TITLE 24
BUILDING REGULATIONS

Chapter 24.10

ADMINISTRATION AND ENFORCEMENT

Sections:

24.10.010 Title.

This Title shall be known as the "Building Regulations," and may be so cited and pleaded and is referred to herein as "this Title."

24.10.020 Purpose.

(Amended by Ordinance No. 163908, effective Feb. 27, 1991.) The purpose of this Title is to provide minimum performance standards to safeguard the health, safety, welfare, comfort, and security of the residents of this City who are occupants and users of buildings, and will provide for the use of modern methods, devices, materials, techniques, and practicable maximum energy conservation by regulating and controlling the design, construction, quality of materials, use, and occupancy, location and maintenance of all buildings, structures and land within this jurisdiction.

24.10.030 Scope.

(Amended by Ordinance Nos. 163237, 163908, 165678 and 176783, effective August 30, 2002.) The provisions of this Title shall apply to the construction, alteration, moving, demolition, repair, and use of any building, structure or land, and to any land clearing or grading within the City. Exceptions are work in the public right-of-way as approved by the City Engineer; publicly constructed sanitary and storm sewer systems and facilities approved by the BES Chief Engineer; and public utility towers and poles, mechanical equipment not specifically regulated in this Code.

24.10.040 Codes.

(Amended by Ordinance Nos. 158651, 162695, 163908, 164950, 166111, 166436, 169312, 169905, 172737, 174891, 177414, 177433, 178745, 179125, 181359, 182370 and 184140, September 29, 2010.)

A. Structural Specialty Code. The provisions of the State of Oregon Structural Specialty Code 2010 Edition, as published by the International Code Council and known as the International Building Code 2009 Edition and amended by the Building Codes Division of the Oregon Department of Consumer and Business Services, including Appendix L and the provisions of Section 903.2.8.1, are hereby adopted by reference. The Structural Specialty Code is on file in the Development Services Center of the City of Portland.

B. Compliance with recognized standards. Where requirements of this Title do not provide necessary regulation or are not fully detailed with regard to processes, methods, specifications, equipment testing, and maintenance, standards of design, performance, and installation, and other pertinent criteria, the applicable standards and recommendation of the National Fire Protection Association, as set forth in its National Fire Code, current Edition, Volumes 1 through 16 shall apply, a copy of which is on file in the City Auditor's Office. Said volumes and all subsequent editions are hereby incorporated in this Title by reference.

C. Application of other titles. Nothing in this Title is intended to permit the establishment or conversion of any structure or use of any land in any zone which is not in accordance with the applicable sections of Title 25 (Plumbing Regulations), Title 26 (Electrical Regulations), Title 27 (Heating and Ventilating Regulations), Title 33 (Planning and Zoning Regulations).

D. Residential code. The provisions of the State of Oregon, Residential Specialty Code, 2008 Edition, as published by the International Code Council, and known as the International Residential Code, 2006 Edition, and amended by the Building Codes Division of the Oregon Department of Consumer and Business Services, including the appendices and standards adopted by the State of Oregon, is hereby adopted by reference. The Residential Specialty Code is on file in the Development Services Center of the City of Portland.

24.10.050 Organization.

(Amended by Ordinance No. 176955, effective October 9, 2002.)

A. Bureau of Development Services. The Bureau of Development Services shall be under the jurisdiction of the Director designated by the appointing authority.

B. Director to enforce Title. General. The Director is hereby authorized and directed to enforce all provisions of this Title. For such purpose he shall have the powers of a law enforcement officer.

C. Deputies. The Director may appoint officers, inspectors, and assistants and other employees. He may also deputize employees as may be necessary to carry out the duties of the Bureau of Development Services.

D. Right of Entry. Whenever an inspection is necessary to enforce any of the provisions of this Title, or whenever the Director or his duly authorized representative has reasonable cause to believe that there exists in any building or upon any premises any condition which makes such building or premises substandard as defined within this Title, or upon presentation of a lawfully issued warrant, the Director may enter such building or premises at all reasonable times to inspect or to perform any imposed duty and shall have recourse to every remedy provided by law to secure entry.

24.10.060 Enforcement.

(Amended by Ordinance Nos. 168340 and 176955, effective October 9, 2002.)

A. All permitted work shall be subject to inspection by the Director, and certain work shall have continuous inspection by special inspectors as specified in Section 24.20.

B. The Director, upon notification from the permit holder or his agent, shall either approve of those portions of the construction requiring inspection or shall notify the permit holder, or his agent, in writing, wherein the same fails to comply with the provisions of this Title.

C. Whenever any work related to construction, for which a permit is required from the Bureau of Development Services, is being done contrary to the provisions of the Code of the City of Portland, the Director may order the work stopped by notice in writing served on any persons engaged in the doing or causing of such work and any such persons shall forthwith stop such work until authorized by the Director to proceed.

D. It is unlawful for any person, firm, or corporation to erect, construct, enlarge, alter, repair, move, improve, remove, convert or demolish, equip, use, occupy, or maintain any building or structure in the City, or cause the same to be done, contrary to or in violation of any of the provisions of this Title.

E. If an unoccupied structure or structure under construction is open or unattended, the Director may enter to determine if a hazardous condition exists. If such a condition exists, he shall notify the owner of the condition and order the structure immediately secured against the entry of unauthorized persons.

F. In the event the property owner, permit holder or his agent fails or neglects to carry out any requirement, or fails to correct any noted violation of this Title, the Director may gain compliance by any of the remedies outlined in Title 3.30.015 of the Code of the City of Portland.

24.10.070 Application for Permits.

(Amended by Ordinance. Nos. 162100, 163908, 165678, 169905, 171773, 174880, 176783, 176955 and 180330, effective August 18, 2006.)

A. Permits required. No person, firm, or corporation shall erect, construct, enlarge, alter, repair, move, improve, remove, convert, change occupancy group of, or demolish any building or structure, or to do any clearing or grading, or cause any of the same to be done without first obtaining a building permit, or where appropriate a minor structural label as outlined in Section 24.10.095. Building permits and fees for work on private property are waived whenever the work appears on plans and specifications, approved by the City Engineer or BES Chief Engineer. This work shall be limited to the construction of streets, public sewers, public stormwater management facilities, driveways, retaining walls, fences, walkways, parking pads, steps, and tree, shrub, and brush removal.

B. For exempted work see Chapter 1 of the Structural Specialty Code.

C. Plans and specifications. Plans, engineering diagrams, and other data shall be submitted in three sets with each application, and shall comply with the requirements of Chapter 1 of the Structural Specialty Code. If a structural design is required, computations, stress diagrams, computer data, and such additional data as required by the Director, sufficient to show the correctness of the plans and compliance with the structural provisions of this Title shall be submitted. The above data shall include a brief summary of all basic assumptions, design methods, structural systems, loading, lateral bracing systems, and a table of contents of the computations. Computer calculations submitted as substantiation of the design shall include a copy of the program users manual for each program, definition, sketches, index of data runs, and properly identified input and output listings. For other than nationally recognized programs, the correctness of the program shall be substantiated in a manner acceptable to the Director. When required by the Director, or when required under ORS 672 (State Engineering Law) or ORS 671 (State Architectural Law), plans shall be prepared and certified by an architect or registered professional engineer licensed to practice in the State of Oregon.

D. Parking lots. Parking lots shall not require a separate building permit when they are clearly shown on plans submitted and their valuation is included on the application for the principal building permit.

E. Compliance with Section 17.88.010 (Street Access) of this Code is required prior to issuance of this permit.

F. Plans for other than one and two family dwelling repairs, remodels, or additions shall be approved by the Fire Marshal prior to approval by the Director.

G. Issuance of permits. Issuance of permits shall be in accordance with Chapter 1 of the Structural Specialty Code provided that plans for all commercial buildings and any off-street parking area where the parking of three or more cars is to be established shall be approved by the City Engineer and the City Traffic Engineer before a building permit may be issued.

H. Charge for partial permits. When complete plans and specifications are not available, the Director may issue partial permits to assist in the commencement of the work, provided that a partial permit charge is paid to the bureau. The number of partial permits issued shall not exceed six on any individual project, except that in special circumstances the Director may allow this number to be exceeded.

I. Retention of plans.

1. Plans and specifications for all buildings, or their photographic image, shall be retained permanently in the files of the Bureau of Development Services as follows:

   a. Plans and specifications for work which does not concern or affect the structural stability of a building and which does not affect a change of occupancy may be destroyed after 5 years from date of building permit for same;

2. Plans and specifications for one or two family dwellings, and/or buildings accessory thereto may be destroyed after 5 years from date of building permit for same.

J. A separate permit, known as a development permit, shall be required for a site development, changes in use, or other work performed in compliance with Title 33, Chapter 33.700, Administration, which is not otherwise included with the permit described in Subsection A. of this Section. Reviews and approval of site plans or other documents shall be obtained from the Bureau of Development Services prior to issuance of the permit.

K. Life of Permit Limited. If no inspection approval has taken place within six months after permit issuance, the permit shall become void, and no further work shall be done at the premises until a new permit has been secured and a new fee paid. Each time an inspection approval is granted, the permit shall be deemed to be automatically extended for six months, until final approval is granted. The Building Official may extend a permit for one period of six months upon finding that the permittee was unable to commence or continue work for reasons beyond his or her control. Extension requests shall be in writing and shall be received by the Director before the permit expiration date. If an inspection approval has not been granted within this extended time period, the permit shall be void. A permit that has been expired for six months or less may be renewed provided no changes have been made in the original plans and specifications for such work. No permit may be renewed if it has been expired for more than six months. A permit may be renewed only once. If an inspection approval has not been granted within the time period of permit renewal the permit shall be void. The renewal fee shall be one half the amount required for a new building permit.

24.10.080 Board of Appeals.

(Amended by Ordinance Nos. 174719 and 176955, effective October 9, 2002.)

A. In order to determine the suitability of alternate materials and methods of construction and to provide for reasonable interpretation of the provisions of this Title, there has been created a Board of Appeal, consisting of three members appointed by the Mayor. The Board members must be qualified by experience and training to make decisions on matters pertaining to building construction. All persons shall be appointed for a term of 3 years. At least one member of the Board shall be a competent builder who has engaged in the building business in the City for at least two years immediately preceding his appointment, and at least one member of the Board shall be a competent architect who has practiced his profession for at least 3 years. The Director shall be an ex officio member and shall act as Secretary of the Board.

B. No member may act on or hear a case in which he has an interest. If such a case comes before the Board, the member's alternate shall attend or the Mayor shall appoint a substitute.

C. Meeting of the Board of Appeal. Meetings of the Board of Appeal shall be held at the call of the Chairman or upon notice from the Commissioner In Charge of the Bureau of Development Services of any special appeal.

D. Removal from office. Any member of the Board of Appeal may be removed from office by the Mayor for due cause, such as malfeasance in office, incapacity, or neglect of duty.

E. The Mayor shall appoint a qualified alternate for each member, who shall attend meetings and vote when the member is unavailable.

F. Appeals to Board. Any person who may have been ordered by the Bureau of Development Services to incur an expense for the alteration, repair, or construction of any building or any person whose application for a permit may have been refused by the Bureau of Development Services may appeal to the Board of Appeal by serving written notice upon the Bureau of Development Services. The notice or a certified copy thereof, shall be transmitted at once to the Board of Appeal. After service of notice upon the persons interested, a hearing shall be held; and the Board may, by a majority vote, affirm, annul, or modify the action of the Bureau of Development Services; provided, however, in any matter relating to or involving fire prevention, fire safety measures, or building construction requirements for safety, any modification of a strict application of this Title shall be made only on condition that substantially equivalent degree of safety is provided generally conforming to national standards concerning fire prevention, fire safety measures, and building construction requirements for safety. The decision of the Board shall have full force and effect. A certified copy of the decision shall be delivered to the appellant.

G. Powers of the Board of Appeal. Where unquestionably and clearly, practical difficulties, unnecessary hardship or consequences, inconsistent with the general purposes of this Title may result from the literal interpretation and enforcement thereof, the Board of Appeals may grant adjustment of variances in a specific case with such conditions and safeguards as it may determine, in harmony with the general purpose, intent, and spirit of this Title, so that the public safety and welfare shall be secured and substantial justice shall be done, upon unanimous vote of the Board. If interpretation of the provisions of this Title is required, decisions thereon may be determined by a majority vote of the Board. Any person aggrieved by the final decision of the Appeals Board as to the application of any provision of this Specialty Code may, within 30 days after the date of the decision, appeal to the appropriate State Specialty Advisory Board. The appellant shall submit the appeal fee with his request for appeal. The decision of the Appeals Board shall be subject to review and final determination by the appropriate State Specialty Advisory Board authorized pursuant to OAR Chapter 8.4, as to technical and scientific determinations related to the application of this Title. All required fees are stated in the Fee Schedule adopted by City Council. Fees will be updated annually or on an as needed basis. The approved Fee Schedule will be available at the Development Services Center.

24.10.085 Structural Engineering Advisory Committee.
(Added by Ordinance No. 162056, effective June 22, 1989.)

A. There is hereby created a Structural Engineering Advisory Committee. Such board members shall be appointed by the Mayor and shall consist of three members and three alternates licensed in Oregon to practice structural engineering.
Members shall serve 3-year terms and may be appointed to consecutive terms. In addition, the Director, or designee, shall be an ex-officio member of the board.

B. Any member of the board may be removed from office by the Mayor for malfeasance in office or neglect of duty at any time during his or her tenure.

C. The board shall elect a chairperson, adopt rules of procedure, and set the time and place for regular meetings. Written minutes of all meetings shall be made and kept subject to the requirements and limitations of ORS 192.400 to ORS 192.500.

D. It shall be the duty of the board to advise the Director and/or the Appeals Board in structural matters relative to reasonable interpretation and to alternate materials and methods of construction.

E. Any action of the board shall be in an advisory capacity to the City. Subsequent action taken by the City as a result of advice from the boards shall be the sole responsibility of the City.

24.10.087 Alternative Technology Advisory Committee
(Added by Ordinance No. 182217, effective October 24, 2008.)

A. **Purpose.** It shall be the duty of the Alternative Technology Advisory Committee to advise the Bureau of Development Services on new or innovative sustainable building technologies and products.

B. **Membership.** The Alternative Technology Advisory Committee shall consist of a minimum of three members. The committee members will be appointed by the Director of the Bureau of Development Services. The committee shall consist of design professionals, construction contractors, and persons associated with a university with an engineering school. In addition, two designees from the Bureau of Development Services familiar with building code review shall be ex-officio members of the committee.

C. **Appointment and Terms.**

1. Appointment to the Alternative Technology Advisory Committee shall be for a three-year term. Committee members may be appointed to no more

than two consecutive, complete terms. If a position is vacated during a term, it shall be filled for the unexpired term.

2. Any member of the committee may be removed from the committee by the Director of the Bureau of Development Services for any reason deemed appropriate by the Director.

3. The committee shall elect a chairperson, adopt rules of procedure, and set the time and place for regular meetings. Written minutes of all meetings shall be kept.

D. Compensation. Alternative Technology Advisory Committee members shall serve without compensation.

E. Other. The Alternative Technology Advisory Committee serves only in an advisory capacity to the City. Subsequent action taken by the City as a result of the committee's advice shall be the sole responsibility of the City.

24.10.090 Pre-application and Pre-construction Meetings.

(Amended by Ordinance No. 162100, effective Aug. 1, 1989). Where major construction projects involve coordination between City bureaus and the design/ construction teams, the Director may hold a pre-application or pre- construction meeting with representatives of the interested parties as an aid to the enforcement of this Title.

24.10.095 Commercial and Industrial Minor Structural Labels.

(Added by Ordinance No. 171773, effective November 19, 1997.)

A. General. Oregon Revised Statutes Chapter 455.190 establishes special alternative inspections programs for commercial and industrial installations for other than new construction. One of these programs is the Minor Label Program. Implementation rules are found in Oregon Administrative Rules 918-100-000 through 918-100-060. The Bureau will operate the Minor Structural Label Program in accordance with the Oregon Administrative Rules. The Minor Structural Label Program utilizes minor labels in lieu of regular building permits. Random inspections are made to ensure compliance of minor work.

B. Requirements. Commercial and Industrial Minor Structural Labels may be used in all occupancies (including commercial, industrial, apartment and multi-family installations) except one and two family dwellings. Labels are sold in groups of ten. Labels expire six months from date of purchase and are not refundable. No more than one minor structural label may be used on any single project. A single project is defined as not more than one minor label used per calendar month for each address, suite or tenant space.

C. Work Allowed. The following work may be done under a Minor Structural Label:

1. Alteration, replacement or repair of up to 100 linear feet of nonbearing, non-fire resistive walls and partitions not part of the building shell, an exit or an exit passageway;

2. Window and door replacements or relocations not part of an exit or exit passageway and fit within existing openings. Replacement windows and doors shall comply with the requirements of the current State of Oregon codes, including but not limited to safety glazing requirements;

3. Lightweight interior awnings under 100 pounds total weight;

4. Removal and replacement of acoustical ceiling tiles in nonfire-rated ceilings of less than 1,000 square feet (replacement of supporting grid is not included);

5. Minor roofing repairs not exceeding ten percent of the roofing area.

24.10.100 Fees

24.10.101 General.

(Amended by Ordinance No. 176955, effective October 9, 2002.) The following fees are required to be paid to the Director of the Bureau of Development Services, shall be as set forth in this Chapter.

24.10.102 Building Permit and Plan Check/Process Fee.

(Replaced by Ordinance No. 174719, effective August 21, 2000.)

A. All required fees are stated in the Fee Schedule adopted by City Council. Fees will be updated annually or on an as needed basis. The approved Fee Schedule will be available at the Development Services Center.

B. A plan checking fee is payable when the plans and application are accepted by the Director for examination and shall not be refundable. A permit fee shall be paid to the Director before a building permit is issued.

C. Permit and plan check fees will, as a general rule, be refunded when the services covered by the fee have not commenced, and the permit or plan review fees were paid incorrectly due to an error on the part of the City. When a permit applicant requests a refund, but the City was not at fault in accepting payment, fees shall be retained to cover the cost of plan review or inspections actually performed and 20 percent of the amount remaining. State surcharge fees are only refundable when a

permit was issued in error. Requests for refunds must be made within 6 months of payment or permit issuance, whichever is later. Refunds are to be made to the same person or firm who paid the fee within 3 months of the request. Exceptions to the above requirements may be made by the Director or designee.

24.10.103 Requested Inspection Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.104 Fee for Appeal.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.106 Home Occupation Permit.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.107 Appeal Fee for Historical Building Review Board.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.108 Street Use Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.109 Grading Permit Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.110 Excavation and Grading Plan Check Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.111 Dangerous Building Abatement Processing Fee.
(Repealed by Ordinance No. 167088, effective Dec. 3, 1993.)

24.10.112 Product Approval Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.113 Circus Tent Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.114 Welder Certification Fee.
(Repealed by Ordinance No. 165486, effective July 1, 1992.)

24.10.115 Reproduction Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.116 Fee for Examination of Filed Plans.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.117 Approved Fabricators Certification Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.118 Special Inspection Certification Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.119 Approved Testing Agency Certification Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.122 Certificate of Occupancy.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.123 Temporary Certificate of Occupancy.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.124 Zoning Inspection Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.125 Inspections Outside of Normal Business Hours.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.126 Reinspection Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.127 Additional Plan Review Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.128 Address Assignment Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.130 Clearing Permit Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.131 Clearing With Tree Cutting Permit Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.).

24.10.132 Pre-Permit Site Inspection for Properties in Environmental Zones.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.133 Manufactured Dwelling Installation Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.134 Manufactured Dwelling Park.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.135 Recreational Park.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.136 Park Trailer Installation Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.137 Minor Structural Labels.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.138 Master Permit/Facilities Permit Program Fees.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.139 On-site Permanent Stormwater Control Facilities Inspection Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

24.10.140 Tree Preservation and Planting Plan Check and Inspection Fee.
(Repealed by Ordinance No. 174719, effective August 21, 2000.)

Chapter 24.15

DEFINITIONS

Sections:

24.15.010 General.

For the purpose of this Title, certain terms, phrases, words, and their derivatives shall be construed as specified herein. Words used in the singular include the plural and the plural the singular. Words used in the masculine gender include the feminine and the feminine the masculine. Terms, words, phrases, and their derivatives used, but not specifically defined in this Chapter, either shall have the meaning defined in this Title, or if not herein defined, shall have the meanings commonly accepted in the community.

24.15.020 Abandoned Structure.

An abandoned structure is a structure that has been vacant for a period in excess of 6 months or any period less than 6 months when a vacant structure or portion thereof constitutes an attractive nuisance or hazard to the public.

