

Site Development Narrative

Proposed Project Name: Northwest Property Management

Proposal Description: The applicant proposes to construct a new metal building with a footprint of approximately 12,500 SF including Industrial Use Warehouse space.

Applicant: NW Precision Design, LLC (Darin Bouska) 17407 SW Inkster Dr,

Sherwood, Oregon 97140

Owner: Nelmun Management, LLC

Site Address: 20861 SW Olds Place, Sherwood, OR 97140

Tax Lot: 2S129A03400

Legal Description: Parcel 2, partition plat no 2018-021, recorded May 17, 2018 as document no. 2018-034151 in the city of Sherwood, County of Washington and state of Oregon.

Land Use Designation: Light Industrial (LI)

This narrative addresses the following Code Sections:

Sherwood, Oregon - Municipal Code:

Division II. - Land Use And Development

Chapter 16.31 - Industrial Land Use Districts

Division V. - Community Design Chapter 16.90 - Site Planning

Chapter 16.92 - Landscaping

Chapter 16.94 - Off-Street Parking And Loading Chapter 16.96 - On-Site Circulation

Chapter 16.98 - On-Site Storage

Division VI. - Public Infrastructure

Chapter 16.106 - Transportation Facilities Chapter 16.112 - Water Supply

Chapter 16.114 - Storm Water

Chapter 16.116 - Fire Protection

Division VIII. - Environmental Resources

Chapter 16.142 - Parks, Trees And Open Spaces Chapter 16.146 - Noise

Chapter 16.148 - Vibrations

Chapter 16.150 - Air Quality

Chapter 16.152 - Odors

Chapter 16.156 - Energy Conservation

Attachment: Traffic Impact Statement

Chapter 16.31 - Industrial Land Use Districts

16.31.010 - Purpose



A. Employment Industrial (EI) - The EI zoning district provides employment areas that are suitable for, and attractive to, key industries and industry clusters that have been identified by the State of Oregon and the City's economic development strategy as important to the state and local economy. The following are preferred industry sectors for areas zoned EI: Clean Technology; Technology and Advanced Manufacturing; and Outdoor Gear and Active Wear.

Land zoned EI shall provide for large and medium-sized parcels for industrial campuses and other industrial sites that can accommodate a variety of industrial companies and related businesses. Areas zoned EI are also intended to provide the opportunity for flex building space within small- and medium-sized industrial campuses and business parks to accommodate research and development companies, incubator/emerging technology businesses, related materials and equipment suppliers, and/or spin-off companies and other businesses that derive from, or are extensions of, larger campus users and developments. Retail and commercial uses are allowed only when directly supporting area employers and employees.

Industrial establishments and support services shall not have objectionable external features and shall feature well-landscaped sites and attractive architectural design, as determined by the Hearing Authority.

B. Light Industrial (LI) - The LI zoning district provides for the manufacturing, processing, assembling, packaging and treatment of products which have been previously prepared from raw materials. Industrial establishments shall not have objectionable external features and shall feature well-landscaped sites and attractive architectural design, as determined by the Commission.

C. General Industrial (GI) - The GI zoning district provides for the manufacturing, processing, assembling, packaging and treatment of products from previously prepared or raw materials, providing such activities can meet and maintain minimum environmental quality standards and are situated so as not to create significant adverse effects to residential and commercial areas of the City. The minimum contiguous area of any GI zoning district shall be fifty (50) acres.

(Ord. No. 2016-008, § 2, 6-21-2016; Ord. No. 2012-011, § 2, 8-7-2012)

RESPONSE: The applicant proposes to construct a new metal building with a footprint of approximately 12,500 SF including Industrial Use Warehouse space.

Chapter 16.58 - CLEAR VISION AND FENCE STANDARDS

16.58.010 - Clear Vision Areas



A. A clear vision area shall be maintained on the corners of all property at the intersection of two (2) streets, intersection of a street with a railroad, or intersection of a street with an alley or private driveway.

B. A clear vision area shall consist of a triangular area, two (2) sides of which are lot lines measured from the corner intersection of the street lot lines for a distance specified in this regulation; or, where the lot lines have rounded corners, the lot lines extended in a straight line to a point of intersection, and so measured, and the third side of which is a line across the corner of the lot joining the non-intersecting ends of the other two (2) sides.

C. A clear vision area shall contain no planting, sight obscuring fence, wall, structure, or temporary or permanent obstruction exceeding two and one-half (21/2) feet in height, measured from the top of the curb, or where no curb exists, from the established street center line grade, except that trees exceeding this height may be located in this area, provided all branches and foliage are removed to the height of seven (7) feet above the ground on the sidewalk side and ten (10) feet on the street side.

The following requirements shall govern clear vision areas:

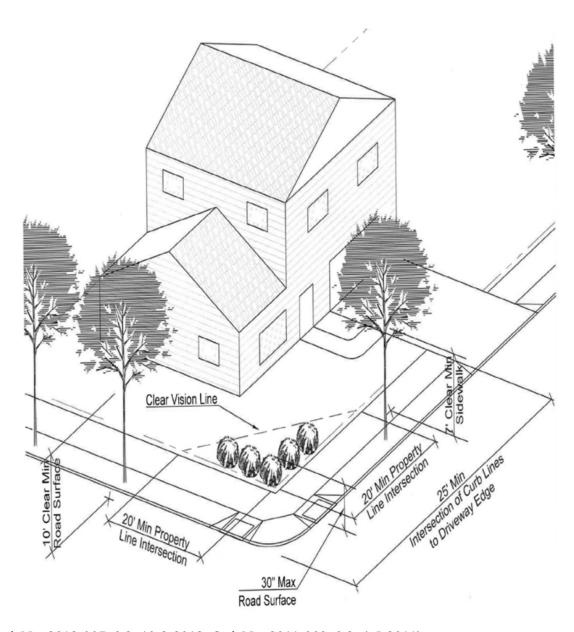
- 1. In all zones, the minimum distance shall be twenty (20) feet.
- 2. In all zones, the minimum distance from corner curb to any driveway shall be twenty-

five(25) feet.

3. Where no setbacks are required, buildings may be constructed within the clear vision area.

RESPONSE: Clear Vision Areas are shown on A0.1 Site plan, which demonstrating that the design meets the requirement.





(Ord. No. 2018-007, § 2, 10-2-2018; Ord. No. 2011-003, § 2, 4-5-2011)



Chapter 16.90 - SITE PLANNING*

16.90.010 - Purpose

Site planning review is intended to:

- A. Encourage development that is compatible with the existing natural and manmade environment, existing community activity patterns, and community identity.
- B. Minimize or eliminate adverse visual, aesthetic or environmental effects caused by the design and location of new development, including but not limited to effects from:
- 1. The scale, mass, height, areas, appearance and architectural design of buildings and other development structures and features.
 - 1. Vehicular and pedestrian ways and parking areas.
 - 2. Existing or proposed alteration of natural topographic features,

vegetation and water-ways.

(Ord. No. 2015-003, § 2, 3-17-2015; Ord. No. 2010-015, § 2, 10-5-2010; Ord. 86-851, § 3)

16.90.020 - Site Plan Review

A. Site Plan Review Required

Site Plan review is required prior to any substantial change to a site or use that does not meet the criteria of a minor or major modification, issuance of building permits for a new building or structure, or for the substantial alteration of an existing structure or use. For the purposes of Section 16.90.020, the terms "substantial change" and "substantial alteration" mean any development activity as defined by this Code that generally requires a building permit and may exhibit one or more of the following characteristics:

1. The activity alters the exterior appearance of a structure, building or property and is not considered a modification.

RESPONSE: Acknowledge that the proposal of new construction on a previously unimproved site does trigger the Site Plan Review Requirement.

- 2. The activity involves changes in the use of a structure, building, or property from residential to commercial or industrial and is not considered a modification.
- RESPONSE: Not Applicable there is no change in use being proposed.
- 3. The activity involves non-conforming uses as defined in Chapter 16.48. **RESPONSE:** Not Applicable — there are no non-conforming use of land, structures or use of structures being proposed.
- 4. The activity constitutes a change in a City approved plan, per Section 16.90.020 and is not considered a modification.

RESPONSE: Acknowledge that the proposal of new construction on a previously unimproved site does trigger the Site Plan Review Requirement.

5. The activity is subject to site plan review by other requirements of this Code. *RESPONSE: Acknowledge*



6. building more than doubles in size), regardless of whether it would be considered a major or minor modification.

The activity increases the size of the building by more than 100% (i.e. the

RESPONSE: Not Applicable — There are not current buildings on site that will be modified. Project consists of new construction.

- B. Exemption to Site Plan Requirement
 - 1. Single and two family uses
- 2. Manufactured homes located on individual residential lots per Section 16.46.010, but including manufactured home parks.

RESPONSE: Not Applicable — The proposed project is not a residential project.

- C. Reserved
- D. Required Findings

No site plan approval will be granted unless each of the following is found:

1. The proposed development meets applicable zoning district standards and design standards in Division II, and all provisions of Divisions V, VI, VIII and IX.

RESPONSE: The proposed development meets the applicable zoning district standards and design standards in Division II, and all provisions of Division V, VI, VIII and IX.

2. The proposed development can be adequately served by services conforming to the Community Development Plan, including but not limited to water, sanitary facilities, storm water, solid waste, parks and open space, public safety, electric power, and communications.

RESPONSE: The proposed development can be adequately served by services conforming to the Community Development Plan.

3. Covenants, agreements, and other specific documents are adequate, in the City's determination, to assure an acceptable method of ownership, management, and maintenance of structures, landscaping, and other on-site features.

RESPONSE: Acknowledged.

4. The proposed development preserves significant natural features to the maximum extent feasible, including but not limited to natural drainage ways, wetlands, trees, vegetation (including but not limited to environmentally sensitive lands), scenic



views, and topographical features, and conforms to the applicable provisions of Division VIII of this Code and Chapter 5 of the Community Development Code. *RESPONSE: Acknowledged. All actions have been taken to preserve significant natural features to the maximum extent feasible.*

5. For developments that are likely to generate more than 400 average daily trips (ADTs), or at the discretion of the City Engineer, the applicant must provide adequate information, such as a traffic impact analysis (TIA) or traffic counts, to demonstrate the level of impact to the surrounding transportation system. The developer is required to mitigate for impacts attributable to the project, pursuant to TIA requirements in Section 16.106.080 and rough proportionality requirements in Section 16.106.090. The determination of impact or effect and the scope of the impact study must be coordinated with the provider of the affected transportation facility.

RESPONSE: Not Applicable -Please note that a Traffic Impact Statement from Gaylord Marine Services, Inc. has been included with this document.

- 6. The proposed commercial, multi-family, institutional or mixed-use development is oriented to the pedestrian and bicycle, and to existing and planned transit facilities. Urban design standards include the following:
 - a. Primary, front entrances are located and oriented to the street, and have significant articulation and treatment, via facades, porticos, arcades, porches, portal, forecourt, or stoop to identify the entrance for pedestrians. Additional entrance/exit points for buildings, such as a postern, are allowed from secondary streets or parking areas.

RESPONSE: The proposed development has been designed to demonstrate main building entrances through architectural articulation.

b. Buildings are located adjacent to and flush to the street, subject to landscape corridor and setback standards of the underlying zone.

Response: The proposed development has the building located in adjacent to and flush to the streets subject to landscape corridor and set backs standards of the underlying zone.

c. The architecture of buildings are oriented to the pedestrian and designed for the long term and be adaptable to other uses. Aluminum, vinyl, and T-111 siding are prohibited. Street facing elevations have windows, transparent fenestration, and divisions to break up the mass of any window. Roll up and sliding doors are acceptable. Awnings that provide a minimum 3 feet of shelter from rain are required unless other architectural elements are provided for similar protection, such as an arcade.

RESPONSE: The proposed building meets the requirements set forth based on material, building orientation, building articulations, and transparent fenestration.



d. As an alternative to the standards in Section 16.90.020.D.6.a–c, the following Commercial Design Review Matrix may be applied to any commercial, multi-family, institutional or mixed use development (this matrix may not be utilized for developments within the Old Town Overlay). A development must propose a minimum of 60 percent of the total possible points to be eligible for exemption from the standards in Section 16.90.020.D.6.a–c. In addition, a development proposing between 15,001 and 40,000 square feet of floor area, parking or seating capacity and proposing a minimum of 80 percent of the total possible points from the matrix below may be reviewed as a Type II administrative review, per the standards of Section 16.72.010.A.2.

RESPONSE: Acknowledge requirement to meet Industrial Design Standards (16.90.030.D7 a or b).

e. As an alternative to the standards in Sections 16.90.020.D.6.a-c, the Old Town Design Standards (Chapter 16.162) may be applied to achieve this performance measure.

