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CHAPTER 82

CHANGE OF OCCUPANCY, USE AND RATING CLASSIFICATION

SECTION 8201 GENERAL

Every change of occupancy, use and rating classification in any existing building or structure shall conform to the construction requirements for the group occupancy to be housed in the building or structure or for the use to which the building or structure is to be put, as set forth in this chapter.

SECTION 8202 CHANGE OF RATING CLASSIFICATION

An existing building within the scope of Chapter 88 of this code shall not be changed from one rating classification, as described in Section 8804, to another rating classification unless the building meets or is altered to meet the requirements of Chapter 88 for the proposed rating classification and the building meets or is altered to meet the other requirements of this code for the use or occupancy change.

SECTION 8203 CHANGE OF OCCUPANCY GROUP OR GROUP DIVISION

Every change of occupancy to one classified in a different group or a different division of the same group, as described in Chapter 3 of this Code, shall require a new Certificate of Occupancy whether or not any alterations to the building are required by this Code. For the purpose of this subdivision, the occupancy group and division of interconnected assembly rooms shall be based on the total occupant load in such rooms.

If the building or portion thereof does not conform to the requirements of this Code for the proposed occupancy group or division, the building or portion thereof shall be made to conform. The Department may issue a new Certificate of Occupancy without stating therein that all of the requirements of the Code have been met and without requiring compliance with all such requirements if it is found that the change in occupancy group or division will result in no overall increase in hazard to life, limb, health, property or public welfare.

Exceptions: Changes of occupancy group or division may be made without establishing that the building complies with current structural requirements of this Code under any of the following conditions:

1. In buildings constructed on or after October 6, 1933, a change of occupancy group or division may be made to establish any occupancy group or division provided the building is not substantially altered.
2. In buildings which are within the scope of Chapter 88, a change of occupancy group or division may be made to establish any occupancy group or division, provided the building complies or is made to comply with the requirements of Chapter 88.

3. Except for the Groups A, E, and I Occupancies, which were constructed prior to October 6, 1933, and are not within the scope of Chapter 88, a change of occupancy group or division may be made to another of equal or lesser hazard as listed below. A change to a higher hazard occupancy group, or to a Group A, E or I occupancy, shall not be made in buildings constructed prior to October 6, 1933, except for Type I buildings as provided for in Item 4 of this exception.

Group U (least hazardous group)

Groups R-3 and R-3.1

Group S-2

Groups B, F, M, H and S-1

Groups R-1, R-2 and R-4

Groups A, E and I (highest hazard group)

4. In Type I buildings constructed prior to October 6, 1933 and not within the scope of Chapter 88, a change to a higher hazard grouping (as listed in Item 3 of this exception) or to a Group A, E, or I occupancy will be individually considered, taking into account the general structural requirements in effect at the time the building was constructed, the structural system used in the building, the condition of the structural system, the proposed occupancy group or division, the occupant load and other pertinent conditions.

If the building or portion thereof does not conform to the requirements of this Code for the proposed occupancy group or division, then a building permit is required and the application for change of occupancy shall require a plan submittal. The plan shall be of sufficient clarity to show that it conforms to the requirements of this Code by showing the existing conditions and proposed alterations in detail.

SECTION 8204 CHANGE OF USE

Every change of use or increased occupant load within the same division of an occupancy group shall require compliance with the provisions of Chapter 3 and the requirements of Chapter 10 of this Code applicable to the proposed use or increased occupant load.

Any assembly occupancy in a building constructed prior to October 6, 1933, shall not be expanded or arranged to accommodate a larger number of occupants than that for which it was previously authorized by the Department unless the entire building conforms to the provisions of Chapter 16 or Chapter 88.

The Department may allow a change of use or increased occupant load within the same division of an occupancy group without requiring compliance with all the applicable requirements of the Code if it is found that the change in use or

increased occupant load as well as any conditions established by the Department will not result in an overall increase in hazard to life, limb, health, property or public welfare.

SECTION 8205 CERTIFICATE OF BUILDING COMPLIANCE

8205.1 General. If the owner of an existing building desires to determine whether the building is in compliance with applicable sections of Chapter IX of the *Los Angeles Municipal Code* for existing buildings, the owner may make application to the Department for a Certificate of Building Compliance.

8205.2 Fees. Before any application for such Certificate of Building Compliance is accepted, a fee shall be paid by the applicant to cover the cost to the City for the necessary inspection and report. The amount of the fee shall be as shown in Table No. 82-A.

**TABLE 82-A
CERTIFICATE OF BUILDING COMPLIANCE INSPECTION FEE**

Residential Building*

SECTION	FEE
Single-family dwelling or the first dwelling unit on the premises	\$185.00
Each additional dwelling unit on the premises up to four units total	\$105.00 per unit
Each dwelling unit in excess of four units	\$68.00 per unit
Each guest room or light-housekeeping room	\$47.00 per unit

*Inspection of buildings accessory to the residential building shall be included as part of the inspection without an additional fee.

Nonresidential Buildings*

AFFECTED FLOOR AREA	FEE
0 - 2,500 square feet	\$315.00
2,501 - 5,000 square feet	\$470.00
5,001 - 7,500 square feet	\$500.00
7,501 - 10,000 square feet	\$600.00
Each additional 10,000 square feet or fraction thereof	\$210.00

For SI: 1 square foot = 0.0929 m².

*Inspection of buildings accessory to the residential building shall be included as part of the inspection without an additional fee.

NONRESIDENTIAL BUILDINGS

AFFECTED FLOOR AREA	FEE
0 - 2,500 square feet	\$300.00
2,501 - 5,000 square feet	\$450.00
5,001 - 7,500 square feet	\$500.00
7,501 - 10,000 square feet	\$600.00
Each additional 10,000 square feet or fraction thereof	\$200.00

For SI: 1 square foot = 0.0929 m².

8205.3 Inspection procedures. After the application has been accepted, the Department shall cause an inspection to be made and a report prepared. If, after taking into account nonconforming rights, the inspection report indicates that any building or portion thereof does not conform to the requirements of Chapter IX of the *Los Angeles Municipal Code*, that portion shall be made to conform.

When compliance has been secured, or if no corrections are required as a result of the inspection report, the Department will issue to the owner a Certificate of Building Compliance stating that the building is now in substantial compliance with the applicable provisions of Chapter IX of the *Los Angeles Municipal Code* for existing buildings.

The issuance of this certificate shall not be construed by any person to be a representation, guarantee or warranty of the premises for any purpose, including, but not limited to, fitness, suitability, or freedom from defects, either latent or patent. Nor is the issuance of this certificate to be construed to be a waiver of any immunity provided to public entities and public employees under state law, including, but not limited to, those immunities provided by Division 3.6 of Title 1 of the *California Government Code*.

CHAPTER 83

RELOCATION PERMIT

SECTION 8301 GENERAL APPLICATION

8301.1 No person shall relocate or cause to be relocated any building or structure into or within the City of Los Angeles without complying with the provisions of Chapters I and IX of the *Los Angeles Municipal Code*.

8301.2 Where a building or structure is to be relocated to a site outside the City, only the provisions of Sections 8302.1, 8302.3 and 8303.3 shall apply.

8301.3 The provisions of Section 93.0110 of the *Electrical Code*, Section 94.103.1.1.2 of the *Plumbing Code* and Section 95.104.5 of the *Mechanical Code* shall apply to all buildings moved into or within the City.

SECTION 8302 PERMITS REQUIRED – GENERAL CONSIDERATIONS

8302.1 Board of public works — permission required. No person shall move any building or structure, or any portion thereof, over, upon, along or across any street without a written permit therefor from the Board of Public Works. Such permit may be referred to as a “house mover’s permit” and shall be issued under the provisions of Sections 62.83.1 and 62.84 of the *Los Angeles Municipal Code*.

8302.2 Department of building and safety — security deposit and permit required.

8302.2.1 No house mover’s permit shall be issued until the Department of Building and Safety has first received a security deposit as required pursuant to Section 8305 of this Code.

8302.2.2 If the building or structure is to be moved to a permanent site within City limits, no house mover’s permit shall be issued until the Department of Building and Safety has first issued to the owner or person having legal control of the premises to which the building is to be moved, a permit to relocate the particular building upon those premises. Such permit shall be called a “relocation permit.”

8302.2.3 If the building or structure is to be moved to a temporary storage site within the City limits, no house mover’s permit shall be issued until the applicant furnishes evidence to the Department of Building and Safety that the storage site is within the proper zone pursuant to the provisions of Article 2, Chapter I of the *Los Angeles Municipal Code* (Zoning Code) and that a Certificate of Occupancy for land use has been issued pursuant to the requirements of Section 12.26 E 2 of the *Los Angeles Municipal Code*.

8302.2.4 If the building or structure is to be moved to a site outside City limits, no house mover’s permit shall be issued until the applicant furnishes evidence to the Department of

Building and Safety that the proposed location meets the requirements of the jurisdiction.

8302.2.5 Prior to issuance of a relocation permit, an inspection shall be required to investigate the condition of the building to be moved and to investigate the acceptability of the proposed new location. Fees for such inspection shall be paid by the applicant as specified in Section 8308.

8302.3 Department of building and safety — sewer-capping permit required. Where a building or structure is to be removed from a lot within the City, no house mover’s permit shall be issued until the Department of Building and Safety has first issued to the owner of such premises a permit to provide a watertight cap to the house connection sewer at the property or sewer easement line.

8302.4 Building relocation conditions.

8302.4.1 An apartment house or dwelling moved into or within the City and all other buildings moved within the City may retain the existing materials and methods of construction, provided that in the new location the building conforms to the requirements of this Code with respect to fire district requirements, under-floor ventilation and clearance, underpinning, footings, foundations, occupancy requirements, and fire safety standards and does not become or continue to be a substandard residential building.

A substandard residential building and any building other than an apartment house or dwelling moved into the City shall be made to conform to all of the requirements of this Code for a new building in the same location within the City and to all other applicable laws.

8302.4.2 The Department of Building and Safety may, in granting any relocation permit, impose such terms and conditions it deems reasonable and proper, including, but not limited to, the requirements of maintenance corrections, alterations or repairs to be made to the building or structure so that the relocation thereof will not be materially detrimental or injurious to public safety or to public welfare or to the property and improvements within a radius of 1,000 feet (304 800 mm) from the site to which it is to be relocated.

SECTION 8303 PERMIT APPLICATION – PLANS AND SPECIFICATIONS

8303.1 Every application to the Department of Building and Safety for a relocation permit shall be in writing upon a form furnished by that Department and shall set forth such information as that Department may reasonably require in order to carry out the purposes of this Chapter.

8303.2 Each such application shall be signed by the person owning or having legal control of the site upon which the building or structure is to be relocated, and prior to any appeal or the issuance of any permit there shall be filed fully delineated

working drawings, electrical and mechanical plans and complete specifications. Such working drawings, plans and specifications shall show all new construction, materials, fixtures and fittings and any alterations, repairs or additions to be made to existing construction. Such plans shall also include floor plans, elevations and necessary construction details so as to show conformity with the intent of this ordinance. Such drawings, plans and specifications shall, in addition to the requirements of Section 106.3.3 of this Code, show all site preparation, grading and improvements.

The applicant shall assume all responsibility for the preparation and completeness of said plans. In the event the City elects to complete the building or to demolish the building under the provisions of the *Los Angeles Municipal Code*, the City reserves the right to interpret errors or omissions or supply missing information on the plans. The City shall not be responsible for the performance of the work done under any contract entered into to complete or demolish the building.

8303.3 Any lot within the City from which a building or structure is moved shall be cleared of all debris resulting from such removal. The footings and foundation walls shall be removed to grade and the lot shall be graded as necessary to provide drainage to a street, gutter or other approved location. A demolition permit shall be secured by the owner to authorize this work.

SECTION 8304 SPECIAL CONDITIONS UNDER WHICH A PERMIT WILL NOT BE ISSUED

No permit shall be issued to relocate any building or structure, if any one of the following conditions exist:

1. It is unfit for human habitation or is so dilapidated, defective or in such condition of deterioration or disrepair that its relocation at the proposed site would cause appreciable harm or be materially detrimental to the property or improvements in the neighborhood within a radius of 1,000 feet (30 480 mm) from the proposed site.
2. Because of age, size, design, architectural treatment or proposed location on the lot, the building does not substantially conform to the general design, plan, location on the lot and construction of the buildings located in the neighborhood within a radius of 1,000 feet (30 480 mm) from the proposed site so that its relocation would be materially detrimental to the property or improvements in said neighborhood.
3. The proposed use is prohibited by the zoning laws of the City.
4. Whenever the applicant is currently in default, as determined by the Department, on one or more relocation permits.

SECTION 8305 GUARANTEE OF COMPLETION REQUIRED

8305.1 Relocation permit. No relocation permit shall be issued unless the applicant therefore shall first post with the Department of Building and Safety a bond in an amount equal

to the cost of the work required to be done, plus an additional 25 percent, guaranteeing compliance with all conditions of the permit and completion of all work described in the plans and specifications therefor, as estimated by the Department of Building and Safety. The applicant may post either a surety bond or cash bond or negotiable United States Treasury Certificates of the kind approved by law for securing deposits of public money.

The bond shall be executed by the applicant as principal and, if a surety bond, shall also be executed by a corporation authorized to act as surety under the laws of the state of California. The bond shall be a joint and several obligation and shall be conditioned upon the faithful performance of all terms and conditions of the permit and of all work described in the plans and specifications therefor to the satisfaction of the Department of Building and Safety. The bond shall contain the further conditions that should the applicant fail to complete all such work within the time specified on the permit, the City may, at its option, cause all of such work to be done or completed in accordance with the terms and conditions of the permits and the plans and specifications therefor on file with said Department, or demolish the building.

The parties executing the bond shall be firmly and continuously bound for the payment of all the costs necessary to complete the work or demolish the building under all terms and conditions of the bond. The cost shall include the cost to complete the work or demolish the building, including any cost to monitor or remove asbestos, plus an amount equal to 40 percent of the cost to cover the cost to the City of administering the contract and supervising the work required.

Whenever the applicant elects to deposit cash or approved negotiable United States Treasury Certificates, the City shall be authorized in the event of any default on the part of the applicant to use any or all of the cash or approved negotiable certificates to cause the work to be done and for the payment of all costs thereof. The term of the bond shall begin on the date of the deposit of the cash or negotiable certificates or the filing of the surety bond, and shall end upon the date of the completion to the satisfaction of the Department of all such work. The fact of such completion shall be evidenced by a written statement thereof signed by the Superintendent of Building and thereafter the cash deposit or certificate shall be returned to the applicant, or the surety bond released, as the case may be.

Whenever the City elects to have such work done because of the applicant's default, the amount of the deposit or certificates in excess of all cost of such work shall be returned to the applicant after the work has been so approved.

Exception: No bond need be posted in any case where the Department shall determine that the only relocation involved is that of moving a building temporarily to the regularly occupied business premises of a house mover, or that of moving a building to adjacent property of the same owner. The exceptions herein made shall not apply unless the Department further finds that no such security is necessary in order to assure compliance with the requirements of this section.

8305.2 Security deposit. No house mover's permit shall be issued to any house mover pursuant to the terms of the Sections

62.62 through 62.93 of the *Los Angeles Municipal Code*, inclusive, until the applicant therefor shall have deposited with the Department of Building and Safety a security deposit of \$2.00 per square foot of total floor area of all buildings, as stated in the application provided for in Subsection A of Section 62.84 of the *Los Angeles Municipal Code*.

In lieu of the specific deposit for each application, any house mover may make and maintain a general deposit in the sum of \$3,000.00 which shall be used for the same purposes as the specific deposit mentioned in this section.

If, for any reason, the move as authorized by the house mover's permit is not completed within 30 days of the date of issuance and it becomes necessary for the Department of Building and Safety to either remove or demolish the building or structure, the cost of so doing plus an administrative fee of 40 percent shall be deducted from the aforementioned deposit. The remainder of such deposit, if any, shall be refunded to the person making such deposit, or to his or her assignees.

In case the deposit shall not be sufficient to pay the cost of removal or demolition, or of the costs of repairs, if any, the person making such deposit shall, upon demand, pay to the Department of Building and Safety a sufficient sum to cover all such cost. Upon failure to pay such sum, it may be recovered by the City in any court of competent jurisdiction.

SECTION 8306 TERMS OF PERMIT

Every relocation permit issued under the provisions of this section shall contain each and every term and condition imposed by the Department of Building and Safety; shall be valid for a period not to exceed 120 days, unless extended by said Department or by the Board, in case an appeal is made to it under Section 98.0403.2 of the *Los Angeles Municipal Code*; and shall become null and void without further notice or order upon the expiration of such time or any extension thereof, or upon any default in the performance of any of the aforesaid terms or conditions.

SECTION 8307 DEFAULT IN PERFORMANCE OF CONDITIONS OR TERMS OF PERMITS – FAILURE TO COMPLETE

8307.1 Whenever the Department of Building and Safety finds that:

1. A building has not been lowered onto its foundation within 60 days after issuance of the relocation permit;
2. A default has occurred in the performance of any term or condition of the relocation permit; or
3. The applicant has failed to complete the work required as specified by the permit, plans and/or specifications approved for the project within the time prescribed, the Department shall be authorized to give notice to the applicant and to the surety, if any, to complete the work or perform the condition within a specified additional time, not to exceed 60 days. Such notice shall be served upon the applicant and the surety, if any, by certified mail and shall be deemed to have been so served when placed

in the United States mail, postage prepaid and addressed to such person. No person shall fail or refuse to comply with such notice. However, such notice may be complied with by demolishing and removing the building or structure and restoring the site within the time prescribed, at the option of the applicant or the surety, as the case may be.

8307.2 If the applicant or the surety fails or refuses to comply with any notice within the time prescribed, the Department shall be authorized to cause the building or structure to be demolished or the work to be completed, whichever it shall determine is reasonable under the circumstances, without further notice or order. The cost of completing the work or demolishing the building, including the cost of any monitoring or removal of asbestos, plus the 40 percent administration and supervision cost, shall be paid for out of the cash deposit or negotiable United States Treasury Certificates posted with the Department, or from the Repair and Demolition Fund, if no deposit or certificate has been posted. All sums used for this purposes out of the Repair and Demolition Fund shall be recovered from the surety under the surety bond provided for above. Any work to be performed by the Department under the provisions of this section shall be done in accordance with the established public works practices of the City of Los Angeles. If the Department uses any money in the Repair and Demolition Fund for the completion or demolition of any building under the provisions of this section, the Department shall notify the surety, and the surety shall immediately thereafter reimburse the City of Los Angeles therefor under the surety bond. The City Attorney is authorized to and shall institute any action necessary to the recovery of the money under the surety bond provided for above.

SECTION 8308 PERMIT FEES

8308.1 Before any application for a relocation permit is accepted, a fee shall be paid by the applicant of the cost to the City for the investigation of the condition of the building to be moved and the inspection of the proposed new location. The amount of the fee shall be as shown in Table No. 83-A for each main building or for the first accessory building where no main building is to be relocated.

Where an accessory building, in addition to a main building or the first accessory building where no main building is to be moved, is to be relocated from the same location to the same site at the new location, an application fee of \$80.00 shall be paid for each such accessory building.

8308.2 In the case of a building located outside the City limits of the City of Los Angeles, an additional fee of \$525.00 shall be paid for each application. In addition to the fee, a mileage charge of 65 cents per mile (1609 mm) shall be paid for any inspection which is made 10 miles (16 090 mm) or more beyond City limits. Mileage shall be measured in a straight line from the point 10 miles beyond the City limits which is nearest to the location of the building to be inspected, to the location of the building, and return to said point of departure.

8308.3 The application fees required by Sections 8308.1 and 8308.2 shall be in addition to the regular building permit fee required by Section 107.2.

8308.4 Should a relocation permit be denied by the Department solely because the proposed relocation site is not approved, the applicant may, with the consent of the Department, file within six months of the date of the original application an amended application for approval of a new proposed site. An additional fee of \$300.00 for each such amended application will be charged. If a relocation permit is not obtained within 6 months after the original application fee is paid, a new application shall be filed and a new application fee paid before the relocation permit is issued.

8308.5 The provisions of this subsection shall not apply to the relocation of temporary buildings or structures to be used by a governmental agency for a governmental purpose.

SECTION 8309 ENTRY UPON PREMISES

8309.1 The Department, the surety, and the duly authorized representatives of either shall have access to the premises described in the relocation permit for the purpose of inspecting the progress of the work.

8309.2 In the event of any default in the performance of any term or condition of the relocation permit, the surety, or any person employed or engaged on its behalf, or the Department, or any person employed or engaged on his or her behalf shall have the right to go upon the premises to complete the required work or to remove or demolish the building or structure.

8309.3 It shall be unlawful for the owner or the owner's representatives, successors or assignees, or any other person to interfere with or obstruct the ingress or egress to or from any such premises of any authorized representative or agent of any surety or of the City engaged in the work of completing, demolishing or removing any building or structure for which a relocation permit has been issued after a default has occurred in the performance of the terms or conditions thereof.

**TABLE NO. 83-A
BASIC RELOCATION APPLICATION FEE SCHEDULE**

FLOOR AREA OF BUILDING	FEE
0 - 2,500 square feet	\$770.00
2,501 - 5,000 square feet	\$1160.00
5,001 - 7,500 square feet	\$1350.00
7,501 - 10,000 square feet	\$1535.00
Each additional 10,000 square feet	\$300.00

For SI: 1 square foot = 0.0929 m².

CHAPTER 85

ALTERNATIVE BUILDING STANDARDS FOR JOINT LIVING AND WORK QUARTERS

SECTION 8501 GENERAL

8501.1 Purpose. The purpose of this chapter is to provide alternative building standards for the conversion of existing buildings, or portions thereof, from commercial or industrial uses to joint living and work quarters. The alternative standards are designed to provide a reasonable level of safety to the building occupants, and are in conformance with the provisions of Section 17958.11 of the *Health and Safety Code*.

8501.2 Application. Nothing in this chapter shall be construed to allow the reduction of the seismic or fire and life safety elements of an existing building, where such elements provide a greater level of protection than the minimum requirements established by this chapter.

The alternative building standards of this chapter may be applied when the commercial or industrial uses in an existing building are converted (change of use or occupancy) to joint living and work quarter(s) provided:

- A. **General fire and life safety requirements for all existing buildings.** All existing buildings that are converted to joint living and work quarter(s) shall comply or be made to comply with all of the building area, height, number of stories, type of construction, occupancy, means of egress and other fire and life safety requirements of this code for a new building of the same use or occupancy, except as provided in this chapter.
- B. **Structural requirements for Chapter 88 buildings.** For existing buildings which are within the scope of Chapter 88, a change of occupancy or use of any portion of a building constructed prior to October 6, 1933, to a joint living and work quarter may be permitted provided the building complies or is made to comply with the structural requirements of Section 8502.12.1 of this Code.
- C. **Structural requirements for existing buildings other than Chapter 88 buildings.** For all other buildings, the change of occupancy or use of any portion of an existing building to a joint living and work quarter may be permitted provided the entire building complies or is made to comply with all the structural requirements of this code for a new building, except as provided in Section 8502.12 of this Code.

8501.3 Definition. For the purpose of this chapter, certain terms are defined as follows:

ARTIST-IN-RESIDENCE. An artist or artists using a space within a building for combined living and artistic working purposes.

EXISTING BUILDING. A building for which a building permit was issued prior to April 1, 1994.

FEMA 351, "RECOMMENDED SEISMIC EVALUATION AND UPGRADE CRITERIA FOR EXISTING WELDED STEEL MOMENT-FRAME BUILDINGS."

The July 2000 edition prepared by the partnership of the Structural Engineers Association of California, the Applied Technology Council, and the California Universities for Research in Earthquake Engineering (SAC) Joint Venture for the Federal Emergency Management Agency, Washington, DC.

FEMA 352, "RECOMMENDED POST-EARTHQUAKE EVALUATION AND REPAIR CRITERIA FOR WELDED STEEL MOMENT-FRAME BUILDINGS."

The June 2000 edition prepared by the partnership of the Structural Engineers Association of California, the Applied Technology Council, and the California Universities for Research in Earthquake Engineering (SAC) Joint Venture for the Federal Emergency Management Agency, Washington, DC.

FEMA 356, "PRESTANDARD AND COMMENTARY FOR THE SEISMIC REHABILITATION OF BUILDINGS."

The November 2000 edition prepared by the partnership of the Structural Engineers Association of California, the Applied Technology Council, and the California Universities for Research in Earthquake Engineering (SAC) Joint Venture for the Federal Emergency Management Agency, Washington, DC.

GUIDELINES FOR SEISMIC RETROFIT OF EXISTING BUILDINGS.

The July 2001 edition of the *Guidelines for Seismic Retrofit of Existing Buildings*, published by the International Conference of Building Officials, 5360 Workman Mill Road, Whittier, California 90601-2298.

JOINT LIVING AND WORK QUARTER. A residential occupancy of one or more rooms or floors used as a dwelling unit with adequate working space reserved for, and regularly used by, one or more persons residing therein pursuant to *Health and Safety Code* (H&S) Section 17958.11(a).

QUALIFIED HISTORICAL BUILDING. Any building deemed of importance to the history, architecture or culture of any area by an appropriate local, state or federal governmental jurisdiction. This shall include designated buildings on, or determined eligible for, official national, state or local historical registers or official inventories, such as the National Register of Historic Places, California Register of Historical Resources, State Historical Landmarks, State Points of Historical Interest, and official adopted city or county registers, inventories, or surveys of historical or architecturally significant sites, places or landmarks.

STATE HISTORICAL BUILDING CODE. A set of code standards known as Part 8, Title 24 of the California Code of

Regulations and published as the *California Historical Building Code*.

8501.4 General. A joint living and work quarter shall not be used for public sales purposes or for instructional classes when either is inconsistent with residential use. No hazardous activities such as, but not limited to, welding, open flame, or storage of flammable liquids shall occur in the joint living and work quarter.

Exception: In buildings three stories or less in height, activities such as welding, open flame, or minimal storage of flammable liquids may be allowed provided written approval is obtained from the fire department.

All buildings containing a joint living and work quarter shall have a sign posted in a conspicuous location at each entrance to the building. The sign shall be constructed of a durable weatherproof material and shall meet the requirements of Los Angeles Fire Department Standard No. 58. In the lower white diamond of the sign, a red colored letter "A" shall be placed so as to meet the size and letter thickness specified in the Los Angeles Fire Department Standard No. 58.

If any portion of an existing building is converted to a joint living and work quarter, then the entire building, including any portion not being converted, shall comply with all of the requirements of the code for a new building of the same use and type of construction, except as provided in this chapter.

SECTION 8502 ALTERNATIVE STANDARDS

8502.1 Use or occupancy. When applying this chapter, a joint living and work quarter shall be classified as Group R, Division 1 occupancy and comply with all Group R, Division 1 occupancy requirements of the Code, except as provided in this chapter. Not more than 33 percent of the total floor area of a joint living and work quarter shall be used or arranged for residential purposes, such as sleeping area, cooking space, sanitary facilities and closet areas.

8502.1.1 Ceiling height. Existing ceiling height within a joint living and work quarter may be maintained, provided the ceiling height is not less than 7 feet (2134 mm), except that the ceiling height above a mezzanine may be 6 feet 6 inches (1981 mm) to any structural projections from the ceiling.

8502.1.2 Emergency escape. Every room below the fourth story where occupants sleep in a joint living and work quarter shall be provided with an emergency escape or rescue window or door, which complies with the requirements of Section 1026 of this Code.

Exception: The emergency escape or rescue window or door may open directly into an existing court, provided:

- A. The court is accessible to the fire department.
- B. The court is provided with a minimum of one direct exit to a corridor, exit stairway, exit passageway, exterior exit stairway, exterior exit balcony, or exterior exit ramp, or existing fire escape. The existing fire escape shall be structurally sound and shall not serve as an exit for an assembly use.

- C. All openings in walls surrounding the court shall be protected as required by Section 704.3 of this Code or be provided with an approved water curtain.

8502.2 Exterior wall and exterior opening protection. Existing construction of the exterior walls may be maintained without complying with current exterior fire resistive wall construction.

Existing unprotected exterior openings, which are not allowed or are required to be protected due to their proximity to a property line, may be maintained without complying with the requirements of Section 704.8 of this Code provided the openings are protected with an approved water curtain. Openings in the exterior walls that are not allowed by Section 704.8 of this Code due to their proximity to a property line, may not be used to satisfy other code requirements, such as, light and ventilation, smoke control or emergency escape.

8502.3 Smoke control system. Existing high-rise buildings shall provide a smoke control system in all portions of the building including basements. The smoke control system shall meet the requirements of Section 909 of this Code or all the requirements of this section.

Exception: The following areas are exempt:

- A. New or existing rooms less than 50 square feet (4.6 m²) in area.
- B. New or existing rooms located at or above grade level provided the room has a direct exit to the exterior of the building.
- C. Floor levels with openable windows or breakable tempered glass panels in the exterior walls. The area of the openable windows or breakable tempered glass panels shall be a minimum of 20 square feet (2 m²) in area. The openable windows or breakable tempered glass panels shall be located in the exterior walls around the perimeter of the floor no more than 50 linear feet (15 240 mm).

8502.3.1 Capacity. Smoke-control systems shall provide at least six air changes per hour for all areas within the building including basements, provide exhaust to the exterior of the building, and provide an adequate makeup air supply that is uniformly distributed.

8502.3.2 Smoke dampers. If a smoke-control system serves more than one floor, then smoke dampers shall be installed in the main exhaust air ducts and the main supply air ducts serving each floor and shall comply with the activation requirements of Section 716.3.2.1 of this Code. The smoke dampers shall be installed in a manner that will prevent the movement of smoke from one floor to another floor when the dampers are closed. The vertical risers of the main exhaust air duct shall be installed in metal ducts complying with the requirements for product-conveying ducts in Chapters 5 and 6 of the *Mechanical Code*.

In the fire-fighter's control panel, all smoke dampers within the same smoke-control zone shall be actuated by one On-Auto-Off switch in accordance with Section 909.16.3 of this Code, except that an alternate actuation

method may be allowed when approved by both the fire department and the Department.

Combination fire and smoke dampers, and smoke dampers shall be listed to conform to UL 555 and they shall be accessible for inspection, service and repair. Pneumatic tubing to operate these dampers shall be of noncombustible materials.

8502.3.3 Fire-fighter's control panel. The fire-fighter's control panel shall comply with all the requirements of Section 909.16 of this Code, except that graphically depicted representation of the building may be omitted when accepted by the fire department. The fire-fighter's control panel shall monitor and be capable of overriding the mechanical test panel. The mechanical test panel is a separate control panel that provides controls and displays the status of the ventilation fans, dampers, and other smoke control devices as required by Section 909 of this Code and shall be located in the same room as the fire-fighter's control panel.

8502.3.4 Performance test. Upon completion and before final approval of the installation of a smoke-control system required by this Code, a smoke control performance test, complying with the testing procedures of Section 909.18 of this Code shall be used to verify the rate of air-flow and proper operation as specified in this chapter. Tests shall be conducted in the presence of both the fire department and the Department.

Prior to conducting the required smoke control performance test, a preliminary performance report shall be submitted to the Department by a person holding a Certificate of Qualification as required by Section 909.18 of this Code, verifying that the performance criteria of the Department have been met.

8502.3.5 Additional smoke control requirements. Existing air conditioning and ventilation systems may be used as part of the smoke-control system. Existing return air plenum and approved fiberglass air ducts may be used as part of the smoke-control system. A smoke exhaust system shall be designed in a manner that will prevent smoke from going from one room to another, except when two or more rooms are connected together by means of a permanent unobstructed opening at least 20 square feet (1.9 m²) with a minimum 3 feet (914 mm) dimension, then the rooms shall be considered as one room for the purpose of designing the smoke-control system.

8502.4 Fire-extinguishing system. Fire sprinkler system, standpipe system and water storage tank shall be provided as required for a new building of the same height, type of construction and occupancy, except that a high-rise building for which a building permit was issued prior to July 1, 1974, that may comply with the fire safety standards of Section 8604 of this Code.

The fire sprinkler system, if required, shall be installed in accordance with NFPA 13 as adopted by the *Plumbing Code*.

8502.5 Fire alarm system. If a fire alarm system is required by Section 907.2.8 or 907.2.12.2 of this Code for a new building of the same type of construction and occupancy, or installed at the option of the owner, then the entire building shall have fire alarm systems that are in full compliance with Section 907.2.8 of this Code. In a high-rise building, the fire alarm systems shall be supplied by a generator used as an emergency system in accordance with Section 403.11 of this Code. For all other buildings, an alternate source of power may be used provided it is approved by both the fire department and the Department.

High-rise buildings shall be provided with a central control station (fire control room) that complies with all the requirements of Section 403.8 of this Code and Section 57.118.02 of the *Fire Code* including the minimum room dimensions of 10 feet by 10 feet (3048 mm by 3048 mm).

8502.6 Fire pumps and generator (combustion engines and gas turbines) rooms. In high-rise buildings, diesel or/and electric fire pumps shall be provided as required for a new building, except that a high-rise building for which a building permit was issued prior to July 1, 1974, may comply with Section 8604.6.5 of this Code.

Fire pump and generator (combustion engines and gas turbines) rooms shall be separated with a minimum 1-hour occupancy separation from adjoining rooms and from each other.

Combustion air and room ventilation air shall be required by the building and mechanical codes, except that the room ventilation exhaust may be considered as environmental air.

In rooms containing diesel fire pumps and generators, a flue venting system shall be provided which complies with the requirements of Chapter 8 of the *Mechanical Code*, except that:

- A. Clearance from the flue venting system to any combustible material may be reduced to 6 inches (152 mm) if the vent is wrapped with an approved insulation equivalent to 2-hour fire-rated assembly for high-rise buildings and 1-hour fire-rated assembly for all other types of buildings;
- B. The flue venting system may terminate at the exterior wall of the building provided the exhaust outlet is located at least: 10 feet (3048 mm) above adjacent grade, 10 feet (3048 mm) from the property line or center line of a public way, 10 feet (3048 mm) from any opening into the building, and extending out at least 3 feet (1828 mm) from the exterior wall of the building, or
- C. The flue venting system may terminate under the roof overhang, provided the exhaust outlet is located lower than the overhang by a distance equal to the projection of the overhang.

8502.7 Means of egress. The portion of the building converted to a joint living and work quarter shall be provided with means of egress as required by Chapter 10 of this Code for a new building, except that the alternative requirements of Sections 8502.7.1 through 8502.7.5 may be used in lieu of the requirements in Chapter 10 of this Code. An existing fire escape that is in good operating condition, may be used as a second means of egress, provided the fire escape does not serve as an exit for an assembly occupancy.

8502.7.1 Corridors. All public corridors serving the occupants of the joint living and work quarter shall comply with all the requirements of Section 1017 of this Code, except as follows:

- A. Existing nonconforming fire-resistive walls and ceiling of a corridor constructed of wood lath and plaster, which are in good condition, may be acceptable as equivalent to the required 1-hour fire-resistant construction.
- B. Existing doors between the corridor and the joint living and work quarter that are part of the historic fabric of a qualified historical building may be allowed to remain provided approved smoke gaskets and self-closing and latching devices to prevent smoke penetration are installed on the door, or the existing door shall be replaced with a door conforming to the requirements of Section 1017.1 of this Code.
- C. Glazing elements that are part of the historic fabric of a qualified historical building and located in corridors, may be allowed to remain provided the fixed transoms, glass doors and other glazed openings are provided with smoke gaskets, and one layer of $\frac{5}{8}$ -inch (16 mm) type "X" drywall on the room side or other acceptable fire rated protection.

8502.7.2 Dead-end corridors. An existing dead-end corridor which exceeds 20 feet (6096 mm) in length and serves the occupants of a joint living and work quarter may remain, provided the dead-end corridor complies with all of the following:

- A. The dead-end corridor shall be constructed as described above in Section 8502.7.1 for the full length of the dead-end corridor.
- B. The dead-end corridor shall not exceed 40 feet (1219 mm) in length.
- C. A door with a magnetic hold-open device shall be placed across the corridor to create a vestibule located furthest from the open end of the dead-end corridor. The placement of the door shall be located not more than 20 feet (6096 mm) from the open end of the dead-end corridor and the occupant load of the vestibule shall be less than 10 occupants.

8502.7.3 Means of egress illumination and exit signs. Means of egress illumination, exit signs, floor-level exit signs and exit path markings serving a joint living and work quarter shall comply with Sections 1011 and 1006 of this Code.

8502.7.4 Exit stairway. All exit stairways shall be enclosed and shall comply with all the requirements of Section 1020 of this Code. Existing exit stairway enclosures may be allowed to pass through the first-floor elevator lobby, provided an approved fire-rated smoke-sealed door is placed in front of the elevator door on the first floor or there is another exit stairway enclosure leading directly to the public way.

8502.7.5 Pressurization of exit stairway enclosure. If pressurization of exit stairway enclosure is required, then a mechanical ventilation system shall be provided. The

mechanical ventilation system shall provide a uniform air velocity of not less than 50 feet per minute (0.25 m/s) while maintaining a positive pressure [not exceeding 25 pounds force (2750 N) on an interior door] relative to the adjacent areas and discharging this air to the outside of the building.

The mechanical ventilation system shall be activated simultaneously with the fire sprinkler system or the smoke detector system. The mechanical ventilation system shall be supplied with primary and secondary sources of power. The primary power shall be provided by the power system supplied by the public utilities. The secondary power shall be from an approved standby source complying with the *Electrical Code*.

8502.8 Accessibility (Disabled Access). The conversion of an existing building or portion thereof to a joint living and work quarter(s) shall be considered residential occupancy for the purpose of applying accessibility (Disabled Access) requirements. Inasmuch as there are no public sales and no access to the public, any portion of a building that is converted to a Joint living and work quarter(s) and any area of the building that serves the the joint living and work quarter(s) is not required to comply with disabled access requirements of Chapter 11A.

8502.9 Interior environment. All habitable rooms in the joint living and work quarter shall be provided with natural light and ventilation by means of exterior glazed openings.

8502.9.1 Light. Windows or skylights with a total area not less than one fifteenth of the floor area of the room may be used to satisfy the natural light requirements. Kitchens may be provided with artificial light.

8502.9.2 Ventilation. Habitable rooms shall be provided with natural ventilation by means of openable exterior openings with an area of not less than one thirtieth of the floor area of the room. In lieu of required openable exterior openings, a mechanical ventilation system may be provided.

Public corridors or hallways shall be provided with an adequate ventilation system when all the habitable rooms in the joint living and work quarter on the floor do not have openable exterior openings that comply with the requirements of Section 1203.1 of this Code.

Adequate ventilation system for the public corridors shall mean either openable exterior window or permanent exterior opening having a minimum area of 5 square feet (0.46 m²), or a mechanical ventilation system that complies with the requirements of Sections 8502.14 and 1203.1 of this Code.

8502.9.3 Light and ventilation court. A window may open into an existing court for light and ventilation, provided the court is has adequate access at the bottom of the court for cleaning purposes. Every court more than two stories in height shall be provided with a horizontal air intake at the bottom of the court from the court to the exterior of the building, unless the court opens to a yard or public way.

The horizontal air intake shall not be less than 10 square feet (0.93 m²) in cross-sectional area and shall lead to the exterior of the building. The construction of the horizontal air intake shall be as required for the court walls of the building, but in no case shall be less than 1-hour fire-resistant

construction. A mechanical ventilation system complying with the *Mechanical Code* may vent the court in lieu of the horizontal air intake.

Exception: When approved by the Superintendent of Building, an existing court may be deemed adequate for the purpose of providing light and ventilation based upon the area and height of the court.

8502.10 Sound transmission insulation. Existing construction may remain without complying with the sound transmission insulation requirements for any newly created joint living and work quarter. All new construction shall comply with sound transmission requirements of Section 1207 of this Code.

8502.11 Energy conservation. All new HVAC and new lighting systems shall comply with the current energy conservation requirements contained in Part 6 of Title 24 of the *California Code of Regulations (California Energy Code)*. An Existing Building with a joint living and work quarter need not comply with the building envelope requirements of the *California Energy Code*, if the Building Envelope is not altered in anyway due to compliance with other code requirements.

8502.12 Structural design requirements (seismic provision). The conversion of any portion of an Existing Building to a joint living and work quarter shall be considered a "substantial alteration" when applying Exception 1 of Section 8203 of this Code.

All existing buildings (including those specifically stated in Sections 8502.12.1 through 8502.12.4 of this Code) shall be analyzed for 75 percent of the design earthquake ground motion, as defined in Section 1613.2 of this Code and as specified in Section 1613.5 of this Code, but in no event shall there be a reduction in the capacity of the seismic force resisting system where that system provides a greater level of protection than the minimum requirements established by this chapter.

Performance-based engineering analysis and design procedures may be used to evaluate the existing structure and the design of strengthening elements when approved by the Superintendent of Building. All structural elements of the building shall be strengthened to meet the minimum design analysis as specified in Sections 8502.12.1 through 8502.12.4 of this Code or new structural elements shall be added when required. All new structural elements shall meet current detailing requirements of Section 1604 of this Code.

Other types of buildings not mentioned in this section, such as steel frame buildings with semi-rigid beam-column connections, dual systems with steel moment frames and concrete shear walls, or steel frame buildings with steel bracing shall comply with the standards developed by the Department.

8502.12.1 Unreinforced masonry bearing wall buildings (URM). Unreinforced masonry brick buildings shall comply with the requirements of Chapter 88 of this Code, except that a moment-resisting frame shall not be used with an unreinforced masonry wall in a single line of resistance unless the moment-resisting frame is designed to carry 100 percent of the lateral forces designated in Chapter 88 of this Code and the story drift ratio is limited to 0.0025.

The use of Appendix Chapter 1 of Part 10 of the *California Code of Regulations Title 24 (California Code for*

Building Conservation) is permitted when approved by the Superintendent of Building.

8502.12.2 Reinforced concrete buildings and concrete frame buildings with and without masonry infill walls. Reinforced concrete buildings or concrete frame buildings with or without masonry infill walls and that are within the scope of Section 9502 of this Code shall comply with all the provisions of Chapter 95 of this Code.

Exception: When approved by the Superintendent of Building, the *Guidelines for Seismic Retrofit of Existing Buildings* may be permitted as an alternate standard to strengthen reinforced concrete buildings and concrete frame buildings with and without masonry infill walls.

8502.12.3 Steel frame buildings with masonry infill walls. Steel frame buildings with masonry infill walls shall be made to comply with the standards as developed by the Department and all the provisions of Chapter 95 of this Code except for the following: Item A of Section 9509.6 of this Code, Items 1 and 2 of Section 9509.7.2 of this Code, and Sections 9509.9 and 9511.5.1 of this Code.

8502.12.4 Welded steel moment-frame (WSMF) buildings. All buildings constructed prior to March 7, 1995, utilizing WSMF as their primary lateral force resisting system shall be evaluated by the standards developed by the Department.

All existing WSMF buildings, which have experienced greater than 0.25g-peak ground acceleration and which were constructed prior to March 7, 1995, shall be evaluated using procedures and repair criteria of FEMA 352, "Recommended Post-earthquake Evaluation and Repair Criteria for Welded Steel Moment-Frame Buildings." An engineering report shall be submitted to the Department. The engineering report shall either substantiate that the existing steel moment framed connections are in good condition, or recommend repair procedures for the welded steel moment-frame connections that are cracked or otherwise compromised.

8502.13 Electrical systems. All electrical systems and installations for a joint living and work quarter and other alterations in adjoining areas shall be designed in accordance with the *Electrical Code* except that the general lighting in the joint living and work quarter shall be installed based on the unit load of 6.5 volt-amperes per square foot. The load calculation and wiring installation in a joint living and work quarter shall be as required for the residential occupancy.

8502.14 Mechanical systems. All mechanical systems shall comply with the requirements of the *Mechanical Code*. The ventilation system for the corridor shall be designed independently of the ventilation system for the joint living and work quarter or any other adjoining rooms. When a corridor is divided by the placement of self-closing door(s), the ventilation system shall be designed for each portion of the corridor, except when the doors have magnetic hold-open devices, the adjoining corridors may be considered as one space for the purpose of designing the ventilation system. An existing heating and/or cooling system may be used in lieu of the ventilation system for the corridor, provided the heating and/or cooling system is independent from the

LA heating and/or cooling system for the joint living and work quar-
LA ter or from any other adjoining rooms.
LA

LA **8502.15 Elevators.** Existing elevators need not comply with
LA the requirements of Chapter 30 of this Code, except when
LA required to comply with the State Elevator Safety Order of
LA Sub-chapter 6, of Chapter 4, Division 1 of Title 8 of the *Califor-*
LA *nia Code of Regulations*. Existing freight elevators shall not be
LA used as passenger elevators.
LA

LA **8502.16 Historical building provisions.** qualified historical
LA buildings may use the *State Historical Building Code*.
LA

CHAPTER 86

SPECIAL PROVISIONS FOR EXISTING BUILDINGS

SECTION 8601 GENERAL

In addition to the general requirements of Chapter 81, every building housing occupancy classifications specifically specified in a section of this chapter shall conform to the requirements of that section.

SECTION 8602 GROUP E OCCUPANCIES

8602.1 Scope. This section shall apply to every lawfully existing Group E occupancy housed in a building constructed prior to July 1, 1961.

8602.2 Certificate of Occupancy.

8602.2.1 Revocation. The Certificate of Occupancy for any lawfully existing Group E occupancy housed in a building constructed prior to July 1, 1961, may be revoked by the Department as follows if, upon inspection, the building is found in violation of requirements of this section:

1. If the violations, defects or hazards found to be existing therein are immediately dangerous to the public health, safety or general welfare, and if effective repair is not commenced within 180 days after the issuance of an order to do so by the Department; or
2. If the violations, defects or hazards found to be existing therein are not of such a nature as described hereinabove, and effective repair is not commenced within five years after the issuance of an order to do so by the Department.

8602.2.2 Issuance. A new Certificate of Occupancy shall be issued for any lawfully existing Group E occupancy housed in a building constructed prior to July 1, 1961, if such building is either made to comply with all of the requirements of this Chapter, or is made to comply with the requirements of Sections 8602.6, 8602.7 and 8602.8.

8602.3 Other laws. Except as otherwise specifically provided for herein, this section does not repeal, alter or modify any other provisions of this Code.

8602.4 Violation. It shall be unlawful for any person to use or permit the use of any building for a Group E occupancy:

8602.4.1 After a Certificate of Occupancy has been revoked in accordance with the provisions of Section 8602.2 after July 1, 1961;

8602.4.2 In any case where a Certificate of Occupancy has not been issued, unless the building is constructed in full conformity with all other applicable provisions of this Code; or

8602.4.3 Unless such building is constructed, operated, used and maintained as required by this section.

8602.5 Alternate methods. The Department may, after referral to and report from the Fire Department, approve alternate methods of obtaining the equivalent fire protection and safety required by this section, provided the Department finds that the existing condition of the building under consideration makes strict conformity impracticable and that such alternate methods are within the purpose and intent of this section.

8602.6 One-story buildings. One-story buildings shall conform to the requirements of this section and Section 305.1.

8602.7 Buildings over one story.

8602.7.1 Type V buildings two stories or more in height shall not be used to house Group E Occupancies unless such buildings are completely sprinklered.

Exception: Complete sprinklers are not required where the Group E occupancy is only in the first story of a two-story building and the Group E occupancy conforms to the requirements of a one-story building as set forth in this section.

8602.7.2 Every building over one story in height shall have sprinklers installed in all hallways, stair shafts, stairways, basements, laboratory and vocational rooms, and other usable areas not customarily used for class, toilet or assembly purposes.

Exceptions:

1. The Department may, after referral to and report from the Fire Department, modify the above requirement, provided it is first found that equivalent alternate safety measures are provided.
2. Sprinklers may be omitted, provided every room used for instruction purposes or assembly is provided with exits giving direct egress to the exterior of the building.
3. Covered walkways complying with the requirements of Section 409 and balconies need not be sprinklered.

8602.7.3 A sprinkler system required under the provisions of this part shall be electrically interconnected to the building fire alarm system.

8602.8 General.

8602.8.1 All requirements of this Code with respect to exits shall be complied with.

Exceptions:

1. The provisions of Section 711 which require shaft enclosures need not be complied with, provided the provisions of this section are met.
2. Every boiler using liquid or solid fuel shall be housed in a boiler room separated from the remainder of the building by two-hour fire-resistive construction with

openings protected by a fire assembly having a one- and one-half-hour fire-resistive rating.

3. Every boiler using fuel gas shall be housed in a boiler room separated from the rest of the building by 1-hour fire-resistive construction with openings protected by a fire assembly having a 1-hour fire-resistive rating.
4. Each gas piping system serving a Group E occupancy shall be provided with a gas shutoff valve designed to close the flow of gas to the piping system and a label designating such valve. The label shall be of corrosion-resistant metal with letters at least 3 inches (76 mm) high, stating: "GAS SHUT-OFF VALVE."
5. Any fire-warning system required to be installed by the Los Angeles Fire Department pursuant to the provisions of Article 7, Chapter V of the *Los Angeles Municipal Code* shall meet the requirements of Article 760 of the *California Electrical Code* adopted by the City of Los Angeles.

SECTION 8603

FIRE PROTECTION – WARNING SYSTEM

8603.1 Group R, Division 1 and Division 2 occupancies.

8603.1.1 Existing residential building. Except as otherwise provided in Section 8603.1.2, the provisions of Section 907.2.10 of this Code shall apply to every dwelling unit, efficiency dwelling unit, guest room and suite in any building where the original building permit was issued prior to May 18, 1980. The smoke detectors may be battery operated until August 1, 1983, at which time the smoke detectors shall be located and permanently wired as required in Section 907.2.10 of this Code.

Nothing here shall be construed to waive the requirement for permanently wired smoke detectors, which was in effect at the time the original building permit for the building was issued.

Every permanently wired smoke detector installed in a corridor or area giving access to the sleeping rooms shall be located within 12 feet 6 inches (3810 mm) of the sleeping room. Where the location of the detector is less than 12 feet six inches (3810 mm) of an appliance, which produces products of combustion other than a forced-air heating unit, a photoelectric type detector shall be required. There shall be no more than one door separating that type of detector from any room used for sleeping purposes. A permanently wired smoke detector installed pursuant to a permit issued prior to July 31, 1981, need not comply with this paragraph until replaced.

8603.1.2 Existing apartment hotels and hotels over 75 feet (22 860 mm) in height. Every existing apartment hotel more than 75 feet (22 860 mm) in height and containing no more than nine dwelling units and every existing hotel more than 75 feet in height, where the original building permit for the building was issued prior to May 18, 1980, shall comply

with the provisions of Section 907.2.10 of this Code not later than August 1, 1981.

Exception: The operative date for compliance may be delayed until August 1, 1982, if the Department determines that the building complies with either the provisions of Sections 419 and 602.2 of this Code or Sections 2-1733 through 2-1747 of Title 19 of the *California Administrative Code*.

Notwithstanding any other provision here to the contrary, every guest room in any apartment hotel or hotel described in this section when used as a light-housekeeping room, as that term is described in Section 811.1 of this Code, shall be provided with smoke detectors in compliance with the provisions of Section 907.2.10 of this Code and the provisions of Section 8603.2 pertaining to photoelectric type smoke detectors located in corridors or areas giving access to sleeping rooms. Smoke detectors may be battery operated until August 1, 1982, at which time the smoke detectors shall be located and permanently wired as required by Section 907.2.10 of this Code.

8603.2 Group R, Division 3 occupancies.

8603.2.1 Existing one-family dwellings. After July 31, 1980, existing one-family dwellings shall be provided with smoke detectors, which may be battery operated, located as specified in Section 907.2.10 of this Code for Group R, Division 3 occupancies, if:

1. The dwelling is sold or exchanged and the original building permit was issued prior to May 19, 1980;
2. Alterations, repairs or additions requiring a permit are made or reroofing or shower pan replacement is performed by a Certified Licensed Contractor pursuant to Section 108.12 of this Code with a valuation in excess of \$1,000.00;
3. One or more sleeping rooms are added or created; or
4. Bars, grilles, grates, roll-down security shutters, or similar devices are installed on all emergency escape windows and exterior doors of any sleeping rooms.

Nothing here shall be construed to waive the requirement to install permanently wired smoke detectors, which were required at the time the original building permit for the building was issued.

For the purposes of this subsection, the term "permit" shall not include permits required for the repair or replacement of electrical, plumbing or mechanical equipment.

8603.2.2 Existing two-family dwellings. Every building containing two dwelling units and not more than five guest rooms, where the original building permit was issued prior to May 18, 1980, shall comply with the provisions of Section 907.2.10 of this Code and the provisions of Section 8603.2.1 pertaining to photoelectric-type smoke detectors located in corridors or areas giving access to sleeping rooms. Smoke detectors may be battery operated until August 1, 1983, at which time the smoke detectors shall be located and permanently wired as required by Section 907.2.10 of this Code.

Nothing here shall be construed to waive a requirement to install permanently wired smoke detectors, which were required at the time the original building permit for the building was issued.

SECTION 8604 FIRE SAFETY STANDARDS

8604.1 General.

8604.1.1 Notification.

8604.1.1.1 Whenever the Department of Building and Safety determines by inspection that a building does not conform to the minimum requirements of either Sections 8604.2, 8604.3, 8604.4 or 8604.5, the Department of Building and Safety shall prepare a written Fire Safety Standards Repair Order directing the owner to repair and modify the building so as to conform to those minimum requirements. The Department of Building and Safety shall serve the order either personally or by certified or registered mail, upon the owner as shown on the last equalized assessment roll and may serve the order upon the person, if any, in real or apparent charge or control of the building.

The order shall specify the manner in which the building fails to meet the minimum requirements of either Sections 8604.2, 8604.3, 8604.4 or 8604.5. The order shall direct the owner of the building to submit plans, obtain the necessary permits and complete the necessary corrections.

8604.1.1.2 Whenever, pursuant to Section 57.01.22 of the *Los Angeles Municipal Code*, the fire department determines by inspection that a building does not conform to the minimum requirements of Section 8604.6, it shall prepare a written Fire/Life Safety Order directing the owner to repair and modify the building so as to conform to the minimum requirements of Section 8604.6.

The order shall specify the manner in which the building fails to meet the minimum requirements of Section 8604.6. The order shall direct the owner of the building to submit plans, obtain necessary permits and complete the necessary corrections.

The order shall be transmitted to the Department of Building and Safety for service, recording and enforcement purposes. The Department of Building and Safety shall serve the order, either personally or by certified or registered mail, upon the owner as shown on the last equalized assessment roll and may serve the person, if any, in real or apparent charge or control of the building. The provisions of this subparagraph are not intended to prevent the Department of Building and Safety from also making a determination or issuing an order regarding failure to comply with Section 8604.6.

8604.1.2 Time for compliance.

8604.1.2.1 Whenever the Department of Building and Safety serves a Fire Safety Standards Repair Order pursuant to Section 8604.1.1.1 above, the owner of a building shall submit plans and obtain necessary permits as

required in that order not later than 90 days after service of the order and shall complete necessary corrections not later than 1 year after service of the order for work under Sections 8604.2, 8604.3, 8604.4 or 8604.5. No extension of time, either to submit plans, obtain permits or complete the necessary corrections shall be granted except by the Board of Building and Safety Commissioners upon a finding of unusual circumstances which warrant an extension.

