ORDINANCE NO. 11- 01

AN ORDINANCE OF THE LAKESIDE FIRE PROTECTION DISTRICT WHICH ADOPTS THE 2010 CALIFORNIA FIRE CODE AND THE 2009 INTERNATIONAL FIRE CODE WITH CERTAIN AMENDMENTS, ADDITIONS, AND DELETIONS

WHEREAS, Health & Safety Code section 17958 mandates that the Lakeside Fire Protection District shall adopt ordinances or regulations imposing the same requirements as are contained in the regulations adopted by the State pursuant to Health & Safety Code section 17922; and

WHEREAS, the State of California is mandated by Health & Safety Code section 17922 to impose the same requirements as are contained in the 2010 California Fire Code based on the 2009 International Fire Code published by the International Code Council, hereinafter referred to collectively as the Fire Code; and

WHEREAS, the State of California is mandated by Health & Safety Code section 17922 to impose the same requirements as are contained in the 2010 California Fire Code based on the 2009 International Fire Code, together with the Lakeside Fire Protection District amendments, which collectively shall be known as the Lakeside Fire Protection District Fire Code for the purpose of prescribing regulations in the unincorporated territory of the County of San Diego and the boundaries of the Lakeside Fire Protection District; and

WHEREAS, code amendments adopted by the State of California shall take precedence over the 2009 International Fire Code language. The 2009 International Fire Code language shall be used for those code sections not adopted by the State; and

WHEREAS, local amendments adopted by the Lakeside Fire Protection District shall take precedence over both the 2009 International Fire Code and 2010 California Fire Code provisions; and

WHEREAS, Health & Safety Code section 17958.5 permits the Lakeside Fire Protection District to make such changes or modifications to the Codes as are reasonably necessary because of local conditions; and

WHEREAS, Health & Safety Code section 17958.7 requires that the Lakeside Fire Protection District before making any changes or modifications pursuant to section 17958.5 make express findings that such changes or modifications are needed due to local climatic, geological, or topographical conditions; and

WHEREAS, the Board of Directors of the Lakeside Fire Protection District does herewith find that the Lakeside Fire Protection District has certain climatic, geological, and topographical features that can have a deleterious effect on emergency services such as fire protection and emergency medical services; and

WHEREAS, the Board of Directors of the Lakeside Fire Protection District finds that the modifications and changes to the 2009 International Fire Code and 2010 California Fire Code are reasonably necessary because of the following local climatic, geological, and topographical conditions as identified in Attachment A; and

WHEREAS, certain amendments to the 2010 California Fire Code and the 2009 International Fire Code serve to mitigate to the extent possible said deleterious effects; and

WHEREAS, sections 50022.1 through 50022.10, inclusive, of the Government Code and section 13869 of the Health & Safety Code, provide authority for the adoption by reference of codes, or portion of such codes.

NOW THEREFORE, the Board of Directors of the Lakeside Fire Protection District does ordain as follows:

Section 1

That Ordinance No.s 08-01, 08-02 and 08-03, to the extent that the latter is or was effective, of the Lakeside Fire Protection District and all other ordinance or parts of ordinances in conflict herewith are hereby repealed.

Section 2

That the Board of Directors of the Lakeside Protection District adopts as the Fire Code for the Lakeside Fire Protection District ("Fire Code" or "code") the following: the 2010 California Fire Code, including the appendix to Chapter 4 and appendices B, BB, H and I, the 2009 International Fire Code ("IFC"), and the National Fire Protection Association Standards 13, 13-R & 13-D, 2010 Editions, together with the District's amendments in this ordinance. This Fire Code is adopted for the protection of the public health and safety. This Fire Code includes, but is not limited to, definitions, provisions for the safeguarding of life and property from fire and explosion hazards arising from the storage, handling and use of hazardous substances, materials and devices, and from conditions hazardous to life or property in the occupancy of buildings, requirements for permits and inspection for installing or altering systems, regulations for the erection, construction, enlargement, alteration, repair, moving, removal, conversion, demolition, equipment use and maintenance of buildings and structures, including the installation, alteration or repair of new and existing fire protection systems and their inspection and

provides penalties for violation of this code. Each and all of the regulations, provisions, penalties, conditions and terms of the Fire Code on file in the office of the Lakeside Fire Protection District are hereby referred to, adopted, and made a part hereof, as if fully set out in this ordinance, with the additions, insertions, deletions and changes, if any, prescribed in Section 3 of this ordinance.

Section 3

That the following sections and chapters of the 2010 California Fire Code are herby revised:

SEC. 101.5. VALIDITY.

Section 101.5 of the 2010 California Fire Code is revised to read:

Sec. 101.5 Validity. The Board of Directors of the Lakeside Fire Protection District hereby declares that should any section, paragraph, sentence or word of this code be declared invalid for any reason it is the intent of this Board that it would have passed all other portions of this code independently of any portion that may be declared invalid.

SEC. 102.13. REPEAL OF CONFLICTING ORDINANCES, RESOLUTIONS OR MOTIONS.

Section 102.13 is added to the 2010 California Fire Code to read:

Sec. 102.13 Repeal of conflicting ordinances, resolutions or motions. All former ordinances, resolutions or motions or parts thereof, conflicting or inconsistent with the provisions of this code are repealed.

SEC. 104.1. GENERAL AUTHORITY AND RESPONSIBILITIES

Section 104.1 of the 2010 California Fire Code is revised to read:

Sec. 104.1 General authority and responsibilities. The fire code official is hereby authorized to enforce the provisions of this code and shall have the authority to render interpretations of this code, and to adopt policies, procedures, rules and regulations in order to clarify the application of its provisions. Such interpretations, policies, procedures, rules and regulations shall be in compliance with the intent and purpose of this code and shall not have the effect of waiving requirements specifically provided for in this code. The fire code official may consult with other fire professionals and experts in the interpretation and application of this code.

SEC. 104.8. MODIFICATIONS.

Section 104.8 of the 2010 California Fire Code is revised to read:

Sec. 104.8 Modifications. Whenever there are practical difficulties involved in carrying out the provisions of this code, the fire code official shall have the authority to grant modifications for individual cases, provided the fire code official shall first find that special individual reasons make the strict letter of this code impracticable and the modification is in compliance with the intent and purpose of this code and that such modification does not lessen health, life and fire safety requirements. The details of action granting modifications shall be recorded and entered into the files of the department of fire prevention.

SEC. 105.6.5.1. CHRISTMAS TREE LOTS.

Section 105.6.5.1 is added to the 2010 California Fire Code to read:

Sec. 105.6.5.1 Christmas tree lots. An operational permit is required to operate a Christmas tree lot, with or without flameproofing services.

SEC. 105.6.19.1. GREENWASTE RECYCLING, MULCHING, COMPOSTING OPERATIONS AND STORAGE.

Section 105.6.19.1 is added to the 2010 California Fire Code to read:

Sec. 105.6.19.1 Greenwaste recycling, mulching, composting operations and storage. An operational permit is required for greenwaste recycling, mulching, composting operations and storage.

SEC. 105.8. NEW MATERIALS, PROCESSES OR OCCUPANCIES WHICH REQUIRE PERMITS.

Section 105.8 is added to the 2010 California Fire Code to read:

Sec. 105.8 New materials, processes or occupancies which require permits. The fire code official may determine, after allowing affected persons an opportunity to be heard, that a material, process or occupancy, not listed in this code shall require a permit, in addition to those now enumerated in this code. In that case, the fire code official shall prepare a list of any additional material, process or occupancy that shall require a permit and post the list in a conspicuous place in the offices of the Lakeside Fire Protection District. Any interested person may obtain a copy of the list.

SEC. 108. APPEALS.

Section 108 of the 2010 California Fire Code is revised to read:

Sec. 108.1 Regional Fire Appeals Board established. In order to hear and decide appeals of orders, decisions or determinations made by the fire code official relative to the application and interpretation of this code, including the granting or denial of modifications, there shall be and is hereby created the Regional Fire Appeals Board (Appeals Board). The Appeals Board shall adopt rules of procedure for conducting its business, and shall render all decisions and findings in writing to the appellant with a duplicate copy to the fire code official. A copy shall also be sent to the County Building Official or other decision maker for the project, whichever is appropriate.

Sec. 108.2 Limitations on authority. An application for appeal shall be based on a claim that the intent of this code or the rules legally adopted hereunder have been incorrectly interpreted, the provisions of this code do not fully apply, or an equivalent method of protection or safety is proposed. The Appeals Board shall have no authority to waive requirements of this code.

Sec. 108.3 Qualifications. The Appeals Board shall consist of members who are qualified by experience and training to pass on matters pertaining to hazards of fire, explosions, hazardous conditions or fire protection systems and are not employees of the jurisdiction.

Sec. 108.4 Appeals procedures. This section establishes appeal procedures of an order, decision or determination (collectively, "determination") made by the fire code official, including the granting or denial of appeals.

Sec. 108.4.1 Appeals of determinations regarding building permits. The County, fire agency or project applicant may appeal a determination made by the fire code official related to a project for which a building permit is required by filing an appeal in writing with the Appeals Board within 30 days of the fire code official's final determination. The Appeals Board shall make factual findings and issue a written recommendation to the County Building Official on whether the fire code official's determination should be upheld, overruled or modified. The County Building Official may not waive the requirements of this code, except as authorized by the code and is subject to the same requirements and restrictions in the code that apply to the fire code official. A copy of the recommendation shall be provided to the applicant. The County Building Official shall act on the Appeals Board's recommendation and issue a written decision to the parties within 15 days of receipt of the Appeals Board's recommendation. The County Building Official's decision shall be final.

Sec. 108.4.2 Appeals of determinations regarding discretionary permits. If the County, the fire agency or the project applicant disagrees with a determination of the fire code official related to a project for which a discretionary permit is required, the following provisions shall apply:

(a) The County, fire agency or project applicant may raise the issue with the decision maker or decision making body. The decision maker or decision making body shall uphold, overrule or modify the fire code official's determination as part of the decision on the discretionary permit. The decision maker or decision making body may not waive the requirements of this code except as authorized by the code, and the decision maker or decision making body is subject to the same requirements and restrictions in the code that applied to the fire code official. If the decision by the decision maker or decision making body on the discretionary permit may be appealed, the decision on the fire code official's determination may be raised in an appeal. If the determination of the fire code official is raised in an appeal of the decision on the discretionary permit, the decision maker or decision making body that hears the appeal shall uphold, overrule or modify the fire code official's determination as part of the decision on the appeal. The decision maker or decision making body hearing the appeal may not waive the requirements of this code except as authorized by the code, and the decision maker or decision making body is subject to the same requirements and restrictions in the code that applied to the fire code official.

(b) The County, the fire agency or the project applicant may seek review of the fire code official's determination by the Appeals Board by filing a request for review with the Appeals Board within 30 days of the fire code official's determination. When reviewing a fire code official's determination pursuant to this subsection, the Appeals Board shall act in an advisory capacity. The Appeals Board shall review the fire code official's determination and make a recommendation to uphold, overrule or modify the fire code official's determination. The Appeals Board shall render its recommendation to the County decision maker or decision-making body for consideration with the application for the discretionary permit.

Sec. 108.4.3 Appeals of determinations for matters other than building permits or discretionary permits.

(a) **Areas outside the fire protection district.** For areas outside the jurisdictional boundaries of the Lakeside Fire Protection District, any person may appeal a determination made by the fire code official regarding a matter for which a building permit or discretionary permit is not required by filing an appeal in writing with the Appeals Board within 30 days of the fire code official's final

determination. The Appeals Board shall review the fire code official's determination and make a recommendation to uphold, overrule or modify the fire code official's determination. The Appeals Board's determination shall be final.

(b) **Areas inside the fire protection district.** For areas inside the jurisdictional boundaries of the Lakeside Fire Protection District, any person may appeal a determination made by the fire code official regarding a matter for which a building permit or discretionary permit is not required by filing an appeal in writing with the fire protection district's Board of Directors within 30 days of the fire code official's final determination. The Board of Directors shall review the fire code official's determination and make a recommendation to uphold, overrule or modify the fire code official's determination. The Board of Director's determination shall be final.

Sec. 108.5 Regional Fire Appeals Board.

(a) The Appeals Board members shall consist of the following:

- Two representatives from the San Diego County Fire Districts Association.
- Two chief officers from CAL FIRE.
- One fire marshal from the unincorporated area of the County.

(b) The Appeals Board shall not include a representative from the agency whose fire code official made the determination that is being appealed. An alternate for the regular member(s) of the Appeals Board shall be designated to serve in this situation.

(c) Three members shall constitute a quorum for the transaction of business, and three affirmative votes shall be necessary to render a recommendation or final determination.

(d) If the Appeals Board recommends a modification to this code for an individual case, a copy of the recommendation and findings along with a map showing the proposed modification and mitigating measures shall be forwarded to the Unit Chief of CAL FIRE, San Diego/Imperial Unit.

SEC. 109.3 VIOLATIONS PENALTIES.

Section 109.3 of the 2010 California Fire Code is revised to read:

Sec. 109.3 Violations penalties. Any person who shall violate any of the provisions of this code or standards hereby adopted or fail to comply therewith, or who shall violate

or fail to comply with any order made there under, or who shall build in violation of any detailed statement or specification or plans submitted and approved there under, or any certificate or permit issued there under, and from which no appeal has been taken, or who shall fail to comply with such an order as affirmed or modified by the attorney for the Lakeside Fire Protection District or by a court of competent jurisdiction within the time fixed herein, shall severally for each and every violation and noncompliance respectively, be guilty of a misdemeanor, punishable by a fine not exceeding $1000.00 or by imprisonment in County Jail not exceeding six (6) months, or both. The imposition of one penalty of any violation shall not excuse the violation or permit it to continue; and all such persons shall be required to correct or remedy such violations or defects within a reasonable time; and when not otherwise specified, each day that prohibited conditions are maintained shall constitute a separate offense.

The application of the above penalty shall not be held to prevent the enforced removal of prohibited conditions.

SEC. 111.4 FAILURE TO COMPLY.

Section 111.4 of the 2010 California Fire Code is revised to read:

Sec. 111.4 Failure to comply. Any person, who shall continue any work having been served with a stop work order, except such work as that the person is directed to perform to remove a violation or unsafe condition, shall be liable to a fine of not less than $250.00 dollars or more than $1,000 dollars.