RESPONSE: Not Applicable — Project location is not within Old Town.

f. As an alternative to the standards in Sections 16.90.020.D.6.a.–e, an applicant may opt to have a design review hearing before the Planning Commission to demonstrate how the proposed development meets or exceeds the objectives in Section 16.90.010.B of this Code. This design review hearing will be processed as a Type IV review with public notice and a public hearing.

RESPONSE: Acknowledged.

- 7. Industrial developments provide employment opportunities for citizens of Sherwood and the region as a whole. The proposed industrial development is designed to enhance areas visible from arterial and collector streets by reducing the "bulk" appearance of large buildings. Industrial design standards include the following:
 - a. Portions of the proposed industrial development within 200 feet of an arterial or collector street and visible to the arterial or collector (i.e. not behind another building) must meet any four of the following six design criteria:
 - (1) A minimum 15% window glazing for all frontages facing an arterial or collector.
 - (2) A minimum of two (2) building materials used to break up vertical facade street facing frontages (no T-111 or aluminum siding).
 - (3) Maximum thirty-five (35) foot setback for all parts of the building from the property line separating the site from all arterial or collector streets (required visual corridor falls within this maximum setback area).
 - (4) Parking is located to the side or rear of the building when viewed from the arterial or collector.



(5) Loading areas are located to the side or rear of the building when viewed from the arterial or collector. If a loading area is visible from an arterial or collector, it must be screened with vegetation or a screen made of materials matching the building materials.

(6) All roof-mounted equipment is screened with materials complimentary to the building design materials.

RESPONSE: Not Applicable The proposed development is not within 200 feet from an arterial or collector street.

- b. As an alternative to Section 16.90.020.D.7.a, an applicant may opt to have a design review hearing before the Planning Commission to demonstrate how the proposed development meets or exceeds the applicable industrial design objectives below (this design review hearing will be processed as a Type IV review):
- (1) Provide high-value industrial projects that result in benefits to the community, consumers and developers.
- (2) Provide diversified and innovative working environments that take into consideration community needs and activity patterns.
- (3) Support the City's goals of economic development.
- (4) Complement and enhance projects previously developed under the industrial design standards identified in Section 16.90.020.D.7.
- (5) Enhance the appearance of industrial developments visible from arterials and collectors, particularly those considered "entrances" to Sherwood, including but not limited to: Highway 99W, Tualatin-Sherwood Road and Oregon Street.
- (6) Reduce the "bulk" appearance of large industrial buildings as viewed from the public street by applying exterior features such as architectural articulation, windows and landscaping.
- (7) Protect natural resources and encourage integration of natural resources into site design (including access to natural resources and open space amenities by the employees of the site and the community as a whole).

RESPONSE: Acknowledged.

8. Driveways that are more than twenty-four (24) feet in width shall align with existing streets or planned streets as shown in the Local Street Connectivity Map in the adopted Transportation System Plan (Figure 17), except where prevented by topography, rail lines, freeways, pre-existing development, or leases, easements, or covenants.

RESPONSE: Acknowledged.

E. Approvals

The application is reviewed pursuant to Chapter 16.72 and action taken to approve,



approve with conditions, or deny the application for site plan review. Conditions may be imposed by the Review Authority if necessary to fulfill the requirements of the adopted Comprehensive Plan, Transportation System Plan or the Zoning and Community Development Code. The action must include appropriate findings of fact as required by Section 16.90.020. The action may be appealed to the Council in

accordance with Chapter 16.76.

RESPONSE: Acknowledged.

F. Time Limits

Site plan approvals are void after two (2) years unless construction on the site has begun, as determined by the City. The City may extend site plan approvals for an additional period not to exceed one (1) year, upon written request from the applicant showing adequate cause for such extension, and payment of an extension application fee as per Section 16.74.010. A site plan approval granted on or after January 1, 2007 through December 31, 2009, is extended until December 31, 2013. (Ord. No. 2015-003, § 2, 3-17-2015; Ord. No. 2012-003, § 2, 5-1-2012; Ord. No. 2011-011, § 1, 10-4-2011)

Editor's note– Ord. No. 2011-011, § 1, adopted October 4, 2011, amended the Code by, in effect, repealing former § 16.90.020, and adding new §§ 16.90.020 and 16.90.030. Former § 16.90.020 pertained to site plan review, and derived from Ord. 86-851; Ord. 91-922; Ord. 98-1053; Ord. 2003-1148; Ord. 2005-009; Ord. 2006-021; Ord. No. 2009-005, adopted June 2, 2009; Ord. No. 2010-05, adopted April 6, 2010; Ord. No. 2010-015, adopted October 5,2010.

RESPONSE: Acknowledged.

Footnotes:

- -No aluminum or T-111 siding permitted.
- -Pictures and/or artistic renderings must be submitted for review by the Planning Commission if metal roofs are proposed.
- Two (2) points if there is only one street-facing side and it is >20% glazing with inactive windows.
- If multiple buildings are proposed, average the building sizes in the development.
- -If multiple buildings are proposed in one development, one point is awarded if one or more buildings are located adjacent to one or more rights-of-way and two points are awarded if there is at least one building adjacent to each right-of-way.
- If primary entrance is oriented to the pedestrian, the project is automatically given these points without need for a second entrance.
- Percent of minimum required.
- Based on tree inventory submitted with development application.
- When no mitigation is required, the project receives zero points.
- -In addition to mitigated trees on-site, does not include Water Quality Facility Plantings.
- -Shrubs and drought resistant ground cover are better.

Schools automatically receive the full 3 points and are not penalized for amount of grass.

- -Includes visual corridor.
- -Including retaining walls.



Response: Acknowledge requirements for Site Plan review. The Commercial Design Review matrix is not applicable. Acknowledge requirement to meet Industrial Design Standards (16.90.030.D7 a or b).

16.90.030 - Site Plan Modifications and Revocation

- A. Modifications to Approved Site Plans
- 1. Major Modifications to Approved Site Plans
 - a. Defined. A major modification review is required if one or more of the changes listed below are proposed:
 - (1) A change in land use (i.e. residential to commercial, commercial to industrial, etc.);
 - (2) An increase in density by more than ten (10) percent, provided the resulting density does not exceed that allowed by the land use district;
 - (3) A change in setbacks or lot coverage by more than ten (10) percent, provided the resulting setback or lot coverage does not exceed that allowed by the land use district;
 - (4) A change in the type and/or location of access-ways, drives or parking areas negatively affecting off-site traffic or increasing Average Daily Trips (ADT) by more than 100;
 - (5) An increase in the floor area or height proposed for non-residential use by more than ten (10) percent;
 - (6) A reduction of more than ten (10) percent of the area reserved for common open space; or
 - (7) Change to a condition of approval that was specifically applied to this approval (i.e. not a "standard condition"), or a change similar to items identified in Section 16.90.030.A.1.
 - a.(1)–(2) as determined by the Review Authority. b. Approval Criteria. An applicant may request a major modification as follows:
 - (1) Upon the review authority determining that the proposed modification is a major modification, the applicant must submit an application form, filing fee and narrative, and a site plan using the same plan format as in the original approval. The review authority may require other relevant information, as necessary, to evaluate the request.
 - (2) The application is subject to the same review procedure (Type II, III or IV), decision making body, and approval criteria used for the initial project



approval, except that adding a Conditional Use to an approved Type II

project is reviewed using a Type III procedure.

- (3) The scope of review is limited to the modification request and does not open the entire site up for additional review unless impacted by the proposed modification. For example, a request to modify a parking lot requires site design review only for the proposed parking lot and any changes to associated access, circulation, pathways, lighting, trees, and landscaping.
- (4) Notice must be provided in accordance with Chapter 16.72.020.
- (5) The decision maker approves, denies, or approves with conditions an application for major modification based on written findings of the criteria.

2. Minor Modifications to Approved Site Plans

- a. A Minor Modification is any modification to a land use decision or approved development plan that is not within the description of a major modification.
- b. Minor Modification Review Procedure. An application for approval of a minor modification is reviewed by the review authority using a Type I review procedure under Section 16.72.010.A. Minor modifications involve only clear and objective Code standards.
- c. Minor Modification Applications. An application for minor modification must include an application form, filing fee and narrative, updated Clean Water Services (CWS) Service Provider Letter or equivalent acknowledgement from CWS, and a site plan using the same plan format as in the original approval if possible. The review authority may require other relevant information, as necessary, to evaluate the request.
- d. Minor Modification Approval Criteria. The review authority approves, denies, or approves with conditions an application for minor modification based on written findings that the modification is in compliance with all applicable requirements of the Development Code and conditions of approval on the original decision, and the modification is not a major modification.

B. Revocation

Any departure from an approved plan is cause for revocation of applicable building and occupancy permits. Furthermore if, in the City's determination, a condition or conditions of site plan approval are not or cannot be satisfied, the site plan approval, or building and occupancy permits, will be revoked.

(Ord. No. 2015-003, § 2, 3-17-2015; Ord. No. 2014-012, § 3, 7-17-2014; Ord. No. 2011-011, § 1, 10-4-2011)

RESPONSE: Acknowledge process of site plan review.



16.92.020 - Landscaping Materials

A. Type of Landscaping

Required landscaped areas shall include an appropriate combination of native evergreen or deciduous trees and shrubs, evergreen ground cover, and perennial plantings. Trees to be planted in or adjacent to public rights- of-way shall meet the requirements of this Chapter. Plants may be selected from the City's "Suggested Plant Lists for Required Landscaping Manual" or suitable for the Pacific Northwest climate and verified by a landscape architect or certified landscape professional.

1. Ground Cover Plants

- a. All of the landscape that is not planted with trees and shrubs must be planted in ground cover plants, which may include grasses. Mulch is not a substitute for ground cover, but is allowed in addition to the ground cover plants.
- b. Ground cover plants other than grasses must be at least the four-inch pot size and spaced at distances appropriate for the plant species. Ground cover plants must be planted at a density that will cover the entire area within three (3) years from the time of planting.
- 2. Shrubs
- a. All shrubs must be of sufficient size and number to be at full growth within three (3) years of planting.
- b. Shrubs must be at least the one-gallon container size at the time of planting.
- 3. Trees
- a. Trees at the time of planting must be fully branched and must be a minimum of two (2) caliper inches and at least six (6) feet in height.
- b. Existing trees may be used to meet the standards of this chapter, as described in Section 16.92.020.C.2.

B. Plant Material Selection and Preparation

- 1. Required landscaping materials shall be established and maintained in a healthy condition and of a size sufficient to meet the intent of the approved landscaping plan. Specifications shall be submitted showing that adequate preparation of the topsoil and subsoil will be undertaken.
- 2. Landscape materials should be selected and sited to produce a hardy and drought-resistant landscape area. Selection of the plants should include consideration of soil type, and depth, the amount of maintenance required, spacing, exposure to sun and wind, the slope and contours of the site, and compatibility with existing native vegetation preserved on the site.

C. Existing Vegetation

1. All developments subject to site plan review per Section 16.90.020 and required to submit landscaping plans per this section shall preserve existing trees, woodlands and vegetation on the site to the maximum extent possible, as determined by the Review Authority, in addition to complying with the provisions of Section 16.142.(Parks, Trees and Open Space) and Chapter 16.144 (Wetland,



Habitat, and Natural Resources).

- 2. Existing vegetation, except those plants on the Nuisance Plants list as identified in the "Suggested Plant Lists for Required Landscaping Manual" may be used to meet the landscape standards, if protected and maintained during the construction phase of the development.
 - a. If existing trees are used, each tree six (6) inches or less in diameter counts as one (1) medium tree.
 - b. Each tree that is more than six (6) inches and up to nine (9) inches in diameter counts as two (2) medium trees.
 - c. Each additional three (3) inch diameter increment above nine (9) inches counts as an additional medium tree.

D. Non-Vegetative Features

- 1. Landscaped areas as required by this Chapter may include architectural features interspersed with planted areas, such as sculptures, benches, masonry or stone walls, fences, rock groupings, bark dust, semi- pervious decorative paving, and graveled areas.
- 2. Impervious paving shall not be counted toward the minimum landscaping requirements unless adjacent to at least one (1) landscape strip and serves as a pedestrian pathway.
- 3. Artificial plants are prohibited in any required landscaped area. (Ord. No. 2015-003, § 2, 3-17-2015; Ord. No. 2012-008, § 2, 7-17-2012; Ord. No. 2010-015, § 2, 10-5-2010; Ord. 2006-021; Ord. 86-851, § 3)

RESPONSE: Landscape Materials are proposed in accordance with the above code. Please see L1.0 for detailed landscape plan and plantings.

