

**BUILDING STANDARDS COMMISSION**

2525 Natomas Park Drive, Suite 130  
Sacramento, California 95833-2936  
(916) 263-0916 FAX (916) 263-0959



October 21, 2013

Chuck Clark, Building Inspection Manager  
County of San Mateo  
455 County Center, 2nd Floor  
Redwood City, CA. 94063

Dear Mr. Clark:

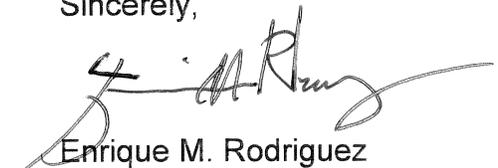
This letter is to acknowledge receipt on October 2, 2013 of the County of San Mateo submittal pertaining to Ordinance No. 04532 with findings and is acceptable for filing. Your filing attests to your understanding that according to Health and Safety Code §18941.5 and 17958.7 no modification or change to the California Building Standards Code shall become effective or operative for any purpose until the findings and the modifications or changes have been filed with the California Building Standards Commission (the Commission).

This letter attests only to the filing of these local modifications with the Commission, which is not authorized by law to determine the merit of the filing. As a reminder, local modifications are specific to a particular edition of the Code. They must be readopted and filed with the Commission in order to remain in effect when the next triennial edition of the Code is published.

In addition, should you receive Fire Protection District ordinances for ratification, it is required to submit the ratified ordinances to the Department of Housing and Community Development [Health and Safety Code Section 13869.7(c)], ATTENTION: State Housing Law Program Manager, rather than the Commission. Likewise, ordinances containing energy efficiency standards may require approval from the California Energy Commission pursuant to Public Resources Code Section 25402.1(h)(2).

If you have any questions or need any further information, you may contact me at (916) 263-0916.

Sincerely,



Enrique M. Rodriguez  
Associate Construction Analyst

cc: Chron  
Local Filings

**ORDINANCE NO. 04532**  
BOARD OF SUPERVISORS, COUNTY OF SAN MATEO,  
STATE OF CALIFORNIA

\* \* \* \* \*

**AN ORDINANCE MAKING CERTAIN FINDINGS OF LOCAL  
CONDITIONS, ADOPTING THE 2009 EDITION OF THE INTERNATIONAL  
FIRE CODE WITH THE 2010 CALIFORNIA FIRE CODE AMENDMENTS KNOWN AS  
THE 2010 CALIFORNIA FIRE CODE, CALIFORNIA CODE OF REGULATIONS,  
TITLE 24 PART 9 PUBLISHED BY THE INTERNATIONAL CODE COUNCIL, AND  
MODIFICATIONS THERETO AS SET FORTH HEREIN, INCLUDING APPENDIX  
CHAPTERS 4, B, C, D, F, H, I, AND J, AND REPEALING AND REPLACING  
CHAPTER 3.84 OF TITLE 3 OF THE SAN MATEO COUNTY ORDINANCE CODE**

The Board of Supervisors of the County of San Mateo, State of California,  
**ORDAINS** as follows:

**SECTION 1. Findings of Fact**

For the purposes of this ordinance, the Board of Supervisors hereby makes the following findings, as required by Sections 17958.7 and 18941.5 of the California Health and Safety Code. The Board of Supervisors finds and declares that the unique characteristics of the topography, geographic, climatic, and the balance of light industrial, commercial and residential properties located within the areas served by the San Mateo County Fire Department, requires the formal adoption of the 2009 International Fire Code with the 2010 California Fire Code Amendments, including all Appendix Chapters, Referenced Standards and modifications contained herein which are reasonably necessary in order to protect health, safety, and welfare of the residents and properties in the areas served, because of the existence of the following local conditions:

**1. Climatic Conditions**

The areas served by the San Mateo County Fire Department, on average, experience an annual rainfall between 15 to 24 inches. This rainfall can be expected between October and April of each year. However, during the summer and early fall months there is little, if any, measurable precipitation. During this dry period, the temperatures range from 70°-90° with light to gusty westerly winds and occasionally but becoming more common, northeast to easterly winds, known as the Diablo Winds. These drying winds, mixed with the natural vegetation, which is dominant throughout the area, creates hazardous fuel conditions, which further increases extensive wildfire risk. With residential developments encroaching into these wooded, grass, or brush covered areas, wind and terrain-driven fires could have severe consequences to improved properties at risk. This has been demonstrated on several occasions in the Bay Area.

## 2. **Geographical Conditions**

Geographic Location. The areas served by the San Mateo County Fire Department are located in unincorporated areas of the county, from the southern end of the county adjacent to the County of Santa Cruz and the County of Santa Clara, to the northern boundary adjacent to the City and County of San Francisco.

Seismic Location. The relatively young geological processes that have created the San Francisco bay region are still active today. Seismically, the County of San Mateo sits along the active San Andreas Fault, and is rated as a Seismic Zone Classification of C to F.

Size and Population. Direct service protection areas served by the San Mateo County Fire Department encompass approximately 330 square miles and 17,500 people.

Roads and Streets. The number of vehicle miles driven is steadily increasing despite limited growth. Many older streets are narrow and steep. The impact of additional planned developments and increased traffic flow will continue to create an effect on the delivery of fire protection services.

Soil Conditions. The areas closest to the Bay are overlain by unconsolidated fine silt clay, known as Bay Mud, which varies in thickness from a few feet to as much as thirty (30) feet. The mountainous areas are a combination of solid rock to mixed rock and earth. The topography varies from steep mountainous terrain, to flat coastal lands. Slopes range from (0) degrees to more than (20) degrees on numerous streets and driveways.

Vegetation. The hilly portions of the County contain old growth and second growth timberland, oak woodlands, dense brush and a heavy growth of natural grasses. Numerous fires occur within the County and surrounding City jurisdiction lands each year.

## 3. **Topographical Conditions**

The topographic element, as would be expected, is closely associated with the geographic element. With the significant elevation changes within the County, development is a geographical concern. Elevation changes within developments following the path of least resistance, creating a meandering pattern of structures. This does not lend itself to a systematic street and road layout, which would promote easy traffic flow.

Topographic constraints have allowed only a few major cross-county thoroughfares to be constructed. These main thoroughfares tend to be heavily congested, primarily during commute hours and seasonal periods of the year. "Pass-through" vehicular traffic in corridors, such as Highway 92, Highway 35, Edgewood Road, and Highway 84, increase commute time traffic for East and West bound vehicular movement to US 101 and Interstate 280. The increased traffic has increased the response time of fire apparatus and other emergency vehicles. The conditions

associated with topography in this county are intensified with the construction of large remote residential structures.

Employment areas are scattered throughout the county, and the people who work in these complexes add to the traffic congestion throughout the county and local cities, thereby further increasing fire apparatus response times.

**SECTION 2.** Existing Chapter 3.84 of Title 3 of the San Mateo County Ordinance Code is repealed in its entirety.

**SECTION 3.** A new Chapter 3.84 is added to Title 3 of the San Mateo County Ordinance Code to be numbered and entitled and to read as follows:

### **Chapter 3.84 Fire Protection Regulations**

#### **§ 3.84.010 Title and Scope**

This Chapter shall be known and may be cited as the San Mateo County Fire Code. The provisions of this Chapter shall apply to all of the unincorporated areas of the County served by the San Mateo County Fire Department.

#### **§ 3.84.020 Documents Adopted by Reference**

For the purpose of establishing proper regulations for building construction and the use of certain systems involving flammable, volatile, or hazardous materials, and for the regulation of activities that threaten the health and safety of local residents, the 2009 International Fire Code with the 2010 California Fire Code Amendments, (herein "The Fire Code") published by the International Code Council, together with Appendix Chapters 4, B, C, D, F, H, I, and J, is hereby adopted subject to the modifications set forth below.

#### **§ 3.84.030 San Mateo County Fire Department**

The San Mateo County Fire Department is hereby established and shall be administered by the County Fire Chief.

#### **§ 3.84.040 County Fire Chief**

"County Fire Warden" and "County Fire Chief" shall mean the "Fire Chief" of the San Mateo – Santa Cruz Unit of the California Department of Forestry and Fire Protection (CAL FIRE) or authorized representative thereof, so long as there shall be in effect an agreement for CAL FIRE to provide fire protection services to the County. The Fire Warden / Fire Chief shall have all powers and duties conferred upon Fire Chiefs by state law.

#### **§ 3.84.050 County Fire Chief Duties**

The Board of Supervisors hereby delegates the authority granted by section 24008 of the Government Code and authorizes the County Fire Chief to appoint from qualified personnel on the Chief's staff such as Deputy, Assistant, and Battalion Chief's (Chief

Officers) as necessary to perform those duties relating to fire or fire protection as are required by the Board. The County Fire Chief and appointed designees shall aid in enforcing all laws and ordinances and any rules and regulations adopted by the State Fire Marshal relating to fires or fire prevention and protection and shall exercise peace officer powers pursuant to the provisions of section 24008 of the Government Code.

#### **§ 3.84.060 Bureau of Fire Prevention and Enforcement Duties**

The Board of Supervisors authorizes the County Fire Chief to establish a Bureau of Fire Prevention, which shall be known herein as the San Mateo County Fire Marshal's Office. The Fire Code adopted and amended herein shall be enforced by the San Mateo County Fire Marshal's Office under the direction of the County Fire Chief.

#### **§ 3.84.070 County Fire Marshal**

The "County Fire Marshal" is the chief officer assigned to the San Mateo County Fire Marshal's Office. The County Fire Marshal shall be known as the "Fire Code Official" as defined in the Fire Code.

#### **§ 3.84.080 No Liability for Damages**

This Code shall not be construed to hold the County of San Mateo or any of its officers or employees liable for any damage to persons or property by reason of any inspection or reinspection authorized herein or by reason of the approval or disapproval of any equipment or process authorized herein, or for any act or omission in connection with the control or extinguishment of any fire or in connection with any other official duties.

#### **§ 3.84.090 Chimney Screens Required**

Any chimney upon any cabin, house, hotel, house trailer, or other building or improvement located in any timber, grass, brush, or grain covered area shall have across the opening thereof a galvanized or copper screen spark arrester of a mesh not larger than one-half of an inch.

#### **§ 3.84.100 Fuel Breaks**

- A. Every person, owning, leasing or otherwise controlling improved real property, shall maintain an effective fuel break for the protection of improvements by removing all hazardous flammable materials or growth from the ground around each improvement for a distance of not less than 30 feet from its exterior circumference. The County Fire Chief may require a distance of up to 100 feet to be cleared if he determines that the greater distance is necessary to protect improvements. Where the Distance from the improvements to the property line of the parcel upon which the improvement is located is less than the distance required to be cleared, the person owning, leasing or otherwise controlling the property shall bear any and all costs associated with clearing an area sufficient to provide the required fuel break, including area that is adjacent to the property.

- B. In determining the extent of clearing necessary to establish an adequate fuel break, due consideration shall be given to the retention of existing landscaping or natural features that, in the opinion of the County Fire Marshal, do not increase the risk of the spread of a fire.
- C. Any determination as to the required size of a fuel break shall give due consideration to the presence of any sensitive habitats entitled to protection under federal, state or local laws, and shall comply with such laws. In the case of any development for which environmental review is required, and for which a fuel break will be required, the environmental review shall consider any environmental impacts which may result from the creation of the required fuel break.

#### **§ 3.84.110 Land Divisions**

- A. No final map for a major land division shall be approved within the boundaries of an area served by a public water system until the County Fire Marshal certifies that the land division has met the provisions of California Fire Code Sections 503 and 508 for Fire Apparatus Access Roads and Fire Protection Water Supply either through installation of required improvements before final map approval, or through a subdivision or other binding agreement which requires installation of the required improvements by a specified date following final map approval, whichever is appropriate.
- B. No parcel map for a minor land division shall be approved within the boundaries of an area served by a public water system until the County Fire Marshal certifies that the land division has met the provisions of California Fire Code Sections 503 and 508 for Fire Apparatus Access Roads and Fire Protection Water Supply either through installation of required improvements before final map approval, or through a subdivision or other binding agreement which requires installation of the required improvements by a specified date following final map approval, whichever is appropriate.
- C. The requirements of this section do not apply to lot line adjustments between four or fewer existing parcels, where land taken from one parcel is added to an adjacent parcel, and where a greater number of parcels than originally existed is not thereby created.

#### **§ 3.84.120 Construction, Relocation and Alteration**

Every person who constructs, relocates, alters (adding to a building which will increase the size or value of the building by 50 percent or more); a building or portion of a building shall comply with the provisions of California Fire Code Sections 503 and 508 for Fire Apparatus Access Roads and Fire Protection Water Supply. Valuation of a building and alterations shall be determined in the same manner as determined under applicable building codes.

#### **§ 3.84.130 Modifications to Fire Code**

The San Mateo County Board of Supervisors hereby determines that modifications to

certain specific sections of the California Fire Code are reasonably necessary due to local conditions as set forth in the following Sections.

#### **§ 3.84.140 Special Events**

Section 105.6.4.1 of the California Fire Code is adopted to read as follows:

To conduct a special event either inside or outside of a structure. Special events include but are not limited to the following types of activity: crafts faire, festivals, historical celebrations, etc.

#### **§ 3.84.150 Explosives**

Section 105.6.14 of the California Fire Code is amended to read as follows:

An operational permit is required for the manufacture, storage, handling, sale or use of any quantity of explosives, explosive materials, fireworks or pyrotechnic special effects within the scope of Chapter 33 of this code, or when a local permit or approval from the Fire Chief is required by the California Code of Regulations Title 19, Division 1, Chapter 6 – Fireworks or Chapter 10 – Explosives.

**Exception:** Small arms ammunition of .75 caliber or less, cartridges for propellant-actuated power devices, and cartridges for industrial guns, 20 pounds or less of smokeless powder, 5 pounds or less of black sporting powder providing such smokeless or black sporting powder is for the hand loading of small arms or small arms ammunition.

#### **§ 3.84.160 Open Burning**

Section 105.6.30 of the California Fire Code is deleted:

#### **§ 3.84.170 Fire Protection Board of Appeals**

Section 108.1 of the California Fire Code is amended to read as follows:

In order to hear and decide appeals of orders, decisions or determinations made by the County Fire Marshal relative to the application and interpretation of this Code, there is established a Fire Protection Board of Appeals, consisting of three members to hear appeals and to grant such relief or make such interpretation or explanation as may be necessary and proper pursuant to the provisions of this Code. The Fire Protection Board of Appeals shall consist of the San Mateo County Fire Chief, the San Mateo County Fire Operations Chief and the Planning Department Director or their authorized representatives. The County Fire Marshal shall act as Secretary of the Board. The Fire Protection Board of Appeals shall adopt rules and regulations for conducting its hearings and shall render all decisions and findings in writing to the appellant, with duplicate copy to the County Fire Marshal.

Any appeal of a decision, order or determination made by the Fire Marshal shall be in writing and filed with the San Mateo County Fire Chief within thirty (30) days from the date of the decision, order or determination being appealed. The notice of appeal shall:

1. Specify the substance and particulars of the decision, order or determination being appealed, including the date of the decision, order or determination.
2. Describe the grounds for and arguments in support of the appeal.
3. Be signed by the appellant or his/her duly authorized agent.
4. Include the mailing address of the appellant.

Whenever a notice of appeal is filed with the Fire Chief, the Fire Chief shall set the matter for hearing at the earliest reasonable time and shall notify the appellant of the place, date and time the Board of Appeals shall hear and consider the appeal. The Fire Chief shall give notice of the hearing to the appellant at least seven days prior to the time set for the hearing. Notice shall be given to the appellant by first class mail and certified mail to the address shown on the notice of appeal.

#### **§ 3.84.180 Violations**

Section 109.3 of the California Fire Code is amended to read as follows:

Persons who shall violate a provision of this code or shall fail to comply with any of the requirements thereof or who shall erect, install, alter, repair, or do work in violation of the approved construction documents or directive of the fire code official, or of a permit or certificate used under the provisions of this code, shall be guilty of a misdemeanor, punishable as set forth in the Penal Code. Each day that the violation continues after a notice has been served shall be deemed as a separate offense.

#### **§ 3.84.190 Failure to Comply**

Section 111.4 of the California Fire Code is amended to read as follows:

No person shall continue any work after having been served with a stop work order, except such work as that person is directed to perform to remove a violation or unsafe condition.

#### **§ 3.84.200 Traffic Calming Devices**

Section 503.4.1 of the California Fire Code is added to read as follows:

Traffic calming devices are prohibited unless approved by the fire code official. Traffic calming devices shall not be installed on designated fire apparatus response routes. When approved, traffic calming devices shall be installed in accordance with the San Mateo County Fire Dept's "Traffic Calming Devices" Standard Detail.

#### **§ 3.84.210 Premises Identification**

Section 505.1.1 of the California Fire Code is added to read as follows:

New residential buildings shall have **internally illuminated** address numbers contrasting with the background so as to be seen from the public way fronting the building. Residential address numbers shall be at least six feet above the finished surface of the driveway. Where buildings are located remotely to the public roadway, additional signage at the driveway/roadway entrance leading to the building and/or on each individual building shall be required by the San Mateo County Fire Department. This remote signage shall consist of a 6 inch by 18 inch green reflective metal sign with 3 inch reflective Numbers/ Letters similar to Hy-Ko 911 or equivalent.

**§ 3.84.220 Multiple Tenant Structures**

Section 505.1.2 of the California Fire Code is added to read as follows:

Multiple tenant buildings, using the same street address numbers, shall have suite or unit identification posted as required by the San Mateo County Fire Department.

**§ 3.84.230 Commercial/Industrial Size and Stroke of Numbers.**

Section 505.1.3 of the California Fire Code is added to read as follows:

Building address numbers shall be either internally or externally illuminated and contrasting with the background so as to be seen from the public way fronting the building.

Building address number heights shall be sized in accordance with the table noted below. The number stroke shall be 1/2-inch or larger.

<u>Distance from Road</u>	<u>Address No. Size</u>
0-50 feet	6-inch
50-100 feet	8-inch
100-150 feet	10-inch
150 + feet	12-inch

with a corresponding increase in stroke width.

**§ 3.84.240 Rear Addressing.**

Section 505.1.4 of the California Fire Code is added to read as follows:

When required by the Chief, approved numbers or addresses shall be placed on all new and existing buildings in such a position as to be plainly visible and legible from the fire apparatus road at the back of the property. Number stroke and size will comply with Section 505.1 for residential buildings and 505.1.3 for commercial buildings.

