable outdoor fireplaces shall be used in accordance with the manufacturer's instructions and shall not be operated within 15 feet (3048 mm) of a structure or combustible material.

Exception:

1. Portable outdoor fireplaces used at one-and two-family dwellings.
2. Portable outdoor fireplaces as approved by the fire code official for Fire Department staffed special events within the parameters established by the fire code official.

**14.28.060 Section 508.1 of the 2025 California Fire Code titled "General" is amended to read as follows. Subsections adopted as published.**

**508.1 General.**

Where required by other sections of this code and in all buildings totaling three (3) stories or greater above and below grade and in all F-1 and S-1 occupancies with a building footprint greater than 500,000 square feet (46451 $m^2$), a fire command center for fire department operations shall be provided and shall comply with Sections 508.1.1 through 508.1.7.

**14.28.070 - Section 903.1 of the 2025 California Fire Code is amended by adding Section 903.1.2 titled "Existing occupancies" to read as follows.**

**903.1.2 Existing occupancies.**

Existing occupancies, shall comply with Section 903.2 where one of the following conditions exists:

1. Whenever additions result in an additional level above or below grade, or a total increase of more than 1000 square feet (92.9 $m^2$) or more, or an increase of more than fifty percent (50%) of the existing floor area including mezzanines and additional stories, whichever is less, regardless of ownership. Additions shall be cumulative with each application for a building permit from January 1, 2008 to present day.

   **Exception:** R-3 occupancies shall not be required to comply with this section solely due to the addition of an additional level, unless the criteria for an increase of existing floor area is also exceeded or if the addition

exceeds a combined total floor area of 3,600 square feet and fire flow requirements are not met.

2. Whenever the value of alterations exceeds fifty percent (50%) of the replacement value of the structure, excluding the value of property and contents, as determined by the Building Official. Alteration values shall be cumulative with each application for a building permit from January 1, 2008. Expenditures for maintenance and repairs such as interior and exterior painting, carpeting, interior window coverings, drapes, movable partitions, surface re-roofing or plumbing, mechanical and electrical repairs shall not be considered when calculating the percentage of alterations.
3. Whenever there is a change of occupancy to a more hazardous use, as determined by the fire code official.

**14.28.080 - Section 903.1 of the 2025 California Fire Code is amended by adding Section 903.1.3 titled "Partial automatic fire sprinkler system prohibited" to read as follows.**

**903.1.3 Partial automatic fire sprinkler system prohibited.**

Whenever an automatic fire sprinkler system is installed for any portion of any building or structure, an automatic fire sprinkler system shall be installed for the entire building or structure.

**14.28.090 - Section 903.2 of the 2025 California Fire Code titled “Where required” is amended to read as follows.**

**903.2 Where required.**

All new construction of buildings and structures shall be provided with an approved automatic fire sprinkler system.

**Exception:** The following types of construction may be exempt from this section when approved by the fire code official.

1. Detached private garages, utility sheds, and similar structures 500 square feet or less, accessory to a R-3 occupancy, provided no portion of the structure is located more than 150 feet (45,720 mm) from an approved fire department access road.
2. Detached Carports, detached gazebos, pergolas, and similar shade structures open on all sides constructed of non-combustible material 500 square feet or less, accessory to a R-3 occupancy.
3. Other similar structures as deemed appropriate by the fire code official.

**EXHIBIT 3**

**14.28.100 - Section 903.2.18 of the 2025 California Fire Code titled "Group U private garages and carports accessory to Group R-3 occupancies" is amended to read as follows.**

**903.2.18 Group U detached and attached private garages, carports, and similar structures accessory to Group R-3 occupancies.**

Carports with habitable space above and attached garages, accessory to Group R-3 occupancies, shall be protected by residential fire sprinklers in accordance with this section. When an automatic fire sprinkler system is required in accordance with sections 903.1.2 and 903.2, carports without habitable space above, detached garages, and similar attached and detached structures, accessory to R-3 occupancies, shall be protected by residential fire sprinklers in accordance with this section. Residential fire sprinklers shall be connected to, and installed in accordance with, an automatic residential fire sprinkler system that complies with Section R309 of the California Residential Code or with NFPA 13D. Fire sprinklers shall be residential sprinklers or quick-response sprinklers, designed to provide a minimum density of 0.05 gpm/ft2 (2.04 mm/min) over the area of the garage, carport, and/or similar structure, but not to exceed two sprinklers for hydraulic calculation purposes. Garage doors shall not be considered obstructions with respect to sprinkler placement.