16.92.030 - Site Area Landscaping and Perimeter Screening Standards
A. Perimeter Screening and Buffering

1. Perimeter Screening Separating Residential Zones:

A minimum six-foot high sight-obscuring wooden fence, decorative masonry wall, or evergreen screen, shall be required along property lines separating single and two-family uses from multi- family uses, and along property lines separating residential zones from commercial, institutional/public or industrial zones subject to the provisions of Chapter 16.48.020 (Fences, Walls and Hedges).

a. For new uses adjacent to inventoried environmentally sensitive areas, screening requirements shall be limited to vegetation only to preserve



wildlife mobility. In addition, the Review Authority may require plants and other landscaping features in locations and sizes necessary to protect the privacy of residences and buffer any adverse effects of adjoining uses. b. The required screening shall have breaks, where necessary, to allow pedestrian access to the site. The design of the wall or screening shall also provide breaks or openings for visual surveillance of the site and security. c. Evergreen hedges used to comply with this standard shall be a minimum of thirty-six (36) inches in height at maturity, and shall be of such species, number and spacing to provide the required screening within one (1) year after planting.

Response: The property does not abut residential.

- 2. Perimeter Landscaping Buffer
- a. A minimum ten (10) foot wide landscaped strip comprised of trees, shrubs and ground cover shall be provided between off-street parking, loading, or vehicular use areas on separate, abutting, or adjacent properties.
- b. The access drives to a rear lots in the residential zone (i.e. flag lot) shall be separated from abutting property(ies) by a minimum of forty-two- inch sight-obscuring fence or a forty-two-inch to an eight (8) feet high landscape hedge within a four-foot wide landscape buffer. Alternatively, where existing mature trees and vegetation are suitable, Review Authority may waive the fence/buffer in order to preserve the mature vegetation.

RESPONSE: A 5-foot-wide landscape buffer is proposed between the parking/loading area and the street, using the following:

3. Perimeter Landscape Buffer Reduction

If the separate, abutting property to the proposed development contains an existing perimeter landscape buffer of at least five (5) feet in width, the applicant may reduce the proposed site's required perimeter landscaping up to five (5) feet maximum, if the development is not adjacent to a residential zone. For example, if the separate abutting perimeter landscaping is five (5) feet, then applicant may reduce the perimeter landscaping to five (5) feet in width on their site so there is at least five (5) feet of landscaping on each lot.

RESPONSE: A minimum 10-foot-wide landscape buffer is proposed between the parking/loading area and the rear property line. A minimum 5-foot-wide landscape buffer is proposed along the south property line.

- B. Parking Area Landscaping
 - 1. Purpose

The standard is a landscape treatment that uses a combination of trees, shrubs, and ground cover to provide shade, storm water management, aesthetic benefits, and screening to soften the impacts of large expanses of pavement and vehicle

movement. It is applied to landscaped areas within and around the parking lot and loading areas.

- 2. Definitions
- a. Parking Area Landscaping: Any landscaped area on the site that is not required as perimeter landscaping § 16.92.030 (Site Landscaping and Screening).
- b. Canopy Factor
 - (1) Landscape trees are assigned a canopy factor to determine the specific number of required trees to be planted. The canopy factor is calculated based on the following formula:

Canopy Factor = Mature Height (in feet) × Canopy Spread (in feet) × Growth Rate Factor × .01

- (2) Growth Rate Factor: The growth rate factor is three (3) for fast-growing trees, two (2) for medium growing trees, and one (1) for slow growing trees. The growth rate of a tree is identified in the "Suggested Plant Lists for Required Landscaping Manual."
- 3. Required Landscaping

There shall be at least forty-five (45) square feet parking area landscaping for each parking space located on the site. The amount of required plant materials are based on the number of spaces as identified below.

RESPONSE: Parking lot landscaping for 9 parking spaces equals 405 square feet of parking lot landscape required, 790 square feet of parking lot landscaping is proposed. See L1.0.

- 4. Amount and Type of Required Parking Area Landscaping
 - a. Number of Trees required based on Canopy Factor Small trees have a canopy factor of less than forty (40), medium trees have a canopy factor from forty (40) to ninety (90), and large trees have a canopy factor greater than ninety (90);
 - (1) Any combination of the following is required:
 - (i) One (1) large tree is required per four (4) parking spaces;
 - (ii) One (1) medium tree is required per three (3) parking spaces; or
 - (iii) One (1) small tree is required per two (2) parking spaces.
 - (iv) At least five (5) percent of the required trees must be evergreen.

RESPONSE: Two large and two small trees are proposed for parking lot trees which equals 12 spaces and only 9 are proposed. See L1.0 for calculations and plan.

(2) Street trees may be included in the calculation for the number of required trees in the parking area.

RESPONSE: Street trees are not required/allowed due to the existing PUE and are not included in the parking lot tree calculation.

b. Shrubs:



Two (2) shrubs are required per each space.

RESPONSE: Eighteen (18) shrubs are required in the parking lot and 37 shrubs are proposed. Please see L1.0.

(2) For spaces where the front two (2) feet of parking spaces have been landscaped instead of paved, the standard requires one (1) shrub per space. Shrubs may be evergreen or deciduous.

RESPONSE: This does not apply.

- c. Ground cover plants:
- (1) Any remainder in the parking area must be planted with ground cover plants.
- (2) The plants selected must be spaced to cover the area within three (3) years. Mulch does not count as ground cover.

RESPONSE: Ground cover is proposed throughout with species that will spread to cover the ground in 3 years. Please see L1.0.

- 5. Individual Landscape Islands Requirements
 - a. Individual landscaped areas (islands) shall be at least ninety (90)square feet in area and a minimum width of five (5) feet and shall be curbed to protect the landscaping.
 - b. Each landscape island shall be planted with at least one (1) tree.
 - c. Landscape islands shall be evenly spaced throughout the parking area.
 - d. Landscape islands shall be distributed according to the following:
 - (1) Residential uses in a residential zone: one (1) island for every eight (8) contiguous parking spaces.
 - (2) Multi or mixed-uses, institutional and commercial uses: one (1) island for every ten (10) contiguous parking spaces. (3) Industrial uses: one (1) island for every twelve (12) contiguous parking spaces.
 - e. areas and may be included in the calculation of the required landscaping amount. f. Exception to Landscape Requirement

Linear raised or marked sidewalks and walkways within the parking areas connecting the parking spaces to the on-site buildings may be included in the calculation of required site landscaping provide that it:

- (1) Trees are spaced a maximum of thirty (30) feet on at least one
 - (1) side of the sidewalk.
 - (2) The minimum unobstructed sidewalk width is at least six (6) feet wide.



(3) The sidewalk is separated from the parking areas by curbs, bollards, or other means on both sides.

RESPONSE: Landscape islands are not required, only 9 parking spaces are proposed. See L1.0.

6. Landscaping at Points of Access

When a private access-way intersects a public right-of-way or when a property abuts the intersection of two (2) or more public rights-of-way, landscaping shall be planted and maintained so that minimum sight distances shall be preserved pursuant to Section 16.58.010.

RESPONSE: Proposed Landscape materials adjacent to the entrance drive will not impede the minimum sight distance requirements. See L1.0.

7. Exceptions

a. For properties with an environmentally sensitive area and/or trees or woodlands that merit protection per Chapters 16.142 (Parks, Trees and Open Space) and 16.144 (Wetland, Habitat and Natural Areas) the landscaping standards may be reduced, modified or "shifted" on-site where necessary in order to retain existing vegetation that would otherwise be removed to meet the above referenced landscaping requirements.

b. The maximum reduction in required landscaping buffer permitted through this exception process shall be no more than fifty (50) percent. The resulting landscaping buffer after reduction may not be less than five (5) feet in width unless otherwise permitted by the underlying zone. Exceptions to the required landscaping may only be permitted when reviewed as part of a land use action application and do not require a separate variance permit.

C. Screening of Mechanical Equipment, Outdoor Storage, Service and Delivery Areas All mechanical equipment, outdoor storage and manufacturing, and service and delivery areas, shall be screened from view from all public streets and any adjacent residential zones. If unfeasible to fully screen due to policies and standards, the applicant shall make efforts to minimize the visual impact of the mechanical equipment.

D. Visual Corridors

Except as allowed by subsection 6. above, new developments shall be required to establish landscaped visual corridors along Highway 99W and other arterial and collector streets, consistent with the Natural Resources and Recreation Plan Map, Appendix C of the Community Development Plan, Part II, and the provisions of Chapter 16.142(Parks, Trees, and Open Space). Properties within the Old Town Overlay are exempt from this standard.

RESPONSE: This section does not apply.



16.92.040 - Installation and Maintenance Standards A. Installation

All required landscaping must be in-ground, except when in raised planters that are used to meet minimum Clean Water Services storm water management requirements. Plant materials must be installed to current nursery industry standards. Plant materials must be properly supported to ensure survival. Support devices such as guy wires or stakes must not interfere with vehicular or pedestrian movement.

B. Maintenance and Mitigation of Landscaped Areas

- 1. Maintenance of existing non-invasive native vegetation is encouraged within a development and required for portions of the property not being developed.
- 2. All landscaping shall be maintained in a manner consistent with the intent of the approved landscaping plan.
- 3. Any required landscaping trees removed must be replanted consistent with the approved landscaping plan and comply with § 16.142, (Parks, Trees and Open Space).

RESPONSE: The landscape will be professionally maintained.

C. Irrigation

The intent of this standard is to ensure that plants will survive the critical establishment period when they are most vulnerable due to lack of watering. All landscaped areas must provide an irrigation system, as stated in Option 1, 2, or 3.

- 1. Option 1: A permanent built-in irrigation system with an automatic controller installed.
- 2. Option 2: An irrigation system designed and certified by a licensed landscape architect or other qualified professional as part of the landscape plan, which provides sufficient water to ensure that the plants become established. The system does not have to be permanent if the plants chosen can survive independently once established.
- 3. Option 3: Irrigation by hand. If the applicant chooses this option, an inspection will be required one (1) year after final inspection to ensure that the landscaping has become established.

RESPONSE: An automatic irrigation system will be installed as part of the scope of the project.

D. Deferral of Improvements

Landscaping shall be installed prior to issuance of occupancy permits, unless security equal to one hundred twenty-five (125) percent of the cost of the landscaping is filed with the City. "Security" may consist of a performance bond payable to the City, cash, certified check,



or other assurance of completion approved by the City. If the installation of the landscaping is not completed within one (1) year, the security may be used by the City to complete the installation.

RESPONSE: Acknowledged.

Chapter 16.94 - OFF-STREET PARKING AND LOADING 16.94.010 - General Requirements

A. Off-Street Parking Required

No site shall be used for the parking of vehicles until plans are approved providing for off-street parking and loading space as required by this Code. Any change in uses or structures that reduces the current off-street parking and loading spaces provided on site, or that increases the need for off-street parking or loading requirements shall be unlawful and a violation of this Code, unless additional off- street parking or loading areas are provided in accordance with Section 16.94.020, or unless a variance from the minimum or maximum parking standards is approved in accordance with Chapter 16.84 Variances.

B. Deferral of Improvements

Off-street parking and loading spaces shall be completed prior to the issuance of occupancy permits, unless the City determines that weather conditions, lack of available surfacing materials, or other circumstances beyond the control of the applicant make completion impossible. In such circumstances, security equal to one hundred twenty five (125) percent of the cost of the parking and loading area is provided the City. "Security" may consist of a performance bond payable to the City, cash, certified check, or other assurance of completion approved by the City. If the installation of the parking or loading area is not completed within one (1) year, the security may be used by the City to complete the installation.

C. Options for Reducing the Required Parking Spaces

- 1. Two (2) or more uses or, structures on multiple parcels of land may utilize jointly the same parking and loading spaces when the peak hours of operation do not substantially overlap, provided that satisfactory evidence is presented to the City, in the form of deeds, leases, or contracts, clearly establishing the joint use.
 - a. Within commercial, institutional and public, or industrial zones, shared parking may be provided on lots that are within five hundred (500) feet of the property line of the use to be served.
 - b. Shared parking is allowed if the application can show that the combined peak use is available by a parking study that demonstrates:



- (1) There is a sufficient number of parking spaces to accommodate the requirements of the individual businesses; or
 - (2) That the peak hours of operation of such establishments do not overlap, and
 - (3) That an exclusive permanent easement over a delineated area has been granted for parking space use.
- 2. Mixed use projects are developments where a variety of uses occupies a development project or complex. For example, an eating establishment, professional office building and movie theater are all components of a mixed use site. It does not include a secondary use within a primary use such as an administrative office associated with a retail establishment. In mixed-use projects, the required minimum vehicle parking shall be determined using the following formula:
 - a. Primary use: i.e. that with the largest proportion of total floor area within the development at one hundred (100) percent of the minimum vehicle parking required for that use.
 - b. Secondary Use: i.e. that with the second largest percentage of total floor area within the development, at ninety (90) percent of the vehicle parking required for that use.
 - c. Subsequent use or uses, at eighty (80) percent of the vehicle parking required for that use.