**§ 3.84.250 Suite/Unit Identification.**

Section 505.1.5 of the California Fire Code is added to read as follows:

Buildings containing separate suite and/or unit identification shall have the suite or unit

identification clearly posted with assigned letters or numbers having a minimum height of four inches and a minimum stroke of 3/8 inch. Assigned letters or numbers shall be of contrasting color to the background and located between 5 feet and 6 feet off the finished floor. Directional address numbers or letters shall be provided.

**§ 3.84.260 Directories.**

Section 505.1.6 of the California Fire Code is added to read as follows:

Complexes with multiple buildings may be required by the San Mateo County Fire Department to provide one or more of the following: a directory, a premise map or directional signage. Location, size and color of such elements will be determined by the San Mateo County Fire Department on a site-specific basis.

**§ 3.84.270 Automatic Fire Sprinklers Required.**

Section 903.1.2 of the California Fire Code is added to read as follows:

All automatic fire sprinkler systems installed as required by the San Mateo building Code Ordinance must be approved by the County Fire Marshal.

**§ 3.84.280 Fire Department Response To False Alarms**

Section 907.9.5.1 of the California Fire Code is added to read as follows:

Any building owner or owner's agent who fails to properly maintain and service any smoke detector or fire alarm system, water flow detection alarm or fire sprinkler tamper alarm, after being notified that service or maintenance is required, will be subject to the payment of costs related to any false alarm response by the fire department.

**§ 3.84.290 Making False Report**

Section 907.9.5.2 of the California Fire Code is added to read as follows:

It shall be unlawful for a person to give, signal or transmit a false alarm. A false report may include signals from a fire alarm system, including signals caused during fire alarm maintenance without prior Fire Department notification. Any person making a false report will be subject to the payment of costs related to any false report response by the fire department.

**§ 3.84.300 Identification**

Section 912.4.1 of the California Fire Code is added to read as follows:

Fire department connections to sprinkler systems and/or standpipe systems shall clearly identify the building served as required by the San Mateo County Fire Department.

**§ 3.84.310 Fireworks**

Section 3301.2 of the California Fire Code is added to read as follows:

All non-professional fireworks, including but not limited to, those listed by the California State Fire Marshal as "Safe and Sane," are prohibited within the jurisdictional boundaries of the San Mateo County Fire Department on a year around basis.

**§ 3.84.320 Permits**

Section 3301.3 of the California Fire Code is added to read as follows:

Permits shall be required as set forth in Section 105.6 and regulated in accordance with this section.

**§ 3.84.330 Other Permits Required**

Nothing stated in this chapter shall relieve a property owner from obtaining any other permits required by law for improvements imposed under the provisions of this chapter, including but not limited to a coastal development permit for improvements in the coastal zone.

**SECTION 4.**

This Ordinance shall be effective thirty (30) days from the passage thereof.

\*\*\*\*\*

Regularly passed and adopted this 14<sup>th</sup> day of December, 2010.

AYES and in favor of said ordinance:

Supervisors: MARK CHURCH  
CAROLE GROOM  
ROSE JACOBS GIBSON  
ADRIENNE J. TISSIER

NOES and against said ordinance:

Supervisors: NONE

Absent Supervisors: NONE

Carole Groom

Vice President, Board of Supervisors  
County of San Mateo  
State of California

Certificate of Delivery

I certify that a copy of the original ordinance filed in the Office of the Clerk of the Board of Supervisors of San Mateo County has been delivered to the President of the Board of Supervisors.

Marie L. Peterson

Marie L. Peterson, Deputy  
Clerk of the Board of Supervisors

**BUILDING STANDARDS COMMISSION**

2525 Natomas Park Drive, Suite 130  
Sacramento, California 95833-2936  
(916) 263-0916 FAX (916) 263-0959



May 29, 2014

Gary West  
Building Official  
County of San Mateo  
455 County Center 2<sup>nd</sup> Floor  
Redwood City, CA 94063

RE: Ordinance #04537

Dear Mr. West:

This letter is to advise you of our determination regarding the referenced ordinance with express findings received from your agency on October 7, 2013.

Our review finds the submittal to contain one ordinance modifying provisions of the 2010 California Building Standards Code in Title 24, California Code of Regulations (code), and express findings complying with Health and Safety Code §§17958.7 and 18941.5. The code modification is accepted for filing and is enforceable. This letter attests only to the satisfaction of the cited law for filing of local code amendment supported by an express finding with the Commission. The Commission is not authorized by law to evaluate the merit of the code modification or the express finding.

Local modifications to the code are specific to a particular edition of the code. They must be readopted and filed with the Commission in order to remain in effect when the next triennial edition of the code is published.

On a related matter, should your county receive and ratify Fire Protection District ordinances making modifications to the code, be advised that Health and Safety Code §13869.7(c) requires such ratified ordinances and express findings to be filed with the Department of Housing and Community Development, Division of Codes and Standards, State Housing Law Program, rather than this Commission. Also, ordinances making modifications to the energy efficiency standards of the code may require approval from the California Energy Commission pursuant to Public Resources Code §25402.1(h)(2).

If you have any questions or need any further information, you may contact me at (916) 263-0916.

Sincerely,

A handwritten signature in blue ink that reads "Enrique M. Rodriguez".

Enrique M. Rodriguez  
Associate Construction Analyst

cc: Chron  
Local Filings

**ORDINANCE NO. 04537**  
**BOARD OF SUPERVISORS, COUNTY OF SAN MATEO,**  
**STATE OF CALIFORNIA**

\* \* \* \* \*

**AN ORDINANCE ADOPTING THE LATEST EDITIONS (2010) OF THE CALIFORNIA BUILDING STANDARDS CODE, TITLE 24, 2010 CALIFORNIA BUILDING CODE (PART 2), 2010 CALIFORNIA RESIDENTIAL CODE, TITLE 24 (PART 2.5), 2010 CALIFORNIA ELECTRICAL CODE (PART 3), 2010 CALIFORNIA MECHANICAL CODE (PART 4), 2010 CALIFORNIA PLUMBING CODE (PART 5), 2010 CALIFORNIA ENERGY CODE (PART 6), 2010 CALIFORNIA ELEVATOR SAFETY CONSTRUCTION CODE (PART 7), 2010 CALIFORNIA HISTORICAL BUILDING CODE (PART 8), 2010 CALIFORNIA FIRE CODE (PART 9), 2010 CALIFORNIA EXISTING BUILDING CODE (PART 10), 2010 CALIFORNIA GREEN BUILDING STANDARDS CODE (PART 11), 2010 CALIFORNIA REFERENCE STANDARDS CODE (PART 12) AND RE-ADOPTING THE SAN MATEO COUNTY ORDINANCE CODE, DIVISION VII (BUILDING REGULATIONS), AND AMENDING SECTIONS 9100, 9150, 9180, 9200, 9104, 9113, 9114, 9117, 9184, 9015, 9041 AND 9058, ADDING SECTIONS 9118 AND 9119, AND AMENDING THE SAN MATEO COUNTY ORDINANCE CODE, DIVISION VII (BUILDING REGULATIONS) TO REFERENCE THE INTERNATIONAL BUILDING CODE AND THE INTERNATIONAL RESIDENTIAL CODE**

The Board of Supervisors of the County of San Mateo, State of California,

**ORDAINS** as follows

**SECTION 1.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1,

Section 9100 is hereby amended to read as follows:

**SECTION 9100. ADOPTION OF 2010 CALIFORNIA BUILDING STANDARDS**

**CODE.** The latest adopted editions of the 2010 California Building Standards Code, Title 24, excluding Part 1 (California Administrative Code) and including the 2010 California Building Code (Part 2), 2010 California Residential Code, Title 24 (Part 2.5), 2010 California Energy Code (Part 6), 2010 California Elevator Safety Construction Code (Part 7), 2010 California Historical Building

Code (Part 8), 2010 California Fire Code (Part 9), 2010 California Existing Building Code (Part 10), 2010 California Reference Standards Code (Part 12) and all appendices, amendments, errata, and emergency supplements are hereby adopted and by reference except as otherwise provided in Division VII, as the Building Code of the County of San Mateo. A copy of the "California Building Standards Code" is on file at the San Mateo County Building Inspection Section. The mandatory requirements of the appendix to the California Building Standards Code shall be enforceable to the same extent as if contained in the body of the Building Code. Any amendments, errata and/or emergency supplements to this code shall be enforceable to the same extent as if contained in the body of the "California Building Standards Code."

**SECTION 2.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 2, Section 9150 is hereby amended to read as follows:

**SECTION 9150. ADOPTION OF 2010 CALIFORNIA ELECTRICAL CODE.**

The latest adopted edition of the 2010 California Electrical Code (Title 24, Part 3), based on the 2008 National Electrical Code (NEC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Electrical Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 3.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1,  
Sections 9118 and 9119 are hereby added to read as follows.

**SECTION 9118. ADOPTION OF 2010 CALIFORNIA RESIDENTIAL CODE.**

The latest adopted edition of the 2010 California Residential Code, Title 24 (Part 2.5) is hereby adopted and incorporated by reference. All appendices within the referenced standard above and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Residential Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 9119. ADOPTION OF 2010 CALIFORNIA GREEN BUILDING**

**STANDARDS CODE.** The latest adopted edition of the 2010 California Green Building Standards Code, Title 24 (Part 11) is hereby adopted and incorporated by reference. All appendices within the referenced standard above and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Green Building Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 4.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 3,  
Section 9180 is hereby amended to read as follows:

**SECTION 9180. ADOPTION OF 2010 CALIFORNIA PLUMBING CODE.** The  
latest adopted edition of the 2010 California Plumbing Code (Title 24, Part 5),

based on the 2009 Uniform Plumbing Code (UPC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Plumbing Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 5.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 4, Section 9200 is hereby amended to read as follows:

**SECTION 9200. ADOPTION OF 2010 CALIFORNIA MECHANICAL CODE.**

The latest adopted edition of the 2010 California Mechanical Code (Title 24, Part 4), based on the 2009 Uniform Mechanical Code (UMC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Mechanical Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 6.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9104(a) is hereby amended to read as follows:

- (a) **Minimum Slab Thickness.** The minimum thickness of floor slabs supported directly on the ground shall be not less than 3 1/2 inches (89 mm). The

slab shall be supported by not less than 6 inches by 6 inches with 10-gauge wire mesh or approved alternative installed at mid height of the slab.

**SECTION 7.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9113 is hereby amended to read as follows:

1. The following requirements shall apply to all new buildings or structures and existing structures that require a building permit issued by San Mateo County.
  - a. The roof covering for every new building or structure, or any existing building or structure which is undergoing a re-roof and all materials applied as part of a roof covering assembly, shall have a minimum fire rating of Class B or higher, treated in accordance with California Building Standards Code, Standard 15-2. Where required by the California Building Standards Code or other provision of law, roof coverings must meet a higher fire rating.
  - b. Subsection 1.a of this section shall not apply to buildings or structures that are less than 120 square feet in floor area.
  - c. Any person installing or constructing a roof covering shall, immediately upon completion of the roof covering, provide certification of the roof covering classification to the building owner and to the inspection authority having jurisdiction.

2. The requirements of this section are minimum standards for new construction and re-roofing of existing structures. Where the International Building Code, International Residential Code, International Fire Code, or the California Building Standards Code contains higher standards or additional or more stringent requirements than required by this section, those additional or more stringent requirements shall apply. Further, nothing in this section shall prevent any fire authority having jurisdiction from adopting and enforcing regulations imposing more stringent requirements than those provided by this section.

**SECTION 8.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9114 is hereby amended to read as follows:

1. The following requirements shall apply to all new buildings or structures that require a building permit issued by San Mateo County.
  - a. Except as otherwise provided by this section, or as provided under Section 903.1 of the California State Building Standards Code, automatic fire sprinkler systems shall be installed and maintained in every new building or structure of any type of construction, use, occupancy or size that requires a building permit issued by San Mateo County.
  - b. The term "automatic fire sprinkler system" as used in this section means an integrated system of underground and overhead piping,

including a water supply such as a gravity tank, fire pump, reservoir, pressure tank, or connection by underground piping to a fire main, which system complies in all respects with the requirements for such systems contained in standards issued by the National Fire Protection Association based upon occupancy classification.

- c. An automatic fire sprinkler system shall be provided throughout an existing structure when a building permit is issued to allow additions, alterations, or repairs within any 12-month period, which increase the value of the structure by fifty percent (50%) for one- and two-family dwellings or fifty percent (50%) for all other structures.
- d. Automatic fire sprinklers shall be installed in any garage or carport and breezeway attached to any structure for which a fire sprinkler system is required. A detached non-habitable garage, 1,000 square feet or more in size, or which has an attached studio or workshop shall require the installation of an NFPA-13 light hazardous automatic fire sprinkler system.

2. The following structures are exempt from the requirements of this section.

- a. **Agricultural Buildings.** For the purpose of this section, an "agricultural building" is defined as a non-residential structure designed and constructed to house farm implements, hay, grain, poultry, livestock, or other horticultural products. "Agricultural building" includes a

place of employment where agricultural products are processed, treated or packaged. Office uses within agricultural buildings shall not exceed ten percent (10%) of the total floor area of the building unless such buildings are provided with an automatic fire sprinkler system throughout. "Agricultural buildings" shall include greenhouses.

- b. Non-residential structures less than 1,000 square feet.
- c. Recreational trailers, fifth wheels, and similar structures used for temporary housing during the construction of a permitted building.
- d. Mausoleums of Type I construction, as defined by the California Building Standards Code, which do not contain offices, chapels, stores, or other places of public occupancy for purposes other than parking of vehicles.
- e. Open air parking garages of Type I construction, as defined by the California Building Standards Code, which do not contain offices, chapels, stores, or other places of public occupancy for purposes other than parking and are detached from other buildings.
- f. Car wash structures where no offices or waiting rooms are attached.

3. Additions, alterations or modifications to any existing structure containing automatic fire sprinklers shall require the extension or modification of the fire sprinkler system throughout the added, altered, or modified areas.

Plans for the installation, extension or modification of an automatic sprinkler system shall be submitted to the Planning and Building Department of San Mateo County for review and approval by the appropriate fire department or district prior to installation. Additions, alterations, or remodels to an existing dwelling previously equipped with automatic sprinklers shall require the submittal of three sets of sprinkler plans and hydraulic calculations. All components of the existing system shall be submitted for review to determine compliance with the applicable standards.

4. All automatic fire sprinkler systems shall comply with the most current adopted edition of NFPA-13, NFPA-13-D, NFPA-13-R and any additional County specifications, or modifications imposed by supplemental rules and regulations adopted by the County of San Mateo.
5. The installation of an automatic fire suppression system may be required by the Building Official when an alteration, addition or change in use or occupancy of a building or portion of a building thereof increases the hazard of fire or threat to life and safety.

6. The requirements of this section are intended to represent minimum standards for new construction. Nothing in this section shall prevent any fire authority having jurisdiction from adopting and enforcing any regulations, which impose more stringent requirements. Further, any requirements of the International Building Code, International Residential Code, International Fire Code or the California Building Standards Code, which is more restrictive, specify higher standards or mandates specific locations within a structure for automatic sprinkler systems shall be applicable.

**SECTION 9.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9117 is hereby amended to read as follows:

**SECTION 9117. CHAPTER 7A OF THE 2010 CALIFORNIA BUILDING STANDARDS CODE.** The following requirements shall apply to all new buildings that require a building permit issued by San Mateo County.

Chapter 7A of the 2010 California Building Standards Code and the Local Responsibility Area (LRA), and the State Responsibility Area (SRA) Fire Hazard Severity Zone maps shall apply to all new buildings in the County that require a building permit.

**SECTION 10.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 3, Section 9184 is hereby amended to read as follows:

1. Chapter 6 of the Uniform Plumbing Code is hereby amended to read as follows:

**SECTION 604.0. MATERIALS**

**SECTION 604.1.** All potable water piping and fittings shall be brass, copper, cast iron, galvanized malleable iron, galvanized wrought iron, or galvanized steel. All materials used in the water supply system, except valves and similar devices, shall be of like material.

**SECTION 604.1.1.** CPVC pipe for non-potable hot and cold water distribution systems within the interior of residential buildings is permitted provided all conditions of Section 604.1.1 of the Uniform Plumbing Code are satisfied.

2. Chapter 7 of the Uniform Plumbing Code is hereby amended to read as follows:

**SECTION 701.0. MATERIALS**

**SECTION 701.1.** Drainage piping shall be cast iron, galvanized steel, galvanized wrought iron, copper, brass, Stainless Steel 304 or 316L, Schedule 40 ABS (DWV), Schedule 40 PVC (DWV), extra-strength vitrified clay pipe, or other approved materials having a smooth and uniform bore.

**SECTION 701.1.1.** No galvanized wrought iron or galvanized steel pipe shall be used underground. Galvanized wrought iron or galvanized steel pipe shall be kept at least six (6) inches (152 mm) aboveground.

**SECTION 701.1.2.** ABS and PVC (DWV) piping installations shall be limited to underground installation outside of the structure, and in accordance with IS 5, IS 9, and Chapter 15, "Firestop Protection." Except for individual single-family dwelling units, materials exposed within ducts or plenums shall have a flame-spread index of not more than 25 and a smoke-developed index of not more than 50, when tested in accordance with the Test for Surface - Burning Characteristics of the Building Materials. (See the Building Code Standards based on ASTM E-84 and ANSI/UL 723.)

3. Chapter 9 of the Uniform Plumbing Code is hereby amended to read as follows:

**SECTION 903.0. MATERIALS**

**SECTION 903.1.** Vent pipe shall be cast iron, galvanized steel, galvanized wrought iron, copper, brass, Schedule 40 ABS (DWV), Schedule 40 PVC (DWV), Stainless Steel 304 or 316L (Stainless Steel 304 pipe and fittings shall not be installed underground and shall be kept at least six (6) inches (152 mm) aboveground), or other approved materials having a smooth and uniform bore.

**SECTION 903.1.2.** ABS and PVC (DWV) shall not be approved for use for vent piping or fittings except for underground installation beginning two (2) feet outside the structure.

4. The provisions of Section 9184 shall not apply to the minor repair of existing in place plastic pipe when authorized by the Building Official.

**SECTION 11.** San Mateo County Ordinance Code, Division VII, Chapter 2, Article 1, Section 9015 is hereby amended to read as follows:

**SECTION 9015. VIOLATIONS AND PENALTIES**

1. It shall be unlawful for any person, firm, or corporation to erect, install, construct, enlarge, alter, repair, move, improve, remove, replace, convert, equip, use, occupy, maintain or demolish any building, structure or equipment therein regulated by this code or the construction codes, or cause the same to be done, contrary to or in conflict with or in violation of any of the provisions of said code or codes.
2. Any person, firm, or corporation violating any of the provisions of this code or the construction codes shall be deemed guilty of a misdemeanor as provided in Title 1, Chapter 1.08, Section 1.08.010 of the San Mateo County Ordinance Code. A Stop Work Notice will be posted at the address of the violation(s), and a \$500.00 per day fine will be applied to the owner(s) and/or the address in violation. The Community Development

Director and/or the Building Official may reduce this fine to zero if the owner(s) in violation apply(ies) for their permit(s) within ten (10) business days after the Stop Work Notice has been posted.