SEC. 202. DEFINITIONS.

Section 202 of the 2010 California Fire Code is revised by adding or modifying the following definitions:

COUNTY SERVICE AREA (CSA). A service area formed pursuant to California Government Code sections 25210 et seq. to provide fire protection, emergency medical services or other government services.

FIRE AUTHORITY HAVING JURISDICTION (FAHJ). The designated entity providing enforcement of fire regulations as they relate to planning, construction and development. The FAHJ may also provide fire suppression and other emergency services.

FIRE CHIEF. The fire chief is one of the following:

(a) The person appointed by the Board of Supervisors to serve as fire chief in the unincorporated areas not within a fire protection district.

(b) The chief officer of a fire protection district.

(c) The Sheriff when enforcing Chapter 33 of the County Fire Code within the unincorporated areas of the County not within a fire protection district.

FIRE CODE OFFICIAL. The fire chief or his or her duly authorized representative charged with the administration and enforcement of this code.

FIRE DEPARTMENT. Any regularly organized fire department, fire protection district, fire company, or legally formed volunteer fire department registered with the County of San Diego regularly charged with the responsibility of providing fire protection to a jurisdiction.

FIRE HAZARD. Any condition or conduct which: (a) increases or may increase the threat of fire to a greater degree than customarily recognized as normal by persons in the public service regularly engaged in preventing, suppressing or extinguishing fire or (b) may obstruct, delay, hinder or interfere with the operations of the fire department or the egress of occupants in the event of fire.

FIRE PROTECTION DISTRICT. Any fire protection district created under State law and any water district providing fire protection services.

FUEL MODIFICATION ZONE. A strip of land where combustible vegetation has been thinned or modified or both and partially or totally replaced with approved fire-resistant and/or irrigated plants to provide an acceptable level of risk from vegetation fires. Fuel modification reduces the radiant and convective heat on a structure and provides valuable defensible space for firefighters to make an effective stand against an approaching fire front.

HAZARDOUS FIRE AREA. Any geographic area mapped by the State or designated by a local jurisdiction as a moderate, high or very high fire hazard area or which the FAHJ has determined is a hazardous fire area, because the type and condition of vegetation, topography, weather and structure density increase the probability that the area will be susceptible to a wildfire.

HIGH-HAZARD GROUP H. High-hazard Group H occupancy includes, among others, the use of a building or structure or a portion thereof, that involves the manufacturing, processing, generation or storage of materials that constitute a physical or health hazard in quantities in excess of quantities allowed in control areas constructed and located as required in section 2703.8.3. Hazardous uses are classified in Groups H-1, H-2, H-3, H-4 and H-5 and shall comply with this chapter and the requirements of section 415 of the 2010 California Building Code.

Exceptions: The following shall not be classified in Group H, but shall be classified in the occupancy that they most nearly resemble as determined by the fire code official:

1. Buildings and structures that contain not more than the maximum allowable quantities per control area of hazardous materials as shown in Tables 2703.1.1(1) and 2703.1.1(2), provided that the buildings are maintained as provided with this chapter.

2. Buildings utilizing control areas in compliance with section 2703.8.3 that contain not more than the maximum allowable quantities per control area of hazardous materials as shown in Tables 2703.1.1(1) and 2703.1.1(2).

3. Wholesale and retail sales and storage of flammable and combustible liquids in mercantile occupancies conforming to Chapter 34 of the California Fire Code.

4. Closed piping systems containing flammable or combustible liquids or gases utilized for the operation of machinery or equipment.

5. Cleaning establishments that utilize combustible liquid solvents having a flash point of 140°F (60°C) or higher in closed systems employing equipment listed by an approved testing agency, provided that this occupancy is separated from all other areas of the building by 1-hour fire barriers constructed in compliance with section 706 of the California Building Code or 1-hour horizontal assemblies constructed in accordance with section 711 of the California Building Code, or both.

6. Cleaning establishments that utilize a liquid solvent having a flash point at or above 200°F (93°C).

7. Liquor stores and distributors without bulk storage.

8. Refrigeration systems.

9. The storage or utilization of materials for agricultural purposes on the premises.

10. Stationary batteries utilized for facility emergency power, uninterrupted power supply or telecommunication facilities, provided that the batteries are provided with safety venting caps and ventilation is provided in accordance with the California Mechanical Code.

11. Corrosives contained in household or personal products or commonly used building materials, in their original retail packaging.

12. Display and storage of nonflammable solid and nonflammable or noncombustible liquid hazardous materials in quantities not exceeding the maximum allowable quantity per control area in Group M or S occupancies complying with section 2703.8.3.5.

13. The storage of black powder, smokeless propellant and small arms primers in Groups M and R-3 and special industrial explosive devices in Groups B, F, M and S, provided the storage conforms to the quantity limits and requirements of this chapter.

LISTED. Equipment, materials, products or services included in a list published by an organization acceptable to the fire code official and concerned with the evaluation of products or services that maintains periodic inspection of production of listed equipment or materials or periodic evaluation of services and whose listing states either that the equipment, material product or service meets identified standards or has been tested and found suitable for a specific purpose.

MID-RISE BUILDING. A building four stories or more high, but not exceeding 75 feet in height and not defined as a high-rise building by section 202 of the 2010 California Building Code. Measurements shall be made from the underside of the roof or floor above the topmost space that may be occupied to the lowest fire apparatus access road level.

RESPONSE TIME. The elapsed time from the fire department's receipt of the first alarm to when the first fire unit arrives at the scene.

STRUCTURE. That which is built or constructed, an edifice or building of any kind, or any piece of work artificially built up or composed of parts joined together in some manner.

TRAVEL TIME. The estimated time it would take for a responding agency to travel from the fire station to the furthest structure in a proposed development project, determined by measuring the safest, most direct, appropriate and reliable route with consideration given to safe operating speeds for heavy fire apparatus.

SEC. 304.1.4. OUTDOOR CARNIVALS AND FAIRS.

Section 304.1.4 is added to the 2010 California Fire Code to read:

Sec. 304.1.4 Outdoor carnivals and fairs. Outdoor carnivals and fairs shall only be conducted on grounds free of combustible vegetation or trimmed to the satisfaction of the FAHJ.

SEC. 307.5. ATTENDANCE OF OPEN BURNING AND RECREATIONAL FIRES.

Section 307.5 of the 2010 California Fire Code is revised to read:

Sec. 307.5 Attendance. Open burning, bonfires, recreational fires and the use of portable outdoor fireplaces shall be constantly attended by an adult until the fire is extinguished. A minimum of one portable fire extinguisher complying with section 906 with a minimum 4-A rating or other approved on-site fire-extinguishing equipment, such as dirt, sand, water barrel, garden hose or water truck, shall be available for immediate utilization.

SEC. 316.3. PITFALLS.

Section 316.3 of the 2010 California Fire Code is deleted.

SEC. 318. STORAGE OF FIREWOOD.

Section 318 is added to the 2010 California Fire Code to read:

SECTION 318
STORAGE OF FIREWOOD

Sec. 318.1 General. **Firewood shall not be stored in unenclosed space beneath a building or structure, on a deck or under eaves, a canopy or other projection or overhang. When required by the fire code official, firewood or other combustible material stored in the defensible space surrounding a structure shall be located at least 30 feet from any structure and separated from the crown of any trees by a minimum of 15 feet, measured horizontally. Firewood and combustible materials not for use on the premises shall be stored so as to not pose a fire h**

SEC. 319. MID-RISE BUILDINGS.

Section 319 is added to the 2010 California Fire Code to read:

SECTION 319
MID-RISE BUILDINGS

Sec 319.1 General. A newly constructed mid-rise building or a mid-rise building which undergoes a complete renovation that requires the building to be completely vacated shall comply with this section.

Exceptions:

1. Buildings used exclusively as an open parking garage.

2. Buildings where all floors above the fourth floor level are used exclusively as an open parking garage.

3. Buildings such as a power plant, lookout tower, steeple, grain house, and other similar structures with intermittent human occupancy.

Sec. 319.1.1 Automatic fire sprinkler systems and standpipes. Mid-rise buildings shall be protected throughout by an automatic fire sprinkler system designed and installed in conformance with the latest edition of NFPA 13 and in accordance with the following:

1. A shut-off valve and a water flow alarm shall be provided for each floor. Each shut-off valve and water flow alarm shall be electronically supervised.

2. Mid-rise buildings shall be provided with a class I standpipe system that is interconnected with the automatic fire sprinkler system. The system shall consist of 2½-inch hose valves located in each stair enclosure on every floor. Two hose outlets shall be located on the roof outside of each stair enclosure which penetrates the roof. The standpipe system shall be designed, installed and tested in accordance with the latest edition of NFPA 14.

3. Fire department standpipe connections and valves serving each floor shall be located in the vestibule and located in a manner so as not to obstruct egress when hose lines are connected and charged.

Sec. 319.1.2 Smoke detection. Smoke detectors shall be provided in accordance with this section. Smoke detectors shall be connected to an automatic fire alarm system and shall be installed in accordance with the latest edition of NFPA 72. The actuation of any device required by this section shall operate the emergency voice alarm signal system and shall operate all equipment necessary to prevent the circulation of smoke through air return and exhaust ductwork. Smoke detectors shall be located as follows:

1. In every mechanical equipment, electrical, transformer, telephone equipment, unmanned computer equipment, elevator machinery or similar room and in all elevator lobbies. Elevator lobby detectors shall be connected to an alarm verification zone or be listed as a releasing device.

2. In the main return air and exhaust air plenum of each air conditioning system. The smoke detector shall be located in a serviceable area downstream of the last duct inlet.

3. At each connection to a vertical duct or riser serving two or more stories from a return air duct or plenum of an air conditioning system. In Group R, Division 1 and 2 occupancies, an approved smoke detector is allowed to be used in each return air riser carrying not more than 5,000 cubic feet per minute and not serving more than 10 air inlet openings.

4. For Group R, Division 1 and 2 occupancies, in all corridors serving as a means of egress for an occupant load of 10 or more persons.

Sec. 319.1.3 Fire alarm system. An approved and listed, automatic and manual, fully addressable and electronically-supervised fire alarm system shall be provided in conformance with this code and the 2010 California Building Code.

Sec. 319.1.4 Emergency voice alarm signaling system. The operation of any automatic fire detector or water flow device shall automatically sound an alert tone followed by a pre-recorded voice instruction giving appropriate information and direction on a general or selective basis to the following terminal areas:

1. Elevators
2. Elevator lobbies
3. Corridors
4. Exit stairways
5. Rooms and tenant spaces
6. Dwelling units
7. Hotel guest rooms
8. Areas designated as safe refuge within the building

Sec. 319.1.5 Fire command center. A fire command center for fire department operations shall be provided. The location and accessibility of the fire command center shall be approved by the fire department. The room shall be separated from the remainder of the building by not less than a 1-hour fire barrier. The room shall be a minimum of 200 square feet with a minimum dimension of 10 feet. It shall contain the following facilities at a minimum:

1. Voice alarm and public address panels
2. Fire department communications panel
3. Fire alarm enunciator panel
4. Elevator enunciator panel (when building exceeds 55 feet in height)

5. Status indicators and controls for air-handling systems (stairwell pressurization)
6. Controls for unlocking stairwell doors
7. Fire pump status indicators (if required)
8. Set of complete building plans
9. Elevator control switches for switching of emergency power
10. Work table

Sec. 319.1.6 Annunciation identification. Control panels in the central control station shall be permanently identified as to their function. Water flow, automatic fire detection and manually-activated fire alarms, and supervisory and trouble signals shall be monitored by an approved UL-listed central monitoring station and annunciated in the fire command center by means of an audible and visual indicator. For the purposes of annunciation, zoning shall be in accordance with the following:

1. When the system serves more than one building, each building shall be a separate zone.
2. Each floor in a building shall be a separate zone.
3. When one or more risers serve the same floor, each riser shall be a separate zone.

Sec. 319.1.7 Elevators. Elevators and elevator lobbies shall comply with Chapter 30 of the 2010 California Building Code. At least one elevator cab shall be assigned for fire department use, and shall serve all floors of the building. This cab shall be provided large enough to accommodate an ambulance-type stretcher in accordance with section 3002.4 of the 2010 California Building Code.

Sec. 319.1.8 Fire department communication system. An approved two-way fire department communication system designed and installed in accordance with the latest edition of NFPA 72 shall be provided for fire department use per section 907.2.13.2.

Sec. 319.1.9 Means of egress. In addition to the requirements of Chapter 10, egress components of mid-rise buildings shall comply with sections 319.1.9.1 through 319.1.9.5.

Sec. 319.1.9.1 Extent of enclosure. Stairway enclosures shall be continuous and shall fully enclose all portions of the stairway. Exit enclosures shall exit directly to the exterior of the building or include an exit passageway on the ground floor leading to the exterior of the building. Each exit enclosure shall extend completely through the roof and be provided with a door that leads onto the roof.

Sec. 319.1.9.2 Pressurized enclosures and stairways. All required stairways and enclosures in a mid-rise building shall be pressurized as specified in section 909. Pressurized stairways shall be designed to exhaust smoke manually when needed.

Sec. 319.1.9.3 Vestibules. Pressurized stairway enclosures serving a mid-rise building shall be provided with a pressurized entrance vestibule on each floor that complies with section 909.

Sec. 319.1.9.4 Pressure differences. The minimum pressure difference between a vestibule and adjacent areas shall comply with section 909.

Sec. 319.1.9.5 Locking of stairway doors. All stairway doors that are locked to prohibit access from the interior of the stairway shall have the capability of being unlocked simultaneously, without unlatching, upon a signal from the fire command center. Upon failure of normal electrical service or activation of any fire alarm, the locking mechanism shall automatically retract to the unlocked position.

A telephone or other two-way communication system connected to an approved emergency service which operates continuously shall be provided at not less than every third floor in each required exit stairway vestibule.

Approved signage stating doors are locked shall be provided in each stairwell vestibule on each floor in which entry may be made and on each floor in which a telephone is located. Hardware for locking stairway vestibule doors shall be State Fire Marshal listed and approved by the Fire Chief by permit before installation. Stairway doors located between the vestibules and the stairway shaft shall not be locked.