D. Prohibited Uses

Required parking, loading and maneuvering areas shall not be used for long-term storage or sale of vehicles or other materials, and shall not be rented, leased or assigned to any person or organization not using or occupying the building or use served.

E. Location

1. Residential off-street parking spaces:

parking structures).

- a. Shall be located on the same lot or development as the residential use. b. Shall not include garages or enclosed buildings with the exception of a parking structure in multifamily developments where three (3) or more spaces are not individually enclosed. (Example: Underground or multi-level
- 2. For other uses, required off-street parking spaces may include adjacent on- street parking spaces, nearby public parking and shared parking located within five hundred (500) feet of the use. The distance from the parking, area to the use shall be measured from the nearest parking space to a building entrance, following a sidewalk or other pedestrian route. The right to use private off-site parking must be evidenced by a recorded deed, lease, easement, or similar written notarized letter or instrument.
- 3. Vehicle parking is allowed only on improved parking shoulders that meet City standards for public streets, within garages, carports and other structures, or on driveways or parking lots that have been developed in conformance with this code. Specific locations and types of spaces (car pool, compact, etc.) for parking shall be



indicated on submitted plans and located to the side or rear of buildings where feasible.

a. All new development with forty (40) employees or more shall include preferential spaces for carpool/vanpool designation. Carpool and vanpool parking spaces shall be located closer to the main employee entrance than all other parking spaces with the exception of ADA parking spaces. Carpool/vanpool spaces shall be clearly marked as reserved for carpool/vanpool only.

b. Existing development may redevelop portions of designated parking areas for multi-modal facilities (transit shelters, park and ride, and bicycle parking), subject to meeting all other applicable standards, including minimum space standards.

F. Marking

All parking, loading or maneuvering areas shall be clearly marked and painted. All interior drives and access aisles shall be clearly marked and signed to show the direction of flow and maintain vehicular and pedestrian safety.

G. Surface and Drainage

- 1. All parking and loading areas shall be improved with a permanent hard surface such as asphalt, concrete or a durable pervious surface. Use of pervious paving material is encouraged and preferred where appropriate considering soils, location, anticipated vehicle usage and other pertinent factors
- 2. Parking and loading areas shall include storm water drainage facilities approved by the City Engineer or Building Official.

H. Repairs

Parking and loading areas shall be kept clean and in good repair. Breaks in paved surfaces shall be repaired. Broken or splintered wheel stops shall be replaced. Painted parking space boundaries and directional symbols shall be maintained in a readable condition.

I. Parking and Loading Plan

An off-street parking and loading plan, drawn to scale, shall accompany

requests for building permits or site plan approvals, except for single and two-family dwellings, and manufactured homes on residential lots. The plan shall show but not be limited to:

- 1. Delineation of individual parking and loading spaces and dimensions.
- 2. Circulation areas necessary to serve parking and loading spaces.
- 3. Location of accesses to streets, alleys and properties to be served, and any curb cuts.
- 4. Landscaping as required by Chapter 16.92.
- 5. Grading and drainage facilities.
- 6. Signing and bumper guard specifications.
- 7. Bicycle parking facilities as specified in Section 16.94.020.C.
- 8. Parking lots more than one (1) acre in size shall provide street-like features including curbs, sidewalks, and street trees or planting strips. Parking Districts

J. Parking Districts

The City may establish a parking district (i.e., permits or signage) in residential areas in order to protect residential areas from spillover parking generated by adjacent commercial, employment or mixed-use areas, or other uses that generate a high demand for parking. The district request shall be made to the City Manager, who will forward a recommendation to the City Council for a decision.

K. Structured parking and on-street parking are exempt from the parking space maximum in Section 16.94.020.A.

16.94.020 - Off-Street Parking Standards

A. Generally

Where square feet are specified, the area measured shall be the gross building floor area primary to the functioning of the proposed use. Where employees are specified, persons counted shall be those working on the premises, including proprietors, during the largest shift at peak season. Fractional space requirements shall be counted as a whole space. The Review Authority may determine alternate off - street parking and loading requirements for a use not specifically listed in this Section based upon the requirements of comparable uses.

Use: Warehouse

- WAREHOUSE = 13,000 S.F. (0.3/1000 = 4) (9 PROVIDED)



1 Parking Zone A reflects the maximum number of permitted vehicle parking spaces allowed for each listed land use. Parking Zone A areas include those parcels that are located within one-quarter (1/4) mile walking distance of bus transit stops, one-half (1/2) mile walking distance of light rail station platforms, or both, or that have a greater than twenty-minute peak hour transit service.

2 Parking Zone B reflects the maximum number of permitted vehicle parking spaces allowed for each listed land use. Parking Zone B areas include those parcels that are located at a distance greater than one-quarter (1/4) mile walking distance of bus transit stops, one-half (1/2) mile walking distance of light rail station platforms, or both.

3 If the street on which the house has direct access does not permit on-street parking or is less than twenty-eight (28) feet wide, two (2) off-street parking spaces are required per single-family residential unit. (includes single-family detached or attached, two-family dwelling or a manufactured home on an individual lot) If the abutting street is twenty-eight (28) feet or wider, one (1) standard (9 ft. × 20 ft.) parking space is required.

4 Visitor parking in residential developments: Multi-family dwelling units with more than ten (10) required parking spaces shall provide an additional fifteen (15) percent of the required number of parking spaces for the use of guests of the residents of the development. The spaces shall be centrally located or distributed throughout the development. Required bicycle parking facilities shall also be centrally located within or evenly distributed throughout the development.

B. Dimensional and General Configuration Standards

1. Dimensions For the purpose of this Chapter, a "parking space" means a stall nine (9) feet in width and twenty (20) feet in length. Up to twenty five (25) percent of required parking spaces may have a minimum dimension of eight (8) feet in width and eighteen (18) feet in length so long as they are signed as compact car stalls.

2. Layout

Parking space configuration, stall and access aisle size shall be of sufficient width for all vehicle turning and maneuvering. Groups of more than four (4) parking spaces shall be served by a driveway so as to minimize backing movements or other maneuvering within a street, other than an alley. All parking areas shall meet the minimum standards shown in the following



table and diagram

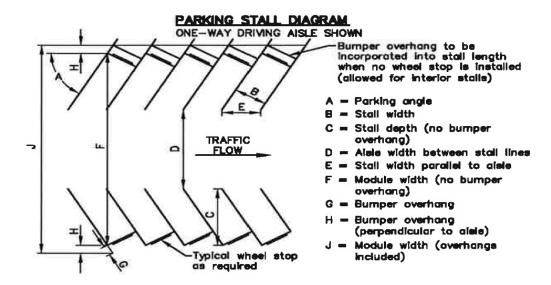


Table 2: Minimum Parking Dimension Requirements One-Way Driving Aisle (Dimensions in Feet)

Table 2: Minimum Parking Dimension Requirements One-Way Driving Aisle (Dimensions in Feet)

А	В	С	D	Е	F	G	Н	J
45°	8.0	16.5	13.0	11.3	46.0	3.0	2.5	51.0
	9.0	18.5	12.0	12.7	49.0	3.0	2.5	54.0
60°	8.0	17.0	18.0	9.2	52.0	3.0	2.5	57.0
	9.0	19.5	16.0	10.4	55.0	3.0	2.5	60.0
75°	8.0	16.5	26.0	8.3	59.0	3.0	3.0	65.0
	9.0	19.0	23.0	9.3	61.0	3.0	3.0	67.0
90°	8.0	18.0	26.0	8.0	56.0	3.0	3.0	62.0
	9.0	20.0	24.0	9.0	58.0	3.0	3.0	64.0



Table 3: Two-Way Driving Aisle (Dimensions in Feet)

А	В	С	D	Е	F	G	Н	J
45°	8.0	16.5	24.0	11.3	57.0	3.0	2.5	62.0
	9.0	18.5	24.0	12.7	61.0	3.0	2.5	66.0
60°	8.0	17.0	24.0	9.2	58.0	3.0	2.5	63.0
	9.0	19.5	24.0	10.4	63.0	3.0	2.5	68.0
75°	8.0	16.5	26.0	8.3	59.0	3.0	3.0	65.0
	9.0	19.0	24.0	9.3	62.0	3.0	3.0	68.0
90°	8.0	18.0	26.0	8.0	56.0	3.0	3.0	62.0
	9.0	20.0	24.0	9.0	58.0	3.0	3.0	64.0

3. Wheel Stops

a. Parking spaces along the boundaries of a parking lot or adjacent to interior landscaped areas or sidewalks shall be provided with a wheel stop



at least four (4) inches high, located three (3) feet back from the front of the parking stall as shown in the above diagram.

b. Wheel stops adjacent to landscaping, bio-swales or water quality facilities shall be designed to allow storm water runoff.

c. The paved portion of the parking stall length may be reduced by three (3) feet if replaced with three (3) feet of low lying landscape or hardscape in lieu of a wheel stop; however, a curb is still required. In other words, the traditional three-foot vehicle overhang from a wheel stop may be low-lying landscaping rather than an impervious surface.

4. Service Drives

Service drives shall be clearly and permanently marked and defined through use of rails, fences, walls, or other barriers or markers, and shall have minimum vision clearance area formed by the intersection of the driveway center line, the street right-of-way line, and a straight line joining said lines through points fifteen (15) feet from their intersection.

5. Credit for On-Street Parking

- a. On-Street Parking Credit. The amount of off-street parking required shall be reduced by one (1) off-street parking space for every on-street parking space adjacent to the development. On-street parking shall follow the established configuration of existing on-street parking, except that angled parking may be allowed for some streets, where permitted by City standards.
- b. The following constitutes an on-street parking space:
 - (1) Parallel parking, each twenty-four (24) feet of uninterrupted curb;
 - (2) Forty-five (45)/sixty (60) degree diagonal, each with ten (10) feet of curb;
 - (3) Ninety (90) degree (perpendicular) parking, each with eight (8) feet of curb:
 - (4) Curb space must be connected to the lot which contains the use;
 - (5) Parking spaces that would not obstruct a required clear vision area, nor any other parking that violates any law or street standard; and;
 - (6) On-street parking spaces credited for a specific use may not be used exclusively by that use, but shall be available for general public use at all times. No signs or actions limiting general public use of on-street spaces is permitted.
- 6. Reduction in Required Parking Spaces
 Developments utilizing Engineered storm water bio-swales or those adjacent to



environmentally constrained or sensitive areas may reduce the amount of required parking spaces by ten (10) percent when twenty-five (25) through forty-nine (49) parking spaces are required, fifteen (15) percent when fifty (50) and seventy-four (74) parking spaces are required and twenty (20) percent when more than seventyfive (75) parking spaces are required, provided the area that would have been used for parking is maintained as a habitat area or is generally adjacent to an environmentally sensitive or constrained area.

7. Parking Location and Shared Parking Owners of off-street parking facilities may post a sign indicating that all parking on the site is available only for residents, customers and/or employees, as applicable.

RESPONSE: Acknowledge requirements. The total parking provided meets minimum requirements, provided 9 off-street parking stalls adequate to accommodate both the employees of the company and any potential visitors please see A0.1 for use diagram and parking calculations.

C. Bicycle Parking Facilities

1. General Provisions

a. Applicability. Bicycle parking spaces shall be provided for new development, changes of use, and major renovations, defined as construction valued at twenty-five (25) percent or more of the assessed value of the existing structure.

b. Types of Spaces. Bicycle parking facilities shall be provided in terms of short-term bicycle parking and long-term bicycle parking. Short-term bicycle parking is intended to encourage customers and other visitors to use bicycles by providing a convenient and readily accessible place to park bicycles. Long-term bicycle parking provides employees, students, residents, commuters, and others who generally stay at a site for at least several hours a weather-protected place to park bicycles.

- c. Minimum Number of Spaces. The required total minimum number of bicycle parking spaces for each use category is shown in Table 4, Minimum Required Bicycle Parking Spaces.
- d. Minimum Number of Long-term Spaces. If a development is required to provide eight (8) or more required bicycle parking spaces in Table 4, at least twenty-five (25) percent shall be provided as long-term bicycle with a minimum of one (1) long-term bicycle parking space.
- e. Multiple Uses. When there are two or more primary uses on a site, the required bicycle parking for the site is the sum of the required bicycle parking for the individual primary uses.