**14.28.110 - Section 903.3.5 of the 2025 California Fire Code titled "Water supplies" is amended to read as follows. Subsection 903.3.5.1 adopted as published.**

**903.3.5 Water supplies.**

Water supplies for automatic sprinkler systems shall comply with this section and the standards referenced in Section 903.3.1. The potable water supply shall be protected against backflow in accordance with *Health and Safety Code 13114.7*. For connections to public waterworks systems, the water supply test used for design of fire protection systems shall be adjusted to account for seasonal and daily pressure fluctuations based on information from the water supply authority and as approved by the fire code official. Hydraulic calculations shall include a 10% safety margin.

**14.28.120 - Section 903.3.5.2 of the 2025 California Fire Code titled "Residential combination services" is amended to read as follows.**

**903.3.5.2 Residential combination services.**

A single combination water supply shall not be allowed for NFPA 13R systems.

**EXHIBIT 3**

**14.28.200 - Section 5001.6.1 of the 2025 California Fire Code titled "Temporary out-of-service facilities" is amended to read as follows.**

**5001.6.1Temporary out-of-service facilities.**

Facilities that are temporarily out of service shall continue to maintain a permit and be monitored and inspected. Unless otherwise specified, a temporary facility closure shall last not more than 180 calendar days. The fire code official may authorize one 180-day extension.

**14.28.210 - Section 5003 of the 2025 California Fire Code is amended by adding Section 5003.2.9.3 titled "Minimum testing" to read as follows.**

**5003.2.9.3 Minimum testing.**

At a minimum, all tanks, primary storage, secondary containment, monitoring systems, release prevention and mitigation systems, and other safety equipment or systems for the storage, use or handling of any hazardous material shall be tested for proper function as described by manufacturer's or design specifications, whichever is more stringent, prior to the introduction of a hazardous material.

**14.28.220 - Section 5704.2.7.4 of the 2025 California Fire Code titled "Emergency venting" is amended to read as follows.**

**5704.2.7.4 Emergency venting.**

Stationary, above-ground tanks shall be equipped with additional venting that will relieve excessive internal pressure caused by exposure to fires. Emergency venting devices shall be listed and approved. Emergency vents for Class I, II and IIIA liquids shall not discharge inside buildings. This requirement shall also apply to each compartment of a compartmentalized tank, the interstitial space (annulus) of a secondary containment type tank, and the enclosed space of tanks of closed-top dike construction. Additionally, this requirement shall apply to spaces or enclosed volumes, such as those intended for insulation, membranes or weather shields that can contain liquid because of a leak from the primary vessel and can inhibit venting during fire exposure. The insulation, membrane or weather shield shall not interfere with emergency venting. The venting shall be installed and maintained in accordance with Section 22.7 of NFPA 30 *except as modified by Section 5703.6.2.2.*

**14.28.230 - Section 5704.2.7.5.8 of the 2025 California Fire Code titled "Overfill prevention" is amended to read as follows.**

**5704.2.7.5.8 Overfill prevention.**

An approved means or method in accordance with Section 5704.2.9.7.5 shall be provided to prevent the overfill of all Class I, II and IIIA liquid storage tanks. Storage

tanks in refineries, bulk plants or terminals regulated by Section 5706.4 or 5706.7 shall have overfill protection in accordance with API 2350.

An approved means or method in accordance with Section 5704.2.9.7.5 shall be provided to prevent overfilling of Class IIIB liquid storage tanks connected to fuel-burning equipment inside buildings.

**14.28.240 - Section 5704.2.8.14 of the 2025 California Fire Code titled "Emergency vents" is amended to read as follows.**

**5704.2.8.14 Emergency vents.**

Emergency vents shall be vapor tight and shall not be allowed to discharge inside the vault. Long-bolt manhole covers shall not be allowed for this purpose.

**14.28.250 - Section 5704.2.9.6.1 of the 2025 California Fire Code titled "Locations where above-ground tanks are prohibited" is amended to read as follows. Subsections adopted as published.**

**5704.2.9.6.1 Locations where above-ground tanks are prohibited.**

Storage of Class I and II liquids in above-ground tanks outside of buildings is prohibited within the limits established by law as the limits of districts in which such storage is prohibited in the City of Pasadena.

**14.28.260 - Section 5706.2.4.4 of the 2025 California Fire Code titled "Locations where above- ground tanks are prohibited" is amended to read as follows.**

**5706.2.4.4 Location where above-ground tanks are prohibited.**

The storage of Class I and II liquids in above-ground tanks is prohibited within the limits established by law as set forth in the fire code adoption ordinance or other regulation adopted by the City of Pasadena.