SEC. 501.3.1. FIRE APPARATUS ACCESS MODIFICATIONS.

Section 501.3.1 is added to the 2010 California Fire Code to read:

Sec. 501.3.1 Fire apparatus access modifications. Plans for the modification of fire apparatus access road shall be submitted to the fire code official for review and approval prior to construction or modification of any fire apparatus road.

SEC. 502.1. DEFINITIONS.

The following definitions in section 502.1 of the 2010 California Fire Code are added or revised to read:

DEAD-END ROAD. A road that has only one point of vehicular ingress/egress, including cul-de-sacs and looped roads.

FIRE APPARATUS ACCESS ROAD. A road that provides fire apparatus access from a fire station to a facility, building or portion thereof. This is a general term that includes, but is not limited to a fire lane, public street, private street, driveway, parking lot lane and access roadway.

SEC. 503. FIRE APPARATUS ACCESS ROADS

Section 503 of the 2010 California Fire Code is revised to read:

SECTION 503
FIRE APPARATUS ACCESS ROADS

Sec. 503.1 General. Fire apparatus access roads, including private residential driveways, shall be required for every building hereafter constructed when any portion of an exterior wall of the first story is located more than 150 feet from the closest point of fire department vehicle access.

Fire apparatus access roads, except private residential driveways, shall be provided and maintained for purposes of rapid and reliable fire apparatus access and for unobstructed traffic circulation for evacuation or relocation of civilians during a wildfire or other emergency.

Fire apparatus access roads, including private residential driveways more than 150 feet in length, shall be provided and maintained in compliance with this section and the most recent edition and any amendments thereto, of public and private road standards as adopted by the County of San Diego (San Diego County Standards for Private Roads and Public Roads, San Diego County Department of Public Works). The fire code official may modify the requirements of this section if the modification provides equivalent access.

Sec. 503.1.1 Buildings and facilities. Approved fire apparatus access roads shall be provided for every facility, building or portion of building hereafter constructed or moved into or within the jurisdiction. The fire apparatus access road shall comply with the requirements of this section and shall extend within 150 feet of all portions of the facility and all portions of the exterior walls of the first story of the building as measured by an approved route around the exterior of the building or facility.

Exceptions: The fire code official may increase the 150 foot minimum where:

1. The building is equipped throughout with an approved automatic sprinkler system installed in accordance with sections 903.3.1.1, 903.3.1.2 or 903.3.1.3.

2. Fire apparatus access roads cannot be installed because of topography, waterways, nonnegotiable grades or other similar conditions, and an approved alternative means of fire protection is provided.

3. There are no more than two Group R-3 or Group U occupancies.

Sec. 503.1.2 Additional access. The fire code official is authorized to require more than one fire apparatus access road based on the potential for impairment of a single road by vehicle congestion, condition of terrain, climatic conditions or other factors that could limit access.

Sec. 503.1.3 Dead-end roads. The maximum length of a dead-end road, including all dead-end roads accessed from that dead-end road, shall not exceed the following cumulative lengths, regardless of the number of parcels served:

ZONING FOR PARCEL SERVED BY DEAD-END ROAD(s)	CUMULATIVE LENGTH OF DEAD-END ROAD(s)
Parcels zoned for less than 1 acre	800 feet
Parcels zoned for 1 acre to 4.99 acres	1,320 feet
Parcels zoned for 5 acres to 19.99 acres	2,640 feet
Parcels zoned for 20 acres or larger	5,280 feet

All lengths shall be measured from the edge of the roadway surface at the intersection where the road begins to the end of the road surface at its farthest point. Where a dead-end road crosses areas of differing zoned parcel sizes, requiring different length limits, the shortest allowable length shall apply. Where parcels are zoned 5 acres or larger, turnarounds shall be provided at a maximum of 1320 foot intervals. Each dead-end road shall have a turnaround approved by the fire code official and constructed at its terminus.

Sec. 503.1.4 High-piled storage. Fire department vehicle access to buildings used for high-piled combustible storage shall comply with the applicable provisions of Chapter 23.

Sec. 503.2 Specifications. Fire apparatus access roads shall be installed and arranged in compliance with sections 503.2.1 through 503.2.8.

Sec. 503.2.1 Dimensions. The dimensions of fire apparatus access roads shall be in accordance with the following:

(a) Fire apparatus access roads shall have an unobstructed improved width of not less than 24 feet, except for single-family residential driveways serving no more than two single-family dwellings, which shall have a minimum of 16 feet of unobstructed improved width. Any of the following, which have separated lanes of one-way traffic:

gated entrances with card readers, guard stations or center medians, are allowed, provided that each lane is not less than 14 feet wide.

(b) Fire apparatus access roads that are public or private roads which are provided or improved as a result of a Tentative Map, Tentative Parcel Map or a Major/Minor Use Permit shall have the dimensions as set forth by the County of San Diego Standards for Public and Private Roads.

(c) All fire apparatus access roads shall have an unobstructed vertical clearance of not less than 13 feet 6 inches.

(d) Vertical clearances or road widths shall be increased when the fire code official determines that vertical clearances or road widths are not adequate to provide fire apparatus access.

(e) Vertical clearances or road width may be reduced when the fire code official determines the reduction does not impair access by fire apparatus. In cases where the vertical clearance has been reduced, approved signs shall be installed and maintained indicating the amount of vertical clearance.

Sec. 503.2.1.1 Road phasing policy for single family dwellings on existing legal parcels. The fire access roadway requirement for widening existing improved fire apparatus roadway shall be per Table 503.2.1.1A and will extend from the property out to the nearest public road.

TABLE 503.2.1.1A - PHASING POLICY
Fire Apparatus Access – Single Family Dwellings

Number of Parcels	Unobstructed Road width	Roadways Over 600 foot Long	Extend to Nearest Public Road
1-2	16-foot, paved	Turnouts every 400-feet	Yes
3-8	20-foot, paved	Turn-outs every 400-feet	Yes
9 or more	24-foot, paved	Not required	Yes

The access roadway will not be required to be improved for auxiliary structures (non-habitable) and residential additions/remodels less than 500 square feet if the access roadway has already been improved to a minimum width of 20 feet. If the roadway is not 20 feet, then the roadway shall be widened per Table 503.2.1.1A, but not greater than 20 feet. The preceding addition/remodel exception is limited to one permit (addition or remodel) per three-year period from the date of the last permit approval.

Sec. 503.2.2 Authority to increase minimums. The fire code official shall have the authority to require an increase in the minimum access road widths where the fire code official determines the minimum are inadequate for fire or rescue operations.

Sec. 503.2.3 Surface. Fire apparatus access roads shall be designed and maintained to support the imposed loads of fire apparatus (not less than 75,000 lbs.) and shall be provided with an approved paved surface so as to provide all-weather driving capabilities.

Sec. 503.2.3.1 Surfacing materials. The minimum surfacing materials required for fire apparatus access roads shall vary with the slope of the roadway as follows:

0-15% Slope	2" Asphaltic Concrete
16-20% Slope	3" Asphaltic Concrete

The paving and sub-base shall be installed to the standards specified in Section I-M of the County of San Diego Off-street Parking Design Manual. A residential driveway constructed of 3½" Portland cement concrete may be installed on any slope up to 20% provided that slopes over 15% have a deep broom finish perpendicular to the direction of travel to enhance traction.

Sec. 503.2.4 Turning radius. The turning radius of a fire apparatus access road shall comply with the County public and private road standards approved by the Board of Supervisors. The turning radius for a private residential driveway shall be a minimum of 28 feet, as measured on the inside edge of the improvement width or as approved by the fire code official.

Sec. 503.2.5 Dead ends. All dead-end fire access roads in excess of 150 feet in length shall be provided with approved provisions for turning around emergency apparatus. A cul-de-sac shall be provided in residential areas where the access roadway serves more than 2 structures. The minimum unobstructed paved radius width for a cul-de-sac in a residential area shall be 36 feet. The fire code official shall establish a policy identifying acceptable turnarounds for various project types.

Sec. 503.2.6 Bridges and elevated surfaces. Where a bridge or an elevated surface is part of a fire apparatus access road, the bridge shall be constructed and maintained in accordance with AASHTO HB-17. Bridges and elevated surfaces shall be designed for a live load sufficient to carry the imposed loads of fire apparatus. Vehicle load limits and clearance limitations shall be posted at both entrances to bridges when required by the fire code official. Where elevated surfaces designed for emergency vehicle use are adjacent to surfaces which are not designed for such use, approved

barriers, approved signs or both shall be installed and maintained when required by the fire code official.

Sec. 503.2.6.1 Bridges with one traffic lane. When approved by the fire code official, private bridges providing access to not more than two residential dwellings may have one 12 foot wide travel lane; however, it shall provide for unobstructed visibility from one end to the other, and turnouts shall be provided at both ends.

Sec. 503.2.7 Grade. The gradient for a fire apparatus access roadway shall not exceed 20.0%. Grades exceeding 15.0% shall not be allowed without mitigation measures. Minimal mitigation shall be the installation of a fire sprinkler system and a road surface that conforms to section 503.2.3.1. The fire code official may require additional mitigation measures where he deems appropriate. The angle of departure and angle of approach of a fire access roadway shall not exceed 7 degrees (12 percent) or as approved by the fire code official.

Sec. 503.2.8 Roadway turnouts. When required by the fire code official, turnouts shall be a minimum of 10 feet wide and 30 feet long with a minimum 25 foot taper on each end.

Sec. 503.3 Marking. When required by the fire code official, approved signs or other approved notices shall be provided for fire apparatus access roads to identify such roads or prohibit the obstruction thereof. Signs or notices shall be maintained in a clean and legible condition at all times and be replaced or repaired when necessary to provide adequate visibility. All new public roads, all private roads within major subdivisions and all private road easements serving four or more parcels shall be named. Road name signs shall comply with County of San Diego Department of Public Works Design Standard #DS-13.

Sec. 503.3.1 Fire lane designation. Where the fire code official determines that it is necessary to ensure adequate fire access, the fire code official may designate existing roadways as fire access roadways as provided by Vehicle Code section 22500.1.

Sec. 503.4 Obstruction of fire apparatus access roads. Fire apparatus access roads shall not be obstructed in any manner, including the parking of vehicles. The minimum road widths and clearances established in section 503.2.1 shall be maintained at all times.

Sec. 503.4.1 Roadway design features. Roadway design features (speed bumps, speed humps, speed control dips, etc.) which may interfere with emergency apparatus responses shall not be installed on fire access roadways, unless they meet design criteria approved by the fire code official.

Sec. 503.5 Required gates or barricades. The fire code official is authorized to require the installation and maintenance of gates or other approved barricades across fire apparatus access roads, trails or other accessways, not including public streets, alleys or highways. Electric gate openers, where provided, shall be listed in accordance with UL 325. Gates intended for automatic operation shall be designed, constructed and installed to comply with the requirements of ASTM F2200.

Sec. 503.5.1 Secured gates and barricades. When required, gates and barricades shall be secured as approved by the fire code official. Roads, trails and other accessways that have been closed and obstructed in the manner prescribed by section 503.5 shall not be trespassed on or used unless authorized by the owner and the fire code official.

Exception: The restriction on use shall not apply to public officers acting within the scope of duty.

Sec. 503.5.2 School fences and gates. School grounds may be fenced and gates therein may be equipped with locks, provided that safe dispersal areas based on three square feet per occupant are located between the school and the fence. Such required safe dispersal areas shall not be located less than 50 feet from school buildings.

Every public and private school shall conform to Education Code section 32020, as amended from time to time.

Sec. 503.6 Security gates. No person shall install a security gate or security device across a fire access roadway without the fire code official's approval.

1. An automatic gate across a fire access roadway or driveway shall be equipped with an approved emergency key-operated switch overriding all command functions and opening the gate.
2. A gate accessing more than four residences or residential lots or a gate accessing hazardous institutional, educational or assembly occupancy group structure, shall also be equipped with an approved emergency traffic control-activating strobe light sensor or other device approved by the fire code official, which will activate the gate on the approach of emergency apparatus.
3. An automatic gate shall be provided with a battery back-up or manual mechanical disconnect in case of power failure.
4. An automatic gate shall meet fire department policies deemed necessary by the fire code official for rapid, reliable access.
5. An automatic gate serving more than one dwelling or residential lot in existence at the time of adoption of this chapter is required to install an approved emergency key-operated switch or other mechanism approved by the fire code official, at an approved location, which overrides all command

functions and opens the gate. A property owner shall comply with this requirement within 90 days of receiving written notice to comply.

6. Where this section requires an approved key-operated switch, it may be dual-keyed or equipped with dual switches provided to facilitate access by law enforcement personnel.
7. All gates providing access from a road to a driveway shall be located a minimum of 30 feet from the nearest edge of the roadway and shall be at least two feet wider than the width of the traffic lane(s) serving the gate.
8. Electric gate openers, where provided, shall be listed in accordance with UL 325. Gates intended for automatic operation shall be designed, constructed and installed to comply with the requirements of ASTM F2200.

SEC. 505. PREMISES IDENTIFICATION.

Section 505 of the 2010 California Fire Code is revised to read:

SECTION 505
PREMISES IDENTIFICATION

Sec. 505.1 Address numbers. Approved numbers and/or addresses shall be placed on all new and existing buildings and at appropriate additional locations, plainly visible and legible from the street or roadway fronting the property when approaching from either direction. The numbers shall contrast with their background and shall meet the following minimum size standards: 4" high with a ½" stroke for residential buildings, 6" high with a ½" stroke for commercial and multi-residential buildings and 12" high with a 1" stroke for industrial buildings. Additional numbers shall be required where deemed necessary by the fire code official, such as rear access doors, building corners and entrances to commercial centers. The fire code official may establish different minimum sizes for numbers for various categories of projects.

Sec. 505.2 Street or road signs. Streets and roads shall be identified with approved signs. Temporary signs shall be installed at each street intersection when construction of new roadways allows passage by vehicles. Signs shall be of an approved size, weather resistant and be maintained until replaced by permanent signs.

Sec. 505.3 Easement address signs. A road easement which is not named differently from the roadway from which it originates shall have an address sign installed and maintained listing all street numbers occurring on that easement. The sign shall be located where the easement intersects the named roadway. The numbers on the sign shall contrast with the background and have a minimum height of 4" and a minimum stroke of ⅜."