2. Location and Design.



a. General Provisions

- (1) Each space must be at least two (2) feet by six (6) feet in area, be accessible without moving another bicycle, and provide enough space between the rack and any obstructions to use the space properly.
- (2) There must be an aisle at least five (5) feet wide behind all required bicycle parking to allow room for bicycle maneuvering. Where the bicycle parking is adjacent to a sidewalk, the maneuvering area may extend into the right-of-way.
- (3) Lighting. Bicycle parking shall be at least as well lit as vehicle parking for security.
- (4) Reserved Areas. Areas set aside for bicycle parking shall be clearly marked and reserved for bicycle parking only.
- (5) Bicycle parking in the Old Town Overlay District can be located on the sidewalk within the right-of-way. A standard inverted "U shaped" or staple design is appropriate. Alternative, creative designs are strongly encouraged.
- (6) Hazards. Bicycle parking shall not impede or create a hazard to pedestrians. Parking areas shall be located so as to not conflict with vision clearance standards.

b. Short-term Bicycle Parking

- (1) Provide lockers or racks that meet the standards of this section.
- (2) Locate inside or outside the building within thirty (30) feet of the main entrance to the building or at least as close as the nearest vehicle parking space, whichever is closer.
- c. Long-term Bicycle Parking
- (1) Provide racks, storage rooms, or lockers in areas that are secure or monitored (e.g., visible to employees or customers or monitored by security guards).
- (2) Locate the outside bicycle parking spaces within one hundred (100) feet of the entrance that will be accessed by the intended users.
- (3) All of the spaces shall be covered.
- d. Covered Parking (Weather Protection)
- (1) When required, covered bicycle parking shall be provided in one (1) of the following ways: inside buildings, under roof overhangs or awnings, in bicycle lockers, or within or under other structures.
- (2) Where required covered bicycle parking is not within a building or locker, the cover must be permanent and designed to protect the bicycle from rainfall and provide seven-foot minimum overhead clearance.
- (3) Where required bicycle parking is provided in lockers, the lockers shall be securely anchored.

Use: Warehouse

- INDUSTRIAL = 2 or 1 per 40 spaces (2-Short Term/2=Long Term) provided. See A0.1



16.94.030 - Off-Street Loading Standards A. Minimum Standards

- 1. A driveway designed for continuous forward flow of passenger vehicles for the purpose of loading and unloading passengers shall be located on the site of any school, or other public meeting place, which is designed to accommodate more than twenty five (25) persons at one time.
- 2. The minimum loading area for non-residential uses shall not be less than ten (10) feet in width by twenty-five (25) feet in length and shall have an unobstructed height of fourteen (14) feet.
- 3. Multiple uses on the same parcel or adjacent parcels may utilize the same loading area if it is shown in the development application that the uses will not have substantially overlapping delivery times.
- 4. The following additional minimum loading space is required for buildings in excess of twenty thousand (20,000) square feet of gross floor area:
 - a. Twenty thousand (20,000) to fifty (50,000) sq. ft. five hundred (500) sq. ft.
 - b. Fifty (50,000) sq. ft. or more seven hundred fifty (750) sq. ft.

B. Separation of Areas

Any area to be used for the maneuvering of delivery vehicles and the unloading or loading of materials shall be separated from designated offstreet parking areas and designed to prevent the encroachment of delivery vehicles onto off-street parking areas or public streets. Off-street parking areas used to fulfill the requirements of this Chapter shall not be used for loading and unloading operations.

C. Exceptions and Adjustments.

The review authority, through Site Plan Review, may approve loading areas within a street right-of-way in the Old Town Overlay District when all of the following conditions are met:

- 1. Short in duration (i.e., less than one (1) hour);
- 2. Infrequent (less than three (3) operations occur daily between 5:00 a.m. and 12:00 a.m. or all operations occur between 12:00 a.m. and 5:00 a.m. at a location that is not adjacent to a residential zone);
- 3. Does not unreasonably obstruct traffic; [or] Does not obstruct traffic during peak traffic hours:
- 4. Does not obstruct a primary emergency response route; and
- 5. Is acceptable to the applicable roadway authority.

Response: Acknowledge requirements for Off-Street Loading. We have provided a designated area for loading/unloading.

16.96.010 - On-Site Pedestrian and Bicycle Circulation

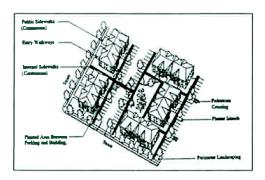
A. Purpose

On-site facilities shall be provided that accommodate safe and convenient



pedestrian access within new subdivisions, multi-family developments, planned unit developments, shopping centers and commercial districts, and connecting to adjacent residential areas and neighborhood activity centers within one-half mile of the development. Neighborhood activity centers include but are not limited to existing or planned schools, parks, shopping areas, transit stops or employment centers. All new development, (except single-family detached housing), shall provide a continuous system of private pathways/sidewalks.

On-Site Circulation System (Multi-Family Example)



B. Maintenance

No building permit or other City permit shall be issued until plans for ingress, egress and circulation have been approved by the City. Any change increasing any ingress, egress or circulation requirements, shall be a violation of this Code unless additional facilities are provided in accordance with this Chapter.

C. Joint Access

Two (2) or more uses, structures, or parcels of land may utilize the same ingress and egress when the combined ingress and egress of all uses, structures, or parcels of land satisfied the other requirements of this Code, provided that satisfactory legal evidence is presented to the City in the form of deeds, easements, leases, or contracts to clearly establish the joint use.

D. Connection to Streets

- 1. Except for joint access per this Section, all ingress and egress to a use or parcel shall connect directly to a public street, excepting alleyways with paved sidewalk.
- 2. Required private sidewalks shall extend from the ground floor entrances or the ground floor landing of stairs, ramps or elevators to the public sidewalk or curb of the public street which provides required ingress and egress.

E. Maintenance of Required Improvements

Required ingress, egress and circulation improvements shall be kept clean and in good repair.

F. Access to Major Roadways

Points of ingress or egress to and from Highway 99W and arterials designated on the Transportation Plan Map, attached as Appendix C of the Community Development Plan, Part II, shall be limited as follows:

- 1. Single and two-family uses and manufactured homes on individual residential lots developed after the effective date of this Code shall not be granted permanent driveway ingress or egress from Highway 99W and arterial roadways. If alternative public access is not available at the time of development, provisions shall be made for temporary access which shall be discontinued upon the availability of alternative access.
- 2. Other private ingress or egress from Highway 99W and arterial roadways shall be minimized. Where alternatives to Highway 99W or arterials exist or are proposed, any new or altered uses developed after the effective date of this Code shall be required to use the alternative ingress and egress.
- 3. All site plans for new development submitted to the City for approval after the effective date of this Code shall show ingress and egress from existing or planned local or collector streets, consistent with the Transportation Plan Map and Section VI of the Community Development Plan.

G. Service Drives

Service drives shall be provided pursuant to Section 16.94.030.

RESPONSE: Acknowledge requirements for On-Site Pedestrian and Bicycle Circulation.

16.96.020 Minimum - Residential standards

Minimum standards for private, on-site circulation improvements in residential developments:

RESPONSE: The proposed development is Commercial. This Section does not apply.

16.96.030 - Minimum Non-Residential Standards

Minimum standards for private, on-site circulation improvements in non-residential developments:

A. Driveways

- 1. Commercial: Improved hard surface driveways are required as
- 3. appropriate considering soils, anticipated vehicle usage and other pertinent factors.

B. Sidewalks and Curbs

1. A private pathway/sidewalk system extending throughout the development site shall be required to connect to existing development, to public rights-of-way with or without improvements, to parking and storage areas, and to connect all building entrances to



one another. The system shall also connect to transit facilities within five hundred (500) feet of the site, future phases of development, and whenever possible to parks and open spaces.

- 2. Curbs shall also be required at a standard approved by the Hearing Authority. Private pathways/sidewalks shall be connected to public rights- of-way along driveways but may be allowed other than along driveways if approved by the Hearing Authority.
- 3. Private Pathway/Sidewalk Design. Private pathway surfaces shall be concrete, asphalt, brick/masonry pavers, or other pervious durable surface. Primary pathways connecting front entrances to the right of way shall be at least 6 feet wide and conform to ADA standards. Secondary pathways between buildings and within parking areas shall be a minimum of four (4) feet wide and/or conform to ADA standards. Where the system crosses a parking area, driveway or street, it shall be clearly marked with contrasting paving materials or raised crosswalk (hump). At a minimum all crosswalks shall include painted striping.

4. Exceptions. Private pathways/sidewalks shall not be required where physical or topographic conditions make a connection impracticable, where buildings or other existing development on adjacent lands physically preclude a connection now or in the future considering the potential for redevelopment; or pathways would violate provisions of leases, restrictions or other agreements.

Response: Acknowledge Minimum Non-Residential Standards. Per parking requirements, we have provided one (1) driveway with a minimum width of 24 feet for two-way traffic. Interior pathways/sidewalks have been connected to the public right of way.

16.96.040 - On-Site Vehicle Circulation

A. Maintenance

No building permit or other City permit shall be issued until plans for ingress, egress and circulation have been approved by the City. Any change increasing any ingress, egress or circulation requirements, shall be a violation of this Code unless additional facilities are provided in accordance with this Chapter.

B. Joint Access [See also Chapter 16.108]

Two (2) or more uses, structures, or parcels of land are strongly encouraged to utilize jointly the same ingress and egress when the combined ingress and egress of all uses, structures, or parcels of land satisfy the other requirements of this Code, provided that satisfactory legal evidence is presented to the City in the form of deeds, easements, leases, or contracts to clearly establish the joint use. In some cases, the City may require a joint access to improve safety, vision clearance, site



distance, and comply with access spacing standards for the applicable street classification.

C. Connection to Streets

- 1. Except for joint access per this Section, all ingress and egress to a use or parcel shall connect directly to a public street, excepting alleyways.
- 2. Required private sidewalks shall extend from the ground floor entrances or the ground floor landing of stairs, ramps or elevators to the public sidewalk or curb of the public street which provides required ingress and egress.

D. Maintenance of Required Improvements

Required ingress, egress and circulation improvements shall be kept clean and in good repair.

E. Service Drives

Service drives shall be provided pursuant to Section 16.94.030.

RESPONSE: Acknowledge On-Site Vehicle Circulation requirements.

Chapter 16.98 - ON-SITE STORAGE

16.98.010 - Recreational Vehicles and Equipment

Recreational vehicles and equipment may be stored only within designated and improved off-street parking areas. Such areas shall meet the screening and landscaping requirements of Section 16.92.030.

RESPONSE: Recreational Vehicle and Equipment section is not applicable.

16.98.020 - Solid Waste and Recycling Storage

All uses shall provide solid waste and recycling storage receptacles which are adequately sized to accommodate all solid waste generated on site. All solid waste and recycling storage areas and receptacles shall be located out of public view. Solid waste and recycling receptacles for multi-family, commercial, industrial and institutional uses shall be screened by six (6) foot high sight-obscuring fence or masonry wall and shall be easily accessible to collection vehicles.

RESPONSE: Acknowledge Solid Waste and Recycling Storage requirements and designated area has been provided and shown on site plan.

16.98.030 - Material Storage



A. Generally. Except as otherwise provided herein, external material storage is prohibited, except in commercial and industrial zones where storage areas are approved by the Review Authority as part of a site plan or per Section 16.98.040.

B. Standards. Except as per Section 16.98.040, all service, repair, storage, and merchandise display activities carried on in connection with any commercial or industrial activity, and not conducted within an enclosed building, shall be screened from the view of all adjacent properties and adjacent streets by a six (6) foot to eight (8) foot high, sight obscuring fence subject to chapter 16.58.020. In addition, unless adjacent parcels to the side and rear of the storage area have existing solid evergreen screening or sight-obscuring fencing in place, new evergreen screening no less than three (3) feet in height shall be planted along side and rear property lines. Where other provisions of this Code require evergreen screening, fencing, or a landscaped berm along side and rear property lines, the additional screening stipulated by this Section shall not be required.

C. Hazardous Materials. Storage of hazardous, corrosive, flammable, or explosive materials, if such storage is otherwise permitted by this Code, shall comply with all local fire codes, and Federal and State regulations.

RESPONSE: Acknowledge requirements for Material Storage.

16.98.040 - Outdoor Sales and Merchandise Display

RESPONSE: There will be NO Outdoor Sales or Merchandise Display

Chapter 16.106 - TRANSPORTATION FACILITIES 16.106.010 - Generally A. Creation

Public streets shall be created in accordance with provisions of this Chapter. Except as otherwise provided, all street improvements and rights-of-way shall conform to standards for the City's functional street classification, as shown on the Transportation System Plan (TSP) Map (Figure 17) and other applicable City standards.