**14.28.270 - Section 5806.2 of the 2025 California Fire Code titled "Limitations" is amended to read as follows.**

**5806.2 Limitations.**

Storage of flammable cryogenic fluids in stationary containers outside of buildings is prohibited within the limits established by law as set forth in the fire code adoption ordinance or other regulation adopted by the City of Pasadena.

**EXHIBIT 3**

**14.28.280 - Section 6101.3 of the 2025 California Fire Code titled "Construction documents" is amended to read as follows.**

**6101.3 Construction documents.**

Where a single LP-gas container is more than 20 gallons (75.7 L) in water capacity or the aggregate water capacity of LP-gas containers is more than 40 gallons (151 L) in water capacity, the installer shall submit construction documents for such installation.

**14.28.290 - Section 6101 of the 2025 California Fire Code is amended by adding Section 6101.4 titled “Minimum testing” to read as follows.**

**6101.4 Minimum testing.**

At a minimum, all tanks, primary storage, secondary containment, monitoring systems, release prevention and mitigation systems, and other safety equipment or systems for the storage, use or handling of any hazardous material shall be tested for proper function as described by manufacturers or design specifications, whichever is more stringent, prior to the introduction of a hazardous material.

**14.28.300 - Table B105.1(1) of Appendix B of the 2025 California Fire Code titled "Required fire flow for one- and two-family dwellings, Group R-3 and R-4 buildings and townhouses" is amended as follows.**

TABLE B105.1(1) REQUIRED FIRE-FLOW FOR ONE- AND TWO-FAMILY DWELLINGS, GROUP R-3 AND R-4 BUILDINGS AND TOWNHOUSES

| Fire Flow Calculation Area (square feet) | AUTOMATIC SPRINKLER SYSTEM (Design Standard) | MINIMUM FIRE FLOW (gallons per minute) | FLOW DURATION (hours) |
|---|---|---|---|
| 0—3,600 | No automatic sprinkler system | 1,000 | 1 |
| 3,601 and greater | No automatic sprinkler system | Value in Table B105.1(2) | Duration in Table B105.1(2) at the required fire flow rate |
| 0—3,600 | Section 903.3.1.3 of the California Fire Code or Section 313.3 of the California Residential Code | 1,000 | ½ |
| 3,601 and greater | Section 903.3.1.3 of the California Fire Code or Section 313.3 of the California Residential Code | 1,500 | 1 |

For SI: 1 square foot = 0.0929 $m^2$, 1 gallon per minute = 3.875 L/m.

**14.28.310 - Table B105.2 of Appendix B of the 2025 California Fire Code titled "REQUIRED FIRE-FLOW FOR BUILDINGS OTHER THAN ONE- AND TWO-FAMILY DWELLINGS, GROUP R-3 AND R-4 BUILDINGS AND TOWNHOUSES" is amended as follows.**

| TABLE B105.2 REQUIRED FIRE-FLOW FOR BUILDINGS OTHER THAN ONE- AND TWO-FAMILY DWELLINGS, GROUP R-3 AND R-4 BUILDINGS AND TOWNHOUSES | | |
|---|---|---|
| AUTOMATIC SPRINKLER SYSTEM (Design Standard) | MINIMUM FIRE FLOW (gallons per minute) | FLOW DURATION (hours) |
| No automatic sprinkler system | Value in Table B105.1(2) | Duration in Table B105.1(2) |
| Section 903.3.1.1 of the California Fire Code | 50% of the value in Table B105.1(2) [a] | Duration in Table B105.1(2) at the reduced required fire flow rate |
| Section 903.3.1.2 of the California Fire Code | 50% of the value in Table B105.1(2) [b] | Duration in Table B105.1(2) at the reduced required fire flow rate |

For SI: 1 gallon per minute = 3.785 L/m.

a. The reduced fire-flow shall be not less than 1,000 gallons per minute.

b. The reduced fire-flow shall be not less than 1,500 gallons per minute.

**14.28.400 - Section D103.6 of Appendix D of the 2025 California Fire Code titled "Signs" is amended to read as follows. Subsections adopted as published.**

**D103.6 Signs.**

Where required by the fire code official, fire apparatus access roads shall be marked with permanent “NO PARKING—FIRE LANE” signs complying with the current specifications maintained by the Pasadena Department of Public Works.

**14.28.500 - Fire hazard severity zone map.**

The map entitled "City of Pasadena Fire Hazard Severity Zone Map" dated March 24, 2025, is adopted and incorporated in this chapter by this reference. The adopted map shall be maintained on file with the City Clerk and made available for public inspection during normal business hours. Such map shall be used by the fire chief in administering this chapter.