Sec. 505.4 Directory map. A lighted directory map, meeting current fire department standards, shall be installed at the driveway entrance to a residential project or a mobile home park, with more than 15 units.

Sec. 505.5 Response map updates. Any new development which necessitates updating emergency response maps due to new structures, hydrants, roadways or similar features shall be required to provide map updates in a format compatible with current department mapping services and shall be charged a reasonable fee for updating all response maps. At a minimum, the map updates shall be provided in PDF or a CAD format approved by the FAHJ.

SEC. 506.1.2. EMERGENCY KEY ACCESS.

Section 506.1.2 is added to the 2010 California Fire Code portion to read:

Sec. 506.1.2 Emergency key access. All central station-monitored fire detection systems and fire sprinkler systems shall have an approved emergency key access box on site in an approved location. The owner or occupant shall provide and maintain current keys for any structure for fire department placement in the box and shall notify the fire department in writing when the building is re-keyed.

SEC. 507.2. TYPE OF WATER SUPPLY.

Section 507.2 of the 2010 California Fire Code is revised to read:

Sec. 507.2 Type of water supply. Water supply may consist of reservoirs, pressure tanks, elevated tanks, water mains or other fixed systems, as approved by the fire code official, capable of providing the required fire flow in a reliable manner. In setting the requirements for fire flow, the fire code official shall follow section 507.3, Appendix B of the 2010 California Fire Code or the standard published by the Insurance Services Office, "Guide for Determination of Required Fire Flow".

Sec. 507.2.1 Private fire service mains. Private fire service mains and appurtenances shall be installed in accordance with NFPA 24.

Sec. 507.2.2 Water tanks. Water tanks for private fire protection, when authorized by the fire code official, shall comply with Table 507.2.2.

TABLE 507.2.2 WATER TANK REQUIREMENTS			
Building Square Feet	Gallons Per Minute Water Flow	Capacity Gallons	Duration Minutes
Up to 1,500 Over 1,500	250 250	5,000 10,000	20 40
When the exposure distance is one hundred feet (100') or less from an adjacent property, or where additional hazards or higher fire flow exists, the required water storage may be modified by the fire code official.			

1. Tank bottom elevation shall be equal to or higher than the fire department connection on the premises. Regardless of domestic use, all tanks shall be equipped with a device that will ensure that the tank contains the designated amount of water for fire flow duration as determined by the FAHJ. Tank size may be increased to serve multiple structures on a single parcel.

2. Supply outlet shall be at least 4 inches in diameter from the base of the tank to the point of outlet at the fire department connection. The fire department connection shall have an approved means of controlling water flow. The fire department connection shall be at least one 4-inch National Standard Thread (male), reduced to one 2½ inch National Standard Thread (male). Additional outlets may be required.

3. Location of fire department outlet shall be shown on the plot plan when submitted to the FAHJ. Consideration will be given to topography, elevations, and distance from structures, driveway access, prevailing winds, etc.

4. The outlet shall be located along a fire apparatus access roadway and shall not be closer than 50 feet or further than 150 feet from the structure.

5. All exposed tank supply pipes shall be of an alloy or other material listed for above ground use. Adequate support shall be provided.

6. Water storage tanks shall be constructed from materials approved by the fire code official and installed per manufacturer recommendations.

7. The fire code official may require any necessary information to be submitted on a plot plan for approval.

8. Vessels previously used for products other than water shall not be allowed.

9. The bottom of the water storage tank shall be level with or above the building pad.

SEC. 507.3. FIRE FLOW.

Section 507.3 of the 2010 California Fire Code is revised to read:

Sec. 507.3 Fire flow. Fire flow requirements shall be based on Appendix B of the 2010 California Fire Code or the standard published by the Insurance Services Office, "Guide for Determination of Required Fire Flow." Consideration should be given to increasing the gallons per minute to protect structures of extremely large square footage and for such reasons as: poor access roads, grade and canyon rims, hazardous brush and response times greater than five minutes by a recognized fire department or fire suppression company. In hazardous fire areas the main capacity for new subdivisions shall not be less than 2,500 gallons per minute, unless otherwise approved by the fire code official. If fire flow increases are not feasible, the fire code official may require alternative design standards such as: alternative types of construction that provides a higher level of fire resistance, fuelbreak requirements, which may include required irrigation, modified access road requirements, specified setback distances for building sites addressing canyon rim developments and hazardous brush areas, and other requirements as authorized by this chapter and as required by the fire code official.

SEC. 507.5.1. FIRE PROTECTION WATER SUPPLIES-REQUIRED INSTALLATIONS.

Section 507.5.1 of the 2010 California Fire Code is revised to read:

Sec. 507.5.1 Required installations. The location, type and number of fire hydrants connected to a water supply capable of delivering the required fire flow shall be provided on the public or private street, or on the site of the premises to be protected or both. Fire hydrants shall be accessible to the fire department apparatus by roads meeting the requirements of section 503.

Sec. 507.5.1.1 Location of fire hydrants. Fire hydrants shall be located as required by the fire code official using the following criteria and taking into consideration departmental operational needs. Hydrants shall be located at intersections, at the beginning radius of cul-de-sacs and at intervals identified in the following tables and criteria. Hydrants located across heavily traveled roadways shall be not considered as serving the subject property.

Sec. 507.5.1.1.1 Requirements for single-family dwellings. In projects zoned for single-family dwellings, fire hydrants shall be installed in accordance with Table 507.5.1.1.1.

TABLE 507.5.1.1.1 DISTANCE BETWEEN HYDRANTS FOR SINGLE FAMILY DWELLINGS	
Parcels 2½ acres and larger:	Every 1,000 feet
Parcels ½ to 2½ acres:	Every 500 feet
Parcels less than ½ acre:	Every 350 feet

Sec. 507.5.1.1.2 Requirements for multi-family, commercial and industrial zones. In multi-family, commercial and industrial zones, fire hydrants shall be installed at intersections, at the beginning radius of cul-de-sacs and every 300 feet of fire apparatus access roadways, regardless of parcel size.

Exception: When the fire code official determines that fire protection methods greater than this code requires are provided on a parcel, the fire code official may modify the requirements of this section.

Sec. 507.5.1.1.3 Fire hydrant construction and configuration. All fire hydrants shall be of bronze construction, including all internal parts except seats. Alternative materials may be used if approved by the fire code official and the local water district having jurisdiction. The stems shall be designed and installed in a manner that will ensure that they will not be projected outward from the main body by internal water pressure due to disassembly. The number and size of fire hydrant outlets shall be as follows:

1. One 4 inch and one 2½ inch NST outlet.
2. One 4 inch and two 2½ inch NST outlets.

In some instances the fire code official may require a fire hydrant to have any other combination of 4 inch and 2½ inch outlets.

Sec. 507.5.1.2 Waterline extensions. The fire code official may require a waterline extension for the purpose of installing a fire hydrant if a water main is 1,500 feet or less from the property line.

SEC. 603.6.6. SPARK ARRESTERS.

Section 603.6.6 is added to the 2010 California Fire Code to read:

Sec. 603.6.6 Spark arresters. All structures having a chimney, flue or stovepipe attached to a fireplace, stove, barbecue or other solid or liquid fuel burning equipment or device shall have the chimney, flue or stovepipe equipped with an approved spark arrester. An approved spark arrester is a device intended to prevent sparks from escaping

into the atmosphere, constructed of welded or woven wire mesh, 12 gauge thickness or larger, with openings no greater than ½ inch, or other alternative material the FAHJ determines provides equal or better protection.

SEC. 603.8.1. RESIDENTIAL INCINERATORS.

Section 603.8.1 of the 2010 California Fire Code is revised to read:

Sec. 603.8.1 Residential Incinerators. Residential incinerators are prohibited in the unincorporated area of the County of San Diego.

SEC. 605.11 SOLAR PHOTOVOLTAIC POWER SYSTEMS.

Section 605.11 is added to the 2010 California Fire Code to read:

Sec. 605.11 Solar photovoltaic power systems. Solar photovoltaic power systems shall be installed in accordance with this code, the San Diego County Building Code and the San Diego County Electrical Code.

Exception: Detached Group U non-habitable structures, such as parking shade structures, carports, solar trellises and similar type structures are not subject to the requirements of this section.

Sec. 605.11.1 Marking. Marking is required on all interior and exterior conduit, enclosures, raceways, cable assemblies, junction boxes, combiner boxes and disconnects.

Sec. 605.11.1.1 Materials. The materials used for marking shall be reflective, weather-resistant and suitable for the environment. Marking as required in sections 605.11.1.2 through 605.11.1.4 shall have all letters capitalized with a minimum height of 3/8 inch and shall be white on red background.

Sec. 605.11.1.2 Marking content. The marking shall contain the words "WARNING: PHOTOVOLTAIC POWER SOURCE".

Sec. 605.11.1.3 Main service disconnect. The marking shall be placed adjacent to the main service disconnect in a location clearly visible from the location where the disconnect is operated.

Sec. 605.11.1.4 Location of marking. Marking shall be placed on all interior and exterior DC conduit, raceways, enclosures and cable assemblies every 10 feet, within 1 foot of all turns or bends and within 1 foot above and below all penetrations of roof/ceiling assemblies and all walls and barriers.

Sec. 605.11.2 Locations of DC conductors. Conduit, wiring systems and raceways for photovoltaic circuits shall be located as close as possible to the ridge, hip or valley and from the hip or valley as directly as possible to an outside wall to reduce trip hazards and maximize ventilation opportunities. Conduit runs between sub arrays and to DC combiner boxes shall be installed in a manner that minimizes the total amount of conduit on the roof by taking the shortest path from the array to the DC combiner box. The DC combiner boxes shall be located such that conduit runs are minimized in the pathways between arrays. DC wiring shall be installed in metallic conduit or raceways when located within enclosed spaces within a building. Conduit shall run along the bottom of load bearing members.

Sec. 605.11.3 Access and pathways. Roof access, pathways and spacing requirements shall be provided in order to ensure access to the roof, provide pathways to specific areas of the roof, provide for smoke ventilation operations, and to provide emergency egress from the roof.

Exceptions:

1. Space requirements to ridge, hips and valleys do not apply to roof slopes of two units vertical in 12 units horizontal (2:12) or less.

2. Residential structures shall be designed so that each array is no greater than 150 feet by 150 feet in either axis.

3. The fire code official may allow modules to be located up to the ridge when an alternative ventilation method acceptable to the fire code official has been provided or where the fire code official has determined vertical ventilation techniques will not be employed.

Sec. 605.11.3.1 Roof access points. Roof access points shall be defined as an area that does not place ground ladders over openings, such as windows or doors, and shall be located at strong points of building construction in locations where the access point does not conflict with overhead obstructions, such as tree limbs, wires or signs.

Sec. 605.11.3.2 Residential systems for one- and two-family residential dwellings. Access shall be provided in accordance with sections 605.11.3.2.1 through 605.11.3.2.4.

Sec 605.11.3.2.1 Residential buildings with hip roof layouts. Modules shall be located in a manner that provides a 3 foot wide clear access pathway from the eave to the ridge on each roof slope where modules are located. The access pathway shall be located at a structurally strong location on the building capable of supporting the live load of fire fighters accessing the roof.

Sec. 605.11.3.2.2 Residential buildings with a single ridge. Modules shall be locates in a manner that provides two 3 foot wide access pathways from the eave to the ridge on each roof slope where the modules are located.

Sec. 605.11.3.2.3 Hips and valleys. Modules shall be located no closer than 18 inches to a hip or a valley if modules are to be placed on both sides of a hip or valley. If the modules are to be located on only one side of a hip or valley that is of equal length, then the modules may be placed directly adjacent to the hip or valley.

Sec. 605.11.3.2.4 Smoke ventilation. Modules shall be located no higher than 3 feet below the ridge in order to allow for fire department smoke ventilation operations.

Sec. 605.11.3.3 All other occupancies. Access shall be provided in accordance with sections 605.11.3.3.1 through 605.11.3.3.3.

> **Exception:** Where the fire code official determines that the roof configuration is similar to a one- and two-family dwelling, the fire code official may approve the residential access and ventilation requirements provided in sections 605.11.3.2.1 through 605.11.3.2.4.

Sec. 605.11.3.3.1 Access. There shall be a minimum 6 foot wide clear perimeter around the edges of the roof.

> **Exception:** If either axis of the building is 250 feet or less, there shall be a minimum 4 foot wide clear perimeter around the edges of the roof.

Sec. 605.11.3.3.2 Pathways. The solar photovoltaic installation shall be designed to provide designated pathways. The pathways shall meet the following requirements:

1. Pathways shall be over areas capable of supporting the live load of the fire fighters accessing the roof.
2. Center line axis pathways shall be provided in both axis of the roof. Center line axis pathways shall run where the roof structure is capable of supporting the live load of fire fighters accessing the roof.
3. Pathways shall be a straight line not less than 4 feet clear to skylight and/or ventilation hatches.
4. Pathways shall be a straight line not less than 4 feet clear to roof standpipes.
5. Pathways shall provide not less than 4 feet clear around the roof access hatch with at least one not less than 4 feet of clear pathway to a parapet or roof edge.

Sec. 605.11.3.3.3 Smoke ventilation. The solar photovoltaic installation shall be designed to meet the following requirements:

1. Arrays shall be no greater than 150 feet in length in either axis in order to create opportunities for smoke ventilation operations.
2. Smoke ventilation options between array sections shall be one of the following:
    a. A pathway 8 feet or greater in width
    b. A pathway 4 feet or greater in width and bordering roof skylights or smoke and heat vents
    c. A pathway 4 feet or greater in width and bordering 4 foot by 8 foot venting cutouts every 20 feet on alternating sides of the pathway.

The fire code official may require additional means of ventilating a building including the installation of a manually-operated ventilation system.

Sec. 605.11.4 Ground-mounted photovoltaic arrays. Ground-mounted photovoltaic array installations shall meet the requirements of sections 605.11.4.1 through 605.11.4.4.

Sec. 605.11.4.1 Fire apparatus access roads. Fire apparatus access roads to ground-mounted photovoltaic arrays, associated equipment structures and operations/maintenance buildings shall comply with section 503.