RESPONSE: Section is not applicable.

16.106.020 - Required Improvements

A. Generally

Except as otherwise provided, all developments containing or abutting an existing or proposed street, that is either unimproved or substandard in right-of-way width or improvement, shall dedicate the necessary right-of-

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way prior to the issuance of building permits and/or complete acceptable improvements prior to issuance of occupancy permits. Right-of-way requirements are based on functional classification of the street network as established in the Transportation System Plan, Figure 17.

B. Existing Streets

Except as otherwise provided, when a development abuts an existing street, the improvements requirement shall apply to that portion of the street right-of-way located between the centerline of the right-of-way and the property line of the lot proposed for development. In no event shall a required street improvement for an existing street exceed a pavement width of thirty (30) feet.

C. Proposed Streets

- 1. Except as otherwise provided, when a development includes or abuts a proposed street, in no event shall the required street improvement exceed a pavement width of forty (40) feet.
- 2. Half Streets: When a half street is created, a minimum of 22 feet of driving surface shall be provided by the developer.

D. Extent of Improvements

- 1. Streets required pursuant to this Chapter shall be dedicated and improved consistent with Chapter 6 of the Community Development Plan, the TSP and applicable City specifications included in the City of Sherwood Construction Standards. Streets shall include curbs, sidewalks, catch basins, street lights, and street trees. Improvements shall also include any bikeways designated on the Transportation System Plan map. Applicant may be required to dedicate land for required public improvements only when the exaction is directly related to and roughly proportional to the impact of the development, pursuant to Section 16.106.090.
- 2. If the applicant is required to provide street improvements, the City Engineer may accept a future improvements guarantee in lieu of street improvements if one or
 - a. A partial improvement is not feasible due to the inability to achieve proper design standards;
 - b. A partial improvement may create a potential safety hazard to motorists or pedestrians.
 - c. Due to the nature of existing development on adjacent properties it is unlikely that street improvements would be extended in the foreseeable future and the improvement associated with the project under review does not, by itself, provide a significant improvement to street safety or capacity;
 - d. The improvement would be in conflict with an adopted capital improvement plan;
 - e. The improvement is associated with an approved land partition on



property zoned residential use and the proposed land partition does not create any new streets; or

- f. Additional planning work is required to define the appropriate design standards for the street and the application is for a project that would contribute only a minor portion of the anticipated future traffic on the street. e. Transportation Facilities Modifications
 - 1. A modification to a standard contained within this Chapter and Section 16.58.010 and the standard cross sections contained in Chapter 8 of the adopted TSP may be granted in accordance with the procedures and criteria set out in this section.
 - 2. A modification request concerns a deviation from the general design standards for public facilities, in this Chapter, Section 16.58.010, or Chapter 8 in the adopted Transportation System Plan. The standards that may be modified include but are not limited to:
 - a. Reduced sight distances
 - b. Vertical alignment
 - c. Horizontal alignment
 - d. Geometric design (length, width, bulb radius, etc.)
 - e. Design speed
 - f. Crossroads
 - g. Access policy.
 - h. A proposed alternative design which provides a plan superior to these standards.
 - i. Low impact development.
 - i. Access Management Plans
 - 3. Modification Procedure
 - a. A modification shall be proposed with the application for land use approval.
 - b. A modification is processed as a Type II application. Modification requests shall be processed in conjunction with the underlying development proposal.
 - c. When a modification is requested to provide a green street element that is not included in the Engineering Design Manual, the modification process will apply, but the modification fee will be waived.
 - 4. Criteria for Modification: Modifications may be granted when criterion 4a and any one of criteria 4b through 4e are met:
 - a. Consideration shall be given to public safety, durability, cost of maintenance, function, appearance, and other appropriate factors to advance the goals of the adopted Sherwood Comprehensive Plan and Transportation System Plan as a whole. Any modification shall be the minimum necessary to alleviate the hardship or disproportional impact.
 - b. Topography, right-of-way, existing construction or



physical conditions, or other geographic conditions impose an unusual hardship on the applicant, and an equivalent alternative which can accomplish the same design purpose is available.

c. A minor change to a specification or standard is required to address a specific design or construction problem which, if not enacted, will result in an unusual hardship. Self- imposed hardships shall not be used as a reason to grant a modification request.

d. An alternative design is proposed which will provide a plan equal to or superior to the existing street standards. e. Application of the standards of this chapter to the development would be grossly disproportional to the impacts created.

RESPONSE: Acknowledge Required Improvement.

16.106.040 - Design

Standard cross sections showing street design and pavement dimensions are located in the City of Sherwood's Engineering Design Manual.

A. Reserve Strips

Reserve strips or street plugs controlling access or extensions to streets are not allowed unless necessary for the protection of the public welfare or of substantial property rights. All reserve strips shall be dedicated to the appropriate jurisdiction that maintains the street.

B. Alignment

All proposed streets shall, as far as practicable, be in alignment with existing streets. In no case shall the staggering of streets create a "T" intersection or a dangerous condition. Street offsets of less than one hundred (100) feet are not allowed.

C. Future Extension

Where necessary to access or permit future subdivision or development of adjoining land, streets must extend to the boundary of the proposed development and provide the required roadway width. Dead-end streets less than 100' in length must comply with the Engineering Design Manual. A durable sign must be installed at the applicant's expense. The sign is required to notify the public of the intent to construct future streets. The sign must read as follows: "This road will be extended with future



development. For more information contact the City of Sherwood Engineering Department."

D. Intersection Angles

Streets shall intersect as near to ninety (90) degree angles as practical, except where topography requires a lesser angle. In all cases, the applicant shall comply with the Engineering Design Manual.

E. Cul-de-sacs

- 1. All cul-de-sacs shall be used only when exceptional topographical constraints, existing development patterns, or compliance with other standards in this code preclude a street extension and circulation. A cul-de-sac shall not be more than two hundred (200) feet in length and shall not provide access to more than 25 dwelling units.
- 2. All cul-de-sacs shall terminate with a turnaround in accordance with the specifications in the Engineering Design Manual. The radius of circular turnarounds may be larger when they contain a landscaped island, parking bay in their center, Tualatin Valley Fire and Rescue submits a written request, or an industrial use requires a larger turnaround for truck access. 3. Public easements, tracts, or right-of-way shall provide paved pedestrian and bicycle access ways at least 6 feet wide where a cul-de-sac or dead-end street is planned, to connect the ends of the streets together, connect to other streets, or connect to other existing or planned developments in accordance with the standards of this Chapter, the TSP, the Engineering Design Manual or other provisions identified in this Code for the preservation of trees.

F. Grades and Curves

Grades shall be evaluated by the City Engineer and comply with the Engineering Design Manual.

G. Streets Adjacent to Railroads

Streets adjacent to railroads shall run approximately parallel to the railroad and be separated by a distance suitable to allow landscaping and buffering between the street and railroad. Due consideration shall be given at cross streets for the minimum distance required for future grade separations and to provide sufficient depth to allow screening of the railroad

H. Buffering of Major Streets

Where a development abuts Highway 99W, or an existing or proposed principal arterial, arterial or collector street, or neighborhood route, adequate protection for residential properties must be provided, through and local traffic be separated, and traffic conflicts minimized. In addition, visual corridors pursuant to Section 16.142.040, and all applicable access provisions of Chapter 16.96, are to be met. Buffering may be achieved by: parallel access streets, lots of extra depth abutting the major street with frontage along another street, or other treatment suitable to meet the objectives of this Code.

I. Median Islands

As illustrated in the adopted Transportation System Plan, Chapter 8, median



islands may be required on arterial or collector streets for the purpose of controlling access, providing pedestrian safety or for aesthetic purposes J. Transit Facilities

Development along an existing or proposed transit route, as illustrated in Figure 7-2 in the TSP, is required to provide areas and facilities for bus turnouts, shelters, and other transit-related facilities to Tri-Met specifications. Transit facilities shall also meet the following requirements:

- 1. Locate buildings within 20 feet of or provide a pedestrian plaza at major transit stops.
- 2. Provide reasonably direct pedestrian connections between the transit stop and building entrances on the site.
- 3. Provide a transit passenger landing pad accessible to disabled persons (if not already existing to transit agency standards).
- 4. Provide an easement or dedication for a passenger shelter and underground utility connection from the new development to the transit amenity if requested by the public transit provider.
- 5. Provide lighting at a transit stop (if not already existing to transit agency standards).

K. Traffic Controls

- 1. Pursuant to Section 16.106.080, or as otherwise required by the City Engineer, an application must include a traffic impact analysis to determine the number and types of traffic controls necessary to accommodate anticipated traffic flow.
- 2. For all other proposed developments including commercial, industrial or institutional uses with over an estimated 400 ADT, or as otherwise required by the City Engineer, the application must include a traffic impact analysis to determine the number and types of traffic controls necessary to accommodate anticipated traffic flow.
- L. Traffic Calming
- 1. The following roadway design features, including internal circulation drives, may be required by the City in new construction in areas where traffic calming needs are anticipated:
- a. Curb extensions (bulb-outs).
- b. Traffic diverters/circles.
- c. Alternative paving and painting patterns.
- d. Raised crosswalks, speed humps, and pedestrian refuges.
- e. Other methods demonstrated as effective through peer reviewed Engineering studies.

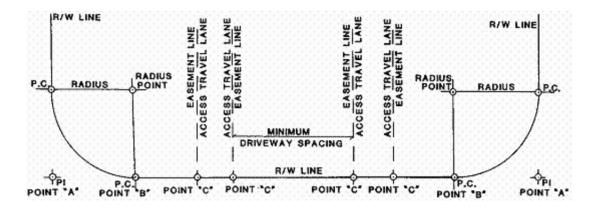


2. With approval of the City Engineer, traffic calming measures such as speed humps and additional stop signs can be applied to mitigate traffic operations and/or safety problems on existing streets. They should not be applied with new street construction unless approved by the City Engineer and Tualatin Valley Fire & Rescue.

M. Vehicular Access Management

All developments shall have legal access to a public road. Access onto public streets shall be permitted upon demonstration of compliance with the provisions of adopted street standards in the Engineering Design Manual.

- 1. Measurement: See the following access diagram where R/W = Right-of-Way; and P.I. = Point-of-Intersection where P.I. shall be located based upon a 90 degree angle of intersection between ultimate right-of-way lines.
 - a. Minimum right-of-way radius at intersections shall conform to City standards.
 - b. All minimum distances stated in the following sections shall be governed by sight distance requirements according to the Engineering Design Manual.
 - c. All minimum distances stated in the following sections shall be measured to the nearest easement line of the access or edge of travel lane of the access on both sides of the road.
 - d. All minimum distances between accesses shall be measured from existing or approved accesses on both sides of the road.
 - e. Minimum spacing between driveways shall be measured from Point "C" to Point "C" as shown below:



2. Roadway Access

No use will be permitted to have direct access to a street or road except as specified below. Access spacing shall be measured from existing or approved accesses on either side of a street or road. The lowest functional classification street available to the legal lot, including alleys within a public easement, shall take precedence for new access points.



a. Local Streets:

Minimum right-of-way radius is fifteen (15) feet. Access will not be permitted within ten (10) feet of Point "B," if no radius exists, access will not be permitted within twenty-five (25) feet of Point "A." Access points near an intersection with a Neighborhood Route, Collector or Arterial shall be located beyond the influence of standing queues of the intersection in accordance with AASHTO standards. This requirement may result in access spacing greater than ten (10) feet.

b. Neighborhood Routes:

Minimum spacing between driveways (Point "C" to Point "C") shall be fifty (50) feet with the exception of single family residential lots in a recorded subdivision. Such lots shall not be subject to a minimum spacing requirement between driveways (Point "C" to Point "C"). In all instances, access points near an intersection with a Neighborhood Route, Collector or Arterial shall be located beyond the influence of standing queues of the intersection in accordance with AASHTO standards. This requirement may result in access spacing greater than fifty (50) feet.

c. Collectors:

All commercial, industrial and institutional uses with one- hundred-fifty (150) feet or more of frontage will be permitted direct access to a Collector. Uses with less than one-hundred-fifty (150) feet of frontage shall not be permitted direct access to Collectors unless no other alternative exists.