24.15.030 Agreement/Contract to Repair/Work.

An agreement or contract to repair/work is a written agreement in which an owner of a structure agrees to carry out repair/work on any abandoned, unsafe, dangerous structure, or structure between a specified commencement and completion date.

24.15.040 Approved Testing Agency.

An approved testing agency is an established and recognized agency regularly engaged in conducting testing and furnishing inspection services.

24.15.045 Boarded.

Added by Ordinance No. 162525; amended by 164318 and 168901, effective June 7, 1995.) Secured against entry by apparatus which is visible off the premises and is not both lawful and customary to install on occupied structures.

24.15.050 Building.

A building is a structure used or intended for sheltering any use or occupancy.

24.15.060 Dangerous Structure.

(Amended by Ordinance No. 168626, effective Apr. 22, 1995.) Any structure which has any or all of the conditions or defects hereinafter described, to the extent that life, health, property, or safety of the public or its occupants are endangered, shall be deemed to be a dangerous structure and such condition or defects shall be abated pursuant to Sections 24.55.250 and 24.55.300 of this Chapter.

A. Whenever the stress in any materials, member, or portion thereof, due to all dead and live loads, is more than 1-1/2 times the working stress or stresses allowed in the Oregon Structural Specialty Code and Fire and Life Safety Code for new buildings of similar structure, purpose, or location.

B. Whenever any portion thereof has been damaged by fire, earthquake, wind, flood, or by any other cause, to such an extent that the structural strength or stability thereof is materially less than it was before such catastrophe and is less than the minimum requirements of the Oregon State Structural Specialty Code and Fire and Life Safety Code for new buildings of similar structure, purpose, or location.

C. Whenever any portion or member of appurtenance thereof is likely to fail, or to become detached or dislodged, or to collapse and thereby injure persons or damage property.

D. Whenever any portion of a building, or any member, appurtenance, or ornamentation of 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 of that specified in the Oregon Structural Specialty Code and Fire and Life Safety Code for new buildings of similar structures, purpose, or location without exceeding the working stresses permitted in the Oregon State Structural Specialty Code and Fire and Life Safety Code for such buildings.

E. Whenever any portion thereof has wrecked, warped, buckled, or 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 similar new construction.

F. Whenever the building or structure, or any portion thereof, because of

1. dilapidation, deterioration, or decay;

2. faulty construction**;**

3. the removal, movement, or instability of any portion of the ground necessary for the purpose of supporting such building;

4. the deterioration, decay, or inadequacy of its foundation; or

5. any other cause, is likely to partially or completely collapse.

G. Whenever, for any reason, the building or structure, or any portion thereof, is manifestly unsafe for the purpose for which it is being used.

H. 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 of gravity does not fall inside the middle one-third of the base.

I. Whenever the building or structure exclusive of the foundation, shows 33 percent or more damage or deterioration of its supporting member or members, or 50 percent damage or deterioration of its non-supporting members, enclosing, or outside wall coverings.

J. Whenever the building or structure has been so damaged by fire, wind, earthquake or flood or any other cause, or has become so dilapidated or deteriorated as to become (I) an attractive nuisance, or (ii) a harbor for vagrants or criminals.

K. Whenever any building or structure has been constructed, exists, or is maintained in violation of any specific requirement or prohibition applicable to such building or structure provided by the building regulations of this City, as specified in the Oregon State Structural Specialty Code and Fire and Life Safety Code or any law or ordinance of this State or City relating to the condition, location, or structure or buildings.

L. Whenever any building or structure which, whether or not erected in accordance with all applicable laws and ordinances, has in any non-supporting part, member, or portion, less than 50 percent, or in any supporting part, member, or portion less than 66 percent of the

1. strength,

2. fire-resisting qualities or characteristics required by law in the case of a newly constructed building of like area, height, and occupancy in the same location. This subsection does not apply to strength required to resist seismic loads. For application of seismic requirements see Chapter 24.85.

M. Whenever any building or structure, because of dilapidated condition, deterioration, damage, inadequate exits, lack of sufficient fire-resistive construction, faulty electric wiring, gas connections, or heating apparatus, or other cause, is a fire hazard.

N. Whenever any building or structure is in such a condition as to constitute a public nuisance known to the common law or in equity jurisprudence.

O. Whenever any portion of a building or structure remains on a site for more than 30 days after the demolition or destruction of the building or structure.

24.15.065 Derelict Commercial Building.

(Added by Ordinance No. 162525; amended by 164318 and 168901, effective June 7, 1995.) Any building or structure:

A. In which there are no dwelling units, and

B. Which is not an accessory building to a building in which there are dwelling units, and

C. Which building, structure or a portion thereof is unoccupied; and

D. Which meets any of the following criteria:

1. Has been ordered vacated by the Director pursuant to 24.55.250 F; or

2. Has been issued a correction notice by the Director pursuant to 24.55.250 A.; or

3. Is unsecured; or

4. Is boarded; or

5. Has been posted for violation of Section 18.03.050 more than once in any two year period; or

6. Has, while vacant, had a nuisance abated by the City pursuant to Sections 18.03.010 or 18.03.030.

24.15.070 Director.

(Amended by Ordinance No. 176955, effective October 9, 2002.) Director shall mean the Director of the Bureau of Development Services or a duly authorized representative of the Director.

24.15.075 Dwelling Unit.

(Added by Ordinance No. 168901, effective June 7, 1995.) One or more habitable rooms which are occupied by or designed or intended to be occupied by one person, or by a family or group of housemates living together as a single housekeeping unit.

24.15.080 Exterior Property Area.

Exterior property area is the open space on the premises and on adjoining property under the control of the owner or operator of such premises.

24.15.090 Hearings Officer.

Hearings Officer is the office of the Code Enforcement Hearings Officer created pursuant to Section 22.02.010 of the City Code.

24.15.100 Imminently Dangerous.

Imminently dangerous means any condition posing a direct and immediate threat to human life, health, or safety.

24.15.110 Inspections Manager.

(Amended by Ordinance No. 176955, effective October 9, 2002.) The Inspections Manager is the Director's duly authorized representative responsible for the administration of the Inspections Division of the Bureau of Development Services.

24.15.115 Master Permit/Facilities Permit Program.

(Added by Ordinance No. 172431; amended by Ordinance No. 173973, effective January 1, 2000.) The Master Permit/Facilities Permit program is a special alternative inspection program authorized under Oregon Revised Statute 455.190. This program is available to commercial/industrial building owners and building management companies to streamline the approval of maintenance/repair and tenant improvement work on their private facilities.

24.15.120 Owner.

Owner is any person, agent, firm, or corporation having a legal or equitable interest in a property.

24.15.130 Repair.

Repair is the reconstruction or renewal of any part of an existing structure for the purpose of its maintenance.

24.15.140 Residential Structure.

Residential structure means any building or other improvements designed or intended to be used for residential purposes.

24.15.150 Requested Inspection.

Requested inspection means any additional inspection which is not part of the City's regular or mandated inspection program.

24.15.160 Service Station Site.

(Amended by Ordinance No. 169905, effective Apr. 1, 1996.) A service station site shall mean premises improved as a Group S, Division 3, occupancy for use as automobile or truck service stations used for supplying fuel, oil, minor accessories, and trailers, excluding body and fender repair for passenger automobiles, trucks, and truck trailers at retail direct to the customer.

24.15.170 Substandard.

Substandard means in violation of any of the minimum requirements as set out in this Title.

24.15.180 Special Inspector.

Definition to be added.

24.15.190 Subject Structure.

(Amended by Ordinance No. 176955, effective October 9, 2002.) A subject structure is any abandoned, unsafe, or dangerous structure upon which the Bureau of Development Services has commenced abatement proceedings.

24.15.200 Structure.

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

24.15.210 Swimming Pool.

(Repealed by Ordinance No. 180330, effective August 18, 2006.)

24.15.215 Tree Cutting.

(Added by Ordinance No. 168340, effective Dec. 7, 1994.) Tree cutting means the removal, felling or destruction of 50% or more of a tree, but does not include trimming branches for tree maintenance purposes.

24.15.220 Unoccupied.

(Added by Ordinance No. 162525; amended by 168901, effective June 6, 1970.) Not being used for a lawful occupancy.

24.15.230 Unsafe.

Means:

A. Any structure which is structurally unsafe or not provided with adequate egress, or which constitutes a fire hazard or is otherwise dangerous to human life.

B. Unsafe use is any use of structures constituting a hazard to health, safety, or public welfare by reason of inadequate maintenance, dilapidation, obsolescence, fire hazard, disaster, damage, or abandonment.

C. Unsafe appendages are parapet walls, cornices, spires, towers, tanks, statuaries, or other appendages or structural members which are supported by, attached to, or part of a building, and which are in a deteriorated condition or otherwise unable to sustain the design loads which are specified in the Oregon State Structural Specialty and Fire and Life Safety Code.

24.15.240 Unsecured.

(Added by Ordinance No. 162525, amended by 168901, June 7, 1995.) Any building or structure in which doors, windows, or apertures are open or broken so as to allow access by unauthorized persons.

24.15.250 Value/Valuation.

Value or valuation of a structure or building shall be the estimated cost to replace the structure or building in kind, based on either the building valuation data reported in the latest issue of the ICBO Building Standards Journal or by any alternate method approved by the Director to give an accurate assessment of building replacement costs.

24.15.260 Warehousing.

Warehousing means securing a structure against vandalism, deterioration, and unauthorized entry pending its return to active use or occupancy.

Chapter 24.20

SPECIAL INSPECTIONS

(Chapter substituted by Ordinance No. 160581, effective Apr. 18, 1988.)

Sections:

24.20.010 General.

(Amended by Ordinance No. 169905, effective Apr. 1, 1996.)

A. In addition to the inspections required under Section 108 of the Structural Specialty Code, the owner or the owner's agent shall employ a Special Inspector during construction of the types of work specified in Section 1701 of the Structural Specialty Code or for cases specifically required by the Director.

B. The Director shall have the authority to adopt and enforce written rules concerning the conduct and administration of special inspections in the City of Portland.

24.20.020 Advisory Board for Special Inspections.

(Amended by Ordinance Nos. 161315 and 176955, effective October 9, 2002.)

A. There is hereby created an Advisory Board for Special Inspections. Such Board members shall be appointed by the Mayor and shall consist of two members and two alternates licensed to practice structural engineering in the State of Oregon, one member and one alternate licensed to practice architecture in the State of Oregon, one member and one alternate representing a testing laboratory and one member and one alternate who are Class A Special Inspectors. In addition, the Director of the Bureau of Development Services, or his or her designee, shall be an ex-officio member of the Advisory Board for Special Inspections. Members shall serve three-year terms and may be appointed to consecutive terms.

B. Any member of the Board may be removed from office by the Mayor for malfeasance in office or neglect of duty at any time during his or her tenure.

C. The duties of the Board shall include:

1. Assist the Director with reviewing the applications for examination of the Special Inspectors;

2. Assist the Director with the administration of the Special Inspector examinations;

3. Reviewing the Special Inspections Program of the Bureau of Development Services on a periodic basis for the purpose of recommending procedural improvements to the Director.

D. The Board shall elect a chairperson, adopt rules of procedure and set the time and place for meetings. Written minutes of all meetings and results of all examinations shall be made and kept subject to the requirements and limitations of ORS 192.410 to ORS 92.500.

E. A simple majority vote of a quorum present at any meeting shall decide any matter coming before the Board.

F. The Board may appoint representatives of affected industries or specialists in specific fields to serve in an advisory capacity.

G. At the end of each fiscal year, a report of work performed shall be sent to the City Council.

24.20.030 Qualifications and Certification of Special Inspectors.

(Amended by Ordinance Nos. 161315 and 176955, effective October 9, 2002.) Special Inspections shall be either denominated "Class A," "Class B - Trainee," or "Class C" Special Inspectors.

A. "Class A" Special Inspectors. As minimum evidence for qualification of certification as a Special Inspector, an applicant shall successfully complete a written and oral examination prescribed by the Director as well as providing evidence sufficient to show that the Applicant has met one of the following experience prerequisites:

1. At least 3 years of experience in construction inspection, testing or design work, of such nature or character as the Director may by rule provide; or

2. Successful completion of a training program of such nature or character as the Director may by rule provide. Application for examination for certification as a Class A Special Inspector shall be made by submission of a completed form furnished by the Director and payment of the certification fee. A separate application shall be submitted for each category of certification desired. When satisfied as to their experience and after satisfactory completion of the examination, the Director shall issue certificates to Class A Special Inspectors. Such certificates will be valid for one year from the date of issuance. Class A Special Inspectors must apply for renewal within 30 days following expiration of an existing certificate.

B. "Class B - Trainee" Special Inspectors. As minimum evidence of qualification for certification as a Special Inspector, an applicant shall successfully complete a written examination prescribed by the Director as well as participate in a training program of such nature or character as the Director may by rule provide. A "Class B - Trainee" Special Inspector shall work under the supervision of an inspection agency approved by the Director.
Upon successful completion of the training program and an oral interview prescribed by the Director, the special Inspector may submit an application to be certified as a "Class A" Special Inspector.

C. "Class C" Special Inspectors. Upon approval of the Director, the Oregon registered professional engineer or architect of record and persons under their direct supervision may provide the required special inspection as otherwise provided by this Chapter.
The duties and responsibilities for a "Class C" Special Inspector are the same as a "Class A" and "Class B - Trainee" Special Inspector, and the name(s) of any such person(s) performing inspections shall appear on the permit documents.

D. The Bureau of Development Services will maintain a current list of "Class A" and "Class B - Trainee" Special Inspectors available for public inspection.

24.20.040 Revocation or Suspension of Certification of Special Inspectors.
(Amended by Ordinance No. 161315, effective Nov. 19, 1988.)

A. The Director may revoke, suspend or refuse to renew the certification of a Class A or Class B - Trainee Special Inspector or may revoke or suspend the approval of a Class C Special Inspector, if the Director determines that the Special Inspector:

1. Willfully failed to perform any duties of a Special Inspector; or

2. Incompletely or ineffectively performed any duties of a Special Inspector.

B. If the Director believes that an inspector has failed, incompletely or ineffectively performed their duties, the Director shall hold a hearing on the matter. The Director will give notice of this hearing to the inspector charged with the violation by mailing to them, at least 10 days prior to the time set for a hearing, a list of the allegations, as well as the time, date and place set for the hearing, when the inspector shall have an opportunity to be heard and present matter in their defense. Not later than 10 days thereafter, the Director shall issue a decision along with the type of action, if any, that is to be taken.

C. An inspector adversely affected by the Director's determination may have review pursuant to ORS 34.010 to 34.100.

24.20.050 Selection of the Special Inspectors.

(Amended by Ordinance No. 176955, effective October 9, 2002.) With the approval of the Director, Special Inspectors and approved inspection and/or testing agencies shall be chosen and paid by the owner, and will report to the licensed architect or engineer whose signature and seal appear on the design drawings and to the Bureau of Development Services. No changes of Special Inspectors or inspection/testing agency approved by the Director shall be made without obtaining approval of the responsible architect/engineer and the Director.

24.20.060 General Duties of the Special Inspector.

A. The Special Inspector shall observe the work assigned for conformance with the approved permit documents.

B. The Special Inspector shall furnish inspection reports to the Director, the engineer and architect of record, the contractor and other designated individuals. All discrepancies shall be brought to the immediate attention of the contractor for correction, then, if uncorrected, to the Director.

C. The Special Inspector shall submit a final signed summary report stating whether the work requiring special inspection was, to the best of his/her knowledge, in conformance with the approved plans and specifications and the applicable workmanship provisions in the State Building Code.

Chapter 24.25

MOVING OF BUILDINGS

Sections:

24.25.010 General.

No building shall be moved from one location to another until permits have been obtained.

24.25.020 Permit Information Required.

The applicant shall file with the Director an application for a permit to move the structure, it shall be signed by the owner or his authorized agent, and shall contain a description of the building to be moved, the location where it is to be moved, and the use and occupancy proposed, in addition to the information required by Section 24.10.070 of this Title regarding foundation or other work at the final location.

24.25.030 Direction of City Engineer.

(Amended by Ordinance No. 169905, effective Apr. 1, 1996.) No building shall be moved across or along any street until the route to be followed and the time allowed for moving has been submitted to the City Engineer and approved by him. Moving shall be under the direction of the City Engineer. For the regulations covering the use of public streets see Chapter 33 of the Structural Specialty Code.

24.25.040 Housing Code Inspection Report Required.

The Director shall inspect any residential building that is proposed to be moved, to ensure its compliance with the provision of Title 29 of the Code of the City of Portland.

Chapter 24.30

HOME OCCUPATIONS

Sections:

24.30.010 Permits Required.

A permit shall be required to establish a home occupation. The permit shall be renewed every 2 years to maintain said home occupation.

24.30.020 Compliance with Planning and Zoning Regulations.

All home occupations shall comply with the provisions of Title 33 of the Code of the City of Portland.

24.30.030 Fees for Home Occupations.

The fee for a home occupation permit shall be as provided in Section 24.10 of this Title.

Chapter 24.35

HISTORICAL BUILDINGS

Sections:

24.35.010 Historical Review Board.

(Amended by Ordinance Nos. 174719 and 176955, effective October 9, 2002.) The Historical Building Review Board shall consist of the members of the Board of Appeal referred to in Section 24.10.080 plus the Chairman of the Portland Historical Landmarks Commission, or his designee with the power to waive any provision of the combined State Building Code.

Any person who may have been ordered by the Bureau of Development Services to incur an expense for the alteration or repair of any building defined as an historical building under Chapter 41 of the State Building Code, 1982 Edition, or any person whose application for a permit to alter or repair an historical building may have been refused by the Director may appeal to the Historical Building Review Board by serving written notice upon the Bureau of Development Services. The notice, or certified copy thereof, shall be transmitted at once to the Historical Building Review Board. After service of notice upon the persons interested, a hearing shall be held; and the Board may by unanimous vote, waive the provisions of the combined State Building Code, if, in their opinion, such historic buildings are not hazardous to life or health or the proposed variance does not conflict with the public interest. The Board shall consider the historic performance of the building, the structural stability, and the occupancy classification. Any variances granted by the Board shall be subject to the established occupancy classification, and any changes in occupancy classification occurring after the Board's decision shall terminate the Board's order thus subjecting the building or structure to be resubmitted for reconsideration or abated. The Board shall adopt reasonable rules and regulations for conducting its business. In any matter relating to or involving fire prevention, fire safety measures, or building construction requirements for safety, any modification by the Board of a strict application of this Title shall be made only on condition that a substantially equivalent degree of safety is provided generally conforming to national standards concerning fire prevention, fire safety measures, and building construction requirements for safety. A certified copy of the Board's decision shall be delivered to the appellant. The fee for each appeal shall be stated in the Fee Schedule adopted by City Council. Fees will be updated annually or on an as needed basis. The approved Fee Schedule will be available at the Development Services Center.

24.35.020 Special Approval.

Any permit application for exterior remodeling or alteration, construction of a new building, or demolition of a building, which involves an historical building or site so designated by the City Council, shall be submitted to the Portland Historical Landmarks Commission for approval, conditional approval or rejection prior to the issuance of any permit, to the extent required by the provisions of the planning and zoning regulations of the City. Issuance of the permit shall be subject to the terms and provisions of the planning and zoning regulations relative to the historical buildings or sites.

Chapter 24.40

USE OF AND PROJECTIONS OVER PUBLIC STREETS AND PROPERTY

Sections:

24.40.010 Street Use.

(Amended by Ordinance No. 169905, effective Apr. 1, 1996.) A person undertaking work covered by a building permit, may, on proof of necessity, be entitled to a permit for use of the street, sidewalks, and/or roadway. Applications shall be subject to the approval of the Traffic Engineer and the Director. Material or equipment necessary for the work may be placed or stored on public property in the following locations:

A. On the roadway, adjacent to the curb in front of the site for which a building permit has been issued.

B. On the roadway in front of an adjoining site.

C. On the public sidewalk, in front of the construction site, except on those sidewalks required to be kept open. A street use permit shall be issued for a minimum period of 1 week and a maximum period of 90 days. The permit may be extended if in the judgment of the Director an extension is warranted by existing conditions. The use of the street by persons holding a permit and/or the fencing-off of street space shall not be continued longer than is necessary. If the permit for street use is within the Special Traffic Control Districts outlined in Section 17.23.030, the prior approval of the City Engineer must be obtained if the street use extends beyond the curb line.