**SECTION 12.** San Mateo County Ordinance Code, Division VII, Chapter 2, Article 4, Section 9041 is hereby amended to read as follows:

**SECTION 9041. INVESTIGATION FEES.** The following provisions shall govern investigation fees.

1. The Board of Supervisors hereby finds that there is a substantial cost to the County in identifying and investigating construction or work commenced without first obtaining the prescribed permits therefor, or done in violation of prescribed permits, and in assuring compliance with permit requirements and other pertinent County code provisions when such violations are determined to exist. The Board of Supervisors further finds that a reasonable measure of the cost to the County in identifying, investigating and obtaining compliance for such violations is ten times the value of the applicable permit, and that this cost should be borne by the violator in the form of an investigation fee to be assessed as set forth in Subsection 2, of this section.
2. Whenever any construction or work for which permit is required by this code or by any other code incorporated by reference and made a part of this code, is started or commenced without the prescribed permit having

first been obtained, an investigation fee in the amount of ten times the prescribed permit fee shall be added to the permit fee, and shall be collected at time of application for the permit. Such investigation fee shall be collected for each separate and distinct permit required for a specific project. Where a permit has been previously obtained, but construction or work is commenced which goes beyond the scope of the permit, or is in violation of the terms of the permit, the above described investigation fee shall be assessed for such portion of the construction or work done beyond the scope of, or in violation of, the permit. This investigation fee shall be required and collected whether or not a permit is then or subsequently issued. The maximum investigation fee which may be assessed and collected as to any individual permit shall be three thousand dollars (\$3,000.00). Nothing in this section shall relieve any person(s) from fully complying with the requirements of this code, or with any codes incorporated by reference and made a part of this code, in the execution of the work, or from any other penalties prescribed by law.

3. Whenever any Farm Labor Housing, temporary or permanent, has been found to have been installed, constructed, altered or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fees shall be based on an hourly cost to compensate staff time spent on processing the violation.

4. Whenever Low Income or Affordable Housing, temporary or permanent, has been found to have been installed, constructed, altered, or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.
  
5. The Building Official shall have the authority to adjust investigation fees for minor and major violations, as listed below, provided such violation is a first offense, and/or extenuating circumstances determined by the Building Official. In no case shall the investigation fee be reduced to less than two times the permit fee, plus the permit fee. Such reduction in investigation fees shall not relieve the applicant from full compliance with all applicable codes and zoning regulations. Such reduced investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.
  - a. Water heater installations or replacements
  - b. Furnace/heater installations or replacements
  - c. Recreational decks for single-family dwellings
  - d. Re-roofing of a single-family dwelling
  - e. Electrical service changes to a single-family dwelling
  - f. Non-habitable accessory structures not exceeding 200 square feet
  - g. Water or sewer line replacements for single-family dwellings

- h. Fences
  - i. Kitchen or bathroom remodels of single-family dwellings
6. The Building Official or authorized representative shall have the authority to issue an Information Notice in lieu of a Stop Work Notice for minor violations listed above or in the event that work has just begun on other violations. The issuance of an Information Notice shall waive the requirement for investigation fees provided that the work stops immediately and the violator has contacted the Planning and Building Department to initiate the permit process within ten (10) working days of the issuance of the Information Notice. Failure to comply with these two requirements will result in the issuance of a Stop Work Notice and shall also result in the disqualification of the reduction of investigation fees as allowed in Item #5 of this section.

**SECTION 13.** San Mateo County Ordinance Code, Division VII, Chapter 2, Article 5, Section 9058 is hereby amended to read as follows:

**SECTION 9058. FINAL INSPECTION AND ADDRESSING**

1. There shall be a final inspection and approval on all buildings or structures when completed and ready for occupancy. A final inspection approval may, upon notice, be revoked by the Building Official if it is found that construction, work, or equipment fails in any respect to comply with the

requirement of these codes, or that the installation is unsafe, dangerous, or a hazard to life or property.

2. The address of the structure must be posted on all buildings in a position such that it is plainly visible and legible from the street or road fronting the property. Buildings with multiple units or tenants must have each unit or suite identified by a separate address or unit number/letter. Where structures are remote to the public or is a private road, additional directional signage may be required at each driveway or roadway intersecting the access to the building or structure. Nothing in this subsection shall prevent any fire authority having jurisdiction from adopting and enforcing regulations imposing more stringent requirements for addressing requirements.
3. The Community Development Director or the Building Official has the authority to change a property address if it is found to be inconsistent or out of sequence with surrounding addresses.

**SECTION 14.** The San Mateo County Ordinance Code, Division VII (Building Regulations), is hereby re-adopted in its entirety except as amended or added within this ordinance. A copy of the "Building Regulations" is on file at the San Mateo County Building Inspection Section.

**SECTION 15.** All references to the "Uniform Building Code" contained within the San Mateo County Ordinance Code, Division VII (Building Regulations) is hereby amended and replaced with "International Building Code" and International "Residential Code."

**SECTION 16.** This Ordinance will be in full force and effective thirty (30) days after the adoption by the Board of Supervisors.

\*\*\*\*\*

Regularly passed and adopted this 25<sup>th</sup> day of January, 2011.

**AYES and in favor of said ordinance:**

**Supervisors:**

\_\_\_\_\_  
**CAROLE GROOM**

\_\_\_\_\_  
**DON HORSLEY**

\_\_\_\_\_  
**ROSE JACOBS GIBSON**

\_\_\_\_\_  
**ADRIENNE J. TISSIER**

**NOES and against said ordinance:**

**Supervisors:**

\_\_\_\_\_  
**NONE**

**Absent Supervisors:**

\_\_\_\_\_  
**NONE**

\_\_\_\_\_  
**Carole Groom**

**President, Board of Supervisors  
County of San Mateo  
State of California**

**Certificate of Delivery**

**I certify that a copy of the original ordinance filed in the Office of the Clerk of the Board of Supervisors of San Mateo County has been delivered to the President of the Board of Supervisors.**

\_\_\_\_\_  
**Marie L. Peterson**

**Marie L. Peterson, Deputy  
Clerk of the Board of Supervisors**



**COUNTY OF SAN MATEO**  
**Inter-Departmental Correspondence**  
**Planning and Building Department**



**DATE:** November 29, 2010  
**BOARD MEETING DATE:** December 14, 2010  
**SPECIAL NOTICE/HEARING:** None  
**VOTE REQUIRED:** Majority

**TO:** Honorable Board of Supervisors

**FROM:** Jim Eggemeyer, Community Development Director 

**SUBJECT:** EXECUTIVE SUMMARY: Adoption of the 2010 California Building Standards Code and Amending San Mateo County Ordinance Code, Division VII (Building Regulations).

**RECOMMENDATION:**

1. Adopt an ordinance adopting the latest editions (2010) of the California Building Standards Code, Title 24, 2010 California Building Code (Part 2), 2010 California Residential Code, Title 24 (Part 2.5), 2010 California Electrical Code (Part 3), 2010 California Mechanical Code (Part 4), 2010 California Plumbing Code (Part 5), 2010 California Energy Code (Part 6), 2010 California Elevator Safety Construction Code (Part 7), 2010 California Historical Building Code (Part 8), 2010 California Fire Code (Part 9), 2010 California Existing Building Code (Part 10), 2010 California Green Building Standards Code (Part 11), 2010 California Reference Standards Code (Part 12) and re-adopting the San Mateo County Ordinance Code, Division VII (Building Regulations), and amending Sections 9100, 9150, 9180, 9200, 9104, 9113, 9114, 9117, 9184, 9015, 9041 and 9058, adding Sections 9118 and 9119, and amending the San Mateo County Ordinance Code, Division VII (Building Regulations) to reference the International Building Code and the International Residential Code.
2. Waive the reading of the ordinance in its entirety, and continue the hearing until the second reading.

**BACKGROUND:**

The Planning and Building Department proposes the adoption of the 2010 California Building Standards Code as required by State law, and corresponding amendments to the San Mateo County Ordinance Code, Division VII, Building Regulations, in addition to local amendments to the California Building Standards Code to address specific concerns within unincorporated San Mateo County.

**State Code Requirements:** The California Building Standards Code has now adopted the International Building Code, International Residential Code and International Fire Code Standards (IBC, IRC and IFC-2009). Building and Fire Codes are published and adopted by the State of California on 3-year cycles. The most recent adoption was the 2010 Edition of the California Building Standards Code, which is based on the new model codes of the International Building Code, International Residential Code and the International Fire Code, developed and published by the International Code Council (ICC).

**DISCUSSION:**

Local jurisdictions are required to enforce building code regulations as adopted by the State. Counties or cities may choose to modify specific code sections, and are required to make specific findings based on topographical, geological, or climatic conditions, which exist within the jurisdiction, that necessitate the local amendments.

The Planning and Building Department is recommending the re-adoption of San Mateo County Ordinance Code, Division VII, Building Regulations, in addition to local amendments to the California Building Standards Code, to address specific concerns within unincorporated San Mateo County. There are five major local amendments and the staff report includes the necessary information and discussion for the Board of Supervisors to make the required findings. These major amendments require facts and findings, and those findings are contained in the staff report for the following: (1) Floor Slab Reinforcement, Section 9104; (2) Class B or Better Roofing, Section 9113; (3) Fire Sprinkler Requirements, Section 9114; (4) Chapter 7A, Section 9117; and (5) existing prohibition on Plastic Pipe, Section 9184.

In addition to the five proposed major local amendments, nine minor administrative amendments are recommended, which do not require specific findings be made for local approval. These proposed amendments include: (1) adopting the California Building Standards Codes, Section 9100; (2) amending Violations and Penalties, Section 9015; (3) amending Investigation Fees, Section 9041; (4) amending the Final Inspection and Addressing, Section 9058; (5) adding California Residential Code, Section 9118; (6) adding California Green Building Standards Code, Section 9119; (7) adopting of the California Electrical Code, Section 9150; (8) adopting of the California Plumbing Code, Section 9180; and (9) adopting of the California Mechanical Code, Section 9200.

The adoption of the 2010 California Building Standards Code and amendment of the San Mateo County Ordinance Code, Division VII, Building Regulations contributes to the 2025 Shared Vision outcome of a livable community by promoting buildings that are permitted and inspected under the most current code, thus protecting life and property.

**FISCAL IMPACT:**

None



**COUNTY OF SAN MATEO**  
**Inter-Departmental Correspondence**  
**Planning and Building Department**



**DATE:** November 29, 2010  
**BOARD MEETING DATE:** December 14, 2010  
**SPECIAL NOTICE/HEARING:** None  
**VOTE REQUIRED:** Majority

**TO:** Honorable Board of Supervisors

**FROM:** Jim Eggemeyer, Community Development Director 

**SUBJECT:** Adoption of the 2010 California Building Standards Code and Amending San Mateo County Ordinance Code, Division VII (Building Regulations).

**RECOMMENDATION:**

1. Adopt an ordinance adopting the latest editions (2010) of the California Building Standards Code, Title 24, 2010 California Building Code (Part 2), 2010 California Residential Code, Title 24 (Part 2.5), 2010 California Electrical Code (Part 3), 2010 California Mechanical Code (Part 4), 2010 California Plumbing Code (Part 5), 2010 California Energy Code (Part 6), 2010 California Elevator Safety Construction Code (Part 7), 2010 California Historical Building Code (Part 8), 2010 California Fire Code (Part 9), 2010 California Existing Building Code (Part 10), 2010 California Green Building Standards Code (Part 11), 2010 California Reference Standards Code (Part 12) and re-adopting the San Mateo County Ordinance Code, Division VII (Building Regulations), and amending Sections 9100, 9150, 9180, 9200, 9104, 9113, 9114, 9117, 9184, 9015, 9041 and 9058, adding Sections 9118 and 9119, and amending the San Mateo County Ordinance Code, Division VII (Building Regulations) to reference the International Building Code and the International Residential Code.
2. Waive the reading of the ordinance in its entirety, and continue the hearing until the second reading.

**BACKGROUND:**

**Proposal:** The Planning and Building Department proposes the adoption of the 2010 California Building Standards Code as required by State law, and corresponding amendments to the San Mateo County Ordinance Code, Division VII, Building Regulations, in addition to local amendments to the California Building Standards Code to address specific concerns within unincorporated San Mateo County.

**State Code Requirements:** The California Building Standards Code no longer uses the Uniform Building Code Standards. It has now adopted the International Building Code, International Residential Code and International Fire Code Standards (IBC, IRC and IFC-2009). Building and Fire Codes are published and adopted by the State of California on 3-year cycles. The International Code Council (ICC) develops construction and public safety codes on a triennial calendar through a governmental consensus process. This system of code development has provided the citizens of the United States the highest level of safety in the world for more than 80 years. The most recent adoption was the 2010 Edition of the California Building Standards Code, which is based on the new model codes of the International Building Code, International Residential Code and the International Fire Code, developed and published by the International Code Council (ICC).

Local jurisdictions are required to enforce these regulations as adopted by the State. Counties or cities may choose to modify specific code sections, but must make specific findings based on topographical, geological, or climatic conditions that exist within the jurisdiction. The Planning and Building Department (the Department) proposes to make some local amendments, as discussed below.

#### **DISCUSSION:**

Included below is the necessary information and discussion to amend specific sections of the California Building Standards Code (California Building Code) to address San Mateo County (County) concerns. There are five major items proposed for re-adoption and/or additions with minor modifications to Division VII of the San Mateo County Building Regulations. This includes: (1) Floor Slab Reinforcement, Section 9104; (2) Class B or Better Roofing, Section 9113; (3) Fire Sprinkler Requirements, Section 9114; (4) Chapter 7A, Section 9117, and (5) the existing Prohibition on Plastic Pipe, Section 9184. These major items require facts and findings stated in this report.

Local jurisdictions are required to adopt new local amendments and re-adopt existing local amendments each time the State adopts new building codes. A local jurisdiction must approve findings that there are specific local topographical, geological and/or climatic conditions that necessitate any major local amendments.

In addition to the proposed five major amendments, the Department proposes nine minor administrative amendments, which do not require facts and findings to be made based on local conditions. These amendments include clarifications and minor additions to existing County code sections and are explained in detail later in this report.

#### **A. PROPOSED MAJOR LOCAL AMENDMENTS**

Each of the proposed major local amendments below include discussion in the following four areas: (1) Proposed Amendment Summary; (2) Finding(s); (3) Local Conditions and Impacts; and (4) Recommendations and Proposed County Code Language.

1. Floor Slab Reinforcement

a. **Proposed Amendment Summary**

Pursuant to State law, the Board of Supervisors of San Mateo County, in its ordinance amending the County Ordinance Code, Division VII, changes or modifies certain provisions of the California Building Standards Code as it pertains to the regulation of the health and safety of buildings. Specifically, such changes or modifications will require minimum reinforcement of floor slabs to reduce deterioration produced by expansion and contraction of soils, such as clay loam and alluvial fans, during periods of heavy rain and extreme dryness.

b. **Finding**

Pursuant to State law including but not limited to Sections 13143.5, 18941.5, 17959.5 and 17958.7 of the California Health and Safety Code, the governing body of San Mateo County finds that the changes or modifications are reasonably necessary because of certain local geological conditions as described below which create situations that can and do result in health and safety conditions that in turn could result in excessive harm and danger to life and property in the community.

c. **Local Conditions**

The following local conditions require the proposed amendment to the California Building Standards Code in order to provide a reasonable degree of health and safety in San Mateo County.

GEOLOGICAL

Expansive Soils

The County is located in a geological area that contains expansive soils such as clay loam and alluvial fans.

Impact

The expansion and contraction of these soils during periods of rain and dryness cause stress to slabs placed on grade. Continuous stress on an unreinforced slab seriously affects the slab, which can result in substantial cracking and deterioration.

d. **Recommendation and Proposed County Code Language**

The Department recommends that the Board approve the following amendment to the California Building Standards Code because the

amendment is reasonably necessary to mitigate the above-described impacts that are caused by local geological conditions.

State Code Provisions, Section 1900.4.4 – Minimum Slab Thickness. The minimum thickness of floor slabs supported directly on the ground shall be not less than 3-1/2 inches (89 mm).

Proposed Provision, San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9104 – Minimum Slab Thickness. The minimum thickness of floor slabs supported directly on the ground shall be not less than 3 1/2 inches (89 mm). The slab shall be supported by not less than 6 inches by 6 inches with 10-gauge wire mesh or approved alternative installed at mid height of the slab.

2. Class B or Better Roofing: Modifications to Existing Fire Sprinkler Requirements, and Re-adoption of Wildland Urban Interface Fire Hazard Area Modifications and the State Fire Hazard Severity Zone Maps

a. **Proposed Amendment Summary**

Pursuant to State law, the Board of Supervisors of San Mateo County, in its ordinance amending the 2010 California Building Standards Code, amends provisions of the California Building Standards Code as it pertains to the regulation of the fire safety of buildings. Specifically, such amendments include: (1) all roofing materials on all new structures and major remodels are to be Class B or better; (2) new structures, with specific exceptions, must install automatic fire sprinkler systems; (3) removing the 75% valuation language in Section 9114.1.c and adding 50% to be in line with current Building Code Standards; (4) removing "Mobile Homes" as one of the exceptions in Section 9114.2.c of the Ordinance. This amendment will be in line with State regulations and not exempting mobile homes and/or manufactured homes from the fire sprinkler requirement; and (5) re-adopt and amend Chapter 7A with minor modifications adding the State Responsibility Area Map. These major amendments are discussed as a group because they are all fire safety related and are all affected by the same local conditions.

b. **Finding**

Pursuant to State law including but not limited to Sections 13143.5, 18941.5, 17958.5 and 17958.7 of the California Health and Safety Code, the governing body of San Mateo County finds that the above changes or modifications are reasonably necessary because of certain local climatic, geological and topographic conditions as described below which create situations which can and do result in extremely uncontrollable and contagious fire situations which can and do result in excessive harm and danger to life and property in the community.

All of the proposed fire safety related amendments help protect structures and firefighters during a fire. Fire resistive roof materials help reduce the spread of windborne fires. Fire sprinklers help suppress fires inside a building and help reduce the amount of water needed from outside sources to suppress the fire. Adoption of the Wildland Urban Interface Fire Hazard Area Modifications and State Fire Hazard Severity Zone Maps assist in identifying areas within San Mateo County that are especially prone to high risk of fire and will require building materials in these zones that reduce the risk of fire damage.