Where joint access is available it shall be used, provided that such use is consistent with Section 16.96.040, Joint Access. No use will be permitted direct access to a Collector within one- hundred (100) feet of any present Point "A." Minimum spacing between driveways (Point "C" to Point "C") shall be one-hundred (100) feet. In all instances, access points near an intersection with a Collector or Arterial shall be located beyond the influence of standing queues of the intersection in accordance with AASHTO standards. This requirement may result in access spacing greater than one hundred (100) feet.

d. Arterials and Highway 99W - Points of ingress or egress to and from Highway 99W and arterials designated on the Transportation



Plan Map, attached as Figure 1 of the Community Development Plan, Part II, shall be limited as follows:

- (1) Single and two-family uses and manufactured homes on individual residential lots developed after the effective date of this Code shall not be granted permanent driveway ingress or egress from Highway 99W or arterials. If alternative public access is not available at the time of development, provisions shall be made for temporary access which shall be discontinued upon the availability of alternative access.

 (2) Other private ingress or egress from Highway 99W and arterial roadways shall be minimized. Where alternatives to Highway 99W or arterials exist or are proposed, any new or altered uses developed after the effective date of this Code shall be required to use the alternative ingress and egress. Alternatives include shared or crossover access agreement between properties, consolidated access points, or frontage
- (a) Access to Highway 99W shall be consistent with ODOT standards and policies per OAR 734, Division 51, as follows: Direct access to an arterial or principal arterial will be permitted provided that

comply with the following standards:

or backage roads. When alternatives do not exist, access shall

Point 'A' of such access is more than six hundred (600) feet from any intersection Point 'A' or other access to that arterial (Point 'C').

- (b) The access to Highway 99W will be considered temporary until an alternative access to public right-of-ways is created. When the alternative access is available the temporary access to Highway 99W shall be closed.
 (3) All site plans for new development submitted to the City for approval after the effective date of this Code shall show ingress and egress from existing or planned local, neighborhood route or collector streets, including frontage or backage roads, consistent with the Transportation Plan Map and Chapter 6 of the Community Development Plan.
- 3. Exceptions to Access Criteria for City-Owned Streets
 a. Alternate points of access may be allowed if an access
 management plan which maintains the classified function and
 integrity of the applicable facility is submitted to and approved by
 the City Engineer as the access management plan must be included
 as part of the land use submittal or an application for modification as



described in § 16.106.020 E. (Transportation Facilities Modifications).

b. Access in the Old Town (OT) Overlay Zone Access points in the OT Overlay Zone shown in an adopted plan such as the Transportation System Plan, are not subject to the access spacing standards and do not need a variance. However, the applicant shall submit a partial access management plan for approval by the City Engineer. The approved plan shall be implemented as a condition of development approval.

N. Private Streets

- 1. The construction of a private street serving a single-family residential development is prohibited unless it provides principal access to two or fewer residential lots or parcels (i.e. flag lots).
- 2. Provisions shall be made to assure private responsibility for future access and maintenance through recorded easements. Unless otherwise specifically authorized, a private street shall comply with the same standards as a public street identified in the Community Development Code and the Transportation System Plan.
- 3. A private street shall be distinguished from public streets and reservations or restrictions relating to the private street shall be described in land division documents and deed records.
- 4. A private street shall also be signed differently from public streets and include the words "Private Street".

RESPONSE: Acknowledge requirements of design.

16.106.060 - Sidewalks

A. Required Improvements

- 1. Except as otherwise provided, sidewalks shall be installed on both sides of a public street and in any special pedestrian way within new development.
- 2. For Highway 99W, arterials, or in special industrial districts, the City Manager or designee may approve a development without sidewalks if alternative pedestrian routes are available.
- 3. In the case of approved cul-de-sacs serving less than fifteen (15) dwelling units, sidewalks on one side only may be approved by the City Manager or designee.

B. Design Standards

1. Arterial and Collector Streets

Arterial and collector streets shall have minimum six (6) or eight (8) foot wide sidewalks/multi-use paths, located as required by this Code. Residential areas shall have a minimum of a six (6) foot wide sidewalk and commercial industrial areas shall have a minimum of an eight (8) foot wide sidewalk.



2. Local Streets

Local streets shall have minimum five (5) foot wide sidewalks, located as required by this Code.

3. Handicapped Ramps

Sidewalk handicapped ramps shall be provided at all intersections.

C. Pedestrian and Bicycle Paths

Provide bike and pedestrian connections on public easements or right-ofway when full street connections are not possible, with spacing between connections of no more than 330 feet except where prevented by topography, barriers such as railroads or highways, or environmental constraints such as rivers and streams.

RESPONSE: Sidewalks on SW Olds Place have previously been established. Any off-site improvements will adhere to current standards.

16.106.070 - Bike Lanes

If shown in Figure 13 of the Transportation System Plan, bicycle lanes shall be installed in public rights-of-way, in accordance with City specifications. Bike lanes shall be installed on both sides of designated roads, should be separated from the road by a twelve-inch stripe or other means approved by Engineering Staff, and should be a minimum of five (5) feet wide.

Editor's note- Ord. No. 2014-012, § 3, adopted July 17, 2014, amended the Code by repealing former § 16.106.070 in its entirety, and renumbering former § 16.106.080 as a new § 16.106.070. Former § 16.106.070 pertained to the Hwy. 99W Capacity Allocation Program (CAP), and derived from Ord. No. 2011-011, adopted October 4, 2011.

RESPONSE: Section Not Applicable.

16.106.080 - Traffic Impact Analysis (TIA)

A. Purpose

The purpose of this section is to implement Sections 660-012-0045(2)(b) and -0045(2)(e) of the State Transportation Planning Rule (TPR), which require the City

to adopt performance standards and a process to apply conditions to land use proposals in order to minimize impacts on and protect transportation facilities. This section establishes requirements for when a traffic impact analysis (TIA) must be prepared and submitted; the analysis methods and content involved in a TIA; criteria used to review the TIA; and authority to attach conditions of approval to minimize the impacts of the proposal on transportation facilities.

This section refers to the TSP for performance standards for transportation facilities as well as for projects that may need to be constructed as mitigation measures for a proposal's projected impacts. This section also relies on the City's Engineering Design Manual to provide street design standards and construction specifications for improvements and projects



that may be constructed as part of the proposal and mitigation measures approved for the proposal.

B. Applicability

A traffic impact analysis (TIA) shall be required to be submitted to the City with a land use application at the request of the City Engineer or if the proposal is expected to involve one (1) or more of the following:

- 1. An amendment to the Sherwood Comprehensive Plan or zoning map.
- 2. A new direct property approach road to Highway 99W is proposed.
- 3. The proposed development generates fifty (50) or more PM peak-hour trips on Highway 99W, or one hundred (100) PM peak-hour trips on the local transportation system.
- 4. An increase in use of any adjacent street or direct property approach road to Highway 99W by ten (10) vehicles or more per day that exceed the twenty thousand-pound gross vehicle weight.
- 5. The location of an existing or proposed access driveway does not meet minimum spacing or sight distance requirements, or is located where vehicles entering or leaving the property are restricted, or such vehicles are likely to queue or hesitate at an approach or access connection, thereby creating a safety hazard.
- 6. A change in internal traffic patterns that may cause safety problems, such as back up onto the highway or traffic crashes in the approach area.

C. Requirements

The following are typical requirements that may be modified in coordination with Engineering Staff based on the specific application.

- 1. Pre-application Conference. The applicant shall meet with the City Engineer prior to submitting an application that requires a TIA. This meeting will be coordinated with Washington County and ODOT when an approach road to a County road or Highway 99W serves the property, so that the TIA will meet the requirements of all relevant agencies.
- 2. Preparation. The TIA shall be prepared by an Oregon Registered Professional Engineer qualified to perform traffic Engineering analysis and will be paid for by the applicant.
- 3. Typical Average Daily Trips and Peak Hour Trips. The latest edition of the Trip Generation Manual, published by the Institute of Transportation Engineers (ITE), shall be used to gauge PM peak hour vehicle trips, unless a specific trip generation study that is approved by the City Engineer indicates an alternative trip generation rate is appropriate.
- 4. Intersection-level Analysis. Intersection-level analysis shall occur at every intersection where the analysis shows that fifty (50) or more peak hour vehicle trips can be expected to result from the development.



5. Transportation Planning Rule Compliance. The requirements of OAR 660-012-0060 shall apply to those land use actions that significantly affect the transportation system, as defined by the Transportation Planning Rule.

D. Study Area

The following facilities shall be included in the study area for all TIAs:

- 1. All site-access points and intersections (signalized and unsignalized) adjacent to the proposed development site. If the site fronts an arterial or collector street, the analysis shall address all intersections and driveways along the site frontage and within the access spacing distances extending out from the boundary of the site frontage.
- 2. Roads and streets through and adjacent to the site.
- 3. All intersections needed for signal progression analysis.
- 4. In addition to these requirements, the City Engineer may require analysis of any additional intersections or roadway links that may be adversely affected as a result of the proposed development.

E. Analysis Periods

To adequately assess the impacts of a proposed land use action, the following study periods, or horizon years, should be addressed in the transportation impact analysis where applicable:

- 1. Existing Year.
- 2. Background Conditions in Project Completion Year. The conditions in the year in which the proposed land use action will be completed and occupied, but without the expected traffic from the proposed land use action. This analysis should account for all City-approved developments that are expected to be fully built out in the proposed land use action horizon year, as well as all planned transportation system improvements.
- 3. Full Buildout Conditions in Project Completion Year. The background condition plus traffic from the proposed land use action assuming full buildout and occupancy.
- 4. Phased Years of Completion. If the project involves construction or occupancy in phases, the applicant shall assess the expected roadway and intersection conditions resulting from major development phases. Phased years of analysis will be determined in coordination with City staff.
- 5. Twenty-Year or TSP Horizon Year. For planned unit developments, comprehensive plan amendments or zoning map amendments, the applicant



shall assess the expected future roadway, intersection, and land use conditions as compared to approved comprehensive planning documents.

F. Approval Criteria

When a TIA is required, a proposal is subject to the following criteria, in addition to all criteria otherwise applicable to the underlying land use proposal:

- 1. The analysis complies with the requirements of 16.106.080.C;
- 2. The analysis demonstrates that adequate transportation facilities exist to serve the proposed development or identifies mitigation measures that resolve identified traffic safety problems in a manner that is satisfactory to the City Engineer and, when County or State highway facilities are affected, to Washington County and ODOT;
- 3. For affected non-highway facilities, the TIA demonstrates that mobility and other applicable performance standards established in the adopted City TSP have been met; and
- 4. Proposed public improvements are designed and will be constructed to the street standards specified in Section 16.106.010 and the Engineering Design Manual, and to the access standards in Section 16.106.040.
- 5. Proposed public improvements and mitigation measures will provide safe connections across adjacent right-of-way (e.g., protected crossings) when pedestrian or bicycle facilities are present or planned on the far side of the right-of-way.

G. Conditions of Approval

The City may deny, approve, or approve a development proposal with conditions needed to meet operations and safety standards and provide the necessary right- ofway and improvements to ensure consistency with the future planned transportation system. Improvements required as a condition of development approval, when not voluntarily provided by the applicant, shall be roughly proportional to the impact of the development on transportation facilities, pursuant to Section 16.106.090. Findings in the development approval shall indicate how the required improvements are directly related to and are roughly proportional to the impact of development.

RESPONSE: See provided 'Trip Generation Summary'.

16.106.090 - Rough Proportionality

A. Purpose

The purpose of this section is to ensure that required transportation facility improvements are roughly proportional to the potential impacts of the proposed development. The rough proportionality requirements of this section apply to both frontage and non-frontage improvements. A proportionality analysis will be conducted by the City Engineer for any proposed development that triggers transportation facility improvements pursuant to this chapter. The City Engineer will take into consideration any benefits that are estimated to accrue to the development property as a result of any required transportation facility improvements. A proportionality



determination can be appealed pursuant to Chapter 16.76. The following general provisions apply whenever a proportionality analysis is conducted. B. Mitigation of impacts due to increased demand for transportation facilities associated with the proposed development shall be provided in rough proportion to the transportation impacts of the proposed development. When applicable, anticipated impacts will be determined by the TIA in accordance with Section 16.106.080. When no TIA is required, anticipated impacts will be determined by the City Engineer. C. The following shall be considered when determining proportional

- improvements:
- 1. Condition and capacity of existing facilities within the impact area in relation to City standards. The impact area is generally defined as the area within a one- half-mile radius of the proposed development. If a TIA is required, the impact area is the TIA study area.
- 2. Existing vehicle, bicycle, pedestrian, and transit use within the impact
- 3. The effect of increased demand on transportation facilities and other approved, but not yet constructed, development projects within the impact area that is associated with the proposed development.
- 4. Applicable TSP goals, policies, and plans.
- 5. Whether any route affected by increased transportation demand within the impact area is listed in any City program including school trip safety; neighborhood traffic management; capital improvement; system development improvement, or others.
- 6. Accident history within the impact area.
- 7. Potential increased safety risks to transportation facility users, including pedestrians and cyclists.
- 8. Potential benefit the development property will receive as a result of the construction of any required transportation facility improvements.
- 9. Other considerations as may be identified in the review process pursuant to Chapter 16.72.