8604.1.2.2 Whenever the Department of Building and Safety serves a Fire/Life Safety Order pursuant to Section 8604.1.1.2, the owner of a building shall:

- (1) Submit main system plans, which include Plans for any required water storage tank, fire pump(s), Fire Department connection(s) and all sprinkler riser valves for sprinkler connections of each floor;
- (2) Obtain necessary main system permits as required in that order not later than one year after service of the order; and
- (3) Complete necessary corrections required by the Fire/Life Safety Order not later than three years after service of the order for work required under Section 8604.6.

Exceptions to the time for work required under Section 8604.6:

1. **Vacant building.** If a building is vacant and secured from unauthorized entry, then the owner of the building may apply to the Department of Building and Safety for an extension of time to comply with the requirements of Section 8604.6. An extension of time may be granted for a two year period and may be renewed for two year time periods, unless to do so poses a threat of health or safety. This extension of time expires and the building is subject to enforcement procedures if it is no longer adequately secured from unauthorized entry.
2. **Buildings only occupied below the second floor.** If a building is only occupied below the second floor and all floors from the second floor and above are vacant and secured from unauthorized entry, then the owner(s) of that building may apply to the Department of Building and Safety for an extension of time to comply with the requirements of Section 8604.6, provided sprinklers are installed on the occupied floors(s) and a 2-hour fire-rated separation is provided between the vacant and occupied floors. Such an extension of time may be granted for a 2 year period and may be renewed for additional 2 year time periods, unless to do so poses a threat to health or safety. No vacant portion of the building may be reoccupied until the requirements of Exception 3 of Section 8604.1.2.2, are satisfied. This extension of time expires and the building is subject to enforce-

ment procedures if it is no longer adequately secured above the first floor from unauthorized entry.

3. **Buildings with occupancy above the first floor.** The owner of a building cited for a violation of Section 8604.6 may request an extension of time to comply with those requirements. Extensions of time may be granted for a period of 1 year from the date of application and may be renewed for two additional 1 year periods. The owner shall submit to the Department a plan of action to:

- (a) Install fire sprinklers, including the base system, fire alarm, emergency power and stairwell ventilation from the ground floor up to the floor above the highest occupied floor; and
- (b) Bring elevator lobby vestibules on all required floors up to the highest occupied floor into compliance.

An additional 3-year extension of time to comply with the requirements of Section 8604.6 on the remaining unoccupied floors of the building may be granted subject to the owner completing all requirements in the occupied portions of the building within the time guidelines of the owner's plan of action, unless to do so poses a threat of health or safety.

4. **Asbestos.** If an owner of a building commits to a program of abatement of asbestos, then the Department of Building and Safety may grant an extension of time to complete the work required under Section 8604.6, provided that all necessary permits are obtained and the required water storage tank, fire pumps, riser and all sprinkler riser valves for sprinkler connections on each floor are installed and operational prior to the grant of any extension.

Subsequent extension approvals beyond the initial approval shall also be conditioned on progress of work in conformance with the plan of work submitted with the approved extension of time.

Request for an extension of time under Exceptions 1-4 above shall be filed on an application form provided by the Department of Building and Safety and signed by the owner of the building. Applications are subject to review and action by the Department of Building and Safety with concurrence by the Fire Department. An extension of time may be granted only where a good faith effort to comply can be demonstrated by the applicant. Applications shall be processed according to the guidelines set forth in Section 98.0403.2.

8604.1.2.3 Records. At the time that the Department of Building and Safety serves a Fire/Life Safety Order or Fire Safety Repair Order, the Department shall file with the Office of the County Recorder a certificate stating

that the building does not meet the minimum fire safety requirements of Sections 8604.2, 8604.3, 8604.4, 8604.5 or 8604.6 and that the owner of the building has been so notified.

After all necessary corrective work has been performed, the Department of Building and Safety shall file with the Office of the County Recorder a certificate terminating the status of the building as nonconforming to the minimum fire safety requirements of Sections 8604.2, 8604.3, 8604.4, 8604.5 or 8604.6.

8604.1.2.4 Enforcement. Notwithstanding any other provisions of this Code to the contrary, it shall be unlawful for any person, firm or corporation to maintain, use or occupy any building within the scope of this section which does not meet the minimum standards specified in Section 8604.6.

Any person who fails to comply with an order issued pursuant to this section, within each of the time periods set forth in Section 8604.1.2.2, or who causes or permits another person to fail to comply with such an order, is guilty of a misdemeanor which is punishable by a fine of not more than \$1,000.00 and/or 6 months imprisonment.

For purposes of this paragraph, the phrase "any person" includes an owner, or lessor, sublessor, manager or any person in control of a building subject to this section. The legal owner of a building is that person, firm, corporation, partnership or other entity whose name or title appears in the records in the Office of the County Recorder, as well as all successors or assignees of these owners.

In addition to any other remedy available at law, if the owner or other person in charge and control of the building fails to comply with an aforementioned order within the time periods set forth in Section 8604.1, the Department of Building and Safety may order that the building be vacated and that the building remain vacated until all required corrective work has been completed. Whenever compliance with an order issued pursuant to the provision of this section has not been accomplished within 90 days after the date the building has been ordered vacated, or such additional time as may have been granted by the Board, the Department may order demolition of the building, in accordance with the provisions of Chapter 89.

8604.2 Commercial buildings.

8604.2.1 Purpose. The purpose of this subsection is to provide a reasonable degree of fire safety for persons occupying existing commercial and industrial buildings.

8604.2.2 Scope The provisions of this section shall apply to all existing commercial and industrial buildings more than two stories in height which do not conform to the minimum shaft enclosure and exit requirements of this Code and which are not required to comply with Section 1733 of Part 2, Title 24, of the *California Administrative Code* for existing buildings over 75 feet (22 860 mm) in height. The provisions of this subsection shall not authorize the modification of existing buildings or portions thereof which provide a

greater degree of protection against fire than the minimum requirements established by this subsection.

Exception: The requirements of this subsection shall not apply to buildings erected after January 1, 1943.

8604.2.3 Shaft enclosures. Every opening in a floor shall be enclosed as required by Section 707 of this Code for shaft enclosures, provided, however, that existing enclosure walls constructed of wood lath and plaster or equivalent fire-resistive materials and that are in good condition may be accepted in lieu of enclosure wall construction.

Corridor exits, which are interrupted by stairwell enclosures required by this subdivision, shall be provided with exit door fire assemblies that will close automatically when activated by an approved smoke detector.

Exceptions:

1. The shaft protection required by this paragraph may be omitted if the building is sprinklered throughout.
2. Existing metal elevator doors need not be replaced if they are in good condition. These doors may have openings protected with wire glass.

8604.2.4 Exits. Two reasonably separated and accessible exits shall be provided from each floor.

Exception: Existing fire escapes that are in structurally sound operational condition may be used as one means of egress.

Exit signal with letters at least 6 inches (152 mm) high shall be installed in conspicuous locations at each exit from the floor and whenever otherwise required to clearly indicate the direction of egress from area served.

8604.3 Residential buildings.

8604.3.1 Purpose. The purpose of this subsection is to provide a reasonable degree of fire safety for persons living and sleeping in apartment houses, hotels, apartment hotels, and in buildings housing Group R-4 or I-1 occupancy. Group R-4 or I-1 occupancy includes homes with medical care for ambulatory patients or children 6 years of age or over, and honor farms or conservation camps housing inmates who are not restrained. Alterations are required to these existing buildings, which do not conform to the minimum exiting, shaft enclosure and corridor protection requirements of this Code.

8604.3.2 Scope. The provisions of this subsection shall apply to all existing buildings more than two stories in height, which contain Group R-1, R-2, R-4 or I-1 occupancy. Group R-4 or I-1 occupancy include homes with medical care for ambulatory patients or children 6 years of age or over, and honor farms or conservation camps housing inmates who are not restrained. The provisions of this subsection shall not authorize the modification of existing buildings or portions of buildings, which provide a greater degree of protection against fire than the minimum requirements established by this subsection.

8604.3.3 Corridor walls and openings. The walls of every public corridor shall be protected by 1-hour fire-resistive construction, provided, however, that existing walls constructed of wood lath and plaster and which are in good condition, will be acceptable in lieu thereof.

Transoms and openings other than doors from public corridors to guest rooms and dwelling units shall be closed and solidly covered with material that will provide the degree of fire resistance as shall be provided by adjacent corridor walls.

All door openings from public corridors to guest rooms and dwelling units shall provide the same degree of fire resistance as shall be provided by adjacent corridor walls.

Exception: Door openings from public corridors to guest rooms and dwelling units may have 20-minute protection, provided:

- A. All stairways, hallways, exitways and storage or closet areas adjacent thereto are sprinklered;
- B. A sprinkler head is placed inside each unit adjacent to each door opening from the public corridor to the guest room or dwelling unit; and
- C. An approved self-closing device is installed on each door opening from the public corridor into the guest room or dwelling unit.

8604.3.4 Shaft enclosures. All stairwells shall be enclosed in approved shaft enclosures, provided, however, that existing enclosure walls constructed of wood lath and plaster which are in good condition will be accepted in lieu of approved shaft wall construction.

Exception: In buildings erected prior to January 1, 1943, stair shaft enclosures may be omitted if the building is sprinklered throughout and the sprinkler system is interconnected to the alarm system required under Section 8604.5 of this Code.

8604.3.5 Existing conditions.

8604.3.5.1. Existing means of exit, including fire escapes, are acceptable where they exist in the required number and are maintained in good condition.

8604.3.5.2. No standpipes will be required where none exist.

8604.3.5.3. No emergency hallway illumination will be required where none exist.

8604.3.5.4. Dead-end corridors not over 20 feet (6096 mm) in length may have access to a second exit through a stair shaft enclosure.

8604.4 Fire safety for existing Group R-4 or I-1 occupancy. This section applies to every existing Group R-4 or I-1 occupancy over two stories in height with homes providing medical care for ambulatory patients or children 6 years of age or over, or with honor farms or conservation camps housing un-restrained inmates. When these buildings do not conform to the minimum shaft and corridor protection requirements of this Code, they shall be made to conform to the minimum requirements as specified in Section 8604.3.

8604.5 Fire protection standards for existing Group R -1 or R-2 occupancies erected prior to January 1, 1943.

8604.5.1 Scope. The provisions of this section are in addition to those in Section 8604.3 and apply to all existing buildings three or more stories in height, which contain Group R-1 or R-2 occupancies and which were erected prior to January 1, 1943.

8604.5.2 Closure of doors. All required stair shaft, cut-off and area separation doors shall be equipped with approved self-closing devices and electrically operated hold-open devices designed to release the door by the activation of smoke detectors located on each side of the doorway and within 12 inches (305 mm) of the ceiling.

8604.5.3 Sprinklers. All interior stairways, hallways, exits and storage or closet areas adjacent thereto shall be provided with an approved automatic sprinkler system connected with an alarm system that emits an audible signal throughout the premises. In any room having a door opening into an interior hallway, stairway or exitway, a sprinkler head shall be located inside the room directly over the door. Sprinklers so installed shall be equipped with listed residential sprinkler heads and may utilize polybutylene plastic pipe for laterals only. Sprinkler materials and installation shall comply with the *Plumbing Code* and Supplemental Rules and Regulations.

8604.5.4 Self-closing device. Each apartment or guest room door opening into an interior stairway, hallway or exit shall be equipped with an approved self-closing device.

8604.5.5 State Fire Code. Where the Group R-1 or R-2 occupancy regulated by this section has floors used for human occupancy more than 75 feet (22 860 mm) above the lowest floor level having building access, the provisions of Part 2 of Title 24 of the *California Administrative Code* relating to those occupancy shall apply in lieu of any less restrictive provisions set forth in this section.

8604.6 Fire safety standards for existing high-rise buildings.

8604.6.1 Purpose. The purpose of this section is to provide a reasonable degree of fire safety for persons occupying existing high-rise buildings.

8604.6.2 Scope. The provisions of this section shall apply to every existing high-rise building for which a building permit was issued prior to July 1, 1974.

Exception: The provisions of this section shall not apply to Group R-1 or R-2 occupancy, as defined in Section 310.1 of this Code. The provisions of this section shall not authorize the modification of existing buildings or portions of the buildings, which provide a greater degree of protection against fire than the minimum requirements established by this section.

8604.6.3 Definition. For the purposes of this section, a high-rise building is a building of any type of construction having floors (as measured from the top of the floor surface) that may be used for human occupancy located more than 75

feet (22 860 mm) above the lowest floor level having building access.

8604.6.4 Requirements. Every building within the scope of this section shall be provided with an automatic fire sprinkler system complying with all applicable sections of the *Los Angeles Municipal Code*. The sprinkler system shall cover all areas of the building.

Exceptions:

1. Sprinklers need not be installed in locations expressly excepted in the *Los Angeles Plumbing Code* provided other approved fire protection equipment is installed.
2. The Department of Building and Safety may review, on a case by case basis, buildings within the scope of this section and may approve alternative fire protection systems which meet the intent of the high-rise sprinkler requirements.
3. The Department of Building and Safety may, with the concurrence of the fire department, grant exceptions from the requirements of Chapter IX, Article 4, Division 7 of the *Los Angeles Municipal Code* as specified in Section 8604.6.5.

8604.6.5 Conditional exceptions. The following exceptions from the requirements set forth in Section 94.2001 of the *Los Angeles Municipal Code* are available upon application to the Department provided all the stated conditions are met for each category of building.

8604.6.5.1 Existing buildings 75 feet to 150 feet (22 860 mm to 45 720) in height.**Exceptions:**

1. Existing risers may be used when maintained in a safe and operable condition.
2. New, on-site water storage need not be provided. (When existing on-site water storage is available, it may be integrated into the fire sprinkler system.)

Conditions:

1. A 3-inch (76 mm) test drain shall be provided in stair shafts where pressure-regulator valves are used. Valves, equipment and devices shall conform to *Los Angeles Plumbing Code* requirements.
2. A single pump having a minimum capacity of 750 gpm (2839 L/min) shall be provided. (Diesel pumps shall have a 4-hour fuel supply.)
3. There shall be a flow of 750 gpm (2839 L/min) at 65 psi (3112 Pa) at the roof, and the sprinkler system design shall meet code requirements.
4. Existing sprinkler systems, existing or new standpipe systems and existing or new sprinkler risers shall be interconnected at the base of the riser system with a minimum of one fire department connection.

5. Emergency standby electrical power with a 4-hour fuel supply shall be provided for fire pumps and the following new installations:

Fire protective signaling systems;
Emergency exit lighting; and
Exit and directional signs.

8604.6.5.2 Existing buildings over 150 feet to 275 feet in height.

Exception: Existing risers may be used when maintained in a safe and operable condition.

Conditions:

1. A 3-inch (76 mm) test drain shall be provided in each stair shaft where pressure- regulator valves are used. Valves, equipment and devices shall conform to *Plumbing Code* requirements.
2. At least two pumps connected to the automatic sprinkler system having a minimum capacity of 750 gpm (2839 L/min) each shall be provided. (Diesel pumps shall have a four hour fuel supply.)
3. There shall be a flow of 750 gpm (2839 L/min) at 65 psi (3112 Pa) at the roof, and the sprinkler system design shall meet code requirements.
4. Existing sprinkler systems, new and existing standpipe systems and new and existing sprinkler risers shall be interconnected at the base of the riser system with at least one fire department connection.
5. Emergency standby electrical power with a four hour fuel supply shall be provided for fire pumps and the following new installations:
Fire-protective signaling systems;
Emergency exit lighting; and
Exit and directional signs.
6. A minimum usable capacity of 20,000 gallon (75 700 L) storage tank shall be provided on site.

8604.6.5.3 Existing buildings greater than 275 feet (83 820 mm) in height.

Exception: Existing risers may be used when maintained in a safe and operable condition.

Conditions:

1. A 3-inch (76 mm) test drain shall be provided in each stair shaft where pressure- reduction valves are used. Valves, equipment and devices shall conform to *Plumbing Code* requirements.
2. At least three pumps connected to the automatic sprinkler system having a minimum capacity of 750 gpm (2839 L/min) each shall be provided.
At least one pump shall be an electric motor-driven pump. (Diesel pumps shall have a four hour fuel supply.)

3. There shall be a flow of 1,000 gpm (37 854 L/min) at 65 psi (342 Pa) at the roof, and the sprinkler system design shall meet code requirements.

4. Existing sprinkler systems, new and existing standpipe systems, and new and existing sprinkler risers shall be interconnected at the base of the riser system with at least one Fire Department connection.

5. Emergency standby electrical power with a four hour fuel supply shall be provided for fire pumps and the following new installations:

Fire-protective signaling systems;
Emergency exit lighting; and
Exit and directional signs.

6. A minimum usable capacity of 40,000 gallon (151 400 L) water storage tank shall be provided on site.

8604.6.6 Elevator lobbies. Existing high-rise buildings within the scope of this section shall comply with the following:

1. Except for the main entrance level, every elevator on each floor shall open into an elevator lobby that is separated from the remainder of the building, including corridors and other exits, by walls having a fire-resistive rating of not less than 1 hour. All lobby openings other than those for elevator doors, stairway enclosures and ducts shall be protected with $\frac{3}{4}$ -hour self-closing fire assemblies actuated by combustion products-type smoke detectors.
2. Except for the main entrance level, each elevator lobby shall be provided with an approved smoke detector located on the lobby ceiling. When the detector is activated, elevator doors shall not open and all cars serving that lobby shall return to the main floor and be under manual control only. The smoke detector shall meet the requirements of Title 8, *California Administrative Code* (Elevator Safety Orders). The detector may serve to close the lobby doors.

8604.6.7 Stair shaft ventilation. Each stair shaft which extends to the roof shall be provided with a minimum ventilation opening of 20 square feet (1.86 m²) at the roof level.

SECTION 8605 EMERGENCY HOMELESS SHELTERS

8605.1 Applicability of standards. The provisions and standards set forth in Section 8605.2 shall be applicable to any emergency shelter for the homeless which complies with and is approved pursuant to Section 12.80 or Section 12.81 of the *Los Angeles Municipal Code*.

8605.2 General. Notwithstanding any provisions of this Code to the contrary, the following requirements shall apply to emergency homeless shelters operated during a shelter crisis, as provided for in Section 8698 of the *Government Code, et seq.* Other than the requirements set forth below, the facilities need

not comply with the requirements of this Code for Group R occupancies unless otherwise specified in this Code:

1. The maximum occupant load allowed in these facilities shall be the number determined appropriate by the professional service provider operating the facility and/or the Community Development Department of the City of Los Angeles, but in no event resulting in less than 50 square feet (232 m²) of usable area per occupant.
2. Fire safety requirements.

A. All exits shall comply with Division 33 of Article 7 of Chapter V of the *Los Angeles Municipal Code* and Chapter 10.

B. Smoke detection devices shall be provided in all sleeping areas and shall be installed in accordance with Division 112 of Article 7 of Chapter V of the *Los Angeles Municipal Code* and Section 907.2.10 of this Code.

C. A fire alarm system capable of arousing occupants shall be installed in accordance with Division 122 of Article 7 of Chapter V of the LAMC and Section 907.1 of this Code.

D. The use of any open flames and the possession or storage of any combustibles shall not be permitted.

Exception: The Superintendent of Building may approve the use of open flames and storage of combustibles in these buildings with concurrence of the fire department.

E. Sleeping quarters shall be limited to the ground floor only.

3. Security.

A. An adequate number of security personnel shall remain on the premises during actual occupancy for the protection of the occupants and property.

B. Adequate lighting for security purposes shall be provided at all times.

4. Light, heating, ventilation and sanitation.

A. Exterior openings for natural light and ventilation shall be provided as required for Group R occupancy, Sections 1203 and 1205 of this Code.

B. All sleeping areas shall be provided with heating facilities capable of maintaining a room temperature of 70° F (21°C) at a point eight feet above the floor.

C. Every building shall be provided with at least one water closet or at least two separate toilet facilities where both sexes are accommodated. Additional water closets shall be provided for each sex at the rate of one for every 20 beds in excess of 20.

5. Additional requirements.

A. Operating procedures shall be developed by the professional service provider and approved by the Community Development Department of the City of Los Angeles. These procedures shall be

designed to maintain order and safety within the Emergency Homeless Shelter.

B. Emergency Homeless Shelters shall be open for occupancy between the hours of 6:00 p.m. and 6:00 a.m. of the following day.

8605.3 Zoning. Every facility used to shelter homeless persons pursuant to this section shall comply with Section 12.80 or Section 12.81 of the *Los Angeles Municipal Code*.

SECTION 8606 EMERGENCY LIGHTING STANDARDS FOR EXISTING RESIDENTIAL BUILDINGS, GROUP R, DIVISION 1 OCCUPANCIES

8606.1 Scope. The provisions of this section apply to all existing buildings, which contain five or more dwelling units with an enclosed exit corridor or pathway that is 50 feet (15 240 mm) in length or greater on any single floor, or which has an enclosed stairway.

Exceptions:

A. The provisions of this section shall not apply to Group R-1 and R-2 occupancies, which currently have lighted emergency exit signs and emergency lights in the corridors and stairwells where both signs and lights are connected to a generator, central battery system or individual battery powered unit.

B. The provisions of this section shall not apply to corridors located inside individual dwelling units.

C. The provisions of this section shall not apply to Group R-1 and R-2 occupancies, which do not contain enclosed exit corridors, enclosed stairways, lobbies, passageways, or other common interior pathways that are part of the exiting system.

8606.2 Definition.

1. The owner is that legal owner of an apartment building, congregate residence, hotel, and in those instances where a building is a condominium, the association of owners or the association of owners and the owner of each unit.

2. The legal owner of a building is that person, firm, corporation, partnership, or other entity whose name or title appears in the last equalized assessment roll in the Office of the County Recorder, as well as all successors or assignees of these owners.

8606.3 Requirements.

8606.3.1 All buildings required to comply with this section shall be provided with:

1. Permanently connected, emergency, battery operated, enclosed exit corridor, enclosed stairway, and exit sign illumination installed in the required exit pathway; or

2. The required emergency enclosed exit corridor, enclosed stairway, and exit sign illumination powered from a central battery system or an emergency generator complying with Article 700 of the NEC.

8606.3.2 Plan check. Plans for the emergency exit corridor and exit sign lighting systems shall be submitted to the Department of Building and Safety for review and approval prior to obtaining a permit. Plans shall provide the information specified in Section 93.0207 of the *Los Angeles Municipal Code (Electrical Code)*.

Exception: Existing buildings having less than four stories and containing fewer than 50 dwelling units are exempt from the requirement to submit electrical plans.

8606.3.3 Means of egress illumination shall be provided for the enclosed exit corridor, enclosed stairway and pathway as required in Section 1006 of this Code.

8606.3.4 Lighted exit signs shall meet the requirements of Section 1011.1 of this Code and where emergency power is required for Group R-1 and R-2 occupancies as specified in Section 1011.5.3 of this Code.

8606.3.5 Emergency battery powered units shall be capable of operating for a minimum one and one-half hours.

8606.3.6 The provisions of this section shall not authorize modifying emergency lighting systems in existing buildings or portions thereof which provide a greater degree of protection than the minimum requirements established by this section.

8606.3.7 When the residential portion of a mixed occupancy building falls within the scope of this section, the non-residential portions of that building must also comply with the provisions of this section.

8606.4 Enforcement.

8606.4.1 Notification. Whenever the Department of Building and Safety or the fire department determines by inspection or review of City records that a Group R-1 or R-2 occupancy multifamily residential building containing five or more dwelling units does not conform to the minimum requirements of this section, either Department shall prepare a written order directing the owner to repair and modify the building so as to conform to the minimum requirements of this section.

The order shall specify the manner in which the building fails to meet the minimum requirements of this section. The order shall direct the owner of the building to submit plans, if required, to the Department of Building and Safety, obtain necessary permits and complete the work specified in the order.

Service of the order shall be accomplished in the following manner:

1. The Department of Building and Safety and/or the fire department may personally serve the order upon the owner; or
2. The Department of Building and Safety and/or the fire department may serve the order by certified or registered mail upon the owner.

In addition, the person in real or apparent charge or control of the building or unit of the building may be served in the manner prescribed by this section.

8606.4.2 Time for compliance. Whenever an order is served pursuant to Section 8606.4.1 above, the owner shall:

1. Submit all building plans required by the order to the Department of Building and Safety within 2 years of the effective date of the order; and
2. Obtain permits required by the order from the Department of Building and Safety as a result of the order within three years of the effective date of the order;
3. Complete the work required by the order within 5 years of the effective date of the order.

8606.4.3 Penalties. Any person who fails to comply with an order issued pursuant to this section, within each of the time periods set forth in Section 8606.4.2 above, or who causes or permits another person to fail to comply with such an order, is guilty of a misdemeanor which is punishable by a fine of not more than \$1,000.00 and/or 6 months imprisonment in the county jail. For purposes of penalties, the phrase "any person" includes an owner, lessor, sublessor, manager, or any person in charge or control of a building subject to this section.

In addition to any other remedy available by law, if the owner or other person in charge or control of the subject building fails to comply with an order issued pursuant to this section within the time periods set forth in Section 8606.4.2, the Department of Building and Safety or the fire department may refer the violation to the State Franchise Tax Board as a substandard residential building and/or refer the building to the Rent Escrow Account Program (REAP).

SECTION 8607 TENANT SAFETY FOR APARTMENT HOUSES, EXCEPT FOR RESIDENTIAL CONDOMINIUMS

The purpose of this section is to provide minimum security standards for tenants in existing apartment houses, except for residential condominiums as defined in this Code. Owners of all lots developed with an apartment house shall provide lights and locks or metal bars or grilles that comply with the provisions of Sections 12.21 A.5.(k), 6304.2, 6305 and Chapter 67 in any of the following circumstances:

1. At the time the apartment building is sold or exchanged;
2. At the time a permit is issued for alterations, repairs or additions which exceed a valuation of \$10,000; or
3. Upon the determination of the Board pursuant to Section 8108.3.

No costs incurred as a result of this section may be charged to the tenant or tenants of any properties subject to the Rent Escrow Account Program provisions commencing at Section 162.00 of this Code.

CHAPTER 88

EARTHQUAKE HAZARD REDUCTION IN EXISTING BUILDINGS

SECTION 8801 PURPOSE

The purpose of this chapter is to promote public safety and welfare by reducing the risk of death or injury that may result from the effects of earthquakes on unreinforced masonry bearing wall buildings constructed before 1934. Such buildings have been widely recognized for their sustaining of life hazardous damage as a result of partial or complete collapse during past moderate to strong earthquakes.

The provisions of this chapter are minimum standards for structural seismic resistance established primarily to reduce the risk of loss of life or injury and will not necessarily prevent loss of life or injury or prevent earthquake damage to an existing building which complies with these standards. This chapter shall not require existing electrical, plumbing, mechanical or fire-safety systems to be altered unless they constitute a hazard to life or property.

This chapter provides systematic procedures and standards for identification and classification of unreinforced masonry bearing wall buildings based on their current use. Priorities, time periods and standards are also established under which these buildings are required to be structurally analyzed and anchored. Where the analysis determines deficiencies, this Chapter requires the building to be strengthened or demolished.

SECTION 8802 SCOPE

The provisions of this chapter shall apply to all buildings constructed or under construction prior to October 6, 1933, or for which a building permit was issued prior to October 6, 1933, which on the effective date of this ordinance have unreinforced masonry bearing walls as defined herein.

Exception: This chapter shall not apply to detached one- or two-family dwellings and detached apartment houses containing less than five dwelling units and used solely for residential purposes.

SECTION 8803 DEFINITIONS

For purposes of this chapter, the applicable definitions in Sections 1602 and 1613 of this Code and the following shall apply:

ESSENTIAL BUILDING. Any building housing a hospital or other medical facility having surgery or emergency treatment areas, fire or police stations, municipal government disaster operation and communication centers.

HIGH-RISK BUILDING. Any building not classified as an essential building having an occupant load, as determined by Section 1004.1 of this Code, of 100 occupants or more.

Exception: A high-risk building shall not include the following:

1. Any building having exterior walls braced with masonry cross walls or wood-frame cross walls spaced less than 40 feet (12 192 mm) apart in each story. Cross walls shall be full-story height with a minimum length of $1\frac{1}{2}$ times the story height.
2. Any building used for its intended purpose, as determined by the Department, for less than 20 hours per week.

HISTORICAL BUILDING. Any building designated as an historical building by an appropriate federal, state or City jurisdiction.

LOW-RISK BUILDING. Any building not classified as an essential building having an occupant load as determined by Section 1004.1 of this Code of less than 20 occupants.

MEDIUM-RISK BUILDING. Any building not classified as a high-risk building or an essential building having an occupant load as determined by Section 1004.1 of this Code of 20 occupants or more.

UNREINFORCED MASONRY BEARING WALL. A masonry wall having all the following characteristics:

1. Provides the vertical support for a floor or roof.
2. The total superimposed load is over 100 pounds per linear foot (1.5 kN/m).
3. The area of reinforcing steel is less than 50 percent of that required by Section 2106.1 of this Code.

SECTION 8804 RATING CLASSIFICATIONS

The rating classifications as exhibited in Table No. 88-A are hereby established and each building within the scope of this chapter shall be placed in one rating classification by the Department. The total occupant load of the entire building as determined by Section 1004.1 of this Code shall be used to determine the rating classification.

Exceptions:

1. For the purpose of this chapter, portions of buildings constructed to act independently when resisting seismic forces may be placed in separate rating classifications.

2. For the purpose of this chapter, to establish the rating classification of a building containing one or more artist in residence spaces, as defined in Section 8501 of this Code, the occupant load of each artist in residence space shall be one for each space less than 2,000 square feet (186 m²) in area and two for each space 2,000 square feet (186 m²) or more in area.

SECTION 8805 GENERAL REQUIREMENTS

The owner of each building within the scope of this chapter shall cause a structural analysis to be made of the building by a civil or structural engineer or architect licensed by the State of California, and if the building does not meet the minimum earthquake standards specified in this chapter, the owner shall cause it to be structurally altered to conform to such standards or cause the building to be demolished.

The owner of a building within the scope of this Chapter shall comply with the requirements set forth above by submitting to the Department for review within the stated time limits:

1. Within 270 days after the service of the order, a structural analysis. Such analysis, which is subject to approval by the Department, shall demonstrate that the building meets the minimum requirements of this Chapter;
2. Within 270 days after the service of the order, the structural analysis and plans for the proposed structural alterations of the building necessary to comply with the minimum requirements of this Chapter;
3. Within 120 days after service of the order, plans for the installation of wall anchors in accordance with the requirements specified in Section 8808.3; or
4. Within 270 days after the service of the order, plans for the demolition of the building.

After plans are submitted and approved by the Department, the owner shall obtain a building permit, and commence and complete the required construction or demolition within the time limits set forth in Table No. 88-B. These time limits shall begin to run from the date the order is served in accordance with Sections 8806.1 and 8806.2.

Owners electing to comply with Item 3 are also required to comply with Items 2 and 4, provided, however, that the 270 day period provided for in Items 2 and 4 and the time limits for obtaining a building permit, commencing construction and completing construction for complete structural alterations or building demolition set forth in Table No. 88-B shall be extended in accordance with Table No. 88-C. Each such extended time limit, except the time limit for commencing construction, shall begin to run from the date the order is served in accordance with Section 8806.2. The time limit for commencing construction shall commence to run from the date the building permit is issued.

SECTION 8806 ADMINISTRATION

8806.1 Service of order. When the Department determines that a building is within the scope of this chapter, the owner shall comply with Section 8805. If the owner does not comply, the Department shall issue an order, as provided in Section 8806.2, to the owner of each building with the minimum time periods for service of such orders set forth in Table 88-C. The minimum time period for the service of such orders shall be measured from the effective date of this chapter. The Department shall, upon receipt of a written request from the owner, order a building to comply with this chapter prior to the normal service date for such building as set forth in this section.

8806.2 Contents of order. The order shall be in writing and shall be served either personally or by certified or registered mail upon the owner as shown on the last equalized assessment, and upon the person, if any, in apparent charge or control of the building. The order shall specify that the building has been determined by the Department to be within the scope of this chapter and, therefore, is required to meet the minimum seismic standards of this chapter. The order shall specify the rating classification of the building and shall be accompanied by a copy of Section 8805, which sets forth the owner's alternatives and time limits for compliance.

8806.3 Appeal from order. The owner or person in charge or control of the building may appeal the Department's initial determination that the building is within the scope of this chapter to the Board of Building and Safety Commissioners. Such appeal shall be filed with the Board within 60 days from the service date of the order described in Section 8806.2. Any such appeal shall be decided by the Board no later than 60 days after the date that the appeal is filed. Such appeal shall be made in writing upon appropriate forms provided therefor by the Department, and the grounds thereof shall be stated clearly and concisely. Each appeal shall be accompanied by a filing fee as set forth in Table No. 4-A of Division 4 of Article 8 of Chapter IX of the *Los Angeles Municipal Code*.

Appeals or requests for slight modifications from any other determinations, orders or actions by the Department pursuant to this chapter shall be made in accordance with the procedures established in Section 98.0403.2 of the *Los Angeles Municipal Code*.

8806.4 Recordation. At the time that the Department serves the aforementioned order, the Department shall file with the Office of the County Recorder a certificate stating that the subject building is within the scope of this chapter. The certificate shall also state that the owner thereof has been ordered to structurally analyze the building and to structurally alter or demolish it when the Department determines the building is not in compliance with this chapter.

If the building is either demolished, found not to be within the scope of this chapter, or is structurally capable of resisting minimum seismic forces required by this chapter as a result of structural alterations or an analysis, the Department shall file with the Office of the County Recorder a certificate terminating

the status of the subject building as being classified within the scope of this chapter.

8806.5 Enforcement. If the owner or other person in charge or control of the subject building fails to comply with any order issued by the Department pursuant to this chapter within any of the time limits set forth in Section 8805, the Department may order that the entire building or a portion thereof be vacated and that the building or a portion thereof remain vacated until such order has been complied with. If compliance with such order has not been accomplished within 90 days after the date the building has been ordered vacated or such additional time as may have been granted by the Board, the Superintendent of Building may order its demolition in accordance with the provisions of Section 8903 of this Code.

SECTION 8807 HISTORICAL BUILDINGS

Qualified historical buildings shall comply with the requirements of Chapter 84 and the *California Historical Building Code* established under Part 8, Title 24 of the *California Code of Regulations*.

SECTION 8808 ANALYSIS AND DESIGN

8808.1 General. Every structure within the scope of this Chapter shall be analyzed and constructed to resist minimum total lateral seismic forces assumed to act non concurrently in the direction of each of the main axes of the structure in accordance with the following formula:

$$V = IKCSW \quad (\text{Formula 8-1})$$

The value of $IKCS$ does not need to exceed the values set forth in Table No. 88-D based on the applicable rating classification of the building.

8808.2 Lateral forces on elements of structures. Parts or portions of structures shall be analyzed and designed for lateral loads in accordance with Sections 8808.1 and 1630 of this Code, but not less than the value from the following formula:

$$F_p = IC_pSW_p \quad (\text{Formula 8-2})$$

For the provisions of this section, the product of IS does not need to exceed the values as set forth in Table No. 88-E.

Exception: Unreinforced masonry walls in buildings not having a Rating Classification I may be analyzed in accordance with Section 8809.

The value of C_p need not exceed the values set forth in Table No. 88-F.

8808.3 Anchorage and interconnection. Anchorage and interconnection of all parts, portions and elements of the structure shall be analyzed and designed for lateral forces in accordance with Table No. 88-F and Formula (8-2) as modified by Table No. 88-E. Minimum anchorage of masonry walls to each floor or roof shall resist a minimum force of 200 pounds per lin-

ear foot (2.92 kN/m) acting normal to the wall at the level of the floor or roof.

8808.4 Level of required repair. Alterations and repairs required to meet the provisions of this chapter shall comply with all other applicable requirements of this Code unless specifically provided for in this chapter.

8808.5 Required analysis.

8808.5.1 General. Except as modified herein, the analysis and design relating to the structural alteration of existing structures within the scope of this chapter shall be in accordance with the analysis specified in Chapter 16.

In addition, the compatibility of the roof diaphragm stiffness with the out-of-plane stability of the unreinforced masonry bearing walls of the story immediately below the roof system shall be verified in accordance with the provisions of Section 8811.

Exception: Buildings with rigid concrete or steel and concrete roof diaphragms shall use the h/t values for "all other buildings" in Table No. 88-G.

8808.5.2 Continuous stress path. A complete, continuous stress path from every part or portion of the structure to the ground shall be provided for the required horizontal forces.

8808.5.3 Positive connections. All parts, portions or elements of the structure shall be interconnected by positive means.

8808.6 Analysis procedure.

8808.6.1 General. Stresses in materials and existing construction utilized to transfer seismic forces from the ground to parts or portions of the structure shall conform to those permitted by the Code and those materials and types of construction specified in Section 8809.

8808.6.2 Connections. Materials and connectors used for interconnection of parts and portions of the structure shall conform to the Code. Nails may be used as part of an approved connector.

8808.6.3 Unreinforced masonry walls. Except as modified here, unreinforced masonry walls shall be analyzed as specified in the applicable parts of Sections 2106 and 2107 of this Code to withstand all vertical loads as specified in Chapter 16 in addition to the seismic forces required by this Chapter.

Substantial changes in wall thickness or stiffness shall be considered in the analysis for out-of-plane and in-plane wall stability, and the wall shall be restrained against out-of-plane instability by anchorage and bracing to the roof or floor diaphragm in accordance with Section 8808.3.

Exception: Variations in wall stiffness caused by nominal openings, such as windows and exit doors need not be considered. The 50 percent increase in the seismic force factor for shear walls as specified in Section 2106.5.1 of this Code may be omitted in the computation of seismic loads to existing shear walls.

No allowable tension stress will be permitted in unreinforced masonry walls. Walls not capable of resisting the required design forces specified in this chapter shall be strengthened or shall be removed and replaced.

Exceptions:

1. Unreinforced masonry walls in buildings not classified as a Rating Classification I pursuant to Table No. 88-A may be analyzed in accordance with Section 8809.
2. Unreinforced masonry walls which carry no design loads other than their own weight may be considered as veneer if they are adequately anchored to new supporting elements.

8808.7 Combination of vertical and seismic forces.

8808.7.1 New materials. All new materials introduced into the structure to meet the requirements of this section, which are subjected to combined vertical and horizontal forces, shall comply with Section 1605 of this Code.

8808.7.2 Existing materials. When stresses in existing lateral force-resisting elements are due to a combination of dead and live loads plus seismic loads, the allowable working stress specified in the Code may be increased 100 percent. However, no increase will be permitted in the stresses allowed in Section 8809, and the stresses in members due only to seismic and dead loads shall not exceed the values permitted by Section 1605 of this Code.

8808.7.3 Allowable reduction of bending stress by vertical load. In calculating tensile fiber stress due to seismic forces required by this chapter, the maximum tensile fiber stress may be reduced by the full direct stress due to vertical dead loads.

8808.8 Irregular features. All structures having any of the irregular features described in Table 12.3-1 or Table 12.3-2 of ASCE-7 shall be designated to meet the additional requirements of those sections referenced in the tables.

SECTION 8809 MATERIALS OF CONSTRUCTION

8809.1 General. All materials permitted by this Code, including their appropriate allowable stresses and those existing configurations of materials specified herein, may be utilized to meet the requirements of this chapter.

8809.2 Existing materials.

8809.2.1 General. Unreinforced masonry walls analyzed in accordance with this section may provide vertical support for roof and floor construction and resistance to lateral loads.

All units of both bearing and nonbearing walls shall be laid with full shoved mortar joints; all head, bed and wall (collar) joints shall be solidly filled with mortar; and the bonding of adjacent wythes of multiwythe walls shall be as follows:

The facing and backing shall be bonded so that not less than 4 percent of the wall surface of each face is composed

of headers extending not less than four inches (102 mm) into the backing. The distance between adjacent full-length headers shall not exceed 24 inches (610 mm) either vertically or horizontally. In walls in which a single header does not extend through the wall, headers from the opposite sides shall overlap at least 4 inches (102 mm), or headers from opposite sides shall be covered with another header course overlapping the header below at least 4 inches (102 mm).

Wythes of walls not bonded as described above shall be considered as veneer. The veneer wythe shall not be included in the effective thickness used in calculating the height-to-thickness ratio and the shear capacity of the wall.

Tension stresses due to seismic forces normal to the wall may be neglected if the wall does not exceed the height-to-thickness ratio in Table No. 88-G and the in-plane shear stresses due to seismic loads as set forth in Table No. 88-J.

If the wall height-to-thickness ratio exceeds the specified limits, the wall may be supported by vertical bracing members designed in accordance with Chapter 16. The deflection of such bracing member at design loads shall not exceed one tenth of the wall thickness.

Exception: The wall may be supported by flexible vertical bracing members designed in accordance with Section 8808.2 if the deflection at design loads is not less than one quarter or more than one third of the wall thickness.

All vertical bracing members shall be attached to floor and roof construction for their design loads independently of required wall anchors. Horizontal spacing of vertical bracing members shall not exceed one half the unsupported height of the wall or 10 feet (3048 mm).

The wall height may be measured vertically to bracing elements other than a floor or roof. Spacing of the bracing elements and wall anchors shall not exceed 6 feet (1829 mm). Bracing elements shall be detailed to minimize the horizontal displacement of the wall by components of vertical displacements of the floor or roof.

8809.2.2 Veneer. Veneer shall be anchored with approved anchor ties conforming to the required design capacity specified in Section 1403.4.3 and placed at a maximum spacing of 24 inches (610 mm).

Exception: Existing veneer anchor ties may be acceptable provided the ties are in good condition and conform to the minimum size, maximum spacing and material requirements specified in the provisions of the Los Angeles Building Ordinances in effect prior to October 6, 1933. Said provisions specified that veneer anchor ties shall be corrugated galvanized iron strips not less than 1 inch (25 mm) in width, 8 inches (203 mm) in length and $\frac{1}{16}$ inch (1.6 mm) in thickness and shall be located and laid in every alternate course in the vertical height of the wall at a spacing not to exceed 17 inches (432 mm) on center horizontally. As an alternative, said provisions specified that such ties may be laid in every fourth course vertically at a spacing not to exceed 9 inches (229 mm) on center horizontally.

The existence and condition of existing veneer anchor ties shall be verified as follows:

1. An approved testing laboratory shall verify the location and spacing of the ties and shall submit a report to the Department for approval as a part of the structural analysis.
2. The veneer in a selected area shall be removed to expose a representative sample of ties (not less than four) for inspection by the Department.

8809.2.3 Existing roof, floors, walls, footings and wood framing. Existing materials, including wood shear walls utilized in the described configuration, may be used as part of the lateral load-resisting system, provided that the stresses in these materials do not exceed the values shown in Table No. 88-H.

8809.3 Strengthening of existing materials. New materials, including wood shear walls, may be utilized to strengthen portions of the existing seismic resisting system in the described configurations, provided that the stresses do not exceed the values shown in Table No. 88-I.

8809.4 Alternate materials. Alternate materials, designs and methods of construction may be approved by the Department in accordance with the provisions of Article 8, Chapter IX of the *Los Angeles Municipal Code*.

8809.5 Minimum acceptable quality of existing unreinforced masonry walls.

8809.5.1 General provisions. All unreinforced masonry walls utilized to carry vertical loads and seismic forces parallel and perpendicular to the wall plane shall be tested as specified in this section. All masonry quality shall equal or exceed the minimum standards established herein or shall be removed and replaced by new materials. Alternate methods of testing may be approved by the Department. The quality of mortar in all masonry walls shall be determined by performing in-place shear tests or by testing 8-inch (203 mm) diameter cores.

The vertical wall joint between wythes (collar joints) shall be inspected at the test location after the in-place shear tests, and an estimate of the percentage of wythe-to-wythe mortar coverage shall be reported along with the results of the in-place shear tests. Where the exterior face is veneer, the type of veneer, its thickness and its bonding and/or ties to the structural wall masonry shall also be reported.

Alternative methods of testing may be approved by the Department. Nothing shall prevent pointing with mortar of all the masonry wall joints before the tests are first made. Prior to any pointing, the mortar joints must be raked and cleaned to remove loose and deteriorated mortar. Mortar for pointing shall be Type S or N except masonry cements shall not be used. All preparation and mortar pointing shall be done under the continuous inspection of a registered deputy inspector. At the conclusion of the inspection, the inspector shall submit a written report to the licensed engineer or architect responsible for the seismic analysis of the building setting forth the result of the work inspected. Such report shall be submitted to the Department for approval as part of the structural analysis.

All testing shall meet Department-approved testing method parameters (including rate of load application) and shall be performed in accordance with the requirements specified in this section by a testing agency approved by the Department.

An accurate record of all such tests and their location in the building shall be recorded and these results shall be submitted to the Department for approval as part of the structural analysis.

8809.5.2 Number and location of tests. The minimum number of tests shall be as follows:

1. At each of both the first and top stories, not less than two per wall line or line of wall elements providing a common line of resistance to lateral forces.
2. At each of all other stories, not less than one per wall element providing a common line of resistance to lateral forces.
3. In any case, not less than one per 1,500 square feet (139.4 m²) of wall surface and a total of eight.

The shear tests shall be taken at locations representative of the mortar conditions throughout the entire building, taking into account variations in workmanship at different building height levels, variations in weathering of the exterior surfaces and variations in the condition of the interior surfaces due to deterioration caused by leaks and condensation of water and/or by the deleterious effects of other substances contained within the building. Where the higher h/t ratios allowed in Notes 4 and 5 of Table No. 88-G are to be used, the in-place shear tests taken at the top story shall be included in the 80 percent of the shear tests used to determine the minimum mortar shear strength.

The exact test or core location shall be determined at the building site by the licensed engineer or architect responsible for the seismic analysis of the subject building.

8809.5.3 In-place shear tests. The bed joints of the outer wythe of the masonry shall be tested in shear by laterally displacing a single brick relative to the adjacent bricks in that wythe. The mortar in the opposite head joint of the brick to be tested shall be removed and cleaned prior to testing. The minimum quality mortar in 80 percent of the shear tests shall not be less than the total of 30 psi (206.9 kPa) plus the axial stress in the wall at the point of the test. The shear stress shall be based on the gross area of both bed joints and shall be that shear stress at which movement of the masonry is first measured or at which cracking first appears.

An internal caliper, graduated in 0.001 of an inch (0.025 mm) increments shall be used to measure movement of the masonry unit. A hydraulic jack equipped with a pressure gauge graduated in increments of 50 psi (345 kPa) or less shall be used. The jack load shall be applied at a rate not exceeding 5,000 pounds (22 240 N) per minute.

The test shall be conducted by a minimum of two technicians. Load and displacement readings shall be recorded at the following intervals:

1. At a caliper reading of 0.001 inch (0.025 mm);

2. At first visually observed sign of movement or cracking of the mortar or masonry unit;
3. At a caliper reading of 0.02 inch (0.51 mm); and
4. The ultimate load on the unit.

The masonry unit to be tested shall not be located adjacent to a bond course in a brick wall laid in common bond. Tests to evaluate the mortar quality of structural walls shall not be conducted in masonry veneer.

Walls with mortar values which are consistently low and do not meet the minimum quality values specified in this section shall be entirely pointed per U.B.C. Standard 21-8 except that the depth of joint penetration shall be $1\frac{1}{2}$ inch (38 mm) in lieu of the $\frac{3}{4}$ inch (19 mm) specified.

8809.5.4 Core tests. A minimum number of mortar test specimens equal to the number of required cores shall be prepared from the cores and tested as specified herein. The mortar joint of the outer wythe of the masonry core shall be tested in shear by placing the circular core section in a compression testing machine with the mortar bed joint rotated 15 degrees from the axis of the applied load. The mortar joint tested in shear shall have an average ultimate stress of 20 psi (138 kPa) based on the gross area. The average shall be obtained from the total number of cores made. If test specimens cannot be made from cores taken, the shear value shall be reported as zero.

8809.6 Testing of shear bolts. One fourth of all new shear bolts and dowels embedded in unreinforced masonry walls shall be tested by a registered deputy building inspector using a torque calibrated wrench to the following minimum torques:

$\frac{1}{2}$ -inch-diameter bolts or dowels	40 foot-pounds
$\frac{5}{8}$ -inch-diameter bolts or dowels	50 foot-pounds
$\frac{3}{4}$ -inch-diameter bolts or dowels	60 foot-pounds

For SI: 1 inch = 25.4 mm, 1 foot-pound = 1.356 Nm.

No bolts exceeding $\frac{3}{4}$ -inch (19.1 mm) shall be used. All nuts shall be installed over malleable iron or plate washers when bearing on wood and heavy cut washers when bearing on steel.

8809.7 Determination of allowable stresses for design methods based on test results.

8809.7.1 Design shear values. Design seismic in-plane shear stresses shall be substantiated by tests performed as specified in Section 8809.5.3 and 8809.5.4.

Design stresses shall be related to test results obtained in accordance with Table No. 88-J. Intermediate values between 3 and 10 psi (20.7 kPa and 69 kPa) may be interpolated.

8809.7.2 Design compression and tension values. Compression stresses for unreinforced masonry having a minimum design shear value of 3 psi (20.7 kPa) shall not exceed 100 psi (690 kPa). Design tension values for unreinforced masonry shall not be permitted.

8809.8 Five percent of the existing rod anchors utilized as all or part of the required wall anchors shall be tested in pullout by an

approved testing laboratory. The minimum number tested shall be four per floor, with two tests at walls with joists framing into the wall and two tests at walls with joists parallel to the wall. The test apparatus shall be supported on the masonry wall at a minimum distance of the wall thickness from the anchor tested. The rod anchor shall be given a preload of 300 pounds (136 kg) prior to establishing a datum for recording elongation. The tension test load reported shall be recorded at $\frac{1}{8}$ -inch (3.2 mm) relative movement of the anchor and the adjacent masonry surface. Results of all tests shall be reported. The report shall include the test results as related to the wall thickness and joist orientation. The allowable resistance value of the existing anchors shall be 40 percent of the average of those tested anchors having the same wall thickness and joist orientation.

8809.9. Qualification tests for devices used for wall anchorage shall be tested with the entire tension load carried on the enlarged head at the exterior face of the wall. Bond on the part of the device between the enlarged head and the interior wall face shall be eliminated for the qualification tests. The resistance value assigned the device shall be 20 percent of the average of the ultimate loads.

SECTION 8810 INFORMATION REQUIRED ON PLANS

8810.1 General. In addition to the seismic analysis required elsewhere in this chapter, the licensed engineer or architect responsible for the seismic analysis of the building shall determine and record the information required by this section on the approved plans.

8810.2 Construction details. The following requirements, with appropriate construction details, shall be made part of the approved plans:

1. All unreinforced masonry walls shall be anchored at the roof and ceiling levels by tension bolts through the wall as specified in Table No. 88-I, or by an approved equivalent at a maximum anchor spacing of 6 feet (1829 mm). Anchors installed in accordance with Section 8114 of this Code shall be accepted as conforming to this requirement.

All unreinforced masonry walls shall be anchored at all floors and ceiling with tension bolts through the wall or by existing rod anchors at a maximum anchor spacing of 6 feet (1829 mm). All existing rod anchors shall be secured to the joists to develop the required forces. The Department may require testing to verify the adequacy of the embedded ends of existing rod anchors. Tests, when required, shall conform to Section 8809.8.

Exception: Walls need not be anchored to ceiling systems that, because of their low mass and/or relative location with respect to the floor or roof systems, would not impose significant normal forces on the wall and cause out-of-plane wall failures.

At the roof and all floor levels, the anchors nearest the building corners shall be combination shear and tension anchors located not more than 2 feet (610 mm) horizontally from the inside corners of the walls.

When access to the exterior face of the masonry wall is prevented by proximity of an existing building, wall anchors conforming to Items 5 and 7 in Table No. 88-I may be used.

Alternative devices to be used in lieu of tension bolts for masonry wall anchorage shall be tested as specified in Section 8809.9.

2. Diaphragm chord stresses of horizontal diaphragms shall be developed in existing materials or by addition of new materials.
3. Where trusses and beams, other than rafters or joists are supported on masonry, independent secondary columns shall be installed to support vertical loads of the roof or floor members.
4. Parapets and exterior wall appendages not capable of resisting the forces specified in this Chapter shall be removed, stabilized or braced to ensure that the parapets and appendages remain in their original position.

The maximum height of an unbraced, unreinforced masonry parapet above the lower of either the level of tension anchors or roof sheathing shall not exceed one and one half times the thickness of the parapet wall. If the required parapet height exceeds this maximum height, a bracing system designed for the force factors specified in Table Nos. 88-E and 88-F for walls shall support the top of the parapet. Parapet corrective work must be performed in conjunction with the installation of tension roof anchors.

5. All deteriorated mortar joints in unreinforced masonry walls shall be pointed with Type S or N mortar. Prior to any pointing, the wall surface must be raked and cleaned to remove loose and deteriorated mortar. All preparation and pointing shall be done under the continuous inspection of a registered deputy inspector certified to inspect masonry or concrete. At the conclusion of the project, the inspector shall submit a written report to the Department setting forth the portion of work inspected.
6. Repair details of any cracked or damaged unreinforced masonry wall required to resist forces specified in this chapter.

8810.3 Existing construction. The following existing construction information shall be made a part of the approved plans:

1. The type and dimensions of existing walls and the size and spacing of floor and roof members.
2. The extent and type of existing wall anchorage to floors and roof.
3. The extent and type of parapet corrections which were performed in accordance with Section 8114 of this Code.
4. Accurately dimensioned floor plans and masonry wall elevations showing dimensioned openings, piers, wall thickness and heights, and veneer and anchorages.
5. The location of cracks or damaged portions of unreinforced masonry walls requiring repairs.

6. The type of interior wall surfaces and ceilings, and if reinstalling or anchoring existing plaster is necessary.
7. The general condition of the mortar joints and if the joints need pointing.
8. The location of the shear tests shall be shown on the floor plans and building wall elevations, and the complete test report shall be reproduced on the approved plans.

SECTION 8811 DESIGN CHECK – COMPATIBILITY OF ROOF DIAPHRAGM STIFFNESS TO UNREINFORCED MASONRY WALL OUT-OF-PLANE STABILITY

8811.1 General. The requirements of this section are in addition to the requirements of Sections 8808 and 8809. The relative stiffness and strength of a diaphragm governs the amount of amplification of the seismic ground motion by the diaphragm and, therefore, a diaphragm stiffness and strength-related check of the out-of-plane stability of unreinforced masonry walls anchored to wood diaphragms shall be made. This section contains a procedure for the evaluation of the out-of-plane stability of unreinforced masonry walls anchored to wood diaphragms that are coupled to shear-resisting elements.

8811.2 Requirements for terms. The requirements for the terms used in this Chapter shall be defined as follows:

CROSS WALL. A wood-framed wall having a height-to-length ratio of:

1. Two to one for wood structural panels.
2. One to one for gypsum board, gypsum lath, cement plaster or diagonal sheathing.

The total strength of all cross walls located within any 40-foot (12 192 mm) length of diaphragm measured in the direction of the diaphragm span shall not be less than 30 percent of the strength of the diaphragm in the direction of consideration.