**c. Local Conditions**

The following local conditions make necessary the above amendments to the California Building Standards Code in order to provide a reasonable degree of fire and life safety in San Mateo County.

*CLIMATIC*

*Precipitation and Relative Humidity*

Precipitation ranges from 15 to 24 inches per year with an average of approximately 20 inches per year. Ninety-six percent (96%) falls during the months of October through April and four percent (4%) from May through September. This is a dry period of at least five months each year. Additionally, the area is subject to frequent periods of drought – May 2001 has been rated as the fifth driest May in California records; 2001 also experienced the 17th driest November-February, the 16th driest November-March, the 24th driest October-May, and the 23rd driest June-May periods. Similar periods of continued drought may be expected locally in the future.

Relative humidity remains in the middle range most of the time. It ranges from 45 to 65 percent in the winter. It occasionally falls as low as 15 percent.

*Impact*

Locally experienced dry periods cause extreme dryness of untreated wood shakes and shingles on buildings and non-irrigated grass, brush and weeds, which are often near buildings with wood roofs. Such dryness causes these materials to ignite very readily and burn rapidly and intensely. Because of dryness, a rapidly burning grass fire or exterior building fire can quickly transfer to other buildings with dry shake or shingle roofs by means of radiation or flying sparks and embers. Where there are large and/or numerous buildings with untreated shake or shingle exteriors, a small fire can rapidly grow to a magnitude beyond the control

capabilities of the fire departments, resulting in an excessive fire loss within the community.

The average rainfall in the County is frequently surpassed by concentrated periods of heavy rainfall. These factors, combined with soil types, terrain and existing road systems, have led to landslides and flooding across State, County, and private road systems. The blockage of access routes delays or prevents the ability of fire apparatus to respond to the scene of an emergency.

During 1982 and again in 1998, these conditions resulted in closures of Highway 1 in the Devil's Slide area, Highway 84 in the La Honda area, and Pescadero Road in the Pescadero area for extended periods. Many other County-maintained roads also experience landslides, resulting in closures, or limited traffic capabilities for fire apparatus. Although roads known to be susceptible to closure have been identified by CalTrans and the County, clearing of these routes is dependent upon knowledge and availability of resources. Thus, a road closure could prevent fire fighter access during a critical period.

Following past rains, partial or complete road blockages were found on Tunitas Creek Road, Bear Gulch West, Oak Knoll, Springdale, Glenloch Way, Alpine Road, Cloverdale, and Pescadero Road.

#### Temperatures

Temperatures from June through September average above 80° F. Temperatures as high as 110° F have been recorded, and it is not unusual to experience several continuous days with temperatures in the mid to high 90s. These extended periods occurred in July 1988, July 1990, October 1991 and more recently August and September 1998.

#### Impact

High temperatures cause rapid fatigue and heat exhaustion of fire fighters, thereby reducing their effectiveness and ability to control large wildland fires, which can endanger buildings, or large fires involving either interiors or exteriors of buildings. This limited ability results in losses of buildings without automatic fire protection systems.

Local high temperatures occasionally cause loss of electrical power in all or portions of communities within the County due to overloading from air conditioning equipment or other temperature-related stresses on the electrical utilities. Water storage and delivery systems within the County depend primarily or entirely upon electrical power for both domestic and fire flow delivery. Extended periods of power loss reduce the amount of storage available for suppression of wildland and structural fires.

Another impact from high temperatures is that combustible building materials and non-irrigated weeds, grass and brush are preheated, thus causing these materials to ignite more readily and burn more rapidly and intensely. Additionally, the atmosphere surrounding the materials being of a higher temperature reduces the effectiveness of the water being applied to the burning materials. This requires that more water be more effectively applied, which in turn requires more fire department resources in order to control a fire on a hot day. High temperatures directly contribute to the rapid growth of fires to an intensity and magnitude beyond the control capabilities of the fire departments.

### Winds

Prevailing winds in the area are from the west. However, winds are experienced from virtually every direction at one time or another. Velocities are generally in the 12-MPH range, gusting to 25 to 35 MPH. Forty (40) MPH winds are experienced and winds up to 55 MPH have been registered locally.

### Impacts

Winds such as those experienced locally can and do cause fires, both interior and exterior, to burn and spread rapidly. Fires involving non-irrigated weeds, grass and brush can grow to a magnitude and be fanned to an intensity beyond the control capabilities of the fire department very quickly, even by relatively moderate winds. When such fires are not controlled, they can extend to nearby buildings, particularly those with untreated wood shake or shingle roofs.

Local winds frequently cause damage to electrical transmission lines which then arc, spark and/or break. This can start fires on untreated wood shake or shingle roofs or in dry vegetation, which can spread to nearby untreated wood shake or shingle roofs. Additionally, when power lines are broken by winds, they can result in power outages in large portions of the County.

Local winds frequently cause the breakage of limbs and branches of trees. It is not unusual for local winds to cause trees to fall. In many instances, damage occurs in trees adjacent to electrical transmission and distribution lines. During December 1997, these winds caused broken tree limbs to break power lines, resulting in fires. In 1998, the fire in Frenchman's Creek burned approximately 35 acres. The fire burning concurrently in Tunitas Creek burned more than 45 acres of grass, brush, and timbered areas, and resulted in the destruction of a year-round dwelling and another structure.

When interior building fires break open windows, winds can cause smoke and fire to quickly spread to other portions of the building via interior and exterior openings. An interior blowtorch effect can be created by wind when windows on more than one side of the building are open. When an interior fire ventilates through the roof of a building, regardless of the type of roof construction, sparks and embers from the fire are carried by winds to other roofs and to dry weeds, grass and brush, thereby starting additional fires.

When buildings are covered with untreated wood shake or shingle roofs, local wind conditions make them very susceptible to ignition by sparks or embers from other fires and cause them to burn more rapidly and intensely. Burning buildings with wood shake and shingle roofs, in turn give off more sparks and embers to be carried by winds to other buildings.

Winds of the type experienced locally also reduce the effectiveness of exterior water streams used by the fire department on fires involving interior areas of buildings. Local winds will continue to be a definite factor toward causing major fire losses to buildings not provided with fire resistive roofs and automatic sprinkler systems. National statistics frequently cite wind conditions such as those experienced locally as a major factor where conflagrations have occurred.

National statistics also indicate that structures protected by automatic sprinkler systems confine, contain, or control interior fires to the area, or room of origin, reducing the need for exterior hose streams.

## GEOLOGICAL

### Seismicity

The County is located in Seismic Risk Zone 4, which is the worst earthquake area in the United States. Buildings and other structures in Zone 4 can experience major seismic damage. Within San Mateo County are active faults such as San Andreas, San Gregorio, Seal Cove, and other lesser faults. Earthquake activities with nearby epicenters have the potential for the following impacts.

### Impact

A major earthquake could result in the cutting-off of response routes of fire companies by collapsing buildings, overpasses and bridges throughout the County.

Earthquakes of the magnitude experienced locally can cause major damage to electrical transmission facilities, which in turn cause power failures while at the same time starting fires throughout the County. The

occurrence of multiple fires will quickly disperse existing fire department resources, thereby reducing and/or delaying their response to any given fire.

Even minor seismic activity has an adverse impact on fire protection. Any earth movement which causes buildings to move creates cracking and warping of area separation walls, smoke barriers, door frames, etc., thereby negating the effectiveness of these structural elements which are intended to prevent fire and smoke from spreading within the building.

### Soils

The area is replete with various soils which are unstable, clay loam and alluvial fans being predominant. These soil conditions are moderately to severely prone to swelling and shrinking, and are plastic and tend to liquefy, depending upon moisture content.

### Impact

The swelling, shrinking, shifting and settling of local soils cause shifting and warping of buildings built upon them. As noted above, any earth movement which causes buildings to move creates cracking and warping of area separation walls, smoke barriers, door frames, etc., thereby negating the effectiveness of structural elements intended to prevent fire and smoke from spreading within a building.

Additionally, these soils are susceptible to seismic shock and moisture concentrations. This may result in landslides in hilly and creek side areas, which often exceed 30 percent slopes and can obstruct roads used for response by the fire department. Such restriction of response routes can result in major fire losses in locations where buildings are covered with untreated wood shakes or shingles, particularly where these structures have no automatic fire protection systems such as sprinklers.

## TOPOGRAPHIC

### Vegetation

Highly combustible dry grass, weeds and brush are common in the hilly and open space areas adjacent to built-up locations six to eight months of each year. When these areas experience wildland fires, they immediately threaten nearby buildings, particularly those with wood roofs. This condition can be found throughout the County, especially in those developed and developing areas of the County, which interface and intermix with adjoining wildlands.

Examples of fires of this type include the San Mateo Highlands in 1988, Devonshire Canyon in 1990, and Palomar Park in 1991. On the morning of October 16, 1991, a structure fire occurred on Sylvan Way in Emerald Lakes Hills. The fire quickly spread to adjacent trees and vegetation, and debris and ash fell into unburned vegetation and onto adjacent structures in an area more than 400 feet around the fire. The morning fog, which cleared during suppression activities, contributed to the lack of fire spread in the vegetation. An undetected ember landed in an abandoned redwood septic tank approximately 175 feet from the fire, and smoldered for nearly twelve hours before breaking into open flame and spreading to surrounding grasses.

#### Impact

Fire involving large areas of dry vegetation can quickly grow to a magnitude beyond the control capabilities of a fire department. Such fires give off sparks, embers and radiated heat that easily ignite untreated wood shakes and shingles on nearby buildings. When such a situation occurs, fire department resources may not be able to prevent major fire losses in locations with such conditions.

#### Surface Features

The arrangement and location of natural and manmade surface features, including hills, creeks, highways, housing tracts, individual dwelling units, commercial development, open space areas, streets and roads, combine to limit feasible response routes for fire department resources in and to County areas.

#### Impact

The limited number of response routes and lack of feasible alternate routes subject responding fire department units to significant delays in arriving at fires. As the community and environs continue to grow without compensating increases in traffic arterials, the traffic congestion problem becomes correspondingly worse. Delays result in an insufficient number of fire department resources arriving early to effectively control fires involving buildings with untreated wood shake and shingle roofs or with interiors not having automatic fire protection systems. The result can be serious fire losses at such buildings.

Additional delays including total blockage of existing access routes must be anticipated particularly where they traverse the hilly areas serving many communities. These delays result from a combination of residents attempting to flee or enter the fire area and spectators driving and/or parking along normal or alternate access roads. Fire damage from these delays and complete inability to reach fire scenes by fire apparatus is

intensified and results in the need for additional suppression resources to obtain control.

### Buildings, Landscaping and Terrain

Many of the new buildings and building complexes have building and landscaping features and designs, which preclude or greatly limit any approach or operational access to their exteriors by fire department vehicles. There are many concentrations of houses and other buildings in the County with untreated wood shake or shingle roofs, which are well within 20 feet of each other. There are many such buildings to which access by fire fighting personnel to all but one side is made virtually impossible due to landscaping, fences, slopes or other buildings.

### Impact

When fire department vehicles and personnel cannot gain access to the exteriors of buildings involved with fire, it becomes necessary to conduct all extinguishing and ventilating operations via the interior. It also requires that equipment must be carried for long distances from fire vehicles to the fire location. Such operations quickly exhaust fire personnel both in numbers and in stamina. Access problems often result in severely delaying, misdirecting or making impossible fire and smoke control efforts such as locating the seat of the fire, applying hose streams and locating and opening windows or roofs for ventilating. This can result in extensive heat, smoke and water damage in much of the building not originally involved in the fire. Access problems increase the potential for, and numbers of, injuries sustained by fire fighting personnel.

When fire department access to buildings with burning wood shakes or shingles is precluded, the fires continue to spread both through the involved building and then to other buildings with similar exterior coverings. The combination of buildings with untreated wood shake or shingle roofs and without fire sprinkler systems located in close proximity to each other, and with impeded access for the fire department, these situations can readily result in multiple building fires and major fire losses.

### Electrical Power Transmission Equipment

Above-ground electrical power transmission lines suspended on poles and towers exist throughout the County. Many power line poles are located adjacent to streets and roads and many of the transmission wires are suspended above large areas of dry vegetation and near untreated wood shake or shingle roofs. Most of the electrical power provided within the County is supplied via aboveground facilities.

### Impact

Above-ground electrical power transmission lines are subject to damage from overloading, winds, trees, earthquakes and collisions from motor vehicles and aircraft.

When damaged, these facilities often start fires involving dry vegetation and/or untreated wood shakes or shingles from the resultant arcing and sparking. Frequently, such damage results in numerous fires being started simultaneously, thereby quickly dispersing available fire department forces. This in turn results in delayed and/or limited response by the fire department to any given fire, thereby causing excessive fire damage due to limited fire department capacity.

Damaged electrical lines often fall onto streets, thereby obstructing response routes from fire stations to fire locations, which again results in excessive fire damage due to limited and/or delayed response by the fire department.

Also, damage to electrical transmission lines frequently results in large areas of the community being without power for extended periods of time. Unless a building involved in a fire located in a powerless area has its own automatic fire alarm system containing an emergency power supply or fire sprinkler system, fire can result in major damage and possible loss of life.

Additionally, the existence of above-ground electrical transmission poles and lines along streets and near buildings often results in partial to complete obstruction of exterior operations and access to the building by fire department aerial apparatus. This again limits the effectiveness and capabilities of the fire department and contributes to extensive fire losses.

#### **d. Recommendations and Proposed County Code Language**

The Planning and Building Department recommends the following four amendments to the California Building Standards Code because they are necessary to mitigate the above-described impacts, which are caused by local climatic, geological and topographic conditions.

##### Class B, or Better, Fire Resistive Roofing

This proposed amendment would require all new homes or structures undergoing a re-roofing project within the unincorporated area of San Mateo County to have Class B or better fire resistive roofing.

State Code Provisions, Section 1503.3 - Minimum Roof Covering Requirements

Since 1995, California State Code provisions have required every new structure, and every existing structure, when 50 percent or more of the total roof area is re-roofed within any one-year period commencing any date on or after July 1, 1995, to have a Class C fire retardant roof covering.

Proposed Provision, San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9113

1. The following requirements shall apply to all new buildings or structures and existing structures, that require a building permit issued by San Mateo County.
  - a. The roof covering for every new building or structure, or any existing building or structure which is undergoing a re-roof and all materials applied as part of a roof covering assembly, shall have a minimum fire rating of Class B or higher, treated in accordance with California Building Standards Code, Standard 15-2. Where required by the California Building Standards Code or other provision of law, roof coverings must meet a higher fire rating.
  - b. Subsection 1.a of this section shall not apply to buildings or structures that are less than 120 square feet in floor area.
  - c. Any person installing or constructing roof covering shall, immediately upon completion of the roof covering, provide certification of the roof covering classification to the building owner and to the inspection authority having jurisdiction.
2. The requirements of this section are minimum standards for new construction and re-roofing of existing structures. Where the International Building Code, International Residential Building Code, International Fire Code, or the California Building Standards Code contains higher standards or additional or more stringent requirements than required by this section, those additional or more stringent requirements shall apply. Further, nothing in this section shall prevent any fire authority having jurisdiction from adopting and enforcing regulations imposing more stringent requirements than those provided by this section.

### Fire Sprinkler Requirement Modifications

This proposed amendment would require that automatic fire extinguishing systems be provided in all new structures, with specific exceptions.

The primary proposed modification to the existing fire sprinkler requirements is that the current exemption of some habitable structures of 1,000 square feet or less would be removed. Cal-Fire supports this amendment for life-safety reasons because many people reside in residences of 1,000 square feet or less.

### State Code Provisions, Section 903.1. Automatic Fire Sprinkler Systems – Minimum Requirements

Section 903.1 requires the installation of automatic fire sprinkler systems in certain occupancies and specifically exempts existing (R-3) single-family dwellings.

### Proposed Provision, San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9114

1. The following proposed requirements shall apply to all new buildings or structures, that require a building permit issued by San Mateo County.
  - a. Except as otherwise provided by this section, or as provided under Section 903.1 of the California Building Standards Code, automatic fire sprinkler systems shall be installed and maintained in every new building or structure of any type of construction, use, occupancy or size which requires a building permit issued by San Mateo County.
  - b. The term "automatic fire sprinkler system" as used in this section means an integrated system of underground and overhead piping, including a water supply such as a gravity tank, fire pump, reservoir, pressure tank, or connection by underground piping to a fire main, which system complies in all respects with the requirements for such systems contained in standards issued by the National Fire Protection Association based upon occupancy classification.
  - c. An automatic fire sprinkler system shall be provided throughout an existing structure when a building permit is issued to allow additions, alterations, or repairs within any 12-month period, which increase the value of the structure by 50% for one- and two-family dwellings.

- d. Automatic fire sprinklers shall be installed in any garage or carport and breezeway attached to any structure for which a fire sprinkler system is required. A detached non-habitable garage, 1,000 square feet or more in size, and/or which has an attached studio or workshop shall require the installation of an NFPA-13 light hazardous automatic fire sprinkler system.
2. The following structures are exempt from the requirements of this section.
- a. **Agricultural Buildings.** For the purpose of this section, an "agricultural building" is defined as a non-residential structure designed and constructed to house farm implements, hay, grain, poultry, livestock, or other horticultural products. "Agricultural building" includes a place of employment where agricultural products are processed, treated or packaged. Office uses within agricultural buildings shall not exceed ten percent (10%) of the total floor area of the building unless such buildings are provided with an automatic fire sprinkler system throughout. "Agricultural buildings" shall include greenhouses.
  - b. Non-residential structures less than 1,000 square feet.
  - c. Mobile homes, recreational trailers, fifth wheels, and similar structures used for temporary housing during the construction of a permitted building.
  - d. Mausoleums of Type I construction, as defined by the California Building Standards Code, which do not contain offices, chapels, stores, or other places of public occupancy for purposes other than parking of vehicles.
  - e. Open-air parking garages of Type I construction, as defined by the California Building Standards Code, which do not contain offices, chapels, stores, or other places of public occupancy for purposes other than parking and are detached from other buildings.
  - f. Car wash structures where no offices or waiting rooms are attached.
3. Additions, alterations or modifications to any existing structure containing automatic fire sprinklers shall require the extension or modification of the fire sprinkler system throughout the added, altered, or modified areas.

Plans for the installation, extension or modification of an automatic sprinkler system shall be submitted to the Planning and Building Department of San Mateo County for review and approval by the appropriate fire department or district prior to installation. Additions, alterations, or remodels to an existing dwelling previously equipped with automatic sprinklers shall require the submittal of three sets of sprinkler plans and hydraulic calculations. All components of the existing system shall be submitted for review to determine compliance with the applicable standards.