When work not requiring a building permit is undertaken for maintenance of buildings or structures in the congested areas where parking meters are located, the person undertaking such work shall not close off any portion of the sidewalk or roadway areas without first obtaining, subject to the approval of the Traffic Engineer, a street use permit; the time limit for such permit shall be as specified above. If the street use permit is within the special Traffic Control Districts outlined in Section 17.23.030, the prior approval of the City Engineer must be obtained if the street use extends beyond the curb line. While work is in progress, a roped-off passageway not less than 4 feet in width shall be maintained for pedestrians. This passageway shall be no closer, than 6 feet horizontally from any scaffold, ladder, machinery, or equipment. The passageway shall be entirely contained within the existing sidewalk area. The Director may also require pedestrian protection as outlined in Chapter 33 of the Structural Specialty Code. In order to ensure coordination of construction activity within the Street area and to provide that the private and public needs are met, the Director may also require a preconstruction meeting as outlined in Section 24.10.090 of this Title.

24.40.020 Dirt on Streets from Construction Projects.

If dirt or debris falls on any public right-of-way and such debris originates from a construction project for which a building, plumbing, or electrical permit has been issued, it is unlawful for the permit holder and/or owner not to remove it immediately. Failure of either the owner and/or permit holder to remove the spillage within 24 hours after notification given either orally or in writing may result in the Director gaining compliance by any of the methods outlined in Section 24.10.060 of this Title.

24.40.030 Fees.

Fees for street use shall be as indicated in Section 24.10 of this Title.

Chapter 24.45

PARKING AND DRIVEWAY SURFACES

Sections:

24.45.010 General.

All vehicular driveways, parking spaces, and areas utilized for the maneuvering of vehicles shall be surfaced in accordance with this Chapter.

24.45.020 Minimum Surfacing Standards for Parking Areas and Garages for Passenger Cars and Trucks not Exceeding 1/2-Ton Capacity and Driveways Serving Structures 150 Feet or Less from an Improved Public Right-of-Way.

(Amended by Ordinance No. 173270, effective May 21, 1999.) Surfaced areas shall be constructed on properly drained, well-compacted subgrade, that is free of organic materials. Minimum pavement structure shall be:

A. Three and one-quarter inches Portland cement concrete having a compressive strength of 2,000 psi after 28 days, or

B. One and one-half inches of asphalt concrete placed over a base of 4 inches of crushed stone or gravel, or

C. Grid paving blocks, paving stones or materials with adequate spacing for drainage infiltration, or other stormwater management control surfaces. Where such surfaces are provided in accessible parking and as part of an accessible pedestrian path, the surfaces shall meet accessibility standards of the state building code.

24.45.030 Minimum Surfacing Standards for Driveways Serving Structures More than 150 Feet from an Improved Public Right-of-Way.

(Amended by Ordinance No. 173270, effective May 21, 1999.) Surfaced areas shall be constructed on properly drained, well-compacted subgrade, that is free of organic materials. Minimum pavement structure shall be:

A. Two inches of asphalt concrete on 4 inches of 1-inch minus, compacted crushed rock; or

B. Five inches of Portland cement concrete having a compressive strength of 3,000 psi after 28 days, or

C. A driveway surfaced as per Section 24.45.020 for the first 40 feet contiguous with the right-of-way paving and the remaining portion of 8 inches of 1-inch minus, compacted crushed gravel over filter fabric, or

D. Grid paving blocks, paving stones or materials with adequate spacing for drainage infiltration, or other stormwater management control surfaces. Where such surfaces are provided in accessible parking and as part of an accessible pedestrian path, the surfaces shall meet accessibility standards of the state building code.

24.45.040 Minimum Surfacing Standards for Trucks Over 1/2-Ton Capacity and Other Vehicles.

Surface of parking, storing, and maneuvering areas for vehicles and motorized equipment not regulated elsewhere in this Chapter shall be by a method approved by the Director that will effectively eliminate dust, mud, or other contaminating elements on surrounding street areas and/or abutting property and be constructed of materials capable of supporting the maximum axle weight of the largest piece of equipment. At each street entrance, a concrete or asphalt driving apron shall extend from the right-of-way paving at least 40 feet into the surface area.

24.45.050 Private Streets.

(Amended by Ordinance No. 169228, Aug. 23, 1995.) Private street improvements shall consist of 1-1/2 inches of Class "C" asphalt concrete on 1-1/2 inches of Class "B" asphalt concrete on 6 inches of 1-1/2 inch minus compacted crushed gravel upon a compacted subgrade that has achieved 95 percent compaction.

No gates or other barriers which would restrict vehicles or pedestrians from using the private street may be located on a private street approved under this section.

Chapter 24.50

FLOOD HAZARD AREAS

(New Chapter substituted by Ordinance
No. 160413, effective Jan. 14, 1988.)

Sections:

24.50.010 Purpose.

The purpose of this Chapter is to protect the public health, safety, and welfare by restricting or prohibiting uses which are dangerous to health, safety, or property in times of flood or which cause increased flood heights or velocities, and by requiring that uses and structures vulnerable to floods be protected from flood danger at the time of initial construction.

24.50.020 General.

(Amended by Ordinance No. 182370, effective November 26, 2008.)

A. The provisions of this Chapter shall regulate development and construction in flood hazard areas identified in Section 24.50.030.

B. Land classified in a flood hazard area may restrict or affect uses and development permitted in one or more of the regular zones listed in Chapter 33.16. If an inconsistency exists between Chapter 24.50 and other titles of this Code, the more restrictive uses or requirements shall prevail.

C. A structure or the use of a structure or property which was lawful before the original date of this Chapter but which is not in conformity with the provisions of this Chapter may be continued subject to provisions of the State Building Code, regulations for existing structures.

D. The flood protection elevations and the floodway and floodway fringe areas specified by this Chapter, based on the 100-year flood elevations, are considered reasonable. Greater flood heights and more extensive floodway fringe areas associated with longer flood frequency occurrences may occur or the flood height and extent of flooding may be increased by human or natural causes, such as log jams, bridge openings restricted by debris, or changes in basin conditions. Areas within designated drainage districts and those areas not covered by adequate topographic maps may contain unmapped watercourses subject to flooding. The identification of designated flood hazard areas does not imply that lands outside of such areas will be free from flooding or flood damage.
The City of Portland or any officer or employee thereof, or the Federal Insurance Administration shall not be liable for any flood damages that result from reliance on the provisions or designations of this Chapter or any administrative decision lawfully made thereunder.

24.50.030 Flood Related Definitions.
(Amended by Ordinance Nos. 178741, 182370 and 184235, effective November 26, 2010.) The definitions contained in this Section relate to flood hazard areas and considerations outlined in this Chapter.

A. "Appeal" means a request for a review of the City of Portland's interpretation of any provision of this ordinance or a request for a variance.

B. "Area of shallow flooding" means a designated AO or AH zone on the Flood Insurance Rate Map (FIRM). The base flood depths range from 1 to 3 feet; a clearly defined channel does not exist; the path of flooding is unpredictable and indeterminate; and, velocity flow may be evident. AO is characterized as sheet flow and AH indicates ponding.

C. "Areas of Special Flood Hazard" mean the land in the flood plain within a community subject to a one percent or greater chance of flooding in any given year. Designation on maps always includes the letters A or V.

D. "Base Flood (100-year flood)" means the flood having 1 percent chance of being equaled or exceeded in any given year. Designation on maps always includes the letters A or V.

E. "Basement" means any area of the building having its floor subgrade (below ground level) on all sides.

F. "City Datum" means the reference datum for the City of Portland maps. The FIRM maps described in Section 24.50.050 are referenced to the North American

Vertical Datum (NAVD) of 1988. To convert NAVD 1988 level to City datum, subtract 2.125 feet from the elevation referenced to NAVD 1988 level.

G. "Development" means any man-made change to improved or unimproved real estate, including but not limited to buildings, bridges, other structures, and mining, dredging, filling, grading, paving, excavation, fencing, landscaping, drainage facilities, drilling operations, or storage of equipment or material.

H. "Existing manufactured home park or manufactured home subdivision" means a parcel (or contiguous parcels) of land divided into two or more manufactured home lots for rent or sale for which the construction of facilities for servicing the lot on which the manufactured home is to be affixed (including as a minimum, the installation of utilities, either final site grading or the pouring of concrete pads, and the construction of streets) is completed before the original date of this Chapter.

I. "Expansion to an existing manufactured home park or manufactured home Subdivision" means the preparation of additional sites by the construction of facilities for servicing the lots on which the manufactured homes are to be affixed (including the installation of utilities, either final site grading or the pouring of concrete pads, and the construction of streets).

J. "FIA" means Federal Insurance Administration.

K. "Flood Hazard Area" means any area which has been identified as subject to flooding.

L. “Flood Insurance Study” means the official report provided by the Federal Insurance Administration that contains information regarding flooding, discusses the engineering methods used to develop the Flood Insurance Rate Maps (FIRMs), includes flood profiles, and the water surface elevation of the base flood.

M. "Flood Insurance Rate Map (FIRM)" means the official map on which the Federal Insurance Administration has delineated the areas of special flood hazards.

N. "Flood or flooding" means a general and temporary condition of partial or complete inundation of normally dry land areas from the overflow of inland or tidal waters, and/or the unusual and rapid accumulation of runoff of surface waters from any source.

O. "Flood protection elevation" means the water surface elevation of the base flood plus a freeboard allowance.

P. "Floodplain" means the channel of watercourse and adjacent land areas which are subject to inundation by the base flood.

Q. "Floodproofing" means any combination of structural and nonstructural additions, changes, or adjustments to structures which reduce or eliminate flood damage to real estate or improved real property, sanitary, and water facilities, structures, and their contents.

R. "Floodway" means the channel of a river or other watercourse and the adjacent land areas that must be reserved in order to discharge the base flood without cumulatively increasing the water surface elevation more than one foot. The actual floodway boundaries are computer activated and approximate. These boundaries are depicted on the FIRM. Boundaries for other watercourses may be subject to identification by the Sewage System Administrator. The width of the floodway for unidentified watercourses should not be less than 15 feet.

S. "Flood fringe area" means any area lying outside the floodway which is subject to flooding by a base flood and for which water surface elevations and floodway and flood fringe boundaries have been determined by a Flood Insurance Study and are shown on the FIRMs. Boundaries for unidentified watercourses may be subject to identification by the Sewage System Administrator.

T. "Freeboard" means an additional height above the base flood level to account for factors that may contribute to flood heights greater than the height calculated for a selected size flood and floodway conditions, such as filling in the floodway fringe, wave action, effect of urbanization of the watershed, map inaccuracies, irregular stream cross sections, irregular constructions at bridges, and the uncertainties of flood discharge computations.

U. "Lowest Floor" means the lowest floor of the lowest enclosed area (including basement). An unfinished or flood resistant enclosure, usable solely for parking of vehicles, building access or storage, in an area other than a basement area, is not considered a building's lowest floor, provided that such enclosure is not built so as to render the structure in violation of the applicable non-elevation design requirements of this ordinance found at Section 24.50.060 F.2.

V. "Manufactured home" means a structure transportable in one or more sections, which is built on a permanent chassis and is designed for use with or without a permanent foundation when connected to the required utilities. For flood plain management purposes, the term "manufactured home" also includes park trailers, travel trailers, and other similar vehicles placed on a site for greater than 180 consecutive days. For insurance purposes, the term "manufactured home" does not include park trailers, travel trailers, and other similar vehicles.

W. "New construction" means structures for which the start of construction commenced on or after the effective date of this Chapter.

X. "New manufactured home park or manufactured home subdivision" means a parcel (or contiguous parcels) of land divided into two or more manufactured home lots for rent or sale for which the construction of facilities for servicing the lots on which the manufactured home is to be affixed (including as a minimum, the installation of utilities, either final site grading or the pouring of concrete pads and the construction of streets) is completed on or after the original date of this Chapter.

Y. “Start of construction” includes substantial improvement, and means the date the building permit was issued, provided the actual start of construction, repair, reconstruction, placement or other improvement was within 180 days of the permit date. The actual start means either the first placement of permanent construction of a structure on a site, such as the pouring of slab or footings, the installation of piles, the construction of columns, or any work beyond the stage of excavation; or the placement of a manufactured home on a foundation. Permanent construction does not include land preparation, such as clearing, grading and filling; nor does it include the installation of streets, walkways, sanitary sewers, storm sewers, and/or drainage facilities; nor does it include excavation for a basement, footings, piers, or foundation or the erection of temporary forms; nor does it include the installation on the property of accessory buildings, such as garages or sheds not occupied as dwelling units or not part of the main structure.

Z. “Structure or accessory structure” means, for the purposes of this Chapter, a walled and roofed building including a gas or liquid storage tank that is principally above ground.

AA. “Substantial Damage” means damage of any origin sustained by a structure whereby the cost of restoring the structure to its before damaged condition would equal or exceed 50 percent of the market value of the structure before the damage occurred.

BB. "Substantial Improvement" means any repair, reconstruction, or improvement of a structure, the cost of which equals or exceeds 50 percent of the market value of the structure, either:

1. Before the improvement or repair is started, or

2. If the structure has been damaged, and is being restored, before the damage occurred. Substantial improvement is considered to occur when the first alteration of any wall, ceiling, floor, or other structural part of the

building commences, whether or not that alteration affects the external dimensions of the structure.
The term does not, however, include either:

a. Any project for improvement of a structure to comply with existing State or local health, sanitary, or safety code specifications which are solely necessary to assure safe living conditions, or

b. Any alteration of a structure listed on the National Register of Historic Places or the State Inventory of Historic Places.

CC. "Variance" means a grant of relief from the requirements of this ordinance which permits construction in a manner that would otherwise be prohibited by this ordinance.

DD. "Water surface elevation" means the height of the water surface of the base flood for any point along the longitudinal course of a stream.

EE. "Watercourse" means a channel in which a flow of water occurs, either continuously or intermittently, and if the latter, with some degree of regularity. Watercourses may be either natural or artificial.

24.50.040 FIA Study and Flood Hazard Maps.
(Amended by Ordinance Nos. 173979, 176955, 178741, 182671 and 184235, effective November 26, 2010.) The following study and maps in this Section are hereby adopted and declared to be a part of this Chapter.

A. Flood Insurance Study is the official scientific and engineering report entitled "Flood Insurance Study for City of Portland, Oregon: Multnomah, Clackamas and Washington Counties", dated November 26, 2010 prepared by the Federal Insurance Administration (FIA) under agency agreement with the Portland District Corps of Engineers. The latest edition of the report, along with accompanying FIRMs, are on file with the Bureau of Development Services.

B. Flood Insurance Rate Maps (FIRMs) are the official maps entitled "The Flood Insurance Rate Maps (FIRMs) for City of Portland, Oregon: Multnomah, Clackamas and Washington Counties", dated either October 19, 2004 or November 26, 2010, whichever is more current, on which the Federal Insurance Administration has delineated the areas of flood hazards along with the 100-year (base flood) and 500-year flood boundaries, the floodway zone boundaries and the 100-year flood elevations.

C. Water Features Map is the official map, dated May, 1981, or latest edition, compiled by the Bureau of Planning and Sustainability delineating certain watercourses which are subject to special flood hazard and drain 30 acres or more.

D. When base flood elevation data has not been provided by the FIA study, the Sewage System Administrator may obtain, review, and reasonably utilize any base flood elevation and floodway data available from a federal, state, or other source. This data shall be utilized only after technical review and approval of the Sewage System Administrator.

E. The "Title 3 Water Quality and Flood Management Area Map," as adopted by Metro Council on June 18, 1998, is the official map which identifies areas as "February 1996 Flood Inundation." The identified areas are subject to the regulations of this Title.

24.50.050 Flood Hazard Areas and Flood Protection Elevations.

(Amended by Ordinance Nos. 173979, 178741 and 182370, effective November 26, 2008.) Flood hazard areas shall contain all lands located within the Floodway boundary, Flood Zones within the Flood fringe areas, and other identified Flood Zones. Identified Flood Zones are depicted on the National Flood Insurance Rate Map (FIRM). Both identified and unidentified Flood Hazard areas along with flood protection elevations are described in the following. Figure 1 illustrates the basic flood hazard areas and elevations.

(See Figure 1 at the end of Title 24)

A. Columbia River FIRM Flood Zone AE. These flood zones represent areas for which base flood elevations are determined. The flood protection elevation shall be the base flood elevation plus one foot of freeboard. The nominal one-foot increase for freeboard reflects the relatively wide flood plain of the Columbia River. In the vicinity of the confluence of the Columbia and Willamette Rivers, the Columbia River floodplain shall be considered to be east of the westerly floodway fringe boundary of the Columbia Slough.

B. Multnomah Drainage District No. 1 and Peninsula Drainage District No. 2 FIRM Zone AH. This flood zone represents isolated areas of shallow flooding (1 to 3 feet in depth, resulting from upslope runoff) for which base flood elevations are determined. In the case of unidentified watercourses occurring within the boundaries of the Drainage Districts, the base flood elevation shall be estimated by procedures described in paragraph G. below. The flood protection elevation shall be the base flood elevations plus one foot of freeboard.

C. Columbia River FIRM Flood Zone A. These flood zones represent areas for which base flood elevations are not determined. The flood protection elevation

shall be either the grade at the adjacent flood fringe boundary or the crown of the nearest street, whichever is higher, plus one foot of freeboard.

D. Willamette River FIRM Flood Zone AE. These flood zones represent areas for which the base flood elevations are determined. The flood protection elevation shall be the base flood elevation plus two feet of freeboard.

E. Johnson Creek, Fanno Creek and Crystal Springs Creek FIRM Flood Zone AE. This flood zone represents area for which the base flood elevations are determined. The flood protection elevation shall be the base flood elevation plus two feet of freeboard.

F. Johnson Creek FIRM Flood Zone AH. This flood zone represents areas of shallow flooding depth (1 to 3 feet) for which base flood elevations are determined. The flood protection elevation shall be the base flood elevation plus two feet of freeboard.

G. Johnson Creek FIRM Flood Zone AO. This flood zone represents areas of shallow flooding depth (1 to 3 feet) for which the depths of flooding are determined. The flood protection elevation shall be the depth of flooding shown on the FIRM map plus two feet of freeboard above the highest adjacent grade.

H. Johnson Creek, Fanno Creek, Tryon Creek, and Crystal Springs Creek FIRM Flood Zone A. These flood zones represent areas for which base flood elevations are not determined. The flood protection elevation shall be the base flood elevation plus two feet of freeboard. Base flood elevations shall be calculated in accordance with paragraph I. below.

I. Unidentified Watercourse Flood Zones. These watercourses, generally draining one acre or more, are not identified in a Federal Insurance Study and may not be identified on the Water Features map. The flood protection elevation shall be the base flood elevation plus two feet of freeboard. The width of the floodway shall not be less than 15 feet. The floodway boundary, flood fringe boundary, and flood protection elevation data shall be based upon watercourse geometry, slope, channel roughness, effect of obstructions, backwater and other factors which affect flood flow. The requisite flood hazard data, maps, and sections shall be obtained and developed by procedures approved by the Sewage System Administrator. When appropriate and necessary data are available, the flood protection elevation and floodway and flooding fringe boundary data may be provided by the Sewage System Administrator. If pertinent hydrologic data and topographic data are not available, inaccurate, or outdated, and where substantial alterations or relocations of a watercourse are involved, the Sewage System Administrator may require the permit applicant to secure a registered engineer

and surveyor to develop and supply the requisite flood hazard data, maps, and sections.

J. Metro Flood Management Areas. Flood 1996 inundation areas shown on Metro Title 3 Water Quality and Flood Management Area Maps shall have a flood protection elevation which provides two feet of freeboard above the Flood 1996 level. Flood 1996 inundation areas adjacent to Columbia River FIRM Flood Zone AE, Multnomah Drainage District No. 1, Peninsula Drainage District No. 2 Firm Zone AH and Columbia River FIRM Flood Zone A shall have freeboard of one foot.

24.50.060 Provisions for Flood Hazard Reduction.

(Amended by Ordinance Nos. 165678, 169905, 172209, 173979, 176955, 178741, 182370 and 184235, effective November 26, 2010.) In all flood hazard areas defined in Section 24.50.050, the following provisions are required:

A. Permits. All permit applications shall be reviewed to determine whether proposed building sites will be reasonably safe from flooding. A development or building permit shall be obtained before construction or development begins within any area of flood hazard. Such applications for permits shall include the following specific information:

1. Elevation of lowest floor, including basement, for all structures and floodproofed elevations for nonresidential structures.

2. Elevation of lowest point of bridge structures.

3. Existing and proposed topography of the site taken at a contour interval (normally 1 foot) sufficiently detailed to define the topography over the entire site and adjacent watercourses subject to flooding. Ninety percent of the contours shall be plotted within 1 contour interval of the true location.

4. All necessary permits obtained from the federal and state governmental agencies from which prior approval is required.

5. Where elevation data is not available either through the Flood Insurance Study or from another authoritative source (Section 24.50.050 G.), applications for building permits shall be reviewed to assure that proposed construction will be reasonably safe from flooding. The test of reasonableness is a local judgment and includes use of any available hydrological data, drainage basin hydrology, historical data, high water marks, photographs of past flooding, etc., where available. Failure to

elevate at least two feet above grade in these zones may result in higher insurance rates.