DEMAND-CAPACITY RATIO (DCR). A ratio of the following:

1. **Demand** = lateral forces due to 33 percent of the weight of the diaphragm and the tributary weight of the walls and other elements anchored to the diaphragm.
2. **Capacity** = diaphragm total shear strength in the direction under consideration as determined using the values in Table No. 88-K or Table No. 88-L.

8811.3 Notations.

- D** = depth of diaphragm, in feet (mm), measured perpendicular to the diaphragm span.
- h/t** = height-to-thickness ratio of an unreinforced masonry wall. The height shall be measured between wall anchorage levels and the thickness shall be measured through the wall cross section.
- L** = span of diaphragm between masonry shear walls or steel frames.

V_c = total shear capacity of cross walls in the direction of analysis immediately below the diaphragm level being investigated as determined by using Tables Nos. 88-K and 88-L.

v_u = maximum shear strength in pounds per foot for a diaphragm sheathed with any of the materials given in Tables Nos. 88-K and 88-L.

W_d = total dead load of the diaphragm plus the tributary weight of the walls anchored to the diaphragm, the tributary ceiling and partitions and the weight of any other permanent building elements at the diaphragm level under investigation.

8811.4 Design check procedure.

8811.4.1 General. The demand-capacity ratio (DCR) for the building under investigation shall be calculated using the following equations:

$$DCR = 0.33W_d/2v_uD \quad (\text{Formula 11-3})$$

or

$$DCR = 0.33W_d/(2v_uD + V_c) \quad (\text{Formula 11-4})$$

8811.4.2 Diaphragm deflection. The calculated DCR shall be to the left of the curve in Figure No. 88-A. Where the calculated DCR is outside (to the right of) the curve, the diaphragm deflection limits are exceeded, and cross walls may be used to reduce the deflection.

8811.4.3 Unreinforced masonry wall out-of-plane stability. The DCR shall be calculated discounting any cross walls. If the DCR corresponding to the diaphragm span is to the right of the curve in Figure No. 88-A, the region within the curve at and below the intersection of the diaphragm span with the curve may be used to determine the allowable h/t values per Table No. 88-G.

SECTION 8812 VIOLATIONS

Notwithstanding any other provision of this Code to the contrary, it shall be unlawful for any person, firm, or corporation to maintain, use, or occupy any building within the scope of this chapter which does not meet the minimum earthquake standards specified in this chapter.

Any person who violates, causes or permits another person to violate this provision is guilty of a misdemeanor. Any person includes an owner, lessor, sublessor, manager or person in control of a building subject to this chapter. This term shall not include any person who is merely a tenant or other individual occupying any dwelling unit, efficiency dwelling unit, guest room or suite in a building. The legal owner of a building is that person, firm, corporation, partnership or other entity whose name or title appears on the record with the Office of the County Recorder, as well as all successors or assignees of these persons.

Exception: This section shall not apply to any building on which work is proceeding in compliance with the time limits set forth in this chapter, and/or in compliance with any extensions of time granted by the Department or the Board;

or any action, order or determination made by the Department or the Board in the implementation of this chapter.

SECTION 8813 SPECIAL REQUIREMENTS FOR VACANT BUILDINGS

8813.1 General. This section shall apply to every vacant unreinforced masonry bearing wall building within the scope of this Chapter which has not complied with the requirements contained in this Chapter.

8813.2 Enforcement. When the Department determines that a building is within the scope of this section, it shall notify the owner and order the owner to bring the building into compliance with the provisions of this section. Compliance with such an order shall be accomplished within the time limits set forth herein and any extensions of time granted by the Department. If the owner does not comply within such time limits, then the Department may order the demolition of the building or structure in accordance with the provisions of Section 8903.

8813.3 Time for compliance.

1. For a one-story building with wall anchors installed pursuant to Section 8808.3, either before or within 60 days after notice is given by the Department:

Within 180 days after notice is given pursuant to this section, the owner shall submit to the Department either plans and a structural analysis for the proposed structural alterations of the building necessary to comply with the minimum requirements of this Chapter, or an application for demolition of the building or structure.

If the owner elects to perform the proposed structural alterations, then within 270 days after notice is given pursuant to this section, the owner shall obtain the necessary permits for strengthening the building or structure; within 90 days of obtaining a permit to strengthen the building, the owner shall commence strengthening work; and within 18 months after notice is given pursuant to this section, the owner shall complete all strengthening work.

If the owner elects to demolish the building, then within 210 days after notice is given pursuant to this section, the owner shall obtain permits for the demolition of the building or structure; within 21 days of obtaining a demolition permit, the owner shall commence demolition; and within 300 days after notice is given pursuant to this section the owner shall complete the demolition of the building or structure.

2. Time for compliance for all other buildings:

Within 60 days after notice is given pursuant to this section, the owner shall submit to the Department either plans and a structural analysis for the proposed structural alterations of the building necessary to comply with the minimum requirements of this Chapter, or an application for demolition of the building or structure.

If the owner elects to perform the necessary alterations, then within 120 days after notice is given pursuant to this section, the owner shall obtain the necessary

permits for strengthening the building or structure; within 21 days of obtaining a permit, the owner shall begin work; and within 365 days after notice is given pursuant to this section, the owner shall complete all strengthening work.

If the owner elects to perform the necessary alterations, then within 120 days after notice is given pursuant to this section, the owner shall obtain the necessary permits for strengthening the building or structure; and within 120 days after obtaining the demolition permit,

the owner shall complete the demolition of the building or structure.

8813.4 Special provisions for damaged buildings. An unreinforced masonry bearing wall building which is damaged or partially destroyed by fire, flood, wind, earthquake or other calamity or act of God or the public enemy shall be repaired or demolished within 6 months of such damage or destruction.

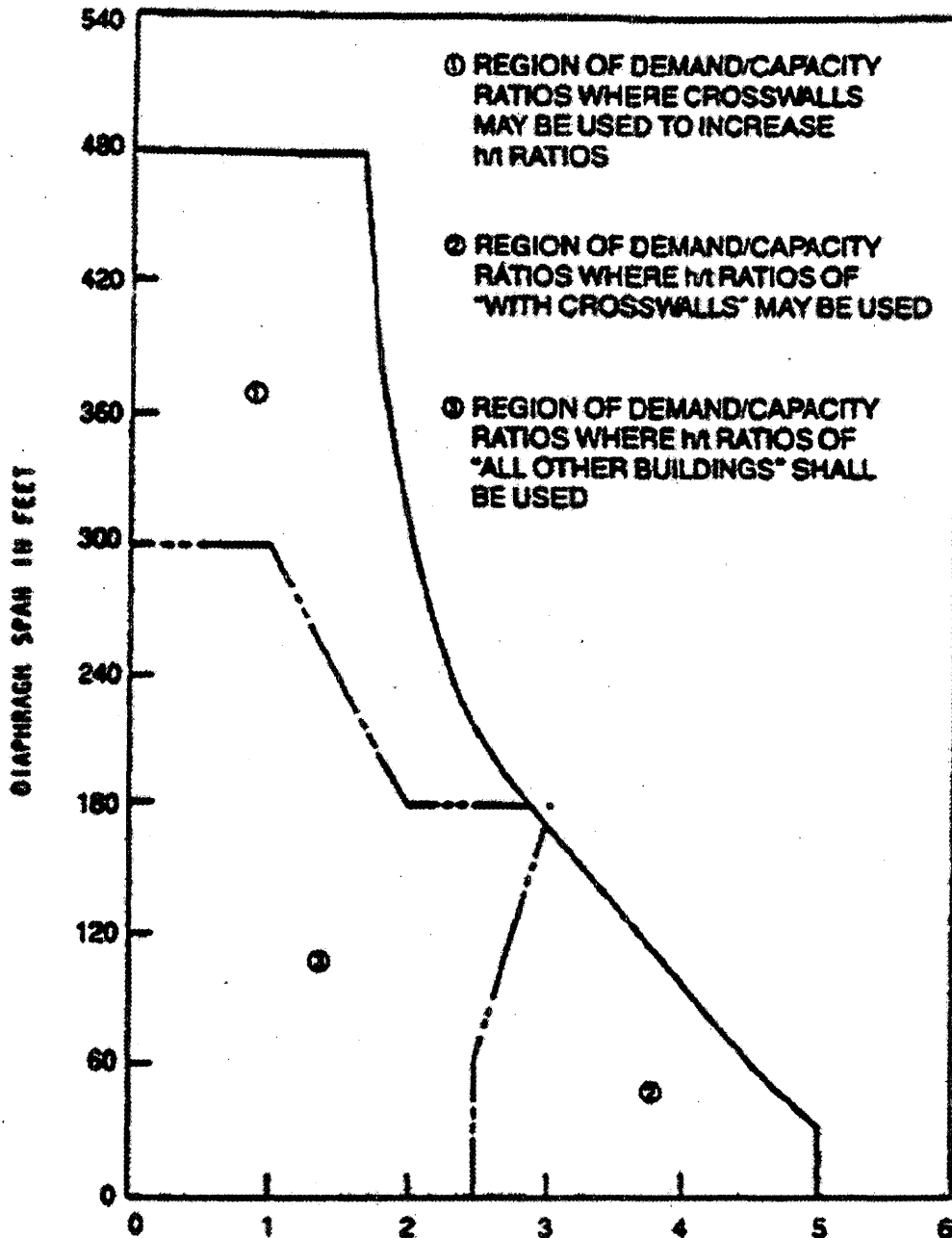


FIGURE NO. 88
ACCEPTABLE SPAN FOR DIAPHRAGMS
(BASED ON DISPLACEMENT CONTROL CONCEPTS)

**TABLE NO. 88-A
RATING CLASSIFICATIONS**

TYPE OF BUILDING	CLASSIFICATION
Essential Building	I
High Risk Building	II
Medium Risk Building	III
Low Risk Building	IV

**TABLE NO. 88-B
TIME LIMITS FOR COMPLIANCE**

REQUIRED ACTION BY OWNER	OBTAIN BUILDING PERMIT WITHIN	COMMENCE CONSTRUCTION WITHIN	COMPLETE CONSTRUCTION WITHIN
Complete Structural Alterations or Building Demolition	1 year	180 days*	3 years
Wall Anchor Installation	180 days	270 days	1 year

*Measured from date of building permit issuance.

**TABLE NO. 88-C
SERVICE PROVISIONS AND EXTENDED TIME PROVISIONS****

RATING OCCUPANT CLASSIFICATION	EXTENSION OF TIME IF WALL ANCHORS LOAD	MINIMUM TIME PERIODS ARE INSTALLED	SERVICE OF ORDER
I (Highest Priority)	Any	1 Year	0
II	100 or more	1 Year	90 Days
III	100 or more	1 Year	1 Year
	More than 50, but less than 100	1 Year	2 Years
	More than 19, but less than 51	1 Year	3 Years
IV (Lowest Priority)	Less than 20	1 Year	4 Years

**Buildings that have obtained a building permit for wall anchors and met the time schedule in Table 88-B for wall anchor installation may utilize the time extensions, which are permitted in Table 88-C prior to the adoption of this ordinance.

**TABLE NO. 88-D
HORIZONTAL FORCE FACTORS BASED ON RATING CLASSIFICATION**

RATING CLASSIFICATION	<i>IKCS</i>
I	0.186
II	0.133
III & IV	0.100

**TABLE NO. 88-E
HORIZONTAL FORCE FACTORS "IS" FOR PARTS OR PORTIONS OF STRUCTURES**

RATING CLASSIFICATION	<i>IS</i>
I	1.50
II	1.00
III & IV	0.75

TABLE NO. 88-F
HORIZONTAL FORCE FACTOR “C_p” FOR PARTS OR PORTIONS OF BUILDINGS OR OTHER STRUCTURES ¹

PART OR PORTION OF BUILDINGS	DIRECTION OF FORCE	VALUE OF C _p
Exterior bearing and nonbearing walls; interior bearing walls and partitions; interior nonbearing walls and partitions over 10 feet in height; masonry fences over 6 feet in height.	Normal to flat surface	0.20
Cantilever parapet and other cantilever walls, except retaining walls.	Normal to flat surface	1.00
Exterior and interior ornamentations and appendages.	Any direction	1.00
When connected to or a part of a building: towers, tanks, towers and tanks plus contents, racks over 8 feet 3 inches in height plus contents, chimneys, smokestacks and penthouses.	Any direction	0.20 ^{2,4}
When connected to or a part of a building: rigid and rigidly mounted equipment and machinery not required for continued operation of essential occupancies. ⁵	Any horizontal direction	0.20 ³
Tanks plus effective contents resting on the ground.	Any direction	0.12
Floors and roofs acting as diaphragms.	In the plane of the diaphragm	0.12 ⁶
Prefabricated structural elements, other than walls, with force applied at center of gravity of assembly.	Any horizontal direction	0.30
Connections for exterior panels or elements.	Any direction	2.00

For SI: 1 inch = 25.4 mm, 1 foot = 305 mm.

1. See Section 8808.2 for use of C_p.
2. When located in the upper portion of any building with a height to depth ratio of 5 to 1 or greater, the value shall be increased by 50 percent.
3. For flexible and flexible mounted equipment and machinery, the appropriate values for C_p shall be determined with consideration given to both the dynamic properties of the equipment and machinery and to the building and building or structure in which it is placed.
4. The W_p for storage racks shall be the weight of the racks plus contents. The value of C_p for racks over two storage support levels in height shall be 0.16 for the levels below the top two levels.
5. The design of the equipment and machinery and their anchorage is an integral part of the design and specification of that equipment and machinery. The structure to which the equipment or machinery is mounted shall be capable of resisting the anchorage forces (see also Section 13.6.5 of ASCE-7).
6. Floor and roofs acting as diaphragms shall be designed for a minimum force resulting from a C_p of 0.12 applied to W_p unless a greater force results from the distribution of lateral forces in accordance with Section 12.8.3 of ASCE-7.

TABLE NO. 88-G
ALLOWABLE VALUE OF HEIGHT-TO-THICKNESS RATIO OF UNREINFORCED MASONRY WALLS WITH MINIMUM QUALITY MORTAR ^{1,2}

	BUILDINGS W/ CROSS WALLS AS DEFINED BY SECTION 8803	ALL OTHER BUILDINGS
Walls of One-Story Buildings	13 - 16 ^{3,4,5}	13
First-Story Wall of Multistory Buildings	16	15
Walls in Top Story of Multistory Buildings	9 - 14 ^{3,4,5}	9
All Other Walls	16	13

1. Minimum quality mortar shall be determined by laboratory testing in accordance with Section 8809.5 of this Code.
2. This table is not applicable to buildings of Rating Classification I. Walls of buildings within rating classification I shall be analyzed in accordance with Section 8808.6 of this Code.
3. The minimum mortar shear strengths required in Footnotes 4 and 5 shall be that shear strength without the effect of axial stress in the wall at the point of the test.
4. The larger height-to-thickness ratio may be used where mortar shear tests in accordance with Section 8809.5.3 of this Code establish a minimum mortar shear strength of not less than 100 psi (690 kPa) or where the tested mortar shear strength is not less than 60 psi (414 kPa) and a visual examination of the vertical wythe-to-wythe wall joint (collar joint) indicates not less than 50 percent mortar coverage.
5. Where a visual examination of the collar joint indicates not less than 50 percent mortar coverage and the minimum mortar shear strength when established in accordance with Section 8809.5.3 of this Code is greater than 30 psi (207 kPa) but less than 60 psi (414 kPa), the allowable height-to-thickness ratio may be determined by linear interpolation between the larger and smaller ratios in direct proportion to the mortar shear strength.

**TABLE NO. 88-H
VALUES FOR EXISTING MATERIALS**

EXISTING MATERIALS OR CONFIGURATION OF MATERIALS ¹	ALLOWABLE VALUES
1. HORIZONTAL DIAPHRAGMS	
a. Roofs with straight sheathing and roofing applied directly to the sheathing.	100 lbs. per foot for seismic shear.
b. Roofs with diagonal sheathing and roofing applied directly to the sheathing.	400 lbs. per foot for seismic shear.
c. Floors with straight tongue-and-groove sheathing.	150 lbs. per foot for seismic shear.
d. Floors with straight sheathing and finished wood flooring.	300 lbs. per foot for seismic shear.
e. Floors with diagonal sheathing and finished wood flooring.	450 lbs. per foot for seismic shear.
f. Floors or roofs with straight sheathing and plaster applied to the joist or values for items 1(a) and 1(c) rafters. ²	Add 50 lbs. per foot to the allowable values for items 1(a) and 1(c).
2. SHEAR WALL Wood stud walls with lath and plaster	100 lbs. per foot each side for seismic shear.
3. PLAIN CONCRETE FOOTINGS	$f' = 1500$ psi unless otherwise shown by tests.
4. DOUGLAS FIR WOOD	Allowable stress same as No. 1 D.F. ³
5. REINFORCING STEEL	$f' = 18,000$ lbs. per square inch maximum.
6. STRUCTURAL STEEL	$f' = 20,000$ lbs. per square inch maximum.

For SI: 1 pound per foot = 0.0146 N/m, 1 pound per square inch (psi) = 6.895 kPa.

Notes:

1. Material must be sound and in good condition.
2. The wood lath and plaster must be reattached to existing joists or rafters in a manner approved by the Department.
3. Stresses given may be increased for combinations of loads as specified in Section 8808.7.2 of this Code.

**TABLE NO. 88-I
ALLOWABLE VALUES OF NEW MATERIALS USED IN CONJUNCTION WITH EXISTING CONSTRUCTION**

NEW MATERIALS OR CONFIGURATION OF MATERIALS ¹	ALLOWABLE VALUES
1. HORIZONTAL DIAPHRAGMS Plywood sheathing applied directly over existing straight sheathing with ends of plywood sheets bearing on joists or rafters and edges of plywood located on center of individual sheathing boards.	Same as specified in Table 2306.3.1 of this Code for blocked diaphragms.
2. SHEAR WALLS	
a. Plywood sheathing applied directly over existing wood studs. No value shall be given to plywood applied over existing plaster or wood sheathing.	Same as values specified in Table 2306.4.1 for shear walls.
b. Dry wall or plaster applied directly over existing wood studs.	75 percent of the values specified in Table 2306.4.5.
c. Dry wall or plaster applied to plywood sheathing over existing wood studs.	33 1/3 percent of the values specified in Table 2306.4.5.
3. SHEAR BOLTS Shear bolts and shear dowels embedded a minimum of 8 inches into unreinforced masonry walls. Bolt centered in a 2 1/2-inch-diameter hole with drypack or an approved non-shrink grout around circumference of bolt or dowel. ^{1,3}	133 percent of the values for plain solid masonry specified in Table No. 88-M. No values larger than those given for 3/4-inch bolts shall be used.
4. TENSION BOLTS Tension bolts and tension dowels extending entirely through unreinforced masonry secured with bearing plates on far side of wall with at least 30 square inches of area. ^{2,3,4}	1200 lbs. per bolt or dowel.
5. COMBINATION SHEAR AND TENSION WALL ANCHORS	
a. Bolts extending to the exterior face of the wall with a 2 1/2-inch round plate under the head. Install as specified for shear bolts. Spaced not closer than 12 inches on center. ^{1,2,3}	600 lbs. per bolt for tension. ⁴ See Item 3 (SHEAR BOLTS) for shear values.
b. Bolts or dowels extending to the exterior face of the wall with a 2 1/2-inch round plate under the head and drill at an angle of 22 1/2 degrees to the horizontal. Installed as specified for shear bolts. ^{1,2,3}	1200 lbs per bolt or dowel for tension. ⁴ See Item 3 (SHEAR BOLTS) for shear values.
c. Through bolt with bearing plate for tension per Item 4. Combined with minimum eight-inch grouted section for shear per Item 3.	See Item 4 (TENSION BOLTS) for tension values. ⁴ See Item 3 (SHEAR BOLTS) for shear values.
6. INFILLED WALLS Reinforced masonry infilled openings in existing unreinforced masonry walls with keys or dowels to match reinforcing.	Same as values specified for unreinforced masonry walls.
7. REINFORCED MASONRY Masonry piers and walls reinforced per Sections 2106 and 2107.	Same as values determined per Section 2106.
8. REINFORCED CONCRETE Concrete footings, walls and piers reinforced as specified in Chapter 19 and designed for tributary loads.	Same as values specified in Chapter 19.
9. EXISTING FOUNDATION LOADS Foundation loads for structures exhibiting no evidence of settlement.	Calculated existing foundation loads due to maximum dead load plus live load may be increased 25 percent for deadload, and may be increased 50 percent for dead load plus seismic load required by this Chapter.

For SI: 1 inch = 25.4 mm, 1 square inch = 645.16 mm², 1 pound = 4.45 N.

1. Bolts and dowels to be tested as specified in Section 8809.6 of this Code.
2. Bolts and dowels to be 1/2-inch minimum in diameter.
3. Drilling for bolts and dowels shall be done with an electric rotary drill. Impact tools shall not be used for drilling holes or tightening anchor and shear bolt nuts.
4. Allowable bolt and dowel values specified are for installations in minimum three wythe walls. For installations in two wythe walls, use 50 percent of the value specified, except that no value shall be given to tension bolts that do not extend entirely through the wall and are secured with bearing plates on the far side.

TABLE NO. 88-J
ALLOWABLE SHEAR STRESS FOR TESTED UNREINFORCED MASONRY WALLS

EIGHTY PERCENT OF TEST RESULTS IN PSI NOT LESS THAN	AVERAGE TEST RESULTS OF CORES IN PSI	SEISMIC IN-PLANE SHEAR BASED ON GROSS AREA
30 plus axial stress	20	3 psi*
40 plus axial stress	27	4 psi*
50 plus axial stress	33	5 psi*
100 plus axial stress or more	67 or more	10 psi max*

For SI: 1 pound per square inch = 6.895 kPa.

* Allowable shear stress may be increased by addition of 10 percent of the axial stress due to the weight of the wall directly above.

TABLE NO. 88-K
VALUES FOR EXISTING MATERIALS

EXISTING MATERIALS OR CONFIGURATION OF MATERIALS ¹	ALLOWABLE VALUES
1. HORIZONTAL DIAPHRAGMS	
a. Roofs with straight sheathing and roofing applied directly to the sheathing.	100 lbs. per foot for seismic shear.
b. Roofs with diagonal sheathing and roofing applied directly to the sheathing.	250 lbs. per foot for seismic shear.
2. CROSSWALLS ^{2,3}	
a. Plaster on wood or metal lath.	per side: 200 lbs. per foot for seismic shear.
b. Plaster on gypsum lath.	175 lbs. per foot for seismic shear.
c. Gypsum wall board, unlocked edges.	75 lbs. per foot for seismic shear.
d. Gypsum wall board, blocked edges.	125 lbs. per foot for seismic shear.

For SI: 1 pound per foot = 0.0146 N/m.

1. Materials must be sound and in good condition.

2. For crosswalls, values of all materials may be combined, except the total combined value shall not exceed 300 lbs. per foot for seismic shear.

3. The cross wall aspect ratio for plaster on wood, metal, or gypsum lath and gypsum wall board shall be a maximum height to width ratio of 1:1.

TABLE NO. 88-L
ALLOWABLE VALUES OF NEW MATERIALS USED IN CONJUNCTION WITH EXISTING CONSTRUCTION

NEW MATERIALS OR CONFIGURATION OF ALLOWABLE VALUES	NEW AND EXISTING MATERIALS ¹
1. HORIZONTAL DIAPHRAGMS	
Plywood sheathing applied directly over existing straight sheathing with ends of plywood sheets bearing on joists or rafters and edges of plywood located on center of individual sheathing boards.	225 lbs. per foot for seismic shear.
2. CROSSWALLS ²	
a. Plywood sheathing applied directly over existing wood studs. No value shall be given to plywood applied over existing plaster or wood sheathing.	1.33 times the values specified in Table 2306.4.1 for shear walls.
b. Drywall or plaster applied directly over existing wood studs.	100 percent of the values specified in Table 2306.4.5.

For SI: 1 pound per foot = 0.0146 N/m.

1. Materials must be sound and in good condition.

2. For cross walls, values of all materials may be combined, except the total combined value shall not exceed 300 lbs. per foot for seismic shear.

3. The cross wall aspect ratio for drywall, plaster and gypsum wall board shall be a maximum height to width ratio of 1:1, and for plywood shall be a maximum height to width ratio of 2:1.

TABLE NO. 88-M
ALLOWABLE SHEAR ON BOLTS

DIAMETER BOLT (inches)	EMBEDMENT (inches)	SOLID MASONRY (shear in pounds)	GROUTED MASONRY (shear in pounds)
1/2	4	350	750
5/8	4	500	750
3/4	5	750	1100
7/8	6	750	1100
1	7	750	1100
1-1/8	8	750	1100

For SI: 1 inch = 25.4 mm, 1 pound = 0.454 kg.

CHAPTER 89

ABATEMENT OF BUILDINGS, STRUCTURES, PREMISES AND PORTIONS THEREOF WHICH CONSTITUTE A NUISANCE OR ARE HAZARDOUS, OR SUBSTANDARD

SECTION 8901 GENERAL

8901.1 Purpose. It is the purpose of the provisions of this Chapter to provide a just, equitable and practicable method, to be cumulated with and in addition to any other remedy available by law, whereby buildings, structures, premises and portions thereof which are within the scope of this Chapter may be vacated, secured, cleaned, repaired, demolished or removed.

8901.2 Scope. The provisions of this Chapter shall apply to all existing buildings, structures, premises and portions thereof which are a nuisance, a hazard or a substandard residential building.

All sections of Chapter IX of the *Los Angeles Municipal Code* are applicable to those buildings determined to be “**substandard residential buildings**” as defined herein.

The Department of Building and Safety may approve certain deviations from the requirements of Chapter IX of the *Los Angeles Municipal Code* concerning substandard residential buildings, provided the items concerned were built in compliance with code or ordinance provisions in effect at the time of construction, and provided, further, that such additional corrections as may be required by the Department are made so as to ensure that the building complies with the intent of the Chapter.

8901.3 Interference prohibited. It shall be unlawful for any person to obstruct, impede or interfere with any representative of the Department, including contractors hired by the Department or with the inspector of any Department of this city, or with any person who owns or holds any estate or interest in any building or structure which has been ordered to be vacated, secured, cleaned, repaired, demolished or removed, or with any person to whom such building or structure has been lawfully sold pursuant to the provisions of this Chapter whenever any such representative of the Department, inspector, purchaser or person having an interest or estate in such building or structure is engaged in inspecting, securing, cleaning, vacating, repairing, demolishing or removing any such building or structure pursuant to the provisions of this Chapter, or in performing any necessary act preliminary to or incidental to such work, or authorized or directed pursuant hereto.

8901.4 Liability of officers or employees of the city.

8901.4.1 City employees not personally liable. No officer, agent, or employee of the City of Los Angeles shall be personally liable for any damage incurred or alleged to be incurred as a result of any act required, permitted or authorized to be done or performed in the discharge of his or her duties pursuant to this Chapter.

8901.4.2 Suits to be defended by city attorney. Any suit brought against any officer, agent or employee of the City of

Los Angeles as a result of any act required, permitted or authorized in the discharge of his or her duties under this Chapter shall be deemed an action against the City and shall be defended by the city attorney.

8901.5 Other provisions of the municipal code unaffected hereby. The provisions of this Chapter shall not be deemed to repeal by implication any other provision of the *Los Angeles Municipal Code* and the adoption hereof shall not be deemed to affect or diminish the power or authority of an officer or employee of the City to condemn any building or structure erected or maintained in violation of any other provisions of said code.

8901.6 Separability of provisions of this chapter. The City Council hereby declares that it would have adopted each separate provision of this Chapter, regardless of the adoption of any other provision, and if any remedy provided for in this Chapter be held unavailable or limited in effect, such limitation shall not affect the application of any other provision of this Chapter.

8901.7 Unless otherwise expressly provided, the remedies or penalties provided by this Chapter are cumulative to each other and to the remedies or penalties available under law.

The provisions set forth in Article 8 of this chapter shall not apply to proceedings conducted pursuant to this Chapter. However, the Superintendent of Building and the Board may utilize the procedures described therein, to the extent necessary to assure that an owner has a full and fair opportunity to present evidence relevant to the abatement of the public nuisance conditions on that owner's property.

8901.8 Wherever service is required in this Chapter, that service may be accomplished by personal service as authorized in Sections 415.10, 415.20, and 415.21 of the *California Code of Civil Procedure*.

SECTION 8902 DEFINITIONS

For the purpose of this Chapter, certain terms are defined as follows:

DEPARTMENT. Refer to Chapter 2 of this Code.

HAZARDOUS BUILDING. Any building, structure or portion thereof which has any or all of the hereinafter described defects:

1. Whenever any door, aisle, passageway, stairway or other means of exit is not of sufficient width or size, or is not so arranged as to provide safe and adequate means of exit, in case of fire or panic, for all persons housed or assembled therein who would be required to, or might, use such door, aisle, passageway, stairway or other means of exit.

2. Whenever the stress in any materials, member or portion thereof, due to all dead and live loads, is more than one and one-half times the working stress or stresses allowed in Article 1 of Division IX of the *Los Angeles Municipal Code*.
3. Whenever any portion thereof has been damaged by earthquake, wind, flood, or by any other cause, in such a manner that the structural strength or stability thereof is appreciably less than it was before, such catastrophe and is less than the minimum requirements of this Code for a new building of similar structure, purpose or location.
4. Whenever any portion of any member or appurtenance thereof is likely to fall, or to become detached or dislodged, or to collapse and thereby injure persons or damage property.
5. Whenever any portion of a building or any member or appurtenance thereof or ornamentation on the exterior thereof is not of sufficient strength or stability or is not so anchored, attached or fastened in place so as to be capable of resisting a wind pressure of one half that specified in this Code without exceeding the working stresses permitted in this Code.
6. Whenever any portion thereof has settled to such an extent that walls or other structural portions have materially less resistance to winds or earthquakes than is required in the case of new construction.
7. Whenever the building or structure, or any portion thereof, because of dilapidation, deterioration, decay, faulty construction, or because of the removal or movement of some portion of the ground necessary for the purpose of supporting such building, or portion thereof, or some other cause, is likely to partially or completely collapse, or some portion of the foundation or underpinning is likely to fall or give way.
8. Whenever, for any reason whatsoever, the building or structure, or any portion thereof, is unsafe for the purpose for which it is used.
9. Whenever the exterior walls or other vertical structural members list, lean or buckle to such an extent that a plumb line passing through the center gravity does not fall inside the middle third of the base.
10. Whenever the building or structure, exclusive of the foundation, shows 33 percent or more of damage or deterioration to the member or members, or 50 percent of damage or deterioration or a nonsupporting enclosing or outside wall or covering.
11. Whenever the building or structure has been so damaged by fire, wind, earthquake or flood or has become so dilapidated or deteriorated as to become an attractive nuisance to children who might play therein to their danger, or as to afford a harbor for vagrants, criminals or immoral persons or as to enable persons to resort thereto for the purpose of committing nuisance or unlawful or immoral acts.
12. Any building or structure which has been constructed, or which now exists or is maintained in violation of any

specific requirements or prohibition, applicable to such building or structure, of the building regulations of this city, as set forth in Article 1 of Chapter IX of the *Los Angeles Municipal Code* or of any provisions of Article 7 of Chapter V of the *Los Angeles Municipal Code* relating to the prevention of fire, when so determined and reported by the chief engineer, fire department, or of Article 1 of Chapter III of the *Los Angeles Municipal Code* relating to the protection of health when so determined and reported by the health officer, or of any law or ordinance of this state or city relating to the condition, location or structure of buildings.

13. Any building or structure which, whether or not erected in accordance with all applicable laws and ordinances, has in any nonsupporting part, member or portion, less than 50 percent, or in any supporting member less than 66 percent, of the strength, fire-resisting qualities or characteristics or weather-resisting qualities or characteristics required by law or ordinance in the case of a newly constructed building of like area, height and occupancy in the same location.
14. Whenever a building or structure, used or intended to be used for dwelling purposes, because of dilapidation, decay, damage or faulty construction or arrangement, or otherwise, is insanitary or unfit for human habitation or is in a condition that is likely to cause sickness or disease, when so determined by the health officer, or is likely to work injury to the health, safety or general welfare of those living within.
15. Whenever the building or structure, used or intended to be used for dwelling purposes, has light, air and sanitation facilities inadequate to protect the health, safety or general welfare of persons living within.
16. Whenever any building or structure by reason of obsolescence, dilapidated condition, deterioration, damage, electric wiring, gas connections, heating apparatus or other cause, is in such condition as to be a fire hazard and is so situated as to endanger life or other buildings or property in the vicinity or provide a ready fuel supply to augment the spread and intensity of fire arising from any cause.
17. Whenever any fire-protective construction or safety device does not provide the degree of security to life and property required by the *Los Angeles Municipal Code*.
18. Whenever a building or structure is classified as a "sub-standard building."
19. Whenever a building or structure has become vacant and vandalized.
20. Whenever a building or structure has become a nuisance.

NUISANCE. Any premises, building, structure or portion thereof containing numerous code violations or one or more imminent life hazards.

SUBSTANDARD BUILDING. Any building, or portion thereof, including any dwelling unit, guest room or suite of rooms, or the premises on which the same is located, in which

there exists any of the following listed conditions to an extent that endangers the life, limb, health, property, safety or welfare of the public or the occupants thereof:

8902.1 Inadequate sanitation. Inadequate sanitation shall include, but not be limited to, the following:

1. Lack of or improper water closet, lavatory, bathtub or shower in a dwelling unit.
2. Lack of or improper water closets, lavatories and bathtubs or showers per number of guests in a hotel.
3. Lack of or improper kitchen sink.
4. Lack of hot and cold running water to plumbing fixtures in a hotel.
5. Lack of hot and cold running water to plumbing fixtures in a dwelling unit.
6. Lack of adequate heating.
7. Lack of or improper operation of required ventilating equipment.
8. Lack of minimum amounts of natural light and ventilation required by this Code.
9. Room and space dimensions less than required by this Code.
10. Lack of required electrical lighting.
11. Dampness of habitable rooms.
12. Infestation of insects, vermin or rodents as determined by the health officer.
13. General dilapidation or improper maintenance.
14. Lack of connection to required sewage disposal system.
15. Lack of adequate garbage and rubbish storage and removal facilities as determined by the health officer.

8902.2 Structural hazards. Structural hazards shall include, but not be limited to, the following:

1. Deteriorated or inadequate foundations.
2. Defective or deteriorated flooring or floor supports.
3. Flooring or floor supports of insufficient size to carry imposed loads with safety.
4. Members of walls, partitions or other vertical supports that split, lean, list or buckle due to defective material or deterioration.
5. Members of walls, partitions or other vertical supports that are of insufficient size to carry imposed loads with safety.
6. Members of ceilings, roofs, ceiling and roof supports or other horizontal members which sag, split or buckle due to defective material or deterioration.
7. Members of ceilings, roofs, ceiling and roof supports, or other horizontal members that are of insufficient size to carry imposed loads with safety.
8. Fireplaces or chimneys which list, bulge or settle, due to defective material or deterioration.

9. Fireplaces or chimneys which are of insufficient size or strength to carry imposed loads with safety.

8902.3 Nuisance. Any nuisance as defined in this Code.

8902.4 Hazardous wiring. All wiring except that which conformed with all applicable laws in effect at the time of installation and which has been maintained in good condition and is being used in a safe manner.

8902.5 Hazardous plumbing. All plumbing except that which conformed with all applicable laws in effect at the time of installation and which has been maintained in good condition and which is free of cross-connections and siphonage between fixtures.

8902.6 Hazardous mechanical equipment. All mechanical equipment, including vents, except that which conformed with all applicable laws in effect at the time of installation and which has been maintained in good and safe condition.

8902.7 Faulty weather protection. Shall include, but not be limited to, the following:

1. Deteriorated, crumbling or loose plaster.
2. Deteriorated or ineffective waterproofing of exterior walls, roof, foundations or floors, including broken windows or doors.
3. Defective or lack of weather protection for exterior wall coverings, including lack of paint, or weathering due to lack of paint or other approved protective covering.
4. Broken, rotted, split or buckled exterior wall coverings or roof coverings.

8902.8 Fire hazard. Any building or portion thereof, device, apparatus, equipment, combustible waste or vegetation which, in the opinion of the Chief of the fire department or the Chief's deputy, is in such a condition as to cause a fire or explosion or provide a ready fuel to augment the spread and intensity of fire or explosion arising from any cause.

8902.9 Faulty materials of construction. All materials of construction except those which are specifically allowed or approved by this Code and which have been adequately maintained in a good and safe condition.

8902.10 Hazardous or unsanitary premises. Those premises on which an accumulation of weeds, vegetation, junk, dead organic matter, debris, garbage, offal, rat harborages, stagnant water, combustible materials and similar materials or conditions constitute fire, health or safety hazards.

8902.11 Inadequate maintenance. Any building or portion thereof which is determined to be an unsafe building in accordance with the standards set forth in Section 8104.

8902.12 Inadequate exits. All buildings or portions thereof not provided with adequate exit facilities as required by this Code except those buildings or portions thereof whose exit facilities conformed with all applicable laws at the time of their construction and which have been adequately maintained and increased in relation to any increase in occupant load, alteration or addition, or any change in occupancy.

When an unsafe condition exists through lack of, or improper location of, exit, additional exits may be required to be installed.

8902.13 Inadequate fire-protection or fire-fighting equipment. All buildings or portions thereof which are not provided with the fire-resistive construction or fire-extinguishing systems or equipment required by this Code, except those buildings or portions thereof which conformed with all applicable laws at the time of their construction and whose fire-resistive integrity and fire-extinguishing systems or equipment have been adequately maintained and improved in relation to any increase in occupant load, alteration or addition, or any change in occupancy.

8902.14 Illegal occupancy. All buildings or portions thereof occupied for living, sleeping, cooking or dining purposes which were not designed or intended to be used for such occupancies.

SECTION 8903 ABATEMENT PROCEDURES

8903.1 Issuance of initial orders.

8903.1.1 Notification. Whenever the Department determines that any building, structure, or premises is within the scope of this Chapter, the Department shall issue an order to the owner as shown in the last equalized assessment roll.

The order shall specify the conditions which exist which cause the building or premises to be within the scope of this Chapter; whereupon the owner or owner's agent shall obtain the necessary permits and abate the deficiencies in accordance with Section 8903.1.2.

The order shall also require that the owner maintain the vacant buildings or structures vacant until they are repaired or demolished.

The requirements of this section shall also apply to any building, structure, attached or detached appurtenances, or premises as determined by the Department.

8903.1.2 Time for compliance. Within 30 days after notice is given, the owner or the owner's agents shall obtain the necessary permits and shall commence work to abate the deficiencies. All necessary work shall be completed within 90 days after such notice is given.

8903.1.3 Order to vacate. If the necessary permits are not obtained or the required work is not physically commenced within 45 days after notice is given, or the identified deficient conditions are not corrected within 90 days after notice is given, the Department may order the owner to cause the building to be vacated and may also institute enforcement action as provided in this Chapter.

8903.1.4 Vacated buildings. No person shall reoccupy any building within the scope of this Chapter which is found to be vacant or is ordered vacated in accordance with Section 8903.1.3, until the deficiencies have been abated and a new Certificate of Occupancy or clearance is obtained from the Department. Any Certificate of Occupancy previously issued for such building shall be void.

8903.1.5 Posting of buildings. Vacated buildings shall be locked by the owner and otherwise secured against ingress. If the Department has ordered that a building be vacated or that the owner maintain a building vacant, then the Department shall post thereon, in a conspicuous place near the entrance, a warning placard or sign.

A warning placard or sign posted pursuant to this section shall not be defaced, covered, removed or hidden from view in any manner.

The placard or sign posted shall read substantially as follows:

**VACATED BUILDING - DO NOT ENTER
BY ORDER OF THE
DEPARTMENT OF BUILDING AND SAFETY
CITY OF LOS ANGELES**

It is a misdemeanor to enter or occupy or be present in this building. It is a misdemeanor to remove, deface, cover, or hide this placard. Section 8903 *Los Angeles Municipal Code*.

8903.1.6 Recordation. At the time that the Department serves the order described in Section 8903.1, the Department shall file with the Office of the County Recorder a certificate stating that the subject building has been determined to be either a hazardous building, a substandard residential building, or a nuisance, that it has been ordered repaired or demolished, and that the owner thereof has been so notified.

After the building has been repaired or demolished, the Department shall file with the Office of the County Recorder a certificate terminating the above recorded status of the subject building.

8903.1.7 Manner of giving notice. The orders described in this section shall be given in writing and may be given either by personal delivery thereof to the person to be notified or by deposit in the United States mail in a sealed envelope, postage prepaid, addressed to such person to be notified at the address as shown on the last equalized assessment roll. Service by mail shall be deemed to have been completed at the time of deposit in the post office. The failure of any owner or other person to receive such notice shall not affect in any manner the validity of any of the proceedings taken thereunder. Proof of giving any notice may be made by an affidavit of any employee of the City which shows service in conformity with this section.

8903.2 Violations—penalties for disregarding initial orders.

8903.2.1 The owner or other person having charge and control over any building or structure determined by the Department to fall within the scope of this Chapter who shall fail to comply with any order to repair, vacate and repair, or demolish said building, structure or premises within the time limits established in this Chapter shall be guilty of a misdemeanor.

8903.2.2 The occupant or lessee in possession who fails to comply with any order to vacate said building in accordance with any order given as provided for in this Chapter shall be guilty of a misdemeanor.

8903.2.3 Any person who removes any notice or order posted as required in this Chapter shall be guilty of a misdemeanor.

8903.2.4 No person shall enter, occupy or be present in a building which has been posted by the Department pursuant to this section. Any person who enters, occupies or is present in a building which has been posted by the Department pursuant to this section shall be guilty of a misdemeanor. This prohibition shall not apply to public officers or public employees acting within the course and scope of their employment or in the performance of their official duties, or owners, persons acting with the consent of the building owner, the owner's agent, or person in lawful possession.

Notwithstanding any other provision of the *Los Angeles Municipal Code* to the contrary, a police officer with the Los Angeles Police Department shall have the authority to enter any building posted by the Department pursuant to this section, and arrest anyone present in violation of this section.

8903.3 Enforcement—noncompliance with department orders.

8903.3.1 General. Whenever compliance with an order issued pursuant to the provisions of this Chapter for vacated or occupied buildings has not been accomplished within the time set or any additional time as may have been granted under the appellate provisions of this Chapter, the Department may institute appropriate action to secure compliance as provided by law for misdemeanor violation or may cause, by whatever means the Department determines appropriate, the correction of the deficiencies, whether the building is vacated or occupied, or the vacation and demolition, including but not limited to the monitoring and removal of asbestos, of the building or structure.

8903.3.2 Determination of interested parties. When the Department determines to cause the correction of deficiencies or the demolition of a building or structure, it shall obtain a title report either from the Division of Real Estate, Bureau of Engineering, Department of Public Works, City of Los Angeles or by contracting with one or more private title reporting agencies. Said title report shall list all persons shown on the records of the County Recorder as having an ownership interest or liens or encumbrances or other interests in the real property on which the building or structure is located.

8903.3.3 Notification—notice of intention. When the Department determines that the owner shall correct the deficiencies or shall demolish the building or structure, the Department shall notify the owner as identified in the title report and other persons listed in the title report as having an interest in the real property.

The notice of intention shall describe the land and notify the owner of the intention of the City of Los Angeles to cause the correction of the deficiencies or the demolition of the building or structure located on the land, and shall specify a date certain upon or after which the Department shall solicit bids or execute a work order, and shall have the authority to advise that any time thereafter the Department may execute an agreement to do such work. The Depart-

ment shall also notify the owner that the City will cause the cost of such repair or demolition plus an amount equal to 40 percent of such cost, but not less than \$100.00, to cover the cost of the City administering the contract and supervising the required work, to be made a lien against real property on which the building or structure is located. In the event that a contractor offers to pay the City to demolish a building in order to obtain the salvage material, the City's administrative charge shall be 40 percent of the amount paid by the contractor, but not less than \$100.00. Finally, the notice shall advise of the owner's right to a hearing.

The date for solicitation of bids or execution of the work order shall not be sooner than 10 days following the mailing of the notices by certified mail as described in Section 8903.3.4. The award of the contract for such repair or removal may be given at any time following the receipt of bids.

One or more "**Annual Unit-price Contracts**" may be awarded by the Department for the demolition of "privately owned, readily accessible one and two-story wood-frame structures on level lots." In the event one or more such contracts have been executed which are applicable to the building which is to be removed, the notice shall advise that the work shall be pursuant to such contract, and that following a date certain, not less than 10 days following the mailing of notice by certified mail, the City pursuant to such contract shall have the authority to order the contractor to perform the work at the prices specified in said "**Unit-price Contract.**" For the purposes of this subsection an "Annual Unit-price Contract" shall mean a 12-month contract awarded by the Department after competitive bidding based on both stipulated prices and price per square foot of building area for the demolition and removal of buildings, structures and accompanying items on certain properties when and as directed by the Department by means of a work order. No work order shall be executed except in conjunction with the necessary contract or contracts.

The Department shall have the authority to award contracts for the demolition of all other types of buildings or structures by soliciting competitive bids. The General Manager shall have the authority to establish procedures and deadlines for soliciting competitive bids from any interested contractors. In addition, the General Manager shall have the authority to establish procedures for the prequalification of contractors in a manner consistent with the requirements of Section 386 of the Charter and subject to the approval of the City Attorney.

8903.3.4 Method of notification. The notice required by this section shall be sent to each required person by certified mail, postage prepaid, return receipt requested, at the address or addresses of such persons as it appears on the last equalized assessment roll of the County or as known to the City Clerk. If for any reason the certified letter is returned, whether undeliverable or refused, another copy of the letter shall be sent by first-class mail, postage prepaid.

Further, a copy of any order or notice issued under this section shall be posted in a conspicuous place upon the building or structure involved.

The failure of any owner or other person to receive such notice shall not affect in any manner the validity of any proceedings taken thereunder.

8903.3.5 Affidavit of service. The employee of the Department, upon giving notice as provided in this section, shall file an affidavit thereof certifying to the date and manner in which such notice was given. Any receipt card which may have been returned to the employee in acknowledgment of the receipt of such notice by certified mail shall also be filed with the affidavit.

8903.4 Owner's loss of rights.

8903.4.1 General. Whenever the Department has undertaken action to correct deficiencies, secure or demolish any building, structure or portion thereof under the provisions of this Chapter upon failure of the owner or person in apparent charge or control of the property to comply with an order therefor, and has caused the solicitation of bids or executed a work order to accomplish such work, the owner or person in apparent charge or control of the property shall be deemed to have forfeited all further rights and privileges to do such work and is thereafter prohibited from doing any such work, except as the Department may otherwise allow.

8903.4.2 Penalty for performing work prior to contract awarding. In the event that the owner or other person having charge or control of such building or structure proceeds to perform the corrective work or demolish said building or structure, with or without the permission of the Department or Board of Building and Safety Commissioners, after bids have been solicited or a work order executed, but prior to the award of the contract or the acceptance of the work order by the contractor, a charge shall be imposed upon such person as partial reimbursement to the City for any expenses incurred by it in the proceeding. Such charge shall be in the amount of 20 percent of the lowest bid for the demolition or repair contract or of the work order charge, whichever applies, but in no event less than the sum of \$75.00.

8903.4.3 Penalty for performing work after contract is awarded. If the owner or other person having charge or control of the building or structure proceeds to perform the corrective work or demolish the building or structure after the award of the demolition or repair contract or after the acceptance of the work order by the contractor, but before the contractor has commenced performance, a charge shall be imposed upon such person in an amount which shall be the sum of a charge computed as in Section 8903.4.2, plus the amount of the contractor's claim filed with the City Clerk and approved by the Department pursuant to the provisions of Section 8903.5.

8903.5 Cancellation of contract or work order.

8903.5.1 General. If, for any reason, the Department wishes to cancel a demolition or repair contract after it has been awarded or a work order after it has been executed and accepted, it may do so by written notification delivered to the contractor any time prior to the commencement of the work. When the Department determines that expediency so requires, an oral notice of cancellation may be given, immediately followed by its confirmation in writing. Upon

receipt of such oral or written notification the contractor shall take no further action toward demolition or repair of the building or structure.

8903.5.2 Compensation of contractor – cancellation of contract or work order. Upon cancellation of a demolition or repair contract by the Department, the contractor may submit a claim to the City Clerk in an amount up to 25 percent of the contract price, but not to exceed the sum of \$1,000.00, payment of which contractor shall accept as compensation for all real and anticipated expenses and profits.

Upon cancellation of a work order by the Department, the contractor may submit a claim to the City Clerk up to the amount of \$200.00, payment of which contractor shall accept as compensation for all real and anticipated expenses and profits.

8903.5.3 Source of contractor reimbursement funds. Claims submitted pursuant to Section 8903.5.2 and to the extent approved by the Department shall be paid by the Department out of the Repair and Demolition Fund. Where the amount of the claim has been made a charge against the owner or other party of interest pursuant to Section 8903.4.3, or where the demolition or repair contract or work order was canceled by the Department at the request of the owner or other party of interest, such party shall reimburse the City for the amount of the claim filed with the City Clerk and approved by the Department or paid from the repair and demolition fund.

8903.6 Failure to pay charges. Should the owner or other party of interest fail to pay, within 30 days after billing thereof, any charge imposed upon such party pursuant to Sections 8903.5.2 or 8903.5.3, the Department shall transmit any unpaid claim to the Office of the City Attorney for collection and/or appropriate legal remedy as determined by the Office of the City Attorney.

8903.7 Appeals and hearings.

8903.7.1 Appeals. Upon written application by an interested party within 30 days from the service of the initial order as provided for in Section 8903.1, for good cause shown and where no imminent risk of life or property is present, the Department or the Board, in case an appeal is made to it pursuant to Section 98.403.2 of the *Los Angeles Municipal Code*, may grant a reasonable extension of time, not to exceed 120 days after expiration of the 30-day period provided for in the initial order, within which the work required must be commenced.

Nothing in this subdivision precludes the Board from establishing a policy of granting less than the maximum time to comply with Department orders.

8903.7.2 Hearings.

A. Upon the issuance of a Notice of Intention, as provided for in Section 8903.3, any owner or party of interest may appeal in writing to the Board for a hearing to determine the condition of the property, whether it falls within the scope of this Chapter; whether it should be repaired or demolished and how much time should be given to complete the required work. The request for the

hearing shall be made prior to the date set to solicit bids or execute a work order as specified in the Notice of Intention. A request after such date may not be accepted for processing unless it is submitted prior to the Department's awarding a contract or issuing a work order and it is authorized by the Board. Failure of the owner or any party of interest in the property to request a hearing within the specified time or failure to pay the required filing fees shall be deemed a waiver of request for such a hearing.

B. At the hearing the Department shall submit for the record evidence to show whether or not the building or structure falls within the scope of this Chapter. The evidence shall consist of, but need not be limited to, the inspection report originally issued by the Department pursuant to Section 8903.1, recent pictures and testimony by a representative of the Department. The owner or any party of interest shall have the opportunity prior to the hearing to examine the evidence to be submitted by the Department. The owner, the owner's representative or counsel, or a party of interest should be present at the hearing and will be given the opportunity to present any relevant evidence or witnesses, cross-examine any Department witnesses and ask questions or make comments concerning the Department's evidence and testimony. Failure of the owner or the owner's representative to appear at the hearing after receiving notice of the hearing shall be deemed a waiver of hearing rights.

C. At the conclusion of the hearing, the Board shall make findings and determine whether the building falls within the scope of this Chapter and whether the building or structure should be repaired or demolished and how much time, if any, should be given for compliance with the Department's order.

8903.7.3 Time limits for vacant buildings. Any appeal or request for hearing to the Board for an extension of time to repair or demolish a vacant privately owned building shall be decided by the Board no later than 30 days after the hearing thereon and may be granted only on the condition that such repairs be completed within a maximum period of 180 days after the date of the Board's first action to grant an extension of time and on the further condition that no additional time will be granted.

8903.7.4 Notification. Only those persons who request a hearing need to be notified of the date and time of the hearing. Notification shall be made by certified mail, postage prepaid, return receipt requested, to the address as shown on the hearing request application. The employee of the Department, upon giving notice as provided in the subsection, shall file an affidavit thereof certifying to the date and manner in which such notice was given. Any receipt card that may have been returned to the employee in acknowledgment of the receipt of such notice by certified mail shall also be filed with the affidavit.

SECTION 8904 SPECIAL PROVISIONS FOR VACANT PROPERTY GRAFFITI REMOVAL

8904.1 Duties of the owner of vacant property. It shall be unlawful for the owner or person in control to permit the accumulation of trash, debris, vehicle parts, rubbish, excessive vegetation or other similar nuisance conditions on a parcel or in and around any building or structure located on a parcel. The Department may order the fencing of such a parcel in the manner described below.

It shall be unlawful for the owner or person in control of a parcel of land, to allow to exist a vacant building or structure which is open to unauthorized entry on that land. The entire building or structure shall be securely maintained. The owner or person in control of a vacant building, structure, or lot which is open to unauthorized entry shall secure all openings, accessible for entry from the exterior of the building or structure, and where appropriate, the entire lot itself, with one of the following methods:

- 1. Minimum 3/4-inch exterior grade plywood.** The plywood shall have a positive connection to the building or structure using minimum 1/2-inch (13 mm) bolts which shall not be removable from the outside.
- 2. Minimum 16-gauge steel mesh attached to a minimum one inch by 1/8-inch angle iron frame.** The frame shall have a positive connection to the building or structure using minimum 1/2-inch (13 mm) bolts which shall not be removable from the outside.
- 3. Other means of barricading as directed or approved by the Department including wrought iron fencing of the lot.** The Department may, working in cooperation with the police department, develop standards for alternative fencing.

Unless directed otherwise by the Department, the owner or person in control also shall erect a ten foot high, unobstructed, chainlink fence complete with lockable gates. The fence, once constructed, shall become the property of the owner of the property upon which it is constructed and, all structures on the property, including the fence shall be maintained in good repair. In the event that the fence or other barriers cannot be maintained in good repair, the Department may order an alternative method of barricading. The property so fenced shall be conspicuously posted with a "No Trespassing" sign pursuant to Section 41.24 of this Code.

It shall also be unlawful for the owner or person in control to allow to exist any graffiti on a building or fence when that graffiti, as defined in Section 49.84 of this Code, is visible from a public street or alley. It shall also be unlawful if the owner or person in control refuses to consent to the removal of the graffiti by the City after being notified by the Department that the City intends to remove the graffiti.

Owners, whose property displays graffiti, shall completely remove the graffiti by washing, sandblasting or chemical treat-

ment or shall completely and uniformly cover or otherwise obscure the graffiti with paint or other approved materials.

It is unlawful to maintain a swimming pool in violation of Sections 6407 and 6405.16 of this Code. The 10-foot (3048 mm) high chainlink fence described above may be used to comply with Section 6407 of this Code. The swimming pool water shall be removed if the property is vacant.

8904.1.1 Procedure for securing vacant property and removing graffiti—notification. The City Council finds that the following conditions constitute a public nuisance: the maintenance of vacant buildings or structures open to unauthorized entry; the storage and accumulation of trash, debris, vehicle parts or other items prohibited under Section 8904 of this Code; and the maintenance of vacant or occupied property with graffiti visible from a public street or alley as described by Section 8904 of this Code.

If the property owner or person in control consents to the removal of the graffiti, the City may enter upon the property and remove such graffiti.