4. All automatic fire sprinkler systems shall comply with the most current adopted edition of NFPA-13, NFPA 13-D, NFPA-13-R and any additional County specifications, or modifications imposed by supplemental rules and regulations adopted by the County of San Mateo.
5. The installation of an automatic fire suppression system may be required by the Building Official when an alteration, addition or change in use or occupancy of a building or portion of a building thereof increases the hazard of fire or threat to life and safety.
6. The requirements of this section are intended to represent minimum standards for new construction. Nothing in this section shall prevent any fire authority having jurisdiction from adopting and enforcing any regulations, which impose more stringent requirements. Further, any requirements of the Uniform Building Code, International Fire Code or the California Building Standards Code, which is more restrictive, specify higher standards or mandates specific locations within a structure for automatic sprinkler systems shall be applicable.

*Re-Adopt and Amend Wildland Urban Interface Fire Hazard Area Modifications and State Fire Hazard Severity Zone Maps*

The adoption of these amendments and maps would require that all new homes or structures/buildings built within designated Fire Hazard Areas follow the standards put forth by Chapter 7A of the 2010 California Building Code.

*State Code Provisions - Chapter 7A of the 2010 California Building Standards Code*

Chapter 7A of the 2010 California Building Standards Code and the State Fire Hazard Severity Zone Maps provide new standards for all new buildings built within designated Fire Hazard Areas. New buildings within these designated areas would be required to use state approved fire.

resistant materials such as hardi-plank or stucco and maintain specific clearances around structures.

*Proposed Provision, San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9117*

The proposed following requirements shall apply to all new buildings or structures that require a building permit issued by San Mateo County.

Chapter 7A of the 2010 California Building Standards Code, and the State Responsibility Area (SRA) and Local Responsibility Area (LRA) Fire Hazard Severity Zone maps, shall apply to all new buildings in the County that require a building permit.

3. Plastic Pipe Prohibition

a. **Proposed Amendment Summary**

Pursuant to State law, the Board of Supervisors of San Mateo County, in its ordinance amending the County Ordinance Code, Division VII, changes or modifies certain provisions of the Uniform Plumbing Code and the California Building Standards Code as it pertains to the regulation of the health and life safety of buildings. Specifically, such proposed amendments would include the continued prohibition of the use of Acrylonitrile Butadiene Styrene (ABS), and Polyvinyl Chloride (PVC) drain, waste and venting plumbing systems on or within structures, and that the use of Polyvinyl Chloride (PVC), Chlorinated Polyvinyl Chloride (CPVC), and cross-linked Polyethylene (PEX) potable water piping systems would also be prohibited from use.

b. **Finding**

Pursuant to State law including but not limited to Sections 13143.5, 18941.5, 17959.5 and 17958.7 of the California Health and Safety Code, the governing body of San Mateo County finds that the above amendments are reasonably necessary because of certain local climatic, and geological conditions as described below which create situations which can and do result in health and safety conditions which in turn result in excessive harm and danger to life and property in the community.

c. **Local Conditions**

The following local conditions make necessary the amendment to the Uniform Plumbing Code and the California Building Standards Code in order to provide a reasonable degree of health and life safety in this County.

## CLIMATIC

### Precipitation and Relative Humidity

Precipitation ranges from 15 to 24 inches per year with an average of approximately 20 inches per year. Ninety-six percent (96%) falls during the months of October through April and 4 percent from May through September. This results in a dry period of at least five months each year. Additionally, the area is subject to multi-year periods of drought each decade—the last one occurring from 1986 until the winter of 1992. Continued periods of drought are expected locally in the future.

Relative humidity remains in the middle range most of the time. It ranges from 45 to 65 percent in the winter and occasionally falls as low as 15 percent.

### Impact

Locally experienced dry periods cause extreme dryness. Plastic piping such as ABS, PVC, PE and CPVC is of low strength and hardness, with low heat stability, high thermal expansion, and very low chemical resistivity. Extended or repeated periods of drought cause ABS, PVC, PE, PEX and CPVC piping to become brittle.

Rigid plastic pipe systems that have become brittle cannot flex sufficiently to absorb stresses from building shaking or settlement or from thermal expansion. Retained stresses readily damage plastic piping, particularly at solvent-welded joints.

Damage to brittle pipe during seismic activity can cause raw sewage to discharge into wall cavities and under-floor areas providing the potential of disease and infection. Potable water piping systems that are damaged during seismic activity provide the potential of cross-contamination or back siphonage into the domestic water systems or groundwater aquifers.

### Temperatures

Temperatures from June through September average above 80° F. Temperatures as high as 110° F have been recorded, and it is not unusual to experience several continuous days with temperatures in the mid to high 90s. These extended periods occurred in July 1988, July 1990, October 1991 and in August and September 1998.

### Impact

High temperatures cause plastic pipe to become brittle. Rigid plastic pipe systems that have become brittle cannot flex sufficiently to absorb

stresses from building shaking or settlement or from thermal expansion. Retained stresses readily damage plastic piping, particularly at solvent-welded joints.

Once again, damage to brittle pipe during seismic activity can cause raw sewage to discharge into wall cavities and under-floor areas providing the potential of disease and infection. Potable water piping systems that are damaged during seismic activity provide the potential of cross-contamination or back siphonage into the domestic water systems or groundwater aquifers.

## GEOLOGICAL

### Seismicity

The County is located in Seismic Risk Zone 4, which is the worst earthquake area in the United States. Buildings and other structures in Zone 4 can experience major seismic damage. Within San Mateo County are located the San Andreas, San Gregorio, Seal Cove, as well as numerous other lesser faults. Additionally, San Mateo County is located relatively close to active faults located in Alameda County, Santa Clara County and Santa Cruz County. Earthquake activities with nearby epicenters have the potential for the following impact.

### Impact

An earthquake of even mid magnitude could result in structural damage to structures, including damage to plastic pipe systems. With plastic susceptible to breaking at the joint, it makes such a system easily damaged by any shifting or settling of the structure during a seismic event. Where metal piping may have enough strength to hold, plastic would not. The failure of plastic piping and the problems attendant to release of sewage or contamination of domestic water systems would certainly exacerbate the problems after a seismic event.

#### **d. Recommendations and Proposed County Code Language**

The following changes and/or modifications to the 2010 California Plumbing Code and the California Building Standards Code are recommended to mitigate the above-described impacts, which are caused by local climatic and geological conditions.

### State Code Provisions

The existing State Code allows the use of ABS and PVC piping for drain and waste systems and plumbing venting systems for structures not exceeding three floors above grade.

The existing State Code also allows the use of ABS, PVC, CPVC, PE, and PEX piping for potable water distribution systems.

Proposed Continuation of San Mateo County Ordinance Code, Division VII, Chapter 3, Article 3, Section 9184, Prohibiting Plastic Pipe for potable water

1. Chapter 6 of the Uniform Plumbing Code is hereby amended to read as follows:

**Section 604.0 Materials**

**Section 604.1.** All pipe, tube, and fittings carrying water used in potable water systems intended to supply drinking water shall meet the requirements of NSF 61 as found in Table 14-1. All materials used in the water supply system, except valves and similar devices, shall be of a like material, except where otherwise approved by the authority having jurisdiction. Materials for building water piping and building supply piping shall be in accordance with Table 6-4 and the standards in Table 14-1 except that all potable water piping and fittings shall be of brass, copper, cast iron, galvanized malleable iron, galvanized wrought iron, and galvanized steel. All materials used in the water supply system, except valves and similar devices shall be of like material.

Additional Exceptions:

- (1) [OSHPD 1, 2, 3 and 4] Use of CPVC is not permitted for applications under authority of the Office of Statewide Health Planning and Development.
- (2) [OSHPD 1, 2, 3 and 4] Use of PEX piping is not permitted for applications under the authority of the Office of Statewide Health Planning and Development.
- (3) [OSHPD 1, 2, 3 and 4] Use of PEX-AL-PEX piping is not permitted for applications under the authority of the Office of Statewide Health Planning and Development.
- (4) [AGR, DHS] Use of PEX piping is not adopted for applications under the authority of the Department of Health Services and the Department of Food and Agriculture.

**Section 604.1.1. Local Authority to Approve CPVC Pipe Within Residential Buildings Under "Specified" Conditions.** [HCD 1 and HCD 2] All potable water piping and fittings shall be of brass,

copper, cast iron, galvanized malleable iron, galvanized wrought iron, and galvanized steel. All materials used in the water supply system, except valves and similar devices shall be of like material. The Building Official, in accordance with the procedures set forth in Chapter 3, shall authorize by permit the use of CPVC for non-potable hot and cold water distribution systems within the interior of residential buildings provided all of the following conditions are satisfied:

(a) Permit Conditions. Any building permit issued pursuant to Section 604.1.1 shall be conditioned on compliance with the mitigation measures set forth in this section.

(b) Approved Materials. Only CPVC plumbing material listed as an approved material and installed in accordance with this code may be used.

(c) Installation and Use. Any installation and use of CPVC plumbing material pursuant to this section shall comply with all applicable requirements of this code and Section 301.0 of Appendix I of this code, Installation Standard for CPVC Solvent Cemented Hot and Cold Water Distribution Systems, IAPMO IS 20-2005.

(d) Certification of Compliance. Prior to issuing a building permit pursuant to Section 604.1.1, the building official shall require as part of the permitting process that the contractor, or the appropriate plumbing subcontractors, provide written certification: (1) that is required in subdivision (e), and (2) that he or she will comply with the flushing procedures and worker safety measures set forth in Section 301.0 of Appendix I of this code, Installation Standard for CPVC Solvent Cemented Hot and Cold Water Distribution Systems, IAPMO IS 20-2005.

(e) Worker Safety. Any contractor applying for a building permit that includes the use of CPVC plumbing materials authorized pursuant to this section shall include in the permit application a signed written certification stating that: (1) They are aware of the health and safety hazards associated with CPVC plumbing installations; (2) They have included in their Injury and Illness Prevention Plan the hazards associated with CPVC plumbing pipe installations; and (3) The worker safety training elements of their Injury and Illness Prevention Plan meet the Department of Industrial Relation's guidelines.

(f) Findings of Compliance. The building official shall not give final permit approval of any CPVC plumbing materials installed pursuant to Section 604.1.1 unless he or she finds that the material has been

installed in compliance with the requirements of this code and that the installer has complied with the requirements in Section 1.2.1 of Appendix I of this code, Installation Standards for CPVC Solvent Cemented Hot and Cold Water Distribution Systems, IAPMO IS 20-2005.

(g) **Penalties.** Any contractor or subcontractor found to have failed to comply with the ventilation, glove or flushing requirements of Section 1.2.2 of Appendix I of this code, Installation Standards for CPVC Solvent Cemented Hot and Cold Water Distribution Systems, IAPMO IS 20-2005, shall be subject to the penalties in Health and Safety Code, Division 13, Part 1.5, Chapter 6 (Section 17995 et. seq.). In addition, if during the conduct of any building inspection the building official finds that the ventilation and glove requirements of Section 1.2.2 of Appendix I of this code, "Special Requirements for CPVC Installation within Residential Buildings," are being violated, such building officials shall cite the contractor or subcontractor for that violation.

**Section 604.5.** Cast-iron fittings up to and including two (2) inches (51 mm) in size, when used in connection with potable water piping, shall be galvanized.

2. Chapter 7 of the Uniform Plumbing Code is hereby amended to read as follows:

**Section 701.0. Materials**

**Section 701.1.** Drainage piping shall be cast iron, galvanized steel, galvanized wrought iron, copper, brass, Stainless Steel 304 or 316L, Schedule 40 ABS (DWV), Schedule 40 PVC (DWV), extra-strength vitrified clay pipe, or other approved materials having a smooth and uniform bore, except that:

**Section 701.1.1.** No galvanized wrought-iron or galvanized steel pipe shall be used underground and shall be kept at least six (6) inches (152 mm) aboveground.

**Section 701.1.2.** ABS and PVC (DWV) piping installations shall be limited to underground installation outside of the structure, and in accordance with IS 5, IS 9, and Chapter 15, "Firestop Protection." Except for individual single-family dwelling units, materials exposed within ducts or plenums shall have a flame-spread index of not more than 25 and a smoke-developed index of not more than 50, when tested in accordance with the Test for Surface - Burning Characteristics of the Building Materials. (See the Building Code standards based on ASTM E-84 and ANSI/UL 723.)

3. Chapter 9 of the Uniform Plumbing Code is hereby amended to read as follows:

**Section 903.0. Materials**

**Section 903.1.** Vent pipe shall be cast iron, galvanized steel, galvanized wrought iron, copper, brass, Schedule 40 ABS DWV, Schedule 40 PVC DWV, Stainless Steel 304 or 316L (Stainless Steel 304 pipe and fittings shall not be installed underground and shall be kept at least six (6) inches (152 mm) aboveground), or other approved materials having a smooth and uniform bore. ABS and PVC shall not be approved for use for vent piping or fittings except for underground installation beginning two (2) feet outside the structure.

**Section 903.1.1.** No galvanized wrought-iron or galvanized steel pipe shall be used underground and shall be kept at least six (6) inches (152 mm) aboveground.

**Section 903.1.2.** ABS and PVC (DWV) piping installations shall be installed in accordance with IS 5, IS 9, and Chapter 15, "Firestop Protection." Except for individual single-family dwelling units, materials exposed within ducts or plenums shall have a flame-spread index of not more than 25 and a smoke-developed index of not more than 50 when tested in accordance with the Test for Surface - Burning Characteristics of the Building Materials (see the Building Code standards based on ASTM E-84 and ANSI/UL 723).

**Section 903.1.2.1.** [For OSHPD 1, 2, 3 and 4] ABS and PVC installations are not allowed.

**Section 903.1.3.** [HCD 1 and HCD 2] ABS or PVC installations are limited to not more than two stories of areas of residential accommodation.

B. **PROPOSED MINOR LOCAL ADMINISTRATIVE CODE AMENDMENTS**

In addition to the adoption of the California Building Standards Code with the above proposed local amendments, the proposed ordinance also re-adopts San Mateo County Ordinance Code, Division VII and amends several sections of the San Mateo County administrative codes. Administrative codes are not held to the same standard as building codes, in that no specific findings are required to adopt these regulations. These administrative codes contain such standards as permit requirements, application procedures, the number of plan sets required, permit term limits, and similar procedures. There are nine minor local amendments the Department recommends. The proposed re-adoption and/or amendments include the following

topics: (1) amending Violation and Penalties; (2) amending Investigation Fees; (3) amending Final Inspection and Addressing; (4) adopting the 2010 California Building Standards Code (Building Code Section 9100); (5) adding Section 9118, California Residential Code; (6) adding Section 9119, California Green Building Standards Code; (7) amending California Electrical Code, Section 9150; (8) amending California Plumbing Code, Section 9180; (9) amending California Mechanical Code, Section 9200, and wording that officially adopts the California Building Standards Code, Mechanical Code, Electrical Code and Plumbing Code, with local amendments.

Discussion and proposed language for each amendment follows below.

1. Violations and Penalties

a. Proposed Amendment

Currently, Chapter 1.08 of the County Ordinance Code addresses penalties for violations of the building code and construction codes. Section 9015(2) is proposed to be changed by adding the following clarifying language: A Stop Work Notice will be posted at the address of the violation(s) and a \$500.00 per day fine will be applied to the owner(s) and/or the address in violation. The Community Development Director and/or the Building Official may reduce or waive the fine, if the property owner(s) in violation apply for their permit(s) within ten business days after the Stop Work Notice has been posted.

b. Rationale

The proposed clarifying language will provide the Planning and Building Department with the necessary language required for issuing Stop Work Notices and requiring property owners obtain the necessary permits in a timely manner. All construction without the benefit of a building permit puts the occupants at risk of fire, inadequate seismic compliance, inadequate electrical, plumbing and/or gas pipe installations, inadequate mechanical ventilation, and/or unsanitary conditions. This language is necessary to enforce the Planning and Building Department's mandate to protect life and property.

c. Proposed Ordinance Code Language

**SECTION 9015. VIOLATIONS AND PENALTIES**

1. It shall be unlawful for any person, firm, or corporation to erect, install, construct, enlarge, alter, repair, move, improve, remove, replace, convert, equip, use, occupy, maintain or demolish any building, structure or equipment therein regulated by this code or the construction codes, or cause the same to be done, contrary to

or in conflict with or in violation of any of the provisions of said code or codes.

2. Any person, firm, or corporation violating any of the provisions of this code or the construction codes shall be deemed guilty of a misdemeanor as provided in Title 1, Chapter 1.08, Section 1.08.010 of the San Mateo County Ordinance Code, a Stop Work Notice will be posted at the address of the violation(s), and a \$500.00 per day fine will be applied to the owner(s) and/or the address in violation. The Community Development Director and/or the Building Official may reduce this fine to zero if the property owner(s) in violation apply for their permit(s) within ten business days after the Stop Work Notice has been posted.

## 2. Investigation Fees

### a. Proposed Amendment

Currently, Section 9041 of the County Building Regulations reads as follows. No changes are proposed for subsections 1-4. Subsection 5 would provide additional clarifying language to assist in determining minor violations.

1. The Board of Supervisors hereby finds that there is a substantial cost to the County in identifying and investigating construction or work commenced without first obtaining the prescribed permits therefor, or done in violation of prescribed permits, and in assuring compliance with permit requirements and other pertinent County code provisions when such violations are determined to exist. The Board of Supervisors further finds that a reasonable measure of the cost to the County in identifying, investigating and obtaining compliance for such violations is ten times the value of the applicable permit, and that this cost should be borne by the violator in the form of an investigation fee to be assessed as set forth in Subsection 2, of this section.
2. Whenever any construction or work for which permit is required by this code or by any other code incorporated by reference and made a part of this code, is started or commenced without the prescribed permit having first been obtained, an investigation fee in the amount of ten times the prescribed permit fee shall be added to the permit fee, and shall be collected at time of application for the permit. Such investigation fee shall be collected for each separate and distinct permit required for a specific project. Where a permit has been previously obtained, but construction or work is commenced which goes beyond the scope of the permit, or is in violation of the terms of the permit, the above described investigation fee shall be

assessed for such portion of the construction or work done beyond the scope of, or in violation of, the permit. This investigation fee shall be required and collected whether or not a permit is then or subsequently issued. The maximum investigation fee, which may be assessed and collected as to any individual permit, shall be three thousand dollars (\$3,000.00). Nothing in this section shall relieve any person(s) from fully complying with the requirements of this code, or with any codes incorporated by reference and made a part of this code, in the execution of the work, or from any other penalties prescribed by law.