B. Elevation reference. The survey reference datum for finished lowest floor including basement, floodproofed elevations, and finished site grades shall be either the North American Vertical Datum of 1988 or City of Portland datum, whichever is appropriate. When approved by the City Engineer, a local onsite survey reference datum may be adopted for FIRM Zones A and Unidentified Watercourse Flood Zones. The survey reference datum shall be indicated on all relevant plan and Section drawings, and the certified Flood-Elevation Certificate.

C. Certification of elevations and floodproofing. All finished elevations as specified hereunder shall be certified on a FEMA (FIA) Elevation Certificate by a licensed surveyor secured by the permittee, and made part of the permit records.

1. As-built elevation of lowest floor including basement, of all new or substantially improved structures;

2. As-built floodproofed elevation of all new or substantially improved nonresidential structures;

3. As-graded elevation of lowest grade within 25 feet of structures;

4. As-graded elevation of lowest crawl space grade, as applicable.
All floodproofing materials and methods for nonresidential structures shall be certified by a licensed professional engineer or architect as meeting the criteria in Section 24.50.060 F7.

D. Floodway. Encroachments into the floodway by development and structures defined in Section 24.50.020 are prohibited unless it is demonstrated by technical analysis from a registered engineer that the development will result in no increase in the base flood elevation. In areas where a regulatory floodway has not been designated, no new construction, substantial improvement or other development (including fill) shall be permitted within Zone AE, unless it is demonstrated that the cumulative effect of the proposed development, when combined with all other existing and anticipated development, will not increase the water surface elevation of the base flood more than 1 foot at any point within the community. Technical analysis shall be reviewed and approved by the Sewage System Administrator. However, the minimum width of the floodway shall not be less than 15 feet.

E. Alteration of watercourses. The Bureau of Development Services shall:

1. Notify adjacent communities and the Department of Land Conservation and Development prior to any alteration or relocation of a watercourse as identified in the Flood Insurance Study and Flood Insurance Rate Map, and submit evidence of such notification to the Federal Insurance Administration.

2. Require that maintenance is provided within the altered or relocated portion of said watercourse so that the flood carrying capacity is not diminished.

F. Special flood hazard areas.

1. General. All new construction and substantial improvements shall be anchored to prevent flotation, collapse or lateral movement of the structure.

2. Residential construction.

a. New construction and substantial improvement of any residential structure shall have the lowest floor, including basement, elevated to or above flood protection elevation. Floodproofing of "lowest floor" space is not permitted.

b. Fully closed areas below the lowest floor that are subject to flooding are prohibited or shall be used solely for parking of vehicles, building access or limited storage and be designed to automatically equalize hydrostatic flood forces on exterior walls by allowing the entry and exit of floodwaters. Designs for meeting this requirement must either be certified by a registered professional engineer or architect or must meet or exceed the following minimum criteria:

(1) A minimum of two openings having a total net area of not less than one square inch for every square foot of enclosed area subject to flooding shall be provided;

(2) The bottom of all openings shall be no higher than one foot above grade;

(3) Openings may be equipped with screens, louvers, or other coverings or devices provided that they permit the automatic entry and exit of floodwaters.

(a) Fills required to elevate the lowest floor to the flood protection level shall comply with Chapter 24.70. Fill selection and placement shall recognize the effects of inundation from floodwaters on slope stability, fill settlement, and scour. The minimum elevation at the top of the fill slope shall be at the base flood level. Minimum distance from any point of the building perimeter to the top of the fill slope shall be either 25 feet or twice the depth of fill at that point, whichever is the greater distance.

(b) Piling foundations required to elevate the lowest habitable floor to the flood protection level shall comply with Section 1809 and 1808 of the Structural Specialty Code. Pilings shall be spaced no more than 10 feet apart, and reinforcement shall be provided for piling more than 6 feet above the ground level.

3. Subdivision proposals.

a. All subdivision proposals shall be consistent with the need to minimize flood damage;

b. All subdivision proposals shall have public utilities and facilities such as sewer, gas, electrical and water systems located and constructed to minimize flood damage;

c. All subdivision proposals shall have adequate drainage provided to reduce exposure to flood damage; and,

d. Where base flood elevation data has not been provided or is not available from another authoritative source, it shall be generated for subdivision proposals and other proposed developments which contain at least 50 lots or 5 acres (whichever is less).

4. Nonresidential construction. New construction and substantial improvement of any commercial, industrial, or other nonresidential structure shall either have the lowest floor, including basement, elevated to the level of the flood protection elevation, or, together with attendant utility and sanitary facilities, shall:

a. Be floodproofed so that below the flood protection elevation the structure is watertight with walls substantially impermeable to the passage of water;

b. Have structural components capable of resisting hydrostatic and hydrodynamic loads and effects of buoyancy;

c. Be certified by a registered professional engineer or architect that the design and methods of construction are in accordance with accepted standards of practice for meeting provisions of this Subsection based on their development and/or review of the structural design, specifications and plans. Such certifications shall be provided to the Bureau of Development Services.

d. Nonresidential structures that are elevated, not floodproofed, must meet the same standards for space below the lowest floor as described for residential structures.

e. Applicants floodproofing nonresidential buildings shall be notified that flood insurance premiums will be based on rates that are one foot below the floodproofed level (e.g. a building constructed to the base flood level will be rated as one foot below that level).

5. Manufactured homes. All manufactured homes to be placed or substantially improved within Zones AO, AH and AE shall be elevated on a permanent foundation such that the lowest floor of the manufactured home is at or above the flood protection elevation and be securely anchored to prevent flotation, collapse or lateral movement and shall be installed using methods and practices that minimize flood damage. Anchoring methods may include, but are not limited to, use of over-the-top or frame ties to ground anchors (Refer to FEMA's "Manufactured Home Installation in Flood Hazard Areas" guidebook for additional techniques).

6. Utilities. All new and replacement water supply and replacement sanitary sewage systems shall be designed to minimize or eliminate infiltration of flood waters into the systems and discharges from the sanitary sewage systems into flood waters. On-site waste disposal systems shall be located to avoid impairment to them or contamination from them during flooding.

7. Construction materials and methods. All new construction and substantial improvements shall be constructed with materials and utility equipment resistant to flood damage, using methods and practices that minimize flood damage. Electrical, heating, ventilation, plumbing and

air-conditioning equipment and other service facilities shall be designed and/or otherwise elevated or located so as to prevent water from entering or accumulating within the components during conditions of flooding.

8. Balanced Cut and Fill Required. In all Flood Management Areas of the City not addressed by Section 24.50.060 G, balanced cut and fill shall be required. All fill placed at or below the base flood elevation shall be balanced with at least an equal amount of soil material removal. Soil material removal shall be within the same flood hazard area identified in Section 24.50.050 A. through I.

a. Excavation shall not be counted as compensating for fill if such areas will be filled with water in non-storm winter conditions.

b. Temporary fills permitted during construction shall be removed.

9. Tank anchoring. Tanks containing hazardous materials must be anchored to prevent flotation if they are located in areas of special flood hazard or flood management areas.

10. Uncontained hazardous materials as referred to in Section 101 (14) of the Comprehensive Environmental Response, Compensation and Liability Act of 1980 (42 U.S. Section 9601 et seq.) (CERCLA), section 502 (13) of the Clean Water Act and any other substances so designated by the Director of the Bureau of Development Services are prohibited in flood management areas.

11. AH/AO Zone Drainage. Adequate drainage paths shall be provided around structures on slopes to guide floodwaters around and away from proposed structures.

G. Johnson Creek Flood Zones - Special Provisions. In addition to other requirements of this chapter the following requirements shall apply within designated portions of the Johnson Creek Flood Zones:

1. All Johnson Creek Flood Zones

a. Balanced cut and fill. Within all areas of the Johnson Creek Flood Zones, all new fills below the base flood elevation shall be accompanied by an equal amount of excavation on the same site so that the storage capacity of the floodway and floodway fringe is retained.

b. Mitigation payment allowed in lieu of balanced cut and fill. After September 1, 1998 residential properties within the area of the 100 year floodplain, but outside of the floodway and Flood Risk Area, and bounded by I-205 on the west, SE 142nd Avenue on the east, and the Springwater Corridor Trail on the south, may elect to pay into the Johnson Creek Fill Mitigation Bank in lieu of creating a balanced cut and fill. The amount of the payment shall be determined by the Bureau of Environmental Services.

2. Johnson Creek Flood Risk Area. The following provisions shall apply within the Johnson Creek Flood Risk Area, as established in Chapter 33.535 of the City Code:

a. Balanced cut and fill. The requirements of subsection G.1. above, shall apply within the Johnson Creek Flood Risk Area.

b. Reduction in flooding capacity prohibited. Structures, fill or other development shall only be allowed in the Johnson Creek Flood Risk Area when they are designed so that there is no significant reduction in the storage capacity of the floodway and floodway fringe and there is no significant impediment to the passage of flood waters.

c. Exceptions to Section 24.50.060 G.2.:

(1) One story detached accessory buildings used as tool and storage sheds, playhouses and similar uses, provided the floor area does not exceed 120 square feet.

(2) Parking garages accessory to one and two family structures, provided the floor area does not exceed 300 square feet.

(3) Fences which do not prevent the flow of water.

d. Buildings designed to meet all of the following criteria shall be presumed to comply with Section 24.50.060.G.2.:

(1) At least 50% of perimeter walls located at, or below, the base flood elevation shall remain open and unenclosed;

(2) At least 25% of each perimeter wall located at, or below, the base flood elevation shall remain open and unenclosed; and

(3) The footprint of all portions of the building located at, or below, the base flood elevation shall not exceed 15% of the footprint of the building located above the base flood elevation.

24.50.065 Recreational Vehicles located in Areas of Special Flood Hazard or Base Flood Zones.

(Added by Ordinance No. 180330, effective August 18, 2006.)

A. Any recreational vehicle placed on a site located in either an Area of Special Flood Hazard or in the base flood zone shall:

1. Meet the elevation and anchoring requirements for manufactured homes;

2. Be on the site for fewer than 180 consecutive days; or

3. Be fully licensed and ready for highway use. As used in this section, "ready for highway use" means that the vehicle is on its wheels or jacking system, is attached to the site only by quick disconnect type utilities and has no permanently attached additions.

B. For the purpose of this section, "recreational vehicle" means any vehicle which is:

1. Built on a single chassis;

2. 400 square feet or less when measured at the largest horizontal projection;

3. Designed to be self propelled or permanently towable by a light duty truck; and

4. Designed primarily not for use as a permanent dwelling but as temporary living quarters for recreational, camping, travel or seasonal use.

24.50.070 Appeals and Variances.

(Amended by Ordinance No. 178741, effective October 19, 2004.)

A. Appeals. Any person aggrieved by a requirement, decision, or determination made pursuant to the administration of this Chapter may appeal such action to the Building Board of Appeal in accord with Chapter 24.10.

B. Variances. If variances from requirements of this Chapter are requested, all relevant factors and standards specified in other sections of this Chapter shall be considered, as well as the following:

1. The danger that materials may be swept into other lands to the injury of others;

2. The danger to life and property due to flooding or erosion damage;

3. The susceptibility of the proposed facility and its contents to flood damage and the effect of such damage on the individual owner;

4. The importance of the services provided by the proposed facility to the community;

5. The necessity to the facility of a waterfront location, where applicable;

6. The availability of alternative locations, not subject to flooding or erosion damage;

7. The compatibility of the proposed use with existing anticipated development;

8. The relationship of the proposed use to the Comprehensive Plan and Floodplain Management Program for that area;

9. The safety of access to the property in times of flood for ordinary and emergency vehicles;

10. The expected heights, velocity, duration, rate of rise, and sediment transport of the flood waters and the effects of wave action, if applicable, expected at the site;

11. The costs of providing governmental services during and after flood conditions including maintenance and repair of public utilities and facilities such as sewer, gas, electrical, and water systems, and streets and bridges; Upon consideration of the factors listed above and the purposes of this Chapter, such conditions may be attached to the granting of variances as deemed necessary.

C. Conditions for variances.

1. Generally the only condition under which variance from the elevation standard may be issued is for new construction and substantial improvements to be erected on a lot of 1/2 acre or less in size contiguous to and surrounded by lots with existing structures constructed below the base flood level, providing items (1-11) have been fully considered. As

the lot size increases, the technical justification required for issuing the variance increases.

2. Variances shall not be issued within designated floodway if any increase in flood levels during the base flood discharge would result.

3. Variances may be issued for the reconstruction, rehabilitation or restoration of structures listed on the National Register of Historic Places or the State Inventory of Historic Places, without regard to the procedures set forth in this Section.

4. Variances shall only be issued upon a determination that the variance is the minimum necessary, considering the flood hazard, to afford relief.

5. Variances shall only be issued upon:

a. A showing of good and sufficient cause,

b. A determination that failure to grant the variance would result in exceptional hardship to the applicant, and

c. A determination that the granting of a variance would not result in increased flood heights, additional threats to public safety, extraordinary public expense, create nuisances, cause fraud on or victimization of the public, or conflict with existing local laws or ordinances.

6. Any applicant to whom a variance is granted shall be given written notice that the structure will be permitted to be built with a lowest floor elevation below the base flood elevation and that the cost of flood insurance will be commensurate with the increased risk resulting from the reduced lowest floor elevation.

7. Variances as interpreted in the National Flood Insurance Program are based on the general zoning law principle that they pertain to a physical piece of property; they are not personal in nature and do not pertain to the structure, its inhabitants, economic or financial circumstances. They primarily address small lots in densely populated residential neighborhoods. As such, variances from the flood elevations should be quite rare.

8. Variances may be issued for nonresidential buildings in very limited circumstances to allow a lesser degree of floodproofing than watertight or dry-floodproofing, where it can be determined that such action will have

low damage potential, complies with all other variance criteria except 24.50.070 C.1. and otherwise complies with Section 24.50.060 F.1. and 24.50.060 F.7.

Chapter 24.51
WILDFIRE HAZARD ZONES

(New Chapter added by Ordinance
No. 177433, effective May 30, 2003.)

Sections:

24.51.010 Purpose.

The purpose of this Chapter is to adopt the criteria that will be used to specify areas of the City to be classified as Wildfire Hazard Zones, so that roof materials may be limited.

24.51.020 Definitions

(Amended by Ordinance No. 180917, effective May 26, 2007.) The definitions contained in this Section relate to Wildfire Hazard zones and considerations outlined in this Chapter.

A. **Chief** means the Chief of Portland Fire & Rescue or the Chief's duly authorized representative.

B. **Department of Forestry (DOF)** means the State of Oregon Department of Forestry.

C. **Wildfire Hazard Zon**e means those areas of the City as determined by the Chief that rate a minimum score of 5 or higher using the following criteria developed by DOF:

1. Topography hazard factor value

2. Natural vegetative fuel hazard factor value

3. Natural vegetative fuel distribution hazard factor value

D. **Wildfire Hazard Zone Map** means the WHZM attached to Ordinance No. 177433 and as it may be amended from time to time based on the criteria herein.

E. **Hazard Factor.** Hazard Factors are topography, certain natural vegetative fuels and natural, vegetative fuel distribution. Any of these factors, or a combination thereof, may cause an area of the City to be included within a Wildfire Hazard Zone.

F. **Topography Hazard Factor Value** means the hazard value as determined by DOF associated with site slope which effects the fire spread velocity.

G. **Natural Vegetative Hazard Factor Value** means the numerical value assigned by DOF, extrapolated from the "Aids to Determining Fuel Models for Estimating Fire Behavior" published by the Forest Service, USDA Intermountain Forest and Range Experiment Station in 1982 as General Technical Report INT-122, for various common vegetation.

H. **Natural Vegetative Fuel Distribution Hazard Factor Value** means the numerical value assigned by DOF for the percentage of site that is covered by vegetation described in 24.51.020 G.

24.51.030 Wildfire Hazard Zone Map Adoption.

A. Wildfire Hazard Zone Map Adoption.

1. A Wildfire Hazard Zone Map (WHZM) has been developed for the City of Portland through a review of topography, weather, type vegetation and fuel density. This map is dated October 11, 2002.

2. The WHZM dated October 11, 2002, is hereby adopted by reference and incorporated into this ordinance.

3. The Chief shall provide the Director with a copy of the official map adopted in Subsection one of this Section. Copies of the map shall be available for review in the Development Services Center, First Floor 1900 SW 4th Avenue, Portland Oregon.

B. Revisions to the Wildfire Hazard Zone Map.

1. The WHZM may be amended from time to time to either include or exclude properties as the facts may warrant.

2. The Chief shall have the authority to revise the Wildfire Hazard Zone Map.

3. All Wildfire Hazard Zone map revisions shall be determined using the criteria set forth below. Any site having a cumulative hazard value of five (5) or more shall be included in a wildfire hazard zone.

a. Topography Hazard Factor Value. The topography hazard value shall be calculated as follows:

(1) Determine site slope using the appropriate 7.5 minute quadrangle map published by the U.S. Geological Survey, USDI.

(2) Select appropriate hazard value using Table 1.

TABLE 1
APPROPRIATE TOPOGRAPHY
HAZARD FACTOR VALUE

Site Slope as determined by the 7.5 minute quadrangle map	Hazard Value
Slopes 00 to < 03%	0
Slopes 03 to < 12%	1
Slopes 12 to < 20%	2
Slopes 20% or greater	3

b. Natural Vegetative Fuel Hazard Factor Value. The natural vegetative fuel hazard value shall be calculated as follows:

(1) Divide the jurisdiction into geographic areas which best describe the natural vegetation expected to occupy sites for the next 10 to 15 years.

(2) Select the appropriate hazard value from Table 2.

TABLE 2
NATURAL VEGETATIVE FUEL
HAZARD FACTOR VALUE

Natural Vegetative Fuel Description [1]		Hazard Value [2]
Limited	Little or no natural vegetative fuels are present.	0

Natural Vegetative Fuel Description [1]		Hazard Value [2]
Grass	Very little shrub or timber is present, generally less than one-third of the area. Main fuel is generally less than two feet in height. Fires are surface fires that move rapidly through cured grass and associated material. (Fuel model 1)	3
Grass	Open shrub lands and pine stands or scrub oak stands that cover one-third to two-thirds of the area. Main fuel is generally less that two feet in height. Fires are surface fires that spread primarily through the fine herbaceous fuels, either curing or dead. (Fuel model 2)	3
Grass	Beach grasses, prairie grasses, marshland grasses and wild or cultivated grains that have not been harvested. Main fuel is generally less than four feet in height, but considerable variation may occur. Fires are the most intense of the grass group and display high rates of spread under the influence of wind.(Fuel model 3)	3
Shrubs	Stands of mature shrubs have foliage known for its flammability, such as gorse, manzanita and snowberry. Main fuel is generally six feet or more tall. Fires burn with high intensity and spread very rapidly. (Fuel model 4)	3

Natural Vegetative Fuel Description [1]		Hazard Value [2]
Shrubs	Young shrubs with little dead material and having foliage not known for its flammability, such as laurel, vine maple and alders. Main fuel is generally three feet tall or less. Fires are generally carried in the surface fuels and are generally not very intense. (Fuel model 5)	1
Shrubs	Older shrubs with foliage having a flammability less than fuel model 4, but more than fuel model 5. Widely spaced juniper and sagebrush are represented by this group. Main fuel is generally less than six feet in height. Fires will drop to the ground at low wind speeds and in stand openings. (Fuel model 6)	2
Timber	Areas of timber with little undergrowth and small amounts of litter buildup. Healthy stands of lodgepole pine, spruce, fir and larch are represented by this group. Fires will burn only under severe weather conditions involving high temperatures, low humidity and high winds. (Fuel model 8)	1
Timber	Areas of timber with more surface litter than fuel model 8. Closed stands of healthy ponderosa pine and white oak are in this fuel model. Spread of fires will be aided by rolling or blowing leaves. (Fuel model 9)	2

Natural Vegetative Fuel Description [1]		Hazard Value [2]
Timber	Areas of timber with heavy buildups of ground litter caused by over-maturity or natural events of wind throw or insect infestations. Fires are difficult to control due to large extent of ground fuel. (Fuel model 10)	3

1. Some areas may contain vegetative fuels other than those listed in Table 2. Additional natural fuel hazard factors may be found in "Aids to Determining Fuel Models for Estimating Fire Behavior" published by the Forest Service, USDA Intermountain Forest and Ranger Experiment Station in 1982 as General Technical Report INT-122. Vegetative fuel hazard factors determined using General Technical Report INT-122 shall be used as alternative factors, for review under this chapter, as the facts warrant.