If the owner or person in control refuses to remove the graffiti, or if any of the public nuisance conditions above-described exist, then the Department of Building and Safety may issue an order by certified mail, return receipt requested, or may deposit an order in the United States mail in a sealed envelope, postage prepaid, to the owner as shown on the last equalized assessment roll to abate these conditions. A copy of the order shall also be posted on the subject property. The order may give no more than ten days from the date the notice was mailed to perform the work.

However, if the order is served by way of personal service, the order may give no more than 5 days from the date the order was served to perform the work.

8904.1.2 Abatement by the city. In the event the nuisance, including graffiti, is not removed or otherwise eliminated or abated by the date specified in the notice, the City, or its contractor, may enter upon the parcel and remove or eliminate the nuisance. Abatement may be accomplished by contract or work order and may be performed by a private contractor submitting a competitive sealed bid, a public entity performing under a Memorandum of Understanding or by means of an Annual Awarded Contract.

For the purposes of this section, an Annual Awarded Contract shall mean one or more 12-month contracts awarded by the Department after competitive bidding. The contracts may be based upon both stipulated prices and unit cost for the fencing of vacant or vacated property; for removal of graffiti visible from a public street or alley; for draining swimming pools; for the securing of vacant buildings open to unauthorized entry; for the removal of debris, rubbish, excessive vegetation, weed abatement or similar nuisance conditions on property containing a vacant building or vacant lots, when and as directed by the Department by means of a work order. No work order shall be executed except in conjunction with the necessary contract or contracts.

If abatement is performed by a City department other than the Department of Building and Safety, that depart-

ment shall bill the owner for the cost of removal, or other elimination or abatement of the nuisance, including administrative costs. An itemized written report showing the date and cost of abatement work done by the City or its contractor shall be submitted to the Department. Payment for the cost of abatement and recovery of the cost from the property owner shall be pursuant to Section 8906 of this Code.

If the building again becomes open to unauthorized entry, or graffiti is again visible from a public street or alley, or the building's premises or vacant parcel again contain debris, rubbish, excessive vegetation or other similar nuisance conditions, the Department may, upon 3 days notice to the owner, execute a contract or work order to have the required work performed by one of the methods provided by this section. The cost of performing the work may be paid from the Repair and Demolition Fund as established in Section 8906 of this Code. Further, the provisions of Sections 8903.4, 8903.5 and 8903.6 shall apply to this section.

The above abatement procedures are in addition to any other remedy the Department may choose to pursue to eliminate the nuisance conditions.

This section may also be used to abate graffiti, as defined in Section 49.84 of the *Los Angeles Municipal Code*, observable from the public street.

If at the time of removal of the graffiti the owner or occupants object, then the City will immediately obtain the necessary consent, warrants, or court order prior to completion of the graffiti removal. This section should not be administered in any way that would violate the constitutional rights of any person.

8904.2 Abatement of vacant buildings or structures that are open to unauthorized entry and fire damaged or repeatedly used for illegal purposes.

8904.2.1 Any vacant buildings open to unauthorized entry, which become fire damaged or used repeatedly by vagrants and gang members or for other illegal purposes without the owner's permission, constitute a public nuisance. The expeditious repair or demolition of such vacant buildings and attached or detached appurtenances is essential in order to eliminate fire hazards, and public nuisance conditions which adversely affect the public safety and have a blighting effect on the neighborhood. It is the purpose of this section to establish a fair and expeditious procedure which may be used in connection with those buildings and attached or detached appurtenances.

8904.2.2 Procedures. The Department may declare a vacant building to be a public nuisance building under the following circumstances:

1. The vacant building has been secured pursuant to Section 8904.1;
2. It has subsequently become open to unauthorized entry; and
3. It has become fire damaged or is used repeatedly without the owner's permission by vagrants, criminals, or gangs or for other illegal purposes.

If the Department determines that a vacant building is a public nuisance building as defined in this section, then the Department may proceed to abate the public nuisance building utilizing the procedures set forth in Sections 8907.2, 8907.3 and 8907.4 of this Code. The cost of any work done by the City or its contractor to abate the nuisance may be collected from the property owner in accordance with the procedures set forth in Section 8906.

A copy of any order issued pursuant to this section shall be provided to the fire department and police department.

8904.3 Inspection fee for periodic inspection of property and buildings. Whenever the Department determines after notice and hearing that a property or building requires a monthly inspection in order to abate a public nuisance and encourage future maintenance in compliance with applicable codes, the Department may inspect monthly and assess fees pursuant to Section 98.0412 of this Code. These fees shall be imposed annually when the nuisance condition is abated by the City pursuant to this Chapter but not more than once during any 12-month period.

The notice of hearing and intent to impose the annual fee shall be mailed to the owner as listed on the last equalized assessment roll or supplemental roll. The matter shall be scheduled for hearing before the Board of Building and Safety Commissioners on the date specified on the notice. The Board shall determine whether the conditions and previous record of public nuisance conditions and failure to comply with the Code justify the imposition of the annual fee and monthly inspection.

The monthly inspection may be accomplished by contract or work order and may be performed by a private contractor submitting a sealed bid or by means of an Annual Awarded Monitoring Contract. An Annual Awarded Monitoring Contract shall mean one or more 12-month contracts awarded by the Department after competitive bidding. Payment for the cost of monthly inspections shall be made from the Repair and Demolition Fund. Any payments received as a result of the annual fee imposed pursuant to this subsection shall be deposited into the Repair and Demolition Fund. The property owner's failure to pay this fee may result in a lien against the property pursuant to Sections 8906.2 of this Code.

SECTION 8905 SPECIAL PROVISIONS FOR VACATING, BARRICADING, REMOVING OR DEMOLISHING BUILDINGS OR STRUCTURES WITHOUT NOTICE

8905.1 Notwithstanding anything to the contrary in this section, whenever the Department determines that any building, structure, premises or portion thereof falling within the scope of this Chapter is a present, imminent, extreme and immediate hazard or danger to life or limb, health or safety, so as to necessitate the immediate elimination thereof without prior notice to the owner, the Department may, without an order or notice of any kind whatsoever and without a hearing, cause the building, structure or premises or any portion thereof to be immediately vacated, barricaded, removed or demolished by such means as the Department may deem advisable, including the use of the Department's annual awarded demolition contractor.

8905.2 Buildings or structures which are vacated pursuant to this section shall be locked and otherwise secured against ingress and the Department shall post thereon, in a conspicuous place near the entrance, a placard warning the building is unsafe.

Any warning placard posted pursuant to this section shall not be defaced, covered, removed, or hidden from view in any manner.

8905.3 The Department may cause the building, structure or premises or any portion of the building, structure or premises to be immediately barricaded, removed or demolished. The barricading, removal or demolition, including any monitoring or removal of asbestos, may be accomplished by any City department with the forces to perform the work, upon receipt of a request from the Department, or by any forces under contract to the City. Where the work is accomplished either by contract or City forces, the cost shall be paid from the Repair and Demolition Fund as established in Section 8906.

All costs incurred pursuant to this section shall be a personal obligation against the property owner upon which the particular building or structure or any portion is located, recoverable by the City in an action before any court of competent jurisdiction. These costs shall include an amount equal to 40 percent of the cost to perform the actual work, but not less than the sum of \$100.00, to cover the City's costs for administering any contract and supervising the work required. In addition to this personal obligation and all other remedies provided by law, the City may collect any judgment, fee, cost, or charge, including any permit fees, fines, late charges, or interest, incurred in relation to the provisions of this section as provided in Sections 7.35.1 through 7.35.8 of the *Los Angeles Administrative Code*.

8905.4 The administrative fee of 40 percent of the costs shall not be included in the calculation of costs incurred for or arising out of any barricading, removal or demolition resulting from an event or course of events that prompted a declaration of a state of emergency, local emergency, war emergency or major disaster by the Mayor, the Governor of the State, or by the President of the United States.

SECTION 8906 PAYMENT AND RECOVERY OF REPAIR AND DEMOLITION FUNDS

8906.1 Repair and demolition fund.

8906.1.1 Established by City Council. The City Council has set up a special revolving fund designated as the repair and demolition fund. Payments shall be made out of said fund upon the demand of the Department to defray the costs and expenses which may be incurred by said Department in causing the necessary work of repair, securing, cleaning or demolition of buildings, structures and portions thereof or premises which fall within the scope of this Chapter.

8906.1.2 Transfer of funds. The City Council may at any time transfer to the repair and demolition fund, out of any money in the General Fund of the City, sums as it may deem necessary in order to ensure the performance of the work of repair, securing, cleaning or demolition, and the sum so transferred shall be deemed a loan to a special fund and shall

be repaid out of the proceeds of the collection of costs provided for in this Chapter. All funds collected under the proceedings provided for below, either upon voluntary payments or as the result of the involuntary sale of the property, shall be paid when collected to the City Treasurer, who shall place the funds in the repair and demolition fund.

8906.1.3 Maximum amount in fund. At the close of each fiscal year, with the exception of money deposited from the Community Development Trust Fund in connection with the Rental Housing Rehabilitation Program, all monies in said repair and demolition fund in excess of \$250,000.00, over and above the amount of outstanding liabilities payable out of such fund, shall be transferred to the salary account of the Department of Building and Safety for use in building conservation work.

8906.2 Collection of repair and demolition costs. Whenever the Department has caused the repair, securing, cleaning or demolition of any building, structure, or portion of a building, structure or any premises, all costs incurred under the provisions of this Chapter shall be a personal obligation against the property owner, recoverable by the City in an action before any court of competent jurisdiction. These costs shall include an amount equal to 40 percent of the cost to perform the actual work, but not less than the sum of \$100.00, to cover the City's costs for administering any contract and supervising the work required. In addition to this personal obligation and all other remedies provided by law, the City may collect any judgment, fee, cost, or charge, including any permit fees, fines, late charges, or interest, incurred in relation to the provisions of this section as provided in Sections 7.35.1 through 7.35.8 of the *Los Angeles Administrative Code*.

SECTION 8907

ABATEMENT OF PUBLIC NUISANCE CONDITIONS RELATED TO A DECLARED LOCAL EMERGENCY

8907.1 Declaration of purpose. Both the expeditious cleanup of the debris and the removal of irreparably damaged buildings resulting from declared local emergencies are essential in order to eliminate public nuisance conditions which may adversely affect the public health, safety and welfare. It is the purpose of this section to establish a fair and expeditious procedure which may be utilized in connection with declared local emergencies for the abatement of public nuisances, which includes hazardous buildings and debris.

Accordingly, the Department is hereby authorized to issue orders requiring property owners to abate public nuisances. The Department is also authorized to cause the demolition of hazardous buildings and to remove the debris, rubbish or other dangerous or injurious materials; or to take other action as necessary to abate public nuisance conditions, and to cause the cost of the demolition, removal or abatement to become a special lien against the property.

The terms "nuisance" and "hazardous buildings" are defined in Section 8902. As used in this section, the term "debris" includes burned or partially burned building materials, members, or portions thereof, ash, damaged appliances, broken concrete, loose bricks, glass, metal and downed trees.

This procedure is in addition to any other procedure that is currently authorized for abatement of such public nuisances. Notwithstanding any provision of this section, the Department may at any time exercise its lawful authority to summarily and immediately abate public nuisances pursuant to Section 8905.

8907.2 Notice. Whenever the Department discovers the existence of a public nuisance, including debris and hazardous buildings, the Department may issue an order for the premises upon which the nuisance is discovered to the person listed as the owner of the premises, based on the last equalized assessment roll or supplemental roll. A copy of the order shall be posted in a conspicuous place on the parcel or premises, and a copy shall also be mailed to the person listed as the owner based on the last equalized assessment roll or supplemental roll. The failure of any owner or other person to receive such notice shall not affect in any manner the validity of any of the proceedings taken thereunder. Proof of giving any notice may be made by an affidavit of any employee of the City, which shows service in conformity with this section. The order shall indicate:

1. The street address, or the approximate street address if no street address has been assigned, of the property on which the nuisance exists;
2. That the condition on the premises as described in the order constitutes a public nuisance;
3. That the owner or owner's agent is required to obtain all necessary permits to abate the public nuisance within 10 days from the date of the order, and to commence and complete all necessary work within 30 days from the date of the order;
4. That the owner must appear at a hearing conducted by the Board, at a time, date and location specified in the order, which shall be at least 15 days from the date of the order;
5. That upon any such appearance the owner will be given the opportunity to present and to elicit testimony and other evidence to show cause why the alleged nuisance should not be abated by the owner or by the City using its own forces or through contract;
6. That such appearance may be made by the submission of written materials if they have been received by the City at least three days prior to the scheduled hearing at the mailing address specified in the order;
7. That if a public nuisance is found to exist on the property and the owner fails to abate that nuisance, then the Department has the authority to cause the demolition of hazardous buildings and removal of debris, rubbish or other dangerous or injurious materials as necessary to abate public nuisance conditions; and
8. That the cost of abatement of the public nuisance by the City may become a special lien against the premises.

8907.3 Pre-abatement hearing.

8907.3.1 The matter shall be scheduled for hearing before the Board on the date and time specified in the order. The Board shall proceed to determine whether the conditions existing on the premises constitute a public nuisance.

8907.3.2 The person notified to appear, or the actual owner of the parcel or premises in the event the person notified is not the owner, or any person representing the owner, who attends the hearing, shall be given an opportunity to present and to elicit testimony and any other evidence on whether a public nuisance exists, and to show cause why the alleged nuisance conditions should not be abated by the owner or by the City using its own forces or through contract. The Board shall proceed with the hearing whether or not such person is in attendance. Written material shall be considered by the Board if it is received three days prior to the scheduled hearing.

8907.3.3 At the conclusion of the hearing, the Board shall make a finding and determine whether the premises are a public nuisance, and how much additional time, if any, should be given to the owner for compliance with the Department's order. Once the Board has acted, it shall have no further jurisdiction over any matter relating to the abatement of the nuisance conditions on the premises. Any future determinations in this regard, including nuisance abatement actions or requests for extensions of time, shall be within the sole jurisdiction and discretion of the Superintendent of Building and not appealable to the Board.

8907.3.4 The owner and any other person who appeared at the scheduled hearing on behalf of the owner, either in person or by the submission of written material, shall be notified in writing of the determination of the Board.

8907.4 Abatement. If the Board finds that a public nuisance exists, and if the Department determines that permits were not obtained, or that the nuisance was not removed or otherwise abated by the dates specified in the order, then the City or its contractor may enter upon the premises to demolish hazardous buildings, monitor or remove asbestos, remove debris, rubbish or other dangerous or injurious materials, and take other action as necessary to abate the nuisance. The work may be accomplished by any City department with the forces to perform the work, upon receipt of a request from the Department, or by any forces under contract to the City. Further, if the work qualifies, then it may be done as part of the City-sponsored demolition and debris removal program approved in concept by the City Council on May 22, 1992.

Where the work is accomplished by other than City forces, the cost may be paid from the Repair and Demolition Fund as established in Section 8906. All costs incurred pursuant to this section shall be a personal obligation against the owner of the property upon which the nuisance is located, recoverable by the City in an action before any court of competent jurisdiction. These costs shall include an amount equal to 40 percent of the cost to perform the actual work, but not less than the sum of \$100.00, to cover the City's costs for administering any contract and supervising the work required, unless the work is necessitated by an event or course of events that prompts the declaration of a local emergency by the Mayor. In addition to this personal obligation and all other remedies provided by law, the City may collect any judgment, fee, cost, or charge, including any permit fees, fines, late charges, or interest, incurred in relation to the provisions of this section as provided in Sections 7.35.1 through 7.35.8 *Los Angeles Administrative Code*.

SECTION 8908 SPECIAL PROVISIONS FOR THE REPAIR OF WELDED STEEL MOMENT FRAME BUILDINGS LOCATED IN HIGH EARTHQUAKE DAMAGED AREAS

8908.1 Welded steel moment frame buildings located in high earthquake damaged areas experienced damage in the beam to column moment connection as a result of the earthquake of January 17, 1994, and its aftershocks. Except as provided by this section, it is unlawful for any person, firm, or corporation to maintain a building with damaged welded moment connections. The purpose of this section is to provide a practicable method, in addition to any other remedy available by law, whereby earthquake damaged welded steel frame moment buildings may be repaired.

8908.2 If the Department determines that a commercial building is a welded steel moment frame building located in a high earthquake damaged area, then the Department may issue an order to the owner, as shown on the last equalized assessment roll, to repair all damaged welded connections.

Within 180 days of mailing of the order, the building owner shall submit an inspection report to the Department indicating the number of damaged welded connections and proposed repair procedures. This inspection report shall be prepared under the direction of a structural engineer licensed by the State of California and shall include the results of any ultrasonic tests or the results of other approved methods of testing of connections. The inspection report shall be approved when it is determined to be in keeping with general standards established by the Department. Permits shall be obtained and repairs to the damaged connections shall commence within 90 days of the Department's approval of the submitted report. Repairs shall be completed within 2 years of the date of the permit.

8908.3 For purposes of this section, the following areas are high earthquake damaged areas:

That area bounded by, Mulholland Drive, Beverly Glen Boulevard, Pico Boulevard, Overland Avenue, Venice Boulevard, Centinela Avenue, Montana Avenue, 26th Street, Sunset Boulevard, and Mandeville Canyon Road.

That area of the City which is North of Mulholland Drive, and bounded by Universal City, Burbank, Glendale, Los Angeles County, and Ventura County.

The City Council, by resolution, may extend the boundaries of these earthquake damaged areas if it finds that damage has occurred to welded steel moment frame buildings outside the boundaries described above. The Department may issue an order for any welded steel moment frame building outside of the high earthquake damaged areas if the Department determines that the building has experienced earthquake damage.

8908.4 If an owner fails to comply with an order issued pursuant to this section within the time set forth in the order or such additional time as may be granted by the Department, then the Department may secure compliance utilizing the procedures set forth in Section 8903. However, if the Department utilizes Section 8903, then the order described in Section 8903.1.1 shall indicate that the building is within the scope of Chapter 89 because of the owner's failure to comply with the requirements

LA of this section. Further the time for compliance set forth in Sec-
 LA tion 8903.1.2 may be reduced to 10 days, and the order to
 LA vacate described in Section 8903.1.3 may be issued whenever
 LA the Department deems appropriate.
 LA

LA 8908.5 Notwithstanding any other provisions of this Code to
 LA the contrary, the owner of any building, who fails to comply
 LA with an order issued pursuant to this section within the time
 LA limits established in this section, shall be guilty of a misde-
 LA meanor. Further, if the Department determines at any time that
 LA the building is a hazardous building or unsafe to occupy, then it
 LA may order that the building be vacated or that other corrective
 LA actions be taken.

CHAPTER 91

EARTHQUAKE HAZARD REDUCTION IN EXISTING TILT-UP CONCRETE WALL BUILDINGS

SECTION 9101 PURPOSE

The purpose of this Chapter is to promote public safety and welfare by reducing the risk of death or injury that may result from the effects of earthquakes on tilt-up concrete wall buildings designed under the building codes in effect prior to January 1, 1976. Such buildings have been categorized, based on past earthquakes, as being potentially hazardous and prone to significant damage, including possible collapse, in a moderate to major earthquake.

The provisions of this Chapter are minimum standards for structural seismic resistance established primarily to reduce the risk of life loss or injury on both subject and adjacent properties and will not necessarily prevent loss of life or injury or prevent earthquake damage to an existing building which complies with these standards. The requirement for compliance with these standards does not preclude the utilization, at the building owner's option, of more extensive strengthening method that might further prevent or limit loss of life or injury or building damage. This Chapter shall not require existing electrical, plumbing, mechanical or fire-safety systems to be altered unless they constitute a hazard to life or property.

This Chapter provides systematic procedures and standards for identification and classification of tilt-up concrete wall building based on the current use of the building. Priorities, time periods, and standards are also established under which these buildings are required to be structurally analyzed and strengthened for seismic resistance. Where the analysis determines structural deficiencies, this Chapter requires the building to be strengthened or demolished.

SECTION 9102 SCOPE

The provisions of this Chapter shall apply to all buildings designed under building codes in effect prior to January 1, 1976, which on the effective date of this Chapter have tilt-up concrete walls as defined herein.

Buildings within the scope of the Chapter may not be added to or structurally altered or remodeled without first complying with the provisions of this Chapter unless the building official determines that the alteration is minor in nature.

Seismic strengthening in place prior to the effective date of this ordinance shall be evaluated according to the provisions of this Chapter and modified to comply if deficient.

SECTION 9103 DEFINITIONS

For purposes of this Chapter, the applicable definitions in Sections 1602, 1902, 2302 and Section 11.2 of ASCE 7, and the following shall apply:

COMMENCED CONSTRUCTION. Construction pursuant to a valid building permit has progressed to the point that one of the called inspections as required by the Department has been made and the work for which the inspection has been called has been judged by the Department to be substantial and has been approved by the Department.

DEPARTMENT. The Department of Building and Safety.

ESSENTIAL BUILDING. For purposes of this Chapter, any building housing a hospital or other medical facility having surgery or emergency treatment areas, fire or police stations, municipal government disaster operations, and communication centers.

HISTORICAL BUILDING. Any building designated or currently in the process of being designated as an historical building by an appropriate federal, state or city jurisdiction.

TILT-UP CONCRETE WALL. A form of precast concrete panel construction either cast in the horizontal position at the site and after curing, lifted and moved into place in a vertical position, or cast off-site in a fabricator's shop.

SECTION 9104 RATING CLASSIFICATIONS

The rating classification as exhibited in Table No. 91-A is hereby established and each building within the scope of this Chapter shall be placed in one rating classification by the Department. The total occupant load as determined by Section 1004.1 for the entire building plus the occupant load of any adjacent building, which interconnects with the subject building or uses the subject building for exiting purposes, shall be used to determine the rating classification.

SECTION 9105 GENERAL REQUIREMENTS

The owner of each building within the scope of the Chapter shall cause an investigation of the existing construction and a structural analysis to be made of the building by a civil or structural engineer or architect licensed by the State of California, and if the building does not meet the minimum standards specified in this Chapter, the owner shall cause it to be structurally altered to conform to such standards or cause the building to be demolished.

The owner of a building within the scope of this Chapter shall comply with the requirements set forth above by submit-

ting to the Department for review within 275 days after the service of the order the following:

1. A structural analysis, subject to approval by the Department within the 275 day time period, which demonstrates that the building meets the minimum requirements of this Chapter, or
2. A structural analysis and plans for the proposed structural alterations of the building necessary to comply with the minimum requirements of this Chapter, or
3. Plans for the demolition of building. After plans are submitted and approved by the Department, the owner shall obtain a building permit, commence and complete the required construction or demolition within the time limits set forth in Table No. 91-B. These time limits shall begin to run from the date the order is served in accordance with Sections 9106.1 and 9106.2 of this Code. Vacating a building shall not be deemed as complying with the requirements of this Chapter.

SECTION 9106 ADMINISTRATION

9106.1 Service of order. When the Department determines that a building is within the scope of this Chapter, the owner shall comply with Section 9105 of this Code. If the owner does not comply, the Department shall issue an order as provided in Section 9106.2 to the owner of each building with the minimum time periods for service of such orders set forth in Table No. 91-C. The minimum time period for the service of such orders shall be measured from the effective date of this Chapter.

9106.2 Contents of order. The order shall be in writing and may be given either by personal delivery thereof to the owner or by deposit in the United States mail in a sealed envelope, postage prepaid, addressed to the owner as shown on the last equalized assessment roll. Service by mail shall be deemed to have been completed at the time of deposit in the post office. The failure of any owner to receive such notice shall not affect in any manner the validity of any of the proceedings taken thereunder. Proof of giving any notice may be made by an affidavit of any employee of the City which shows such service in conformity with this section. Board action, Department administrative action, other correspondence between the City and the building owner or building owner's representative, or other evidence of knowledge of notification shall also be deemed as proof of giving notice.

The order shall specify that the building has been determined by the Department to be within the scope of this Chapter and, therefore, is required to meet the minimum seismic standards of this Chapter. The order shall specify the rating classification of the building and shall be accompanied by a copy of Section 9105, which sets forth the owner's alternatives and time limits for compliance.

9106.3 Appeal from order. The owner of the building may appeal the Department's determination that the building is within the scope of this Chapter to the Board of Building and Safety Commissioners. Such appeal shall be filed with the Board within 60 days of the service date of the order described in Section 9106.2. Such appeal shall be made in writing upon appropriate forms provided therefor by the Department, and

the grounds thereof shall be stated clearly and concisely. Each appeal shall be accompanied by a filing fee as set forth in Table No. 4-A of Division 4 of Article 8 of Chapter IX of the *Los Angeles Municipal Code*.

9106.4 Recordation. At the time that the Department serves the aforementioned order, the Department shall file with the Office of the County Recorder a certificate stating that the subject building is within the scope of this Chapter. The certificate shall also state that the owner thereof has been ordered to structurally analyze the building and to structurally alter or demolish it when the Department determines the building is not in compliance with this Chapter.

If the building is either demolished, found not to be within the scope of this Chapter, or is structurally capable of resisting minimum seismic forces required by this Chapter as a result of structural alterations or an analysis, the Department shall file with the Office of the County Recorder a certificate terminating the status of the subject building as being classified within the scope of this Chapter.

9106.5 Enforcement. If the owner of the subject building fails to comply with any order issued by the Department pursuant to this Chapter within any of the time limits set forth in Section 9105, or within any additional time limits as may have been granted by the Board, the Department may order that the building be vacated and subsequently ordered to be demolished in accordance with the provisions of Section 8903 of this Code. The Superintendent of Building shall have the authority to grant two one-year extensions in cases of extreme hardship.

SECTION 9107 HISTORICAL BUILDINGS

Qualified historical buildings may utilize alternate building standards or deviations from this Chapter to preserve their original or restored architectural elements and features. See Section 8119 of this Code.

SECTION 9108 ANALYSIS AND DESIGN

For the purpose of this section, the term "anchorage system(s)" shall mean all structural elements, which supports the wall in the lateral direction, including wall anchorage and continuity tie (cross-tie) connectors in subdiaphragms and main diaphragms for retrofit and repairs.

9108.1 Wall panel anchorage. Concrete walls shall be anchored to all floors and roofs which provide lateral support for the wall. The anchorage shall provide a positive direct connection between the wall and floor or roof construction capable of resisting a horizontal force equal to 30 percent of the tributary wall weight for all buildings, and 45 percent of the tributary wall weight for essential buildings, or a minimum force of 250 pounds per linear foot of wall, whichever is greater. The required anchorage shall be based on the tributary wall panel assuming simple supports at floors and roof.

Exception: Alternate design may be approved by the Superintendent when justified by well established principles of mechanics.

9108.2 Special requirements for wall anchors and continuity ties. The steel elements of the wall anchorage systems and continuity ties shall be designed by the allowable stress design method using a load factor of 1.7. The $\frac{1}{3}$ stress increase permitted by Section 12.4.3.3 of ASCE 7 shall not be permitted for materials using allowable stress design methods.

The strength design specified in Section 1912, using a load factor of 2.0 in lieu of 1.4 for earthquake loading, shall be used for design of embedments in concrete.

Wall anchors shall be provided to resist out-of-plane forces, independent of existing shear anchors.

Exception: Existing cast-in-place shear anchors may be used as wall anchors if the tie element can be readily attached to the anchors and if the engineer or architect can establish tension values for the existing anchors through the use of approved as-built plans or testing, and through analysis showing that the bolts are capable of resisting the total shear load while being acted upon by the maximum tension force due to earthquake. Criteria for analysis and testing shall be determined by the Superintendent of Building.

Expansion anchors are not allowed without special approval of the Superintendent of Building. Attaching the edge of plywood sheathing to steel ledgers is not considered as complying with the positive anchoring requirements of the Code; and attaching the edge of steel decks to steel ledgers is not considered as providing the positive anchorage of this Code unless testing and/or analysis are performed, which establish shear values for the attachment perpendicular to the edge of the deck.

9108.3 Development of anchor loads into the diaphragm. Development of anchor loads into roof and floor diaphragms shall comply with Section 12.11 of ASCE 7.

Exception: If continuously tied girders are present, then the maximum spacing of the continuity ties is the greater of the girder spacing or 24 feet (7315 mm).

In wood diaphragms, anchorage shall not be accomplished by use of toe nails or nails subject to withdrawal, nor shall wood ledgers, top plates or framing be used in cross-grain bending or cross-grain tension. The continuous ties required by Section 12.11 of ASCE 7 shall be in addition to the diaphragm sheathing.

Lengths of development of anchor loads in wood diaphragms shall be based on existing field nailing of the sheathing unless existing edge nailing is positively identified on the original construction plans or at the site.

At reentrant corners, continuity collectors may be required for existing return walls not designed as shear walls, to develop into the diaphragm a force equal to the lesser of the rocking or shear capacity of the return wall, or the tributary shear, but not exceeding the capacity of the diaphragm. Shear anchors for the return wall shall be commensurate with the collector force. If a truss or beam, other than rafters or purlins, is supported by the return wall or by a column integral with the return wall, an independent secondary column, is required to support the roof or floor members whenever rocking or shear capacity of the return wall is governing.

Seismic deflection shall be determined at the return walls, and fins/canopies at entrances, to ensure deflection compatibility with

the diaphragm, by either seismically isolating the element or attaching the element and integrating its load into the diaphragm.

9108.4 Anchorage at pilasters. Anchorage of pilasters shall be designed for the tributary wall anchoring load per Section 9108.1 of this Code, considering the wall as a two-way slab. The edge of the two-way slab shall be considered "fixed" when there is continuity at pilasters, and considered "pinned" at roof or floor levels. The pilasters or the walls immediately adjacent to the pilasters shall be anchored directly to the roof framing such that the existing vertical anchor bolts at the top of the pilasters are by-passed without causing tension or shear failure at the top of the pilasters.

Exception: If existing vertical anchor bolts at the top of the pilasters are used for the anchorage, then additional exterior confinement shall be provided.

The minimum anchorage at a floor or roof between the pilasters shall be that specified in Section 9108.1 of this Code.

9108.5 Symmetry. Symmetry of connectors in the anchorage system is required. Eccentricity may be allowed when it can be shown that all components of forces are positively resisted and justified by calculations or tests.

9108.6 Minimum roof member size. Wood members used to develop anchorage forces to the diaphragm must be at least 3x for new construction and replacement. All such members must be checked for gravity and earthquake as part of the wall anchorage system. For existing buildings, the member check shall be without the $\frac{1}{3}$ stress increase per Section 9108.2.

9108.7 Combination of anchor types. To repair and retrofit existing buildings, a combination of different anchor types of different behavior or stiffness shall not be permitted. The capacity of the new and existing connectors cannot be added.

9108.8 Prohibited anchors. Usage of connectors that were bent and/or stretched from the intended use shall be prohibited.

9108.9 Crack and damage repairs, evaluation of existing structural alterations. The engineer shall report any observed structural conditions and structural damage that have imminent life safety effects on the buildings and recommend repairs. Evaluations and repairs shall be reviewed and approved by the Department. The engineer shall also evaluate the effects of alterations such as openings cut in existing wall panels without a permit, that may present immediate life safety hazard and correct when necessary.

9108.10 Miscellaneous. Existing mezzanines relying on the tilt-up walls for vertical and/or lateral support shall be anchored to the walls for the tributary mezzanine load. Walls depending on the mezzanine for lateral support shall be anchored per Sections 9108.1, 9108.2 and 9108.3.

Exception: Existing mezzanines that have independent lateral and vertical support need not be anchored to the walls.

Existing interior masonry or concrete walls not designed as shear walls, that extend to the floor above or to the roof diaphragm shall also be anchored for out-of-plane forces per Sections 9108.1, 9108.2 and 9108.3 of this Code. In the in-plane direction, the walls may be isolated or shall be developed into the diaphragm for a lateral force equal to the lesser of the rock-

ing or shear capacity of the wall, or the tributary shear but not exceeding the diaphragm capacity.

SECTION 9109 MATERIALS OF CONSTRUCTION

All materials permitted by this Code, including their appropriate allowable stresses and those existing configurations of materials specified in Chapter 88, may be utilized to meet the requirements of this Chapter.

SECTION 9110 INFORMATION REQUIRED ON PLANS

9110.1 General. In addition to the seismic analysis required elsewhere in this Chapter, the licensed engineer or architect responsible for the seismic analysis of the building shall record the information required by this section on the approved plans.

9110.2 Information required. The plans shall accurately reflect the results of the engineering investigation and design and show all pertinent dimensions and sizes for plan review and construction. The following shall be provided:

1. Floor plans and roof plans shall show existing framing construction, diaphragm construction, proposed wall anchors, cross-ties and collectors. Existing nailing, anchors, ties and collectors shall also be shown on the plans if these are part of the design, and these structural elements need to be verified in the field.
2. At elevations where there are alterations or damage, details shall show roof and floor heights, dimensions of openings, location and extent of existing damage, and proposed repair.
3. Typical wall panel sections with panel thickness, height, location of anchors shall be provided.
4. Details shall include existing and new anchors and the method of development of anchor forces into the diaphragm framing; existing and/or new cross-ties; existing and/or new or improved support of roof and floor girders at pilasters or walls.

9110.3 Engineer's or architect's statement.

The responsible engineer or architect shall state on the approved plans, the following:

1. I am responsible for this building's seismic strengthening design in compliance with the minimum seismic resistance standards of Chapter 91 of the *Los Angeles Building Code*.

and when applicable:

2. The Registered Deputy Inspector, required as a condition of the use of structural design stresses requiring continuous inspection, will be responsible to me as required by Section 1704 of the *Los Angeles Building Code*.

SECTION 9111 REQUIRED BUILDING MAINTENANCE

Every building within the scope of this Chapter which has been analyzed to demonstrate compliance or structurally altered to

comply with the minimum earthquake standards in this Chapter shall be maintained in conformity with the requirements of this Chapter in effect at the time of such analysis or structural alteration.

SECTION 9112 VIOLATIONS – PENALTIES FOR DISREGARDING DEPARTMENT ORDERS

Notwithstanding any other provisions of this Code to the contrary, it shall be unlawful for any person, firm or corporation to maintain, use or occupy any building within the scope of this Chapter which does not meet the minimum earthquake standards specified in this Chapter.

Any person who violates or causes or permits another person to violate this provision is guilty of a misdemeanor. Any person includes an owner, lessor, sublessor, manager, or person in control of a building subject to this Chapter. This term shall not include any person who is merely a tenant or other individual occupying any dwelling unit, efficiency dwelling unit, guest room or suite in a building. The legal owner of a building is that person, firm, corporation, partnership, or other entity whose name or title appears on the record with the Los Angeles County Recorder's Office, as well as all successors or assignees of these persons.

Exception: This section shall not comply if alteration or repair work has commenced in order to bring the building into compliance with requirements of this Chapter, and such work is proceeding in accordance with the time limits set forth in any order of the department or determination of the board.

TABLE NO. 91-A
RATING CLASSIFICATIONS

CLASSIFICATION	OCCUPANT LOAD
Essential	N/A
Group I	300 or more
Group II	100 to 299
Group III	50 to 99
Group IV	Less than 50

TABLE NO. 91-B
TIME LIMITS FOR COMPLIANCE

OBTAIN BUILDING PERMIT WITHIN	COMMENCE CONSTRUCTION WITHIN	COMPLETE CONSTRUCTION WITHIN
365 days	545 days	3 years

TABLE NO. 91-C
SERVICE PRIORITIES

RATING CLASSIFICATION	MINIMUM TIME PERIOD BEFORE SERVICE OF ORDER
Group I & Essential (Highest Priority)	30 days
Group II	90 days
Group III	240 days
Group IV (Lowest Priority)	1 year

CHAPTER 92

VOLUNTARY – EARTHQUAKE HAZARD REDUCTION IN EXISTING WOOD FRAME RESIDENTIAL BUILDINGS WITH WEAK CRIPPLE WALLS AND UNBOLTED SILL PLATES

SECTION 9201 GENERAL

9201.1 Purpose. The provisions of this Chapter are intended to promote public safety and welfare by reducing the risk of earthquake-induced damage to existing wood-framed residential buildings. The voluntary minimum standards contained in this Chapter shall substantially improve the seismic performance of these residential buildings but will not necessarily prevent all earthquake damage. When fully followed, these standards will strengthen the portion of the structure that is most vulnerable to earthquake damage.

Prior to 1960, most wood frame residential buildings were built with raised wood floors supported by short wood stud walls known as cripple walls. These cripple walls are typically braced with weak seismic materials such as portland cement plaster or horizontal wood siding. In addition, wood frame buildings built under building codes in effect prior to July 1938 were not required to be bolted to their foundations. Recent earthquakes have shown that if a building has weak cripple walls or is unbolted, it may fall off its foundation even in moderate earthquakes. Fallen buildings have collapsed, caught fire or needed extensive repairs to restore their occupancy.

This Chapter sets prescriptive standards for strengthening of underfloor enclosures that shall be permitted by the Superintendent of Building without requiring plans or calculations prepared by an architect or an engineer. This Chapter also provides a design standard for the use of alternate materials or an alternate method of construction in lieu of the prescriptive standards. Construction documents for strengthening using alternate materials or methods shall be prepared by an architect or engineer.

9201.2 Scope. The provisions of this Chapter may be applied to light wood frame Group R occupancies with no more than four dwelling units when they contain one or more of the structural weaknesses specified in Section 9203.1.

The provisions of this Chapter do not apply to the buildings or elements of the buildings, listed below. These buildings or elements require analysis by an engineer or architect in accordance with Chapter 16 or other approved standards to determine appropriate strengthening.

1. Buildings with a lateral force resisting system using poles or columns embedded in the ground.
2. Cripple walls that exceed 4 feet (1234 mm) in height.
3. Buildings exceeding three stories in height and any three-story building with cripple wall studs exceeding 14 inches (360 mm) in height.
4. Buildings, or portions of buildings, constructed on a concrete slab on grade or constructed on or into a slope steeper than three horizontal to one vertical.

5. Buildings where the Superintendent of Building determines that conditions exist that are beyond the scope of the requirements of this Chapter.

The standard details approved by the Superintendent of Building and these prescriptive provisions are not intended to be the only acceptable strengthening methods permitted. Alternate details and methods shall be permitted when approved by the Superintendent of Building. Qualified Historical Buildings shall be permitted to use alternate building regulations of Section 8119 of this Code in order to preserve their original or restored architectural elements and features.

9201.3 Alternative design procedures. When analysis by an engineer or architect is required or provided for a building within the scope of this Chapter, that analysis shall be in accordance with all requirements of this Code except as provided in this Chapter. The design shall provide strengthening for any structural weakness listed in Section 9203 that is at least equivalent to that provided by the prescriptive requirements of this Chapter with respect to strength, deflection, and capacity. The Superintendent of Building may require that sufficient evidence be submitted to substantiate that equivalence. The base shear may be determined in accordance with the following:

$$V = 0.1375 W \quad \text{(Formula 92-1)}$$

where:

- V = The total design lateral force or shear at the base.
 W = The total seismic dead load defined in Section 12.7.2 of ASCE 7

SECTION 9202 DEFINITIONS

For the purpose of this Chapter, in addition to the applicable definitions, symbols and notations in this Code, certain additional terms are defined as follows:

ADHESIVE ANCHOR. A fastener placed in hardened concrete or masonry that derives its holding strength from a chemical adhesive compound placed between the wall of the hole and the embedded portion of the anchor.

ANCHOR SIDE PLATE. A metal plate or plates used to connect a sill plate to the side of a concrete or masonry stem wall.

CRIPPLE WALL. A wood-framed stud wall extending from the top of the foundation to the underside of the lowest floor framing.

EXPANSION ANCHOR. A mechanical fastener placed in hardened concrete or assembled masonry, designed to expand in a self-drilled or pre-drilled hole of a specified size and engage the sides of the hole in one or more locations to develop

shear and/or tension resistance to applied loads without grout, adhesive or drypack.

PERIMETER FOUNDATION. A foundation system which is located under the exterior walls of a building.

SNUG-TIGHT. As tight as an individual can torque a nut on a bolt by hand using a wrench with a 10-inch (254 mm) long handle and the point at which the full surface of the plate washer is contacting the wood member and slightly indents the wood surface.

UNREINFORCED MASONRY. Includes adobe, burned clay, concrete or sand-lime brick, hollow clay or concrete block, hollow clay tile, rubble, cut stone and unburned clay masonry walls in which the area of reinforcement is less than 50 percent of the minimum steel ratios required for reinforced masonry.

SECTION 9203 STRUCTURAL WEAKNESSES

9203.1 General. For the purpose of this Chapter, structural weaknesses shall be as specified below.

1. Sill plates or floor framing which are supported directly on the ground without an approved foundation system.
2. A perimeter foundation system which is constructed of wood posts supported on isolated pad footings.
3. Perimeter foundation systems that are not continuous.

Exceptions:

1. Existing single-story exterior walls not exceeding 10 feet (3084 mm) in length forming an extension of floor area beyond the line of an existing continuous perimeter foundation.
2. Porches, storage rooms and similar spaces not containing fuel-burning appliances.
4. A perimeter foundation system which is constructed of unreinforced masonry.
5. Sill plates which are not connected to the foundation or are connected with less than what is required by Section 9204.3.1.
6. Cripple walls that are not braced in accordance with the requirements of Section 9204.4 and Table 92-A.

SECTION 9204 STRENGTHENING REQUIREMENTS

9204.1 General.

9204.1.1 Scope. The structural weaknesses noted in Section 9203 shall be strengthened in accordance with the requirements of this section. Strengthening work shall be allowed to include both new construction and alteration of existing construction. Except as provided here, all strengthening work and materials shall comply with the applicable provisions of this Code. All prescribe nailing in this Chapter shall be common nails. Alternate methods of strengthening shall be allowed provided the systems are designed by an engi-

neer or architect and approved by the Superintendent of Building.

9204.1.2 Condition of existing wood materials. All existing wood materials that will be a part of the strengthening work shall be in a sound condition and free from defects which substantially reduce the capacity of the member. Any wood material found to contain fungus infection shall be removed and replaced with new material. Any wood material found to be infested with insects or to have been infested shall be strengthened or replaced with new materials to provide a net dimension of sound wood at least equal to its undamaged original dimension.

9204.1.3 Floor joists not parallel to foundations. Floor joists framed perpendicular or at an angle to perimeter foundations shall be restrained by either a nominal 2-inch (51 mm) wide continuous rim joist or a nominal 2-inch (51 mm) wide full depth blocking between alternate joists in one- and two-story buildings, and between each joist in three-story buildings. Blocking for multistory buildings must occur at each joist space above a braced cripple wall panel.

Existing connections at the top edge of an existing rim joist or blocking need not be verified. The bottom edge connection to either the foundation sill plate or top plate of a cripple wall shall be verified unless a supplemental connection is provided. The minimum existing bottom edge connection shall consist of 8d toe nails spaced 6 inches (152 mm) apart for a continuous rim joist or three 8d toe nails per block. When this minimum bottom edge connection is not present, or is not verified, a supplemental connection shall be provided.

When an existing continuous rim joist or the minimum existing blocking does not occur, new 1 $\frac{1}{8}$ inch (29 mm) wood structural panel blocking installed tightly between floor joists and nailed with 10d common nails at four inches on center to the sill or wall top plate shall be provided at the inside face of the cripple wall. In lieu of 1 $\frac{1}{8}$ inch (29 mm) wood structural panel blocking, tight fitting, full or near full depth two inches nominal width (51 mm) lumber blocking shall be allowed provided it does not split during installation. New blocking is not required where it will interfere with vents or plumbing which penetrates the wall.

9204.1.4 Floor joists parallel to foundations. Where existing floor joists are parallel to the perimeter foundations, the end joist shall be located over the foundation and, except for required ventilation openings, shall be continuous and in continuous contact with any existing foundation sill plate or top plate of the cripple wall. Existing connections at the top edge connection of the end joist need not be verified; however, the bottom edge connection to either the foundation sill plate or the top plate of a cripple wall shall be verified unless a supplemental connection is provided. The minimum bottom edge connection shall be 8d toe nails spaced 6 inches (152 mm) apart. If this minimum bottom edge connection is not present or is not verified, a supplemental connection shall be provided.

9204.1.5 Supplemental connections. Supplemental connections shall provide sufficient strength to transfer the seismic forces. Framing anchors of minimum 18 gauge steel

and 12 approved fasteners may be considered to meet this requirement when spaced 32 inches (813 mm) on center for one story buildings, 24 inches (610 mm) on center for two story buildings and 16 inches (406 mm) on center for three story buildings.

Exception: A supplemental connection is not required when:

1. The structural wood panel sheathing extends from the sill plate to the rim joist or blocking above.
2. The floor sheathing is nailed directly into the sill or top plate of the cripple wall.

9204.1.6 Single top plate ties. When a single top plate exists in the cripple wall, all end joints in the top plate shall be tied. Ties shall be connected to each end of the discontinuous top plate and shall be equal to one of the following:

1. Three-inch by 6-inch (76 mm by 152 mm) by 0.036-inch-thick (0.9 mm) galvanized steel and nailed with six 8d nails at each end.
2. One and one-half inches (38 mm) by 12-inch (305 mm) by 0.058 inches (1.47 mm) galvanized steel nailed with six 16d nails at each end.
3. Two-inch by 4-inch by 12-inch wood blocking nailed with six 16d nails at each end.

9204.2 Foundations.

9204.2.1 New perimeter foundations. New perimeter foundations shall be provided for structures with the structural weaknesses noted in Items 1 and 2 of Section 9203.1. Soil investigations or geotechnical studies are not required for this work unless the building shows signs of excessive settlement or creep.

9204.2.2 Foundation evaluation by engineer or architect. Partial perimeter foundations or unreinforced masonry foundations shall be evaluated by an engineer or architect for the force levels noted in Formula (92-1). Test reports or other substantiating data to determine existing foundation material strengths shall be submitted for review. When approved by the Superintendent of Building, these foundation systems may be strengthened in accordance with the recommendations included with the evaluation in lieu of being replaced.

Exception: In lieu of testing existing foundations to determine material strengths and when approved by the Superintendent of Building, a new nonperimeter foundation system, designed for the forces noted in Formula (92-1), may be used to resist all exterior wall lateral forces.

9204.2.3 Details for new perimeter foundations. All new perimeter foundations shall be continuous and constructed according to the standards for new buildings.

Exceptions:

1. When approved by the Superintendent of Building, the existing clearance between existing floor joists or girders and existing grade below the floor need not comply with Section 2304.11.2.1. This

exception shall not be permitted when buildings are relocated on new foundations.

2. When approved by the Superintendent of Building, and when designed by an engineer or architect, partial perimeter foundations may be used in lieu of a continuous perimeter foundation.

9204.3 Foundation sill plate anchorage.

9204.3.1 Existing perimeter foundations. When the building has an existing continuous perimeter foundation, all perimeter wall sill plates shall be connected to the foundation in accordance with Table 92-A and this section.

Anchors shall be installed with the plate washer installed between the nut and the sill plate. The nut shall be tightened to a snug-tight condition after curing is complete for adhesive anchors and after expansion wedge engagement for expansion anchors. The installation of nuts on all anchors shall be subject to verification by the Superintendent of Building. Torque testing shall be performed for 25 percent of all adhesive or expansion anchors. Minimum test values shall be 30 foot pounds (41 Nm) for $\frac{1}{2}$ inch (12.7 mm) and 40 foot pounds (55 Nm) for $\frac{5}{8}$ -inch (15.9 mm) diameter anchors.

Anchor side plates shall be permitted when conditions prevent anchor installation vertically through the sill plate. Anchor side plates shall be spaced as required for adhesive or expansion anchors but only one anchor side plate is required on individual pieces of sill plate less than 32 inches (813 mm) in length. Wood structural panel shims shall be used on sill plates for single plate anchor side plates when the foundation stem wall is from $\frac{3}{16}$ inch (4.8 mm) to $\frac{3}{4}$ inch (19 mm) wider than the sill plate. The shim length shall extend a minimum of two inches (50.8 mm) past each end of the anchor side plate. Two plate anchor side plates shall be used when the total thickness of the required shim exceeds $\frac{3}{4}$ inch (19 mm).

All anchor side plates, which use lag or wood screws shall pre-drill the sill plate to prevent splitting as required by Section 2304.9. Lag or wood screws shall be installed in the center of the thickness of the existing sill plate.

Expansion anchors shall not be used in unreinforced masonry or concrete or masonry grout of poor quality. Adhesive anchors shall be required when expansion anchors will not tighten to the required torque or their installation causes surface cracking of the foundation wall.

9204.3.2 Placement of anchors. Anchors shall be placed within 12 inches (305 mm), but not less than nine inches (229 mm), from the ends of sill plates and shall be placed near the center of the stud space closest to the required spacing. New sill plates may be installed in pieces when necessary because of existing conditions. The minimum length of new sill plate pieces shall be 30 inches (762 mm).

Exception: Where physical obstructions such as fireplaces, plumbing or heating ducts interfere with the placement of an anchor, the anchor shall be placed as close to the obstruction as possible, but not less than 9 inches (229 mm) from the end of the plate. Center-to-center spacing of the anchors shall be reduced as

necessary to provide the minimum total number of anchors required based on the full length of the wall. Center-to-center spacing shall not be less than 12 inches (305 mm).

9204.3.3 New perimeter foundations. Sill plates for new perimeter foundations shall be anchored as required by Section 1805.6.

9204.4 Cripple wall bracing.

9204.4.1 General. Exterior cripple walls, not exceeding four feet (1219 mm) in height shall use the prescriptive bracing method listed below. Cripple walls more than four feet (1219 mm) in height require analysis by an engineer or architect in accordance with Chapter 16.

9204.4.1.1 Sheathing requirements. Wood structural panel sheathing shall not be less than $1\frac{5}{32}$ -inch (12 mm) thick. When used, plywood panels shall be constructed of five or more plies. All wood structural panels shall be nailed with 8d common nails spaced four inches (102 mm) on center at all edges and at 12 inches (305 mm) on center at each intermediate support with not less than two nails for each stud. Nails shall be driven so that their head or crown is flush with the surface of the sheathing and shall penetrate the supporting member a minimum of $1\frac{1}{2}$ inch (38 mm). When a nail fractures the surface, it shall be left in place and not counted as part of the required nailing. A new 8d nail shall be located within 2 inches (51 mm) of the discounted nail and hand driven flush with the sheathing surface.

Exception: No. 6 by 1 $\frac{1}{2}$ inch (38 mm) wood screws may be used for sheathing nailing when bracing materials are installed on the interior face of studs and cement plaster or other brittle finishes are on the exterior of the sheathed wall.

All horizontal joints must occur over nominal 2-inch by 4-inch (51 mm by 102 mm) blocking installed with the nominal 4-inch (102 mm) dimension against the face of the plywood. All vertical joints must occur over studs. Vertical joints at adjoining pieces of wood structural panels shall be centered on existing studs such that there is a minimum $\frac{1}{8}$ inch (3.2 mm) between the panels. Nails shall be placed a minimum of $\frac{1}{2}$ inch (12.7 mm) from the edges of the existing stud. When such edge distance cannot be maintained because of the width of the existing stud, a new stud shall be added adjacent to the existing and connected with 16d common nails at eight inches (206 mm) on center. A minimum of three such nails shall be provided.

9204.4.2 Distribution and amount of bracing. See Table 92-A for the distribution and amount of bracing required. Bracing for a building with three or more floor levels above cripple wall studs exceeding 14 inches (356 mm) in height must be designed in accordance with Chapter 16.

The braced panel must be at least two times the height of the cripple stud wall but not less than 48 inches (1219 mm) in width. All panels along a wall shall be nearly equal in length and shall be nearly equally spaced along the length of

the wall. Braced panels at ends of walls shall be located as near the end as possible.

Where physical obstructions such as fireplaces, plumbing or heating ducts interfere with the placement of cripple wall bracing, the bracing shall then be placed as close to the obstruction as possible. The total amount of bracing required shall not be reduced because of obstructions but the required length of bracing need not exceed the length of the wall.

Underfloor ventilation openings shall be maintained in accordance with Section 2306.7. Braced panels may include underfloor ventilation openings when the height of the solid portion of the panel meets or 75 percent of the height of the cripple stud wall. When the minimum amount of bracing prescribed in Table 92-A cannot be installed due to obstructions along any wall, the bracing must be designed by an architect or engineer in accordance with Section 1203.3.

9204.4.3 Stud space ventilation. When bracing materials are installed on the interior face of studs forming an enclosed space between the new bracing and existing exterior finish, each braced stud space must be ventilated. Adequate ventilation and access for future inspection shall be provided by drilling on 2-inch to 3-inch (51 mm to 76 mm) diameter round hole through the sheathing nearly centered between each stud at the top and bottom of the cripple wall. Such holes should be spaced a minimum of 1-inch (25 mm) clear from the sill or top plates. In stud spaces containing sill bolts, the hole shall be located on the center line of the sill bolt but not closer than 1-inch (25 mm) clear from the nailing edge of the sheathing.

When existing blocking occurs within the stud space, additional ventilation holes shall be placed above and below the blocking or the existing block shall be removed and a new nominal 2-inch (51 mm) by 4-inch (102 mm) block installed with the nominal 4-inch (102 mm) dimension against the face of the plywood. For stud heights less than 18 inches (457 mm) only one ventilation hole need be provided.

9204.4.4 Existing underfloor ventilation. Existing underfloor ventilation shall not be reduced without providing equivalent new ventilation as close to the existing as possible. New sheathing may be installed around existing vent openings in braced panels when the length of the panel is increased a distance equal to the length of the vent opening or one stud space minimum.

Exception: For residential buildings with a post and pier foundation system where a new continuous perimeter foundation system is being installed, ventilation shall be provided in accordance with this Code.

SECTION 9205 QUALITY CONTROL

9205.1 Inspection by the department. All work shall be subject to inspection by the Superintendent of Building including, but not limited to:

1. Placement and installation of new adhesive or expansion anchors or anchor side plates installed in existing foundations.

2. Placement of required blocking and framing anchors.
3. Installation and nailing of new cripple wall bracing.

The torque testing of sill plate anchors per Section 9204.3.1 shall be performed by the building inspector.

9205.2 Special inspection. Special inspection is not required for sill plate anchors installed in existing foundations regulated by the provisions of this Chapter. Any work may be subject to special inspection when required by the Superintendent of Building or when so designated by the architect or engineer of record.

9205.3 Structural observation. Structural observation is not required for work done under the prescriptive provisions of this Chapter. When construction documents for strengthening are prepared by an architect or engineer and alternate materials or methods are used, structural observation shall be provided as required in Section 1709.

9205.4 Engineer's or architect's statement. When an alternative design is provided per Section 9201.3, the responsible engineer or architect shall place the following statement on the approved plans:

1. "I am responsible for this building's seismic strengthening design for the underfloor cripple walls and sill bolting in compliance with the minimum seismic resistance standards of Chapter 92 of the *Los Angeles Building Code*."

or when applicable:

2. "The Registered Deputy Inspector, required as a condition of the use of structural design stresses requiring continuous inspection, will be responsible to me as required by Section 1704 of the *Los Angeles Building Code*."