> **Exception:** Private residential and agricultural systems less than 10 acres in size and where the energy generated is primarily for on-site use are exempt from this requirement.

Sec. 605.11.4.1.1 Perimeter fire apparatus access roadway. Ground-mounted photovoltaic arrays 10 acres or larger in size shall provide a fire apparatus access roadway around the perimeter of the project. The perimeter fire apparatus access roadway shall comply with section 503.

Sec. 605.11.4.2 Fuel modification. Combustible vegetation within the array and to a distance of 30 feet from the array and associated equipment shall be reduced to a height of no more than 6 inches.

> **Exception:** For private residential and agricultural systems less than 10 acres in size and where the energy generated is used primarily on-site, the required fuel modification zone may be reduced to 10 feet.

Operation/maintenance buildings shall be provided with fuel modification zones that comply with section 4 4907.2.

Sec. 605.11.4.3 Water supply. Water supply for fire protection and suppression shall be provided for equipment structures and operations/maintenance buildings as required by section 507.

Exception: Equipment shelters used solely for the equipment associated with the array when the exterior walls and roof assemblies are constructed with non-combustible materials.

Sec. 605.11.4.4 Identification. Ground-mounted photovoltaic arrays with multiple equipment structures shall include a means of readily identifying each equipment structure. The fire code official may require a lighted directory map of the project to be installed on-site near the entrance to the facility for projects of 10 or more acres in size.

SEC. 901.4.5. FIRE DEPARTMENT CONNECTIONS.

Section 901.4.5 is added to the 2010 California Fire Code to read:

Sec. 901.4.5 Fire department connections. Fire hose threads used in connection with fire-extinguishing systems shall be National Standard Thread or as approved by the FAHJ. The location of fire department hose connections and control valves shall be approved by the fire code official.

SEC. 901.8.2. FIRE HYDRANTS AND FIRE APPLIANCES.

Section 901.8.2 is added to the 2010 California Fire Code to read:

Sec. 901.8.2 Fire hydrants and fire appliances. Commercial fire sprinkler system control valves shall not be shut off after activation of the sprinkler system, no matter what the reason for the activation until the shut off is authorized by fire personnel. Fire detection systems activated by fire, smoke, heat or any other cause shall not be reset until authorized by fire personnel.

SEC. 903.2 AUTOMATIC SPRINKLER SYSTEMS-WHERE REQUIRED.

Section 903.2 in its entirety of the 2010 California Fire Code is revised to read:

903.2 Where required. Approved automatic fire sprinkler systems shall be installed in all new structures. For the purpose of fire sprinkler systems, buildings separated by less than 10 feet from adjacent buildings shall be considered one building. Fire barriers and partitions, regardless of rating, shall not be considered as creating separate buildings for purposes of determining fire sprinkler requirements. Mezzanines shall be included in the total square footage calculation.

Exceptions:

1. Group U occupancies not greater than 500 square feet, when the building is more than 20 feet from an adjacent structure or property line.

2. Accessory buildings/barns not greater than 1000 square feet, and not otherwise considered enclosed buildings/structures, which are of ignition-resistant construction or as determined by the fire code official to not present a significant fire hazard.

3. Agricultural buildings constructed of wood or metal frames over which fabric or similar material is stretched, which are specifically used as green houses are exempt from the automatic sprinkler requirements unless physically connected to other structures.

903.2.1 Additions. An automatic fire sprinkler system may be required to be installed throughout structures when the addition is more than 50% of the existing building or when the altered building will exceed a fire flow as calculated pursuant to section 507.3. The fire code official may require an automatic sprinkler system to be installed in buildings where no water main exists to provide the required fire flow or where a special hazard exists, such as poor access roads, steep grades and canyon rims, hazardous brush and response times greater than 5 minutes by a fire department. The fire code official may require that other protective measures be taken based on existing conditions and/or potential hazards.

903.2.2 Remodels or reconstructions. The fire code official may require an automatic sprinkler system to be installed throughout structures if a remodel or reconstruction includes significant modification to the interior or roof of the building and the cost of the installation of an automatic sprinkler system does not exceed 15 percent of the construction costs of the remodel or require vacancy of the building. The fire code official may require that other protective measures be taken based on existing conditions and/or potential hazards.

SEC. 903.4. SPRINKLER SYSTEM MONITORING AND ALARMS.

Section 903.4 of the 2010 California Fire Code is revised to read:

Sec. 903.4 Sprinkler system supervision and alarms. All valves controlling the water supply for automatic sprinkler systems, pumps, tanks, water levels and temperatures, critical air pressures and water-flow switches on all sprinkler systems shall be electronically supervised by a listed fire alarm control unit.

Exceptions:
1. Automatic sprinkler systems with less than 100 fire sprinklers protecting one-family and two-family dwellings.

2. Limited area systems serving fewer than 20 sprinklers.

3. Automatic sprinkler systems installed in accordance with NFPA 13R where a common supply main is used to supply both domestic water and the automatic sprinkler system and a separate shutoff valve for the automatic sprinkler system is not provided.

4. Jockey pump control valves that are sealed or locked in the open position.

5. Control valves to commercial kitchen hoods, paint spray booths or dip tanks that are sealed or locked in the open position.

6. Valves controlling the fuel supply to fire pump engines that are sealed or locked in the open position.

7. Trim valves to pressure switches in dry, preaction and deluge sprinkler systems that are sealed or locked in the open position.

SEC. 907.2.11.4. FIRE ALARM AND DETECTION SYSTEMS-POWER SOURCE.

Section 907.2.11.4 of the 2010 California Fire Code is revised to read:

Sec. 907.2.11.4 Power source. In new construction and in newly classified Group R-3.1 occupancies, required smoke alarms shall receive their primary power from the building wiring when the wiring is served from a commercial source and shall be equipped with a battery backup. Smoke alarms shall emit a signal when the batteries are low. Wiring shall be permanent and without a disconnecting switch other than those required for overcurrent protection. Smoke alarms may be solely battery operated when installed in existing buildings, in buildings without commercial power or in buildings, which undergo alterations, repairs or additions regulated by section 907.2.11.5.

SEC. 907.2.11.5. ADDITIONS, ALTERATIONS OR REPAIRS TO GROUP R OCCUPANCIES.

Section 907.2.11.5 is added to the 2010 California Fire Code to read:

Sec. 907.2.11.5 Additions, alterations or repairs to Group R occupancies. When the valuation of an addition, alteration or repair to a Group R occupancy exceeds $1,000 and a permit is required or when one or more sleeping rooms are added or created in existing Group R occupancies, smoke alarms shall be installed in accordance with section 907.2.11.

SEC. 1418. FUEL MODIFICATION ZONE REQUIREMENTS

Section 1418 is added to the 2010 California Fire Code to read:

1418
FUEL MODIFICATION ZONE REQUIREMENTS

Sec.1418.1 Fuel modification zone during construction. Any person doing construction of any kind which requires a permit under this code or the San Diego County Building Code shall create a fuel modification zone prior to allowing any combustible material to arrive on the site and shall maintain the zone during the duration of the project.

SEC. 1908. STORAGE AND PROCESSING OF WOOD CHIPS, HOGGED MATERIAL, FINES, COMPOST AND RAW PRODUCT ASSOCIATED WITH YARD WASTE AND RECYCLING FACILITIES.

Section 1908 of the 2010 California Fire Code is revised to read:

SECTION 1908
STORAGE AND PROCESSING OF WOOD CHIPS, HOGGED MATERIALS, FINES, COMPOST AND RAW PRODUCT ASSOCIATED WITH YARD WASTE AND RECYCLING FACILITIES

Sec. 1908.1 General. The storage and processing (mulching, composting) of wood chips, hogged materials, fines, compost and raw product produced from yard waste, debris and recycling facilities shall be in accordance with section 1908.

Sec. 1908.2 Definitions. The following definitions shall apply to section 1908:

AERATED STATIC PILE. A composting process that uses an air distribution system to blow or draw air through the pile. Little or no pile agitation or turning is performed.

CHIPPING AND GRINDING. An activity that mechanically reduces the size of organic matter.

COMPOSTING OPERATION. An operation that is conducted for the purpose of producing compost. The operation shall be by one or more of the following processes used to produce a compost product: static pile, windrow pile or aerated static pile.

GREENWASTE. Organic material that includes, but is not limited to, yard trimmings, plant waste, manure, untreated wood wastes, paper products and natural fiber products.

HOGGED MATERIALS. Mill waste consisting mainly of hogged bark but may include a mixture of bark, chips, dust or other by-product from trees and vegetation.

MULCHING. The process by which mixed greenwaste is mechanically reduced in size for the purpose of making compost.

STATIC PILE. A composting process that is similar to the aerated static pile except that the air source may or may not be controlled.

WINDROW COMPOSTING PROCESS. The process in which compostable material is placed in elongated piles. The piles or windrows are aerated and/or mechanically turned on a periodic basis.

WOOD CHIPS. Chips of various species of wood produced or used in chipping and grinding operations.

Sec. 1908.3 Permit required. A permit shall be obtained from the fire code official prior to engaging in the operation and storing processed of wood chips, hogged material, fines, compost and raw product in association with yard waste and similar material recycling facilities. The permit shall be renewed on an annual basis or shall be limited to such period of time as designated by the fire code official. Permits shall not be transferable and any change in use, location, occupancy, operation or ownership shall require a new permit.

Sec. 1908.4 Financial assurance for cost recovery. A security bond, irrevocable letter of credit or other approved form of financial assurance shall be required to be posted, in an amount determined by the fire code official. The financial assurance shall be a minimum of $25,000.00 and a maximum of $100,000.00, depending on the size of operation. The financial assurance shall reimburse the fire department for expenses incurred in any emergency response and/or enforcement action by the fire department to protect the public from fire or hazardous substances related to the operation. The financial assurance shall be returned to the operator in a timely fashion once the operation is closed, to the satisfaction of the fire code official.

Sec. 1908.5 Operational and emergency action plans. The following operational and emergency action plans shall be submitted to and be approved by the fire code official prior to initiating an operation under section 1908:

1. Operational Plan. The operational plan shall include: Site layout, pile dimensions, fire access, water supply, site security, site operations, temperature monitoring, rotation and diversion plan.

2. Emergency Plan. The emergency plan shall include: Operator fire response actions, fire dispersal area, emergency equipment operator callback and initiation of incoming diversion plan. All plans shall define the equipment necessary to process and handle the materials.

Sec. 1908.6 Notification of fire department. The operator shall report all fires to the fire department immediately upon discovery.

Sec. 1908.7 Equipment operator emergency callback. The operator shall implement and maintain a plan for rapid equipment operator response to the site. The maximum response time to the site shall be within one hour of a fire department notification. The following equipment shall be on site and staffed with skilled operators: bulldozer, loaders and heavy duty equipment necessary to mitigate a fire. Notification procedure shall be maintained operational 24 hours a day, seven days a week. Notification may be by pager activation, telephone answering service, or other approved means.

Sec. 1908.8 Incoming waste diversion plan. The operator shall develop a diversion plan for incoming greenwaste for implementation in the event of equipment failure or other inability to process and distribute greenwaste. The plan shall prevent stockpiling of waste on the site and unauthorized depositing of waste on or near the site. The operator shall initiate the diversion plan based on criteria in the Operational and Emergency Plan without further direction from the fire department.

Sec. 1908.9 Unprocessable or non-greenwaste material. All greenwaste that cannot be processed on-site, such as stumps and fibrous plants, shall be immediately removed from the feedstock, stored in roll-off containers or bins and be removed from the facility on a weekly basis. All plastic bags shall be removed prior to shredding material.

Sec. 1908.10 Fire access roadway. A fire access roadway shall be provided to the site and on the site. Each roadway shall be at least 20 feet wide, but the fire official may require a greater width, depending on site conditions. The operator shall also be required to obtain the fire code official's approval for the type of driving surface for the onsite access roadway.

Sec. 1908.11 Storage sites. Storage sites shall be level and on solid ground or other approved all-weather surface.

Sec. 1908.12 Combustible vegetation control. The operator shall clear any combustible material, weeds, brush, trees or other vegetation (including mulch) that is or may become, dry and capable of transmitting fire, from within 50 feet of raw greenwaste and mulch piles. Clearance shall be to bare earth or approved pavement. Individual growing trees within 50 feet may remain, subject to the fire code official's approval.

Sec. 1908.13 Pile separation. Piles shall be separated from adjacent piles and property lines by fire department access roadways.

Sec. 1908.14 Size of piles. Pile height, width and length shall be limited to criteria approved by the fire code official, based in part on the site material handling equipment. In no case shall a pile exceed 12 feet in height, 100 feet in width and 200 feet in length.

Sec. 1908.15 Static pile protection. Interior pile temperatures shall be monitored and recorded on a regular basis per the Operational Plan. Internal pile temperatures shall be taken at ⅔ the pile height, 12 to 24 inches from the surface with a probe-type thermometer. Readings shall be made at not greater than 50-foot intervals along the length of the pile. Temperatures above 158° F are known to adversely affect microbial decomposition and are considered excessive. Infrared thermometers may be used to monitor for hot spots at the surface, but are not a substitute for internal probe measurement and documentation. Once windrows exceed 170° F, the windrows shall be reduced in size, be rotated and be monitored daily until temperatures drop below 158° F. All greenwaste stockpiles shall be re-mixed as necessary to alleviate any fire due to spontaneous combustion or temperatures above 170° F. Windrows shall be visually inspected on a regular basis. Once fires have been detected in any windrows at a site, this visual inspection shall be a minimum daily requirement. Daily inspections shall continue until the threat of fire no longer exists and the fire code official agrees inspections may be discontinued. All temperature and pile-handling records shall be kept on file at the site and be made available for inspection by fire department personnel. Data shall include date, time, temperature, specific location and person conducting measurement.

Sec. 1908.16 Firefighting water supplies and storage. Firefighting water supplies shall conform to sections 1908.16.1 or 1908.16.2.

Sec. 1908.16.1 Public water supply. The operator shall provide and maintain approved fire hydrants and waterline mains as required by the fire code official. Water lines may be approved aboveground lines supplied from a reliable water supply with adequate protection against impact and fire flow reaction. Hydrant spacing shall be at 400-foot intervals along primary fire access roadways. Fire flow at each hydrant shall be least 1000 gallons per minute at 20 psi. Duration of the required fire flow shall be as determined by the fire code official.