3. Whenever any Farm Labor Housing, temporary or permanent, has been found to have been installed, constructed, altered or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fees shall be based on an hourly cost to compensate staff time spent on processing the violation.
4. Whenever Low Income or Affordable Housing, temporary or permanent, has been found to have been installed, constructed, altered, or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.
5. The Community Development Director and/or the Building Official shall have the authority to adjust investigation fees for minor violations, as listed below, provided such violation is a first offense, (and/or extenuating circumstances as determined by either the Community Development Director or the Building Official). In no case shall the investigation fee be reduced to less than two times the permit fee, plus the permit fee. Such reduction in investigation fees shall not relieve the applicant from full compliance with all applicable codes and zoning regulations. Such reduced investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.
  - a. Water heater installations or replacements.
  - b. Furnace/heater installations or replacements.
  - c. Recreational decks for single-family dwellings.
  - d. Re-roofing of a single-family dwelling.

- e. Electrical service changes to a single-family dwelling.
  - f. Non-habitable accessory structures not exceeding 200 square feet.
  - g. Water or sewer line replacements for single-family dwellings.
  - h. Fences.
  - i. Kitchen or bathroom remodels of single-family dwellings.
  - j. Minor improvements involving structural changes or modifications.
6. The Building Official or authorized representative shall have the authority to issue an Information Notice in lieu of a Stop Work Notice for minor violations listed above or in the event that work has just begun on other violations. The issuance of an Information Notice shall waive the requirement for investigation fees provided that the work stops immediately and the violator has contacted the Planning and Building Department to initiate the permit process within ten (10) working days of the issuance of the Information Notice. Failure to comply with these two requirements will result in the issuance of a Stop Work Notice and shall also result in the disqualification of the reduction of investigation fees as allowed in Item #5 of this section.

b. Rationale

These proposed clarifications will assist the Department and the public in determining what constitutes a minor violation, while providing flexibility for staff and retaining the appeal process for the applicant and/or property owner.

c. Proposed Ordinance Code Language

**SECTION 9041. INVESTIGATION FEES.**

1. The Board of Supervisors hereby finds that there is a substantial cost to the County in identifying and investigating construction or work commenced without first obtaining the prescribed permits therefor, or done in violation of prescribed permits, and in assuring compliance with permit requirements and other pertinent County code provisions when such violations are determined to exist. The Board of Supervisors further finds that a reasonable measure of the cost to the County in identifying, investigating and obtaining compliance for such violations is ten times the value of the

applicable permit, and that this cost should be borne by the violator in the form of an investigation fee to be assessed as set forth in Subsection 2, of this section.

2. Whenever any construction or work for which permit is required by this code or by any other code incorporated by reference and made a part of this code, is started or commenced without the prescribed permit having first been obtained, an investigation fee in the amount of ten times the prescribed permit fee shall be added to the permit fee, and shall be collected at time of application for the permit. Such investigation fee shall be collected for each separate and distinct permit required for a specific project. Where a permit has been previously obtained, but construction or work is commenced which goes beyond the scope of the permit, or is in violation of the terms of the permit, the above described investigation fee shall be assessed for such portion of the construction or work done beyond the scope of, or in violation of, the permit. This investigation fee shall be required and collected whether or not a permit is then or subsequently issued. The maximum investigation fee which may be assessed and collected as to any individual permit shall be three thousand dollars (\$3,000.00). Nothing in this section shall relieve any person(s) from fully complying with the requirements of this code, or with any codes incorporated by reference and made a part of this code, in the execution of the work, or from any other penalties prescribed by law.
3. Whenever any Farm Labor Housing, temporary or permanent, has been found to have been installed, constructed, altered or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fees shall be based on an hourly cost to compensate staff time spent on processing the violation.
4. Whenever Low Income or Affordable Housing, temporary or permanent, has been found to have been installed, constructed, altered, or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.
5. The Community Development Director and/or the Building Official shall have the authority to adjust investigation fees for minor violations, as listed below, provided such violation is a first offense, and/or extenuating circumstances as determined by either the Community Development Director or the Building Official. In no

case shall the investigation fee be reduced to less than two times the permit fee, plus the permit fee. Such reduction in investigation fees shall not relieve the applicant from full compliance with all applicable codes and zoning regulations. Such reduced investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.

- a. Water heater installations or replacements.
  - b. Furnace/heater installations or replacements.
  - c. Recreational decks for single-family dwellings.
  - d. Re-roofing of a single-family dwelling.
  - e. Electrical service changes to a single-family dwelling.
  - f. Non-habitable accessory structures not exceeding 200 square feet.
  - g. Water or sewer line replacements for single-family dwellings.
  - h. Fences.
  - i. Kitchen or bathroom remodels of single-family dwellings.
  - j. Minor improvements involving structural changes or modifications.
6. The Building Official or authorized representative shall have the authority to issue an Information Notice in lieu of a Stop Work Notice for minor violations listed above or in the event that work has just begun on other violations. The issuance of an Information Notice shall waive the requirement for investigation fees provided that the work stops immediately and the violator has contacted the Planning and Building Department to initiate the permit process within ten (10) working days of the issuance of the Information Notice. Failure to comply with these two requirements will result in the issuance of a Stop Work Notice and shall also result in the disqualification of the reduction of investigation fees as allowed in Item #5 of this section.

### 3. Final Inspection and Addressing

#### a. Proposed Amendment

Staff is proposing to add Number 3 below to this code section.

1. There shall be a final inspection and approval on all buildings or structures when completed and ready for occupancy. A final inspection approval may, upon notice, be revoked by the Building Official if it is found that construction, work, or equipment fails in any respect to comply with the requirement of these codes, or that the installation is unsafe, dangerous, or a hazard to life or property.
2. The address of the structure must be posted on all buildings in a position such that it is plainly visible and legible from the street or road fronting the property. Buildings with multiple units or tenants must have each unit or suite identified by a separate address or unit number/letter. Where structures are remote to the public or is a private road, additional directional signage may be required at each driveway or roadway intersecting the access to the building or structure. Nothing in this subsection shall prevent any fire authority having jurisdiction from adopting and enforcing regulations imposing more stringent requirements for addressing requirements.
3. The Community Development Director or the Building Official has the authority to change a property address if it is found to be inconsistent or out of sequence with surrounding addresses.

#### b. Rationale

Changes to this section will improve emergency responder's ability to find an address in an emergency. In the past there has been some confusion by emergency personnel responding to an address due to out of sequence numbering or duplication of numbers/addressing. This change will help to reduce the duplication of addresses and/or correct out of sequence numbering, therefore helping emergency responders to save lives.

#### c. Proposed Ordinance Code Language

1. There shall be a final inspection and approval on all buildings or structures when completed and ready for occupancy. A final inspection approval may, upon notice, be revoked by the Building Official if it is found that construction, work, or equipment fails in any respect to comply with the requirement of these codes, or that the installation is unsafe, dangerous, or a hazard to life or property.

2. The address of the structure must be posted on all buildings in a position such that it is plainly visible and legible from the street or road fronting the property. Buildings with multiple units or tenants must have each unit or suite identified by a separate address or unit number/letter. Where structures are remote to the public or is a private road, additional directional signage may be required at each driveway or roadway intersecting the access to the building or structure. Nothing in this subsection shall prevent any fire authority having jurisdiction from adopting and enforcing regulations imposing more stringent requirements for addressing requirements.
3. The Community Development Director or the Building Official has the authority to change a property address if it is found to be inconsistent or out of sequence with surrounding addresses.
4. Adoption of the California Building Standards Code, Electrical Code, Plumbing Code, and Mechanical Code

- a. Proposed Amendments

These sections adopt the latest editions of the California Building Code, Electrical Code, Plumbing Code, and Mechanical Code with any new appendices, amendments, errata, and/or emergency supplements which were not adopted in the last code adoption.

- b. Rationale

As stated above, new editions of the Building Code, Electrical Code, Plumbing Code and Mechanical Code have been adopted in this triennial edition of the California Building Standards Code. In order to effectively administer the County Ordinance Code and the California Building Standards Code, it is necessary for the County to specifically adopt these latest editions, with local amendments as noted in this report.

- c. Proposed Ordinance Code Language

**SECTION 9100. ADOPTION OF 2010 CALIFORNIA BUILDING STANDARDS CODE.** The latest adopted editions of the 2010 California Building Standards Code, Title 24, excluding Part 1, (California Administrative Code) and including the 2010 California Building Code (Part 2), 2010 California Residential Code, Title 24 (Part 2.5), 2010 California Energy Code (Part 6), 2010 California Elevator Safety Construction Code (Part 7), 2010 California Historical Building Code (Part 8), 2010 California Fire Code (Part 9), 2010 California Existing Building Code (Part 10), 2010 California Reference Standards Code (Part 12) and all appendices, amendments, errata, and emergency supplements are hereby adopted and by reference except as otherwise provided in Division VII, as the

Building Code of the County of San Mateo. A copy of the "California Building Standards Code" is on file at the San Mateo County Building Inspection Section. The mandatory requirements of the appendix to the California Building Standards Code shall be enforceable to the same extent as if contained in the body of the Building Code. Any amendments, errata and/or emergency supplements to this code shall be enforceable to the same extent as if contained in the body of the "California Building Standards Code."

**SECTION 9118. ADOPTION OF 2010 CALIFORNIA RESIDENTIAL CODE.** The latest adopted edition of the 2010 California Residential Code, Title 24 (Part 2.5), is hereby adopted and incorporated by reference. All appendices within the referenced standard above and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Residential Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 9119. ADOPTION OF 2010 CALIFORNIA GREEN BUILDING STANDARDS CODE.** The latest adopted edition of the 2010 California Green Building Standards Code, Title 24 (Part 11), is hereby adopted and incorporated by reference. All appendices within the referenced standard above and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Green Building Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 9150. ADOPTION OF 2010 CALIFORNIA ELECTRICAL CODE.** The latest adopted edition of the 2010 California Electrical Code (Title 24, Part 3), based on the 2008 National Electrical Code (NEC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Electrical Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 9180. ADOPTION OF 2010 CALIFORNIA PLUMBING CODE.** The latest adopted edition of the 2010 California Plumbing Code (Title 24, Part 5), based on the 2009 Uniform Plumbing Code (UPC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Plumbing Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 9200. ADOPTION OF 2010 CALIFORNIA MECHANICAL CODE.** The latest adopted edition of the 2010 California Mechanical

Code (Title 24, Part 4), based on the 2009 Uniform Mechanical Code (UMC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Mechanical Code" is on file at the San Mateo County Building Inspection Section.

County Counsel has reviewed and approved the Ordinance as to form and content.

The adoption of the 2010 California Building Standards Code and amendment of the San Mateo County Ordinance Code, Division VII, Building Regulations contributes to the 2025 Shared Vision outcome of a livable community by promoting buildings that are permitted and inspected under the most current code, thus protecting life and property.

**FISCAL IMPACT:**

None.

**ATTACHMENT:**

A. Recommended Findings and Action.

COUNTY OF SAN MATEO  
PLANNING AND BUILDING DEPARTMENT

**RECOMMENDED FINDINGS AND ACTION**

Board Meeting Date: December 14, 2010

Prepared By: Charles Clark, Building  
Inspection Manager

For Adoption By: Board of Supervisors

**RECOMMENDED FINDINGS:**

Regarding the Adoption of the California Building Standards Codes, Find:

1. That the proposed adoption of the current triennial edition of the California Building Standards Codes, Title 24 and all appendices as required by law provide the minimum specific building code requirements for certain occupancies and types of buildings to ensure that structures, which are erected or altered, are constructed in a manner that address the highest level for health, fire, and life safety issues as discussed in the staff report.

Regarding the Re-adoption of the San Mateo County Ordinance Code, Division VII (Building Regulations), Find:

2. That the proposed re-adoption of the San Mateo County Ordinance Code, Division VII (Building Regulations) is required in order to update the regulations every time San Mateo County adopts the California Building Standards Codes and will also provide the minimum specific building code requirements for certain occupancies and types of buildings to ensure that structures, which are erected or altered, are constructed in a manner that address specific local conditions regarding health, fire, and life safety issues as discussed in the staff report.

Regarding the Adoption of the Local Amendments of the California Building Standards Codes, Find:

3. That the proposed adoption of the local amendments of the current triennial edition of the California Building Standards Codes, Title 24 and all appendices provide the minimum specific local building code requirements for certain occupancies and types of buildings to ensure that structures in unincorporated San Mateo County, which are erected or altered, are constructed in a manner that address certain local climatic, geologic, or topographic conditions and to the highest level for health, fire, and life safety issues as discussed in the staff report; specifically:

- a. Regarding slab thickness and reinforcement, that San Mateo County is located in a geological area that contains expansive soils thereby requiring slabs be reinforced to minimize damage from soil expansion and contraction.
- b. Regarding Class B or better roofing, fire sprinkler requirements, and fire hazard area standards, that in San Mateo County there are climatic (including precipitation and relative humidity, temperature, and wind conditions), geological (including seismicity and soils), topographical (including vegetation, surface features, buildings, landscaping, and terrain, and electrical power transmission equipment) conditions that limit or reduce the effectiveness and capabilities of fire departments in controlling fires involving buildings used for human habitation, as well as structures not used for human habitation, and that such local conditions also cause situations which increase the likelihood of ignition and rapid and intense burning, and the likelihood of extensive damage from smoke and heat, and increased water damage resulting from quantities of water necessary to control fires occurring in such buildings and necessitate more restrictive fire prevention measures that mitigate and prevent the adverse impacts and results caused by such local climatic, geological and topographic conditions.

Further finds that the adoption of these code changes and modifications may not prevent the incidence of fire; however, the implementation of these changes can reduce the severity and potential for loss of life and property.

- c. Regarding plastic pipe prohibition, that due to climatic and geological conditions within San Mateo County, create situations which can and do result in health and safety conditions which in turn result in excessive harm and danger to life and property in that plastic materials are subject to deterioration, causing brittleness, and in a seismic event, these brittle materials are likely to crack or break, causing leakage and possible cross contamination. These cracks or breaks can occur within concealed spaces, making detection difficult until health problems or excessive odors occur.

Regarding the Adoption of Local Administrative Amendments of the California Building Standards Codes, Find:

4. That these local amendments are necessary for the effective administration of building permits, including new County standards, updating terminology and numbering systems, clarifying requirements, processes, and any ambiguities, investigation fees, violations and penalties, as discussed in the staff report.

**RECOMMENDED ACTION**

Adopt the Ordinance implementing the California Building Standards Codes, the San Mateo County Ordinance Code, Division VII (Building Regulations), and Local and Administrative Amendments of the California Building Standards Codes included at the end of this report.

**ORDINANCE NO. \_\_\_\_\_**  
**BOARD OF SUPERVISORS, COUNTY OF SAN MATEO,**  
**STATE OF CALIFORNIA**

\* \* \* \* \*

**AN ORDINANCE ADOPTING THE LATEST EDITIONS (2010) OF THE CALIFORNIA BUILDING STANDARDS CODE, TITLE 24, 2010 CALIFORNIA BUILDING CODE (PART 2), 2010 CALIFORNIA RESIDENTIAL CODE, TITLE 24 (PART 2.5), 2010 CALIFORNIA ELECTRICAL CODE (PART 3), 2010 CALIFORNIA MECHANICAL CODE (PART 4), 2010 CALIFORNIA PLUMBING CODE (PART 5), 2010 CALIFORNIA ENERGY CODE (PART 6), 2010 CALIFORNIA ELEVATOR SAFETY CONSTRUCTION CODE (PART 7), 2010 CALIFORNIA HISTORICAL BUILDING CODE (PART 8), 2010 CALIFORNIA FIRE CODE (PART 9), 2010 CALIFORNIA EXISTING BUILDING CODE (PART 10), 2010 CALIFORNIA GREEN BUILDING STANDARDS CODE (PART 11), 2010 CALIFORNIA REFERENCE STANDARDS CODE (PART 12) AND RE-ADOPTING THE SAN MATEO COUNTY ORDINANCE CODE, DIVISION VII (BUILDING REGULATIONS), AND AMENDING SECTIONS 9100, 9150, 9180, 9200, 9104, 9113, 9114, 9117, 9184, 9015, 9041 AND 9058, ADDING SECTIONS 9118 AND 9119, AND AMENDING THE SAN MATEO COUNTY ORDINANCE CODE, DIVISION VII (BUILDING REGULATIONS) TO REFERENCE THE INTERNATIONAL BUILDING CODE AND THE INTERNATIONAL RESIDENTIAL CODE**

The Board of Supervisors of the County of San Mateo, State of California,

**ORDAINS** as follows

**SECTION 1.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1,

Section 9100 is hereby amended to read as follows:

**SECTION 9100. ADOPTION OF 2010 CALIFORNIA BUILDING STANDARDS**

**CODE.** The latest adopted editions of the 2010 California Building Standards Code, Title 24, excluding Part 1 (California Administrative Code) and including the 2010 California Building Code (Part 2), 2010 California Residential Code, Title 24 (Part 2.5), 2010 California Energy Code (Part 6), 2010 California Elevator Safety Construction Code (Part 7), 2010 California Historical Building

Code (Part 8), 2010 California Fire Code (Part 9), 2010 California Existing Building Code (Part 10), 2010 California Reference Standards Code (Part 12) and all appendices, amendments, errata, and emergency supplements are hereby adopted and by reference except as otherwise provided in Division VII, as the Building Code of the County of San Mateo. A copy of the "California Building Standards Code" is on file at the San Mateo County Building Inspection Section. The mandatory requirements of the appendix to the California Building Standards Code shall be enforceable to the same extent as if contained in the body of the Building Code. Any amendments, errata and/or emergency supplements to this code shall be enforceable to the same extent as if contained in the body of the "California Building Standards Code."

**SECTION 2.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 2, Section 9150 is hereby amended to read as follows:

**SECTION 9150. ADOPTION OF 2010 CALIFORNIA ELECTRICAL CODE.**

The latest adopted edition of the 2010 California Electrical Code (Title 24, Part 3), based on the 2008 National Electrical Code (NEC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Electrical Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 3.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Sections 9118 and 9119 are hereby added to read as follows.