TABLE 92-A
SILL PLATE ANCHORAGE AND CRIPPLE WALL BRACING ^{1,2,3}

NUMBER OF STORIES ABOVE CRIPPLE WALLS	MINIMUM SILL PLATE CONNECTION AND MAXIMUM SPACING	AMOUNT OF WALL BRACING
One Story	Adhesive or expansion anchors shall be 1/2-inch (12.7 mm) minimum diameter spaced at six feet (1829 mm) maximum center to center.	Each end and not less than 50% of the wall length.
Two Story	Adhesive or expansion anchors shall be 1/2-inch (12.7 mm) minimum diameter spaced at four feet (1219 mm) maximum center to center; or 5/8-inch (15.9 mm) spaced at six feet maximum center to center.	Each end and not less than 70% of the wall length.
Three Story	Adhesive or expansion anchors shall be 1/2-inch minimum (12.7 mm) diameter spaced at two feet eight inches (813 mm) maximum center to center; or 5/8-inch minimum (15.9 mm) diameter spaced at four feet (1219 mm) maximum center to center.	100% of the wall length.

1. Plate washers for use with adhesive or expansion anchors shall be 2-inch (51 mm) by 2-inch (51 mm) by 3/16-inch (4.8 mm) for 1/2-inch (12.7 mm) diameter anchors and 2 1/2-inch (64 mm) by 2 1/2-inch (64 mm) by 1/4-inch (6 mm) for 5/8-inch (15.9 mm) diameter anchors.
2. Existing sill plate anchor bolts shall be permitted to provide all or a portion of the sill plate connection requirement if:
 - a. the anchor bolt is cast in concrete and in sound condition.
 - b. the diameter size and maximum spacing meets or exceeds the requirements of Table 92-A.
 - c. a new plate washer conforming to footnote 1 is installed.
 - d. the sill plate is connected to a snug tight condition and torque tested per Section 9204.3.1.
3. Anchor side plates shall be permitted when conditions prevent anchor installation vertically through the sill plate.

CHAPTER 93

VOLUNTARY EARTHQUAKE HAZARD REDUCTION IN EXISTING WOOD FRAME RESIDENTIAL BUILDINGS WITH SOFT, WEAK OR OPEN FRONT WALLS

SECTION 9301 PURPOSE

The purpose of this Chapter is to promote the public welfare and safety by reducing the risk of death or injury that may result from the effects of earthquakes on existing wood-frame multi-unit residential buildings. The ground motion of the Northridge Earthquake caused the loss of human life, personal injury and property damage in these types of buildings. This Chapter creates minimum standards to strengthen the more vulnerable portions of these structures. When fully followed, these minimum standards will substantially improve the performance of these buildings but will not necessarily prevent all earthquake related damage.

SECTION 9302 SCOPE

The provisions of this Chapter shall apply to all existing wood frame buildings or portions thereof, designed using the *Los Angeles Building Code* in effect before January 1, 1995 which are used as hotels, lodging houses, congregate residences or apartment houses where:

1. The ground floor portion of the wood frame structure contains parking or other similar open floor space that causes soft, weak, or open front wall lines as defined in this Chapter and there exists one or more levels above, or;
2. The walls of any story or basement of wood construction are laterally braced with nonconforming structural materials as defined in this Chapter and there exists two or more levels above.

SECTION 9303 DEFINITIONS

Notwithstanding the applicable definitions, symbols and notations in this Code, the following definitions shall apply for the purposes of this Chapter:

APARTMENT HOUSE. Any building or portion thereof which contains three or more dwelling units, and for the purposes of this Chapter, includes residential condominiums.

ASPECT RATIO. The ratio of the height of a wall section to its width.

CONGREGATE RESIDENCE. Any building or portion thereof which contains facilities for living, sleeping and sanitation, as required by this code, and may include facilities for eating and cooking, for occupancy by other than a family. A congregate residence may be a shelter, convent, monastery,

dormitory, fraternity or sorority house but does not include jails, hospitals, nursing homes, hotels or lodging houses.

CRIPPLE WALL. A wood-framed stud wall extending from the top of the foundation wall to the underside of the lowest floor framing.

DWELLING UNIT. Any building or portion thereof which contains living facilities, including provisions for sleeping, eating, cooking and sanitation, as required by this code, for not more than one family, or congregate residence for 10 or fewer persons.

EXPANSION ANCHOR. An approved mechanical fastener placed in hardened concrete, designed to expand in a self-drilled or pre-drilled hole of a specified size and engage the sides of the hole in one or more locations to develop shear and/or tension resistance to applied loads without grout, adhesive or drypack.

GROUND FLOOR. Any floor within the wood frame portion of a building whose elevation is immediately accessible from an adjacent grade by vehicles or pedestrians. The ground floor portion of the structure does not include any level that is completely below adjacent grades.

GUEST ROOM. Any room or rooms used or intended to be used by a guest for sleeping purposes. Every 100 square feet (9.3 m²) of superficial floor area in a congregate residence shall be considered a guest room.

HOTEL. Any building containing six or more guest rooms intended or designed to be used, rented, hired out to be occupied, or which are occupied for sleeping purposes by guests.

LEVEL. A story, basement, or underfloor space of a building with cripple walls exceeding 4 feet (1219 mm) in height.

LODGING HOUSE. Any building or portion thereof containing at least one but not more than five guest rooms where rent is paid in money, goods, labor or otherwise.

MOTEL. Shall mean a hotel as defined in this Chapter.

MULTI-UNIT RESIDENTIAL BUILDINGS. Hotels, lodging houses, congregate residences and apartment houses.

NONCONFORMING STRUCTURAL MATERIALS. Wall bracing materials for seismic loads whose *Los Angeles Municipal Code* allowable shear value was reduced or whose maximum allowable aspect ratio was decreased since the original building construction. These methods or materials include, but are not limited to cement or gypsum plaster, gypsum wall-board, diagonal or let-in bracing, straight or diagonal wood sheathing, particle board and structural wood panels.

OPEN FRONT WALL LINE. An exterior wall line without vertical elements of the lateral force resisting system which requires tributary seismic forces to be resisted by diaphragm

rotation or excessive cantilever beyond parallel lines of shear walls. Diaphragms that cantilever more than 25 percent of the distance between lines of lateral force resisting elements shall be considered excessive. Exterior exit balconies of six feet or less in width shall not be considered excessive cantilevers.

RETROFIT. An improvement of the lateral force resisting system by alteration of existing structural elements or addition of new structural elements.

SOFT WALL LINE. A wall line whose lateral stiffness is less than required by story drift limitations or deformation compatibility requirements of this Chapter. In lieu of analysis, this may be defined as a wall line in a story where the story stiffness is less than 70 percent of the story above for the direction under consideration.

STORY STRENGTH. The total strength of all seismic resisting elements sharing the same story shear in the direction under consideration.

WALL LINE. Any length of a wall along a principal axis of the building used to provide resistance to lateral loads. Parallel wall lines separated by less than four feet shall be considered one wall line for the distribution of loads.

WEAK WALL LINE. A wall line laterally braced with nonconforming structural materials or a wall line in a story where the story strength is less than 80 percent of the story above in the direction under consideration.

SECTION 9304 GENERAL REQUIREMENTS FOR PHASED CONSTRUCTION

When the building contains three or more levels, the work specified in this Chapter shall be permitted to be done in the following phases. Work shall start with Phase 1 unless otherwise approved by the Superintendent of Building. When the building does not contain the conditions shown in any phase, the sequence of retrofit work shall proceed to the next phase in numerical order.

1. **Phase 1 Work.** The first phase of the retrofit work shall include the ground floor portion of the wood structure that contains parking or other similar open floor space.
2. **Phase 2 Work.** The second phase of the retrofit work shall include the walls of any level of wood construction with two or more levels above, which are laterally braced with nonconforming structural materials.
3. **Phase 3 Work.** The third and final phase of the retrofit work shall include the remaining portions of the building up to but not including the top story as specified in Section 9305.2.

SECTION 9305 ANALYSIS AND DESIGN

9305.1 General. Every building within the scope of this Chapter shall be analyzed, designed and constructed in conformance with this Code except as modified herein. No alteration of the existing lateral force-resisting or vertical load-carrying system shall reduce the strength or stiffness of the existing structure.

When any portion of a building within the scope of this Chapter is constructed on or into a slope steeper than 1 unit vertical in 3 units horizontal, the lateral-force-resisting system at and below the base level diaphragm shall also comply with the provisions of Chapter 94.

9305.2 Scope. This Chapter requires the alteration, repair, replacement or addition of structural elements and their connections to meet the strength and stiffness requirements of this Code. The lateral load path analysis shall include the resisting elements and connections from the wood diaphragm above any soft, weak or open front wall lines to the foundation soil interface or reinforced concrete slab or masonry wall supporting elements below. The top story of any building need not be analyzed. The lateral load path analysis for added structural elements shall also include evaluation of the allowable soil bearing and lateral pressures in accordance with Section 1804.

Exception: When an open front, weak or soft wall line exists due to parking at the ground level of a two-level building and the parking area is less than 20 percent of the ground floor level, then only the wall lines in the open, weak or soft directions of the enclosed parking area, need comply with the provisions of this Chapter.

9305.3 Design base shear. The design base shear shall be 75 percent of the value from Section 12.8.1 of ASCE 7.

9305.4 Vertical distribution of forces. The total seismic force shall be distributed over the height of the structure based on Formulas (12.8-11) and (12.8-12) in Section 12.8.3 of ASCE 7. Distribution of force by story weight shall be permitted for two story buildings. The value of R used in the design of any story shall be less than or equal to the value of R used in the given direction for the story above.

9305.5 Weak story limitation. The structure shall not exceed 30 feet in height or two levels if the lower level strength is less than 65 percent of the story above. Existing walls shall be strengthened as required to comply with this provision unless the weak level can resist a total lateral seismic force of Ω_o (per Section 9305.3) times the design force prescribed in Section 9305.4.

The story strength for each level of all other structures shall be a minimum of 80 percent of the story above.

9305.6 Story drift limitation. The calculated story drift for each retrofitted level shall not exceed the allowable deformation compatible with all vertical load resisting elements and 0.005 or $0.04/R$ (per Section 9305.3) times the story height. The calculated story drift shall not be reduced by the effects of horizontal diaphragm stiffness but shall be increased when these effects produce rotation.

The effects of rotation and soil stiffness shall be included in the calculated story drift when lateral loads are resisted by vertical elements whose required depth of embedment is determined by pole formulas such as Equation (18-1), (18-2) and (18-3) in Section 1805.7.2.1. The coefficient of variation of subgrade reaction used in the deflection calculations shall be provided from an approved geotechnical engineering report or other approved methods.

9305.7 P-Delta effect. The requirements of Section 12.8.7 of ASCE 7 shall apply except as modified here. All framing ele-

ments not required by the design to be part of the lateral force resisting system shall be investigated and shown to be adequate for vertical load carrying capacity when displaced Ω_o (per Section 9305.3) times the displacements resulting from the required lateral force. The stress analysis of cantilever columns shall use a buckling factor of 2.1 for the direction normal to the axis of the beam.

9305.8 Ties and continuity. All parts of the structure included in the scope of Section 9305.2 shall be interconnected and the connection shall be capable of resisting the seismic force created by the parts being connected. Any smaller portion of a building shall be tied to the remainder of the building with elements having a strength of 0.1833 times the tributary dead load of the smaller portion. A positive connection for resisting a horizontal force acting parallel to the member shall be provided for each beam, girder or truss included in the lateral load path. This force shall not be less than 0.08 times the combined tributary dead and live loads or as required by the lateral load path transfer, whichever is greater.

9305.9 Collector elements. Collector elements shall be provided which can transfer the seismic forces originating in other portions of the building to the elements within the scope of Section 9305.2 that provide resistance to those forces.

9305.10 Horizontal diaphragms. The analysis of shear demand or capacity of an existing plywood or diagonally sheathed horizontal diaphragm need not be investigated unless the diaphragm is required to transfer lateral forces from the lateral resisting elements above the diaphragm to other lateral resisting elements below the diaphragm due to offset in placement of the elements.

Wood diaphragms in structures that support floors or roofs above shall not be allowed to transmit lateral forces by rotation or cantilever. However, rotational effects shall be accounted for when unsymmetric wall stiffness increases shear demands.

Exception: Diaphragms that cantilever 25 percent or less of the distance between lines of lateral load resisting elements from which the diaphragm cantilevers may transmit their shears by cantilever provided that rotational effects on shear walls parallel and perpendicular to the load are accounted for.

9305.11 Shear walls. Shear walls shall have sufficient strength and stiffness to resist the tributary seismic loads and shall conform to the special requirements of this section.

9305.11.1 Gypsum or plaster products. Gypsum or plaster products shall not be used to provide lateral resistance.

9305.11.2 Wood structural panels.

9305.11.2.1 Drift limit. Wood structural panel shear walls shall meet the story drift limitation of Section 9305.7. Conformance to the story drift limitation shall be determined by approved testing or calculation or analogies drawn from there and not the use of an aspect ratio. Calculated deflection shall be in accordance with Chapter 23, "Calculation of Shear Wall Deflection" and 25 percent shall be added to account for inelastic action and repetitive loading. Contribution to the deflection from the anchor or tie down slippage shall also be included. The slippage contribution shall include the vertical elongation

of the metal, the vertical slippage of the connectors and compression or shrinkage of the wood elements. The vertical slippage shall be multiplied by the aspect ratio and added to the total horizontal deflection. Individual shear panels shall be permitted to exceed the maximum aspect ratio provided the story drift and allowable shear capacities are not exceeded.

9305.11.2.2 Openings. Openings are permitted in shear walls if they do not exceed 50 percent of the height or width of the shear wall. The remaining portion of the shear wall shall be strengthened for the transfer and increase of all shearing forces caused by the opening. The resulting shear wall shall be analyzed as a mosaic of shear resisting elements. Blocking and steel strapping shall be employed at the corners of the opening to transfer forces from discontinuous boundary elements into adjoining panel elements.

The effect of openings on the stiffness of the shear wall shall be demonstrated to comply with the requirements of Section 9305.6. The stiffness shall be calculated using the properties of the different shear elements making up the shear wall or it shall be demonstrated by approved testing. When shear walls cannot be made to conform to the requirements of this section because of existing openings, the openings shall be relocated or reduced in width to meet the strength and stiffness requirements of the lateral loads.

Relocated and altered openings shall comply with the emergency escape requirements in Chapter 10. Relocated and altered openings shall comply with the light and ventilation requirements in Chapter 12 unless otherwise approved by the Superintendent of Building.

9305.11.2.3 Wood species of framing members. Allowable shear values for wood structural panels shall consider the species of the framing members. When the allowable shear values are based on Douglas fir-larch framing members and framing members are constructed of other species of lumber, the allowable shear values shall be determined in accordance with Chapter 23.

9305.11.3 Mechanical penetrations. Mechanical penetrations in shear walls that exceed the provisions of Chapter 23 shall be accounted for in the design or the shear wall shall be analyzed as two separate walls on each side of the penetration.

9305.11.4 Substitution for 3 inch nominal width framing members. Two 2-inch nominal width framing members shall be permitted in lieu of any required 3-inch nominal width framing member when the existing and new framing member are of equal dimensions, are connected as required to transfer the in-plane shear between them and the sheathing fasteners are equally divided between them.

9305.11.5 Hold down connectors.

9305.11.5.1 Expansion anchors in tension. Expansion anchors that provide tension strength by friction resistance shall not be used to connect hold down devices to existing concrete or masonry elements. Expansion

anchors shall be permitted to provide tension strength by bearing.

9305.11.5.2 Required depth of embedment. The required depth of embedment or edge distance for the anchor used in the hold down connector shall be provided in the concrete or masonry below any plain concrete slab unless satisfactory evidence is submitted to the Department that shows that the concrete slab and footings are of monolithic construction.

9305.11.5.3 Required preload of bolted hold down connectors. Bolted hold down connectors shall be preloaded to reduce slippage of the connector. Preloading shall consist of tightening the nut on the tension anchor after the placement but before the tightening of the shear bolts in the panel flange member. The tension anchor shall be tightened until the shear bolts are in firm contact with the edge of the hole nearest the direction of the tension anchor. Hold down connectors with self-jigging bolt standoffs shall be installed in a manner to permit preloading.

SECTION 9306 MATERIALS OF CONSTRUCTION

9306.1 New materials. All materials approved by this Code, including their appropriate allowable stresses and minimum aspect ratios, shall be permitted to meet the requirements of this Chapter.

9306.2 Allowable foundation and lateral pressures. Allowable foundation and lateral pressures shall be permitted to use the values from Table 1804.2. The coefficient of variation of subgrade reaction shall be established by an approved geotechnical engineering report or other approved methods when used in the deflection calculations of embedded vertical elements as required in Section 9305.6.

9306.3 Existing Materials. All existing materials shall be in sound condition and constructed in conformance to this Code before they can be used to resist the lateral loads prescribed in this Chapter. The verification of existing material conditions and their conformance to these requirements, shall be made by physical observation reports, material testing or record drawings as determined by the structural designer and approved by the Department.

9306.3.1 Horizontal wood diaphragms. Existing horizontal wood diaphragms that require analysis under Section 9305.10 shall be permitted to use Table No. 88-H of this code for their allowable values.

9306.3.2 Wood structural panel shear walls.

9306.3.2.1 Allowable nail slip values. When the required drift calculations of Section 9305.11.2.1 rely on the lower slip values for common nails or surfaced dry lumber, their use in construction shall be verified by exposure. The use of box nails and unseasoned lumber may be assumed without exposure. The verification of surfaced dry lumber shall be by identification conforming to Chapter 23.

9306.3.2.2 Reduction for clipped nail heads. When exposed nails do not meet the nominal head sizes required for hand driven nails in Chapter 23, the allowable shear capacity for wood structural panel shear walls shall be proportionately reduced. The reduction shall be a percentage of the reduction in the nail head area below the required nail head area including tolerances.

9306.3.2.3 Plywood panel construction. When verification of the existing plywood materials is by use of record drawings alone, the panel construction for plywood shall be assumed to be of three plies.

9306.3.2.4 Framing members of other species. When verification of the existing wood material is by use of record drawings, the allowable shear capacity shall be multiplied by the reduction factor of 0.82 for buildings built on or after 1960. Buildings built before this period shall use the reduction factor 0.65. When verification of the existing wood material is by identification in conformance to Chapter 23, the allowable shear capacity shall be determined in accordance with Section 9305.11.2.3.

9306.3.3 Lumber. When the existing dimensioned lumber is not identified in conformance to Chapter 23, the allowable stresses shall be permitted for the structural elements specified in the chart below.

Posts and Beams	Douglas Fir-larch No. 1
Joists and Rafters	Douglas Fir-larch No. 2
Studs, Blocking	Hem Fir Stud.

9306.3.4 Structural steel. All existing structural steel shall be permitted to use the allowable stresses for Grade A36. Existing pipe or tube columns shall be assumed to be of minimum wall thickness unless verified by testing or exposure.

9306.3.5 Strength of concrete. All existing concrete footings shall be permitted to use the allowable stresses for plain concrete with a compressive strength of 2,000 psi (13 790 kPa). The strength of existing concrete with a record compressive strength greater than 2,000 psi (13 790 kPa) shall be verified by testing, record drawings or Department records.

9306.3.6 Existing sill plate anchorage. Existing cast-in-place anchor bolts shall be permitted to use the allowable service loads for bolts with proper embedment when used for shear resistance to lateral loads.

SECTION 9307 REQUIRED INFORMATION ON PLANS

9307.1 General. The plans shall show all necessary dimensions and materials for plan review and construction and shall accurately reflect the results of the engineering investigation and design.

9307.2 Existing construction. The plans shall show the existing diaphragm and shear wall sheathing and framing materials, fastener type and spacing, diaphragm and shear wall connections, continuity ties, and collector elements. The plans shall also show the portion of the existing materials that needs verification during construction.

9307.3 New construction.

9307.3.1 Foundation plan elements. The foundation plan shall include the size, type, location and spacing of all anchor bolts with the required depth of embedment, edge and end distance; the location and size of all columns for braced or moment frames; referenced details for the connection of braced or moment frames to their footing and referenced sections for any grade beams and footings.

9307.3.2 Framing plan elements. The framing plan shall include the width, location and material of shear walls; the width, location and material of frames; references on details for the column to beam connectors, beam to wall connections, and shear transfers at floor and roof diaphragms; and the required nailing and length for wall top plate splices.

9307.3.3 Shear wall schedule, notes and details. Shear walls shall have a referenced schedule on the plans that includes the correct shear wall capacity in pounds per foot; the required fastener type, length, gauge and head size; and a complete specification for the sheathing material and its thickness. The schedule shall also show the required location of 3-inch (76 mm) nominal or two 2-inch (51 mm) nominal edge members; the spacing of shear transfer elements such as framing anchors or added sill plate nails; the required hold-down with its bolt, screw or nail sizes; and the dimensions, lumber grade and species of the attached framing member.

Notes shall show required edge distance for fasteners on structural wood panels and framing members; required flush nailing at the plywood surface; limits of mechanical penetrations; and the sill plate material assumed in the design. The limits of mechanical penetrations shall also be detailed showing the maximum notching and drilled hole sizes.

9307.3.4 General notes. General notes shall show the requirements for material testing, special inspection, structural observation and the proper installation of newly added materials.

9307.3.5 Engineer's or architect's statement. The responsible engineer or architect shall provide the following statements on the approved plans:

1. "I am responsible for designing this building's seismic strengthening in compliance with the minimum regulations of Chapter 93 of the *Los Angeles Building Code*."

and when applicable:

2. "The Registered Deputy Inspector, required as a condition of the use of structural design stresses requiring continuous inspection, will be responsible to me as required by Section 1704 of the *Los Angeles Building Code*."

CHAPTER 94

VOLUNTARY-EARTHQUAKE HAZARD REDUCTION IN EXISTING HILLSIDE BUILDINGS

SECTION 9401 PURPOSE

The purpose of this Chapter is to promote public safety and welfare by reducing the risk of death or injury that may result from the effects of earthquakes on existing hillside buildings constructed on or into slopes in excess of one unit vertical in three units horizontal (33.3-percent slope). Such buildings have been recognized as life hazardous as a result of partial or complete collapse that occurred during the Northridge Earthquake.

The provisions of this Chapter are minimum standards for structural systems established primarily to reduce the risk of loss of life or injury resulting from earthquakes and will not necessarily prevent loss of life or injury or prevent earthquake damage to an existing building which complies with these standards.

This Chapter provides voluntary retrofit standards under which buildings shall be permitted to be structurally analyzed and retrofitted. When fully followed, these standards will strengthen the portion of the structure that is most vulnerable to earthquake damage.

SECTION 9402 SCOPE

The provisions of this Chapter may be applied to all existing hillside buildings designed under building codes effective prior to June 19, 1995. If only a portion of the building is supported on or into the slope, these regulations may be applied to the entire building.

Seismic retrofit work as described in this Chapter may be applied to the portion of the structure defined as the base-level-diaphragm and below. Nonhabitable accessory buildings, decks not supporting the main building, and existing conditions above the base-level-diaphragm are exempt from these regulations.

Seismic strengthening constructed prior to the effective date of the ordinance may be evaluated in accordance with the provisions of this Chapter.

SECTION 9403 DEFINITIONS

For the purpose of this Chapter, in addition to the applicable definitions, symbols and notations in this Code, certain additional terms are defined as follows:

BASE (BASE LEVEL). The level at which the earthquake motions are considered to be imparted to the structure or the level at which the structure as a dynamic vibrator is supported.

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

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

DIAPHRAGM BACKSPAN. The horizontal cantilevered distance parallel to the direction of the lateral force, between the outermost vertical lateral force resisting elements and the edge of the diaphragm.

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

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

FOUNDATION EXTENDING IN THE DOWNHILL-DIRECTION. A descending foundation and approximately perpendicular to the uphill foundation.

FOUNDATION, UPHILL. A foundation parallel and closest to the uphill diaphragm edge, as defined herein.

HILLSIDE BUILDING. Any wood frame building or portion thereof constructed on or into a slope steeper than one unit vertical in three units horizontal (33.3-percent slope).

PRIMARY ANCHORS. Diaphragm anchors designed for and providing direct connection as described in Sections 9406.2 and 9406.3 between the diaphragm and the uphill foundation.

RETROFIT. An improvement of the lateral force resisting system of the structure by an alteration of existing or addition of new structural elements.

SECONDARY ANCHORS. Diaphragm anchors designed for and providing a redundant diaphragm to foundation connection, as described in Section 9406.4.

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

SECTION 9404 GENERAL REQUIREMENTS

Except as modified herein, the analysis and design of the work within the scope of this Chapter shall be in accordance with Chapter 16.

SECTION 9405 PRE-DESIGN INVESTIGATION

The engineer or architect shall prepare a predesign field investigation report in accordance with Department guidelines and

shall file the report when the plans are filed for permit. The plans shall include a description of the existing lateral force resisting system at and below the base.

SECTION 9406 ANALYSIS AND DESIGN

9406.1 General. Every hillside building within the scope of this Chapter shall be analyzed, designed, and constructed in accordance with the following provisions.

9406.1.1 Base for seismic design defined. The base for seismic design is defined as follows:

1. **Downhill-direction.** For seismic forces acting in the downhill-direction, the base of the building shall be the floor at or closest to the top of the highest level of the foundation.
2. **Normal to the downhill-direction.** For seismic forces acting normal to the downhill-direction, the distribution of seismic forces over the height of the building using Section 12.8.3 of ASCE 7 shall be determined using the height measured from the top of the lowest level of the building foundation. Retrofitting, however, shall only be required at the base-level-diaphragm and below.

9406.1.2 Design base shear. The design base shear shall be that required at the time of the original building permit 75 percent less than currently required by Section 12.8.1 of ASCE 7, but not less than the following:

$$V = 0.133 W$$

where:

V = The total design lateral force or shear at the base

W = The total seismic dead load defined in Section 12.7.2 of ASCE 7

9406.2 Base shear resistance in the downhill-direction.

9406.2.1 General. The base shear in the downhill-direction, including forces from the base-level-diaphragm, shall be resisted through primary anchors from diaphragm struts or collectors provided in the base level framing to the foundation.

9406.2.2 Location of primary anchors. A primary anchor and diaphragm strut or collector shall be provided in line with each foundation extending in the downhill-direction. Primary anchors and diaphragm struts or collectors shall also be provided where interior vertical lateral force resisting elements occur above and in contact with the base-level-diaphragm.

The base-level-diaphragm shall be provided with primary anchors designed for the tributary forces spaced at a maximum 30 feet (9145 mm) on center. Where the floor below the base extends to the uphill foundation, and the foundation at the base is not adequate to resist the forces from the primary anchors, the base shear may be transferred to that lower level and the primary anchorage made at that lower level. The connection shall be made directly to the

foundation. The existing foundation shall be evaluated as specified in Section 9406.11.

9406.3 Seismic forces on floor levels below the base in the downhill-direction.

9406.3.1 General. All floor diaphragm connections between floor diaphragms below the base level diaphragm shall be designed in accordance with the provisions of this section.

9406.3.2 Design. Each floor level below the base defined in Section 9406.1.1 shall be designed for all tributary loads at that level using a minimum seismic force factor not less than the base shear coefficient.

9406.3.3 Direct connections. Each floor level shall be directly connected to the foundation through a system of primary anchors at that level as required for the base as specified in Section 9406.1.1.

9406.4 Secondary anchors from diaphragm to foundation for seismic forces at and below the base in the downhill-direction.

9406.4.1 General. In addition to the anchors required by Sections 9406.2 and 9406.3, the floor diaphragm for levels at and below the base shall be anchored to the uphill foundation at the level of the diaphragm, as specified in this section.

Exception: Secondary anchors are not required where:

1. The concrete or masonry foundations in the downhill-direction are spaced at not more than 30 feet (9145 mm) on center and extend up to and are directly connected to the base-level-diaphragm for at least 70 percent of the diaphragm depth;
2. The diaphragm is separated from the mudsill at the uphill foundation by a cripple wall which has anchor bolts and is braced in the plane of the wall and constructed with studs that are no less than 12 inches (305 mm) in height and primary anchors are spaced a maximum of 20 feet (6096 mm) on center; or
3. The deflection of the plywood floor diaphragm between adjacent primary anchors is calculated to be less than $\frac{1}{4}$ of an inch (6.4 mm).

9406.4.2 Diaphragm anchors. Secondary anchors required by this section shall be provided at each level at and below the base of the building. Diaphragm anchors shall be fully developed into the diaphragm and be connected to the foundation at the uphill diaphragm edge to develop the forces required by this section.

9406.4.3 Anchor spacing. Secondary anchors required by this section shall be uniformly distributed along the uphill diaphragm edge and shall be spaced a maximum of four feet (1219 mm) on center.

9406.4.4 Anchor capacity for floor diaphragms at the base and below. Secondary anchors at the base and below shall be designed for a uniformly distributed minimum force equal to the total primary anchorage design force at that level divided by the length of the uphill diaphragm edge, but shall not be less than 300 pounds per lineal foot

(4.37 kN/m). The existing foundation need not be checked to resist the additional forces induced by the system of secondary anchors; however, the existing foundation shall be evaluated as specified in Section 9406.11.

9406.5 Design of anchorage.

9406.5.1 General. Primary and secondary anchors, and diaphragm struts and collectors, shall be designed in accordance with the provisions of this section.

9406.5.2 Anchorage. The structure shall be anchored to the foundation as specified in Sections 9406.2, 9406.3 and 9406.4.

9406.5.3 Fasteners. All bolted fasteners used to develop connections to wood members shall be provided with square plate washers at all bolt heads and nuts. Washers shall be minimum $\frac{3}{16}$ inch (4.8 mm) thick and two inch (51 mm) square for $\frac{1}{2}$ -inch (12.7 mm) diameter bolts, and $\frac{1}{4}$ inch (6.4 mm) thick and 2- $\frac{1}{2}$ inch (64 mm) square for $\frac{3}{8}$ inch (15.9 mm) diameter or larger bolts. Nuts shall be wrench tightened prior to covering.

9406.5.4 Fastening. The diaphragm to foundation anchorage shall not be accomplished by the use of toe nailing, nails subject to withdrawal, or wood in cross grain bending or cross grain tension.

9406.5.5 Size of wood members. Wood diaphragm struts, collectors, and other wood members connected to primary anchors shall not be less than 3-inch (76 mm) nominal width members or doubled 2-inch (51 mm) nominal width members. Fastening doubled 2-inch (51 mm) nominal width members shall be designed in accordance to the provisions of Chapter 23. Secondary diaphragm anchors as specified in Section 9406.4 may be developed through existing 2-inch (51 mm) nominal width framing members. The effects of eccentricity on wood members shall be evaluated as required per Section 9406.5.9.

9406.5.6 Design. Primary and secondary anchorage, including diaphragm struts, splices, and collectors shall be designed for 125 percent of the tributary force.

9406.5.7 Allowable stress increase. The one-third allowable stress increase shall not be permitted for materials using allowable stress design methods.

9406.5.8 Seismic load factor. Steel elements of the diaphragm anchorage systems and continuity ties shall be designed by the allowable stress design method using a load factor of 1.7. The strength design specified in Section 1912.1 using a load factor of 2.0 in lieu of 1.4 for earthquake loading shall be used for the design of embedment in concrete.

9406.5.9 Symmetry. All seismic lateral force foundation anchorage and diaphragm strut connections shall be symmetrical. Eccentric connections may be permitted when demonstrated by calculation or tests that all components of force have been provided for in the structural analysis or tests.

9406.5.10 Load path.

9406.5.10.1 Primary anchors. The load path for primary anchors shall be fully developed into the dia-

phragm and into the foundation. The foundation must be shown to be adequate to resist the concentrated loads from the primary anchors and must be shown to comply with the following:

1. Soil maximum bearing capacity for conventional footings shall be limited to 3000 psf (143.7 kPa) unless an approved geotechnical report permits higher bearing values.
2. Conventional continuous footings shall be analyzed for uplift forces induced by primary anchors.
3. Soil capacities need not be investigated for grade beam and caisson or pile foundations.
4. Shear stress in grade beams and tie beams shall be investigated for vertical component of primary anchor forces. Unless otherwise known, a maximum 2000 psi (13.8 MPa) concrete strength shall be assumed.

9406.5.10.2 Secondary anchors. The load path for secondary anchors need not be developed beyond the connection to the foundation.

9406.5.10.3 Above base uplift forces. The load path for uplift forces generated from above the base shall be analyzed and fully developed into the below base structural system.

9406.6 Base shear resistance normal to the downhill-direction.

9406.6.1 General. Lateral force resisting elements acting in the normal to the downhill-direction shall be designed in accordance with the requirements of following Sections.

9406.6.2 Base shear. The design base shear shall be 75% less than currently required by Section 12.8.1 of ASCE 7, but not less than the following:

$$V = 0.133 W$$

where:

V = The total design lateral force or shear at the base

W = The total seismic dead load defined in Section 12.7.2 of ASCE 7

9406.6.3 Vertical distribution of seismic forces. The distribution of seismic forces acting normal to the downhill-direction shall be determined using Section 12.8.3 of ASCE 7. The height of the structure in Equation (12.8-12) of Section 12.8.3 of ASCE 7 shall be taken from the base, which shall be measured from the top of the lowest level of the building foundation.

9406.6.4 Drift limitations. The interstory drift below the base-level-diaphragm shall not exceed 0.005 times the story height. The total drift from the base-level-diaphragm to the top of the foundation shall not exceed $\frac{3}{4}$ inch (19 mm). Where the story height or the height from the base-level-diaphragm to the top of the foundation varies because of a stepped footing or story offset, the height shall be measured from the average height of the top of the foundation. The calculated story drift shall not be reduced by the effect of horizontal diaphragm stiffness.

9406.7 Lateral force resisting systems at the base and below in the downhill-direction.

9406.7.1 General. As an alternative to providing primary anchor connections from diaphragms to foundation in the downhill-direction, the following systems may be used, provided their location and spacing is maintained as specified in Section 9406.2.2 for primary anchors.

9406.7.2 Wood shear walls. Wood structural panels or existing wood diagonal sheathed shear walls may be used provided:

1. The minimum length of shear wall shall be eight feet (2438 mm).
2. The minimum level length between steps in the shear wall sill shall be eight feet (2438 mm) and the maximum step height between adjacent sills shall be 2 feet 8 inches (813 mm).
3. Sill plates do not slope and they bear on a level surface.
4. The design lateral forces shall be distributed to lateral force resisting elements of varying heights in accordance with the stiffness of each individual element. The stiffness of a stepped wood structural panel shear wall may be determined by dividing the wall into adjacent rectangular elements, subject to the same top of wall deflection. Deflections of shear walls may be estimated by Sections 2305.3.2 and 2305.3.8.2.9 or other equivalent methods. Sheathing and fastening requirements for the stiffest section shall be used for the entire wall. Each section of wall shall be anchored for shear and uplift at each step as an independent shear wall.
5. Actual configuration of steps shall be determined in the field at the time of predesign investigation.
6. The drift limitations of Section 9406.6.4 are not exceeded.

9406.7.3 Braced frames. Structural steel braced frames with concentric connections may be used as part of the lateral force resisting system. All members in braced frames shall be designed to resist tension and compression forces. Seismic forces shall not induce flexural stresses in any member of the frame, in diaphragm struts, or in the collectors. Where existing anchor bolts are used for anchorage, existing confinement shall be verified and additional confinement provided where necessary. When the braced frame is not rectangular, distribution of forces to members shall account for the variations in slope.

9406.7.4 Rod-braced frames and diaphragms. Existing tension only braces may be used provided they resist five times the design force, and the connections have the capacity to resist the yield strength of the braces. Tension braces and their connections shall be exposed for evaluation. Existing anchor bolts shall be tested in shear and tension to five times the design force.

9406.7.5 Cement plaster and lath and gypsum wall-board. The sheathing materials listed in Chapter 25 are not

permitted to resist seismic lateral forces below the base-level-diaphragm.

9406.8 Lateral force resisting systems at the base and below and normal to the downhill-direction. Lateral force resisting systems acting normal to the downhill-direction may include steel moment frames and those systems permitted under Section 9406.7, provided the drift limitations of Section 9406.6 are not exceeded.

9406.9 Diaphragms.

9406.9.1 General. Diaphragms at the base and below may be of straight 1-inch by 6-inch (25 mm by 152 mm) or 2-inch by 6-inch (51 mm by 152 mm) sheathing, provided vertical lateral force resisting elements in the downhill-direction or primary anchors are spaced no more than 20 feet (6096 mm) apart and the diaphragm shear forces do not exceed 100 plf (1.46 kN/m).

9406.9.2 Existing diaphragms. Existing plywood and diagonally sheathed diaphragms need not be investigated.

9406.9.3 Existing cantilevered diaphragms. Existing cantilevered wood diaphragms are acceptable provided they do not cantilever more than one-half the diaphragm backspan (anchor span).

9406.9.4 Wood diaphragm rotation. Diaphragm rotation is not permitted in resisting lateral forces.

9406.10 Steel beam to column connections.

9406.10.1 General. All steel beam to column connections shall be braced at supports and locations of concentrated loads. The beam to column connection shall be designed to prevent rotation of the beam.

9406.10.2 Steel beams. Steel beams shall have stiffener plates installed on each side of the beam web at the column supports and points of concentrated load. The stiffener plates shall be welded to each beam flange and beam web. This requirement applies at the base and below and only to those connections which are part of the lateral load resisting system or lateral load path.

9406.10.3 Column bracing. All single length multi-level height columns shall be braced in each orthogonal direction at each diaphragm level.

9406.11 Foundations.

9406.11.1 Existing foundations. Foundation soundness shall be verified by the engineer or architect. Foundation types such as unreinforced masonry, stone and ungrouted concrete block and unreinforced concrete shall be retrofitted to resist lateral loads applied through the diaphragm anchors.

9406.11.2 Damaged foundations. Damaged foundations shall be evaluated by the engineer or architect. Cracks in excess of $\frac{1}{8}$ inch (3.2 mm) or differential displacement in excess of $\frac{1}{4}$ inch (6.4 mm) shall be further investigated and repaired where necessary. Specifications for the restoration of the earth to wood separation shall be included and be made a part of the plans.

9406.11.3 Stud wall attachment. Shot pinned anchors shall not be used to resist lateral forces. Lateral force resist-

ing systems which utilize shot pins shall be retrofitted with approved drilled anchors.

9406.11.4 Existing framing connections. Deteriorated framing and connections shall be repaired or replaced.

9406.11.5 Metal connectors. Metal connectors shall not be in contact with, or below earth unless the connectors are hot dipped galvanized and further protected from earth with four inches of concrete.

9406.12 Existing materials.

9406.12.1 Allowable stresses. Existing materials may be used as part of the lateral load-resisting system provided that the stresses in these materials do not exceed the values shown in Table 94-A.

SECTION 9407 HISTORICAL BUILDINGS

9407.1 Qualified historical buildings. Shall be allowed to use alternate building regulations or deviations from this Chapter in order to preserve their original or restored architectural elements and features. See Section 8119 for these standards.

SECTION 9408 QUALITY CONTROL

9408.1 General. All hillside building construction shall comply with the requirements specified in this section.

9408.2 Department called inspections. All anchors installed in accordance with Sections 9406.2, 9406.3 and 9406.4 shall be inspected by the Department prior to installation of any construction which might restrict access to the anchors or prevent a visual inspection from the floor level above the anchors.

9408.3 Structural observation by the engineer or architect of record. The owner shall employ the engineer or architect of record, or other engineer or architect designated by the engineer or architect of record, to perform structural observations as required by Section 1709.

9408.4 Anchor installation. No installed anchor shall be covered prior to all required Department framing inspections and structural observation by the architect or engineer.

SECTION 9409 INFORMATION REQUIRED ON PLANS

9409.1 General. The licensed engineer or architect responsible for the seismic analysis of the building shall record the information required by this section on the approved plans. The plans shall accurately reflect the results of the engineering investigation and design and show all pertinent dimensions and sizes for plan review and construction. The plans shall show existing framing construction, diaphragm construction, proposed primary, alternate and secondary anchors, proposed shear walls and collectors for the base and below. All structural elements that are part of the design including existing nailing, anchors, ties, and collectors, shall be shown on the plans. The plans shall indicate existing construction that has not been exposed and needs verification at the time of construction.

9409.2 Building elevations. Elevations showing the existing conditions shall be drawn to scale. Elevations shall show roof and floor heights, dimensions of openings, location and extent of existing damage, and proposed repair and strengthening.

9409.3 Shear walls. Plans shall include all information pertinent to shear walls, including typical wall panel thickness, length, and the location and size of all anchors.

9409.4 Details. Details shall include the existing lateral bracing systems to be utilized including work required for the lateral and vertical load systems and new anchors and the method of development of anchor forces into the diaphragm framing.

9409.5 Engineer's or architect's statement. The responsible engineer or architect shall state on the approved plans the following:

1. "I am responsible for designing the strengthening for this building's base level and below in compliance with the minimum regulations of Chapter 94 of the *Los Angeles Building Code*; and either I or someone under my responsible charge has performed the pre-design investigation."

or when applicable:

2. "The Registered Deputy Inspector, required as a condition of the use of structural design stresses requiring continuous inspection, will be responsible to me as required by Section 1704 of the *Los Angeles Building Code*."

TABLE 94-A
VALUES FOR EXISTING MATERIALS

EXISTING MATERIALS OR CONFIGURATION OF MATERIALS ¹	ALLOWABLE VALUES
1. Plain or reinforced concrete footings	$f'_c = 2000$ psi (13.8 MPa) unless otherwise shown by tests.
2. Douglas fir wood	Allowable stress same as No. 2 D.F.
3. Reinforcing steel	$f_s = 0.4 F_y$, maximum 16 ksi (110 MPa).
4. Structural steel	$f_b = 0.6 F_y$, maximum 22 ksi (152 MPa).
5. Anchor bolts	Current code values.
6. Wood structural panels/diagonal sheathing	Current code values.

1. Material must be sound and in good condition.

CHAPTER 95

VOLUNTARY-EARTHQUAKE HAZARD REDUCTION IN EXISTING REINFORCED CONCRETE BUILDINGS AND CONCRETE FRAME BUILDINGS WITH MASONRY FILL

SECTION 9501 PURPOSE

The purpose of this Chapter is to promote public safety and welfare by reducing the risk of death or injury that may result from the effects of earthquakes on concrete buildings and concrete frame buildings with masonry infills. The Northridge Earthquake caused widespread damage to these buildings, including some collapses. The recent Great Hanshin Earthquake in Kobe, Japan also caused collapse or partial collapse to several hundred of these buildings. These nonductile concrete buildings are frequently used in Los Angeles for department stores, office buildings, hotels, parking structures and apartment houses. The performance of these structures in an earthquake is essential to the life-safety of their occupants and to significantly reduce the amount of building damage. This Chapter provides voluntary retrofit standards that, when fully followed, will substantially improve the seismic performance of these buildings but will not necessarily prevent all earthquake damage.

SECTION 9502 SCOPE

The provisions of this Chapter may be applied to all buildings designed under building codes in effect prior to January 13, 1976, or built with building permits issued prior to January 13, 1977, having concrete floors and/or concrete roofs supported by reinforced concrete walls or concrete frames and columns, and/or concrete frames with masonry infills.

SECTION 9503 DEFINITIONS

For purposes of this Chapter, the applicable definitions and notations in Sections 1602, 1613.2 and 1902 and the following shall apply:

MASONRY INFILL. The unreinforced or reinforced masonry wall construction within a reinforced concrete frame.

SECTION 9504 RESERVED

SECTION 9505 GENERAL REQUIREMENTS

When the owner of each building within the scope of this Chapter causes an investigation of the existing construction, a structural analysis shall be made of the building by a structural engineer licensed by the State of California.

Exception: Regular concrete shear wall buildings, of four stories in height and under, may be shown to be in conformance with this Chapter by filing a report signed by a licensed architect, civil or structural engineer containing the information specified in Section 9512.

SECTION 9508 CRITERIA SELECTION

9508.1 Basis for analysis. The building shall be analyzed to determine the displacements caused by inertial force effects determined in accordance with the dynamic lateral analysis procedure of Section 9509. The building structural system shall provide a complete load path for resisting the effects of seismic loading. The capacity of all parts of the structural system shall exceed the demand calculated by the dynamic analysis using the effective stiffnesses determined by a nonlinear analysis of the elements.

Exception: Buildings conforming to the requirements of Sections 9508.4.2 and 9508.4.3 may be analyzed using the procedure specified in Sections 9510 and 9511, respectively.

9508.2 Site geology and soil characteristics. In the absence of a soils investigation, the soil site class shall be taken as Type D.

9508.3 Configuration requirements.

9508.3.1 General. Each structure shall be designated as structurally regular or irregular.

9508.3.2 Regular structures. Regular structures have no significant physical discontinuities in plan or vertical configuration or in their lateral force-resisting systems such as the irregular features described below.

9508.3.3 Irregular structures.

9508.3.3.1 Irregular structures have significant physical discontinuities in configuration or in their lateral force-resisting systems. Irregular features include, but are not limited to, those described in Tables 12.3-1 and 12.3-2 of ASCE 7.

9508.3.3.2 Structures having one or more of the features listed in Table 12.3-2 of ASCE 7 shall be designated as having a vertical irregularity.

Exception: Where none of the story drift ratios under equivalent lateral forces is greater than 1.3 times the story drift ratio of the story above, the structure may be deemed to not have the structural irregularities of Type 1 or 2 listed in Table 12.3-2 of ASCE 7. The story drift for this determination shall be calculated including torsional effects.

9508.3.3.3 Structures having one or more of the features listed in Table 12.3-1 of ASCE 7 shall be designated as having a plan irregularity.

9508.3.3.4 Irregular structures conforming to the requirements of Sections 9508.4 and 9511 may be considered regular if the plan and vertical irregularities are removed by the addition of lateral load resisting systems.

9508.4 Selection of lateral analysis procedure.

9508.4.1 General. Any structure may be analyzed using the dynamic lateral analysis procedures of Section 9509. The equivalent lateral force procedure or the simplified analysis may be used for structures conforming to the requirements on the use of those analyses.

9508.4.2 Equivalent lateral force. The equivalent lateral force procedure of Section 9510 may be used for regular structures or irregular structures having plan irregularity only of not more than four stories.

9508.4.3 Simplified analysis. Regular structures of not more than four stories conforming to the requirements of Section 9511 may be analyzed for a prescribed strength of their systems and elements.

9508.5 Alternative procedures.

9508.5.1 General. Alternative lateral analysis procedures using rational analyses based on well-established principles of mechanics may be used in lieu of those prescribed in this Chapter when approved by the Superintendent of Building.

9508.5.2 Seismic isolation. Seismic isolation (using Chapter 17 of ASCE 7, Seismic Design Requirements For Seismically Isolated Structures), energy dissipation and damping systems may be used to reduce story drift when approved by the Superintendent of Building. The isolated structure shall comply with the drift requirements of Section 9509.

SECTION 9509

DYNAMIC LATERAL ANALYSIS PROCEDURE

9509.1 General. Structures shall be analyzed for seismic forces acting concurrently on the orthogonal axes of the structure. The effects of the loading on two orthogonal axes shall be combined by the square root of the sum of the squares (SRSS) methods.

9509.2 Ground motion. The seismic ground motion values shall be determined in accordance with ASCE 7 and may be one of the following:

1. The elastic design response spectrum shall be 75 percent of the response spectrum described in Section 11.4.5 of ASCE 7.
2. A site-specific response spectrum shall be 75 percent of the site-specific response spectrum described in Section 11.4.7 of ASCE 7.

9509.3 Mathematical model. The three-dimensional mathematical model of the physical structure shall represent the spatial distribution of mass and stiffness of the structure to an extent that is adequate for the calculation of the significant features of its dynamic response. All concrete and masonry elements shall be included in the model of the physical structure.

Exception: Concrete or masonry partitions that are adequately isolated from the concrete frame members and the floor above.

Cast-in-place reinforced concrete floors with span-to-depth ratios less than 3:1 may be assumed to be rigid diaphragms. Other floors, including floors constructed of precast elements with or without a reinforced concrete topping, shall be analyzed in conformance with Section 12.3.1.3 of ASCE 7 to determine if they must be considered as flexible diaphragms. The effective in-plane stiffness of the diaphragm, including effects of cracking and discontinuity between precast elements shall be considered. Ramps that interconnect floor levels shall be modeled as having mass appropriately distributed on that element. The lateral stiffness of the ramp may be calculated as having properties based on the uncracked cross section of the slab exclusive of beams and girders.

9509.4 Effective stiffness.

9509.4.1 General. The effective stiffness of concrete and masonry elements or systems shall be calculated as the secant stiffness of the element or system with due consideration of the effects of tensile cracking and compression strain. The secant stiffness shall be taken from the force-displacement relationship of the element or system. The secant stiffness shall be measured as the slope from the origin to the intersection of the force-displacement relationship at the assumed displacement. The force-displacement relationship shall be determined by a nonlinear analysis. The force-displacement analysis shall include the calculation of the displacement at which strength degradation begins.

Exception: The initial effective moment of inertia of beams and columns in shear wall or infilled frame buildings may be estimated using Table 95-D. The ratio of effective moment of inertia used for the beams and for the columns shall be verified by Formula (9-1), (9-2) and (9-3). The estimates shall be revised if the ratio used exceeds the ratio calculated by more than 20 percent.

$$I_c = \left(\frac{M_{cr}}{M_a} \right)^3 I_g + \left[1 - \left(\frac{M_{cr}}{M_a} \right)^3 \right] I_{cr} \quad (\text{Formula 9-1})$$

where:

$$M_{cr} = \frac{f_r I_g}{y_t} \quad (\text{Formula 9-2})$$

and:

$$f_r = 75 \sqrt{f'_c} \quad (\text{Formula 9-3})$$

9509.4.2 Infills. The effective stiffness of an infill shall be determined from a nonlinear analysis of the infill and the confining frame. The effect of the infill on the stiffness of the system shall be determined by differencing the force-displacement relationship of the frame-infill system from the frame-only system.

9509.4.3 Model of infill. The mathematical model of an infilled frame structure shall include the stiffness effects of the infill as a pair of diagonals in the bays of the frame. The diagonals shall be considered as having concrete properties

and only axial loads. Their lines of action shall intersect the beam-column joints. The secant stiffness of the force-displacement relationship, calculated as prescribed in Section 9509.4.2, shall be used to determine the effective area of the diagonals. The effective stiffness of the frame shall be determined as specified in Section 9509.4.1. Other procedures that provide the same effective stiffness for the combination of infill and frame may be used when approved by the Superintendent of Building.

9509.4.4 Effective stiffness of elements and systems. The effective stiffnesses shall be determined by an iterative method. The mathematical model using assumed effective stiffnesses shall be used to calculate dynamic displacements. The effective stiffness of all concrete and masonry elements shall be modified to represent the secant stiffness obtained from the nonlinear force-displacement analysis of the element or system at the calculated displacement. A re-analysis of the mathematical model shall be made using the adjusted effective stiffness of existing and supplemental elements and systems until closure of the iterative process is obtained. A difference of 10 percent from the effective stiffness used and that recalculated may be assumed to be closure of the iterative process.

9509.5 Description of analysis procedures.

9509.5.1 Response spectrum analysis. Response spectrum analysis is an elastic dynamic analysis of a structure utilizing the peak dynamic response of all modes having a significant contribution to total structural response. Peak modal responses are calculated using the ordinates of the appropriate response spectrum curve which correspond to the modal periods. Maximum modal contributions are combined in a statistical manner to obtain an approximate total structural response.

9509.5.2 Number of modes. The requirement of Section 9509.5.1 may be satisfied by demonstrating that for the modes considered, at least 90 percent of the participating mass of the structure is included in the calculation of response for each principal horizontal direction.

9509.5.3 Combining modes. The peak displacements for each mode shall be combined by recognized methods. Modal interaction effects of three-dimensional models shall be considered when combining modal maxima.

9509.5.4 Torsion. The three-dimensional analysis shall be considered as including all torsional effects including accidental torsional effects.

9509.6 Material characteristics. The stress-strain relationship of concrete, masonry and reinforcement shall be determined by testing or from published data. The procedure for testing and determination of stress-strain values shall be as prescribed in one of the following:

A. Concrete. The compressive strength of existing concrete shall be determined by tests on cores sampled from the structure or may be taken from information given on the construction documents and confirmed by limited testing. A default value of horizontal shear stress may be used in Section 9511.5.1 without testing of the compressive strength of the existing concrete.

1. The cutting of cores shall not significantly reduce the strength of the existing structure. Cores shall not be taken in columns. Existing reinforcement shall not be cut.
2. If the construction documents do not specify a minimum compressive strength of the classes of concrete, five cores per story, with a minimum of ten cores, shall be obtained for testing.

Exception: If the coefficient of variation of the compressive strength does not exceed 15 percent, the number of cores per story may be reduced to two and the minimum number of tests reduced to five.

3. When the construction documents specify a minimum compressive strength, two cores per story, per class of concrete, shall be taken in the areas where that concrete was to be placed. A minimum of five cores shall be obtained for testing. If a higher strength of concrete was specified for columns than the remainder of the concrete, cores taken in the beams for verification of the specified strength of the beams, shall be substituted for tests in the columns. The strength specified for columns may be used in the analyses if the specified compressive strength in the beams is verified.
4. The sampling for the concrete strength tests shall be distributed uniformly in each story. If the building has shear walls, a minimum of 50 percent of the cores shall be taken from the shear walls. Not more than 25 percent of the required cores shall be taken in floor and roof slabs. The remainder of cores may be taken from the center of beams at mid-span. In concrete frame buildings, 75 percent of the cores shall be taken from the beams.
5. The mean value of the compressive stresses obtained from the core testing for each class of concrete shall be used in the analyses. Values of peak strain that is associated with peak compressive stress may be taken from published data for the nonlinear analyses of reinforced concrete elements.

B. Solid grouted reinforced masonry. The compressive strength of solid grouted concrete block or brick masonry may be taken as 2000 psi (13.8 MPa). The strain associated with peak stress may be taken as 0.0025.

C. Partially grouted masonry. A minimum of five units shall be removed from the walls and tested in conformance with ASTM C 140. Compressive strength of the masonry may be determined in accordance with Section 2105.2.2, assuming Type S mortar. The strain associated with peak stress may be taken as 0.0025.

D. Unreinforced masonry.

1. The stress-strain relationship of existing unreinforced masonry shall be determined by in-place cyclic testing. The test procedure shall conform to Section 9513.

2. One stress-strain test per story and a minimum of five tests shall be made in the unreinforced masonry infills. The location of the tests shall be uniformly distributed throughout the building.
3. The average values of the stress-strain values obtained from testing shall be used in the nonlinear analyses of frame-infill assemblies or in the calculation of the effective diagonal brace that is used in the simplified analysis procedure of Section 9511.

E. Reinforcement. The yield stress of each type of new or existing reinforcement shall be taken from Table 95-E unless the reinforcement is sampled and tested for yield stress. The axial reinforcement in columns of post-1933 buildings shall be assumed to be hard grade unless noted otherwise on the construction documents.

F. Combination of concrete and masonry materials. Combinations of masonry and concrete infills shall be assumed to have equal strain. The secant moduli at peak stress of the masonry and concrete shall be used to determine the effective transformed area of the composite material.

9509.7 Story drift limitation.

9509.7.1 Definition. Story drift is the displacement of one level relative to the level above or below calculated by the response spectrum analysis using the appropriate effective stiffness.