Sec. 1908.16.2 Private water supply. Above-ground water storage tanks may be installed when authorized by the fire code official where public water supply is not adequate to meet fire flow requirements. Volume and duration of the required fire flow shall be as determined by the fire code official.

Sec. 1908.17 Material-handling equipment. Equipment used on all piles should be of a type that minimizes compaction. All vehicles operating on or around the piles shall have a Class A fire extinguisher of a minimum 2-A rating, in addition to the Class B rating appropriate for the vehicles. Approved material-handling equipment shall be available during fire fighting operations for moving wood chips, hogged material, compost and raw product produced from yard waste and wood fines.

Sec. 1908.18 General safety rules for site equipment maintenance. Welding or cutting torch operations shall be conducted a minimum of 30 feet from combustible materials. A fire watch shall be provided to detect fire, and to operate fire-extinguishing equipment throughout the welding or cutting operation and 30 minutes thereafter. Refueling and on-site maintenance shall comply California Fire Code requirements in Chapters 22 & 34 and all other applicable fire code requirements.

Sec. 1908.19 Site security. Pile storage areas shall be surrounded with approved fencing. Fences shall be a minimum of 6 feet in height.

Sec. 1908.20 Smoking and open burning prohibited. There shall be no smoking and open flame devices on the operational site, including smoking within vehicles. Approved signs shall be clearly and prominently posted, and shall be enforced by the site operators. No open burning shall be allowed on site.

SEC. 2201.1. MOTOR FUEL-DISPENSING FACILITIES AND REPAIR GARAGES-SCOPE

Section 2201.1 of the 2010 California Fire Code is revised to read:

Sec. 2201.1 Scope. Automotive motor-fuel dispensing facilities, marine motor fuel-dispensing facilities, fleet vehicle motor fuel-dispensing facilities and repair garages shall be in accordance with this chapter and the California Building Code, California Plumbing Code and the California Mechanical Code. These operations shall include both operations that are accessible to the public and private operations. Whenever this chapter imposes a requirement that applies to Class IIIA liquids that same requirement shall also apply to Class III liquids.

SEC. 2306.2. GENERAL FIRE PROTECTION AND LIFE SAFETY FEATURES.

Exception J of Table 2306.2 of the 2010 California Fire Code is deleted.

SEC. 3301.2. EXPLOSIVES AND FIREWORKS-APPLICABILITY.

Section 3301.2 is added to the 2010 California Fire Code to read:

Sec. 3301.2 Applicability. This section shall apply to the manufacture, possession, storage, sale, transportation and use of explosives and blasting agents and to any blasting operation in the unincorporated area of the County of San Diego. The Sheriff shall be the Issuing Officer for any permit under this section, but may delegate the responsibility to any fire chief in the unincorporated area to issue a permit in the geographical area of the chief's jurisdiction. The issuing officer shall determine whether a blast is a major blast or a minor blast under this section. A minor blast is subject to all conditions of this section except the inspection requirements.

Sec. 3301.2.1 Definitions. The following definitions shall apply to this section:

BLASTER. A person who has been approved by the Sheriff to conduct blasting operations and who has been placed on the list of approved blasters. The listing shall be valid for one year unless revoked by the Sheriff.

BLASTING AGENT. A material or mixture consisting of a fuel and oxidizer intended for blasting. The finished product as mixed and packaged for use or shipment shall not be detonated by means of a No. 8 test blasting cap when unconfined.

BLASTING OPERATION. The uses of an explosive device or explosive material to destroy, modify, obliterate or remove any obstruction of any kind.

BLASTING PERMIT. A permit issued by the Issuing Officer pursuant to section 105.6.14. The permit shall apply to a specific site and shall be valid for a period not to exceed one year.

BLAST SITE. The geographically defined area, as shown on a project map or plot plan, where a blaster is authorized by a blasting permit issued under this section to conduct a blasting operation.

EXPLOSIVES PERMIT. A permit to possess or use explosives, issued by the Issuing Officer, pursuant to California Health and Safety Code sections 12000 et seq. and Chapter 33 of this code. An explosives permit shall be valid for a period not to exceed one year, as provided in the permit conditions. An explosives permit does not authorize a person to conduct blasting unless the person also obtains a blasting permit under this section.

INSPECTOR. A person on the Sheriff's approved list of inspectors authorized to conduct inspections, before and after a blast. To be on the Sheriff's approved list, an inspector shall have a blasting license issued by the Division of Occupational Safety and Health of the California Department of Industrial Relations ("Cal/OSHA").

MAJOR BLASTING. A blasting operation that does not meet the criteria for minor blasting.

MINOR BLASTING. A blasting operation that meets all of the following criteria: quantity of rock to be blasted does not exceed 100 cubic yards per shot, bore hole diameter does not exceed 2 inches, hole depth does not exceed 12 feet, maximum charge weight does not exceed 8 pounds of explosives per delay and the initiation of each charge will be separated by at least 8 milliseconds. The maximum charge weight shall not exceed the Scaled Distance as shown below:

Distance from Blast Site (In Feet)	Scale-Distance Factor
0 - 300	Mandatory Seismic Monitoring
301 - 5,000	55
5,000+	65

Sec. 3301.2.2. Application. Application for a permit required by this section shall be in the form required by the Issuing Officer.

Sec. 3301.2.3 Permit requirements. No person shall conduct blasting in the unincorporated area of the County of San Diego without a blasting permit issued under this chapter. A person applying for a blasting permit shall, in addition to demonstrating compliance with fire safety requirements, shall also comply with all County of San Diego requirements for any building permits, grading permits, use permits, encroachment permits and all other entitlements to use property, including zoning requirements and any determination under the Zoning Ordinance of nonconforming status. The applicant shall be responsible for providing proof of all necessary approvals when requested by the Issuing Officer.

Sec. 3301.2.4 Permit conditions. The Issuing officer may impose conditions and procedures as are deemed reasonably necessary to protect the public health and safety based upon the facts and circumstances of a particular blasting operation. The permit conditions shall be in writing. Failure to comply with any permit condition is grounds for revocation of the permit. A blaster may request the Issuing Officer release the blaster from any permit condition if circumstances have changed that make the condition no longer applicable. In addition to complying with the County of San Diego blasting regulations, a blaster shall also comply with blasting regulations of neighboring jurisdictions, for any blasting operations outside of the unincorporated area of the County of San Diego conducted in conjunction with a project within the unincorporated areas of the County of San Diego.

Sec. 3301.2.5 Insurance and indemnification required. As an additional condition for obtain a blasting permit the applicant shall submit: (1) a certificate of insurance evidencing that the blaster has obtained a general liability insurance policy which includes coverage for explosion, collapse and underground property damage from an insurer satisfactory to the Issuing Officer, that is in effect for the period covered by the permit, written on an "occurrence" basis, in an amount of not less than $500,000 per each occurrence, naming the County of San Diego and the Lakeside Fire Protection District as an additional insured and providing that the policy will not be canceled or terminated without 30 days prior written notice to the County of San Diego and the Lakeside Fire Protection District and (2) an agreement signed by the blaster agreeing to defend, indemnify and hold the County of San Diego and the Lakeside Fire Protection District and their respective agents, officers and employees harmless from any claims or actions arising from the issuance of the permit or any blasting activity conducted under the permit.

Sec. 3301.2.6 Blasting hours. Blasting shall only be allowed, Monday through Saturday, between the hours of 7:00 a.m. and 6:00 p.m. or ½ hour before sunset, whichever occurs first, unless special circumstances warrant another time or day and the Issuing Officer grants approval of the change in time or day.

Sec. 3301.2.7 Additional operational requirements. The owner of any property in the unincorporated area of the County of San Diego on which any blasting is intended to occur, shall give, or cause to be given, a one-time notice in writing, for any proposed blasting to the local fire agency and to all residences, including mobilehomes, and businesses within 600 feet of any potential major blast location or 300 feet from any potential minor blast location. The notice shall be given not less than 24 hours, but not more than one week, before a blasting operation and shall be in a form approved by the Issuing Officer. The minimum 24-hour notice requirement may be reduced to a lesser period but not less than one hour if the Issuing Officer determines that special circumstances warrant the reduction in time. Adequate precautions shall be taken to reasonably safeguard persons and property before, during and after blasting operations. These precautions shall include:

1. The blaster shall retain an inspector to inspect all structures, including mobilehomes, within 300 feet of the blast site before blasting operations, unless inspection is waived by the owner and/or occupant. The inspector shall obtain permission of the owner and/or occupant before conducting the inspection. The inspection shall be only for the purpose of determining the existence of any visible or reasonably recognizable preexisting defects or damages in any structure. Waiver of inspection shall be in writing signed by the owner and/or occupant. Refusal to allow inspection shall also constitute a waiver. The inspector shall notify the owner and/or occupant of the consequences of refusing an inspection shall include a refusal in the summary report filed with the Issuing Officer. The

blaster shall request an inspector conduct post-blast inspections upon receipt of a written complaint of property damage if the complaint is made within 60 days of completion of blasting operations. If the blaster has knowledge of alleged property damage independent of the written complaint, the blaster shall also retain an inspector to conduct a post-blast inspection.

2. An inspector shall complete and sign pre-blast inspection reports identifying all findings and inspection waivers. The blaster shall retain the inspection reports for three years from the date of the blasting and upon a complaint of alleged damage the blaster shall immediately file a copy of the report with the Issuing Officer and provide a copy to the complainant. If there is a change in the blasting contractor after blasting has commenced on a project, a re-inspection shall be conducted in accordance with the preceding paragraph before the new blasting contractor undertakes any additional blasting.

3. The blaster shall retain an inspector to conduct a post-blast inspection of any structure for which a written complaint alleging blast damage has been received. A written report of the inspection shall be immediately filed with the Issuing Officer and provided to any person who made a complaint for damages.

4. The blaster shall allow any representative of the Issuing Officer to inspect the blast site and blast materials or explosives at any reasonable time.

5. If the blaster wants a representative of the Issuing Officer to witness a blasting operation, the blaster shall make a request with the Issuing Officer at least 12 hours before the blast. The blaster shall confirm the request for a witness with the Issuing Officer at least one hour before the blast. The blaster shall be responsible for any cost incurred by the Issuing Officer in having a representative witness the blast.

6. The blaster shall notify the Issuing Officer on the day of a scheduled blasting operation not less than one hour before blasting.

7. All major blasting operations shall be monitored by an approved seismograph located at the nearest structure within 600 feet of the blasting operation. All daily seismograph reports shall be maintained by the blaster for three years from the blasting.

Sec. 3301.2.8 Seizure of illegal items. The Sheriff may seize at the owner's expense, all explosives, ammunition or blasting agents, which are illegally manufactured, sold, offered or exposed for sale, delivered, stored, possessed or transported in violation of this chapter.

Sec. 3301.2.9 Violations for false or misleading information. It shall be unlawful and a violation of this chapter for any person to provide false or misleading information or documentation to the County San Diego or any of its officers or employees or to any fire department, fire protection district, fire company or legally formed volunteer fire department, or its officers or employees in the unincorporated area of the County of San Diego, having jurisdiction over any aspect of the explosives or blasting permit process or blasting operations.

Sec. 3301.2.10 Fees. A person applying to the Sheriff to be approved as a blaster or inspector, as defined in this section, shall pay an application fee to the Sheriff. A person applying for a blasting permit under this section shall pay the fee established by the Sheriff with the application. The amount of any fee required by this chapter shall be determined by the Sheriff on the basis of the full costs involved in processing an application.

SEC. 3308.1. FIREWORKS DISPLAY.

Section 3308.1 of the 2010 California Fire Code is revised to read:

Sec. 3308.1 General. Outdoor fireworks displays, use of pyrotechnics before a proximate audience and pyrotechnic special effects in motion picture, television, theatrical and group entertainment productions shall comply with California Code of Regulations, Title 19, Chapter 6 and San Diego County Code sections 32.101 et seq. The Sheriff shall be the Issuing Officer for a permit for a fireworks display.

Sec. 3308.1.1 Scope. The possession, manufacture, sale, storage, use and display of fireworks are prohibited in the unincorporated area of the County except as provided in the San Diego County Code sections 32.101 et seq.

SEC. 3405.2.4. TRANSFERING CLASS I, II OR III LIQUIDS.

Section 3405.2.4 of the 2010 California Fire Code is revised to read:

Sec. 3405.2.4 Transferring Class I, II or III liquids. Class I or II liquids or Class III liquids that are heated up to or above their flash points shall be transferred by one of the following methods:

1. From safety cans complying with UL 30.

2. Through an approved closed piping system.

3. From containers or tanks by an approved pump taking suction through an

opening in the top of the container or tank.

4. Approved engineered liquid transfer system.

Exception: Liquids in containers not exceeding a 5.3-gallon (20 L) capacity.

SEC. 3406.2.5.2.. TANKS FOR GRAVITY DISCHARGE.

Section 3406.2.5.2.1 of the 2010 California Fire Code is added to read:

Sec. 3406.2.5.2.1 Limitations on tanks for gravity discharge. Gravity dispensing of Class I or II liquids or Class III liquids that are heated up to or above their flash points is prohibited. Dispensing devices for flammable and combustible liquids shall be of an approved type. Approved pumps taking suction from the top of the tank shall be used. Flammable or combustible liquids shall not be dispensed by a device that operates through pressure within a storage tank. Air or oxygen shall not be used to pressurize an aboveground tank.

SEC. 3406.2.8.2 PROHIBITION ON USE OF TANK VEHICLE.

Section 3406.2.8.2 is added to the 2010 California Fire Code to read:

Sec. 3406.2.8.2. Tank vehicle as a substitute for permanent tank prohibited. The use of a tank vehicle in a stationary manner as a substitute for an approved above-ground or below-ground fuel tank is prohibited.

SEC. 3807.5. SAFETY PRECAUTIONS AND DEVICES-SECURING LPG TANKS.

Section 3807.5 is added to the 2010 California Fire Code to read:

Sec. 3807.5 Securing LPG tanks. When required by the FAHJ, LPG tanks shall be secured to prevent the tank from rolling or moving.