2. Due to various factors, such as variations in local vegetation species or vegetation conditions, the fuel models used in Table 2 may not accurately portray wildfire behavior. The Chief may make modifications to the hazard values as necessary to accurately reflect the following characteristics:

(a) A hazard value of 1 shall describe vegetation that typically produces a flame length of up to 5 feet, a wildfire which exhibits very little spotting, torching, or crowning, and which results in a burned area that can normally be entered within 15 minutes.

(b) A hazard value of 2 shall describe vegetation that typically produces a flame length of 5 to 8 feet, a wildfire which exhibits sporadic spotting, torching, or crowning, and which results in a burned area that can normally be entered within one hour.

(c) A hazard value of 3 shall describe vegetation that typically produces a flame length of over 8 feet, a wildfire that exhibits frequent spotting, torching, or crowning, and which results in a burned area that normally cannot be entered for over one hour.

c. Natural Vegetative Fuel Distribution Hazard Factor Value . To determine the natural vegetative fuel distribution hazard factor value:

(1) Determine the percentage of each individual area that is covered by vegetation.

(2) Using the calculated percentage, assign a value using Table 3.

TABLE 3
NATURAL VEGETATIVE FUEL
DISTRIBUTION HAZARD FACTOR

Natural Vegetative Fuel Distribution	Hazard Value
0 to 10% of the area	0
10 to 25% of the area	1
25 to 40% of the area	2

24.51.040 Map Revision Process

A. Wildfire Hazard Zones may be applied to or removed from areas of the City as follows:

1. During periodic review by the Chief, based upon the criteria listed in section 24.51.030. Periodic review shall occur every 5 years.

2. Upon request to the Chief by any property owner, prior to periodic review, on the grounds that conditions have changed.

B. Prior to applying the Wildfire Hazard Zone to any property the Chief shall provide notice of such proposed zoning and provide a date for a public hearing. The notice shall be sent to all properties to which the zone would be applied. The notice shall be sent fourteen days prior to the date of the hearing. Extensions of time for the hearing may be requested and may be provided by the Chief. The notice shall provide information regarding the City's intention to apply the Wildfire Zone, the reasons therefore and the time and place for the hearing.
Within 7 days of the hearing the Chief shall issue a written decision, based upon the criteria listed above, and which shall include findings supporting that decision and shall contain information regarding the right to appeal the Chief's decision to the Bureau of Development Service's Appeals Board (Board). A copy of the decision shall be sent to all properties that received notice of the City's intention to include these properties within a Wildfire Hazard Zone.

C. When a property owner provides the Chief with a written request that the Wildfire Hazard Zone be removed from specific property the Chief shall consider the request and, based upon the criteria listed above, shall either approve or deny the request.
Such action by the Chief shall occur within 14 days of the date of the request and shall be in writing, shall include findings based upon the facts and criteria and shall contain information regarding the right to appeal the Chief's decision to the

Board. This decision shall be mailed to the property owner requesting the change in status.

24.51.050 Appeals of Decisions Made by the Chief

Notwithstanding any contradictory portion of Code Section 24.10.080:

A. Any decision made by the Chief, regarding the application of a Wildfire Hazard Zone to any area in the City, may be appealed to the Bureau of Development Services Board of Appeals (Board) solely in accordance with this subsection. In considering such appeals the Board shall act solely in accord with this section.

B. Such appeal shall be in writing and shall be filed with the Board within fourteen days of the date of the Chief's decision. The appeal shall include a statement regarding the elements of the Chief's decision with which the appellant takes issue. Reference to facts and the criteria listed above, is required.

C. A copy of the appeal shall be provided to the Chief at the same time that it is filed with the Board. The Chief shall have fourteen days from the date of the appeal to respond, in writing, to the Board and all appellants.

D. The Board shall issue a notice of a hearing date and the place and time of the hearing. Notice shall be provided to the appellants and the Chief.

E. The Board shall then hold a hearing upon any such appeal. After considering the issues raised on appeal, and the reasonableness of the Chief's interpretation of applicable criteria, the Board shall, by majority vote, affirm or modify the Chief's decision. The Board's decision shall be based solely upon the criteria set out in this Chapter and shall include findings addressing the facts and the criteria. The decision of the Board shall have full force and effect. A certified copy of the decision shall be delivered to the appellant.

Any appeal of the Board's decision shall by writ of review.

24.51.060 General

(Amended by Ordinance Nos. 178745 and 179125, effective April 1, 2005.)

A. In addition to the other City codes, all structures located in wildfire hazard zones as identified in the Wildfire Hazard Zone map shall meet the applicable requirements in the State of Oregon Structural Specialty Code or the Residential Specialty Code as applicable.

B. The requirements in Chapter 24.75, Uniform Building Address System, supercede the requirements found in OSSC Appendix L, Section L101.7, for premises identification.

Chapter 24.55

BUILDING DEMOLITION

(New Section substituted by
Ordinance No. 167088; amended by
171455, effective August 29, 1997.)

Sections:

24.55.100 Demolition - Debris - Barricades - Nuisances.

(Amended by Ordinance No. 171455, effective August 29, 1997.) It is unlawful for any owner or persons in control of any such structure which is being demolished, or which has been damaged by fire, to leave any portion of the structure unsupported for more than 1 hour, if such Section is liable to collapse or is in any way a danger to the public. In no event shall a portion of the structure be left unsupported for more than 24 hours. Suitable barricades shall be provided to prevent access to the vicinity of any unsupported Section of the structure. Any permanent structural supports provided as a result of application to this Section shall be designed by a structural engineer registered to practice in the State of Oregon and hired by the applicant. All such designs, calculations, drawings, and inspection reports shall be approved by the Director.

All combustible debris or material shall be removed from the premises on which the demolition is carried out within 30 days from the completion of the demolition, or from the stoppage of the work thereon if the work remains uncompleted. All non-combustible debris or material resulting from demolition shall be removed within 30 days after the completion of the demolition or stoppage thereof, unless the Director extends the time therefore because of weather, terrain, or other special circumstances, but such extension shall not exceed 3 months. It is unlawful for any owner or person in possession of real property to permit the debris to remain on the property without disposal in excess of the periods mentioned above or of any specific extension thereof as set forth above.

Any of the above-mentioned things existing while there is a duty to remove or correct the same, shall constitute a public nuisance. Any unsupported portions of a building or structure existing beyond the periods set forth above shall be subject to summary abatement by the City. The abatement shall be in accordance with the procedure set forth in Title 18, Chapter 18.03, Nuisance Abatement.

All structures to be demolished shall be taken down in a safe manner. The streets or sidewalks shall not be littered with rubbish and shall be wet down, if necessary. During

any demolition work, all receptacles, drop boxes, shafts, or piping used in such demolition work shall be covered in an appropriate manner. After removal of any structure all foundations that are not to be used for new construction shall be removed and all excavations filled in compliance with Chapter 24.70 of this Title, to a level of the adjoining grade. Plans shall be submitted for any new construction proposed, utilizing the remaining foundations. Any remaining foundations approved for further use shall be barricaded by a fence no less than 8 feet high maintained until the new construction has progressed sufficiently to remove any hazards to the public. Such period of time is not to exceed 30 days. For regulations on the use of public streets and protection of pedestrians during demolition see Chapter 24.40 of this Title.

24.55.150 Definitions.

(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.200 Demolition Delay - Housing Preservation.

(Amended by Ordinance Nos. 171455 and 176955, effective October 9, 2002.)

A. Purpose. The demolition delay provisions are intended to allow an adequate amount of time to help save viable housing in the City while recognizing a property owner's right to develop or redevelop property. The regulations provide an opportunity for public notice of impending demolitions and coordination of the efforts of various City bureaus. The regulations also encourage moving as an alternative to demolition. The provisions accomplished this through a two part process:

1. a 35 day notice period during which demolition is delayed, and

2. a possible 120 day extension of the demolition delay period.

B. Where the delay applies. The demolition delay regulations of this Section (24.55.200) apply to sites with residential structures in areas with a residential Comprehensive Plan Map designation. The regulations only apply to applications for demolition of residential structures. They do not apply to demolitions of accessory structures such as garages or other outbuildings.

C. Application for building permit for demolition.

1. Signed statement. The application for a building permit for demolition must include a statement signed by the owner(s) of the property. The statement must acknowledge that the owner(s) are aware of the primary uses permitted under the current zoning on the site without a conditional use, zone change, Comprehensive Plan Map amendment, or other land use approval and that such an approval will be required before other uses will

be permitted on the site. The statement may be on forms that the Director may make available.

2. Delay in issuing. The building permit for demolition will not be issued except as provided for in this Section (24.55.200).

D. Notice of application.

1. Posted notice. Within five days of receipt of the application for demolition, the Director will post a notice of the requested demolition at the site. The notice must be posted at the site for no less than 30 day. The notice must be at least 1-1/2 by 2 feet in size and must be visible to passers-by. The notice must contain at least the following information.

a. Notice that the site has been proposed for demolition,

b. The date the application for demolition was received,

c. Notice that there is a demolition delay period of 35 days which may be extended upon request from the Recognized Organization(s) whose boundaries include the site,

d. The last day that requests for extended delay may be submitted, and

e. The location where more information is available.

2. Notice to the recognized organization(s). Within 7 days of the receipt of the application for demolition, the Director will send a written notice of the demolition request to the recognized organization(s), recognized by the Office of Neighborhood Associations, whose boundaries include the site.

3. Notice to Portland Development Commission. Within 7 days of the receipt of the application for demolition, the Director will send a written notice of the demolition request to the Portland Development Commission. Within 14 days of the receipt of the application for demolition, the Portland Development Commission will forward to the owner of the property such materials explaining City housing programs that the Commission deems appropriate.

E. 35-day notice period. The building permit for demolition will not be issued during the 35-day notice period. The notice period begins on the day the application is received. If no written request to extend the demolition delay is received during the 35 day notice period as provided in subsection 24.55.200 F.

below, then the Bureau of Development Services will issue the building permit for demolition.

F. Requests for extension of demolition delay period. Requests to extend the demolition delay period may be made as follows:

1. Who may request. Requests to extend the demolition delay period an additional 120 days may be made by a recognized organization whose boundaries include the site.

2. How to request. The request to extend the demolition delay period must be made in writing, on forms provided by the Director. They must be submitted to the Bureau of Development Services by 4:30 PM on the last day of the 35-day notice period.

G. 120-day extension of demolition delay period. If a request for extension of the demolition delay is received, the building permit for demolition will not be issued during the 120-day extension period except as provided in Subsection 24.55.200 H. below. During the 120-day extension period, private citizens or the City may pursue alternatives to demolition such as rehabilitating the structure or moving the structure in accordance with agreements reached with the applicant. These efforts may use private resources or public programs that may be available. Mitigation efforts such as a salvage agreement may also be pursued during this period.

H. Appeal of the 120 day extension. The applicant for demolition may appeal the 120-day extension to the Code Enforcement Hearings Officer as provided in Chapter 22.10, Appeals to the Code Hearings Officer. The appeal may be filed anytime within the 120-day extension period. The approval criteria for termination of the extension period are as follows: The demolition delay extension will be terminated if the Hearings Officer finds that the recognized organization that requested the extension has not made a good faith effort to work with the applicant for demolition to do any of the following:

1. Move the structure;

2. Find a purchaser for the site; or

3. Agree on an alternative proposal that would not involve the demolition of the structure.

I. Moving as an alternative. If the applicant decides to move the structure instead of demolishing it, then the demolition notice period and/or extended delay period becomes moot. The demolition delay period is automatically terminated when a

building permit to move the structure from the site and a building permit to relocate the structure to another site are issued.

J. End of the extension period. If the 120 day extension has not been terminated as provided in Subsection 24.55.200 H above, the building permit for demolition may be issued any time after 120 days have elapsed since the end of the 35 day notice period.

K. Exceptions to demolition delay.

1. The provisions of this Section (24.55.200) do not apply to applications for demolition of single family residences if the application is accompanied by an application for a building permit for a replacement single family residence.

2. The provisions of this Section (24.55.200) do not apply to applications for building permits for demolition that are required by the City to remove structures because of a public hazard, nuisance, or liability. The structure must be subject to a demolition order from the City, or be the subject of enforcement proceedings for demolition and be stipulated by the owner as a dangerous building, in order to be exempt from the demolition delay provisions.

3. The provisions of this Section (24.55.200) do not apply to applications for building permits for demolition, for structures that are designated historical landmarks, on the Portland Historic Resources Inventory, or in historic districts. In these situations, the provisions of Chapter 33.222 in Title 33, Planning and Zoning apply.

24.55.250 Enforcement.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.300 Referral to the Hearings Officer.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.350 Appeals.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.400 Rehabilitation and Repair under Direction of Council.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.450 Contracts to Repair or Demolish.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.500 Warehousing of Structures.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.550 Interference with Demolition or Repair Prohibited.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.600 Demolition - Debris - Barricades - Nuisances.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.650 Demolition Permits - Investigations.
(Repealed by Ordinance No. 163608, effective Nov. 7, 1990.)

24.55.700 Demolition Delay - Housing Preservation.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.750 Administrative Review
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.800 Appeals to the Code Hearings Officer.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

24.55.850 Dangerous Building Enforcement Fees.
(Repealed by Ordinance No. 171455, effective August 29, 1997.)

Chapter 24.60

FENCES

(Amended by Ordinance No.
176585, effective July 5, 2002.)

Sections:

24.60.010 Fences Around Swimming Pools.

(Repealed by Ordinance No. 180330, effective August 18, 2006.)

24.60.020 Barbed Wire Fencing.

(Added by Ordinance No. 176585, effective July 5, 2002.) It is unlawful for any person to construct or maintain a fence containing barbed wire, unless the barbed wire is placed not less than 6 inches above the top of the fence and the fence is not less than 4 feet high.

Chapter 24.65

SIDEWALK VAULT OPENINGS

Sections:

24.65.010 Location of Sidewalk Vault Openings.

The outer edge of all openings constructed in sidewalks for fuel, elevators, stairs, or other purposes shall be located not less than 2 feet from the curb line and the inner edge of any sidewalk opening will not be any closer than 3 feet to the property line.

24.65.020 Number of Sidewalk Vault Openings.

There shall not be more than one opening for each individual building frontage and in no case openings closer than 25 feet to an existing sidewalk opening.

24.65.030 Sidewalk Elevators.

Openings in sidewalks provided for in Section 24.65.010 shall be supplied with doors attached to a frame built into the sidewalk and shall be capable of supporting a load of 100 pounds per square foot. The door shall be constructed of sheet steel or other approved metal which has an approved non-slip surface. The dimensions of the door in any direction shall not exceed the dimension of the opening by more than 6 inches. The doors and frames shall be so constructed and maintained that there is no projection above or below the sidewalk exceeding 1/4 inch and existing doors which do not conform to the requirements shall be changed to conform within a period of 10 days after notice is given to change the same. Sidewalk doors shall be provided with a metal guard which, when the doors are open, will hold the doors open. This guard shall be located on the side of the sidewalk opening nearest the property line. The guard shall be made in the form of a grating with openings not exceeding 6 inches in dimension and so arranged that a child cannot get under or through the guard. This guard shall not be required for doors having metal gratings which are level with the sidewalk when the doors are open and the elevator platform is below the sidewalk level. Such gratings shall be capable of supporting a load of 100 pounds per square foot. Elevators having these sidewalk gratings shall be provided with a 3/4-inch steel bar to hold the doors open.

24.65.040 Operation of Sidewalk Elevator.

A. When not in operation the elevator shall be kept in its down position and the sidewalk doors shall be closed.

B. When the elevator is being raised, pedestrians shall be warned of the fact by an automatic warning device approved by the Director.

C. The sidewalk elevator shall not be raised sooner than 15 minutes prior to a delivery and shall be placed in a down position and the sidewalk doors closed within 15 minutes of the completion of a delivery.

24.65.050 Plans Required.

The construction of sidewalk vaults shall be considered as part of a building and plans shall be submitted showing the construction of the same.

Chapter 24.70

CLEARING, GRADING AND EROSION CONTROL

Sections:

24.70.010 General.

(Amended by Ordinance Nos. 165678, and 168340, effective Dec. 7, 1994.) The provisions of this Chapter shall regulate clearing, grading, earthwork construction, erosion control on private property and shall include tree cutting on natural and finished slopes with gradients in whole or in part which exceed 25%.

24.70.020 Permits.

(Amended by Ordinance Nos. 165678, 168340 172209, 173532 and 173979, effective March 1, 2000.) Permits for clearing, grading and tree cutting are required as specified in this section. Applicants for permits made in conjunction with land divisions shall be responsible for all clearing, grading, tree cutting and erosion control within the land division, even where a specific activity is exempt from an individual permit.

A. Clearing Permits. A permit is required and shall be issued in accordance with Section 24.10.070 for clearing activities in the following areas:

1. The Tualatin River sub-basins, Johnson Creek Basin Plan District, environmental zones, greenway zones, or natural resource management plans; or

2. Property larger than five acres. Except that no permit shall be required for clearing an area less than 5,000 square feet.

B. Grading Permits. A permit is required and shall be issued in accordance with Section 24.10.070 for all grading operations with the exception of the following:

1. Grading in an area, where in the opinion of the Director, there is no apparent danger, adverse drainage, or erosion effect on private/public property, or inspection is not necessary;

2. An excavation below finished grade for basements and footings of a building, retaining wall, or other structure authorized by a valid building permit. This shall not exempt any fill made with the material from such excavation nor exempt any excavation having an unsupported height greater than 5 feet after the completion of such structure.

3. Cemetery graves.

4. Refuse disposal sites controlled by other regulations.

5. Excavations for wells or tunnels.

6. Mining, quarrying, excavating, processing, stockpiling of rock, sand, gravel, aggregate, or clay where established and provided for by law provided such operations do not affect the lateral support or increase the stresses in or pressure upon any adjacent or contiguous property.

7. Exploratory excavations under the direction of soil (geotechnical) engineers or engineering geologists.

8. An excavation which

a. Is less than 2 feet in depth, or

b. Which does not create a cut slope greater than 5 feet in height and steeper than 1-1/2 horizontal to 1 vertical.

9. A fill less than 1 foot in depth, and placed on natural terrain with a slope flatter than 5 horizontal to 1 vertical, or less than 3 feet in depth, not intended to support structures, which does not obstruct a drainage course and which does not exceed 10 cubic yards on any one lot.

C. Tree cutting permit. A tree cutting permit is required for tree cutting (except Christmas trees) and root grubbing operations on slopes with gradients which, in

whole or in part, exceed 25%. This regulation applies when more than five trees of six-inch diameter are to be cut or if the area to be cleared is greater than 2,500 square feet. This applies in all areas except those designated environmental zones under the provisions of Title 33. Tree cutting permits shall be issued in accordance with Section 24.10.070.

1. Plans and specifications showing the scope of proposed tree cutting operations, together with a geotechnical engineering report assessing the stability of the slope(s) after both tree felling and root grubbing operations shall be submitted to the Director along with the permit application.

2. Stripping of vegetation or other soil disturbance on the slopes shall be done in a manner which will minimize soil erosion and expose the smallest practical area at any one time. An erosion control and mitigation plan outlining how this is to be achieved and what erosion control measures are proposed to be implemented shall be submitted to the Director for approval.

3. The permit applicant shall also identify the owner's agent who will be responsible for ensuring compliance with these requirements.

D. Permits required under this Chapter shall be obtained before the commencement of any tree cutting, root grubbing or soil disturbance takes place.

24.70.030 Hazards.

(Amended by Ordinance No. 165678, effective July 15, 1992.) The Director may determine that any clearing, grading, or geologic condition on private property has or may become a hazard to life and limb, or endanger property, or cause erosion, or adversely affect drainage or the safety, use or stability of a public way or drainage channel. Upon receipt of notice in writing from the Director, the owner shall mitigate the hazard and be in conformity with the requirements of this Title. The Director may require that plans and specifications and engineering reports be prepared in compliance with this Chapter.

24.70.040 Special Definitions.

The definitions contained in this Section relate to excavation and grading work only as outlined in this Chapter.

A. **" Approval"** shall mean a written engineering or geological opinion concerning the progress and completion of the work.

B. **"As graded"** is the surface conditions exposed on completion of grading.

C. **"Bedrock"** is in-place solid rock.

D. **"Bench"** is a relatively level step excavated into earth material on which fill is to be placed.

E. **"Borrow"** is earth material acquired from an off-site location for use in grading on a site.

F. **"Civil engineer"** shall mean a professional engineer registered in the State to practice in the field of civil works.

G. **"Civil engineering"** shall mean the application of the knowledge of the forces of nature, principles of mechanics, and the properties of materials to the evaluation, design, and construction of civil works for the beneficial uses of mankind.