9509.7.2 Limitation. The story drift is limited to that displacement that causes any of the following effects:

1. Compressive strain of 0.003 in the frame confining infill or in a shear wall.
2. Compressive strain of 0.004 in a reinforced concrete column unless the engineer can show by published experimental research that the existing confinement reinforcement justifies higher values of strain.
3. Peak strain in masonry infills as determined by experimental data or by physical testing as prescribed in Section 9513.
4. Displacement that was calculated by the nonlinear analysis as when strength degradation of any element began.

Exception: Item 4 may be taken as the displacement that causes a strength degradation in that line of resistance equal to 10 percent of the sum of the strength of the elements in that line of resistance.

5. A story drift of 0.015 using the dynamic analysis procedure or the forces specified in Section 9510. This limitation shall not supersede the limitations of Items 1-4.

9509.8 Compressive strain determination.

9509.8.1 General. The compressive strain in columns, shear walls and infills may be determined by the nonlinear analysis or a procedure that assumes plane sections remain plane.

9509.8.2 Axial and flexural loading. The compressive strain shall be determined for combined flexure and axial

loading. The flexural moments shall be taken from the response spectrum model for frame or shear wall buildings, and from the substructure model for infill frames. The axial loads shall have the following combination of effects, where L is unreduced live load:

$$U = 1.0D + 0.3L = 1.0E \quad (\text{Formula 9-4})$$

$$U = 0.9D - 1.0E \quad (\text{Formula 9-5})$$

9509.9 Shear strength limitation. The required in-plane shear strength of all columns, piers and shear walls shall be the shear associated with the moments induced at the ends of columns or piers and at the base of shear walls by the story displacements. No strength reduction factors shall be used in the determination of strength.

SECTION 9510

EQUIVALENT LATERAL FORCE PROCEDURE

9510.1 General. Structures shall be analyzed for prescribed forces acting concurrently on the orthogonal axes of the building. The effects of the loading on the two orthogonal axes shall be combined as required by Section 9509.1.

9510.2 Base shear for analysis. The base shear used to determine story drifts shall be determined using 75 percent of that currently required by Section 12.8.1 of the ASCE 7.

where:

$R = 1.4$ for concrete frame buildings with masonry infill and all other reinforced concrete buildings.

Exception: $R = 1.0$ for single story buildings.

The R value in Table 12.2-1 of ASCE 7 for new building design shall not be used for story drift determination.

9510.3 Structure period. The fundamental period of the structure, T , in the direction under consideration can be calculated by Equation 12.8-7 of ASCE 7 or using the structural properties and deformational characteristics of the resisting elements in a properly substantiated analysis without subject to the limitations established by Table 12.8-1 of ASCE 7.

9510.4 Vertical distribution of forces. The base shear shall be distributed over the height of the structure in conformance with Formula (10-1).

$$C_{vx} = \frac{w_x h_x^k}{\sum_{i=1}^n w_i h_i^k} \quad (\text{Formula 10-1})$$

where:

C_{vx} = vertical distribution factor to be applied to V to obtain the story force at level x .

k = an exponent related to building period as follows:

For buildings having a period of 0.5 seconds or less, $k = 1.0$

For buildings having a period of 2.5 seconds or more, $k = 2.0$

For buildings having a period between 0.5 and 2.5 seconds, k may be taken as two or determined by linear interpolation between one and two.

9510.5 Horizontal distribution of shear. The effective stiffness of elements shall be used for the horizontal distribution of shear.

9510.6 Horizontal torsional moments. Provision shall be made for increased displacements resulting from horizontal torsion. The effects of torsional moments shall be included in the determination of the effective stiffness of elements and systems. Reinforced concrete floors may be considered as rigid diaphragms.

9510.7 Effective stiffness. The effective stiffness of concrete and masonry elements shall be determined as prescribed in Section 9509.4.

9510.8 Material characteristics. Material characteristics shall be determined as prescribed in Section 9509.6.

9510.9 Story drift limitations. Story drift limits shall be as prescribed in Section 9509.7.

9510.10 Compressive strain determination. Compressive strain shall be determined as prescribed in Section 9509.8.

9510.11 Shear strength limitation. The in-plane shear strength shall equal or exceed the shear forces determined as prescribed in Section 9509.9.

SECTION 9511 SIMPLIFIED ANALYSIS PROCEDURE

9511.1 General. Structures conforming to the requirements of this section may be analyzed for having a required strength by a simplified analysis procedure.

9511.2 Required features of the building. The building shall conform to all of the following features, or the building shall be analyzed by the Equivalent Lateral Force procedure or the Dynamic Lateral Force procedure as prescribed by Section 9508.4 of this Code.

1. The lateral resisting elements of the building shall be reinforced concrete shear walls or frames with solid masonry infills and infills which have openings in the masonry infills not exceeding 10 percent of the gross area of the infill panel which has the opening(s).
2. The effective shear area of reinforced concrete shear walls on each orthogonal axis shall be calculated by passing a horizontal plane through each story level. The height of the plane shall be that height where the area of the shear walls is a minimum.
3. The reinforced concrete elements shall have no visible deterioration of concrete or reinforcement.
4. The vertical elements in the lateral-load resisting system shall not have significant strength discontinuities; the story strength in any story shall not be less than 90 percent of the strength of the story above.
5. The lateral-force resisting elements in all story levels shall form a system that is not subject to significant torsion. Significant torsion is the condition where the distance between the story center of rigidity and the story center of mass is greater than 20 percent of the width of the structure in the corresponding plan dimension.

6. The minimum ratio of area of reinforcement to gross area of wall in existing reinforced concrete shear walls shall be 0.0015 in both the vertical and horizontal direction or the minimum ratio of axial reinforcement in the columns of frames containing infills shall be 0.01.

7. The ratio of total height to base length of cantilevered or coupled shear walls shall be two or less. The ratio of clear height to in-plane depth of piers in a shear wall shall be two or less. Shear walls or piers having a height to in-plane depth ratio greater than two shall be given an effective shear area of one-half of their area.

8. All concrete frames with infilled panels conforming to Item 1 above shall have total height to base length ratios of two to one or less.

9511.3 Analysis procedure.

9511.3.1 General. Supplemental elements may be added to the existing building to bring the structure into conformance with Section 9511.2.

9511.3.2 Seismic loading. The seismic loading shall be calculated by Section 9510.2. The loading of each story level shall be calculated Formula (10-1) of Section 9510.4.

9511.3.3 Relative rigidities. The relative rigidity of reinforced concrete shear walls may be based on the stiffness of uncracked sections. The relative rigidity of infill panels may be calculated using a common modulus of elasticity. Use of a combination of infills and reinforced concrete or masonry shear walls on any orthogonal axis is prohibited.

9511.3.4 Required calculations. The calculations may be limited to computation of loads on the reinforced concrete shear walls or infilled frame panels that comply with Section 9511.2 and computation of the drag and tie forces that develop a complete load path. The loads shall include torsional effects.

9511.4 Required strength of systems and elements.

9511.4.1 The capacity of all parts of the structure shall exceed the demand calculated by use of the loading specified in Section 9510.

9511.4.2 The strength of infilled frame systems used for lateral-load resistance in this section shall be calculated using only the infilled frames that conform to Item 1 of Section 9511.2.

9511.5 Shear stress limit.

9511.5.1 The maximum horizontal shear stress in new and existing reinforced concrete shear walls shall not exceed. For the purpose of this Chapter, the horizontal shear stress may be taken as 80 psi (552 kPa) without testing as required by Item A of Section 9509.6.

9511.5.2 The in-plane shear stress in any masonry infilled panel shall not exceed 30 psi (207 kPa). The calculation of shear stresses shall use net section area and only the area of the infilled masonry.

Exception: The in-plane strength of an infill panel without openings may be calculated by procedures described in published research that were verified by

experimental testing and approved by the Superintendent of Building.

SECTION 9512 MINIMUM REQUIREMENTS FOR A LIMITED STRUCTURAL ANALYSIS

9512.1 Structures conforming to the requirements of this section may be shown to be in conformance with this Chapter by submission of the report described in this section.

9512.2 Required features of the building. The building shall conform to all of the following features, or the building shall be analyzed as prescribed by Section 9508.4 of this Code.

1. The lateral load resisting elements of the building shall be reinforced concrete shear walls.
2. The minimum ratio of area of reinforcement to gross area of the wall shall be 0.0015 in both the vertical and horizontal directions.
3. The reinforced concrete elements shall have no visible deterioration of concrete or reinforcement.
4. The area of concrete shear walls on each orthogonal axis at the first floor level shall be 1.5 n percent of the area of the first floor of the building, where n is the number of floor and roof levels.
5. The area of the shear walls in all stories above the first floor shall not be more than 100 percent or less than 80 percent of the area of shear walls at the first floor.
6. The concrete shear walls in all stories above the first floor shall be directly above the shear walls at the first floor which are used to calculate the percent of shear wall area to floor area.
7. The wall area must be uniformly distributed such that at least 80 percent of the wall area used in the calculation is symmetrically placed about the center of the building.
8. The area of the shear walls on each orthogonal axis shall be calculated by passing a horizontal plane through the first story level. The height of the plane shall be that height where the area of the shear walls is a minimum.
9. The ratio of total height to base width of cantilevered or coupled shear walls shall be two or less. The ratio of the clear height to inplane depth of piers in a shear wall shall be two or less. Shear walls or piers having a height to depth ratio greater than two shall be given an effective area of one-half of their area.

9512.3 Information required in the report.

9512.3.1 The report shall include data, sketches, plans and calculations that show conformance with the features given in this section.

9512.3.2 The engineer shall meet with the representative of the Department at the site to review the report.

SECTION 9513 DETERMINATION OF THE STRESS-STRAIN RELATIONSHIP OF EXISTING UNREINFORCED MASONRY

9513.1 Scope. This section covers procedures for determining the expected compressive modulus, peak strain and peak compressive stress of unreinforced brick masonry used for infills in frame buildings.

9513.2 General procedure. The outer wythe of multiple wythe brick masonry shall be tested by inserting two flat jacks into the mortar joints of the outer wythe. The prism height, the vertical distance between the flat jacks, shall be five bricks high. The test location shall have adequate overburden and/or vertical confinement to resist the flat jack forces.

9513.3 Preparation for the test. Remove a mortar joint at the top and bottom of the test prism by saw cutting or drilling and grinding to a smooth surface. The cuts for inserting the flat jacks shall not have a deviation from parallel of more than 3/8 inch (9.53 mm). The deviation from parallel shall be measured at the ends of the flat jacks. The width of the saw cut shall not exceed the width of the mortar joint. The length of the saw cut on the face of the wall may exceed the length of the flat jacks by not more than twice the thickness of the outer wythe plus one inch (25.4 mm).

9513.4 Required equipment. The flat jacks shall be rectangular or with semi-circular ends to mimic the radius of the saw blade used to cut the slot for the flat jack. The length of the flat jack shall be 18 inches (457 mm) maximum and 16 inches (406 mm) minimum. This length shall be measured on longest edge of a flat jack with semi-circular ends. The maximum width of the flat jack shall not exceed the average width of the wythe of brick that is loaded. The minimum width of a flat jack shall be 3 1/2 inches (89 mm) measured out-to-out of the flat jack. The flat jack shall have a minimum of two ports to allow air in the flat jack to be replaced by hydraulic fluid. The unused port shall be sealed after all of the air is forced out of the flat jack. The thickness of the flat jack shall not exceed three-quarters of the minimum height of the mortar joint. It is recommended that the height of the flat jack be about one-half of the width of the slot cut for installation of the flat jack. The remaining space can be filled with steel shim plates having plan dimensions equal to the flat jack.

9513.5 Data acquisition equipment. The strain in the tested prism shall be recorded by gages or similar recording equipment having a minimum range of one-ten thousandth of an inch (0.0025 mm). The compressive strain shall be measured on the surface of the prism and shall have a gage length, measured vertically on the face of the prism, of 10 inches (254 mm) minimum. The gage points shall be fixed to the wall by drilled-in-anchors or by anchors set in epoxy or similar material. The support for the data recording apparatus shall be isolated from the wall by a minimum of 1/16 inch (1.5 mm) so that the gage length used in the calculation of strain can be taken as the measured length between the anchors of the equipment supports. The gaging equipment shall be as close to the face of the prism as possible to minimize the probability of erroneous strain measurements caused by bulging of the prism outward from its original plane.

The compressive strain data shall be measured at a minimum of two points on the vertical face of the prism. These points shall be the one-third points of the length of the flat jacks plus or minus $\frac{1}{2}$ inch. As an alternative, the strain may be measured at three points on the face of the prism.

These points shall be spaced at one-quarter of the flat jack length plus or minus $\frac{1}{2}$ inch.

Horizontal gages at mid-height of the prism may be used to record Poisson strain but this gage should be considered as recording data secondary in importance to the vertical gages and its placement shall not interfere with placing the vertical gaging as close as possible to the face of the prism.

9513.6 Loading and recording data. The loading shall be applied by hydraulic pumps that add hydraulic fluid to the flat jacks in a controlled method. The application of load shall be incremental and held constant while strains are being recorded. The increasing loading for each cycle of loading shall be divided into a minimum of four equal load increments. The strain shall be recorded at each load step. The decrease in loading shall be divided into a minimum of two equal unloading increments. Strain shall be recorded on the decreasing load steps. The hydraulic pressure shall be reduced to zero and the permanent strain caused by this cycle of loading shall be recorded. This procedure shall be used for each cycle of loading.

The load applied in each cycle of load shall be determined by estimating the peak compressive stress of the existing brick masonry. The hydraulic pressure needed to cause this peak compressive stress in the prism shall be calculated by assuming the area of the loaded prism is equal to the area of the flat jack. A maximum of one-third of this pressure, rounded to the nearest 25 psi (172 kPa), shall be applied in the specified increments to the peak pressure prescribed for the first cycle of loading. After recording the strain data, this pressure shall be reduced in a controlled manner to each of the specified increments for unloading and for recording data. The maximum jack pressure on the subsequent cycles shall be one-half, two-thirds, five-sixths and estimated peak pressure. If the estimated peak compressive stress is less than the existing peak compressive stress, the cyclic loading and unloading shall continue using increments of increasing pressure equal to those used prior to the application of estimated peak pressure.

All strain data shall be recorded to one-ten thousandth of an inch (0.0025 mm). Jack pressure shall be recorded in increments of 25 psi (172 kPa) pressure.

9513.7 Quality control. The flat jack shall be calibrated before use by placing the flat jack between bearing plates of two inches minimum thickness in a calibrated testing machine. A calibration curve to convert hydraulic pressure in the flat jack to total load shall be prepared and included in the report of the results of testing. Flat jacks shall be recalibrated after three uses.

The hydraulic pressure in the flat jacks shall be indicated by a calibrated dial indicator having a subdivision of 25 psi (172 kPa) or less. The operator of the hydraulic pump shall use this dial indicator to control the required increments of hydraulic pressure in loading and unloading.

9513.8 Interpretation of the data. The data obtained from the testing required by Item D 2 of Section 9509.6 shall be aver-

aged both in expected peak compressive stress and the corresponding peak strain. The envelope of the averaged stress-strain relationship of all tests shall be used for the material model of the masonry in the infilled frame. If two strain measurements have been made on the surface of the prism, these strain measurements shall be averaged for determination of the stress-strain relationship for the test. If three strain measurements have been made on the surface of the prism, the data recorded by the center gage shall be given a weight of two for preparing the average stress-strain relationship for the test.

SECTION 9514 EVALUATION OF EXISTING STRUCTURAL CONDITIONS

The engineer shall report any observed structural conditions and structural damage that, in the engineer's judgement, have imminent life-safety effects on the structure and recommend repairs. Evaluations and repairs shall be reviewed and approved by the Department.

SECTION 9515 MATERIALS OF CONSTRUCTION

All materials permitted by this Code may be used to reduce the story drifts. Their effective stiffness shall be determined by a nonlinear analysis using principles of engineering mechanics and expected material characteristics.

SECTION 9516 INFORMATION REQUIRED ON THE PLANS

9516.1 General. In addition to the seismic analysis required elsewhere in this Chapter, the licensed engineer responsible for the seismic analysis of the building shall record the information required by this section on the approved plans.

9516.2 Information required. The plans shall accurately reflect the results of the engineering investigation and design, and show all pertinent dimensions and sizes for plan review and construction. The following shall be provided:

1. The plans of the existing construction shall be adequately dimensioned and furnish adequate details in schedules, notes and sections to fully describe the existing building. Foundation plan, floor and roof plans which indicate new work on framing plans of the existing construction.
2. Elevations of the structural system showing sizes and dimensions.
3. Schedules, sections and details showing reinforcement of walls, slabs, beams, joists, girders, columns and foundations.

Exception: If copies of the original construction documents are submitted for information during the plan check, the information required by Items 1, 2 and 3 may be limited to areas of and adjacent to new construction on a complete outline at that level of the building.

4. Sections and details showing attachments and joining of new and existing structures. All reinforcement in the

existing structure shall be shown in these sections and details.

- Specifications and/or general notes fully describing demolition, materials and methods, testing and inspection requirements.

9516.3 Engineer's statement. The responsible engineer shall state on the approved plans, the following:

- "I am responsible for this building's seismic strengthening design in compliance with the minimum seismic resistance standards of Chapter 95 of the *Los Angeles Building Code*."

or when applicable:

- "The Registered Deputy Inspector, required as a condition of the use of structural design stresses requiring continuous inspection, will be responsible to me as required by Section 1704 of the *Los Angeles Building Code*."

**TABLE 95-A
RATING CLASSIFICATIONS**

CLASSIFICATION	TYPE OF BUILDING
Group I	Essential buildings
Group II	Buildings with occupant load of 5,000 or more, or assembly rooms of 1,000 occupants or more, and malls as defined elsewhere in the Code.
Group III	1,000 to 4,999 occupants
Group IV	300 to 999 occupants
Group V	All others

**TABLES 95-B-C
Reserved**

**TABLE 95-D
INITIAL EFFECTIVE MOMENT OF
INERTIA OF CONCRETE MEMBERS**

MEMBER	RANGE
Rectangular beams	$0.30 - 0.5 I_g$
T & L shaped beams	$0.25 - 0.45 I_g$
Columns $P > 0.5 f'_c A_g$	$0.7 - 0.9 I_g$
Columns $P = 0.2 f'_c A_g$	$0.5 - 0.7 I_g$
Columns $P = -0.05 f'_c A_g$	$0.3 - 0.5 I_g$

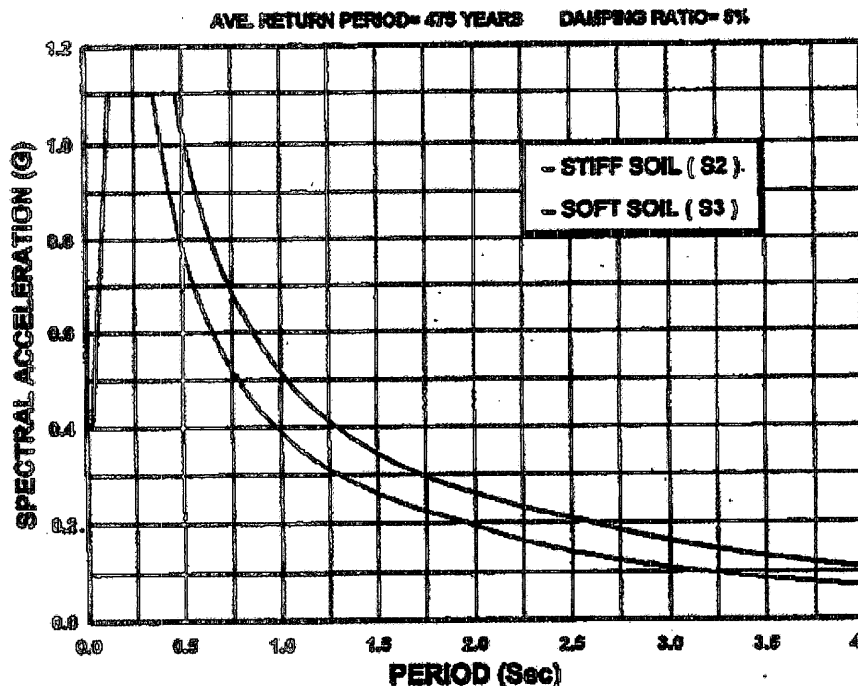
where:

A_g = gross area of the section,

I_g = moment of inertia of gross concrete section about the centroidal axis, neglecting the reinforcement.

**TABLE 95-E
ASSUMED YIELD STRESS OF EXISTING REINFORCEMENT**

TYPE OF REINFORCEMENT AND ERA	ASSUMED YIELD STRESS, KSI
Pre 1940 - Structural and intermediate grade, plain and deformed	45
Pre 1940 - Twisted and hard grade	55
Post-1940 Structural and intermediate grade	45
Post-1940 Hard grade	60
ASTM A615 Grade 40	50
ASTM A615 Grade 60	70



**RESPONSE SPECTRA SHAPES
FIGURE 95-1**

CHAPTER 96

VOLUNTARY-EARTHQUAKE HAZARD REDUCTION IN EXISTING REINFORCED CONCRETE AND REINFORCED MASONRY WALL BUILDINGS WITH FLEXIBLE DIAPHRAGMS

SECTION 9601 PURPOSE

The purpose of this Chapter is to promote public safety and welfare by reducing the risk of death or injury that may result from the effects of earthquakes on reinforced concrete and masonry wall buildings with flexible diaphragms designed under the building codes in effect prior to January 1, 1995. These buildings are potentially hazardous and prone to significant damage, including possible collapse, in a moderate to major earthquake. These structures typically shelter large numbers of persons and property for retail, food markets, food distribution centers, warehousing, aerospace, industrial/manufacturing and general business and office use. Their continued use after an earthquake is also essential to the local economy and its post-earthquake recovery.

The provisions of this Chapter are minimum standards for structural seismic resistance established primarily to reduce the risk of loss of life or injury on both subject and adjacent properties and will not necessarily prevent all earthquake damage to an existing building which complies with these standards. This Chapter shall not require existing electrical, plumbing, mechanical or fire-safety systems to be altered unless they constitute a hazard to life or property.

This Chapter provides voluntary retrofit standards for deficient wall anchorage systems on structures that are not subject to the mandatory provisions of Chapter. When fully followed, these standards will strengthen the portion of the structure that is most vulnerable to earthquake damage.

SECTION 9602 SCOPE

The voluntary provisions of this Chapter shall apply to existing buildings of the following types:

1. Cast-in-place reinforced concrete or masonry wall buildings with flexible diaphragms designed under building codes in effect prior to January 1, 1995.
2. Tilt-up concrete wall buildings with flexible diaphragms designed under the building codes in effect prior to January 1, 1995, but after January 1, 1976.

All tilt-up concrete wall buildings designed under the Building Code in effect prior to January 1, 1976 are subject to the mandatory provisions of this Chapter. All existing reinforced masonry or concrete buildings with flexible diaphragms, including tilt-up concrete wall buildings, designed under the *Los Angeles Building Code* in effect on or after January 1, 1995, shall be designed in conformance with Chapter 16.

SECTION 9603 DEFINITIONS

For the purposes of this Chapter, the applicable definitions in Chapter 2, Sections 1602, 1613.2, 1902 and 2302 of this Code; Sections 1.2, 3.1.1, 4.1, 5.2, 6.2 and 11.2 of ASCE 7, and the following shall apply:

ANCHORAGE SYSTEM. The system of all structural elements and connections, which support the concrete or masonry wall in the lateral direction, including diaphragms and subdiaphragms, wall anchorage and continuity or cross tie connectors in subdiaphragms and main diaphragms.

COMMENCED CONSTRUCTION. Construction pursuant to a valid building permit that has progressed to the point that one of the called inspections as required by the Department has been made and the work for which the inspection has been called has been judged by the Department to be substantial and has been approved by the Department.

EXISTING BUILDING. An erected building for which a legal building permit and a certificate of occupancy have been issued.

FLEXIBLE DIAPHRAGM. Any diaphragm constructed of wood structural panel, diagonal or straight wood sheathing, metal decking without a structural concrete topping, or horizontal rod bracing.

HISTORICAL BUILDING. Any building designated or currently in the process of being designated as a historical building by an appropriate federal, state or City jurisdiction.

REINFORCED CONCRETE WALL. A concrete wall that has 50 percent or more of the reinforcing steel required for reinforced concrete in Chapter 19.

REINFORCED MASONRY WALL. A masonry wall that has 50 percent or more of the reinforcing steel required by Item 2.3 of Section 2106.4.

RETROFIT. Strengthening or structurally improving the lateral force resisting system of an existing building by alteration of existing or addition of new structural elements.

TILT-UP CONCRETE WALL. A form of precast concrete panel construction either cast in the horizontal position at the site and after curing, lifted and moved into place in a vertical position, or cast off-site in a fabricator's shop.

SECTION 9604 ANALYSIS AND DESIGN

9604.1 Wall panel anchorage. Concrete and masonry walls shall be anchored to all floors and roofs which provide lateral support for the wall. The anchorage shall provide a positive direct connection between the wall and floor or roof construction.

tion capable of resisting a horizontal force equal to 30 percent of the tributary wall weight for all buildings, and 45 percent of the tributary wall weight for essential buildings, or a minimum force of 250 pounds per linear foot of wall, whichever is greater.

The required anchorage shall be based on the tributary wall panel assuming simple supports at floors and roof.

Exception: An alternate design may be approved by the Superintendent of Building when justified by well established principles of mechanics.

9604.2 Special requirements for wall anchors and continuity ties. The steel elements of the wall anchorage systems and continuity ties shall be designed by the allowable stress design method using a load factor of 1.7. The $\frac{1}{3}$ stress increase permitted by Section 1605.3.2 shall not be permitted for materials using allowable stress design methods.

The strength design specified in Section 1912.1, using a load factor of 2.0 in lieu of 1.4 for earthquake loading, shall be used for the design of embedment in concrete.

Wall anchors shall be provided to resist out-of-plane forces, independent of existing shear anchors.

Exception: Existing cast-in-place shear anchors may be used as wall anchors if the tie element can be readily attached to the anchors and if the engineer or architect can establish tension values for the existing anchors through the use of approved as-built plans or testing, and through analysis showing that the bolts are capable of resisting the total shear load while being acted upon by the maximum tension force due to seismic loading. Criteria for analysis and testing shall be determined by the Superintendent of Building.

Expansion anchors are not allowed without special approval of the Superintendent of Building. Attaching the edge of plywood sheathing to steel ledgers is not considered as complying with the positive anchoring requirements of the Code; and attaching the edge of steel decks to steel ledgers is not considered as providing the positive anchorage of this Code unless testing and analysis are performed, which establish shear values for the attachment perpendicular to the edge of the deck.

9604.3 Development of anchor loads into the diaphragm. Development of anchor loads into roof and floor diaphragms shall comply with Section 12.11.2.2.3 of ASCE 7.

Exception: If continuously tied girders are present, then the maximum spacing of the continuity ties is the greater of the girder spacing or 24 feet (7315 mm).

In wood diaphragms, anchorage shall not be accomplished by use of toe nails or nails subject to withdrawal, nor shall wood ledgers, top plates or framing be used in cross-grain bending or cross-grain tension. The continuous ties required by Section 12.11.2.2.3 of ASCE 7 shall be in addition to the diaphragm sheathing.

Lengths of development of anchor loads in wood diaphragms shall be based on existing field nailing of the sheathing unless existing edge nailing is positively identified on the original construction plans or at the site.

At reentrant corners, continuity collectors may be required for existing return walls not designed as shear walls, to develop

into the diaphragm a force equal to the lesser of the rocking or shear capacity of the return wall, or the tributary shear but not exceeding the capacity of the diaphragm. Shear anchors for the return wall shall be commensurate with the collector force. If a truss or beam other than rafters or purlins is supported by the return wall or by a column integral with the return wall, an independent secondary column is required to support the roof or floor members whenever rocking or shear capacity of the return wall is governing.

9604.4 Anchorage at pilasters. Anchorage of pilasters shall be designed for the tributary wall anchorage load per Section 9604.1 of this Code, considering the wall as a two-way slab. The edge of the two-way slab shall be considered "fixed" when there is continuity at pilasters, and considered "pinned" at roof or floor levels. The pilasters or the walls immediately adjacent to the pilasters shall be anchored directly to the roof framing such that the existing vertical anchor bolts at the top of the pilasters are by-passed without causing tension or shear failure at the top of the pilasters.

Exception: If existing vertical anchor bolts at the top of the pilasters are used for the anchorage, then additional exterior confinement shall be provided.

The minimum anchorage at a floor or roof between the pilasters shall be that specified in Section 9604.1 of this Code.

9604.5 Symmetry. Symmetry of connectors in the anchorage system is required. Eccentricity may be allowed when it can be shown that all components of forces are positively resisted and justified by calculations or tests.

9604.6 Minimum roof member size. Wood members used to develop anchorage forces to the diaphragm shall be of minimum 3-inch (76 mm) nominal width for new construction and replacement. All such members must be designed for gravity and earthquake forces as part of the wall anchorage system. For existing structural members, the allowable stresses shall be without the $\frac{1}{3}$ stress increase per Section 9604.2.

9604.7 Combination of anchor types. To repair and retrofit existing buildings, a combination of different anchor types of different behavior or stiffness shall not be permitted. The capacity of the new and existing connectors cannot be added.

9604.8 Prohibited anchors. Usage of connectors that were bent or stretched from the intended use shall be prohibited.

9604.9 Crack and damage repairs, evaluation of existing structural alterations. The engineer or architect shall report any observed structural conditions and structural damage that have imminent life safety effects on the buildings and recommend repairs. This includes alterations such as openings cut in existing wall panels without a building permit. Evaluations and repairs shall be reviewed and approved by the Department.

9604.10 Miscellaneous. Existing mezzanines relying on the concrete or masonry walls for vertical or lateral support shall be anchored to the walls for the tributary mezzanine load. Walls depending on the mezzanine for lateral support shall be anchored per Sections 9604.1, 9604.2 and 9604.3 of this Code.

Exception: Existing mezzanines that have independent lateral and vertical support need not be anchored to the concrete or masonry walls.

Existing interior masonry or concrete walls not designed as shear walls, which extend to the floor above or to the roof diaphragm shall also be anchored for out-of-plane forces per Section 9604.1, 9604.2 and 9604.3 of this Code. In the in-plane direction, the walls may be isolated or shall be developed into the diaphragm for a lateral force equal to the lesser of the rocking or shear capacity of the wall, or the tributary shear but not exceeding the diaphragm capacity.

9604.11 Historical buildings. Qualified historical buildings shall be permitted to use alternate building standards or deviations from this Chapter in order to preserve their original or restored architectural elements and features. See Chapter 84 for these alternatives.

SECTION 9605 MATERIALS OF CONSTRUCTION

All materials permitted by this Code, including their appropriate allowable stresses and those existing configurations of materials specified in Chapter 88, may be utilized to meet the requirements of this Chapter.

SECTION 9606 INFORMATION REQUIRED ON PLANS

9606.1 General. In addition to the seismic analysis required elsewhere in this Chapter, the licensed engineer or architect responsible for the seismic analysis of the building shall record the information required by this section on the approved plans.

9606.2 Information required. The plans shall accurately reflect the results of the engineering investigation and design and show all pertinent dimensions and sizes for plan review and construction. The following shall be provided:

1. Floor plans and roof plans shall show the existing framing construction, diaphragm construction, proposed wall anchors, cross-ties and collectors. Existing nailing, anchors, ties and collectors shall also be shown on the plans if these are part of the design, and these structural elements need to be verified in the field.
2. At elevations where there is alterations or damage, the details shall show the roof and floor heights, dimensions of openings, location and extent of existing damage, and proposed repair.
3. Typical concrete or masonry wall sections with wall thickness, height, and location of anchors shall be provided.
4. Details shall include the existing and new anchors and the method of development of anchor forces into the diaphragm framing; existing and new cross-ties, existing and new or improved support of the roof and floor girders at pilasters or walls.

9606.3 Engineer's or architect's statement. The responsible engineer or architect shall state on the approved plans, the following:

1. "I am responsible for this building's seismic strengthening design of the tilt-up concrete wall anchorage system in compliance with the minimum seismic resistance

standards of Chapter 96 of the *Los Angeles Building Code*."

or when applicable:

2. "The Registered Deputy Inspector, required as a condition of the use of structural design stresses requiring continuous inspection, will be responsible to me as required by Section 1704 of the *Los Angeles Building Code*."

**EXCERPTS
FROM RELATED LOS ANGELES CITY CODES
LOS ANGELES MUNICIPAL CODE**

Chapter II, Article 8

**SECTION 28.10
BALLOON - USE FOR ADVERTISING**

No person shall release or allow the release of any free balloon, toy balloon or any group of the same which has attached thereto any substance, matter or material used, designated or intended for any advertising purpose.

**SECTION 28.11
CAPTIVE BALLOONS AND SIMILAR DEVICES**

It shall be unlawful to permit a balloon or similar device which floats in the air and is restrained, attached or held in place by a cord, rope, cable or similar means, to float, ascend, rise or remain aloft at a vertical height of five feet or more above the surface of the ground measured to the highest point of the balloon or similar device.

Chapter IX, Article 6

DIVISION A — MISCELLANEOUS

SECTION 96.02

EXCAVATING, DEPOSITING, DUMPING – EARTH, SAND, GRAVEL, ETC. – WHERE PROHIBITED

- (a) No person shall, upon any private property within any residence district as described in the zoning laws of this City, dig, excavate, separate, screen or dredge for sand, gravel, earth, rock, stone, minerals, or any other substance so as to cause sand, dust or dirt to be either blown or deposited over and upon the inhabited premises of others or across or upon any public way, and no person shall, in connection with any such operation, cause loud noises by the use of steam shovels, tractors, trucks or other power machinery to be made, to the annoyance of occupants of adjacent or nearby habitations.
- (b) No person shall, upon any private property within any residence district, as described in the zoning laws of this City, dump or deposit, to a level above the official grade of an abutting street, any loose earth, sand, gravel or any other similar material so as to cause or result in sand, dust or dirt being blown over and upon the inhabited premises of others, or across any public way, or so as to cause or allow such materials to be washed or eroded over and upon the premises of another or upon any public way.
- (c) The foregoing prohibitions shall not apply to work necessary for the erection or alteration of a building or structure pursuant to a valid building permit issued therefor under the provisions of Article 1 of Chapter 9 of this Code; nor to improvement work done pursuant to a plan for subdividing and improving land carried out as contemplated by Ordinance No. 79,310, nor to work done pursuant to an express permit therefor issued under Article 4 of Chapter 6 of this Code or under any other ordinance of this City. Provided, however, that no person shall claim the benefit of this exception who does not, diligently and without unnecessary or unreasonable delay, prosecute such exempted improvement work to completion, in a manner calculated to avoid undue annoyance to the occupants of nearby habitations.
- (d) No person shall dump, deposit, move or place any earth, sand, gravel, rock, debris or other material, or maintain, permit or allow the same to remain in a condition so as to create the danger, possibility or probability that the same will roll, slip, slide, erode, flow or wash upon or over any public, or privately owned property without prior written consent of the owner thereof, or upon or over any public place, highway, street, alley or way.
- (e) No person shall, when hauling any earth, sand, gravel, rock, stone, debris, paper or any other substance over any public street, alley or other public place, allow such materials to blow or spill over and upon the public street, alley or other public place or adjacent private property.

- (f) No person shall, when excavating, compacting, hauling or moving earth, sand, gravel, rock, stone, debris, or any other similar substance, cause, allow, or permit any mud, earth, sand, gravel, rock, stone, debris or other substance to drop, be deposited, or fall from the body, tires, or wheels of any vehicle so used upon any public street or alley without immediately and permanently removing the same therefrom.

SECTION 96.05

DECLARING CERTAIN AREA SUBJECT TO INUNDATION AND PROHIBITING CONSTRUCTION OF CERTAIN BUILDINGS THEREIN

- (a) Every part and portion of that territory hereinafter described, which constitutes a part of the area known as Laguna-Dominguez area, and located within the corporate limits of the City of Los Angeles, which is less than fifteen and one-half feet elevation above sea level, United States Geological Survey, is hereby declared to be subject to inundation, and is, therefore, declared to be unfit for human habitation. Said territory is more particularly described as follows:

Beginning at the intersection of the easterly prolongation of the center line of that portion of One Hundred Seventieth Street (in the City of Gardena) extending westerly from Vermont Avenue with the westerly boundary of the City of Los Angeles as said boundary existed January 1, 1942; thence southerly along said westerly boundary of the City of Los Angeles in its various courses to the northeasterly prolongation of the center line of that portion of One Hundred Eighty-second Street tending southwestwardly from Vermont Avenue; thence northeasterly along said last-mentioned northeasterly prolongation to the center line of Vermont Avenue; thence southerly along said last-mentioned center line in its various courses to the westerly prolongation of the southerly line of Lot 109, McDonald Tract, as per map recorded in Book 15, pages 21 and 22, Miscellaneous Records of Los Angeles County; thence easterly along said last-mentioned prolongation and said last-mentioned southerly line to a point in the northerly prolongation of the westerly line of Lot 75 of Tract No. 4671, as per map recorded in Book 56, pages 30 and 31 of Maps, Records of said County; thence southerly along said last-mentioned northerly prolongation to the center line of One Hundred Ninetieth Street; thence northeasterly along said last-mentioned center line to the northerly prolongation of the center line of that portion of Hamilton Street extending southerly from One Hundred Ninetieth Street; thence southerly along said last-mentioned northerly prolongation to the southeasterly boundary line of the City of Los Angeles as said boundary existed January 1, 1942; thence northeasterly along said last-mentioned

boundary of the City of Los Angeles and continuing along said boundary to the easterly prolongation of the center line of that portion of One Hundred Eighty-ninth Street extending westerly from Figueroa Street; thence westerly along said last-mentioned easterly prolongation and along said center line of One Hundred Eighty-ninth Street to the southerly prolongation of the westerly line of Lot 8, M. E. Woods Gardena Tract, as per map recorded in Book 10, page 172 of Maps, Records of said County; thence northerly along said last-mentioned southerly prolongation and said westerly line of Lot 8 to the northwesterly corner thereof; thence southwesterly along the southeasterly line of Lot 21 of Stimson Bros. Resubdivision of Farm Lots 18 and 19 South Gardena Tract, as per map recorded in Book 52, page 98, Miscellaneous Records of said County, to the most southerly corner of said Lot 21; thence northerly along the westerly line of said Lot 21 and the northerly prolongation thereof to the center line of One Hundred Eighty-fourth Street; thence southwesterly along said last-mentioned center line to the southerly prolongation of the westerly line of Lot 27, said Stimson Bros. Resubdivision of Farm Lots 18 and 19, South Gardena tract; thence northerly along said last-mentioned southerly prolongation and said westerly line and the northerly prolongation thereof to the easterly prolongation of the hereinbefore mentioned center line of One Hundred Seventieth Street; thence westerly along said last-mentioned easterly prolongation to the point of beginning.

- (b) No building or portion thereof which is designed for residential purposes or as a place of public assembly as herein-after described, or for both, may be constructed, and no existing building may be altered so as to be used either in whole or in part for such use, upon any part or portion of the premises described in Subdivision (a) hereof, which is less than fifteen and one-half feet elevation above sea level, United States Geological Survey.
- (c) A **"place of public assembly"**, as used in Subdivision (b) hereof means and includes every place designed for or used for the congregation or gathering of twenty (20) or more persons, whether such gathering be of a public, restricted, or private nature. Assembly halls, churches, schools, auditoriums, recreation halls, pavilions, places of amusement, dance halls, opera house, motion picture theatres, and the like, are included within this term.
- (d) No permit shall be issued by any officer or employee of the City for the doing of any act for which such permit is required by any provision of this chapter when such act, if performed, would constitute a violation of this section.

DIVISION C — FABRICATOR APPROVALS

SECTION 96.200 STATEMENT OF PURPOSE

If it is the purpose of this division to safeguard the life, health, property and general welfare of the people of this City by regulating work performed at locations other than construction sites which work, if performed at such construction sites, would be subject to certain inspection requirements of the *Los Angeles Municipal Code*.

SECTION 96.201 DEFINITIONS

The following terms are defined for purposes of this division.

DEPARTMENT. The Department of Building and Safety of the City of Los Angeles.

GENERAL MANAGER. The General Manager of the Department.

PERSON. Any natural person and any firm, association, partnership, corporation or other business entity.

TYPE I FABRICATOR. A person who, at a place or location other than the site of a particular building or structure to be erected or under construction in the City of Los Angeles, performs work which:

1. If performed at such construction site would be subject to the inspection requirements of Section 91.1704 of the *Los Angeles Municipal Code*; or
2. Is required by a provision of Article I, Chapter IX, of the *Los Angeles Municipal Code* to be performed by a Type I Fabricator.

TYPE II FABRICATOR. Any person who, at the place or location other than the site of a particular building or structure to be erected or under construction in the City of Los Angeles, performs work which if performed at the construction site would be subject to the inspection requirements of Sections 91.108, 93.0304, 94.103.5, or 95.116 of the *Los Angeles Municipal Code*.

APPROVAL. A written authorization issued to Type I and Type II Fabricators pursuant to the provisions of this division containing the name of the fabricator and the exact facility or physical plant where the work that is subject to these provisions will be performed.

SECTION 96.203 SCOPE AND EFFECT OF APPROVALS

An approval issued pursuant to this division shall constitute authorization for the persons named in the approval to perform work as Type I or Type II Fabricators at the locations designated in the approval and shall constitute authorization to utilize the work so produced without the inspections which, if the work were performed at the construction site of a building or structure in the City of Los Angeles, would be required by Sections 91.108, 91.1701, 93.0304, 94.135.0 and 95.116 of the

Los Angeles Municipal Code, provided, however that any Type I Fabricator who performs work described in Section 91.1701.9 of the *Los Angeles Municipal Code* shall not be exempt from the inspection requirements of that subsection.

No approval issued pursuant to the provisions of this division shall be construed as authority to violate any law or regulation applicable in the City of Los Angeles, nor shall any approval be construed as having any effect whatsoever upon the laws or regulations of the State of California applicable to contractors.

SECTION 96.204 ISSUANCE OF APPROVALS – PROCEDURES

- (a) **Applications.** Applications for initial approvals shall be made on forms provided by the Department, which forms shall include a statement that the applicant agrees to pay all inspection charges imposed pursuant to Subsection (i) of this section. No application will be accepted unless accompanied by the appropriate fee as hereinafter set forth, which fee is unrelated to the inspection charges imposed pursuant to Subsection (i) of this section.
- (b) **Fees.** A fee of \$800.00 shall accompany each application for approval and a renewal fee of \$600.00 shall accompany each application for renewal. A fee of \$450.00 shall be charged for the approval of each branch plant and shall be in addition to fees required for the main fabricator plant. A renewal fee of \$175.00 shall be charged for the renewal of each branch plant in addition to the main fabricator plant. A fee of \$450.00 shall accompany each application for a major modification (includes changes in a quality control system or key management personnel) and a fee of \$ 150.00 shall accompany each application for a clerical modification.

A fee of \$ 250.00 shall accompany each request for acceptance of a material fabricated by an unauthorized fabricator. This request will be accepted only once from any individual fabrication company. Inspection and travel charges shall be the same as those charged to an applicant seeking to become an authorized fabricator.

Exception: An unauthorized fabricator who has filed a complete and acceptable application and submittal requesting to become an authorized fabricator and has paid the application fee may submit additional requests provided:

1. A separate application is made for each request, and
2. A fee of \$240.00 accompanies each request.

The fees for approval of new fabricators include four hours of Departmental processing time. The fees for major modifications of fabricators, and for approval of a branch plant include four hours of Departmental processing time.

The fees for a material fabricated by an unauthorized fabricator includes two hours of Departmental processing time. The fees for renewals and minor modifications include three hours and one and one-half hours, respectively, of Departmental processing time.

The applicant shall agree in writing as part of the application, to pay supplemental fees at the rate of \$75.00 per hour to cover the time of processing that is in excess of the time provided for in the approval, renewal or modification fee specified in this section. Processing shall include those activities directly related to the approval of fabricators for which an application has been made and shall include all research, review, investigation, plant inspection, travel, correspondence, clerical and consultation time pertinent to the application. The Department may require an estimated supplemental fee to cover the cost of time and travel expense to be paid at the time of filing the application and/or before any travel to plants outside of the State of California. However, the applicant shall pay the supplemental fee in full prior to final action on the application by the Department.

The fees specified in this section, including supplemental fees, and application fees are not refundable once work has been performed by the Department, regardless of whether the action taken is approval or denial.

Exception: Supplemental fees paid in advance, which are in excess of the total actual fees, may be refundable.

- (c) **Duration of approval.** Any approval issued pursuant to the provisions of this division shall remain valid for a period of one year from the date of issuance thereof unless revoked by the Department pursuant to the provisions of this division.
- (d) **Investigation of application.** The General Manager shall investigate every application submitted pursuant to Subsection (a) of this section to determine whether the applicant possesses qualifications sufficient to justify the issuance of the requested approval. In making this determination the General Manager may consider the experience, education and training of the applicant and his employees; the quality control standards maintained by the applicant; the equipment and facilities of the applicant; and the physical plant which will be designated in the requested approval if the same is issued. The General Manager may also consider any other factors pertaining to the manufacturing processes of the applicant as he may, in the reasonable exercise of his discretion, deem to be relevant.
- (e) **Action upon applications.** If it is determined that an applicant possesses qualifications sufficient to justify the issuance of the requested approval, the Department shall issue the same to the applicant. If a contrary determination is made, the application shall be denied and the Department shall notify the applicant of that action. Such notification shall be in writing and shall specify the reasons for the denial. Initial applications will expire 12 months after the filing date if the request for approval of a fabricator has not been cleared of corrections and approved. No approval

shall be issued until the application is refiled and a new fee paid.

Exception: The Department or the Board may grant extensions of time if an applicant submits in writing sufficient evidence that unusual conditions or circumstances precluded the approval within the allocated time.

- (f) **Conditional approvals.** The Department may impose reasonable conditions precedent upon the issuance of approvals and may include in any approval special conditions deemed necessary to insure that the work to be performed under such approval will comply with the provisions of Chapter IX of the *Los Angeles Municipal Code*. Such special conditions may include, but are not limited to, special quality control procedures and requirements for specific identification of particular materials. Any special conditions included in an approval shall impose mandatory duties on the fabricator to comply therewith.
- (g) **Rules and regulations.** The General Manager shall establish such rules and regulations as he may deem appropriate relative to the following:
 1. The implementation of the investigatory duties imposed upon him by Subsection (d) of this section;
 2. The maintenance of standards applicable to the facilities, equipment, employees and physical plants of approved fabricators.
 3. Such other matters as are within the scope of this division.
- (h) **Inspections.**
 1. The General Manager of the Department shall cause to be made such inspections of a fabricator's facilities, equipment, procedures, materials and construction sites upon delivery of fabricated products as, in the reasonable exercise of discretion, shall be deemed necessary to carry out the purpose of this division. Such inspections may consist of any or all of the following:
 - Initial inspections.** Inspections conducted prior to the issuance of an approval for which an application has been made.
 - Annual inspections.** In-plant inspection at least once a year.
 - Periodic monitoring inspections.** Unannounced in-plant inspections of the premises of a fabricator to whom an approval has been issued.
 - Job inspections.** On-site or in-plant inspection of fabricated material to be used at construction sites within the City.
 - Requested inspections.** Inspections conducted at the specific written request of a fabricator at a pre-arranged time and inspections conducted of fabricated material of an unlicensed fabricator.
 2. All in-plant inspections of fabrication facilities will be performed by Department personnel, except that

an initial inspection conducted prior to the issuance of a Type I approval applicable to facilities situated more than 60 miles from the Los Angeles City Hall may, at the election of the applicant, be performed by an approved testing agency. Such inspection by an approved testing agency, however, will not preclude such further investigation relative to the application as the General Manager of the Department, pursuant to Subsection (d) hereof, may deem necessary.

(i) **Inspection charges.**

1. Whenever an inspection is conducted by Department personnel at facilities located more than 60 air miles from the Los Angeles City Hall, whether such inspection be conducted pursuant to Subsection (d) or Subsection (h) of this section, or both, the fabricator shall reimburse the City of Los Angeles for the cost thereof in accordance with the following:

A. **Automobile travel.** Mileage at the rate of \$.25 per mile for all miles driven, both ways, between a point 60 miles from Los Angeles City Hall to the facilities where the inspection is to be conducted, plus \$65.00 per hour for all inspection and travel time for each inspector required.

B. **Air travel.** The coach-class fare of a regularly scheduled airline from and to Los Angeles International Airport and the airport closest in proximity to the facilities to be inspected; the cost of motor vehicle transportation to and from such airport and such facilities; inspection and travel time at the rate of \$65.00 per hour for each inspector required.

C. **Per diem.** Per diem at the rate of \$35.00 per day for inspections requiring more than eight hours of combined travel and inspection time. The cost of lodging and meals required during the combined travel and inspection time.

2. Whenever periodic monitoring inspections, requested inspections, or job inspections are conducted by Department personnel at facilities or sites 60 air miles or less from the Los Angeles City Hall, the fabricator shall pay the City of Los Angeles a fee of \$65.00 per inspection, per inspector, plus \$65.00 per hour for all inspection and travel time in excess of one hour.
3. The Department may require an estimated travel expense fee to be paid prior to inspection.

The initial application for approval, and the renewal application, shall include a statement that the applicant agrees to pay all inspection charges imposed pursuant to this subsection.

- (j) **Notification.** Prior to fabrication of products to used within the City, the licensed fabricator shall notify the Department of all fabrication schedules and delivery dates.

- (k) **Identification.** All fabricated products to be used within the City shall be identified in a manner acceptable to the Department.

SECTION 96.205

SUSPENSION AND REVOCATION OF APPROVALS

- (a) **Ground.** An approval issued pursuant to the provisions of this division may be suspended or revoked upon the following grounds:

1. The performance of work for which the approval was issued which fails to comply with the applicable provisions of Chapter IX of the *Los Angeles Municipal Code*.
2. Failure of the fabricator to satisfy any condition of the approval, or to comply with applicable rules and regulations established pursuant to Subsection (g) of Section 96.204 of this Code.
3. Any of the reasons specified in Section 98.0202 of the *Los Angeles Municipal Code*.

In addition to the foregoing, any approval may be temporarily suspended for failure to reimburse the City of Los Angeles for inspection costs as required by Subsection (i) of Section 96.204 of this division.

DIVISION D — REPORT OF RESIDENTIAL PROPERTY RECORDS AND PENDING AND RECORDED LIENS

SECTION 96.300 INTENT

Pursuant to Article 6.5 (commencing with Section 38780) of Chapter 10, Part 2, Division 3, Title 4, of the California Government Code, it is the intent of the Council of this City to assure that the purchasers of residential property within the City are furnished with reports of matters of City record pertaining to the authorized use, occupancy and zoning classification of residential property prior to sale or exchange. It is further the intent of the City Council to assure that purchasers of residential property within the City are furnished with reports of certain pending special assessment liens listed below; information regarding the installation of metal bars, grilles, grates, security roll-down shutters, and similar devices over emergency escape windows in sleeping rooms; smoke detectors; impact hazard glazing; water conservation devices; seismic gas shutoff valves; certificates of occupancy and sewer permits.

SECTION 96.301 DEFINITIONS

For the purposes of this division:

- (a) **"Owner"** shall mean any person, partnership, association, company, corporation or fiduciary in whom or which is vested legal title to residential property as defined herein, or who or which possesses the power to convey legal title to such residential property.
- (b) **"Residential property"** shall mean:
 - (1) Any real property improved with one or more buildings or structures which in whole or in part are used for or are legally permitted to be used for dwelling units or guest room purposes.
 - (2) Any vacant real property located in a zone wherein dwelling or guest room uses are legally permitted.
- (c) **"Agreement of sale"** shall mean any agreement, reduced to writing, which provides that legal title of any real property shall thereafter be conveyed from one owner to another.
- (d) **"Brush abatement"** shall mean those proceedings initiated by the City under the authority of Title 4, Division 3, Part 2, Chapter 13, of the Government Code of the State of California, where the Fire Department has determined that a fire hazard exists by reason of the presence upon real property of brush which the City Council may order removed under the authority of the above-mentioned chapter of the Government Code.

SECTION 96.302 REPORTS REQUIRED

Prior to entering into an agreement of sale or contracting for an exchange of any residential property, or, where an escrow agreement has been executed in connection therewith, prior to close of escrow, the owner or his agent shall obtain from the Department of Building and Safety a report of the Superintendent of Building and a report of the City Engineer; said reports, containing the information specified in Section 96.304 of this Code.

SECTION 96.303 APPLICATION

Upon written application by the owner or the owner's agent to the Department of Building and Safety on forms provided by the City and the payment of a fee specified herein to the Department of Building and Safety, the Superintendent of Building and the City Engineer shall review the appropriate City records. This application shall contain the name and address of the owner, the legal description, the county assessor's map book page and parcel number and, if available, the street address of the residential property for which the reports are sought.

The application for the report regarding a sale or exchange of a residential property shall not be accepted by the Department of Building and Safety until such time as the applicant provides the Department of Building and Safety with one of the following:

1. A declaration under penalty of perjury by the owner certifying that in the residential property for which the report is sought:
 - (a) Smoke detectors have been installed in accordance with the *Los Angeles Municipal Code* Section 91.8603; and
 - (b) Impact hazard glazing has been installed in accordance with *Los Angeles Municipal Code*, Section 91.6101; and
 - (c) Water-conservation devices have been installed in accordance with *Los Angeles Municipal Code* Section 122.03;
 - (d) Metal bars, grilles, grates, security roll-down shutters, and similar devices over emergency escape windows in sleeping rooms have been installed in accordance with *Los Angeles Municipal Code* Section 91.6304.3; and
 - (e) Lights and locks have been installed in accordance with Section 91.8607 of the *Los Angeles Municipal Code*; and
 - (f) Seismic gas shutoff valves has been installed in accordance with Section 94.1219.

2. A declaration under penalty of perjury by the owner certifying that in the residential property for which the report is sought:

- (a) Smoke detectors will be installed in accordance with the *Los Angeles Municipal Code* Section 91.8603; and
- (b) Impact hazard glazing will be installed in accordance with the *Los Angeles Municipal Code*, Section 91.6101.

The owner shall further certify that such smoke detectors and/or impact hazard glazing will be installed prior to entering into an agreement of sale or contracting for an exchange of a residential property, or, where an escrow agreement has been executed in connection therewith, prior to close of escrow, and that within ten days after the smoke detectors and/or impact hazard glazing is/are installed he/she will so advise the Department of Building and Safety in writing; and

- (c) Water conservation devices will be installed in accordance with *Los Angeles Municipal Code* Section 122.03;
- (d) Metal bars, grilles, grates, security roll-down shutters, and similar devices over emergency escape windows in sleeping rooms will be installed in accordance with *Los Angeles Municipal Code* Section 91.6304.3; and
- (e) Lights and locks will be installed in accordance with Section 91.8607 of the *Los Angeles Municipal Code*; and
- (f) Seismic gas shutoff valves will be installed in accordance with Section 94.1219.

3. A declaration under penalty of perjury by the buyer certifying that in the residential property for which the report is sought:

- (a) Smoke detectors will be installed in accordance with the *Los Angeles Municipal Code* Section 91.8603; and
- (b) Impact hazard glazing will be installed in accordance with the *Los Angeles Municipal Code*, Section 91.6101.