SEC. 4902. DEFINITIONS.

Section 4902 of the 2010 California Fire Code is revised to read:

SECTION 4902
DEFINTIONS

Sec. 4902.1 General. For the purposes of this chapter, certain terms are defined as follows:

BUILDING OFFICIAL means the Director of the Department of Planning and Land Use of the County of San Diego or any person appointed or hired by the Director to administer or enforce the County's planning and construction standards. The building official duties shall include plan checking, inspections and code enforcement.

CDF DIRECTOR means the Director of the California Department of Forestry and Fire Protection.

COMBUSTIBLE VEGETATION means material that in its natural state will readily ignite, burn and transmit fire from native or landscape plants to any structure or other vegetation. Combustible vegetation includes dry grass, brush, weeds, litter or other flammable vegetation that creates a fire hazard.

DEFENSIBLE SPACE is an area either natural or man-made, where material capable of allowing a fire to spread unchecked has been treated, cleared or modified to slow the rate and intensity of an advancing wildfire and to create an area for fire suppression operations to occur.

FIRE PROTECTION PLAN (FPP) is a document prepared for a specific project or development proposed in the wildland-urban interface fire area that describes ways to minimize and mitigate potential loss from wildfire exposure, with the purpose of reducing impact on the community's fire protection delivery system.

FIRE HAZARD SEVERITY ZONES are geographical areas designated pursuant to California Public Resources Code sections 4201 through 4204 and classified as Very High, High and Moderate in State Responsibility Areas or as Local Agency Very High Fire Hazard Severity Zones designated pursuant to California Government Code sections 51175 through 51189.

The California Code of Regulations, Title 14, Section 1280 entitles maps of these geographical areas as "Maps of the Fire Hazard Severity Zones in the State Responsibility Area of California."

FUEL BREAK is an area, strategically located for fighting anticipated fires, where the native vegetation has been permanently modified or replaced so that fires burning into it can be more easily controlled. Fuel breaks divide fire-prone areas into smaller areas for easier fire control and to provide access for fire fighting.

LOCAL AGENCY VERY HIGH FIRE HAZARD SEVERITY ZONE means an area designated by a local agency upon the recommendation of the CDF Director pursuant to Government Code sections 51177(c), 51178 and 51189 that is not a State Responsibility

Area and where a local agency, city, county, city and county, or district is responsible for fire protection.

OPEN SPACE EASEMENT means any right or interest in perpetuity or for a term for years in open-space land, as that term is defined in Government Code section 51051, acquired by the County of San Diego, a city or a nonprofit organization where the instrument granting the right or interest imposes restriction on use of the land, to preserve the land for public use or enjoyment of the natural or scenic character of the land.

OPEN SPACE PRESERVE means open-space land, as that term is defined in Government Code section 65560(b), for the preservation of natural resources, managed production of resources, outdoor recreation, public health and safety, buffer for a military installation or the protection of cultural resources.

SLOPE is the variation of terrain from the horizontal; the number of feet, rise or fall per 100 feet, measured horizontally, expressed as a percentage.

STATE RESPONSIBILITY AREA means lands that are classified by the Board of Forestry pursuant to Public Resources Code section 4125 where the financial responsibility of preventing and suppressing forest fires is primarily the responsibility of the State.

TREE CROWN means the primary and secondary branches growing out from the main stem, together with twigs and foliage.

WILDFIRE is any uncontrolled fire spreading through vegetative fuels that threaten to destroy life, property, or resources as defined in Public Resources Code sections 4103 and 4104.

WILDFIRE EXPOSURE is one or a combination of radiant heat, convective heat, direct flame contact and burning embers being projected by vegetation fire to a structure and its immediate environment.

WILDLAND-URBAN INTERFACE FIRE AREA is a geographical area identified by the state as a "Fire Hazard Severity Zone" in accordance with the Public Resources Code sections 4201 through 4204 and Government Code sections 51175 through 51189, or other areas designated by the enforcing agency to be at a significant risk from wildfires.

SEC. 4903. FIRE PROTECTION PLAN.

Section 4903 of the 2010 California Fire Code is revised to read:

SECTION 4903
FIRE PROTECTION PLAN

Sec. 4903.1 When required. The Department of Planning and Land Use of County of San Diego or the FAHJ may require an applicant for a parcel map, subdivision map, specific plan or major use permit for any property located in a wildland-urban interface fire area to submit a Fire Protection Plan (FPP) as part of the approval process.

Sec. 4903.2 Content. The FPP shall consider location, topography, geology, aspect, combustible vegetation (fuel types), climatic conditions and fire history. The plan shall address the following in terms of compliance with applicable codes and regulations including but not limited to: water supply, vehicular and emergency apparatus access, travel time to nearest serving fire station, structural ignitability, structure set back, ignition-resistive building features, fire protection systems and equipment, impacts to existing emergency services, defensible space and vegetation management.

The FPP shall be prepared as prescribed in the County of San Diego Land Use and Environment Group "Guidelines for Determining Significance and Report Format and Content Requirements for Wildland Fire and Fire Protection" document.

SEC. 4907. DEFENSIBLE SPACE.

Section 4907 of the 2010 California Fire Code is revised to read:

SECTION 4907
DEFENSIBLE SPACE

Sec. 4907.1 Structure setbacks from property lines. The building official shall establish the minimum setbacks for locating a structure on a lot in a wildland-urban interface fire area. The setbacks may be greater than the minimum setbacks provided in the San Diego County Zoning Ordinance, when necessary to protect a structure from an unreasonable hazard from a wildfire.

Sec. 4907.1.1 General fire setbacks. Buildings and structures shall be setback a minimum of 30 feet from property lines and open space easements unless the San Diego County Zoning Ordinance requires a greater minimum. When the property line abuts a roadway the setback shall be measured from the centerline of the roadway.

> **Exception:** When both the building official and the FAHJ determine that the hazard from a wildland fire is not significant or when the terrain, parcel size or other constraints on the parcel make the required setback infeasible, the building official may allow the setback to be less than 30 feet from the property line when allowed by the San Diego County Zoning Ordinance.

Sec. 4907.1.2 Fire setbacks adjacent protected areas. Buildings and structures shall be setback a minimum of 100 feet from any property line adjacent a national forest, state park or open space preserve. This setback may be reduced when additional mitigation measures are employed that are satisfactory to both the FAHJ and the building official.

Sec. 4907.2 Fuel modification. A fuel modification zone shall be required around every building that is designed primarily for human habitation or use or a building designed specifically to house farm animals. Decks, sheds, gazebos, freestanding open-sided shade covers and similar accessory structures less than 250 square feet and 30 feet or more from a dwelling, and fences more than 5 feet from a dwelling, are not considered structures for the establishment of a fuel modification zone. A fuel modification zone shall comply with the following:

(a) When a building or structure in a hazardous fire area is located 100 feet or more from the property line, the person owning or occupying the building or structure shall maintain a fuel modification zone within 100 feet of the building or structure. The area within 50 feet of a building or structure shall be cleared of vegetation that is not fire resistant and re-planted with fire-resistant plants. In the area between 50 to 100 feet from a building, all dead and dying vegetation shall be removed. Native vegetation may remain in this area provided that the vegetation is modified so that combustible vegetation does not occupy more than 50% of the square footage of this area. Weeds and annual grasses shall be maintained at a height not to exceed 6 inches. The chips from chipping of vegetation that is done on-site may remain if the chips are dispersed so they do not exceed 6 inches in depth. Trees may remain in both areas provided that the horizontal distance between crowns of adjacent trees and crowns of trees and structures is not less than 10 feet. See Figure 4907.2.

(b) When a building or structure in a hazardous fire area is setback less than 100 feet from the property line, the person owning or occupying the building or structure shall meet the requirements in subsection (a) in the area between the building or structure and the property line as approved by the fire code official.

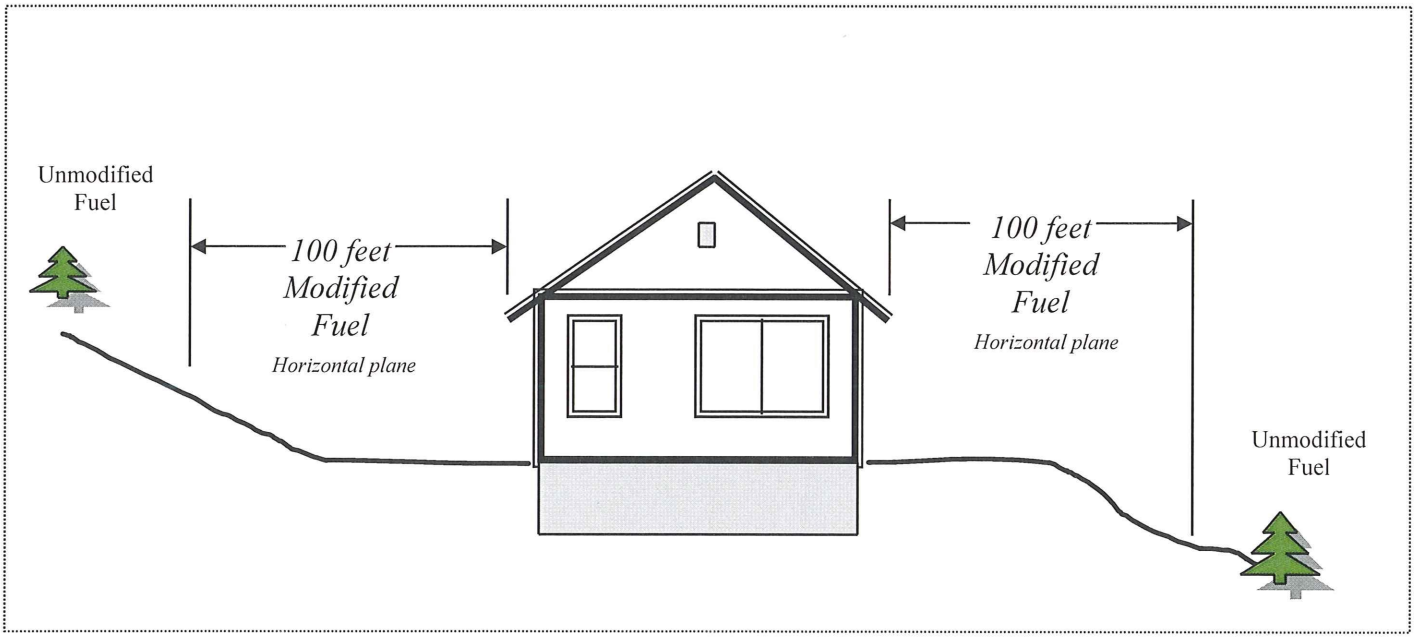
(c) The building official and the FAHJ may provide lists of prohibited and recommended plants.

(d) The fuel modification zone shall be located entirely on the subject property unless approved by the FAHJ. This required fuel modification zone may be reduced as allowed in subsection (b) above or increased as required by a fire protection plan.

(e) When the subject property contains an area designated to protect biological or other sensitive habitat or resource, no building or other structure requiring a fuel

modification zone shall be located so as to extend the fuel modification zone into a protected area.

FIGURE 4907.2 MEASUREMENTS OF FUEL MODIFICATION DISTANCE



Sec. 4907.2.1 Fuel modification of combustible vegetation from sides of roadways. The FAHJ may require a property owner to modify combustible vegetation in the area within 20 feet from each side of the driveway or a public or private road adjacent to the property to establish a fuel modification zone. The FAHJ has the right to enter private property to insure the fuel modification zone requirements are met.

Exception: The FAJH may reduce the width of the fuel modification zone if it will not impair access.

Sec. 4907.2.2 Community fuel modification. The FAHJ may require a developer, as a condition of issuing a certificate of occupancy, to establish one or more fuel modification zones to protect a new community by reducing the fuel loads adjacent to a community and structures within it. The developer shall assign the land on which any fuel modification zone is established under this section to the association or other common owner group that succeeds the developer as the person responsible for common areas within the community.

Sec. 4907.2.2.1 Land ownership. Once a fuel modification zone has been established under section 4907.2.2 the land on which the zone is located shall be under the control of an association or other common ownership established in perpetuity, for the benefit of the community to be protected.

Sec. 4907.3 Maintenance of defensible space. Any person owning, leasing, controlling, operating or maintaining a building or structure required to establish a fuel modification zone pursuant to section 4907.2 shall maintain the defensible space. The FAHJ may enter the property to determine if the person responsible is complying with this section. The FAHJ may issue an order to the person responsible for maintaining the defensible space directing the person to modify or remove non-fire resistant vegetation from defensible space areas, remove leaves, needles and other dead vegetative material from the roof of a building or structure, maintain trees as required by section 4907.3.1 or to take other action the FAHJ determines is necessary to comply with the intent of sections 4903 et seq.

Sec. 4907.3.1 Trees. Crowns of mature trees located within defensible space shall maintain a minimum horizontal clearance of 10 feet for fire resistant trees and 30 feet for non-fire resistive trees. Mature trees shall be pruned to remove limbs to maintain a vertical separation of three times the height of the lower vegetation or 6 feet, whichever is less, above the ground surface adjacent to the trees. Dead wood and litter shall be regularly removed from trees. Ornamental trees shall be limited to groupings of 2-3 trees with canopies for each grouping separated horizontally as described in Table 4907.3.1.

TABLE 4907.3.1
DISTANCE BETWEEN TREE CANOPIES

Distance between Tree Canopies by Percent Slope	
Percent of Slope	**Required Distances Between Edge of Mature Tree Canopies (1)**
0 to 20	**10 feet**
21 to 40	**20 feet**
41 plus	**30 feet**

1. Determined from canopy dimensions as described in Sunset Western Garden Book (Current Edition)

Sec. 4907.3.2 Orchards, groves or vineyards. All orchards, groves and vineyards shall be kept in a healthy state and free of combustible debris and vegetation, including dead or downed trees. A 10-foot firebreak shall be cleared around the perimeter of any orchard, grove or vineyard. Dead grasses between rows of trees or vines shall be mowed.

SEC. 4910. CONSTRUCTION METHODS FOR EXTERIOR WILDFIRE EXPOSURE.