H. **"Clearing"** is the cutting or removal of vegetation which results in exposing any bare soil.

I. **"Compaction"** is the densification of a fill by mechanical means.

J. **"Earth material"** is any rock, natural soil, or fill and/or any combination thereof.

K. **"Engineering geologist"** shall mean a geologist experienced and knowledgeable in engineering geology and registered as an engineering geologist in the State of Oregon.

L. **"Engineering geology"** shall mean the application of geologic knowledge and principles in the investigation and evaluation of naturally occurring rock and soil for use in the design of civil works.

M. **"Erosion"** is the wearing away of the ground surface as a result of the movement of wind, water, and/or ice.

N. **"Excavation"** is the mechanical removal of earth material.

O. **"Fill"** is a deposit of earth material placed by artificial means.

P. **"Geological hazard"** shall mean a potential or apparent risk to persons or property because of geological or soil instability either existing at the time of construction or which would result from construction.

Q. **"Grade"** shall mean the vertical location of the ground surface.

R. **"Existing grade"** is the grade prior to grading.

S. **"Rough grade"** is the stage at which the grade approximately conforms to the approved plan.

T. **"Finish grade"** is the final grade of the site which conforms to the approved plan.

U. **"Grading"** is any excavating or filling or combination thereof.

V. **"Key"** is a designed compacted fill placed in a trench excavated in earth material beneath the toe of a proposed fill slope.

W. **"Site"** is any lot or parcel of land or contiguous combination thereof, under the same ownership, where grading is performed or permitted.

X. **"Slope"** is an inclined ground surface the inclination of which is expressed as a ratio of horizontal distance to vertical distance.

Y. **"Soil"** is naturally occurring surficial deposits overlying bedrock.

Z. **"Soil (Geotechnical) engineer"** shall mean a civil engineer competent by education, training, and experience in the practice of soil engineering.

AA. **"Soil (Geotechnical) engineering"** shall mean the application of the principles of soil mechanics in the investigation, evaluation, and design of civil works involving the use of earth materials and the inspection and testing of the construction thereof.

BB. **"Terrace"** is a relatively level step constructed in the face of a graded slope surface for drainage and maintenance purposes.

24.70.050 Information on Plans and in Specifications.

(Amended by Ordinance No. 173532, effective June 30, 1999.) Plans and specifications shall be submitted in accordance with Section 24.10.070 and in addition shall comply with the following:

A. Plans shall be drawn to scale upon substantial paper or cloth and shall be of sufficient clarity to indicate the nature and extent of the work proposed and show in detail that they will conform to the provisions of this Title and all relevant laws, ordinances, rules, and regulations. The first sheet of each set of plans shall give the location of the work and the name and address of the owner and the person by whom they were prepared.

The plans shall include the following information.

1. General vicinity of the proposed site.

2. Property limits and accurate contours of existing ground and details of terrain and area drainage for the site and surrounding area.

3. Limiting dimensions, elevations, or finish contours to be achieved by the grading and the proposed drainage channels and related construction.

4. Detailed schedule of when each portion of the site is to be graded; how long the soil is to be exposed; and when the area is to be covered with buildings, paving, new vegetation or temporary erosion control measures.

5. Detailed plans of all surface and subsurface drainage devices, walls, cribbing, dams, and other protective devices to be constructed with, or as a part of, the proposed work together with a map showing the drainage area and the estimated runoff of the area served by any drains.

6. Location of any buildings or structures on the property where the work is to be performed and the location of any buildings or structures on land of adjacent owners which are within 15 feet of the property or which may be affected by the proposed grading operations.

7. Specifications shall contain information covering construction and material requirements.

8. Civil engineering report. The civil engineering report, when required by the Director, shall include hydrological calculations of runoff and the existing or required safe storm drainage capacity outlet of channels both on site and off site, and 1 in 100 year flood elevations for any adjacent watercourse. The report shall include recommendations for stormwater control and disposal.

9. Soil (Geotechnical) engineering report. The soil engineering report, when required by the Director, shall include data regarding the nature, distribution, and strength of existing soils, design criteria, and conclusions and recommendations applicable to the proposed development. The report shall include recommendation for subdrainage, and for groundwater control and disposal. Recommendations included in the report and approved by the Director shall be incorporated in the plans and specifications. For single family residences, a surface reconnaissance and stability questionnaire may be substituted for a formal soils report at the discretion of the Director.

10. Engineering geology report. The engineering geology report, when required by the Director, shall include an adequate description of the geology of the site, and conclusions and recommendations regarding the

effect of geologic conditions on the proposed development and site(s) to be developed.
Recommendations included in the report and approved by the Director shall be incorporated in the grading plans and specifications.

B. Issuance. Section 24.10.070 is applicable to grading permits. The Director may require that:

1. The amount of the site exposed during any one period of time be limited; and

2. Grading work be scheduled to avoid weather periods or avoid critical habitat use periods for areas existing on, or adjacent to, the development site.

Subsequent to the issuance of the grading permit, the Director may require that grading operations and project designs be modified if delays occur which can result in weather generated problems not considered at the time the permit was issued.

24.70.060 Bonds.

The Director may require bonds in such form and amounts as may be deemed necessary to assure that the work, if not completed in accordance with the approved plans and specifications, will be corrected to eliminate hazardous conditions.
In lieu of a surety bond the applicant may file a cash bond or instrument of credit with the Director in an amount equal to that which would be required in the surety bond.

24.70.070 Cuts.

A. General. Unless otherwise recommended in the approved soil engineering and/or engineering geology reports, cuts shall conform to the provisions of this Section.

B. Slope. The slope of cut surfaces shall be no steeper than is safe for the intended use. Cut slopes shall be no steeper than 2 horizontal to 1 vertical.

C. Drainage and terracing. Drainage and terracing shall be provided as required by Section 24.70.100.

24.70.080 Fills.

A. General. Unless otherwise recommended in the approved soil engineering report fills shall conform to the provisions of this Section.

In the absence of an approved soil engineering report these provisions may be waived for minor fills not intended to support structures. Such fills shall be subject to review at the discretion of the Director.

B. Ground preparation. The ground surface shall be prepared to receive fill by removing vegetation, noncomplying fill, top-soil, and other unsuitable materials scarifying to provide a bond with the new fill, and where slopes are steeper than 5 to 1, and the height greater than 5 feet, by benching into competent material or sound bedrock as determined by the soils engineer. The bench under the toe of a fill on a slope steeper than 5 to 1 shall be at least 10 feet wide. The area beyond the toe of fill shall be sloped for sheet overflow or a paved drain shall be provided. Where fill is to be placed over a cut the bench under the toe of a fill shall be at least 10 feet wide but the cut must be made before placing fill and approved by the soils engineer and engineering geologist as a suitable foundation for fill. Unsuitable soil is soil which in the opinion of the Director or the civil engineer or the soils engineer or the engineering geologist, is not competent to support either soil or fill, to support structures or to satisfactorily perform the other functions for which the soil is intended.

C. Fill material. Only permitted material free from tree stumps, detrimental amounts of organic matter, trash, garbage, sod, peat, and similar materials shall be used. Rocks larger than 6 inches in greatest dimension shall not be used unless the method of placement is properly devised, continuously inspected, and approved by the Director.
The following shall also apply:

1. Rock sizes greater than 6 inches in maximum dimension shall be 10 feet or more below grade, measured vertically.

2. Rocks shall be placed so as to assure filling all voids with fines. Topsoil may be used in the top 12-inch surface layer to aid in planting and landscaping.

D. Compaction of fill. All fills shall be compacted to a minimum relative dry density of 90 percent as determined in accordance with ASTM Standard D-1557-78. Field density verification shall be determined in accordance with ASTM Standard D-1556-82 or equivalent and must be submitted for any fill 12 inches or more in depth where such fill may support the foundation for a structure. A higher relative dry density, or additional compaction tests, or both, may be required at any time by the Director.

E. Fill slope. The slope of fill surfaces shall be no steeper than is safe for the intended use. Fill slopes shall be no steeper than 2 horizontal to 1 vertical.

F. Drainage and terracing. Drainage and terracing shall be provided and the area above fill slopes and the surfaces of terraces shall be graded and paved as required by Section 24.70.100.

24.70.090 Setbacks.

A. General. The setbacks and other restrictions specified by this Section are minimal and may be increased by the Director, or by the recommendation of the civil engineer, soils engineer, or engineering geologist, if necessary for safety and stability or to prevent damage of adjacent properties from deposition or erosion or to provide access for slope maintenance and drainage. Retaining walls may be used to reduce the required setbacks when approved by the Director.

B. Setbacks from property lines. The tops of cuts and toes of fill slopes shall be set back from the outer boundaries of the permit area, including slope right areas and easements, in accordance with Figure No. 2 and Table No. 24.70-C at the end of this Chapter.

C. Design standards for setbacks. Setbacks between graded slopes (cut or fill) and structures shall be provided in accordance with Figure No. 3 and Table No. 24.70-C at the end of this Chapter.

24.70.100 Drainage and Terracing.
(Amended by Ordinance No. 173270, effective May 21, 1999.)

A. General. Unless otherwise indicated on the approved grading plan, drainage facilities and terracing shall conform to the provisions of this Section.

B. Terrace. Terraces at least 6 feet in width shall be established at not more than 30-foot vertical intervals on all cut or fill slopes to control surface drainage and debris except that where only one terrace is required, it shall be at mid-height. For cut or fill slopes greater than 60 feet and up to 120 feet in vertical height one terrace at approximately mid-height shall be 12 feet in width. Terrace widths and spacing for cut and fill slopes greater than 120 feet in height shall be designed by the civil engineer and approved by the Director. Suitable access shall be provided to permit proper cleaning and maintenance.
A single run of swale or ditch shall not collect runoff from a tributary area exceeding 13,500 square feet (projected) without discharging into a downdrain.

C. Subsurface drainage. Cut and fill slopes shall be provided with subdrainage as necessary for stability. Adequate culverts shall be laid under all fills placed in natural watercourses and along the flow line of any tributary branches in such a manner that the hydraulic characteristics of the stream are not adversely altered. In addition, subdrainage shall be installed if active or potential springs or seeps

are covered by the fill. All culverts/subdrainage shall be installed after the suitable subgrade preparation. Design details of culverts/subdrainage shall be shown on each plan and be subject to the approval of the Director and of other government/private agencies as may be required.
A subdrain system shall be provided for embedded foundation/ retaining walls and floor slabs where ground water or seepage has a potential to affect the performance of the structure. The plans shall indicate

1. subdrainage details with appropriate specifications,

2. location of footing subdrain/discharge lines and,

3. method of disposal.

In lieu of above, walls/floors may be waterproofed and designed to resist hydrostatic pressure.

D. Disposal. All drainage facilities shall be designed to carry waters to the nearest practicable drainageway or approved stormwater management facility, as approved by the Director and/or other appropriate jurisdiction as a safe place to deposit such waters. Erosion of ground in the area of discharge shall be prevented by installation of non-erosive downdrains or other devices.
Building pads shall have a drainage gradient of 2 percent toward approved drainage facilities, unless waived by the Director.
Exception: The gradient from the building pad may be 1 percent if all of the following conditions exist throughout the permit area:

1. No proposed fills are greater than 10 feet in maximum depth.

2. No proposed finish cut or fill slope faces have a vertical line in excess of 10 feet.

3. No existing slope faces, which have a slope face steeper than 10 horizontal to 1 vertical, have a vertical height in excess of 10 feet.

E. Interceptor drains. Paved interceptor drains shall be installed along the top of all cut slopes where the tributary drainage area above slopes towards the cut and has a drainage path greater than 40 feet measured horizontally. Interceptor drains shall be paved with a minimum of 3 inches of concrete or gunite and reinforced. They shall have a minimum depth of 12 inches and a minimum paved width of 30 inches measured horizontally across the drain. The slope of the drain shall be approved by the Director.

24.70.110 Erosion Control.

(Repealed by Ordinance No. 173979, effective March 1, 2000.)

24.70.120 Grading Inspection.

A. General. All grading operations for which a permit is required shall be subject to inspection by the Director. When required by the Director, special inspection of grading operations and special testing shall be performed in accordance with the provisions of Section 24.70.120 C.

B. Grading designation. All grading in excess of 5,000 cubic yards shall be performed in accordance with the approved grading plan prepared by a civil engineer and shall be designated as "engineered grading." Grading involving less than 5,000 cubic yards may also be designated as "engineered grading" by the Director if the grading will

1. support a building or structure of a permanent nature;

2. support other engineering works such as, but not limited to, tanks, towers, machinery, retaining wall, and paving;

3. be deemed a potential hazard under Section 24.70.030. The permittee with the approval of the Director may also choose to have the grading performed as "engineered grading." Otherwise, the grading shall be designated as "regular grading."

C. Engineered grading requirements. For engineered grading, it shall be the responsibility of the civil engineer who prepares the approved grading plan to incorporate all recommendations from the soil engineering and engineering geology reports into the grading plan. He shall also be responsible for the professional inspection and approval of the grading within his area of technical specialty. This responsibility shall include, but need not be limited to, inspection and approval as to the establishment of line, grade, and drainage of the development area. The civil engineer shall act as the coordinating agent in the event that need arises for liaison between the other professionals, the contractor, and the Director. The civil engineer shall also be responsible for the preparation of revised plans and the submission of as-graded grading plans upon completion of the work. The grading contractor shall submit in a form prescribed by the Director a statement of compliance to said as-graded plan.

Soil engineering and engineering geology reports shall be required as specified in Section 24.70.050. During grading all necessary reports, compaction data, and soil engineering and engineering geology recommendations shall be submitted to the civil engineer and the Director by the soil engineer and the engineering

geologist. The soil engineer's area of responsibility shall include, but need not be limited to, the professional inspection and approval concerning the preparation of ground to receive fills, testing for required compaction, stability of all finish slopes, and the design of buttress fills, where required, incorporating data supplied by the engineering geologist.

The engineering geologist's area of responsibility shall include, but need not be limited to, professional inspection and approval of the adequacy of natural ground for receiving fills and the stability of cut slopes with respect to geological matters, and the need for subdrains or other ground water drainage devices. He shall report his findings to the soil engineer and the civil engineer for engineering analysis.

The Director shall inspect the project at the various stages of work requiring approval and at more frequent intervals necessary to determine that adequate control is being exercised by the professional consultants.

D. Regular grading requirements. The Director may require inspection and testing by an approved testing agency. The testing agency's responsibility shall include, but need not be limited to, approval concerning the inspection of cleared areas and benches to receive fill, and the compaction of fills. When the Director has cause to believe that geological factors may be involved the grading operation will be required to conform to "engineered grading" requirements.

E. Notification of noncompliance. If, in the course of fulfilling their responsibility under this Chapter, the civil engineer, the soil engineer, the engineering geologist, or the testing agency finds that the work is not being done in conformity with this Chapter or the approved grading plans, the discrepancies shall be reported immediately in writing to the person in charge of the grading work and to the Director. Recommendations for corrective measures, if necessary, shall be submitted.

F. Transfer of responsibility for approval. If the civil engineer, the soil engineer, the engineering geologist, or the testing agency of record are changed during the course of the work, the work shall be stopped until the replacement has agreed to accept the responsibility within the area of their technical competence for approval upon completion of the work.

24.70.130 Completion of Work.

A. Final reports. Upon completion of the rough grading work and that final completion of the work the Director may require the following reports and drawings and supplements thereto:

1. An as-graded grading plan prepared by the civil engineer including original ground surface elevations, as-graded ground surface elevations,

lot drainage patterns, and locations and elevations of all surface and sub-surface drainage facilities. He shall provide approval that the work was done in accordance with the final approved grading plan.

2. A Soil Grading Report prepared by the soil engineer including locations and elevations of field density tests, summaries of field and laboratory tests and other substantiating data and comments on any changes made during grading and their effect on the recommendations made in the soil engineering investigation report. He shall provide approval as to the adequacy of the site for the intended use.

3. A Geological Grading Report prepared by the engineering geologist including a final description of the geology of the site including any new information disclosed during the grading and the effect of same on recommendations incorporated in the approved grading plan. He shall provide approval as to the adequacy of the site for the intended use as affected by geological factors.

B. Notification of completion. The permittee or his agent shall notify the Director when the grading operation is ready for final inspection. Final approval shall not be given until all work including installation of all drainage facilities and their protective devices and all erosion control measures have been completed in accordance with the final approved grading plan and the required reports have been submitted.

Chapter 24.75

UNIFORM BUILDING ADDRESS SYSTEM

(Added by Ordinance No. 161984,
effective July 1, 1989.)

Sections:

24.75.010 Uniform System.

A. There is established a uniform system of numbering all buildings in separate ownership or occupancy in the City dividing the City into five general districts. In establishing the system Williams Avenue and the center line of the Willamette River southerly from Glisan Street shall constitute the north and south base line from which the numbers on all buildings running easterly and westerly from said streets shall be extended each way, upon the basis of one number for each ten feet of property frontage, wherever possible, starting at the base line with the number 1 continuing with consecutive hundreds at each intersection, wherever possible; provided, however, that streets running easterly and westerly in that district south of Jefferson Street and lying between Front Avenue and the Willamette River shall have the prefix "0" placed before the assigned number, said numbers starting at Front Avenue with the number 1 and continuing with consecutive hundreds at each intersection, where possible. All even numbers shall be placed upon buildings on the southerly side of streets, avenues, alleys and highways, and all odd numbers shall be placed upon buildings on the northerly side of streets, avenues, alleys and highways. Burnside Street shall constitute the east and west base line from which the numbers on all streets running north and south from said streets shall be extended each way, upon the basis of one number for each 10 feet of property frontage, wherever possible, starting at the base line with number 1 and continuing with consecutive hundreds at each intersection, wherever possible. All even numbers shall be placed upon buildings on the easterly side of streets, avenues, alleys, and highways, and all odd numbers upon buildings on the westerly side of said streets, avenues, alleys, and highways. Freestanding

buildings on private streets which are separately owned or occupied shall be separately numbered so as to most closely conform to this system. Each portion of a building which is separately owned or occupied and has a separate entrance from the outside shall have a separate number assigned to it.

B. Suffixes to Building Numbers. Where building address requirements exceed numbers available within the numbering system, the Director may use the suffix "A", "B", "C", etc. as may be required to provide the numbering required by this Chapter.

24.75.020 Size and Location of Building Numbers.

All numbers placed in accordance with this Chapter shall be permanently affixed to a permanent structure and of sufficient size and so placed as to be distinctly legible from the public way providing primary access to the building. All numbers shall be posted as nearly as possible in a uniform place and positioned on the front of each building near the front entrance. Where outside illumination is provided, the numbers shall be placed so as to be illuminated by the outside light. In instances where building mounted numbers are not distinctly visible from a public way, a duplicate set of numbers shall be permanently affixed to a permanent structure at the primary entranceway to such property. If, in the judgment of the Director, the numbering, sequence, legibility, size or location does not meet the requirements as set forth above, the property owner or agent therefor shall be notified and within 30 days shall make such changes as required in the notification.

24.75.030 Administration.

The Director shall assign address numbers, keep records of address assignments, and exercise such other powers as are necessary to carry out the provisions of this Chapter.

24.75.040 Owner Responsibility.

Whenever any new building is erected, modified, or occupied in a manner requiring an address assignment, the owner or owner's agent shall procure the correct address number or numbers designated by the Director and pay required fees.

The owner or agent shall prior to occupancy or within 30 days of assignment, whichever occurs later, place the assigned address number(s) upon the building or in a manner and location as provided in this Chapter.

24.75.050 Alteration of Building Number - Improper Number.

It is unlawful for any person to cause or knowingly permit a building number to be displayed which is different than that assigned pursuant to this Chapter. It is unlawful for any person to own or have possession of a building which does not display the number assigned pursuant to this Chapter in the manner provided by this Chapter.

24.75.060 Building Defined.

As used in this Chapter, "building" is any structure used or intended for supporting or sheltering any use or occupancy.

24.75.070 Enforcement.

The Director shall provide written notices to the owner of any building in violation of the provisions of this Title. The notice shall state the violations existing and specify the owner has 30 days to obtain compliance.

In the event the owner fails or neglects to comply with the violation notice in the prescribed time the Director may gain compliance by:

A. Instituting an action before the Code Enforcement Hearings Officer as provided in Title 22 of the City Code, or

B. Causing appropriate action to be instituted in a court of competent jurisdiction, or

C. Taking such other action as the Director deems appropriate.

Chapter 24.80

DERELICT COMMERCIAL BUILDINGS

(Repealed by Ordinance No. 171455,
effective August 29, 1997.)

Chapter 24.85

SEISMIC DESIGN REQUIREMENTS FOR EXISTING BUILDINGS

(Added by Ordinance No. 168627, effective Mar. 22, 1995.)