The buyer shall further certify that such smoke detectors and/or impact hazard glazing will be installed within 30 days after entering into an agreement of sale or contracting for an exchange of a residential property, or, where an escrow agreement has been executed in connection therewith, within 30 days after close of escrow, and that within 10 days after the smoke detectors and/or impact hazard glazing is/are installed he/she will so advise the Department of Building and Safety in writing; and

- (c) Water conservation devices have been installed in accordance with *Los Angeles Municipal Code* Section 122.03;

- (d) Metal bars, grilles, grates, security roll-down shutters, and similar devices over emergency escape windows in sleeping rooms have been installed in accordance with *Los Angeles Municipal Code* Section 91.6304.3; and

- (e) Lights and locks have been installed in accordance with Section 91.8607 of the *Los Angeles Municipal Code*.

- (f) Seismic gas shutoff valves will be or have been installed in accordance with Section 94.1219.

4. The Department of Building and Safety shall deliver to the applicant, either in person or by mail, the reports required within 15 calendar days after the date of the acceptance of the application.

5. The owner must also provide a declaration under penalty of perjury that he or she has inspected the property for the existence of protected trees and the number of protected trees, if any, located on the subject property. For the purposes of this section, the definition of "protected tree" set forth in Section 46.01 this Code shall apply. The declaration shall also authorize the Bureau of Street Services within the Department of Public Works to verify this information by entry upon the subject property. A fee may be collected for any inspection required to verify the declaration. The fee shall be determined and adopted in the same manner as provided in Section 12.37 I.1. of this Code for establishing fees.

SECTION 96.304 CONTENTS OF REPORTS

- (a) **Report of superintendent of building.** The report of the Superintendent of Building shall contain the following information so far as it is available in the records of the Department of Building and Safety:

- (1) The zoning classification of the property in question.
- (2) The authorized occupancy and use of the subject property as shown by building permits or certificates of occupancy of record.
- (3) Existing orders or the estimated amount of pending assessments of record which are the result of the Superintendent of Building having awarded a contract for the demolition of buildings or structures upon the subject residential property which demolitions were ordered to be performed by the Superintendent of Building under the provisions of the *Los Angeles Municipal Code*.
- (4) The declaration made pursuant to the provisions of Section 96.303 of this Code.
- (5) A copy of any Certificate of Occupancy issued with respect to the subject property pursuant to Section 91.0307 of the *Los Angeles Municipal Code*.
- (6) A listing of all document and reference numbers written or printed directly on the individual lot for which the report is requested as shown on the Zon-

ing Map maintained by the Department of Building and Safety.

- (7) Any current resolution by the City Council placing the property into the Rent Escrow Account Program of the City of Los Angeles. Notice of this resolution shall also be filed in the Office of the County Recorder.

(b) **City engineer reports.** The City Engineer report shall contain the following information:

- (1) An estimate of pending assessment liens on residential properties for public maintenance of private streets. Such estimate shall be provided upon determination of the cost of correcting any hazardous condition upon a private street whenever such corrective work is ordered by the Board of Public Works pursuant to the provisions of Section 65.13 of this Code.
- (2) An estimate of pending special assessment liens for public improvements proposed under assessment procedures authorized by State law for which an ordinance of intention has been adopted by the City Council of this City.
- (3) Pending special assessment liens for weed clearance originating under the provisions of Title 4, Division 3, Part 2, Chapter 13 of the Government Code of the State of California.
- (4) Notices of record to repair sidewalks issued by the Department of Public Works under the authority of Chapter 22 of Part 3 of Division 7 of the Streets and Highways Code of the State of California.
- (5) Existing orders or notices of record received by the Department of Public Works from the Fire Department requesting the initiation of proceeding for brush abatement under the provisions of Title 4, Division 3, Part 2, Chapter 13, of the Government Code of the State of California.
- (6) All recorded assessment liens as known to the City Engineer except for street lighting maintenance assessment liens.
- (7) Whether or not a house sewer connection permit has been issued pursuant to Section 64.12 of the *Los Angeles Municipal Code*.
- (8) Notices of making of application for essential public utilities assessments pursuant to Chapter 8 of Division 6 of the Los Angeles Administrative Code, which have not yet been acted upon by the City Council, or, if acted upon, have resulted in an assessment lien which is not yet delinquent.

SECTION 96.305 FEE FOR REPORTS

Every owner or agent for the owner, who applies for a Report of Residential Property Records and Pending Special Assessment Liens shall pay to the Department of Building and Safety a fee therefor in the sum of sixty-five dollars (\$65.00). Of this

amount, eighteen dollars (\$18.00) shall be credited to the department's receipts of the Bureau of Engineering, Department of Public Works, and the balance shall be credited to the department receipts of the Department of Building and Safety.

SECTION 96.306 EFFECTIVE PERIOD OF REPORT

No new report need be obtained by a owner for a residential property for a period of six months after the issuance of a report under the provisions of this division. During said six-months period the City may notify the applicant, at no extra charge to him, of new information of City record that makes the original report obsolete.

SECTION 96.307 DELIVERY OF THE REPORT

The reports of the Superintendent of Building and the City Engineer shall be delivered by the owner or his agent to the buyer or transferee of the subject residential property prior to entering into an agreement of sale or exchange of said property. Except that where in connection with said sale or exchange an escrow agreement has been executed, the seller or his agent may transmit said reports to the escrow agent with an instruction that said agent present these reports to the buyer or transferee prior to close of escrow, or may instruct the escrow agent to obtain said reports pursuant to the provisions of Section 96.303 and 96.305 of this Code and present them to the buyer or transferee prior to close of escrow.

SECTION 96.308 EXCEPTIONS

The provisions of the division shall not apply to:

- (a) Property exempt from taxation under the Documentary Transfer Tax Act of the State of California.
- (b) The first sale of a residential building or condominium located in a subdivision whose final map has been approved and recorded in accordance with the Subdivision Map Act not more than two years prior to the first sale. Provided, however, that such exception shall not apply to a condominium created in a condominium conversion project, as said terms are defined in Section 12.03 of this Code.

SECTION 96.309 NON-COMPLIANCE NOT TO INVALIDATE SALE OR EXCHANGE: EXCEPTION

No sale or exchange of residential property subject to the provisions of this division shall be invalidated because of the failure of any person responsible for furnishing the report required by this division to furnish such report unless such failure is an act or omission which would be sufficient ground for the rescission of such sale or exchange in the absence of this division.

SECTION 96.309.1
INFORMATION FURNISHED AS GROUND FOR
RESCISSION

Any contract for the sale or exchange of residential property subject to the provisions of this division, including escrow contracts, shall not be invalidated as a result of the information furnished in said report unless it reveals a material misrepresentation or concealment by the owner or unless it reveals a material mistake by both owner and prospective buyer or transferee which would justify a rescission of the sale or exchange in the absence of this division. Should such report reveal such misrepresentation, concealment, or mistake, the sale or exchange may be rescinded or cancelled at the option of the buyer or transferee.

CHAPTER IX, ARTICLE 8 GENERAL ADMINISTRATIVE PROVISIONS

SECTION 98.0103 DEFINITIONS

(a) **General.** For the purpose of this article, certain words and terms are defined as follows:

BOARD. The Board of Building and Safety Commissioners of the City of Los Angeles.

BOARD OF EXAMINERS. Any examining board regularly appointed by the Board of Building and Safety Commissioners or the Superintendent.

CODE. *Los Angeles Municipal Code.*

E-PERMITS. Any Express Permits issued via facsimile or Internet.

EXAMINER. A member of an examining board as hereinafter provided for, or any person designated by the Board or the Superintendent to conduct any hearing provided for in this article.

EXPRESS PERMITS. Any Building, Electrical, Mechanical or Plumbing permits that do not require plans pursuant to Section 91.106.3.2.2 of this Code.

LICENSE. A certificate, registration, license, authority or approval given or issued by the Department pursuant to the provisions of this Code.

LICENSEE. The holder of any license as the word "license" is defined in this article.

SUPERINTENDENT OF BUILDING OR SUPERINTENDENT. The General Manager of the Department of Building and Safety of the City of Los Angeles, or his duly authorized representative.

DEPARTMENT. The Department of Building and Safety.

PARTY. Includes the Board, the Department, the respondent, and any other person who has an interest or estate in a proceeding under this article.

RESPONDENT. Any person against whom an accusation is filed pursuant to this article.

PERMIT. An approved application for the inspection of any work accomplished on or in buildings, structures or sites regulated by Chapter 9 of the *Los Angeles Municipal Code*, but shall not include an application for inspection to obtain a Certificate of Inspection and Permit to Operate.

PLAN CHECK. The review of plans, specifications, and/or details required as condition prior to the issuance of a permit.

PROCEEDING. Any process relative to a hearing as provided in this article.

SLIGHT MODIFICATION. A waiver, granted by the Superintendent or the Board, of the strict requirements of the provisions of Chapter 9 or Chapter I, Article 2 of the *Los Angeles Municipal Code*.

Where the word "Examiner" or "Hearing Examiner" appears hereinafter, the words "Board of Examiners" may be substituted.

SECTION 98.0105 INSPECTIONS

(a) Whenever it is necessary to make an inspection to enforce any of the provisions of or perform any duty imposed by this chapter or other applicable law, or whenever the Superintendent of Building or his authorized representative has reasonable cause to believe that there exists in any building or upon any premises any violation of the provisions of this chapter, or other applicable law, or any condition which makes such building or premises hazardous, unsafe or dangerous, the Superintendent of Building or his authorized representative is hereby authorized to enter such property at any reasonable time and to inspect the same and perform any duty imposed upon the Superintendent of Building by this chapter or other applicable law, provided that:

(1) If such property be occupied, he shall first present proper credentials to the occupant and request entry explaining his reasons therefor; and

(2) If such property is unoccupied, he shall first make a reasonable effort to locate the owner or other person having charge or control of the property and request entry, explaining his reasons therefor. If such entry is refused or cannot be obtained because the owner or other person having charge or control of the property cannot be found after due diligence, the Superintendent of Building or his authorized representative shall have recourse to every remedy provided by law to secure lawful entry and inspect the property.

(b) Notwithstanding the foregoing, if the Superintendent of Building or his authorized representative has reasonable cause to believe that the building or premises is so hazardous, unsafe or dangerous to require immediate inspection to safeguard the public health or safety, he shall have the right to immediately enter and inspect such property, and may use any reasonable means required to effect such entry and make such inspection, whether such property be occupied or unoccupied and whether or not permission to inspect has been obtained. If the property be occupied, he shall first present proper credentials to the occupant and demand entry, explaining his reasons therefor and the purpose of his inspection.

(c) No person shall fail or refuse, after proper demand has been made upon him as provided in Subsection (b) of this section, to promptly permit the Superintendent of Building or his authorized representative to make any inspection provided for by Subsection (b) of this section. Any

person violating this subsection shall be guilty of a misdemeanor.

- (d) The applicant, by accepting any permit issued pursuant to this chapter, does thereby consent and agree to the entry upon the premises described in the permit by Department personnel for the purpose of conducting such inspections as are required by this chapter or other applicable laws.

SECTION 98.0109 EXPRESS PERMITS

- (a) **Guaranteed Express Permit program (GEP).** The Department shall offer a walk-in Express Permit customer a money-back guarantee if:
 - (1) the customer waits longer than 30 minutes for service to begin; or
 - (2) the customer waits longer than 60 minutes for the processing of the permit from the time that service begins.
- (b) **Guaranteed Express Permit (GEP) program guidelines.** If a customer waits longer than the time limits stated in Section 98.0109 (a), and the wait can be verified by the Department through the use of electronic equipment, then the Department shall waive the permit fee.
- (c) **Program limitations.** The GEP applies only to those permits issued at the Express Permit Counter. The Department may add or delete certain permit types from the list of Express Permits at its discretion. GEP does not apply to E-Permits and is limited to one permit per person, per permit application. GEP does not apply to those permits requiring clearance or review by other agencies. The GEP program shall be suspended during power failures, computer system failures, or during times of emergency including, but not limited to, fire, earthquake, or other manmade or natural disaster.

DIVISION 4 – APPEALS AND REQUEST FOR SLIGHT MODIFICATION APPEAL FEES – AVAILABILITY OF RECORDS FOR INSPECTION – BOARD RELATED SERVICES – INVESTIGATION – POWERS OF DEPARTMENT AND BOARD AND PENALTIES

SECTION 98.0402 CODE ENFORCEMENT COSTS INCURRED: INVESTIGATION COSTS, FEES AND FINES

- (a) **Investigation fee required.** Whenever any work has been commenced without authorization by a permit or application for inspection, and which violates provisions of Articles 1 through 8 of Chapter IX of the *Los Angeles Municipal Code*, and if no order has been issued by the Department or a court of law requiring said work to proceed, a special investigation shall be made prior to the issuance of any permit, license or application for inspection. An Investigation Fee which shall be double the amount charged for an application for inspection, license or permit fee, shall be collected on each permit, license or application for inspection so investigated. The fee required by this subsection shall be in addition to any other fees required by the above referenced codes Articles 1 through 8 of Chapter IX of the *Los Angeles Municipal Code*. In no event shall the Investigation Fee be less than \$400.00.

The payment of the Investigation Fee shall not exempt any person from compliance with the provisions of the code nor from any penalty prescribed by law.

- (b) **Collection fee for delinquent invoice for boilers, pressure vessels, elevators and emergency systems.** Whenever an owner or user of any apparatus, equipment or emergency system fails to pay the fees required by Sections 92.0126, 92.0129(d), 92.0132(b), (d) and (e), 93.0235 and 97.0314 within 60 days after notification, the owner or user shall pay, additionally, a collection fee equal to 50% of the required fee specified under Sections 92.0126, 92.0129(d), 92.0132(b), (d) and (e), 93.0235 and 97.0314.
- (c) An investigation fee of \$15.00 per report shall be charged and collected for each boiler or pressure vessel insurance report not submitted as required by Section 97.0318. This investigation fee shall become due 30 days after the date the inspection has been performed and remains unreported and is in addition to the insurance processing fee.
- (d) **Non-compliance inspection fee required.** See Section 98.0411.
- (e) **Annual inspection fee.** Whenever the Department of Building and Safety makes annual inspections pursuant to Sections 12.26 F.3., 12.26 I.5. and 13.03 of the *Los Angeles Municipal Code* (or any other provision of this Code) the Department shall collect a fee for inspection of each "recycling center" and "yard" as defined in Section 12.26 F.1., each vehicle "repair garage" and "used vehicle

sales area" as defined in Section 12.26 I.1., and each "surface mining operation" as defined in Section 13.03 B., the annual inspection fees shall be as follows:

1. For each recycling center, yard, repair garage or used vehicle sales area \$355.00
 2. For each surface mining operation a fee of. . . \$265.00
- (f) The Department shall collect an amount levied by penalty fine from every owner or operator of a yard, repair garage or used vehicle sales area, as described in Subsection (e) above, for the following violations of the *Los Angeles Municipal Code*:
1. **Repeat Violation.** Pursuant to Sections 12.26 F.15. and 12.26 I.18. of the *Los Angeles Municipal Code*, a penalty fine of \$200.00 shall be levied when cited in a subsequent notice to comply for the same violation.
 2. **Notice of Revocation.**
 - A. Pursuant to Section 12.26 F.14. of the *Los Angeles Municipal Code*, penalty fines shall be levied for the following recycling center and yard violations as specified in the notice of intent to revoke:
 - (i) Required wall or fencing in disrepair . . . \$750.00
 - (ii) Vehicle or other material stacked or piled above the height standards as specified in this Code \$750.00
 - (iii) Storage of vehicles or other materials outside of the required walls or fences surrounding the yard \$750.00
 - (iv) Failure to provide or maintain the required minimum number of parking spaces. . . . \$750.00
 - (v) Dismantling, repairing, wrecking, modifying, processing, stripping, or otherwise working on any vehicles or other automotive parts or materials outside the required wall or fence \$750.00
 - (vi) All other violations \$300.00
 - B. Pursuant to Section 12.26 I.17. of the *Los Angeles Municipal Code*, fines shall be levied for the following repair garage and used vehicle sales violations as specified in the notice of revocation:
 - (i) Failure to provide and maintain required walls or fences \$750.00
 - (ii) Failure to provide and maintain a fully enclosed building for body and fender repair \$750.00
 - (iii) Failure to provide and maintain an approved spray booth within an enclosed building . . . \$750.00

- (iv) Failure to provide and maintain a building enclosed on three sides for repairs other than body and fender \$750.00
- (v) Failure to provide and maintain a building required for the operation of any vehicle hoists..... \$750.00
- (vi) Failure to maintain open and accessible customer parking \$750.00
- (vii) Failure to pay annual inspection fee within 60 days of assessment. \$750.00
- (viii) Failure to provide vehicle record when requested. \$750.00
- (ix) All other violations of the provisions of the Municipal Code \$300.00
- (g) In addition to any other remedy provided by law, the City may collect any judgment, fee, cost, or charge, including any permit fees, fines, late charges, or interest, incurred in relation to the provisions of this section as provided in *Los Angeles Administrative Code* Sections 7.35.1 through 7.35.8.

SECTION 98.0403.1

POWERS OF THE DEPARTMENT AND THE BOARD

(a) Powers of the Department.

1. The Department is granted the power to enforce all ordinances and laws relating to the construction, alteration, repair and demolition, or removal of buildings or structures in the City, and to the installation, alteration, repair, use, and operation of all heating, plumbing, lighting, ventilating, refrigerating, electrical and mechanical appliances and equipment in those buildings or structures.
2. The Department is granted the power to enforce all ordinances and laws relating to the construction, alteration, repair, removal or installation of elevators, escalators, console and/or stage lifts, incline cars, manlifts, manhoists, steam boilers, pressure vessels and all connections and appurtenances pertaining to their proper functioning.
3. The Department is granted the power to enforce the zoning ordinances of the City.
4. The Department shall have the power and duty to enforce all ordinances and laws relating to grading and control of excessive dust emission.
5. The Department shall have the power and duty to enforce all portions of the Rules and Regulations of the State Fire Marshal which relate to the construction, alteration, repair, demolition, or removal of buildings, or structures, and to the use and operation of all heating, plumbing, lighting, ventilating, refrigerating, electrical, and mechanical appliances therein. Provided, however, that no application for modification of specific provisions of the Rules and Regulations of the State Fire Marshal shall be granted by the Department, unless and until such

application shall be first submitted to the Chief Engineer of the Fire Department or his representative for report and recommendation with respect thereto.

6. The Department shall have the power to enforce those building regulations mandated by State or Federal law to be enforced by the local building Department or building official.
7. The Department shall have the power to enforce States laws relating to buildings, structures and construction activities provided the authority to do so has been allowed or granted by the State and the Department has determined to undertake such enforcement.
8. The Department shall have the power to enforce other ordinances and laws when designated to do so by law.
9. In the exercise of the powers enumerated in this subsection, the Department shall have the power to apply the building ordinances of the City (Chapter 9 of the Code) and those building regulations mandated by State law to be enforced by the local agency, building Department or building official to buildings and structures containing one or more air space lots as defined in Chapter 1, Article 2, of the Code so as to treat the entirety of such buildings or structures as if they were on or within a single lot, provided:
 - i. That such buildings or structures or portions thereof would otherwise conform to such ordinances and regulations, but for the creation of such air space lots; and
 - ii. That a covenant and agreement, in a form designed to run with the land and satisfactory to the Department be recorded with the Office of the County Recorder and a copy filed with the Department by the owners binding themselves and future owners and assigns to keep, preserve and maintain all portions of such buildings or structures in accordance with and pursuant to such building ordinances and regulations.
10. The Department shall have the power to hear and act upon requests for slight modifications in individual cases to the building ordinances of the City, and regulations under Articles 1 through 8 of Chapter IX of the *Los Angeles Municipal Code*.

In granting a request for a slight modification, the Department shall determine that the slight modification is reasonably equivalent to the ordinance requirement involved, that a special individual reason makes the strict letter of the ordinance impractical and that the slight modification is in conformity with the spirit and purpose of the code or codes involved.
11. The Department shall have the power to hear and determine requests for slight modifications for individual cases in the yard area requirements of the

zoning ordinance, provided that in each such modification, the Superintendent shall first find that a special, individual reason makes the strict letter of the ordinance impractical and that the modification is in conformity with the spirit and purpose of the ordinance involved. Any action granting a modification shall be recorded and entered in the files of the Department.

For structures and additions constructed after January 1, 1995, slight modifications from the yard requirements shall be limited to deviations permitting portions of buildings to extend into a required yard or other open space a distance of not to exceed 20 percent of the width or depth of such required yard or open space. However, for structures and additions existing prior to January 1, 1995, slight modifications may be granted for yard deviations slightly over 20 percent.

Except as expressly provided herein, the Superintendent of Building shall not grant deviations from the lot area, height, or density requirements. Further, the Superintendent shall not grant deviations from the yard requirements relating to the height of fences and walls, or including those for tennis or paddle tennis courts and other game courts.

If the yard regulations cannot reasonably be complied with or it is difficult to determine their application on lots of peculiar shape or location, then the regulations may be modified or determined by the Superintendent of Building. The Superintendent may also waive all or part of the required loading space on unusually shaped lots, oddly located lots, or hillside lots, when such space cannot reasonably be provided or utilized.

Requests for yard modifications as provided in this subsection shall be made in accordance with the procedures established in Section 98.0403.2 of the *Los Angeles Municipal Code*.

12. The Department shall have the power to enforce any administrative nuisance abatement determination made by the Zoning Administrator, former Board of Zoning Appeals, City Planning Commission, Director of Planning or City Council. There shall be no administrative appeal to any City official or Board from such an enforcement action by the Department.

(b) Powers of the Board.

1. The Board shall have the power to hear and act upon appeals filed by any person aggrieved by the Department requesting a slight modification under this section, except for those actions permitted in subsection (a)11.

If the Board grants a slight modification on appeal, then the Board shall make the same findings as required by the Department when acting on a slight modification.

2. The Board shall have the power to hear and determine appeals from orders, interpretations, requirements, determinations, or actions of the Department pertaining to enforcement of specific ordinances, regulations, or laws in site-specific cases. These appeals shall state how the Department has erred or abused its discretion in the matter of the appeal. The Department shall provide the Board with a written report on the appeal. The Department, however, may reverse or modify the action appealed at any time prior to final action by the Commission. The Board shall hear and make its determination on the appeal no later than the 30th calendar day after the appeal is heard.

Notwithstanding the above, the Board shall have no authority to hear and determine appeals from orders, interpretations, requirements, determinations, or actions of the Department pertaining to enforcement of specific ordinances, regulations, or laws contained in Chapter I of this Code and in other land use ordinances. Any appeal concerning these requirements shall be made to the Director of Planning in accordance with the provisions set forth in Section 12.26 K.

The Department shall maintain a file of requests from individuals or groups who wish to be notified of certain determinations on individual job addresses. These requests shall be submitted to the Department in writing and shall specify the subject job address, and the address and telephone number where they wish to be notified. The request shall be in force until the end of the calendar year in which the request is filed and the request may be renewed at any time during the subsequent calendar year.

The Department shall provide a copy of board agendas by U.S. mail to individuals or groups who wish to receive them. The mailing of agendas shall be maintained by a yearly subscription fee of \$50.00. A subscription fee of \$25.00 will be charged if there is less than six months remaining in the calendar year. Fees for individual and/or mail requests for copies of board agendas and other documents shall be as set forth in Los Angeles Administrative Code Sections 12.31 and 12.32.

3. The Board shall have the power to act in other situations as provided by ordinance or law.
4. The Board shall have the power to refuse to hear an appeal if the Board determines that the appeal is basically a restatement of a previous appeal on the same job and no substantial additional justification has been presented by the appellant.
5. The power of the Board shall not include the right to hear and act upon any of the following:
 - i. An appeal from the Department's action on a request for a slight modification, an appeal of a legitimate Department order or an appeal objecting to the Department's determination, if such appeal is:

- a) Filed on or after the date a citation is issued charging a person with a violation of the Code or any other ordinance or law enforced by the Department, and the appeal in any way involves the citation issuance, an arrest associated with the citation issuance, or the facts or Code issues underlying the citation issuance.
- b) Filed on or after evidence of a violation of the Code or any other ordinance or law enforced by the Department is presented to and accepted by the City Attorney for criminal prosecution.

If an appeal or request for a slight modification is not filed with 15 days after the Department's action on the violation, the action and/or determination of the Department shall be final.

- ii. An appeal in violation of limitations placed upon the Board's powers as specified in other ordinances, regulations, or law.
- iii. Repealed.
- iv. If the Board or Superintendent determines that an appeal or request for a slight modification, filed with the Board, relates to Department enforcement of laws or access to public accommodations and housing by the physically handicapped, then the matter shall be referred to the Handicapped Access Appeals Commission for its action. The Board's jurisdiction shall not include the right to hear appeals from or otherwise review any action, order, or determination of the Handicapped Access Appeals Commission.
- v. An appeal dealing with financial, personnel, or administrative issues or other similar matters.
- vi. An appeal seeking relief from any nuisance abatement determination or enforcement decision of the Department relating to any administrative nuisance abatement determination made by the Zoning Administrator, former Board of Zoning Appeals, City Planning Commission, Director of Planning or City Council.

SECTION 98.0403.2 PROCEDURES FOR APPEALS TO THE DEPARTMENT AND TO THE BOARD

(a) Appeals to the department under power granted in section 98.0403.1.

- 1. Such appeals shall be made in writing, upon appropriate forms provided therefor by the Department.
- 2. An appeal processing fee of \$100.00 for the first item and \$30.00 for each additional item shall be paid by

the appellant prior to the Department processing the appeal and making a determination.

In addition to the appeal processing fee required by this subdivision, an inspection fee of \$65.00 shall be paid by the appellant when, in the opinion of the Department, the appeal requires a field inspection to verify site conditions.

An additional inspection fee as described in Section 98.0412(a) may be charged by the Department for each inspection necessary to verify compliance with the conditions established by the determination of the Department.

Exceptions:

- A. No appeal fee shall be required on any appeal from an order arising from an area-wide survey, conducted by the Department, of buildings used for one family housing, if the work required to bring the unit into compliance with the *Los Angeles Municipal Code* is the same as specified in the order.
 - B. No appeal fee shall be required for any appeal on a child-care facility if the owner or operator is a nonprofit child-care organization that has filed a notarized affidavit to that effect with the Department.
3. If the Superintendent determines that an item of request involves a material, device or method of construction appropriate for a General Approval under Section 98.0501 of the *Los Angeles Municipal Code*, such request shall be accompanied by a filing fee of \$165.00 for each request submitted which includes such item.
- A supplemental fee as specified in Section 98.0501(b)4 shall be charged to cover processing time in excess of one hour. If the Department determines that the material submitted with the appeal request substantiates the claim made therein, and no request to hold a hearing is pending the Department may grant a conditional approval of such request.
4. In any appeal the appellant making the request shall cause to be made, at the appellant's own expense, any tests required by the Department to substantiate the claims therein.
 5. The Department may hold any hearings it deems appropriate to consider the appeal.

(b) Appeals to the board under the power granted by section 98.0403.1 (b).

1. Such appeals shall be made in writing, upon appropriate forms provided therefor by the Department.
2. Appeals shall be accompanied by a filing fee based upon the subject of the request as set forth in Tables 4-A or 4-B of this division.

Exceptions:

- A. No filing fee shall be required on any appeal from an order arising from an area-wide sur-

vey, conducted by the Department, of buildings used for one family housing, if the work required to bring the unit into compliance with the *Los Angeles Municipal Code* is the same as specified in the order.

- B. No filing fee shall be required for any appeal on a child care facility if the owner or operator is a nonprofit child care organization that has filed a notarized affidavit to that effect with the Department.
3. If the Board determines that evidence is required to be taken or that further investigation is necessary to decide any such appeal, the Board may refer the matter to a hearing examiner for hearing and report in accordance with provisions of Charter Section 217, or to an ordinance-established advisory board, or may refer the matter to the Department for further investigation and report, whichever the Board deems most appropriate.
 4. In any appeal, the appellant or person making such request shall cause to be made, at the appellant's own expense, any tests required by the Board to substantiate the claims therein.
 5. In addition to any other appeal fees required by this subsection, each appeal shall be accompanied by an inspection fee of \$65.00 when, in the opinion of the Department, the appeal requires a field inspection to verify site conditions. The Department may charge an additional inspection fee as specified in Section 98.0412(a) for each inspection necessary to verify compliance with the conditions established by the Board in any approval or conditional approval.

SECTION 98.0404 EXTRA TERRITORIAL INSPECTIONS

- (a) The Department of Building and Safety may make inspections outside the territorial boundaries of the City of Los Angeles when the Superintendent of Building determines that such inspection is necessary for the City's public health, safety or general welfare. Such inspections may include the inspection of items intended to be used in building construction or as building equipment in the City of Los Angeles. Employees of the Department of Building and Safety shall inspect such items that are manufactured or fabricated during the process of such manufacturing or fabrication in accordance with the requirements of the *Los Angeles Municipal Code*.
- (b) The Superintendent shall adopt reasonable rules and regulations governing such inspections made outside the City boundaries.

SECTION 98.0405 CHARGES FOR PRINTED MATERIALS AND MISCELLANEOUS TYPE SERVICES

The Department shall charge and collect the following amounts for the items shown in Table 4-C prior to providing such materials and/or service to members of the public. The charges herein established shall be sufficient to fully compensate the City for all expenses incurred in the preparation, production, handling and distribution of the items listed and including general overhead expenses. The Superintendent of Building shall periodically review such charges to insure that all applicable expenses to the City are full compensated.

TABLE NO. 4-A
FILING FEES* FOR APPEALS

GROUP OCCUPANCY	FIRST ITEM FOR SINGLE BUILDING TYPE OF BUILDING**				Each Additional Item
	V	IV & II-N	III	I & II Except II-N	
R-3 & U	\$ 155	\$ 155	\$ 155	\$ 155	\$ 55
A, B, E, F, H, I, M, S & R-1 & R-2	255	255	255	455	155

All other filing fees not covered in the above schedule including appeals pursuant to Los Angeles Municipal Code Section 12.27, shall be \$250.00 for the first item and \$150.00 for each additional item.

* See Section 91.105.4 for fees for referral to the Sign Advisory Committee.

** Accessory building, structures or appendages will be considered the same as main building and occupancy.

TABLE NO 4-B
FILING FEES* FOR APPEALS GRADING AND SOIL REQUIREMENTS

NUMBER OF LOTS	CONSTRUCTION REQUIREMENTS	UNSTABLE SOIL OF GEOLOGY	EACH ADDITIONAL ITEM
1-5 lots	\$280	\$480	\$115
6 or more lots	580	880	280

* See Section 91.105.3 for fees for referrals to the Engineering Geology Advisory Committee.

**TABLE 4-C
CHARGES FOR PRINTED MATERIALS**

ITEM	CHARGE
"Certificate of Inspection and Permit to Operate Steam Boiler or Pressure Vessel" Form M-1	\$11.00 pad (100)
"Research Report Index"	\$30.00 per copy

SECTION 98.0406**INSPECTION FEES FOR OFF HOURS INSPECTION**

The Department may, at its discretion, make inspections at other than normal working hours upon application therefor by a permittee. A fee in addition to fees charged elsewhere in this Code, at a rate of \$100.00 per hour shall be charged for such inspection, time to include travel to and from place of inspection, with a minimum of \$300.00.

SECTION 98.0407**SPECIAL ENFORCEMENT PROCEDURE FEES**

Whenever special enforcement procedures are required to obtain compliance with properly executed Departmental orders that apply to application for inspection of Construction Permits, a fee of \$32.00 shall be assessed in addition to fees specified elsewhere in the Municipal Code.

SECTION 98.0408**ISSUANCE OF CITATIONS BY DESIGNATED EMPLOYEES**

- (a) In the performance of their duties, Senior Safety Engineers-Pressure Vessels, Senior Safety Engineers-Elevators, Safety Engineers-Pressure Vessels, Safety Engineers-Elevators, Senior Electrical Equipment Testers, Electrical Equipment Testers, Equipment Safety Investigators, Electrical and Mechanical Engineering Assistants, Building Electrical and Building Mechanical Engineering Associates assigned to the Electrical and Mechanical Test Laboratories, and Senior Inspectors and Inspectors in the classifications of Building, Building-Mechanical, Electrical, Heating and Refrigeration and Plumbing shall have the power, authority and immunity of a public officer or employee, as set forth in California Penal Code Section 836.5, to make arrests without a warrant whenever he or she has reasonable cause to believe that the person to be arrested has committed a misdemeanor or an infraction in his or her presence in violation of an ordinance or statute which such employee has the duty to enforce. Those ordinances or statutes shall include any law set forth in Subsection (b) of this section. In accordance with Section 11.06 of the *Los Angeles Municipal Code*, in any case in which a person is arrested pursuant to this authority and the person arrested does not demand to be taken before a magistrate, the public officer or employee making the arrest shall prepare a written notice to appear and shall release the person on his or her promise to appear as prescribed by Sections 853.5 and 853.6 of the California Penal Code. If such person signs the written notice to appear, thereby promising to appear, he or she shall not be taken into physical custody.

- (b) Any person designated in Subsection (a) of this section shall have the power, authority and immunity of a public officer or employee under California Penal Code Section 836.5 to make arrests without a warrant whenever he or she has reasonable cause to believe that the person to be arrested has committed a misdemeanor or an infraction in his or her presence which is a violation of any of the following *Los Angeles Municipal Code* Sections:

41.14	62.51 1.(e)	66.25
41.45	62.79	67.02(a)
42.00	62.80	80.73(b)2.A.(4)
56.08	62.96(a)	80.73(b)2.C., D., E.
56.11	62.130	85.01(a)
62.45(b)	64.30 with respect to storm drain	114.04
62.49(a)	systems and waters of the State	114.05

or a violation of State of California Penal Code Section 556 or 556.1.

- (c) Those persons designated in Subsection (a) of this section are hereby authorized to issue parking citations as provided for in Section 80.00 of the *Los Angeles Municipal Code* for the violation of Municipal Code Sections 80.53, 80.56, 80.73(b)2.A.(1), (2), (3), 80.73(b)2.F., 80.73.2, 80.77 and 85.01(b) and California Vehicle Code Section 22500(f).

SECTION 98.0410**SURCHARGE FOR ONE-STOP PERMIT CENTER**

There shall be added to the total of all fees imposed for any permit, plan check, license, application, report, and inspection provided for in Articles 1 through 8 of this chapter excluding Sections 91.6205.18, 91.107.4.4, 91.107.4.6, 98.0402, 98.0411, 98.0416, 98.0418 and 98.0716 of this Code a surcharge in an amount equal to the greater of two percent of the fees or one dollar.

SECTION 98.0411**NON-COMPLIANCE FEES**

- (a) **Noncompliance fee.** If, in the course of enforcing any state law or local ordinance, the Department issues an order to a person and the person fails to comply with that order within 15 days following the due date for compliance specified in the order and any extension thereof, then the Department shall have the authority to collect a noncompliance fee.

The purpose of this fee is to recover a portion of the cost of any additional inspection and administrative or appeal proceedings incurred by the Department in order to enforce the Code or secure compliance with the order. No more than one such fee shall be collected for failure to comply with an order. This noncompliance fee shall be in addition to fees specified elsewhere in the *Los Angeles Municipal Code*.

The Department shall not impose a noncompliance fee unless the order states that "a proposed noncompliance fee may be imposed for failure to comply with the order within 15 days after the compliance date specified in the order or unless an appeal or slight modification is filled within 15 days after the compliance date".

Exception: If a person against whom an order is issued appeals that order within 15 days after the compliance date set forth in the order, then the Department may not impose a noncompliance fee until a final appeal determination upholding or modifying the underlying Department order has been made. The Department may then impose a noncompliance fee only for failure to comply with the final appeal determination within 15 days after the compliance date or dates specified in the determination.

- (b) **Appeal.** Any person served with an order and notice of proposed non-compliance fee may appeal the order and proposed imposition of the non-compliance fee or request a slight modification pursuant to the procedures set forth in Section 98.0403.1 of this Code.

The Department or the Board may rescind or modify the proposed non-compliance fee under the authority granted by Section 98.0403.1 of this Code.

If the appeal or request for slight modification is not filed within 15 days after the compliance date or extensions granted therefrom, the determination of the Department to impose and collect a non-compliance fee shall be final.

- (c) **Collection of the Noncompliance Fee.** If the Department determines pursuant to Subsections (a) and (b) of this section that a noncompliance fee is due, then it shall notify the person cited, by United States mail in a sealed envelope, with postage paid, addressed to the last known address of the person cited as that address appears in the last equalized assessment roll. The notice of noncompliance fee shall state that:

"if the noncompliance fee incurred is not remitted to the Department within 30 days after the date of mailing of this notice, the Department shall impose a late charge equal to two times the noncompliance fee and a collection fee equal to 50 percent of the original noncompliance fee. Any person who fails to pay the noncompliance fee, late charge or collection fee shall also pay interest. Interest shall be calculated at the rate of one percent per month, or fraction of a month, on the amount of the noncompliance fee, late charge and collection fee imposed, from the 60th day after the date of mailing of this notice until the date of payment."

Service of the notice of noncompliance fee shall be deemed to have been completed at the time of deposit in the United States mail.

The person cited shall remit the noncompliance fee to the Department within 30 days after the date of mailing the notice of noncompliance fee. If the person cited fails to do so, then the Department may demand payment of the noncompliance fee from the person cited and may withhold the issuance of building permits, licenses or approvals to the cited person until the noncompliance fee has been paid.

A late charge equal to two times the noncompliance fee and a collection fee equal to 50 percent of the original noncompliance fee shall be imposed if the fee is not paid within 30 days after the date of mailing the notice of noncompliance fee. Any person who fails to pay the noncompliance fee, late charge or collection fee shall also pay interest. Interest shall be calculated at the rate of one percent per month, or fraction of a month, on the amount of the noncompliance fee, late charge and collection fee imposed, from the 60th day after the date of mailing the notice of noncompliance fee until the date of payment. Any partial payments of the noncompliance fee, late charge, collection fee or interest received shall be applied first to interest, then late charge and collection fee, and lastly to the noncompliance fee.

The City shall have the right to bring legal action in any court of competent jurisdiction to enforce the order and collect the amount of these fees. In addition to any other remedy provided by law, the City may collect any judgment, fee, cost, or charge, including any permit fees, fines, late charges, or interest, incurred in relation to the provisions of this section as provided in Los Angeles Administrative Code Sections 7.35.1 through 7.35.8.

- (d) The amount of the non-compliance fee shall be as shown in Table No. 4 D.

**TABLE NO. 4-D
NONCOMPLIANCE INSPECTION FEES**

RESIDENTIAL BUILDINGS	
Item	Fee
Single-family dwelling or the first dwelling unit or guest room on the premises	\$100.00
Each additional dwelling unit or guest room on the premises up to 10 units total	90.00
Each dwelling unit or guest room in excess of 10 units	70.00
NONRESIDENTIAL BUILDINGS	
Floor Area	Fee
0 - 2,500 square feet	\$325.00
2,501 - 5,000 square feet	425.00
5,001 - 7,500 square feet	525.00
7,501 - 10,000 square feet	625.00
Each additional 5,000 square feet or fraction thereof	125.00
GRADING	
Item	Fee
Class I Slope Failure ¹	\$2500.00
Class II Slope Failure	2000.00
Class III Slope Failure	1500.00
Other Grading Code Violations	1000.00
MISCELLANEOUS	
Item	Fee
Banners, construction equipment, licenses, other structures, signs, uses and yards	\$100.00

1. Refer to Section 91.7003 for definition of slope failure classification.

SECTION 98.0412 INSPECTION FEES

The following fees when referenced to this section by other sections of Chapter IX of the *Los Angeles Municipal Code* shall be collected by the Department for the following types of inspections:

- (a) Minimum inspection fee ¹ \$65.00 per inspection
- (a1) Single fixtures ² \$40.00 per inspection

Exception: No permit or inspection shall be required for the installation or replacement of garbage disposals within individual dwelling units.

- (b) Additional inspection. 65.00 per inspection
- (c) Miscellaneous permits or inspections 65.00 each
- (d) Special equipment inspection 75.00 per hour or fraction thereof

- (e) Off-site inspection 75.00 per hour, minimum \$200.00

- (f) Witnessing performance test 75.00 per hour or fraction thereof

1. When the cumulative fees set forth in this Code are less than the minimum fee, the minimum fee shall be paid which shall include the issuing fee.
2. The fee for single fixture shall apply to the installation of only one electrical, plumbing or mechanical fixture / equipment and shall include the issuing fee.

SECTION 98.0414 CERTIFICATION FEES

Before accepting for filing any application for a Certificate of Qualification or a Maintenance Certificate of Registration, the Department shall collect from the applicant the following fees:

- (a) Certification of Qualification
 - 1. Initial application fee. \$50.00
 - 2. Subsequent application and examination fee. 50.00
 - 3. Annual renewal fee 25.00
- (b) Maintenance Certificate of Registration
 - 1. Initial certificate fee 150.00
 - 2. Annual renewal fee 150.00

SECTION 98.0415 CLERICAL, ISSUING OR RESEARCH FEES AND MISCELLANEOUS FEES

The Department may collect a fee from the applicant for the following types of services:

- (a) Correction of address for permit \$25.00
- (b) Transfer of name of permittee to any other person 35.00
- (c) Permit issuing fee for:
 - Electrical, plumbing, mechanical and elevator permits. 17.00
 - Building permits 20.00

- (d) Supplementary permit issuing fee. 14.00
- (e) Supplementary/miscellaneous plan check fee \$75.00 per hour or portion thereof
- (f) Fee for report ¹ \$75.00 per hour or portion thereof

1. A minimum fee of \$75.00 shall be payable when a request for a written report on a property or code item is made and any balance shall be due prior to the release of the report. Written reports for which this fee is applicable shall include, but not limited to, interpretation of the public records for the property (document research), termination of covenants and agreements, written interpretation of codes (municipal and/or other codes and regulations) and issuance of reports seeking the status of code violations, permitted use, etc. of a property or other similar purposes.

SECTION 98.0416 BUILDING AND SAFETY SYSTEMS DEVELOPMENT SURCHARGE

There shall be added to the total of all fees imposed for any permit, plan check, license, application, report and inspection provided for in Articles 1 through 8 of this chapter excluding Sections 91.6205.18, 91.107.4.4, 91.107.4.6, 98.0402(f), 98.0410, 98.0411, 98.0416, 98.0418 and 98.0716 of this Code a surcharge in the amount equal to the greater of six per cent of the fee or one dollar. All monies received from this surcharge shall be deposited to and expended as the "Building and Safety Systems Development Account" of the Department of Building and Safety Building Permit Enterprise Fund pursuant to Section 5.121.8 of the *Los Angeles Administrative Code*.

SECTION 98.0417 PROCESSING FEES FOR MISCELLANEOUS CERTIFICATES OF COMPLIANCE

The Department of Building and Safety shall charge a fee of \$21.00 for the processing of each Certified Licensed Contractor Certificate of Compliance. Such certificates shall be provided for each retrofit of a hot water heater, forced air unit, air-conditioning unit, plumbing fixture, solar panel, domestic water piping within a dwelling or accessory swimming pool, metallic water service piping, reroof, smoke detector, shower pan, masonry and concrete fences not exceeding six (6) feet in height replaced or installed, and masonry chimneys repaired as specified in Section 91.0306.4.

SECTION 98.0418 SURCHARGE FOR DEVELOPMENT OF AUTOMATED SYSTEMS FOR THE DEPARTMENT OF CITY PLANNING

There shall be added to the total of all fees imposed for any building permit required by the provisions of Article 1 of Chapter IX of this Code, an automated systems development surcharge in an amount equal to the greater of 6 percent of the fee or \$1.00, except that any other surcharge shall be excluded from the computation of the surcharge under this section. The Fire Hydrant Fee, Section 91.107.4.4, and the Arts Development Fee, Section 91.107.4.6, shall also be excluded from the computation of the surcharge under this section. In addition, an administrative fee of \$5.00 shall be collected each time the surcharge is collected. Moneys received from this surcharge shall

be deposited into the City Planning Systems Development Fund pursuant to *Los Angeles Administrative Code* Section 5.457, except that the \$5.00 fee shall be deposited into the General Fund and credited to the departmental receipts of the Department of Building and Safety.

SECTION 98.0420 REFUNDS OF DEPARTMENT FEES

No claim for refund of Department fees shall be allowed in whole or in part unless filed with the City Clerk within 12 months from the date of expiration of the permit/application or of any extensions granted by the Department or within 12 months from the date of any Department or Board action in which a valuation, as required by Chapter IX of the *Los Angeles Municipal Code*, is lowered pursuant to the provisions of Section 98.0403.1 of this Code. In the case a valuation is lowered, the refund shall be 100% of the difference paid and what should have been paid on all fees.

Insofar as the provisions of this section are in conflict with the provisions of Sections 22.12 and 22.13 of the *Los Angeles Municipal Code*, the language of this section shall be construed to control and supersede the language of said sections as to any such conflict.

SECTION 98.0421 INSPECTION FEE FOR CODE ENFORCEMENT INSPECTION

(a) **Code enforcement inspection fee.** The Department may impose a fee whenever an order is issued for the following:

1. The construction of a new structure, alteration, addition or mechanical installation without permits by the current owner of the property.
2. Maintenance of an open and vandalized vacant building.
3. Conversion of a residential garage, carport, patio or accessory building without the required permits.
4. Parking on a required front yard where parking is prohibited by Section 12.21 C.1.(g).
5. Lack of required pool enclosure.
6. Accumulation of trash and debris.
7. Hazardous conditions caused or allowed by the current property owner or tenant.
8. Use of a property which is not permitted by the Chapter 1 of the *Los Angeles Municipal Code*.

The fee shall be twice the minimum inspection fee specified in Section 98.0412. The fee may be imposed provided the property owner and tenant are notified of the proposed imposition of the fee and underlying violation by United States mail or in person at least ten days prior to the date of issuance of any order issued by the Department.

Exception: In order to protect the public health, safety and welfare and cause the timely abatement of vacant, vandalized buildings, the fee may be imposed without prior notification if the building is determined to be a

hazardous building and subject to the abatement procedures described in Section 91.8903, *et seq.*

- (b) **Notice.** If the Department determines that the inspection fee is due, then the person cited shall be notified by United States mail in a sealed envelope, with postage paid, addressed to the last known address of the person cited as the address appears in the last equalized assessment roll. Service of the notice shall be deemed to have been completed at the time of deposit with the United States Postal Service.
- (c) **Collection of the code enforcement inspection fee.** The person cited shall remit the inspection fee to the Department within 30 days after the date of mailing the notice. If the person cited fails to do so, then the Department may demand payment of the inspection fee from the person cited prior to the issuance of any permit, license or approval to the cited person. In addition to any other remedy provided by law, the City may collect any judgment, fee, cost, or charge, including any permit fees, fines, late charges, or interest, incurred in relation to the provisions of this section as provided in *Los Angeles Administrative Code* Sections 7.35.1 through 7.35.8.

SECTION 98.0422 FEES FOR OFF HOURS PLAN CHECK AND OTHER SERVICES

At the request of the applicant, the Department may, at its discretion, provide plan check or other services at other than normal working hours upon application therefor by an applicant. A fee, in addition to fees charged elsewhere in this code, equal to 50 percent of the fees for plan checking or other services or processing shall be collected at the time of the request.

DIVISION 5 — TESTING PROCEDURES, REGULATIONS AND ADMINISTRATION

SECTION 98.0501 ALTERNATE MATERIALS, DEVICES AND METHODS OF CONSTRUCTION

- (a) **General approvals.** The provisions of this Code are not intended to prevent the use of any material, device or method of construction not specifically prescribed by this Code, provided any such alternate has been approved and its use authorized by the Department. For the purpose of this section, "general approval" means approval by the Department of any device, material or method of construction which is not specifically provided for in Chapter IX of the *Los Angeles Municipal Code*.

The Department may grant a general approval for an alternate, provided that the alternate is at least the equivalent of the prescribed device, material or method of construction in the Code in terms of quality, effective time period of fire resistance, strength, effectiveness, durability and safety. The Department shall require that sufficient evidence or proof be submitted to substantiate any claims that may be made regarding the adequacy of any alternate device, material or method of construction.

The Department may accept as evidence, for purposes of Article 1 of Chapter IX of this Code, valid evaluation reports on alternate materials, devices or methods of construction developed and published by the International Conference of Building Officials Evaluation Service (ICBO ES). These reports may be based upon data from testing agencies not approved under Section 98.0503 of the *Los Angeles Municipal Code*.

The Department shall use Part III, Recognized Standard in addition to Part II, UBC Standards of Division 35 of Article 1 Chapter IX of the *Los Angeles Municipal Code* in evaluation products for approval where such standard exists for the product or the material and may use other approved standards which apply.

The Department may also accept as evidence valid evaluation reports developed and published by other nationally recognized model code organizations only under the following circumstances. Such reports may only be accepted if it is proven to the satisfaction of the Superintendent that the responsible organization utilizes a specially trained and experienced engineering review staff, and its standards of evaluation are at least equal to the Department's current evaluation standards.

Before accepting an evaluation report, the Department shall first verify that the code organization publishing the report has utilized a testing agency acceptance system which is reasonably equivalent to the current Department program for testing agency approval. This system must provide for conflict of interest safeguards, covering the agency itself, its owners and individual employees. These safeguards must be at least equivalent to those applied by the Department to approved testing agencies.

Before issuing general approvals based upon the evaluation reports, the Superintendent shall establish rules and regulations setting forth the procedures and conditions for the review of evaluation reports developed and published by the International Conference of Building Officials Evaluation Service (ICBO ES) or other nationally recognized model code organizations.

The Department determination on an application for general approval may be appealed to the Board of Building and Safety Commissioners under the applicable provisions of this article.

- (b) **Fees and term of general approvals.**

1. The application for a general approval of a new material, device or method of construction pursuant to Article 1 of Chapter IX of this Code, and the application for a two year renewal of a general approval shall be accompanied by a fee as set forth in Table 5-A.

An application for a technical or clerical modification of a general approval shall be accompanied by a fee as set forth in Table 5-A.

The fees for new general approvals and technical modifications include six hours of Department processing time.

The fees for renewals and clerical modifications include three hours and one hour of Department processing time respectively.

2. The fees for general approval of a new material or a new method of construction pursuant to Articles 2, 3, 4, 5 and 7 of Chapter IX of this Code shall be as provided in Section 98.0502(d).

The initial general approval, when granted, will be valid for one year. An application for renewal must be filed before the expiration of the latest approval or subsequent renewal and, when granted, will be valid for a two year period. Sale and installation shall conform to Section 98.0502(h).

3. The application fee for the initial review for Department approval of an evaluation report, pursuant to Article 1 of Chapter IX, shall be as set forth in Table 5-A. This fee shall be paid in lieu of any other application fee for a general approval described in this section.

A fee as set forth in Table 5-A shall also be required for Department review of any clerical or technical modifications of a valid evaluation report.

The fees for initial review of an evaluation report and for technical modifications of or additions to, a previously reviewed evaluation report include six and five hours of Department processing time, respectively.

The fees for clerical modifications include one hour of Department processing time.

If a general approval or renewal is based on an evaluation report issued by a nationally recognized model code organization acceptable to the Department, then the general approval and subsequent renewal shall be valid one year and two years respectively or as long as the unrevised evaluation report, including any renewals, is valid, whichever is less.

The Department shall review the evaluation reports created pursuant to this section and used as a basis for general approvals, prior to their expiration in order to verify that the reevaluation due dates of the reports remain unrevised and fully accurate in the records of the issuing model code organization. Evaluation reports renewed for two years shall be reviewed bi-annually. An administrative processing fee as set forth in Table 5-A covering the Department costs of the reevaluation review and report distribution shall be required from the entity holding the rights to the general approval.

The fees for review of two year reevaluation reports anticipate two hours of Department processing time;

4. The applicant shall agree in the application, to pay supplemental fees at the rate of \$75.00 per hour to cover any additional time required by the Department to process general approvals, renewals, reevaluations or modifications which are specified in Subdivisions 1 and 3 of this subsection and any conditional approvals pursuant to Subdivision 3 of Section 98.0403.2(a) of this Code. Processing shall include those activities directly related to the general approval for which application has been made and shall include all research, review, correspondence, clerical and consultation time pertinent to the application. The Department may require an estimated supplemental fee to be paid when the application is filed. In any event, the supplemental fee shall be paid in full prior to final action on the application by the Department.

The fees specified in this section, including supplemental fees, are application fees and are not refundable after the Department begins processing the application, regardless of whether the application is approved or denied.

Exception: Supplemental fees paid in advance which are in excess of the total actual fee are refundable;

5. All applications shall expire 12 months after the Department begins processing the application if the request for approval of a new material, device or method of construction has not been cleared of corrective orders and approved. No approval shall be issued until the application is refiled and a new fee paid.

Exception: The Department may grant an extension of time if the applicant submits in writing sufficient evidence that unusual conditions or circumstances precluded the approval within the allocated time.

- (c) **Off-hour processing of evaluation reports.** Upon request by an applicant and accepted by the Department, an off-hour processing fee per Section 98.0422 of the *Los Angeles Municipal Code* may be collected for processing of evaluation reports for alternate materials.
- (d) **Renewal.** Upon expiration of an approval or upon any change in design, material, method of construction or model designation made during the period of approval, it shall be unlawful to sell, offer for sale or use a product until a renewal has been approved under provisions of this section.
- (e) **Requests for extension of time.** Request for extension of time to file for renewals or obtain approval of general approvals, clerical and technical modifications, and renewals shall be made within 90 calendar days following the date of expiration of general approvals and applications for general approvals, modifications, and renewals. If such requests for extensions of time are not received within the allocated time, then a new filing fee shall be required.

**TABLE 5-A
FEE SCHEDULE**

ITEM	GENERAL APPROVAL OF RESEARCH REPORTS (BY LOS ANGELES CITY)	GENERAL APPROVAL OF EVALUATION REPORTS (BY A NATIONALLY RECOGNIZED MODEL CODE ORGANIZATION)
1. Initial application filing	\$2250.00	\$1350.00 ³ \$150.00 ⁴
2. Renewal application filing ¹ (two year)	\$1950.00	
3. Reevaluation application filing ² (two year)		\$600.00 ³ \$75.00 ⁴
4. Technical Modification	\$1000.00	\$1200.00 ³ \$150.00 ⁴
5. Clerical Modification	\$185.00	\$185.00 ³ \$100.00 ⁴

1. The Department may approve one year renewals for General Approval of Research Reports, if the applicant makes such a request in writing and submit sufficient evidence of the need for a one year renewal. The fee for a one year renewal shall be \$1,300.00 for General Approval of Research Reports.
2. The Department may approve one year reevaluations for General Approval of Fire- or Life- Safety Product Evaluation Reports, if the applicant makes such a request in writing and submit sufficient evidence of the need for a one year reevaluation. The fee for a one year reevaluation shall be \$400.00 for General Approval of Fire- or Life-Safety Product Evaluation Reports.
3. Fee for Fire-Safety or Life-Safety Products.
4. Fee for Non-Fire-Safety and Non-Life-Safety (non- structural) Products.

**SECTION 98.0502
APPLIANCES, FIXTURES AND EQUIPMENT**

- (a) **Scope.** All appliances, fixtures and equipment which are required by the respective Codes to be approved and for which standards are therein cited, or for which standards or specifications have been adopted by the Superintendent, shall be approved by the Department before they may be sold, installed or used.