**SECTION 9118. ADOPTION OF 2010 CALIFORNIA RESIDENTIAL CODE.**

The latest adopted edition of the 2010 California Residential Code, Title 24 (Part 2.5) is hereby adopted and incorporated by reference. All appendices within the referenced standard above and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Residential Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 9119. ADOPTION OF 2010 CALIFORNIA GREEN BUILDING**

**STANDARDS CODE.** The latest adopted edition of the 2010 California Green Building Standards Code, Title 24 (Part 11) is hereby adopted and incorporated by reference. All appendices within the referenced standard above and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Green Building Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 4.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 3, Section 9180 is hereby amended to read as follows:

**SECTION 9180. ADOPTION OF 2010 CALIFORNIA PLUMBING CODE.** The latest adopted edition of the 2010 California Plumbing Code (Title 24, Part 5),

based on the 2009 Uniform Plumbing Code (UPC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Plumbing Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 5.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 4, Section 9200 is hereby amended to read as follows:

**SECTION 9200. ADOPTION OF 2010 CALIFORNIA MECHANICAL CODE.**

The latest adopted edition of the 2010 California Mechanical Code (Title 24, Part 4), based on the 2009 Uniform Mechanical Code (UMC) is hereby adopted and incorporated by reference. All appendices within the referenced standard above, and all amendments, errata, and/or emergency supplements are also adopted during this triennial California Building Standards Code cycle. A copy of the "California Mechanical Code" is on file at the San Mateo County Building Inspection Section.

**SECTION 6.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9104(a) is hereby amended to read as follows:

- (a) **Minimum Slab Thickness.** The minimum thickness of floor slabs supported directly on the ground shall be not less than 3 1/2 inches (89 mm). The

slab shall be supported by not less than 6 inches by 6 inches with 10-gauge wire mesh or approved alternative installed at mid height of the slab.

**SECTION 7.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9113 is hereby amended to read as follows:

1. The following requirements shall apply to all new buildings or structures and existing structures that require a building permit issued by San Mateo County.
  - a. The roof covering for every new building or structure, or any existing building or structure which is undergoing a re-roof and all materials applied as part of a roof covering assembly, shall have a minimum fire rating of Class B or higher, treated in accordance with California Building Standards Code, Standard 15-2. Where required by the California Building Standards Code or other provision of law, roof coverings must meet a higher fire rating.
  - b. Subsection 1.a of this section shall not apply to buildings or structures that are less than 120 square feet in floor area.
  - c. Any person installing or constructing a roof covering shall, immediately upon completion of the roof covering, provide certification of the roof covering classification to the building owner and to the inspection authority having jurisdiction.

2. The requirements of this section are minimum standards for new construction and re-roofing of existing structures. Where the International Building Code, International Residential Code, International Fire Code, or the California Building Standards Code contains higher standards or additional or more stringent requirements than required by this section, those additional or more stringent requirements shall apply. Further, nothing in this section shall prevent any fire authority having jurisdiction from adopting and enforcing regulations imposing more stringent requirements than those provided by this section.

**SECTION 8.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9114 is hereby amended to read as follows:

1. The following requirements shall apply to all new buildings or structures that require a building permit issued by San Mateo County.
  - a. Except as otherwise provided by this section, or as provided under Section 903.1 of the California State Building Standards Code, automatic fire sprinkler systems shall be installed and maintained in every new building or structure of any type of construction, use, occupancy or size that requires a building permit issued by San Mateo County.
  - b. The term "automatic fire sprinkler system" as used in this section means an integrated system of underground and overhead piping,

including a water supply such as a gravity tank, fire pump, reservoir, pressure tank, or connection by underground piping to a fire main, which system complies in all respects with the requirements for such systems contained in standards issued by the National Fire Protection Association based upon occupancy classification.

- c. An automatic fire sprinkler system shall be provided throughout an existing structure when a building permit is issued to allow additions, alterations, or repairs within any 12-month period, which increase the value of the structure by fifty percent (50%) for one- and two-family dwellings or fifty percent (50%) for all other structures.
- d. Automatic fire sprinklers shall be installed in any garage or carport and breezeway attached to any structure for which a fire sprinkler system is required. A detached non-habitable garage, 1,000 square feet or more in size, or which has an attached studio or workshop shall require the installation of an NFPA-13 light hazardous automatic fire sprinkler system.

2. The following structures are exempt from the requirements of this section.

- a. **Agricultural Buildings.** For the purpose of this section, an "agricultural building" is defined as a non-residential structure designed and constructed to house farm implements, hay, grain, poultry, livestock, or other horticultural products. "Agricultural building" includes a

place of employment where agricultural products are processed, treated or packaged. Office uses within agricultural buildings shall not exceed ten percent (10%) of the total floor area of the building unless such buildings are provided with an automatic fire sprinkler system throughout. "Agricultural buildings" shall include greenhouses.

- b. Non-residential structures less than 1,000 square feet.
- c. Recreational trailers, fifth wheels, and similar structures used for temporary housing during the construction of a permitted building.
- d. Mausoleums of Type I construction, as defined by the California Building Standards Code, which do not contain offices, chapels, stores, or other places of public occupancy for purposes other than parking of vehicles.
- e. Open air parking garages of Type I construction, as defined by the California Building Standards Code, which do not contain offices, chapels, stores, or other places of public occupancy for purposes other than parking and are detached from other buildings.
- f. Car wash structures where no offices or waiting rooms are attached.

3. Additions, alterations or modifications to any existing structure containing automatic fire sprinklers shall require the extension or modification of the fire sprinkler system throughout the added, altered, or modified areas.

Plans for the installation, extension or modification of an automatic sprinkler system shall be submitted to the Planning and Building Department of San Mateo County for review and approval by the appropriate fire department or district prior to installation. Additions, alterations, or remodels to an existing dwelling previously equipped with automatic sprinklers shall require the submittal of three sets of sprinkler plans and hydraulic calculations. All components of the existing system shall be submitted for review to determine compliance with the applicable standards.

4. All automatic fire sprinkler systems shall comply with the most current adopted edition of NFPA-13, NFPA-13-D, NFPA-13-R and any additional County specifications, or modifications imposed by supplemental rules and regulations adopted by the County of San Mateo.
5. The installation of an automatic fire suppression system may be required by the Building Official when an alteration, addition or change in use or occupancy of a building or portion of a building thereof increases the hazard of fire or threat to life and safety.

6. The requirements of this section are intended to represent minimum standards for new construction. Nothing in this section shall prevent any fire authority having jurisdiction from adopting and enforcing any regulations, which impose more stringent requirements. Further, any requirements of the International Building Code, International Residential Code, International Fire Code or the California Building Standards Code, which is more restrictive, specify higher standards or mandates specific locations within a structure for automatic sprinkler systems shall be applicable.

**SECTION 9.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 1, Section 9117 is hereby amended to read as follows:

**SECTION 9117. CHAPTER 7A OF THE 2010 CALIFORNIA BUILDING STANDARDS CODE.** The following requirements shall apply to all new buildings that require a building permit issued by San Mateo County.

Chapter 7A of the 2010 California Building Standards Code and the Local Responsibility Area (LRA), and the State Responsibility Area (SRA) Fire Hazard Severity Zone maps shall apply to all new buildings in the County that require a building permit.

**SECTION 10.** San Mateo County Ordinance Code, Division VII, Chapter 3, Article 3, Section 9184 is hereby amended to read as follows:

1. Chapter 6 of the Uniform Plumbing Code is hereby amended to read as follows:

**SECTION 604.0. MATERIALS**

**SECTION 604.1.** All potable water piping and fittings shall be brass, copper, cast iron, galvanized malleable iron, galvanized wrought iron, or galvanized steel. All materials used in the water supply system, except valves and similar devices, shall be of like material.

**SECTION 604.1.1.** CPVC pipe for non-potable hot and cold water distribution systems within the interior of residential buildings is permitted provided all conditions of Section 604.1.1 of the Uniform Plumbing Code are satisfied.

2. Chapter 7 of the Uniform Plumbing Code is hereby amended to read as follows:

**SECTION 701.0. MATERIALS**

**SECTION 701.1.** Drainage piping shall be cast iron, galvanized steel, galvanized wrought iron, copper, brass, Stainless Steel 304 or 316L, Schedule 40 ABS (DWV), Schedule 40 PVC (DWV), extra-strength vitrified clay pipe, or other approved materials having a smooth and uniform bore.

**SECTION 701.1.1.** No galvanized wrought iron or galvanized steel pipe shall be used underground. Galvanized wrought iron or galvanized steel pipe shall be kept at least six (6) inches (152 mm) aboveground.

**SECTION 701.1.2.** ABS and PVC (DWV) piping installations shall be limited to underground installation outside of the structure, and in accordance with IS 5, IS 9, and Chapter 15, "Firestop Protection." Except for individual single-family dwelling units, materials exposed within ducts or plenums shall have a flame-spread index of not more than 25 and a smoke-developed index of not more than 50, when tested in accordance with the Test for Surface - Burning Characteristics of the Building Materials. (See the Building Code Standards based on ASTM E-84 and ANSI/UL 723.)

3. Chapter 9 of the Uniform Plumbing Code is hereby amended to read as follows:

**SECTION 903.0. MATERIALS**

**SECTION 903.1.** Vent pipe shall be cast iron, galvanized steel, galvanized wrought iron, copper, brass, Schedule 40 ABS (DWV), Schedule 40 PVC (DWV), Stainless Steel 304 or 316L (Stainless Steel 304 pipe and fittings shall not be installed underground and shall be kept at least six (6) inches (152 mm) aboveground), or other approved materials having a smooth and uniform bore.

**SECTION 903.1.2.** ABS and PVC (DWV) shall not be approved for use for vent piping or fittings except for underground installation beginning two (2) feet outside the structure.

4. The provisions of Section 9184 shall not apply to the minor repair of existing in place plastic pipe when authorized by the Building Official.

**SECTION 11.** San Mateo County Ordinance Code, Division VII, Chapter 2, Article 1, Section 9015 is hereby amended to read as follows:

**SECTION 9015. VIOLATIONS AND PENALTIES**

1. It shall be unlawful for any person, firm, or corporation to erect, install, construct, enlarge, alter, repair, move, improve, remove, replace, convert, equip, use, occupy, maintain or demolish any building, structure or equipment therein regulated by this code or the construction codes, or cause the same to be done, contrary to or in conflict with or in violation of any of the provisions of said code or codes.
2. Any person, firm, or corporation violating any of the provisions of this code or the construction codes shall be deemed guilty of a misdemeanor as provided in Title 1, Chapter 1.08, Section 1.08.010 of the San Mateo County Ordinance Code. A Stop Work Notice will be posted at the address of the violation(s), and a \$500.00 per day fine will be applied to the owner(s) and/or the address in violation. The Community Development

Director and/or the Building Official may reduce this fine to zero if the owner(s) in violation apply(ies) for their permit(s) within ten (10) business days after the Stop Work Notice has been posted.

**SECTION 12.** San Mateo County Ordinance Code, Division VII, Chapter 2, Article 4, Section 9041 is hereby amended to read as follows:

**SECTION 9041. INVESTIGATION FEES.** The following provisions shall govern investigation fees.

1. The Board of Supervisors hereby finds that there is a substantial cost to the County in identifying and investigating construction or work commenced without first obtaining the prescribed permits therefor, or done in violation of prescribed permits, and in assuring compliance with permit requirements and other pertinent County code provisions when such violations are determined to exist. The Board of Supervisors further finds that a reasonable measure of the cost to the County in identifying, investigating and obtaining compliance for such violations is ten times the value of the applicable permit, and that this cost should be borne by the violator in the form of an investigation fee to be assessed as set forth in Subsection 2, of this section.
2. Whenever any construction or work for which permit is required by this code or by any other code incorporated by reference and made a part of this code, is started or commenced without the prescribed permit having

first been obtained, an investigation fee in the amount of ten times the prescribed permit fee shall be added to the permit fee, and shall be collected at time of application for the permit. Such investigation fee shall be collected for each separate and distinct permit required for a specific project. Where a permit has been previously obtained, but construction or work is commenced which goes beyond the scope of the permit, or is in violation of the terms of the permit, the above described investigation fee shall be assessed for such portion of the construction or work done beyond the scope of, or in violation of, the permit. This investigation fee shall be required and collected whether or not a permit is then or subsequently issued. The maximum investigation fee which may be assessed and collected as to any individual permit shall be three thousand dollars (\$3,000.00). Nothing in this section shall relieve any person(s) from fully complying with the requirements of this code, or with any codes incorporated by reference and made a part of this code, in the execution of the work, or from any other penalties prescribed by law.

3. Whenever any Farm Labor Housing, temporary or permanent, has been found to have been installed, constructed, altered or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fees shall be based on an hourly cost to compensate staff time spent on processing the violation.

4. Whenever Low Income or Affordable Housing, temporary or permanent, has been found to have been installed, constructed, altered, or created or moved without first obtaining the required permits, an investigation fee shall be assessed whether or not the prescribed permits are then or subsequently issued. Such investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.
  
5. The Building Official shall have the authority to adjust investigation fees for minor and major violations, as listed below, provided such violation is a first offense, and/or extenuating circumstances determined by the Building Official. In no case shall the investigation fee be reduced to less than two times the permit fee, plus the permit fee. Such reduction in investigation fees shall not relieve the applicant from full compliance with all applicable codes and zoning regulations. Such reduced investigation fee shall be based on an hourly cost to compensate for staff time spent on processing the violation.
  - a. Water heater installations or replacements
  - b. Furnace/heater installations or replacements
  - c. Recreational decks for single-family dwellings
  - d. Re-roofing of a single-family dwelling
  - e. Electrical service changes to a single-family dwelling
  - f. Non-habitable accessory structures not exceeding 200 square feet
  - g. Water or sewer line replacements for single-family dwellings

- h. Fences
  - i. Kitchen or bathroom remodels of single-family dwellings
6. The Building Official or authorized representative shall have the authority to issue an Information Notice in lieu of a Stop Work Notice for minor violations listed above or in the event that work has just begun on other violations. The issuance of an Information Notice shall waive the requirement for investigation fees provided that the work stops immediately and the violator has contacted the Planning and Building Department to initiate the permit process within ten (10) working days of the issuance of the Information Notice. Failure to comply with these two requirements will result in the issuance of a Stop Work Notice and shall also result in the disqualification of the reduction of investigation fees as allowed in Item #5 of this section.

**SECTION 13.** San Mateo County Ordinance Code, Division VII, Chapter 2, Article 5, Section 9058 is hereby amended to read as follows:

**SECTION 9058. FINAL INSPECTION AND ADDRESSING**

1. There shall be a final inspection and approval on all buildings or structures when completed and ready for occupancy. A final inspection approval may, upon notice, be revoked by the Building Official if it is found that construction, work, or equipment fails in any respect to comply with the

requirement of these codes, or that the installation is unsafe, dangerous, or a hazard to life or property.

2. The address of the structure must be posted on all buildings in a position such that it is plainly visible and legible from the street or road fronting the property. Buildings with multiple units or tenants must have each unit or suite identified by a separate address or unit number/letter. Where structures are remote to the public or is a private road, additional directional signage may be required at each driveway or roadway intersecting the access to the building or structure. Nothing in this subsection shall prevent any fire authority having jurisdiction from adopting and enforcing regulations imposing more stringent requirements for addressing requirements.
3. The Community Development Director or the Building Official has the authority to change a property address if it is found to be inconsistent or out of sequence with surrounding addresses.

**SECTION 14.** The San Mateo County Ordinance Code, Division VII (Building Regulations), is hereby re-adopted in its entirety except as amended or added within this ordinance. A copy of the "Building Regulations" is on file at the San Mateo County Building Inspection Section.

**SECTION 15.** All references to the "Uniform Building Code" contained within the San Mateo County Ordinance Code, Division VII (Building Regulations) is hereby amended and replaced with "International Building Code" and International "Residential Code."

**SECTION 16.** This Ordinance will be in full force and effective thirty (30) days after the adoption by the Board of Supervisors.

\*\*\*\*\*

**BUILDING STANDARDS COMMISSION**

2525 Natomas Park Drive, Suite 130  
Sacramento, California 95833-2936  
(916) 263-0916 FAX (916) 263-0959



October 21, 2013

Chuck Clark, Building Inspection Manager  
County of San Mateo  
455 County Center, 2nd Floor  
Redwood City, CA. 94063

Dear Mr. Clark:

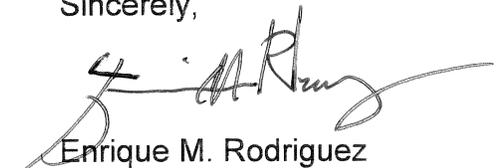
This letter is to acknowledge receipt on October 2, 2013 of the County of San Mateo submittal pertaining to Ordinance No. 04532 with findings and is acceptable for filing. Your filing attests to your understanding that according to Health and Safety Code §18941.5 and 17958.7 no modification or change to the California Building Standards Code shall become effective or operative for any purpose until the findings and the modifications or changes have been filed with the California Building Standards Commission (the Commission).

This letter attests only to the filing of these local modifications with the Commission, which is not authorized by law to determine the merit of the filing. As a reminder, local modifications are specific to a particular edition of the Code. They must be readopted and filed with the Commission in order to remain in effect when the next triennial edition of the Code is published.

In addition, should you receive Fire Protection District ordinances for ratification, it is required to submit the ratified ordinances to the Department of Housing and Community Development [Health and Safety Code Section 13869.7(c)], ATTENTION: State Housing Law Program Manager, rather than the Commission. Likewise, ordinances containing energy efficiency standards may require approval from the California Energy Commission pursuant to Public Resources Code Section 25402.1(h)(2).

If you have any questions or need any further information, you may contact me at (916) 263-0916.

Sincerely,



Enrique M. Rodriguez  
Associate Construction Analyst

cc: Chron  
Local Filings

**ORDINANCE NO. 04532**  
BOARD OF SUPERVISORS, COUNTY OF SAN MATEO,  
STATE OF CALIFORNIA

\* \* \* \* \*

**AN ORDINANCE MAKING CERTAIN FINDINGS OF LOCAL  
CONDITIONS, ADOPTING THE 2009 EDITION OF THE INTERNATIONAL  
FIRE CODE WITH THE 2010 CALIFORNIA FIRE CODE AMENDMENTS KNOWN AS  
THE 2010 CALIFORNIA FIRE CODE, CALIFORNIA CODE OF REGULATIONS,  
TITLE 24 PART 9 PUBLISHED BY THE INTERNATIONAL CODE COUNCIL, AND  
MODIFICATIONS THERETO AS SET FORTH HEREIN, INCLUDING APPENDIX  
CHAPTERS 4, B, C, D, F, H, I, AND J, AND REPEALING AND REPLACING  
CHAPTER 3.84 OF TITLE 3 OF THE SAN MATEO COUNTY ORDINANCE CODE**

The Board of Supervisors of the County of San Mateo, State of California,  
**ORDAINS** as follows:

**SECTION 1. Findings of Fact**

For the purposes of this ordinance, the Board of Supervisors hereby makes the following findings, as required by Sections 17958.7 and 18941.5 of the California Health and Safety Code. The Board of Supervisors finds and declares that the unique characteristics of the topography, geographic, climatic, and the balance of light industrial, commercial and residential properties located within the areas served by the San Mateo County Fire Department, requires the formal adoption of the 2009 International Fire Code with the 2010 California Fire Code Amendments, including all Appendix Chapters, Referenced Standards and modifications contained herein which are reasonably necessary in order to protect health, safety, and welfare of the residents and properties in the areas served, because of the existence of the following local conditions:

**1. Climatic Conditions**

The areas served by the San Mateo County Fire Department, on average, experience an annual rainfall between 15 to 24 inches. This rainfall can be expected between October and April of each year. However, during the summer and early fall months there is little, if any, measurable precipitation. During this dry period, the temperatures range from 70°-90° with light to gusty westerly winds and occasionally but becoming more common, northeast to easterly winds, known as the Diablo Winds. These drying winds, mixed with the natural vegetation, which is dominant throughout the area, creates hazardous fuel conditions, which further increases extensive wildfire risk. With residential developments encroaching into these wooded, grass, or brush covered areas, wind and terrain-driven fires could have severe consequences to improved properties at risk. This has been demonstrated on several occasions in the Bay Area.