Sections:

24.85.010 Scope.

(Amended by Ordinance No. 178831, effective November 20, 2004.)

A. The provisions of this chapter prescribe the seismic design requirements for existing buildings undergoing changes of occupancy, additions, alterations, catastrophic damage, fire, or earthquake repair, or mandatory or voluntary seismic strengthening. The requirements of this chapter only apply to buildings for which a building permit has been applied for to change the occupancy classification, add square footage to the building, alter or repair the building.

B. Under the authority provided by State law, the provisions of this chapter prescribing seismic rehabilitation standards for existing buildings can be used in lieu of meeting the requirements of the current edition of the State of Oregon Structural Specialty Code.

24.85.015 Structural Design Meeting.

(Added by Ordinance No. 178831, effective November 20, 2004.) Upon request, BDS engineering staff is available to meet with an owners design engineer to review proposed seismic strengthening plans in a pre-design meeting. A written record of the meeting discussion and determinations will be placed in the permit record.

24.85.020 Seismic Related Definitions.

(Amended by Ordinance Nos. 169427, 170997, 178831 and 180917, effective May 26, 2007.) The definitions contained in this Section relate to seismic design requirements for existing buildings outlined in this Chapter.

A. **ASCE 31** means the Seismic Evaluation of Existing Buildings ASCE/SEI 31-03 published by the American Society of Civil Engineers and the Structural Engineering Institute.

B. **ASCE 31** Evaluation means the process of evaluating an existing building for the potential earthquake-related risk to human life posed by that building, or building component, and the documentation of that evaluation, performed and written according to the provisions of ASCE 31. ASCE 31 Evaluation is divided into two categories:

1. Non-essential facilities evaluation means a Tier 1 and a Deficiency-Only Tier 2 analysis to the Life Safety (LS) performance level as defined by ASCE 31 unless a complete Tier 2 analysis is required by ASCE 31.

2. Essential facilities evaluation means a Tier 2 analysis to the Immediate Occupancy (IO) performance level as defined by ASCE 31.

C. **ASCE 31** Improvement Standard means the Tier 1 and Tier 2 Life Safety Performance Level Criteria of ASCE 31.

D. **ATC 20** means the 1989 Edition of the manual on "Procedures for Post Earthquake Safety Evaluation of Buildings" published by Applied Technology Council.

E. **BDS** means the City of Portland's Bureau of Development Services.

F. **Building Addition** means an extension or increase in floor area or height of a building or structure.

G. **Building Alteration** means any change, addition or modification in construction.

H. **Catastrophic Damage** means damage to a building that causes an unsafe structural condition from fire, vehicle collision, explosion, or other events of similar nature.

I. **Essential Facility** has the same meaning as defined in the OSSC.

J. **Fire and Life-safety for Existing Buildings (FLEx) Guide** means a code guide published by the Bureau of Development Services, outlining alternative materials and methods of construction that are allowed for existing buildings in Portland.

K. **FM 41** Agreement means a joint agreement between Portland Fire & Rescue, the Bureau of Development Services and a building owner to schedule improvements to the building following a determination of the fire and life safety hazards posed by the existing condition of the building as provided under Oregon law.

L. **Live/Work Space** means a combination working space and dwelling unit. A live/work space includes a room or suite of rooms on one or more floors designed for and occupied by not more than one family and including adequate working space reserved for the resident's occupancy. A live/work space is individually equipped with an enclosed bathroom containing a lavatory, water closet, shower/and or bathtub and appropriate venting.

M. **Net Floor Area** means the entire area of a structurally independent building, including an occupied basement, measured from the inside of the permanent outer building walls, excluding any major vertical penetrations of the floor, such as elevator and mechanical shafts.

N. **Oregon Structural Specialty Code (OSSC)** means the provisions of the State of Oregon Structural Specialty Code as adopted by Section 24.10.040 A.

O. **Reinforced Masonry** means masonry having both vertical and horizontal reinforcement as follows:

1. Vertical reinforcement of at least 0.20 in2 in cross-section at each corner or end, at each side of each opening, and at a maximum spacing of 4 feet throughout. One or two story buildings may have vertical reinforcing spaced at greater than 4 feet throughout provided that a rational engineering analysis is submitted which shows that existing reinforcing and spacing provides adequate resistance to all required design forces without net tension occurring in the wall.

2. Horizontal reinforcement of at least 0.20 in2 in cross-section at the top of the wall, at the top and bottom of wall openings, at structurally connected roof and floor openings, and at a maximum spacing of 10 feet throughout.

3. The sum of the areas of horizontal and vertical reinforcement shall be at least 0.0005 times the gross cross-sectional area of the element.

4. The minimum area of reinforcement in either direction shall not be less than 0.000175 times the gross cross-sectional area of the element.

P. **Roof Covering Repair or Replacement** means the installation of a new roof covering following the removal of an area of the building's roof covering exceeding 50% or more of the total roof area within the previous five year period.

Q. **Unreinforced Masonry (URM)** means adobe, burned clay, concrete or sand-lime brick, hollow clay or concrete block, hollow clay tile, rubble and cut stone and unburned clay masonry that does not satisfy the definition of reinforced masonry as defined herein. Plain unreinforced concrete shall not be considered unreinforced masonry for the purpose of this Chapter.

R. **Unreinforced Masonry Bearing Wall** means a URM wall that provides vertical support for a floor or roof for which the total superimposed vertical load exceeds 200 pounds per lineal foot of wall.

S. **Unreinforced Masonry Bearing Wall Building** means a building that contains at least one URM bearing wall.

24.85.030 Seismic Improvement Standards.

(Amended by Ordinance Nos. 170997 and 178831, effective November 20, 2004.) For changes of occupancy structural additions, building alterations and catastrophic or earthquake damage repair, the design standard shall be the current edition of the OSSC unless otherwise noted by this Chapter.

24.85.040 Change of Occupancy or Use.

(Amended by Ordinance Nos. 169905, 170997 and 178831, effective November 20, 2004.) The following table shall be used to classify the relative hazard of all building occupancies:

TABLE 24.85-A		
Relative Hazard Classification	**OSSC Occupancy Classification**	**Seismic Improvement Standard**
5 (Highest)	A, E, I-2, I-3, H-1, H-2, H-3, H-4, H-5	OSSC
4	R-1,R-2, SR, I-1, I-4	
3	B, M	ASCE 31
2	F-1, F-2, S-1, S-2	
1 (Lowest)	R-3, U	

A. **Occupancy Change to a Higher Relative Hazard Classification.** An occupancy change to a higher relative hazard classification will require seismic improvements based upon the factors of changes in the net floor area and the occupant load increases as indicated in Table 24.85-B below. All improvements to either the OSSC or ASCE 31 improvement standard shall be made such that the entire building conforms to the appropriate standard indicated in Table 24.85-B.

TABLE 24.85-B				
Percentage of Building Net Floor Area Changed		**Occupant Load Increase**	**Required Improvement Standard**	**Relative Hazard Classification**
1/3 of area or less	and	Less than 150	None	1 through 5
More than 1/3 of area	or	150 and above	ASCE 31	1, 2, and 3
More than 1/3 of area	or	150 and above	OSSC	4 and 5

Multiple occupancy changes to a single building may be made under this section without triggering a seismic upgrade provided the cumulative changes do not exceed 1/3 of the building net floor area or add more than 149 occupants with respect to the legal building occupancy as of October 1, 2004.

B. Occupancy Change to Same or Lower Relative Hazard Classification. An occupancy change to the same or a lower relative hazard classification or a change in use within any occupancy classification will require seismic improvements using either the OSSC or ASCE 31 improvement standard, as identified in Table 24.85-A above, where the change results in an increase in occupant load of more than 149 people as defined by the OSSC. Where seismic improvement is required, the entire building shall be improved to conform to the appropriate improvement standard identified in Table 24.85-A.
Multiple occupancy changes to a single building may be made under this section without triggering a seismic upgrade provided the cumulative changes do not

result in the addition of more than 149 occupants with respect to the legal building occupancy as of October 1, 2004.

C. Occupancy Change to Live Work Space. Any building occupancy classified as relative hazard category 1, 2, or 3 may undergo a change of occupancy to live/work space provided that:

1. The building shall be improved such that the entire building conforms to the ASCE 31 improvement standard; and

2. The building meets the fire and life safety standards of either the FLEx Guide or the current OSSC.

3. Any Unreinforced Masonry bearing wall building converted to live/work space, regardless of construction costs, shall be improved such that the entire building conforms to the ASCE 31 improvement standard.

D. Occupancy Change to Essential Facilities. All structures which are being converted to essential facilities, as defined in the OSSC, shall comply with current state code seismic requirements, regardless of other requirements in this section.

24.85.050 Building Additions or Structural Alterations.

(Amended by Ordinance No. 178831, effective November 20, 2004.) An addition that is not structurally independent from an existing building shall be designed and constructed such that the entire building conforms to the seismic force resistance requirements for new buildings unless the three conditions listed below are met. Furthermore, structural alterations to an existing building or its structural elements shall also meet the following three conditions:

A. The addition or structural alteration shall comply with the requirements for new buildings;

B. The addition or structural alteration shall not increase the seismic forces in any structural element of the building by more than 5 percent unless the capacity of the element subject to the increased forces is equal to or greater than that required for new buildings. Multiple force increases on an element are allowed provided the cumulative force increase does not exceed 5 percent of the force on the element from its original, unaltered state; and

C. The addition or structural alteration shall not decrease the seismic resistance of any structural element of the existing building unless the reduced seismic resistance of the element is equal to or greater than that required for new buildings.

24.85.051 Mezzanine Additions.

(Added by Ordinance No. 178831, effective November 20, 2004.) A mezzanine addition shall not require seismic strengthening of the entire building when all of the following conditions are met:

A. Entire building strengthening is not required by any other provision contained in this Title;

B. The net floor area of the of the proposed mezzanine addition is less than 1/3 of the net floor area of the building;

C. The mezzanine addition does not result in an occupant load increase, as defined by the OSSC, of more than 149 people; and

D. Subsections 24.85.050 A. - C. shall also apply to mezzanine additions.

24.85.055 Structural Systems Damaged by Catastrophic Events.

(Added by Ordinance No. 170997; amended by 178831, effective November 20, 2004.)

A. Building structural systems damaged less than or equal to 50%.

1. If a building is damaged by a catastrophic event such that the area of the resulting structural damage is less than or equal to 50 percent of the building's net area, all damaged lateral load resisting components of the building's structural system must be designed and constructed to current provisions of the OSSC. These components must also be connected to the balance of the undamaged lateral load resisting system in conformance with current code provisions. Undamaged components need not be upgraded to current lateral load provisions of the current code, unless required by other provisions of this title.

2. New lateral system vertical elements must be compatible with any existing lateral system elements, including foundations. In multistory buildings, the engineer shall confirm that the new lateral system vertical elements do not introduce soft or weak story seismic deficiencies, as defined by ASCE 31, where they did not previously exist, or make existing conditions more hazardous.

B. Building structural systems damaged more than 50%. Where a building is damaged by a catastrophic event such that the area of the resulting structural damage is greater than 50 percent of the building's net floor area, all lateral load resisting components of the entire building's structural system must be designed and constructed to the current provisions of the OSSC.

24.85.056 Structural Systems Damaged by an Earthquake.

(Added by Ordinance No. 178831, effective November 20, 2004.) As a result of an earthquake, the Director may determine through either an ATC 20 procedure or through subsequent discovery any structure or portion thereof to be in an unsafe condition as defined by State law. As a result of making this determination, the Director may declare the structure or portion thereof to be a public nuisance and to be repaired or rehabilitation as provided in Subsections 24.85.056 A.-C., or abated by demolition or removal in accordance with Title 29. For the purposes of this Section, an "unsafe condition" includes, but is not limited to any portion, member or appurtenance of a building that has become detached or dislodged or appears likely to fail or collapse and thereby injure persons or damage property; or any portion of a building or structure that has been damaged to the extent that the structural strength or stability of the building is substantially less than it was prior to the damaging event.

A. Buildings built prior to January 1, 1974 with lateral support systems that have unsafe conditions shall be repaired or improved to resist seismic forces such that the repaired lateral system conforms to the ASCE 31 improvement standard.

1. Where less than 50% of the lateral support system has been damaged, only the damaged elements must be repaired.

2. Where 50% or more of the lateral support system has been damaged, then the entire lateral support system must be repaired to resist seismic forces such that the repaired system conforms to the ASCE 31 improvement standard.

B. Buildings built on or after January 1, 1974 with lateral support systems that have unsafe conditions shall be repaired or improved to resist seismic forces such that the repaired lateral system conforms to the code to which the building was originally designed, but not less than that required to conform to the ASCE 31 improvement standard.

1. Where less than 50% of the lateral support system has been damaged, only the damaged elements must be repaired.

2. Where 50% or more of the lateral support system has been damaged, then the entire lateral support system must be repaired to resist seismic forces such that the repaired system conforms to the code to which the building was originally designed, but not less than that required to conform to the ASCE 31 improvement standard.

C. New lateral system vertical elements must be compatible with any existing lateral system elements, including foundations. In multistory buildings, the engineer shall confirm that the new lateral system vertical elements do not introduce soft or

weak story seismic deficiencies, as defined by ASCE 31, where they did not previously exist, or make existing conditions more hazardous.

24.85.060 Required Seismic Evaluation.

(Added by Ordinance No. 169427; amended by 178831, effective November 20, 2004). When an alteration for which a building permit is required has a value (not including costs of mechanical, electrical, plumbing, permanent equipment, painting, fire extinguishing systems, site improvements, eco-roofs and finish works) of more than $175,000, an ASCE 31 evaluation is required. This value of $175,000 shall be modified each year after 2004 by the percent change in the R.S Means Construction Index for Portland on file with the Director. A letter of intent to have an ASCE 31 evaluation performed may be submitted along with the permit application. The evaluation must be completed before any future permits will be issued. The following shall be exempted from this requirement:

A. Buildings constructed or renovated to seismic zone 2, 2b or 3 under a permit issued after January 1, 1974.

B. Detached One- and two-family dwellings, and their accessory structures.

C. Single story, light frame metal and light wood frame buildings, not more than 20 feet in height from the top surface of the lowest floor to the highest interior overhead finish and ground area of 4,000 square feet or less.

A previously prepared seismic study may be submitted for consideration by the Director as equivalent to an ASCE 31 evaluation.

24.85.065 Seismic Strengthening of Unreinforced Masonry Bearing Wall Buildings. (Added by Ordinance No. 169427; amended by 170997 and 178831, effective November 20, 2004). When any building alterations or repairs occur at an Unreinforced Masonry Bearing Wall Building, all seismic hazards shall be mitigated as set forth in Subsections 24.85.065 A. and B. A previously permitted seismic strengthening scheme designed in accordance with FEMA 178/310 may be submitted for consideration by the Bureau Director as equivalent to the ASCE 31 improvement standard:

A. Roof Repair or Replacement. When a roof covering is repaired or replaced, as defined in 24.85.020, the building structural roof system, anchorage, and parapets shall be repaired or rehabilitated such that, at a minimum, the wall anchorage for both in-plane and out-of-plane forces at the roof and parapet bracing conform to the ASCE 31 improvement standard. In-plane brick shear tests are not required as part of the ASCE evaluation under this subsection.

B. Additional Triggers.

1. Building alterations or repair. When the cost of alteration or repair work which requires a building permit in a 2 year period exceeds the following criteria, then the building shall be improved to resist seismic forces such that the entire building conforms to the ASCE 31 improvement standard.

Table 24.85-C	
Building Description	Cost of Alteration or Repair
Single Story Building	$40 per square foot
Buildings Two Stories or Greater	$30 per square foot

2. Special building hazards. Where an Unreinforced Masonry Building of any size contains any of the following hazards, the building shall be seismically improved if the cost of alteration or repair exceeds $30 per square foot:

a. The Building possesses an Occupancy Classification listed within the Relative Hazard Category 5 as determined in Section 24.85.040 of this Chapter; or

b. The building is classified as possessing either vertical or plan irregularities as defined in the OSSC.

3. Exclusions from cost calculations. Costs for site improvements, eco-roofs, mandated FM41 agreements, mandated ADA improvements, mandated non-conforming upgrades under Title 33, mandated elevator improvements and mandated or voluntary seismic improvements or work

exempted from permit as described in Chapter 1 of the OSSC will not be included in the dollar amounts listed in Subsections 24.85.065 B.1. and 2.

4. Live/Work spaces in Unreinforced Masonry buildings. See Section 24.85.040 B for requirements when a Unreinforced Masonry building is converted to contain live/work spaces.

5. Automatic cost increase. The dollar amounts listed in Subsections 24.85.065 B.1. and 2. shall be modified each year after 2004 by the percent change in the R.S. Means of Construction Cost Index for Portland, Oregon. The revised dollar amounts will be made available at the Development Services Center.

24.85.067 Voluntary Seismic Strengthening.

(Added by Ordinance No. 178831, effective November 20, 2004.) Subject to permit approval, a building may be strengthened to resist seismic forces on a voluntary basis provided all of the following conditions are met:

A. Mandatory seismic strengthening is not required by other provisions of this Title;

B. The overall seismic resistance of the building or elements shall not be decreased such that the building is more hazardous;

C. Testing and special inspection are in accordance with the OSSC and the City of Portland Administrative Rules;

D. The standard used for the seismic strengthening is clearly noted on the drawings along with the pertinent design parameters; and

E. A written narrative shall be clearly noted on the drawings summarizing the building lateral system, seismic strengthening and known remaining deficiencies. The summary information shall reflect the level of analysis that was performed on the building.

24.85.070 Phasing of Improvements.

(Amended by Ordinance No. 178831, effective November 20, 2004.)

A. The Director may approve a multi-year phased program of seismic improvements when the improvements are pre-designed and an improvement/implementation plan is approved by the Director. The maximum total time allowed for completion of phased improvements shall be ten years. A legal agreement between the building owner and the City of Portland shall be formulated outlining the phased seismic improvements and shall be recorded with the property deed at the County.

B. Upon review, the Director may extend the maximum time for the phased improvements. The Director shall adopt rules under Section 3.30.035 describing the process for granting an extension.

24.85.075 Egress Through Existing Buildings.

(Added by Ordinance No. 178831, effective November 20, 2004.) The building structure and seismic resistance of an egress path through, under or over an existing building must meet the required seismic improvement standard specified in Section 24.85.040, Table 24.85-A, under any of the following conditions:

A. The egress path is from an adjacent new building or addition and the new building or addition area equals 1/3 or more of the existing building area; or,

B. The egress path is from an adjacent existing building that undergoes alterations or a change of occupancy requiring its egress path(s) meet the seismic improvement standards as required by this Chapter; or

C. The additional occupant load, as determined by the OSSC, using the egress path through the existing building is 150 people or more.

24.85.080 Application of Other Requirements.

(Amended by Ordinance No. 178831, effective November 20, 2004.) Building permit applications to improve the seismic capability of a building shall not trigger: accessibility improvements so long as the seismic improvement does not lessen accessibility; fire life safety improvements so long as the seismic improvement does not lessen the buildings fire resistance or exiting capability; landscape improvements required by Chapter 33; street tree improvements required by Section 20.40.070.

Conformance with these regulations may not exempt buildings from future seismic regulations.

24.85.090 Fee Reductions.

(Amended by Ordinance No. 178831, effective November 20, 2004.) Building permit, plan review and fire life safety review fees for structural work related to seismic strengthening covered by this Chapter will be waived when such fees total less than $2,500, and will be and reduced by 50% when such fees would total $2,500 or more.

24.85.095 Appeals.

(Amended by Ordinance No. 178831, effective November 20, 2004.) Because unanticipated circumstances may arise in the enforcement of these requirements for existing buildings, consideration as to the reasonable application of this Chapter may be addressed through the Board of Appeals as provided in Section 24.10.080.

Chapter 24.90

MANUFACTURED DWELLING INSTALLATION AND ACCESSORY STRUCTURES, MANUFACTURED DWELLING PARKS, RECREATIONAL PARKS, PARK TRAILER INSTALLATION AND ACCESSORY STRUCTURES

(Added by Ordinance No. 169312, effective Sept. 20, 1995).

Sections:

24.90.010 Purpose.

The purpose of this Chapter is to provide minimum standards for the following:

A. Installation and maintenance of manufactured dwellings and accessory structures.

B. Development and maintenance of manufactured dwelling parks.

C. Installation and maintenance of park trailers and recreational vehicle accessory structures.

D. Development and maintenance of recreational vehicle parks.

24.90.020 Scope.

Regulation under this Chapter covers all installations or alteration of manufactured dwellings, park trailers, and accessory structures. Regulation under this Chapter covers the development and maintenance of manufactured dwelling parks and recreational

vehicle parks. This Chapter does not include tourist facility regulation and licensing defined in ORS 446.310 to 446.350 and performed by Multnomah County.