For the purpose of this section, sale or selling shall refer to any act of selling, offering for sale, displaying or advertising for sale, loaning, renting, leasing, or disposing of by way of gift or premium or otherwise, in connection with the sale or disposal of equipment, fixtures or appliances as designated in this section.

A label or seal of an approved nationally recognized testing agency attached to an item or any identification marking corresponding to a published listing by an approved nationally recognized testing agency indicating that the item has been tested for compliance with the standards cited in the applicable Code or adopted by the Superintendent, and indicating that the item is included in the testing agency's factory follow-up inspection and listing service, will be accepted in lieu of approval by the Department.

This section shall not apply to general approvals issued pursuant to Section 98.0501(b) of this article and except for Subsections (d) and (h), shall not apply to general approvals issued pursuant to Section 98.0501(c) of this article.

- (b) **Authority of superintendent.** The Superintendent has the authority to establish standards, specifications and special requirements for materials and methods of construction when standards or specifications are not cited in the Code. The Superintendent has the authority to estab-

lish rules and regulations for the Mechanical Testing Laboratory and for the Electrical Testing Laboratory governing requirements for tests, examinations, procedures and approvals, and to establish supplemental fees, including mileage charges for field trips, and charges for examinations and inspections. The rules and regulations shall be in writing and on file in the Department and shall have the same force and effect as if they were included in any of the respective articles.

- (c) **Applications of tests and approvals.** Any person submitting any appliance, fixture or equipment for tests, examination, approval or renewal of approval, as required by this section, shall file an application therefore with the Department on forms provided by the Department.

A separate application shall be made for each item or appliance, fixture or equipment to be tested or examined, unless otherwise determined by the Department, and shall bear the signature of the applicant. When necessary, arrangements may be made for all or part of the tests and examinations to be conducted in the field. Should the testing facilities of the Department be inadequate to determine compliance with the standards, the Superintendent may use available facilities outside the Department, provided the applicant is first notified and the additional cost, if any, is approved by the applicant in writing, for invoicing to and payment by him. The Department may, at its discretion, accept tests and reports of tests by an approved testing agency as a basis in part or in full for granting an approval.

- (d) **Fees.** Applications for initial approvals and renewals pursuant to Articles 2, 3, 4, 5 and 7 of Chapter IX of this Code shall be accompanied by fees as follows:

1. Mechanical Testing Laboratory Fees

ITEM		LABORATORY APPROVAL FEE	GENERAL APPROVAL FEE
1.	Initial application filing*	\$800.00 (Including 8 hr. processing time but no field mileage)	\$900.00 (Including 8 hr. processing time but no field mileage)
2.	Renewal application filing*	\$600.00 (Including 5 hr. processing time but no field mileage)	\$600.00 (Including 5 hr. processing time but no field mileage)
3.	Processing time exceeding amount included with application **	\$75.00/hr	\$75.00/hr
4.	Field Mileage, when required. (Mileage based on one way, straight-line distance from Laboratory to test site)		
	0 to less than 15 miles	\$30.00/trip	\$30.00/trip
	15 to less than 30 miles	\$40.00/trip	\$40.00/trip
	30 miles and overmiles	\$40.00/trip plus \$1.00/mile over 30	\$40.00/trip plus \$1.00/mile over 30 miles
5.	Reopening file closed because required production sample not received within 60 days from date application submitted***	\$100.00	\$100.00
6.	Reopening file closed because previous approval expired for more than 30 days. Approval file shall not be reopened more than one year after expiration date. (This fee is in addition to the renewal fee).	\$200.00	\$200.00
7.	Technical Modification*	\$500.00 (Including 4 hr. processing time, but no field mileage)8.	\$500.00 (Including 4 hr. processing time, but no field mileage)

continued

2. Electrical Testing Laboratory Fees

ITEM	LABORATORY APPROVAL FEE	GENERAL APPROVAL FEE	FIELD APPROVAL FEE (one time approval)
1. Initial application filing*			
a. General purpose equipment			
(1) Simple equipment (applies only to less complex light fixtures or similar equipment)	\$500.00 (Including 4 hr. processing time but no field mileage)	\$1,000.00	\$850.00
(2) Complex equipment and systems	\$900.00	\$1,100.00	\$1,000.00
b. Equipment for hazardous areas			
(1) Simple equipment	N/A	\$1,000.00	N/A
(2) Complex equipment and systems	N/A	\$1,100.00	N/A
c. Medical Equipment			
(1) Simple equipment	\$900.00	\$1,000.00	\$900.00
(2) Complex equipment and systems	\$1,000.00	\$1,100.00	\$1,200.00
d. Equipment rated above 600 volts or above 60 Hertz (except appliances and light fixtures)			
(1) Simple equipment	N/A	\$1,000.00	\$900.00
(2) Complex equipment and systems	N/A	\$1,100.00	\$1,200.00
Note: All fees for initial application filing include 8 hour processing time but no field mileage except when noted.			
2. Annual Renewal application filing*	65% of Fee (Including 4 hr. processing time but no field mileage)	65% of Fee (Including 4 hr. processing time but no field mileage)	N/A
3. Processing time exceeding amount included with application**	\$75.00/hour	\$75.00/hour	\$75.00/hour
4. Field Mileage, when required. (Mileage based on one way, straight-line distance from laboratory to test site)			
0 to 15 miles	\$30.00/trip	\$30.00/trip	\$30.00/trip
15 to 30 miles	\$40.00/trip	\$40.00/trip	\$40.00/trip
30 miles and over	\$40.00/trip plus \$1.00/mile over 30 miles	\$40.00/trip plus \$1.00/mile over 30 miles	\$40.00/trip plus \$1.00/mile over 30 miles
5. Reopening file closed because of failure to respond to correction(s) or required production sample not received within 60 days from date of notification.***	\$100.00	\$100.00	\$100.00
6. Reopening file closed because previous approval expired for more than 30 days. Approval file shall not be reopened if not renewed for more than one year after expiration date. (This fee is in addition to the renewal fee and penalty fee)	\$200.00	\$200.00	\$200.00
7. Technical Modification *Note: Technical Modification approval time is only up to the expiration date of the application approval. This will not set a new approval time for the application.	\$500.00 (Including 4 hr. processing time but no field mileage)	\$500.00 (Including 4 hr. processing time but no field mileage)	
8. Clerical Modification (Revision of names and/or model numbers under current approval requiring no testing or examination)	\$155.00 (Including 1 hr. processing time but no field mileage)	\$155.00 (Including 1 hr. processing time but no field mileage)	
9. Multiple Listings (Additional models and product or firm names on approved products at time of application is submitted for approval or renewal)	\$40.00		
10. Department Approval Labels:			
a. Paper	\$0.10	\$0.10	N/A
b. Water Proof	\$1.50	\$1.50	N/A
c. One time only			No cost

* The applicant shall agree in writing, as part of the application, to pay supplemental fees for processing time, field mileage, and file reopening fees where necessary. These fees are in addition to application filing fee. The Department requires a deposit to cover the estimated total supplemental fees to be paid in advance. Initial applications will expire 12 months after the filing date if the equipment has not been cleared of corrections and approved. No approval shall be issued until the application is refilled or reopened and the penalty fees are paid.

** Processing time includes office and field review and testing, office and field consultation, field standby and travel time directly related to the application.

*** This fee is in addition to other fees specified in this section. The 60 day period may be extended by the Department when the applicant submits written evidence to the Department of a satisfactory reason for the extension.

NOTE: A file shall not be reopened after one year from date of expiration. The total actual fee for the application shall be determined by the Department on the basis of fees established by ordinance and shall be paid by the applicant whether or not an approval is granted. Fees paid in advance which are in excess of the total actual fees are refundable.

- (e) **Test samples.** At the time of filing the application, unless otherwise directed in writing by the Department, the applicant shall submit to the Electrical Testing Laboratory, or the Mechanical Testing Laboratory, or any testing agency as may be designated by the Department, a representative production sample of the material, device, appliance or equipment to be tested and examined, unless arrangements have been made for conducting the tests and examinations on a representative production sample in the field. Additional samples shall be made available as may be required.

All wiring diagrams and additional electrical samples, including components, special ingredients, or materials required by Subsection (f) shall be made available to the Department and conform to the standards which the electrical equipment must meet before approval can be considered as specified in Subsection (f). If the electrical item submitted for test is determined by the Department to be within the practical range of review by the Electrical Testing Laboratory, it shall be accepted and subjected to the tests required by Subsection (f). Samples shall be removed by the applicant or his authorized agent upon notification to do so by the Department, or they may be scrapped upon written authorization by the applicant. Samples unclaimed six (6) months after such notification shall be scrapped.

The Department is authorized, without liability to itself or to its authorized representatives, to subject samples to destructive tests as may be required to properly evaluate the tests and examinations.

- (f) **Standards.** Equipment requiring approval for use, sale or installation which does not fall within the scope of Code standards or those standards adopted by the Superintendent shall be tested for compliance with applicable portions of these standards. The Superintendent shall determine the specific standards or portions thereof to which any specific equipment must conform.
- (g) **Approvals.** Whenever any appliance, fixture or equipment has been found to comply with the provisions of this section and the applicable Code, the Department shall issue an approval therefor for a period of one year. This approval is subject in every case to continued compliance with the provisions of this section and any further amendments to this section, and is subject to the requirements of the applicable articles, except where such articles are in conflict herewith, and subject also in every case to any change in the test or approval requirements for any such material, device, appliance or equipment.

Items submitted for approval which fail to meet the test or examination requirements shall be corrected and resubmitted as set forth in the Mechanical Testing Laboratory or Electrical Testing Laboratory rules and regulations adopted by the Superintendent before an approval can be granted.

- (h) **Renewal of approval.** Upon expiration of an approval granted for any appliance, fixture or equipment, or upon any change in design, material, method of construction or model designation made during the period of approval, it shall be unlawful to sell, offer or advertise for sale, or

install the appliance, fixture or equipment until a renewal of approval has been granted under the provisions of this section.

Exception: Exact duplicates of approved products, bearing the label required by this section and manufactured before the approval expires, may be offered for sale and may be installed and used in conformance with this section and Article 3 of Chapter IX of the Municipal Code (Electrical Code). No equipment, fixture or appliance manufactured after the expiration of its approval may be placed on sale until it has been examined and approved by the annual reexamination service provided by the rules and regulations or otherwise approved by laboratories designated by the Superintendent.

- (i) **Identification of approval.** Each item of material, and each device, appliance, fixture or equipment approved under the provisions of this section, shall be identified as may be required by the applicable article of Chapter IX of the *Los Angeles Municipal Code* or by standards, specifications or rules and regulations under which the approval was granted.

Each item of electrical equipment, fixture or appliance approved under this article and Article 3 of Chapter IX of the Municipal Code (Electrical Code) shall bear the approval label of the department, attached in the manner determined by the standards, or otherwise made accessible for inspection without disassembly. Approval labels may be obtained only upon the written authorization of the applicant or his authorized representative and shall be available only during the year of approval. The applicant shall be held responsible for their use. No label shall be affixed to any item not currently approved by the department, nor shall the labels be transferred to the possession of any unauthorized person.

- (j) **Inspection.** Every person selling, offering or displaying for sale, renting or installing fixtures, appliances or equipment shall make such items available for inspection upon the request of the Department.

When equipment, fixtures or appliances are found not in accord with the provisions of this section or of the respective Codes, the Department shall give written notice to the person violating these provisions to remove them from sale or use. Any person failing to comply with the provisions of such notice shall be guilty of a misdemeanor and shall be subject to the penalties described in Section 11.00 of the *Los Angeles Municipal Code*.

Whenever the Superintendent learns or ascertains that any equipment, as defined in this Code, has become hazardous to life, health or property, he shall order, in writing, that such equipment be restored to a condition of safety or be dismantled or removed from its present location. The written notice shall fix a time limit for compliance with such order. No person shall use or maintain the defective equipment after receiving such notice.

- (k) **Revocation of approvals.** The Superintendent may suspend or revoke any approval if it is determined that the arti-

cle which has been approved is dangerous or unsuitable for the purpose intended, or is of a quality of material or workmanship not equivalent to that required by the Code or standards adopted by the Superintendent, or deviates from any of the conditions upon which the approval was granted, or for any of the reasons set forth in this article.

In any action to suspend or revoke an approval, the procedures prescribed by the provisions of this article shall be followed.

- (l) **Testing in applicants premises.** Testing in applicants premises may be conducted when the applicant submits written evidence to the Department of a satisfactory reason for such tests. The applicant shall agree in writing to pay all the expense for travel, transportation, board and lodging, and other miscellaneous expense required by ordinance.

The applicant shall agree in writing, as a part of the application, to pay supplemental fees at the rate of \$110.00 per hour to cover the time of travel and processing which is in excess of the amount of time provided for in the approval, renewal or modification fee specified in this section.

The applicant shall provide all equipment required for testing and assistance for the test. The applicant shall provide a safe environment for testing, protective equipment, and materials needed for conducting the test.

- (m) **Off-hour review of appliances, fixture and equipment.** Upon request by an applicant and accepted by the Department, an off-hour processing fee per Section 98.0422 of the *Los Angeles Municipal Code* may be collected for all services conducted by the Electrical and Mechanical Testing Laboratory.

SECTION 98.0503 TESTING AGENCIES

Whenever tests or certificates of any material or fabricated assembly thereof, or of any persons, are required by this chapter, such tests or certification shall be made by a testing agency approved by the Superintendent to conduct such tests or provide such certifications. Approvals of testing agencies shall be issued for a period of one year and may be renewed for additional one-year periods.

- (a) The Superintendent shall establish rules and regulations setting forth conditions and provisions precedent to the issuance of any such approval and for the conduct of any person or agency so approved.
- (b) A fee of \$800.00 shall accompany each application for approval and a renewal fee of \$600.00 shall accompany each application for renewal. A fee of \$450.00 shall be charged for the approval of each branch office in addition to the main office and a renewal fee of \$175.00 shall be charged for the renewal of each branch office in addition to the main office. A fee of \$450.00 shall accompany each application for a major modification and a fee of \$150.00 shall accompany each application for clerical modification.

Exception: Application fees shall not be required from those agencies, which are located in the United States of America, established and operating on a nonprofit basis, and

1. which have an approved reinspection service; or
2. which are public universities, colleges or testing facilities operated by a governmental agency.

The fees for approval of new Testing Agencies include four hours of Department processing time. The fees for major modifications of Testing Agencies and review of each branch testing laboratory include four hours of Department processing time. The fees for renewal and clerical modifications include three hours and one and one-half hours of Department processing time respectively.

The fees for application review, investigating and inspecting testing agencies for initial recognition, modifications or renewals shall be \$75.00 per hour for on-site laboratory inspections and follow-up laboratory inspections and are applicable to all testing and other types of product approval or evaluation agencies including those exempted from application fees in the foregoing exception. Such inspections performed at off-hours shall be charged a fee at the rate of one and one-half the hourly fee in this paragraph:

The applicant shall agree in writing, as part of the application, to pay supplemental fees at the rate of \$75.00 per hour to cover the time of processing which is excess of the time provided for in the approval, renewal or modification fee specified in this section. Processing shall include those activities directly related to the approval of Testing or other product approval Agencies for which an application has been made and shall include all research, review, correspondence, clerical and consultation time pertinent to the application. The Department may require an estimated supplemental fee to cover the time and travel expense which shall be paid at the time of filing the application and/or before any travel to laboratories outside of the State of California; however, the supplemental fee shall be paid in full prior to final action on the application by the Department.

The fees specified in this section, including supplemental fees, and application fees are not refundable once work has been performed by the Department, regardless of whether the action taken is approved or denied.

Exception: Supplemental fees paid in advance, which are in excess of the total actual fee shall be refundable.

Initial applications, modifications, renewals and branch approvals shall expire 12 months after the Department has started work on the application if the request for approval of a testing agency has not been cleared of corrections and approved. No approval shall be issued until the application is filed and a new fee paid.

Exception: The Department or the Board on appeal may grant extensions of time if an applicant submits in writing sufficient evidence that unusual conditions

or circumstances precluded the approval within the allocated time, provided that such appeals are submitted within the time period required by Section 98.0501(d)2.

- (c) The Superintendent may suspend or revoke an approval upon evidence of failure of the agency or person so approved to properly conduct any test or certify any material or assembly of material in a manner required by Chapter 9, or for any of the reasons set forth in this article.

In any action to suspend or revoke an approval, the procedure prescribed by the provisions of this article shall be followed.

- (d) In order to determine compliance with applicable rules or regulations, the Superintendent may inspect the premises of any testing agency approved or seeking Superintendent approval. Such inspection shall be conducted during regular working hours and at other reasonable times.

The Superintendent or his authorized representatives may, during the course of any investigation or inspection, obtain statistics, information or, other physical materials which are directly related to the purpose of the investigation or inspection.

The Superintendent may collect fees for the inspection of a testing agency as necessary to cover the actual cost of having an initial inspection performed.

An additional fee may, in the discretion of the Superintendent, be charged for necessary subsequent inspections to determine if applicable ordinances, rules, or regulations governing testing agencies have been and are being met.

The initial application for approval, and the renewal application shall include a statement that the applicant agrees to pay all inspection charges imposed pursuant to this subsection.

Whenever an inspection is conducted by Department personnel at facilities located more than 60 miles from Los Angeles City Hall, the applicant shall reimburse the City of Los Angeles for the cost thereof in accordance with the same charges as imposed for automobile and air travel, per diem and travel time as specified in Subsection 96.204(i) for inspection of fabrication facilities. These charges are the same for inspections initiated by the Department or requested by the applicant and are to be paid by the testing agency.

SECTION 98.0504 ENVIRONMENTAL REPORTS

- (a) A processing fee of \$600.00 shall be charged each applicant when the Department is required to perform an initial study or a negative declaration, to comply with the California Environmental Quality Act (CEQA). This fee shall include eight (8) hours of processing time.
- (b) A processing fee of \$1200.00 shall be charged each applicant when the Department is required to perform a mitigated negative declaration or Environmental Impact Report, to comply with the California Environmental Quality Act (CEQA) and shall be in addition to the fee

charged for an initial study or a negative declaration. This fee shall include twelve (12) hours of processing time.

- (c) The Department shall charge the applicant hourly fees for all staff time over the minimum number of hours specified above. The fee shall be \$75.00 per hour or fraction thereof for each additional hour involving the project California Environmental Quality Act (CEQA) review.

DIVISION 6 — EXPIRATION AND REVOCATION OF PERMITS, PLAN CHECK AND SLIGHT MODIFICATIONS AND ALTERNATIVES

SECTION 98.0601 PURPOSE

The purpose of this division is to establish requirements and procedures for the revocation by the Department of permits issued by the Department and to establish time limits for the validity of permits, plan checks and slight modifications.

(a) Department authority.

1. The Department shall have the authority to revoke any permit, slight modification, determination granted or made in reliance on a false statement or misrepresentation as to a material fact.
2. The Department shall have the authority to revoke any permit, slight modification, or determination whenever such action was granted in error or in violation of other provisions of the Code and conditions are such that the action should not have been allowed.

- (b) Board authority.** The Board shall have the authority to revoke any slight modification, or determination granted or made by the Board in reliance on a false statement or misrepresentation as to a material fact. The Board shall also have the authority to revoke any slight modification, determination granted or made by the Board whenever such action was granted in error or in violation of other provisions of the Code and conditions are such that the action should not have been allowed.

SECTION 98.0602 EXPIRATION OF PERMITS

- (a)** Every permit issued shall be valid for a period of two years from the date thereof, provided that any permit shall expire on the one hundred and eightieth (180) day from date of issuance if the work permitted thereunder has not been commenced; or shall expire whenever the Department determines the work authorized by any permit has been suspended, discontinued or abandoned for a continuous period of 180 days.

Exception: If the holder of any permit issued by the Department presents satisfactory evidence that unusual construction difficulties have prevented work from being started or continued without being suspended within the 180-day time period or completed within the two-year period of validity, the Department or the Board may grant extensions of time reasonably necessary because of such difficulties.

Notwithstanding the provisions of this subsection, the validity of a permit may be further restricted in the following conditions:

1. In the case that a building or structure has been ordered repaired or demolished in accordance with Section 91.8903, 91.8904 or 91.8905 of the Code such time limits as are specified therein shall apply.

2. The Department or the Board may, because of unusual circumstances or conditions such as, but not limited to, the demolition of an imminently hazardous building, or a grading operation which may be subject to flooding during the rainy season, impose restrictions upon the time limits for expiration of any permit.
 3. The time limit of validity of relocation permits shall be as specified in Section 91.8306 of the Code.
 4. The time limit of validity of tent permits shall be as specified in Section 91.5501 of the Code.
 5. The time limit of validity of permits for the installation of metal bars, grills, grates, security roll-down shutters, and similar devices, and of quick-release systems shall be as specified in Section 91.1204 of the Code.
- (b)** Permits which have expired shall have the site, building or project restored to the condition which existed immediately prior to the commencement of work described by such permit.
- (c)** It shall be unlawful for any owner, either before or after the issuance of a permit under this section, and notwithstanding the issuance of such permit, to fail to comply with any order, determination or action of the Department or Board.

SECTION 98.0603 EXPIRATION OF PLAN CHECK

If a permit is not secured within 18 months after plans have been filed for checking such plan check shall expire and no permit shall be issued until the plans are rechecked and approved and a new plan check fee paid.

Exception: The Department or the Board may grant extensions of time if a permit applicant submits in writing sufficient evidence that unusual conditions or circumstances precluded the securing of the permit within the allocated time.

SECTION 98.0604 EXPIRATION OF SLIGHT MODIFICATIONS AND ALTERNATIVES

The rights and privileges granted by the Department or the Board under a slight modification shall be voided if the permit is not secured within 18 months of the date the modification was granted or if the permit expires under any of the conditions specified in Section 98.0602 of the *Los Angeles Municipal Code*.

Exception: The Department or the Board may grant extensions of time if a permit applicant submits in writing substantial evidence that unusual conditions or circumstances precluded the securing of the permit within the allocated

time or caused the permit to expire as specified in Section 98.0603 of the *Los Angeles Municipal Code*.

SECTION 98.0605

TIME LIMITS OF REQUESTS FOR EXTENSION

Requests for extensions of time on the expiration times of permits, plan checks, slight modifications shall not be made not later than 30 days after the expiration time specified in this division.

DIVISION 7 — ABATEMENT OF VACANT BUILDINGS

SECTION 98.0701 DECLARATION OF PURPOSE

The Council of the City of Los Angeles finds and declares that:

- (a) Structures that are vacant and unsecured or barricaded attract vagrants, gang members and other criminals as prime locations to conduct illegal criminal activities.
- (b) Structures that are vacant and not properly secured are extremely vulnerable to being set on fire by unauthorized persons.
- (c) Structures that are vacant and unsecured or barricaded are a blight and cause deterioration and instability in neighborhoods.
- (d) Structures that are vacant and unsecured or barricaded pose serious threats to the public's health and safety and therefore are declared to be public nuisances.
- (e) Immediate abatement and rehabilitation of these structures is necessary and can be accomplished by using the judicial or administrative procedures found in this Code.

SECTION 98.0702 DEFINITIONS

The following words and phrases, whenever used in this division, shall be construed as defined in this section. Words and phrases not defined herein shall be construed as defined in Sections 12.03 and 91.201, *et seq.* of this Code.

"Responsible Person" means the owner and/or person in charge or control of the Vacant Structure.

"Superintendent" means the General Manager of the Department of Building and Safety or his or her duly authorized representative.

"Statement of Intent" means a form filled out by the responsible person of a Vacant Structure which contains specific information regarding the structure and the owner's plan for its rehabilitation and maintenance, or demolition.

"Vacant Structure" means any structure or building that:

- 1) is unoccupied or occupied by unauthorized persons; and
- 2) is unsecured or barricaded.

SECTION 98.0703 ENFORCEMENT AUTHORITY

The Superintendent is authorized to administer and enforce the provisions of this division. The Superintendent or anyone designated by the Superintendent may exercise any enforcement powers as provided in Chapter IX of this Code.

SECTION 98.0704 ENFORCEMENT REMEDIES

Violations of this division may be prosecuted as misdemeanors subject to the fines and custody provided in Section 11.00(m)

of this Code. The Superintendent may also seek injunctive relief and civil penalties in the Superior Court pursuant to Section 98.0716 of this Code or pursue any administrative remedy provided in Chapter IX of this Code.

SECTION 98.0705 STRICT LIABILITY OFFENSES

Violations of this division shall be treated as strict liability offenses regardless of intent.

SECTION 98.0706 DUTY TO CLEAN, FENCE AND BARRICADE

- (a) It is unlawful for the Responsible Person to fail to remove any waste, rubbish, debris, flammable, combustible, or hazardous materials from the interior of the Vacant Structure.
- (b) It is unlawful for the Responsible Person to fail to remove any waste, rubbish, debris, excessive vegetation, inoperable vehicles, trailers, appliances, and any other similar materials from the yards surrounding the Vacant Structure.
- (c) It is unlawful for the Responsible Person to fail to lock, barricade or secure all doors, windows, damaged walls, roofs, foundations and other openings of the Vacant Structure.
- (d) It is unlawful for the Responsible Person to fail to fence the entire lot containing the Vacant Structure.
- (e) It is unlawful for the Responsible Person to fail to post the property containing the Vacant Structure with signs stating **"THIS PROPERTY CLOSED TO THE PUBLIC"** in accordance with Section 41.24 of this Code.
- (f) It is unlawful for the Responsible Person to fail to file written trespass authorization request with the police department pursuant to Section 41.24(g) of this Code to authorize a peace officer's assistance in removing trespassers from the property containing the Vacant Structure.

SECTION 98.0707 ADMINISTRATIVE ABATEMENT PROCEDURES FOR VACANT AND UNSECURED STRUCTURES

- (a) Whenever the Superintendent determines that a vacant and unsecured structure exists within the City of Los Angeles, an abatement notice and order may be sent to the Responsible Person directing abatement by cleaning, fencing and securing or barricading. Barricading and fencing shall be done pursuant to the standards established in Section 91.8904.1 of this Code.
- (b) The Superintendent shall follow the administrative abatement procedures set forth in Division 89 of Article 1 of Chapter IX of this Code.

- (c) If the Responsible Person does not comply with the abatement notice and order, and no appeal is filed, the Superintendent may:

- 1) clean, remove graffiti, fence, and barricade the unsecured Vacant Structure;
- 2) post the property containing the Vacant Structure pursuant to Section 98.0714 of this Code; and
- 3) recover all costs pursuant to the procedures set forth in Division 89 of Article 1 of Chapter IX of this Code.

SECTION 98.0708 STANDARDS FOR FENCING AND BARRICADING A VACANT STRUCTURE

The Responsible Person shall barricade the Vacant Structure according to the following specifications and requirements:

- (a) Remove all waste, rubbish, debris, flammable, combustible, or hazardous materials from the interior of the structure; and
- (b) Remove all waste, rubbish, debris, excessive vegetation, inoperable vehicles, trailers, appliances, and any other similar materials from the yards surrounding the Vacant Structure; and
- (c) Barricade all unsecured doorways, windows, damaged walls, roofs, foundations or exterior openings in accordance with the requirements of Division 89 of Article 1 of Chapter IX of this Code; and
- (d) Fence the entire lot surrounding the Vacant Structure in accordance with the requirements of Division 89 of Article 1 of Chapter IX of the Code; and
- (e) Post the property containing the Vacant Structure with signs stating that the property is closed to the general public in accordance with the requirements of Section 41.24 of this Code.

SECTION 98.0709 ENTRY OR INTERFERENCE WITH NOTICE PROHIBITED

- (a) It is unlawful for any person to enter or occupy any structure or premises which has been posted pursuant to Section 91.8903.1.5, 91.8904.1, or 98.0708(e) of this Code, except to repair or demolish the structure under proper permit or for a purpose authorized by the owner.
- (b) It is unlawful for any person to remove or deface any notice posted pursuant to Section 91.8903.1.5, 91.8904.1, 98.0708(e) or 98.0714 of this Code.

SECTION 98.0710 CONTINUOUS ABATEMENT AUTHORITY

- (a) If a Vacant Structure, previously abated by the Responsible Person or the Superintendent pursuant to a notice and order, again becomes unsecured and open to unauthorized entry, the Superintendent may proceed to abate the nuisance and recover costs pursuant to Division 89 of Article 1 of Chapter IX of this Code.

sance and recover costs pursuant to Division 89 of Article 1 of Chapter IX of this Code.

- (b) If the yards surrounding a Vacant Structure, previously abated by the Responsible Person or the Superintendent pursuant to a notice and order, again contain graffiti, waste, rubbish, debris, excessive vegetation, inoperable vehicles, trailers, appliances, and any other similar materials, the Superintendent may proceed to abate the nuisance and recover costs pursuant to Division 89 of Article 1 of Chapter IX of this Code.

SECTION 98.0711 ABATEMENT COST

- (a) Abatement costs shall include the cost to perform the actual work and the City's cost to administer any abatement.
- (b) Once the abatement is complete, the Superintendent shall recover all abatement costs pursuant to the procedure found in Division 89 of Article 1 of Chapter IX of this Code.

SECTION 98.0712 CONTINUOUS PUBLIC NUISANCES

Any Vacant Structure that was originally secured by the Responsible Person's voluntary actions or pursuant to administrative or judicial order may be declared a permanent public nuisance by the Superintendent if the structure subsequently becomes open and unsecured, thereby requiring additional reinspection and resecuring of the structure by either the Responsible Person or the Superintendent. The Superintendent may seek demolition of this continuous public nuisance by seeking a court order or by following any of the administrative abatement procedures set forth in Division 89 of Article 1 of Chapter IX of this Code.

SECTION 98.0713 DUTY TO FILE A STATEMENT OF INTENT

- (a) The Superintendent shall create and make available a form entitled "**Statement of Intent**" to be completed by the Responsible Person.
- (b) The Responsible Person shall complete the information required on the standard Statement of Intent and submit the Statement to the City within 30 days of the date the Superintendent determines that the structure meets the definition of a Vacant Structure.
- (c) The Superintendent shall determine whether a submitted Statement of Intent is complete and may require the Responsible Person to provide more complete information.
- (d) When a submitted Statement of Intent does not meet with the Superintendent's approval, the Responsible Person shall immediately correct and resubmit the Statement of Intent.

- (e) The Statement of Intent shall include all of the following information as to:
 - (1) expected period of vacancy; and
 - (2) a plan for regular maintenance during the period of vacancy; and
 - (3) a plan and time line for the lawful occupancy, rehabilitation or demolition of the barricaded structure; and
 - (4) any additional information required by the Superintendent.
- (f) It is unlawful to:
 - (1) fail to submit a Statement of Intent within the time period specified by Subsection (b) of this section; or
 - (2) submit a Statement of Intent which does not meet with the approval of the Superintendent or otherwise comply with the requirements of this section.

SECTION 98.0714 POSTING NAME OF RESPONSIBLE PERSON

The Responsible Person shall permanently affix, in a conspicuous place on the Vacant Structure, a notice stating the name, address, and telephone number of both the owner and the owner's agent in charge or control of the Vacant Structure. If the Responsible Person fails to affix this notice on the Vacant Structure within 30 days of the date the Superintendent determines that the structure meets the definition of a Vacant Structure, then the Department may cause the same to be permanently affixed to the Vacant Structure, using the name, address and telephone number for the owner(s) as shown on a title report obtained from either the Division of Real Estate, Bureau of Engineering, Department of Public Works, City of Los Angeles or by contracting with one or more private title reporting agencies. Said title report shall list all persons shown on the records of the County Recorder as having an ownership interest or liens or encumbrances or other interests in the real property on which the Vacant Structure is located.

SECTION 98.0715 REINSPECTION FEE

The Superintendent may periodically reinspect Vacant Structures to ensure compliance with the provisions of this division and all applicable court and administrative orders. The Superintendent may impose a reinspection fee against the Responsible Person for actual costs of each reinspection and continuous monitoring of the structure and premises as is reasonably necessary to determine compliance with the standards and procedures in this division. The Superintendent shall follow the procedures set forth in Sections 91.8904.3, 98.0411 or 98.0412 of this Code.

SECTION 98.0716 VACANT STRUCTURE PENALTY

- (a) Any Responsible Person in charge of a structure which meets the definition of a Vacant Structure as provided in

this division for 90 consecutive calendar days may be liable for a civil penalty in the amount of \$500 per structure, not to exceed \$2,000 per calendar year unless:

- (1) A Statement of Intent has been filed and approved by the Superintendent; and
- (2) The building has been posted as required by Section 98.0714 of this Code; and
- (3) One of the following applies:
 - (A) The structure is the subject of an active building permit for repair, rehabilitation or demolition and the owner is proceeding diligently in good faith to complete the repair, rehabilitation or demolition; or,
 - (B) The structure is maintained in compliance with this division and is actively being offered for sale, lease or rent; or,
 - (C) The Responsible Person can demonstrate that he or she made a diligent and good faith effort to implement the actions set forth in the approved Statement of Intent within the time line contained within the Statement of Intent.
- (b) If the structure continues to meet the definition of Vacant Structure as provided in this division beyond the initial 90 calendar days, and if the Responsible Person does not meet any of the exceptions set forth in this section, the Superintendent may continue to impose a penalty of \$500 for each 90 calendar day period the structure continues to constitute a Vacant Structure. At no time may the amount of the civil penalty exceed \$2,000 per structure in a calendar year.

SECTION 98.0717 PROCEDURES FOR BARRICADED AND VACANT STRUCTURE PENALTY

- (a) Whenever the Superintendent determines that a structure meets the definition of a Vacant Structure as provided in this division for more than 90 consecutive calendar days, and the Responsible Person does not meet any of the exceptions set forth in Section 98.0716(a), a Notice of Barricaded and Vacant Structure Penalty may be issued to the Responsible Person, and any other person listed in the title report as having an interest in the real property.
- (b) A separate Notice of Barricaded and Vacant Structure Penalty shall be issued for each subsequent penalty that may be imposed pursuant to Section 98.0716.
- (c) The Notice of Barricaded and Vacant Structure Penalty shall be served on each required person by any one of the methods of service listed in Section 91.8903.3.4 of this Code.

**SECTION 98.0718
APPEAL OF BARRICADED AND VACANT
STRUCTURE PENALTY**

An appeal of a Barricaded and Vacant Structure Penalty shall follow the procedures set forth in Section 98.0411 of this Code.

**SECTION 98.0719
ADMINISTRATIVE ENFORCEMENT HEARING**

- (a) The appeal hearing shall follow the enforcement hearing procedures set forth in Section 98.0403.2(b) of this Code.
- (b) The Board shall only consider evidence that is relevant to the following issues:
 - (1) Whether the structure meets the definition of Vacant Structure as provided in this division for 90 consecutive calendar days;
 - (2) Whether an approved Statement of Intent has been filed and approved by the Superintendent; and
 - (3) Whether any of the exceptions set forth in Section 98.0916(a)(2)(A) through (C) have been met.
- (c) The Board may impose administrative costs.

**SECTION 98.0720
FAILURE TO PAY PENALTIES**

The failure of any person to pay the penalty within the time specified in the Notice of Barricaded and Vacant Structure Penalty may result in the Superintendent using any legal means to recover the civil penalties, including filing a claim with the Small Claims Court or following the procedures set forth in Section 91.8906 of this Code.

**SECTION 98.0721
ALLOCATION OF VACANT BUILDING PENALTY**

Administrative civil penalties collected pursuant to this division shall be deposited in the appropriate fund as determined by the Superintendent.

CHAPTER XI, ARTICLE 1 NOISE REGULATION

SECTION 111.00 DECLARATION OF POLICY

It is hereby declared to be the policy of the City to prohibit unnecessary, excessive and annoying noises from all sources subject to its police power. At certain levels noises are detrimental to the health and welfare of the citizenry and in the public interests shall be systematically proscribed.

SECTION 111.01 DEFINITIONS

Unless the context otherwise clearly indicates, the words and phrases used in this chapter are defined as follows:

- (a) **"Ambient Noise"** is the composite of noise from all sources near and far in a given environment, exclusive of occasional and transient intrusive noise sources and of the particular noise source or sources to be measured. Ambient noise shall be averaged over a period of at least 15 minutes at a location and time of day comparable to that during which the measurement is taken of the particular noise source being measured.
- (b) **"Commercial Purpose"** is the use, operation, or maintenance of any sound amplifying equipment for the purpose of advertising any business, goods, or services, or for the purpose of attracting the attention of the public to, advertising for, or soliciting patronage or customers to or for any performance, show, entertainment, exhibition, or event, or for the purpose of demonstrating such sound equipment.
- (c) **"Decibel"** (dB) is a unit of level which denotes the ratio between two (2) quantities which are proportional to power; the number of decibels corresponding to the ratio of two (2) amounts of power is ten (10) times the logarithm to the base (10) of this ratio.
- (d) **"Emergency Work"** is work made necessary to restore property to a safe condition following a public calamity or work required to protect persons or property from an imminent exposure to danger, or work by private or public utilities when restoring utility service.
- (e) **"Impulsive Sound"** is sound of short duration, usually less than one second, with an abrupt onset and rapid decay. By way of example **"impulsive sound"** shall include, but shall not be limited to, explosions, musical base drum beats, or the discharge of firearms.
- (f) **"Motor Vehicle"** includes, but shall not be limited to, automobiles, trucks, motorcycles, minibikes and go-carts.
- (g) **"Noncommercial Purpose"** is the use, operation, or maintenance of any sound equipment for other than a "commercial purpose". "Noncommercial purpose" shall mean and include, but shall not be limited to, philanthropic, political, patriotic, and charitable purposes.
- (h) **"Octave Band Noise Analyzer"** is an instrument for measurement of sound levels in octave frequency bands which satisfies the pertinent requirements for Class II octave band analyzers of the American National Standard Specifications for Octave, Half-Octave, and Third-Octave Band Filters, S1.11-1966 or the most recent revision thereof.
- (i) **"Person"** is a person, firm, association, co-partnership, joint venture, corporation, or any entity, private or public in nature.
- (j) **"Sound Amplifying Equipment"** is any machine or device for the amplification of the human voice, music or any other sound, but shall not include:
 - 1. Automobile radios, stereo players or television receivers when used and heard only by the occupants of the vehicle in which the same is installed.
 - 2. Radio, stereo players, phonographs or television receivers used in any house or apartment within any residential zone or within 500 feet thereof.
 - 3. Warning devices on emergency vehicles.
 - 4. Horns or other warning devices authorized by law on any vehicle when used for traffic purposes.
- (k) **"Sound Level"** (Noise level) in decibels (dB) is the sound measured with the "A" weighting and slow responses by a sound level meter; except for impulsive or rapidly varying sounds, the fast response shall be used.
- (l) **"Sound Level Meter"** is an instrument including a microphone, an amplifier, an output meter, and "A" frequency weighting network for the measurement of sound levels which satisfies the pertinent requirements for Type S2A meters in American Standard Specifications for sound level meters in S1.4-1971 or the most recent revision thereof.
- (m) **"Sound Truck"** is any motor vehicle, or any other vehicle regardless of motive power, whether in motion or stationary, which carries, is equipped with, or which has mounted thereon, or attached thereto, any sound amplifying equipment.
- (n) **Supplementary Definitions of Technical Terms.** Definitions of technical terms not defined herein shall be obtained from American Standard Acoustical Terminology S1-1-1971 or the most recent revision thereof.

SECTION 111.02 SOUND LEVEL MEASUREMENT PROCEDURE AND CRITERIA

- (a) Any sound level measurement made pursuant to the provisions of this chapter shall be measured with a sound level meter using the "A" weighting and response as indicated in Section 111.01(k) of this article.

Except when impractical, the microphone shall be located four to five feet above the ground and ten feet or more from the nearest reflective surface. However, in those cases where another elevation is deemed appropriated, the latter shall be utilized.

Interior sound level measurements shall be made at a point at least four feet from the wall, ceiling, or floor nearest the noise source.

Calibration of the sound level meter, utilizing an acoustic calibrator shall be performed immediately prior to recording any sound level data. The ambient noise level and the level of a particular noise being measured shall be the numerical average of noise measurements taken at a given location during a given time period.

- (b) Where the sound alleged to be offending is of a type or character set forth below, the following values shall be added to the sound level measurement of the offending noise:

1. Except for noise emanating from any electrical transformer or gas metering and pressure control equipment existing and installed prior to the effective date of the ordinance enacting this chapter, any steady tone with audible fundamental frequency or overtones have 200 Hz +5

2. Repeated impulsive noise +5

3. Noise occurring more than 5 but less than 15 minutes in any period of 60 consecutive minutes between the hours of 7:00 a.m. and 10:00 p.m. of any day -5

4. Noise occurring five minutes or less in any period of 60 consecutive minutes, between the hours of 7:00 a.m. and 10:00 p.m. of any day -5

- (c) For those cases where an objectionable noise is clearly audible, but where the level of ambient noise does not permit direct quantitative sound level "A" measurements of the objectionable noise, sound measurements may be performed utilizing an octave band sound analyzer to determine sound level "A" limits as indicated in the Table I below. This table is used to convert the sound pressure level meter readings in dB for each band to SPL in dB(A) for each band.

SECTION 111.03 MINIMUM AMBIENT NOISE LEVEL

Where the ambient noise level is less than the presumed ambient noise level designated in this section, the presumed ambient noise level in this section shall be deemed to be the minimum ambient noise level for purposes of this chapter.

TABLE I
OCTAVE BAND NOISE VALUES CORRESPONDING TO SOUND LEVEL "A" VALUES

SOUND LEVEL	OCTAVE BAND SOUND PRESSURE LEVEL, dB re .0002 dyne/cm ² OCTAVE BAND CENTER FREQUENCY IN Hz								
	31.5	63	125	250	500	1000	2000	4000	8000
"A"	31.5	63	125	250	500	1000	2000	4000	8000
35	58	50	42	35	32	29	26	23	20
40	61	54	46	40	37	34	31	28	25
45	64	58	51	45	42	39	36	33	30
50	67	61	55	50	47	44	41	38	35
55	70	64	60	55	52	49	46	43	40
60	73	68	64	60	57	54	51	48	45
65	76	72	68	65	62	59	56	53	50
70	79	76	73	70	67	64	61	58	55
75	84	81	78	75	72	69	66	63	60

TABLE II
SOUND LEVEL "A" DECIBELS

(In this chart, daytime levels are to be used from 7:00 a.m. to 10:00 p.m. and nighttime levels from 10:00 p.m. to 7:00 a.m.)

ZONE	PRESUMED AMBIENT NOISE LEVEL (dB(A))	
	Day	Night
A1, A2, RA, RE, RS, RD, RW1, RW2, R1, R2, R3, R4, and R5	50	40
P, PB, CR, C1, C1.5, C2, C4, C5, and CM	60	55
M1, MR1, and MR2	60	55
M2 and M3	65	65

At the boundary line between two zones, the presumed ambient noise level of the quieter zone shall be used.

SECTION 111.04 VIOLATIONS: ADDITIONAL REMEDIES, INJUNCTIONS

As an additional remedy, the operation or maintenance of any device, instrument, vehicle, or machinery in violation of any provision of this chapter, which operation or maintenance causes discomfort or annoyance to reasonable persons or which endangers the comfort, repose, health, or peace of residents in the area, shall be deemed and is declared to be a public nuisance and may be subject to abatement summarily by a restraining order or injunction issued by a court order of competent jurisdiction.

SECTION 111.05 ENFORCEMENT, CITATIONS

- (a) The Department of Building and Safety shall have the power and duty to enforce the following noise control provisions of this Code: Section 12.14A-6(h), Section 12.19A-4(b)(1), Section 112.02 and Section 112.04(c).
- (b) The Police Department shall have the power and duty to enforce the following noise control provisions of this Code: Section 41.32, Section 41.40, Section 41.42, Section 41.44, Section 41.57, Section 63.51(m), Section 112.01, Section 112.04, Section 112.05, Section 112.06, Section 113.01, Section 114.01 through Section 114.05, inclusive, Section 115.02, and Section 116.01.
- (c) Any Building Mechanical Inspector assigned to noise enforcement inspection shall have the power, authority and immunity of a public officer and employee, as set forth in the Penal Code of the State of California, Section 836.5, to make arrests without a warrant whenever such employee has reasonable cause to believe that the person to be arrested has committed a misdemeanor in his presence which is a violation of any provision set forth in Section 111.05(a) of this chapter. The provisions of said Penal Code section regarding issuance of a written promise to appear shall be applicable to arrests authorized herein.

ARTICLE 2 SPECIAL NOISE SOURCES

SECTION 112.01 RADIOS, TELEVISION SETS, AND SIMILAR DEVICES

- (a) It shall be unlawful for any person within any zone of the City to use or operate any radio, musical instrument, phonograph, television receiver, or other machine or device for the producing, reproducing or amplification of the human voice, music, or any other sound, in such a manner, as to disturb the peace, quiet, and comfort of neighbor occupants or any reasonable person residing or working in the area.
- (b) Any noise level caused by such use or operation which is audible to the human ear at a distance in excess of 150 feet from the property line of the noise source, within any resi-

dential zone of the City or within 500 feet thereof, shall be a violation of the provisions of this section.

- (c) Any noise level caused by such use or operation which exceeds the ambient noise level on the premises of any other occupied property, or if a condominium, apartment house, duplex, or attached business, within any adjoining unit, by more than five (5) decibels shall be a violation of the provisions of this section.

SECTION 112.02 AIR CONDITIONING, REFRIGERATION, HEATING, PUMPING, FILTERING EQUIPMENT

- (a) It shall be unlawful for any person, within any zone of the city to operate any air conditioning, refrigeration or heating equipment for any residence or other structure or to operate any pumping, filtering or heating equipment for any pool or reservoir in such manner as to create any noise which would cause the noise level on the premises of any other occupied property or if a condominium, apartment house, duplex, or attached business, within any adjoining unit, to exceed the ambient noise level by more than five (5) decibels
- (b) This section shall not be applicable to emergency work as defined in Section 111.01(c) of this chapter, or to periodic maintenance or testing of such equipment reasonably necessary to maintain such equipment in good working order.

SECTION 112.03 CONSTRUCTION NOISE

Noise due to construction or repair work shall be regulated as provided by Section 41.40 of this Code.

SECTION 112.04 POWERED EQUIPMENT INTENDED FOR REPETITIVE USE IN RESIDENTIAL AREAS AND OTHER MACHINERY, EQUIPMENT, AND DEVICES

- (a) Between the hours of 10:00 p.m. and 7:00 a.m. of the following day, no person shall operate any lawn mower, backpack blower, lawn edger, riding tractor, or any other machinery, equipment, or other mechanical or electrical device, or any hand tool which creates a loud, raucous or impulsive sound, within any residential zone or within 500 feet of a residence.
- (b) Except as to the equipment and operations specifically mentioned and related elsewhere in this Chapter or for emergency work as that term is defined in Section 111.01(d), and except as to aircraft, tow tractors, aircraft auxiliary power units, trains and motor vehicles in their respective operations governed by State or federal regulations, no person shall operate or cause to be operated any machinery, equipment, tools, or other mechanical or electrical device, or engage in any other activity in such manner as to create any noise which would cause the noise level on the premises of any other occupied property, or, if a condominium, apartment house, duplex, or attached

business, within any adjoining unit, to exceed the ambient noise level by more than five (5) decibels.

- (c) Notwithstanding the provisions of Subsection (a) above, no gas powered blower shall be used within 500 feet of a residence at anytime. Both the user of such a blower as well as the individual who contracted for the services of the user, if any, shall be subject to the requirements of and penalty provisions for this ordinance. Violation of the provisions of this subsection shall be punishable as an infraction in an amount not to exceed One Hundred Dollars (\$100.00), notwithstanding the graduated fines set forth in LAMC § 11.00(m).

SECTION 112.05 MAXIMUM NOISE LEVEL OF POWERED EQUIPMENT OR POWERED HAND TOOLS

Between the hours of 7:00 a.m. and 10:00 p.m., in any residential zone of the City or within 500 feet thereof, no person shall operate or cause to be operated any powered equipment or powered hand tool that produces a maximum noise level exceeding the following noise limits at a distance of 50 feet therefrom:

- (a) 75dB(A) for construction, industrial, and agricultural machinery including crawler-tractors, dozers, rotary drills and augers, loaders, power shovels, cranes, derricks, motor graders, paving machines, off-highway trucks, ditchers, trenchers, compactors, scrapers, wagons, pavement breakers, compressors and pneumatic or other powered equipment;
- (b) 75dB(A) for powered equipment of 20 HP or less intended for infrequent use in residential areas, including chain saws, log chippers and powered hand tools;
- (c) 65dB(A) for powered equipment intended for repetitive use in residential areas, including lawn mowers, backpack blowers, small lawn and garden tools and riding tractors;

The noise limits for particular equipment listed above in (a), (b) and (c) shall be deemed to be superseded and replaced by noise limits for such equipment from and after their establishment by final regulations adopted by the Federal Environmental Protection Agency and published in the Federal Register.

Said noise limitations shall not apply where compliance therewith is technically infeasible. The burden of proving that compliance is technically infeasible shall be upon the person or persons charged with a violation of this section. Technical infeasibility shall mean that said noise limitations cannot be complied with despite the use of mufflers, shields, sound barriers and/or other noise reduction device or techniques during the operation of the equipment.

SECTION 112.06. PLACES OF PUBLIC ENTERTAINMENT

It shall be unlawful for any person to operate, play, or to permit the operation or playing of any radio, television receiver, phonograph, musical instrument, sound amplifying equipment, or similar device which produces, reproduces, or amplifies sound

in any place of public entertainment at a sound level greater than 95dB(A) at any point that is normally occupied by a customer, unless a conspicuous and legible sign is located outside such place, near each public entrance, stating:

**“WARNING: SOUND LEVELS WITHIN MAY CAUSE
HEARING IMPAIRMENT.”**

ARTICLE 6 GENERAL NOISE

SECTION 116.01 LOUD, UNNECESSARY AND UNUSUAL NOISE

Notwithstanding any other provisions of this chapter and in addition thereto, it shall be unlawful for any person to willfully make or continue, or cause to be made or continued, any loud, unnecessary, and unusual noise which disturbs the peace or quiet of any neighborhood or which causes discomfort or annoyance to any reasonable person of normal sensitiveness residing in the area. The standard which may be considered in determining whether a violation of the provisions of this section exists may include, but not be limited to, the following:

- (a) The level of noise;
- (b) Whether the nature of the noise is usual or unusual;
- (c) Whether the origin of the noise is natural or unnatural;
- (d) The level and intensity of the background noise, if any;
- (e) The proximity of the noise to residential sleeping facilities;
- (f) The nature and zoning of the area within which the noise emanates;
- (g) The density of the inhabitation of the area within which the noise emanates;
- (h) The time of the day and night the noise occurs;
- (i) The duration of the noise;
- (j) Whether the noise is recurrent, intermittent, or constant; and
- (k) Whether the noise is produced by a commercial or non-commercial activity.

LOS ANGELES ADMINISTRATIVE CODE

DIVISION 19, CHAPTER 10

PROCEDURE FOR THE REMOVAL OF ILLEGAL SIGNS

SECTION 19.100 DEFINITIONS

For purposes of this chapter, the following terms are defined.

Illegal sign shall mean any sign or sign structure installed, maintained or existing on vacant private property in violation of any law.

Owner shall mean the owner or owners of real property as shown on the last Equalized Assessment Roll of Los Angeles County.

Vacant private property shall mean any single lot or parcel of land described in the records of the County Recorder, held under Private ownership, which has not been improved by any lawfully erected permanent building or structure.

SECTION 19.101 ILLEGAL SIGNS – NUISANCE

It is hereby found and determined that all illegal signs are a public nuisance to be abated as in this chapter provided.

SECTION 19.102 ENTRY UPON VACANT PRIVATE PROPERTY

Officers and employees of the City upon whom duties are imposed by this chapter may enter upon vacant private property for the purpose of performing such duties.

SECTION 19.103 INTERFERENCE PROHIBITED

No person shall impede or interfere with officers and employees of the City in the performance of any duties imposed by this chapter.

SECTION 19.104 NOTICE OF ILLEGAL SIGNS

Whenever it is determined by the Department of Building and Safety that an illegal sign exists on vacant private property in the City, said department shall give written notice by registered or certified mail to the owner of such property. Said notice shall include the following:

- (a) A statement of the determination that an illegal sign exists;
- (b) A statement requiring the owner, within 10 days, to remove the sign or, in the alternative, appeal the determination to the Board of Building and Safety Commissioners;
- (c) A statement that if the owner fails to remove the sign, or appeal to the Board of Building and Safety Commissioners as herein above provided, said sign will be removed by City forces;

- (d) A statement that if the sign is removed by City forces, the cost thereof will be assessed against the real property upon which the sign is located.

SECTION 19.105 REMOVAL OF ILLEGAL SIGN

If within 10 days after notice has been given as provided in Section 19.104 the owner has not filed an appeal with the Board of Building and Safety Commissioners as herein above provided, the Department of Building and Safety shall inspect the property. If it is determined that the illegal sign has not been removed, said department shall notify the Department of Public Works which shall immediately enter upon the vacant private property in question and remove the illegal sign.

SECTION 19.106 COLLECTION OF COSTS

Whenever an illegal sign is removed by the Department of Public Works, the costs incurred shall be a personal obligation against the owner of the property upon which the nuisance is located, recoverable by the City in an action before any court of competent jurisdiction. These costs shall include an amount equal to 40 percent of the cost to perform the actual work, but not less than the sum of \$100.00, to cover the City's costs for administering any contract and supervising the work required, unless the work is necessitated by an event or course of events that prompts the declaration of a local emergency by the Mayor. In addition to this personal obligation and all other remedies provided by law, the City may collect any judgment, fee, cost, or charge, including any permit fees, fines, late charges, or interest, incurred in relation to the provisions of this section as provided in *Los Angeles Administrative Code* Sections 7.35.1 through 7.35.8



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CALIFORNIA BUILDING CODE

Title 24, Part 2, California Code of Regulations (CCR)

For prior history, see the History Note Appendix to the California Building Code, 2001 Triennial Edition effective November 1, 2002.

1. (BSC 01/06, BSC 06/06, DSA-AC 01/06, DSA-AC 02/06, DSA-SS 01/06, DSA-SS 02/06, HCD 04/06, OSHPD 02/06, OSHPD 03/06, OSHPD 04/06, SFM 05/06)
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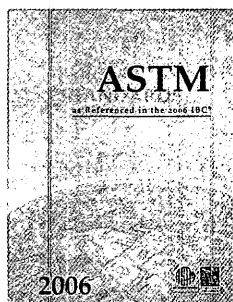


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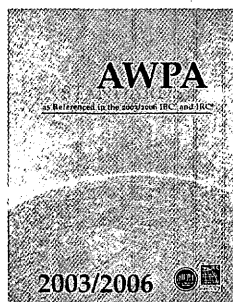


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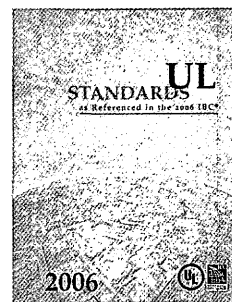


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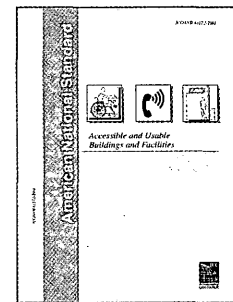


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