## 2. **Geographical Conditions**

Geographic Location. The areas served by the San Mateo County Fire Department are located in unincorporated areas of the county, from the southern end of the county adjacent to the County of Santa Cruz and the County of Santa Clara, to the northern boundary adjacent to the City and County of San Francisco.

Seismic Location. The relatively young geological processes that have created the San Francisco bay region are still active today. Seismically, the County of San Mateo sits along the active San Andreas Fault, and is rated as a Seismic Zone Classification of C to F.

Size and Population. Direct service protection areas served by the San Mateo County Fire Department encompass approximately 330 square miles and 17,500 people.

Roads and Streets. The number of vehicle miles driven is steadily increasing despite limited growth. Many older streets are narrow and steep. The impact of additional planned developments and increased traffic flow will continue to create an effect on the delivery of fire protection services.

Soil Conditions. The areas closest to the Bay are overlain by unconsolidated fine silt clay, known as Bay Mud, which varies in thickness from a few feet to as much as thirty (30) feet. The mountainous areas are a combination of solid rock to mixed rock and earth. The topography varies from steep mountainous terrain, to flat coastal lands. Slopes range from (0) degrees to more than (20) degrees on numerous streets and driveways.

Vegetation. The hilly portions of the County contain old growth and second growth timberland, oak woodlands, dense brush and a heavy growth of natural grasses. Numerous fires occur within the County and surrounding City jurisdiction lands each year.

## 3. **Topographical Conditions**

The topographic element, as would be expected, is closely associated with the geographic element. With the significant elevation changes within the County, development is a geographical concern. Elevation changes within developments following the path of least resistance, creating a meandering pattern of structures. This does not lend itself to a systematic street and road layout, which would promote easy traffic flow.

Topographic constraints have allowed only a few major cross-county thoroughfares to be constructed. These main thoroughfares tend to be heavily congested, primarily during commute hours and seasonal periods of the year. "Pass-through" vehicular traffic in corridors, such as Highway 92, Highway 35, Edgewood Road, and Highway 84, increase commute time traffic for East and West bound vehicular movement to US 101 and Interstate 280. The increased traffic has increased the response time of fire apparatus and other emergency vehicles. The conditions

associated with topography in this county are intensified with the construction of large remote residential structures.

Employment areas are scattered throughout the county, and the people who work in these complexes add to the traffic congestion throughout the county and local cities, thereby further increasing fire apparatus response times.

**SECTION 2.** Existing Chapter 3.84 of Title 3 of the San Mateo County Ordinance Code is repealed in its entirety.

**SECTION 3.** A new Chapter 3.84 is added to Title 3 of the San Mateo County Ordinance Code to be numbered and entitled and to read as follows:

### **Chapter 3.84 Fire Protection Regulations**

#### **§ 3.84.010 Title and Scope**

This Chapter shall be known and may be cited as the San Mateo County Fire Code. The provisions of this Chapter shall apply to all of the unincorporated areas of the County served by the San Mateo County Fire Department.

#### **§ 3.84.020 Documents Adopted by Reference**

For the purpose of establishing proper regulations for building construction and the use of certain systems involving flammable, volatile, or hazardous materials, and for the regulation of activities that threaten the health and safety of local residents, the 2009 International Fire Code with the 2010 California Fire Code Amendments, (herein "The Fire Code") published by the International Code Council, together with Appendix Chapters 4, B, C, D, F, H, I, and J, is hereby adopted subject to the modifications set forth below.

#### **§ 3.84.030 San Mateo County Fire Department**

The San Mateo County Fire Department is hereby established and shall be administered by the County Fire Chief.

#### **§ 3.84.040 County Fire Chief**

"County Fire Warden" and "County Fire Chief" shall mean the "Fire Chief" of the San Mateo – Santa Cruz Unit of the California Department of Forestry and Fire Protection (CAL FIRE) or authorized representative thereof, so long as there shall be in effect an agreement for CAL FIRE to provide fire protection services to the County. The Fire Warden / Fire Chief shall have all powers and duties conferred upon Fire Chiefs by state law.

#### **§ 3.84.050 County Fire Chief Duties**

The Board of Supervisors hereby delegates the authority granted by section 24008 of the Government Code and authorizes the County Fire Chief to appoint from qualified personnel on the Chief's staff such as Deputy, Assistant, and Battalion Chief's (Chief

Officers) as necessary to perform those duties relating to fire or fire protection as are required by the Board. The County Fire Chief and appointed designees shall aid in enforcing all laws and ordinances and any rules and regulations adopted by the State Fire Marshal relating to fires or fire prevention and protection and shall exercise peace officer powers pursuant to the provisions of section 24008 of the Government Code.

#### **§ 3.84.060 Bureau of Fire Prevention and Enforcement Duties**

The Board of Supervisors authorizes the County Fire Chief to establish a Bureau of Fire Prevention, which shall be known herein as the San Mateo County Fire Marshal's Office. The Fire Code adopted and amended herein shall be enforced by the San Mateo County Fire Marshal's Office under the direction of the County Fire Chief.

#### **§ 3.84.070 County Fire Marshal**

The "County Fire Marshal" is the chief officer assigned to the San Mateo County Fire Marshal's Office. The County Fire Marshal shall be known as the "Fire Code Official" as defined in the Fire Code.

#### **§ 3.84.080 No Liability for Damages**

This Code shall not be construed to hold the County of San Mateo or any of its officers or employees liable for any damage to persons or property by reason of any inspection or reinspection authorized herein or by reason of the approval or disapproval of any equipment or process authorized herein, or for any act or omission in connection with the control or extinguishment of any fire or in connection with any other official duties.

#### **§ 3.84.090 Chimney Screens Required**

Any chimney upon any cabin, house, hotel, house trailer, or other building or improvement located in any timber, grass, brush, or grain covered area shall have across the opening thereof a galvanized or copper screen spark arrester of a mesh not larger than one-half of an inch.

#### **§ 3.84.100 Fuel Breaks**

- A. Every person, owning, leasing or otherwise controlling improved real property, shall maintain an effective fuel break for the protection of improvements by removing all hazardous flammable materials or growth from the ground around each improvement for a distance of not less than 30 feet from its exterior circumference. The County Fire Chief may require a distance of up to 100 feet to be cleared if he determines that the greater distance is necessary to protect improvements. Where the Distance from the improvements to the property line of the parcel upon which the improvement is located is less than the distance required to be cleared, the person owning, leasing or otherwise controlling the property shall bear any and all costs associated with clearing an area sufficient to provide the required fuel break, including area that is adjacent to the property.

- B. In determining the extent of clearing necessary to establish an adequate fuel break, due consideration shall be given to the retention of existing landscaping or natural features that, in the opinion of the County Fire Marshal, do not increase the risk of the spread of a fire.
- C. Any determination as to the required size of a fuel break shall give due consideration to the presence of any sensitive habitats entitled to protection under federal, state or local laws, and shall comply with such laws. In the case of any development for which environmental review is required, and for which a fuel break will be required, the environmental review shall consider any environmental impacts which may result from the creation of the required fuel break.

#### **§ 3.84.110 Land Divisions**

- A. No final map for a major land division shall be approved within the boundaries of an area served by a public water system until the County Fire Marshal certifies that the land division has met the provisions of California Fire Code Sections 503 and 508 for Fire Apparatus Access Roads and Fire Protection Water Supply either through installation of required improvements before final map approval, or through a subdivision or other binding agreement which requires installation of the required improvements by a specified date following final map approval, whichever is appropriate.
- B. No parcel map for a minor land division shall be approved within the boundaries of an area served by a public water system until the County Fire Marshal certifies that the land division has met the provisions of California Fire Code Sections 503 and 508 for Fire Apparatus Access Roads and Fire Protection Water Supply either through installation of required improvements before final map approval, or through a subdivision or other binding agreement which requires installation of the required improvements by a specified date following final map approval, whichever is appropriate.
- C. The requirements of this section do not apply to lot line adjustments between four or fewer existing parcels, where land taken from one parcel is added to an adjacent parcel, and where a greater number of parcels than originally existed is not thereby created.

#### **§ 3.84.120 Construction, Relocation and Alteration**

Every person who constructs, relocates, alters (adding to a building which will increase the size or value of the building by 50 percent or more); a building or portion of a building shall comply with the provisions of California Fire Code Sections 503 and 508 for Fire Apparatus Access Roads and Fire Protection Water Supply. Valuation of a building and alterations shall be determined in the same manner as determined under applicable building codes.

#### **§ 3.84.130 Modifications to Fire Code**

The San Mateo County Board of Supervisors hereby determines that modifications to

certain specific sections of the California Fire Code are reasonably necessary due to local conditions as set forth in the following Sections.

#### **§ 3.84.140 Special Events**

Section 105.6.4.1 of the California Fire Code is adopted to read as follows:

To conduct a special event either inside or outside of a structure. Special events include but are not limited to the following types of activity: crafts faire, festivals, historical celebrations, etc.

#### **§ 3.84.150 Explosives**

Section 105.6.14 of the California Fire Code is amended to read as follows:

An operational permit is required for the manufacture, storage, handling, sale or use of any quantity of explosives, explosive materials, fireworks or pyrotechnic special effects within the scope of Chapter 33 of this code, or when a local permit or approval from the Fire Chief is required by the California Code of Regulations Title 19, Division 1, Chapter 6 – Fireworks or Chapter 10 – Explosives.

**Exception:** Small arms ammunition of .75 caliber or less, cartridges for propellant-actuated power devices, and cartridges for industrial guns, 20 pounds or less of smokeless powder, 5 pounds or less of black sporting powder providing such smokeless or black sporting powder is for the hand loading of small arms or small arms ammunition.

#### **§ 3.84.160 Open Burning**

Section 105.6.30 of the California Fire Code is deleted:

#### **§ 3.84.170 Fire Protection Board of Appeals**

Section 108.1 of the California Fire Code is amended to read as follows:

In order to hear and decide appeals of orders, decisions or determinations made by the County Fire Marshal relative to the application and interpretation of this Code, there is established a Fire Protection Board of Appeals, consisting of three members to hear appeals and to grant such relief or make such interpretation or explanation as may be necessary and proper pursuant to the provisions of this Code. The Fire Protection Board of Appeals shall consist of the San Mateo County Fire Chief, the San Mateo County Fire Operations Chief and the Planning Department Director or their authorized representatives. The County Fire Marshal shall act as Secretary of the Board. The Fire Protection Board of Appeals shall adopt rules and regulations for conducting its hearings and shall render all decisions and findings in writing to the appellant, with duplicate copy to the County Fire Marshal.

Any appeal of a decision, order or determination made by the Fire Marshal shall be in writing and filed with the San Mateo County Fire Chief within thirty (30) days from the date of the decision, order or determination being appealed. The notice of appeal shall:

1. Specify the substance and particulars of the decision, order or determination being appealed, including the date of the decision, order or determination.
2. Describe the grounds for and arguments in support of the appeal.
3. Be signed by the appellant or his/her duly authorized agent.
4. Include the mailing address of the appellant.

Whenever a notice of appeal is filed with the Fire Chief, the Fire Chief shall set the matter for hearing at the earliest reasonable time and shall notify the appellant of the place, date and time the Board of Appeals shall hear and consider the appeal. The Fire Chief shall give notice of the hearing to the appellant at least seven days prior to the time set for the hearing. Notice shall be given to the appellant by first class mail and certified mail to the address shown on the notice of appeal.

#### **§ 3.84.180 Violations**

Section 109.3 of the California Fire Code is amended to read as follows:

Persons who shall violate a provision of this code or shall fail to comply with any of the requirements thereof or who shall erect, install, alter, repair, or do work in violation of the approved construction documents or directive of the fire code official, or of a permit or certificate used under the provisions of this code, shall be guilty of a misdemeanor, punishable as set forth in the Penal Code. Each day that the violation continues after a notice has been served shall be deemed as a separate offense.

#### **§ 3.84.190 Failure to Comply**

Section 111.4 of the California Fire Code is amended to read as follows:

No person shall continue any work after having been served with a stop work order, except such work as that person is directed to perform to remove a violation or unsafe condition.

#### **§ 3.84.200 Traffic Calming Devices**

Section 503.4.1 of the California Fire Code is added to read as follows:

Traffic calming devices are prohibited unless approved by the fire code official. Traffic calming devices shall not be installed on designated fire apparatus response routes. When approved, traffic calming devices shall be installed in accordance with the San Mateo County Fire Dept's "Traffic Calming Devices" Standard Detail.

#### **§ 3.84.210 Premises Identification**

Section 505.1.1 of the California Fire Code is added to read as follows:

New residential buildings shall have **internally illuminated** address numbers contrasting with the background so as to be seen from the public way fronting the building. Residential address numbers shall be at least six feet above the finished surface of the driveway. Where buildings are located remotely to the public roadway, additional signage at the driveway/roadway entrance leading to the building and/or on each individual building shall be required by the San Mateo County Fire Department. This remote signage shall consist of a 6 inch by 18 inch green reflective metal sign with 3 inch reflective Numbers/ Letters similar to Hy-Ko 911 or equivalent.

**§ 3.84.220 Multiple Tenant Structures**

Section 505.1.2 of the California Fire Code is added to read as follows:

Multiple tenant buildings, using the same street address numbers, shall have suite or unit identification posted as required by the San Mateo County Fire Department.

**§ 3.84.230 Commercial/Industrial Size and Stroke of Numbers.**

Section 505.1.3 of the California Fire Code is added to read as follows:

Building address numbers shall be either internally or externally illuminated and contrasting with the background so as to be seen from the public way fronting the building.

Building address number heights shall be sized in accordance with the table noted below. The number stroke shall be 1/2-inch or larger.

<u>Distance from Road</u>	<u>Address No. Size</u>
0-50 feet	6-inch
50-100 feet	8-inch
100-150 feet	10-inch
150 + feet	12-inch

with a corresponding increase in stroke width.

**§ 3.84.240 Rear Addressing.**

Section 505.1.4 of the California Fire Code is added to read as follows:

When required by the Chief, approved numbers or addresses shall be placed on all new and existing buildings in such a position as to be plainly visible and legible from the fire apparatus road at the back of the property. Number stroke and size will comply with Section 505.1 for residential buildings and 505.1.3 for commercial buildings.

**§ 3.84.250 Suite/Unit Identification.**

Section 505.1.5 of the California Fire Code is added to read as follows:

Buildings containing separate suite and/or unit identification shall have the suite or unit

identification clearly posted with assigned letters or numbers having a minimum height of four inches and a minimum stroke of 3/8 inch. Assigned letters or numbers shall be of contrasting color to the background and located between 5 feet and 6 feet off the finished floor. Directional address numbers or letters shall be provided.

**§ 3.84.260 Directories.**

Section 505.1.6 of the California Fire Code is added to read as follows:

Complexes with multiple buildings may be required by the San Mateo County Fire Department to provide one or more of the following: a directory, a premise map or directional signage. Location, size and color of such elements will be determined by the San Mateo County Fire Department on a site-specific basis.

**§ 3.84.270 Automatic Fire Sprinklers Required.**

Section 903.1.2 of the California Fire Code is added to read as follows:

All automatic fire sprinkler systems installed as required by the San Mateo building Code Ordinance must be approved by the County Fire Marshal.

**§ 3.84.280 Fire Department Response To False Alarms**

Section 907.9.5.1 of the California Fire Code is added to read as follows:

Any building owner or owner's agent who fails to properly maintain and service any smoke detector or fire alarm system, water flow detection alarm or fire sprinkler tamper alarm, after being notified that service or maintenance is required, will be subject to the payment of costs related to any false alarm response by the fire department.

**§ 3.84.290 Making False Report**

Section 907.9.5.2 of the California Fire Code is added to read as follows:

It shall be unlawful for a person to give, signal or transmit a false alarm. A false report may include signals from a fire alarm system, including signals caused during fire alarm maintenance without prior Fire Department notification. Any person making a false report will be subject to the payment of costs related to any false report response by the fire department.

**§ 3.84.300 Identification**

Section 912.4.1 of the California Fire Code is added to read as follows:

Fire department connections to sprinkler systems and/or standpipe systems shall clearly identify the building served as required by the San Mateo County Fire Department.

**§ 3.84.310 Fireworks**

Section 3301.2 of the California Fire Code is added to read as follows:

All non-professional fireworks, including but not limited to, those listed by the California State Fire Marshal as "Safe and Sane," are prohibited within the jurisdictional boundaries of the San Mateo County Fire Department on a year around basis.

**§ 3.84.320 Permits**

Section 3301.3 of the California Fire Code is added to read as follows:

Permits shall be required as set forth in Section 105.6 and regulated in accordance with this section.

**§ 3.84.330 Other Permits Required**

Nothing stated in this chapter shall relieve a property owner from obtaining any other permits required by law for improvements imposed under the provisions of this chapter, including but not limited to a coastal development permit for improvements in the coastal zone.

**SECTION 4.**

This Ordinance shall be effective thirty (30) days from the passage thereof.

\*\*\*\*\*

Regularly passed and adopted this 14<sup>th</sup> day of December, 2010.

AYES and in favor of said ordinance:

Supervisors: MARK CHURCH  
CAROLE GROOM  
ROSE JACOBS GIBSON  
ADRIENNE J. TISSIER

NOES and against said ordinance:

Supervisors: NONE

Absent Supervisors: NONE

Carole Groom  
Vice President, Board of Supervisors  
County of San Mateo  
State of California

Certificate of Delivery

I certify that a copy of the original ordinance filed in the Office of the Clerk of the Board of Supervisors of San Mateo County has been delivered to the President of the Board of Supervisors.

Marie L. Peterson  
Marie L. Peterson, Deputy  
Clerk of the Board of Supervisors