Section 4910 of the 2010 California Fire Code is revised to read:

SECTION 4910
CONSTRUCTION METHODS FOR EXTERIOR WILDFIRE EXPOSURE

Sec. 4910.1 Construction methods for exterior wildfire exposure. The construction methods for exterior wildfire exposure in a wildland-urban interface fire area shall be as provided in Chapter 7A of the San Diego County Building Code.

SEC. APP.B103.3. AREAS WITHOUT WATER SUPPLY SYSTEMS.

Appendix B, section B103.3 of the 2010 California Fire Code is revised to read:

B103.3 Areas without water supply systems. For information regarding water supplies for fire-fighting purposes in rural areas and suburban areas in which adequate and reliable water supplies do not exist, the fire code official is authorized to utilize provisions in Appendix B of this code or the standard published by the Insurance Services Office document entitled "Guide for Determination of Required Fire Flow."

SEC. APP.H100 REPORTING FORMS

Appendix H, sec. H100 is added to the 2010 California Fire Code to read:

SECTION H100
REPORTING FORMS

H100.1 Reporting forms. Hazardous Materials reporting forms currently adopted by San Diego County Department of Environmental Health Hazardous Materials Management Unit which cover the same areas as forms contained in this Appendix are adopted by reference and take precedence over this Appendix.

Section 4

The geographic limits referred to in certain sections of the 2010 California Fire Code are established as follows:

(a) **Sec. 3204.3.1.1.** The geographic limits in which the storage of flammable cryogenic fluids in stationary containers is prohibited is hereby established as the jurisdictional limits of the Lakeside Fire Protection District, except for areas zoned for mixed, general or high impact industrial uses.

(b) **Sec. 3404.2.9.5.1.** The geographic limits in which the storage of Class I and Class II liquids in above-ground tanks outside of buildings is prohibited is hereby established as the jurisdictional limits of the Lakeside Fire Protection District.

Exceptions:

1. In areas zoned for mixed, general or high impact industrial uses.

2. Crankcase draining may be stored in specially constructed above-ground storage tanks, approved by the fire code official, with a maximum capacity of 550 gallons. These tanks may be located within a building when the fire code official deems appropriate and the container meets U.L. Standard 2085. Containers shall be installed and used in accordance with their listing and provisions shall be made for leak and spill containment. In no case shall storage be allowed on residential or institutional property.

3. With the fire code official's approval, Class I and II liquids may be stored above ground outside of buildings in specially designed, approved and listed containers which have features incorporated into their design which mitigate concerns for exposure to heat, ignition sources and mechanical damage. Containers shall be installed and used in accordance with their listing, and provisions shall be made for leak and spill containment. The fire code official may disapprove the installation of these containers when in his or her opinion their use presents a risk to life or property.

(c) **Sec. 3406.2.4.4**. The geographic limits in which the storage of Class I and Class II liquids in above-ground tanks is prohibited is hereby established as the jurisdictional limits of the Lakeside Fire Protection District.

Exceptions:

1. In areas zoned for other than residential uses, when approved by the FAHJ.

2. Crankcase draining may be stored in specially constructed above-ground storage tanks, approved by the fire code official, with a maximum capacity of 550 gallons. These tanks may be located within a building when the fire code official deems appropriate and the container meets U.L. Standard 2085. Containers shall be installed and used in accordance with their listing, and provisions shall be made for leak and spill containment. In no case shall storage be allowed in residential or institutional property.

3. With the fire code official's approval, Class I and II liquids may be stored above ground in specially designed, approved and listed containers which meet U.L. Standard 2085. Containers shall be installed and used in accordance with their listing, and provisions shall be made for leak and spill containment. The fire code official may disapprove the installation of such containers when in his opinion their use presents a risk to life or property.

(d) **Sec. 3804.2.** The geographic limits in which the bulk storage of liquefied petroleum gas is prohibited for the protection of heavily populated and congested areas is hereby established as the jurisdictional limits of the Lakeside Fire Protection District, except for areas zoned for mixed, general or high impact industrial uses.

Exception: Bulk tanks with a maximum aggregate capacity of 30,000 gallons water capacity for above-ground storage of underground distribution to residential areas, where the storage and distribution meets Fire Code requirements as determined by the FAHJ.

Section 5

That if any section, subsection, sentence, clause or phrase of this ordinance is, for any reason, held to be unconstitutional, such decision shall not affect the validity of the remaining portions of this ordinance. The Board of Directors hereby declares that it would have passed this ordinance, and each section, subsection, clause, or phrase thereof, irrespective of the fact that any one or more sections, subsections, sentences, clauses, and phrases be declared unconstitutional.

Section 6

That nothing in this ordinance or in the 2010 California Fire Code hereby adopted shall be construed to affect any suit or proceeding impending in any court, or any rights acquired, or liability incurred, or any cause or causes of action acquired or existing, under any act or ordinance hereby repealed as cited in Section 1 of this ordinance; nor shall any just or legal right or remedy of any character be lost, impaired or affected by this ordinance.

Section 7

That the Clerk of the Board of Directors is directed to prepare and have published a summary of this ordinance no less than five days prior to the consideration of its adoption and again within 15 days following adoption indicating votes cast pursuant to the provisions of California Government Code section 25124. Upon passage, the Clerk of the Board of Directors shall transmit a copy of this Ordinance to the County of San Diego pursuant to California Health and Safety Code section 13869.7 and to the California Building Standards Commission pursuant to California Health and Safety Code section 17958.7.

Section 8

That this ordinance and the rules, regulations, provisions, requirements, orders, and matters established and adopted hereby shall take effect and be in full force and effect upon ratification pursuant to California Health and Safety Code section 13869.7, and not less 30 days from and after the date of its final passage and adoption.

INTRODUCED AND FIRST READ at a regular meeting of the Board of Directors of the Lakeside Fire Protection District, California, held on the 26th day of April 2011; and

THEREAFTER ADOPTED at a regular meeting of the Board of Directors of the Lakeside Fire Protection District, California, on the 24th day of May, 2011, by the following roll call:

AYES: Conniry, Lorenz, Liebig.
NOES: None.
ABSENT: None.
ABSTAIN: Bingham, Johnson.

Nicholas Johnson
President

ATTEST:

Andy Parr
Fire Chief

ATTACHMENT A

FINDINGS

FOR REVISION OF THE LAKESIDE FIRE PROTECTION DISTRICT
AMENDMENTS TO THE 2010 CALIFORNIA FIRE CODE, CALIFORNIA CODE OF REGULATIONS, TITLE 24, PART 9

As required by Health and Safety Code section 17958.7 the Board of Directors of the Lakeside Fire Protection District does herewith make express findings that amendments to the California Building Standards Code are necessary for the protection of the public health, safety and welfare due to certain climatic, topographic or geological features existing in the County of San Diego.

The following matrix lists the Lakeside Fire Protection District amendments and the corresponding express findings. Minor editorial changes or typographical corrections to the Fire Code are not shown in these findings. The full text of the proposed Lakeside Fire Protection District amendments to the California Building Standards Code is shown in Lakeside Fire Protection District Fire Code.

MATRIX OF FINDINGS		
2010 California Fire Code Amendments		
Sections	**PAGE NUMBER**	**FINDING NUMBER(S)**
101.5 Validity	3	All
102.13 Repeal Conflicting Ordinance	3	All
104.1 General Authority and Responsibilities	3	All
104.8 Modifications	3	All
105.6.5.1 Christmas Tree Lots	4	All
105.6.19.1 Greenwaste Recycling, Mulching	4	All
105.8 New Materials, Processes, or Occupancies	4	All
108 Appeals	4	All
109.3 Violation Penalties	7	All
111.4 Failure to Comply	8	All
202 Definitions	8	All
304.1.4 Outdoor Carnivals and Fairs	11	All
307.5 Attendance of Open Burning and Recreational Fires	11	4,5,6,7,8
316.3 Pitfalls	12	All
318 Storage of Firewood	12	All

ATTACHMENT A

Sections	PAGE NUMBER	FINDING NUMBER(S)
319 Mid-Rise Buildings	12	All
501.3.1 Fire Apparatus Access Modifications	16	1,3,9
502.1 Definitions	16	All
505 Premises Identification	23	All
506.2.1 Emergency Key Access	24	All
507.2 Type of Water Supply	24	2,3,4,7,9
507.3 Fire Flow	26	2,3,4,7,9
507.5.1 Fire Protection Water Supplies—Required Installations	26	2,3,4,7,9
603.6.6 Spark Arrestors	27	All
603.8.1 Residential Incinerators	28	All
605.11 Solar Photovoltaic Power Systems	28	All
901.4.5 Fire Department Connections	32	All
901.8.2 Fire Hydrants and Fire Appliances	32	2,3,4,7,9
903.2 Automatic Sprinkler Systems—Where Required	32	1,2,3,5,6,8
903.4 Sprinkler System Monitoring and Alarms	33	1,2,3,5,6,8
903.4 Sprinkler system monitoring and alarms	33	1,2,3,5,6,8
907.2.11.4 Fire Alarm and Detection Systems--Power Source	34	All
907.2.11.5 Additions, Alterations or Repairs to Group R Occ.	34	All
1418 Fuel Modification Zone Requirements	35	3,4,5,6,7,8
1908 Storage and Processing of Wood Chips, Hogged Materials	35	All
2201.1 Motor Fuel-Dispensing Facilities and Repair Garages	39	All
2306.2 General Fire Protection and Life Safety Features	39	All
3301.2 Explosives and Fireworks—Applicability	39	All
3308.1 Fireworks Display	44	All
3405.2.4 Transferring Class I, II and III Liquids	44	All
3406.2.5.2 Tanks for Gravity Discharge	44	All
3406.2.8.2 Prohibition on Use of Tank Vehicle	45	All
3807.5 Securing Tanks to the Ground (LPG)	45	All
4902 Definitions	45	All
4903 Fire Protection Plan	47	All
4907 Defensible Space	48	3,4,5,6,7,8
4910.1 Construction Methods for Exterior Wildfire Exposure	51	4,5,6,7,8,
APP.B103.3 Areas Without Water Supply	52	All
APP.H100.1	52	All

Findings for the Fire Code

Finding 1

The Lakeside Fire Protection District finds that flood conditions carry the potential for overcoming the ability of the fire department to aid or assist in fire control, evacuations, rescues and the emergency task demands inherent in such situations. The potential for flooding conditions result in limiting fire department emergency vehicular traffic, with resulting overtaxing fire department personnel, may further cause a substantial or total lack of protection against fire for the buildings and structures located within the jurisdiction.

Finding 2

Much of the rural area of the County of San Diego is a mountainous topography and lacks the infrastructure needed for water supply (fire flow) and experiences water shortages from time to time. Those conditions have an adverse effect on water availability for firefighting. Fires starting in sprinklered buildings are typically controlled by one or two sprinkler heads, flowing as little as 13 gallons per minute.

Hose streams used by engine companies on well-established structure fires operate at about 250 gallons per minute each, and the estimated water need for a typical residential fire is 1,250 to 1,500 gallons per minute, according to the Insurance Service Office and the International Fire Code.

Under circumstances such as, lack of water infrastructure, earthquakes, multiple fires and wildland fires within a community, the limited water demands needs of residential fire sprinklers would control and extinguish many fires before they spread from building to wildland. In such a disaster, water demands needed for conflagration firefighting probably would not be available.

Finding 3

The topography of the County of San Diego presents problems in delivery of emergency services, including fire protection. Hilly terrain has narrow, winding roads with little circulation, preventing rapid access and orderly evacuation. Much of these hills are covered with highly combustible natural vegetation. In addition to access and evacuation problems, the terrain makes delivery of water extremely difficult. Some hill areas are served by water pump systems subject to failure in fire, high winds, earthquake and other power failure situations. This would only allow domestic gravity feed water from tanks and not enough water for fire fighting.

Finding 4

The seasonal climatic conditions during the late summer and fall create numerous serious difficulties regarding the control of and protection against fires in the County of San Diego. The hot, dry weather typical of this area in summer and fall coupled with Santa Ana winds frequently results in wildfires which threaten or could threaten the County of San Diego.

Code requirements regarding fire-resistive construction methods have a direct bearing on building survival in a wildland fire situation. In a dry climate, on low humidity days, many materials are much more easily ignited. More fires are likely to occur and any fire, once started, can expand extremely rapidly.

Finding 5

Due to seasonal climatic conditions, major brush fires are a common occurrence in Southern California and repeatedly destroy many structures each fire season. For example:

a) The Southern California Firestorms of 1993 resulted in the devastation of 1,171 structures; and

b) The Harmony Grove of 1996 resulted in the devastation of 122 structures; and

c) The Gavilan Fire (Fallbrook) of 2002 destroyed 43 homes and damaged 13; and

d) The Cedar and Paradise Firestorms of 2003 destroyed 2,684 homes in San Diego County; and

e) The Witch, Harris, Rice and Poomacha fires of 2007 destroyed approximately 1,200 homes and 1,100 accessory structures in the County of San Diego.

Finding 6

The County of San Diego recently experienced the Witch, Harris, Rice and Poomacha fires. In late October 2007 these fires resulted in the destruction of approximately 1,200 homes and 1,100 accessory structures in the County of San Diego and burned a total of approximately 368,000 acres. The destruction of many of these structures was attributed to the fact that embers were able to enter concealed spaces within the buildings through openings in roofs or walls combined with the severe weather conditions, such as high wind velocities and low humidity.

Finding 7

In the County of San Diego, windswept brands from burning structures have spread fire not only to adjacent structures but also to other structures considerable distances away, which happened to be in the path of the flying burning brands.

Finding 8

In the County of San Diego, radiant heat from involved structures has spread fire to adjacent and distant combustible structures, thereby jeopardizing the safety of the citizens and the effectiveness of the firefighters.

Finding 9

The County of San Diego is situated near three major faults, each capable of generating earthquakes of significant magnitude. These are the Rose Canyon Fault, the Elsinore Fault, and the Agua Caliente Fault. These faults are subject to becoming active at any time; the County of San Diego is particularly vulnerable to devastation should such an earthquake occur.

The potential effects of earthquake activity include isolating certain areas of County of San Diego from the surrounding area and restricting or eliminating internal circulation due to the potential for collapsing of highway overpasses and underpasses, along with other bridges in the area, or an earth slide, and the potential for vertical movement rendering surface travel unduly burdensome or impossible.