24.90.030 Regulatory Adoption.

(Amended by Ordinance No. 176955, effective October 9, 2002.) The City of Portland through the Bureau of Development Services adopts regulatory authority for the installation maintenance and alteration of manufactured dwellings and accessory structures as authorized in ORS 446.250 and 446.253; for the development and maintenance of manufactured dwelling park as authorized in ORS 446.430 and OAR 918-600-100; for the development and maintenance of a recreational vehicle park, picnic park or camp as authorized in ORS 455.170, for the installation, maintenance and alteration of park trailers, other recreational vehicles and accessory structures as authorized in ORS 455.170 and OAR 918-525-005. Nothing contained herein provides regulatory authority when delegation of authority is expressly withheld by the State.

24.90.040 Definitions.

For the purposes of this Chapter definitions contained in Chapter 24.15 shall apply in conjunction with definitions found in ORS 446.003, ORS 455.010, OAR 918-500-005, OAR 918-525-005, OAR 918-600-005 and OAR 918-650-005. Definitions in ORS or OAR shall take precedence over other conflicting definitions.

24.90.050 Administration and Enforcement.

(Amended by Ordinance No. 176955, effective October 9 , 2002.) This Chapter shall be administered and enforced in conformance with applicable Oregon Administrative Rules contained in Chapter 918 Division 500, 505, 510, 520, 600 and 650.

Applicable regulatory provisions contained in the Oregon Administrative Rules are indexed in the Policy and Procedure Manual. The index and applicable Oregon Administrative Rules are on file at the Bureau of Development Services. Reproductions will be provided upon request for the fee described in 24.10.115.

24.90.060 Special Regulation.

Manufactured Dwellings and Cabanas installed on a residential lot shall be certified by the manufacturer to have an exterior thermal envelope meeting performance standards which reduce levels equivalent to the performance standards required of single family dwellings constructed under the state building code. Skirting and permanent enclosures shall be required for all park trailer and cabana installations.

24.90.070 Permit Application.

Permits are required for the development, enlargement, alteration or removal of manufactured dwelling parks, or recreational parks. Permit applications, plans and specifications and permit issuance shall conform to Section 24.10.070, and applicable Oregon Administrative Rules. Permits are required for the installation or alteration of manufactured dwellings, park trailers and accessory structures. Plans and specifications

are required in conformance with Section 24.10.070 and applicable Oregon Administrative Rules except when;

A. All installation is within an existing manufactured dwelling park and all the installation is performed in accordance with the manufactures approved installation instructions.

B. All installation is within an existing recreational or combination park, and all installation is performed under OAR 918-530-005 through 918-530-120.
When the Director determines special installation or construction requires design by a registered engineer or architect, such design shall be submitted in triplicate and approved by the Bureau prior to commencement or continuance of installation or construction.

24.90.080 Violations.

When any construction or installation under this Chapter is found not to comply with the regulations or standards set forth in this Chapter, the Director may issue a correction notice. When reinspection is called for and noncompliance continues the Director may assess a reinspection fee. When construction or installation under this Chapter is commenced without a permit the Director shall require a special investigation and assess an investigation fee. Reinspection or special investigation fees must be paid prior to resuming work or occupying the dwelling.
The Director may issue to the violator and post on the premises, a stop work order when work under this chapter is being performed contrary to regulations of this Chapter. When a stop work is issued and posted, work shall not resume until authorized by Director.
The Director may determine the construction or installation unsafe and proceed with actions contained in 24.10.060 (e)(f).

24.90.090 Appeals.

Any person, firm or corporation may request a ruling from the Administrator of the State Building Codes Division prior to submitting a permit application under this Chapter or after withdrawing a previously submitted application. Any ruling or order initiated by the Director shall remain in full force until or unless a ruling by the Division reverses the Director's ruling.
Any person, firm or corporation aggrieved by a decision of the Bureau under this Chapter may request an administrative appeal and pay the appeal fee. An administrative appeal committee consisting of persons appointed by the Director who are especially qualified to provide expert opinions in matters of this Chapter under appeal, shall act in advisory capacity to the Director. Committee review shall culminate in a finding by the Director. Further appeal may be made without fee to the appropriate Board of Appeals described in Sections 24.10.080, 25.07, 26.12 and 27.02.030. Within 30 days of the final appeal finding by the Board of Appeals an appellant who continues to be aggrieved may submit a continuance of the appeal to the State Manufactured Structures and Parks Advisory Board.

Chapter 24.95

SPECIAL DESIGN STANDARDS FOR FIVE STORY APARTMENT BUILDINGS

(Chapter added by Ordinance No. 169730, effective January 24, 1996.)

Sections:

24.95.010 General.

(Amended by Ordinance 181136, effective August 17, 2007.) The provisions of this chapter may be used to design and construct five story, wood frame apartment buildings in addition to complying with the Oregon Structural Specialty Code as adopted and effective October 1, 2003. Buildings designed and constructed under this chapter shall comply with all provisions of this chapter. Where a provision in this chapter is in conflict with the Oregon Structural Specialty Code, the provision of this chapter shall take precedence, as authorized by the Director of the Department of Consumer and Business Services pursuant to Oregon Revised Statute 455.040.

24.95.020 Construction.

(Amended by Ordinance 181136, effective August 17, 2007.)

A. Single Construction. Single construction buildings complying with this chapter may be a maximum of five stories of Type V-1 Hour construction.

B. Mixed Construction. Six story buildings complying with this chapter may be designed and constructed where any basement or first story is constructed of Type I construction and a maximum of the top five stories are of Type V-1 Hour construction. The Type I construction shall be separated from the Type V-1 Hour construction above with a three-hour occupancy separation.

C. Construction Types. Type I and Type V-1 Hour construction shall be as specified in the Oregon Structural Specialty Code.

24.95.030 Occupancy.

(Amended by Ordinance 181136, effective August 17, 2007.)

A. Single Construction. In five story wood frame buildings of single construction as specified in Section 24.95.020 A, the occupancy of the top four stories of buildings shall be limited to Group R, Division 1 apartment occupancies. Occupancies located in the first story and basement shall be limited to those listed in Subsection C.

B. Mixed Construction. In six story buildings of mixed construction, as specified in Section 24.95.020 B, the occupancy of the wood frame stories of the building shall be limited to Group R, Division 1 apartment occupancy. Occupancies located in the Type I portion of the building shall be limited to those listed in Subsection C.

C. Other Occupancies.

1. General. Occupancies located in the basement or first story of single construction buildings and in the Type I portion of a mixed construction building shall be limited to:

a. Group A, Division 3;

b. Group B offices;

c. Group B dining and drinking establishments;

d. Group E, Division 3 day care occupancies;

e. Group M retail stories;

f. Group S, Division 3 parking occupancies; and

g. Group R, Division 1, apartment houses.

Occupancies shall be as defined in the Oregon Structural Specialty Code.

2. Limitations. The following limitations apply to the occupancy categories listed in Subsection 1.

a. Group E, Division 3 day care occupancies. For either single or mixed construction buildings, Group E, Division 3 day care occupancies are restricted to the first story.

b. Group S, Division 3 parking occupancies. In mixed construction buildings, Group S, Division 3 parking occupancies shall be limited to the portion of the building constructed to Type I standards.

24.95.035 Commercial Kitchen Grease Ducts and Exhaust Equipment.

(Amended by Ordinance 181136, effective August 17, 2007.) Commercial kitchen grease ducts and exhaust equipment shall comply with the requirements of the Oregon Mechanical Specialty Code and the provisions of NFPA 96, 2001 edition.

Ducts that serve Type I hoods and penetrate a floor shall be in a shaft enclosure of not less than 2 hour fire resistive construction.

24.95.040 Sprinkler Protection.

(Amended by Ordinance 181136, effective August 17, 2007.) All portions of the building shall be protected throughout by an automatic sprinkler system complying with U.B.C. Standard No. 9-1 (NFPA 13) as contained in the Oregon Structural Specialty Code. The automatic sprinkler system shall not substitute for one-hour fire-resistive construction and cannot be used for building area increases.

24.95.050 Height.

(Amended by Ordinance 181136, effective August 17, 2007.) Regardless of construction, the maximum height the building shall be 65 feet. The height shall be measured from the lowest level of fire department vehicle access to the highest point of any of the following:

A. top of parapet;

B. the highest point of coping of a flat roof;

C. the deck of a mansard roof; or

D. the average height of the highest gable of a pitched or hipped roof associated with the building façade.

Each portion of the building created by an area separation wall shall comply with this section. Where a portion of the building created by an area separation wall is not directly

adjacent to approved fire department vehicle access locations, the roof of that portion of the building shall be no higher than the roof of the adjoining portion of the building which is adjacent to fire department vehicle access.

Exception: Mechanical, elevator and stairway penthouses may project up to 15 feet above the height limits determined in this section.

24.95.055 Opening Protection

(Amended by Ordinance 181136, effective August 17, 2007.) Exterior walls and opening protection in exterior walls shall comply with the provisions of Section 503.2 and Table 5-A of the Oregon Structural Specialty Code based on the occupancy and the type of construction of that portion of the building under consideration.

24.95.060 Fire Fighting Access.

(Amended by Ordinance Nos. 176955, 180917 and 181136, effective August 17, 2007.) Access to the building for fire fighting, rescue and related purposes shall be provided as follows:

A. Fire fighting access required. Subject to the approval of Portland Fire & Rescue, fire department vehicle access shall be provided that meets the following standards:

1. Location. Fire department vehicle access locations shall be on an access road.

2. Access to apartment units. At least fifty percent (50%) of all apartments with windows on the exterior façade shall be reachable by a ladder truck provided with a 100 foot aerial ladder and located on an access road.

3. Design standards for access road. An access road shall be provided as follows:

a. Classification. Access roads shall be either:

(1) A public street; or

(2) An area of the property set aside for access road purposes.

b. Location.

(1) Access roads shall be located along at least 2 sides of the building.

(2) The edge of access roads at the access location shall be no closer than 10 feet and no farther than 21 feet from the building.

c. Width. Minimum width for access roads shall be not less than one of the following:

(1) 20 feet wide where no parking is allowed; or

(2) 28 feet wide where parking is allowed on one side of the road; or

(3) 32 feet wide where parking is allowed on 2 sides of the road.

d. Paving. All access roads shall be paved

e. Design load. The minimum design load of an access road shall support the weight of an ASHTO HS25 design vehicle.

f. Policy compliance. The access road shall also comply with Portland Fire & Rescue Code Enforcement policy B-1.

4. Location of planted trees. Any trees planted between the edge of an access road and building facades with apartments having reachable windows as described in Subsection 24.95.050 A.2. above, shall be subject to the approval of Portland Fire & Rescue and Director; and

5. Location of overhead wires. The location of overhead wires along building facades adjacent to fire department vehicle access shall be subject to the approval of the Portland Fire & Rescue;

B. Interior Courtyards. Interior courtyards shall be not less than 30 feet in any interior dimension.

C. Stairways to the roof. Unless the roof has a slope greater than 4 vertical in 12 horizontal, at least fifty percent (50%), but not less than two stairways, in the building shall provide access to the roof.

1. Priority. The following stairways shall be included in those providing access to the roof. Access to the roof shall be provided by the stairways in the locations described below, in the following order of priority:

a. Stairways that are the most remote from fire department access.

b. Where corridors within the building are not continuous or looped, stairways located at each end of a corridor.

2. Design.

a. Ladder access to most units. Where all the apartments above eighty percent (80%) of the building perimeter have windows within reach of a 100 foot aerial ladder positioned at an approved fire department vehicle access location, stairway roof access may be provided by ships ladders and roof hatch devices as follows:

(1) Ladder design.

(a) The ladder shall be constructed of steel.

(b) The minimum width of the ladder shall be 30 inches between handrails.

(c) The rise and run of the ladder shall be 12 inches maximum and 5 inches minimum respectively.

(d) Handrails shall be provided on both sides of the ladder and shall extend to the underside of the roof. Handrails shall not reduce the clear width of the ladder to less than 30 inches.

(2) Roof hatch design.

(a) The scuttle opening shall be at least 30 inches wide.

(b) The scuttle opening shall be at least 8 feet long.

(c) The maximum scuttle threshold shall be 12 inches.

(d) Covers shall open to a minimum of 90 degrees measured from the scuttle opening.

(e) The cover shall have an automatic raising mechanism and an automatic hold open arm and cover release.

(f) The cover shall have lever handles on both the interior and the exterior.

(g) The cover latch shall be spring activated.

(h) Scuttles may be locked on the inside only with a brass-shackle (marine) padlock.

(i) Scuttles shall be designed to support and open under all required roof loads including any applicable snow drift conditions.

b. Restricted ladder access. Where less than one hundred percent (100%) of apartments on eighty percent (80%) of the building perimeter have windows as specified in Subsection 24.95.060 C.2.a above, all of the following requirements shall apply:

(1) Roof loads. The roof shall be designed to support loads as if it were an occupied roof.

(2) Stairway construction. All stairways shall comply with Section 1003.3.3 of the Oregon Structural Specialty Code.

(3) Roof access. Access onto the roof for fifty percent (50%) of the stairways providing roof access, but not less than one, shall be provided by way of a door complying with Section 1003.3.1 of the Oregon Structural Specialty Code. Roof access for all remaining stairways may be provided by way of a roof hatch meeting the design requirements of 24.95.060 C.2.a.(2) and the requirements in (a) through (c) below:

(a) Hardware for the hatch or door shall meet the requirements of Chapter 10 and Chapter 11 of the Oregon Structural Specialty Code.

(b) Door or hatch thresholds at roof opening.

(i) Door thresholds shall be not more than six inches (152 mm) in height.

(ii) Hatch thresholds shall be not more than 12 inches (304 mm) in height or another height approved by the Director.

(c) A sign shall be posted at a clearly visible location either on the door or on the wall adjacent to the door or hatch stating, "Watch Step - High Threshold."

(4) Rescue area. At least one rescue area shall be provided on the building roof. Where the building has been divided using area separation walls, a rescue area shall be provided for each separate building area. The Portland Fire & Rescue shall approve the location of all rescue areas. In addition:

(a) The rescue area shall be located so that the area is available from all egress stairways serving the roof.

(b) Where more than one rescue area is provided for a roof or portion thereof, a pedestrian path shall be provided between the areas.

(c) Where only one area is provided, the area shall be large enough to contain the occupant load of the upper two floors located between the area separation walls. Where more than one area is provided, the required rescue area size may be divided equally amongst the number of areas provided.

(d) The size of the rescue area shall be calculated using an occupant load factor of three square feet (.028 m2) per person.

(e) Where the roof is not surrounded by a parapet at least 30 inches in height, all rescue areas shall be provided with guardrails complying with Section 509 of the Oregon Structural Specialty Code.

(f) The slope of the rescue area, including the pedestrian path to or between areas, shall not be more than 1 to 48.

(g) The rescue area shall be designed to support concentrated loads of 100 psf.

D. Each stairway shall include a Class I or III standpipe complying with the Oregon Structural Specialty Code.

24.95.070 Permit Application

(Amended by Ordinance Nos. 176955, 180917 and 181136, effective August 17, 2007.)

A. Plans and Specifications. Permit applications submitted pursuant to this chapter shall include the plans and specifications as required by the Bureau of Development Services and Portland Fire & Rescue.

B. Pre-application Conference. As early as practicable in the design process, the applicant shall have a per-application design conference with the Director and Portland Fire & Rescue.

C. Design considerations. As part of the permit application, the engineer of record shall document consideration of issues critical to the design of tall wood structures. Considerations shall include, but are not limited, to the following:

1. Splitting of wood members from shear wall nailing;

2. Differential shrinkage of wood, steel and concrete members;

3. Differential shrinkage of load bearing walls with and without wood panels;

4. Axial and flexural capacity of lower floor studs; and

5. Compression of lower floor wood plates.

24.95.080 Construction and Inspection.

(Amended by Ordinance Nos. 176955 and 181136, effective August 17, 2007.) In addition to inspections and special inspections specified in the Oregon Structural Specialty Code and Chapter 24.20 of this Title, the Director shall require the following for buildings constructed pursuant to this chapter:

A. Structural Observation: Structural observation shall be provided by the engineer of record. Reports of the structural observation shall be provided to the Director periodically during framing.

B. Special Inspection. Special inspection shall be provided to enhance attention on the key elements of the lateral force resisting systems of the building, including, but not limited to, the following:

1. The grade of structural wood panels used in the sheer walls and horizontal diaphragms;

2. The nail size and pattern of the sheer walls and horizontal diaphragms;

3. The framing, location and length of all shear walls;

4. The hold down installations at all shear wall locations;

5. The diaphragm chord, drag strut and related details;

6. The base plate bolting; and

7. The blocking to top plate nailing.

The special inspector shall be employed by the owner or shall be employed by the engineer of record acting as the owner's agent, and shall comply with the standards of Chapter 24.20 of the City Code.

BASIC FLOODPLAIN RELATIONSHIPS

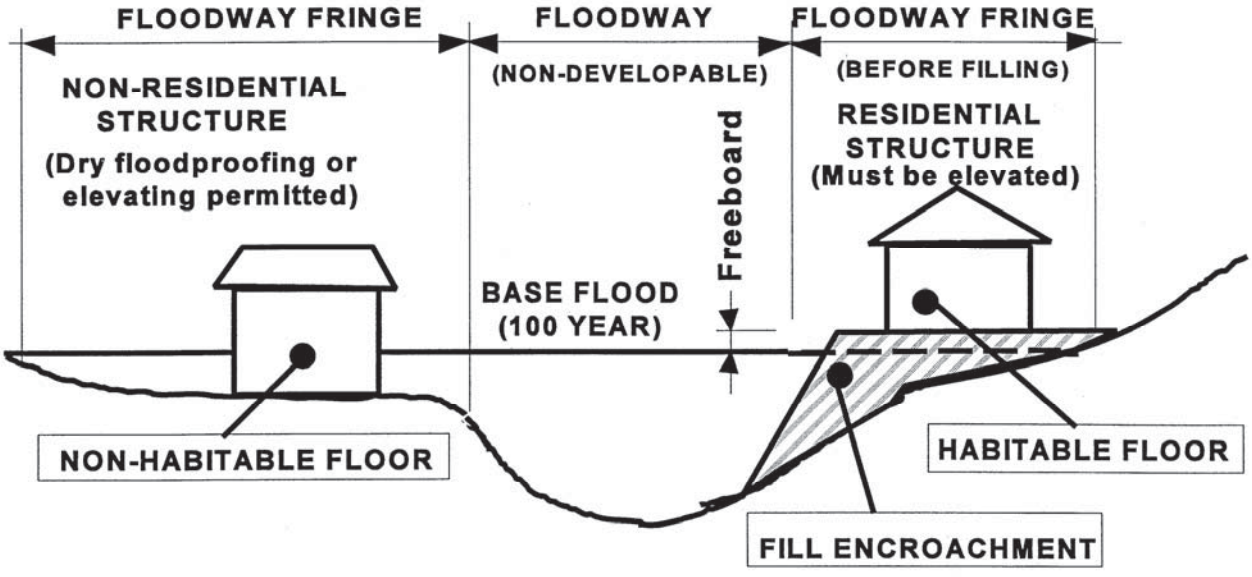

FIGURE 1 (Section 24.50.070)

FIGURE 2 (24.70)

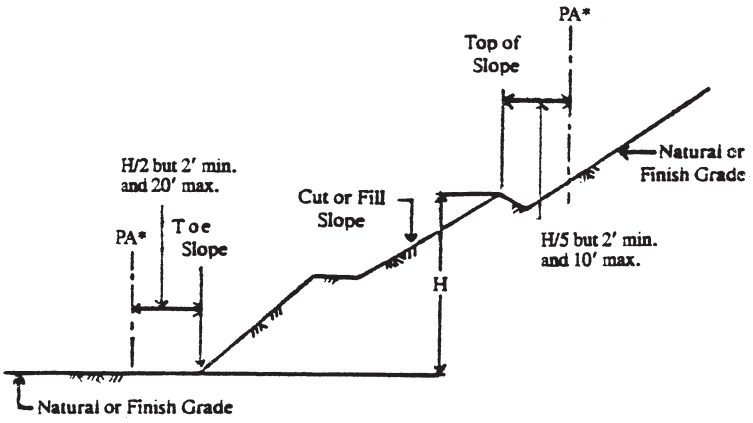

Table No. 24.70-C
Required Setbacks from permit area boundary (in feet)

TABLE 24-70C

	SETBACKS	
H	a	b'
Under 5	0	1
5 - 30	H/2	H/5
Over 30	15	6

Additional width may be required for interceptor drain.

FIGURE 3 (24.70)