RESPONSE: Acknowledge.

Chapter 16.112 - WATER SUPPLY*

16.112.010 - Required Improvements

Water lines and fire hydrants conforming to City and Fire District standards shall be installed to serve all building sites in a proposed development. All waterlines shall be connected to existing water mains or shall construct new mains appropriately sized and located in accordance with the Water System Master Plan.

RESPONSE: Water and fire services will be provided to the building to meet the code requirements with the correct backflows and meter. Fire



hydrant calculations will also be completed to determine the requirements of any additional public or private fire hydrants.

16.112.020 - Design Standards

A. Capacity

Water lines providing potable water supply shall be sized, constructed, located and installed at standards consistent with this Code, the Water System Master Plan, the City's Design and Construction Manual, and with other applicable City standards and specifications, in order to adequately serve the proposed development and allow for future extensions.

B. Fire Protection

All new development shall comply with the fire protection requirements of Chapter 16.116, the applicable portions of Chapter 7 of the Community Development Plan, and the Fire District.

C. Over-Sizing

- 1. When water mains will, without further construction, directly serve property outside a proposed development, gradual reimbursement may be used to equitably distribute the cost of that over-sized system.
- 2. Reimbursement shall be in an amount estimated by the City to be the proportionate share of the cost of each connection made to the water mains by property owners outside the development, for a period of ten (10) years from the time of installation of the mains. The boundary of the reimbursement area and the

method of determining proportionate shares shall be determined by the City. Reimbursement shall only be made as additional connections are made and shall be collected as a surcharge in addition to normal connection charges.

3. When over-sizing is required in accordance with the Water System Master Plan, it shall be installed per the Water System Master Plan. Compensation for over-sizing may be provided through direct reimbursement, from the City, after mainlines have been accepted. Reimbursement of this nature would be utilized when the cost of over-sizing is for system wide improvements.

RESPONSE: Water and fire services will be provided to the building to meet the code requirements. Coordination with the building plumber is ongoing to verify the correct sizing and capacities of the proposed systems.

16.112.030 - Service Availability

Approval of construction plans for new water facilities pursuant to Chapter 16.106, and the issuance of building permits for new development to be served by existing water systems shall include certification by the City that existing or proposed water systems are adequate to serve the development.

RESPONSE: Water and fire services will be installed to meet code without the requirement of any public main extensions or new mains.

Chapter 16.114 - STORM WATER*
16.114.010 - Required Improvements



Storm water facilities, including appropriate source control and conveyance facilities, shall be installed in new developments and shall connect to the existing downstream drainage systems consistent with the Comprehensive Plan and the requirements of the Clean Water Services water quality regulations contained in their Design and Construction Standards R&O 04-9, or its replacement.

(Note: Section 16.114.015, Street Systems Improvement Fees (SIF) was repealed by Ordinance 91-922 § 19) to be removed from the SZCDC and permanently located in the Municipal Code).

16.114.020 - Design Standards

A. Capacity

Storm water drainage systems shall be sized, constructed, located, and installed at standards consistent with this Code, the Storm Drainage Master Plan Map, attached as Exhibit E, Chapter 7 of the Community Development Plan, other applicable City standards, the Clean Water Services Design and Construction standards R&O 04-9 or its replacement, and hydrologic data and improvement plans submitted by the developer.

B. On-Site Source Control

Storm water detention and groundwater recharge improvements, including but not limited to such facilities as dry wells, detention ponds, and roof top ponds shall be constructed according to Clean Water Services Design and Construction Standards.

C. Conveyance System

The size, capacity and location of storm water sewers and other storm water conveyance improvements shall be adequate to serve the development and accommodate upstream and downstream flow. If an upstream area discharges through the property proposed for development, the drainage system shall provide capacity to the receive storm water discharge from the upstream area. If downstream drainage systems are not sufficient to receive an increase in storm water caused by new development, provisions shall be made by the developer to increase the downstream capacity or to provide detention such that the new development will not increase the storm water caused by the new development.

RESPONSE: Mechanical treatment will be used along with detention piping to meet the storm management requirements. The onsite system will be used to achieve the treatment and flow control requirements. The conveyance system will be sized to handle up to the 25 yr storm. A down stream analysis is not required as the proposed storm system will limit flows to predevelopment rates before leaving the site.



16.114.030 - Service Availability

Approval of construction plans for new storm water drainage facilities pursuant to Chapter 16.106, and the issuance of building permits for new development to be served by existing storm water drainage systems shall include certification by the City that existing or proposed drainage facilities are adequate to serve the development.

RESPONSE: Storm management will be installed to meet code without the requirement of any public main extensions or new mains.

Chapter 16.116 - FIRE PROTECTION*

16.116.010 - Required Improvements

When land is developed so that any commercial or industrial structure is further than two hundred and fifty (250) feet or any residential structure is further than five hundred (500) feet from an adequate water supply for fire protection, as determined by the Fire District, the developer shall provide fire protection facilities necessary to provide adequate water supply and fire safety.

RESPONSE: Water and fire services will be provided to the building to meet the code requirements with the correct backflows and meter. Fire hydrant calculations will also be completed to determine the requirements of any additional public or private fire hydrants.

16.116.020 - Standards

A. Capacity

All fire protection facilities shall be approved by and meet the specifications of the Fire District, and shall be sized, constructed, located, and installed consistent with this Code, Chapter 7 of the Community Development Plan, and other applicable City standards, in order to adequately protect life and property in the proposed development.

B. Fire Flow

Standards published by the Insurance Services Office, entitled "Guide for Determination of Required Fire Flows" shall determine the capacity of facilities required to furnish an adequate fire flow. Fire protection facilities shall be adequate to convey quantities of water, as determined by ISO standards, to any outlet in the system, at no less than twenty (20) pounds per square inch residual pressure. Water supply for fire protection purposes shall be restricted to that available from the City water system. The location of hydrants shall be taken into account in determining whether an adequate water supply exists.

C. Access to Facilities

Whenever any hydrant or other appurtenance for use by the Fire District is required by this Chapter, adequate ingress and egress shall be provided. Access shall be in the form of an improved, permanently maintained roadway or open paved area, or any combination thereof, designed, constructed, and at all times maintained, to be clear and unobstructed. Widths, height clearances, ingress and egress shall be adequate for District firefighting equipment. The Fire District, may further prohibit vehicular



parking along private accessways in order to keep them clear and unobstructed, and cause notice to that effect to be posted.

D. Hydrants

Hydrants located along private, accessways shall either have curbs painted yellow or otherwise marked prohibiting parking for a distance of at least fifteen (15) feet in either direction, or where curbs do not exist, markings shall be painted on the pavement, or signs erected, or both, given notice that parking is prohibited for at least fifteen (15) feet in either direction.

RESPONSE: Water and fire services will be provided to the building to meet the code requirements. Coordination with the building plumber is ongoing to verify the correct sizing and capacities of the proposed systems. Fire hydrant calculations will also be completed to determine the requirements of any additional public or private fire hydrants.

16.116.030 - Miscellaneous Requirements

A. Timing of Installation

When fire protection facilities are required, such facilities shall be installed and made serviceable prior to or at the time any combustible construction begins on the land unless, in the opinion of the Fire District, the nature or circumstances of said construction makes immediate installation impractical.

B. Maintenance of Facilities

All on-site fire protection facilities, shall be maintained in good working order. The Fire District may conduct periodic tests and inspection of fire protection and may order the necessary repairs or changes be made within ten (10) days.

C. Modification of Facilities

On-site fire protection facilities, may be altered or repaired with the consent of the Fire District; provided that such alteration or repairs shall be carried out in conformity with the provisions of this Chapter.

RESPONSE: Miscellaneous fire requirements will be managed by the site contractor and owner to meet the jurisdictional requirements. Any changes to the system after design approval will be coordinated and reviewed by the correct parties before any modifications are completed.



Chapter 16.142 - PARKS, TREES AND OPEN SPACES[57]

16.142.010 - Purpose

This Chapter is intended to assure the provision of a system of public and private recreation and open space areas and facilities consistent with this Code and applicable portions of Chapter 5 of the Community Development Plan Part 2. The standards of this section do not supersede the open space requirements of a Planned Unit Development, found in Chapter 16.40 -Planned Unit Development (PUD).

16.142.020 - Multi-Family Developments

A. Standards

Except as otherwise provided, recreation and open space areas shall be provided in new multi-family residential developments to the following standards (townhome development requirements for open space dedication can be found in Chapter 16.44.B.8- Townhome Standards):

1. Open Space

A minimum of twenty percent (20%) of the site area shall be retained in common open space. Required yard parking or maneuvering areas may not be substituted for open space.

2. Recreation Facilities

A minimum of fifty percent (50%) of the required common open space shall be suitable for active recreational use. Recreational spaces shall be planted in grass or otherwise suitably improved. A minimum area of eight-hundred (800) square feet and a minimum width of fifteen (15) feet shall be provided.

3. Minimum Standards

Common open space and recreation areas and facilities shall be clearly shown on site development plans and shall be physically situated so as to be readily accessible to and usable by all residents of the development.

4. Terms of Conveyance

Rights and responsibilities attached to common open space and recreation areas and facilities shall be clearly specified in a legally binding document which leases or conveys title, including beneficial ownership to a home association, or other legal entity. The terms of such lease or other instrument of conveyance must include provisions suitable to the City for guaranteeing the continued use of such land and facilities for its intended purpose; continuity of property maintenance; and, when appropriate, the



availability of funds required for such maintenance and adequate insurance

RESPONSE: Section Not Applicable.

16.142.030 - Single-Family or Duplex Residential Subdivisions

protection.

A. A minimum of five percent (5%) of the net buildable site (after exclusion of public right-of-way and environmentally constrained areas) shall be maintained as "open space". Open space must include usable areas such as public parks, swimming and wading pools, grass areas for picnics and recreational play, walking paths, and other like space. The following may not be used to calculate open space:

- 1. Required yards or setbacks.
- 2. Required visual corridors.
- 3. Required sensitive areas and buffers.
- 4. Any area required to meet a standard found elsewhere in this code.
- B. Enhanced streetscapes such as "boulevard treatments" in excess of the minimum public street requirements may count toward a maximum of 10,000 square feet of the open space requirement.
 - 1. Example: if a 52-foot-wide right-of-way [ROW] is required for a 1,000 foot- long street and a 62-foot wide ROW with 5-foot additional plantings/meandering pathway is provided on each side of the street, the additional 10-foot-wide area x 1,000 linear feet, or 10,000 square feet, counts toward the open space requirement.
- C. The open space shall be conveyed in accordance with one of the following methods: 1. By dedication to the City as public open space (if acceptable to the City). Open space proposed for dedication to the City must be acceptable to the City Manager or the Manager's designee with regard to the size, shape, location, improvement, environmental condition, and budgetary and maintenance abilities; 2. By leasing or conveying title (including beneficial ownership) to a corporation, homeowners' association or other legal entity, with the City retaining the development rights to the open space. The terms of such lease or other instrument of conveyance must include provisions (e.g., maintenance, property tax payment, etc.) suitable to the City.
- D. The density of a single-family residential subdivision shall be calculated based on the net buildable site prior to exclusion of open space per this Section.
 - 1. Example: a 40,000 square foot net buildable site would be required to maintain 2,000 square feet (5%) of open space but would calculate density based on 40,000 square feet.
- E. If a proposed residential subdivision contains or is adjacent to a site identified as "parks" on the Acquisition Map of the Parks Master Plan (2006) or has been identified for acquisition by the Sherwood Parks and Recreation Board, establishment of open space shall occur in the designated areas if the subdivision contains the park site, or immediately adjacent to the parks site if the subdivision is adjacent to it.
- F. If the proposed residential subdivision does not contain or is not adjacent to a site identified on the Parks Master Plan map or otherwise identified for acquisition by the Parks and Recreation Board, the applicant may elect to convey off-site



park/open space.

G. This standard does not apply to a residential partition provided that a development may not use phasing or series partitions to avoid the minimum open space requirement. A partition of land that was part of an approved partition within the previous five (5) years shall be required to provide the minimum five percent (5%) open space in accordance with subsection (A) above.

H. The value of the open space conveyed under Subsection (A) above may be eligible for Parks System Development Charges (SDCs) credits based on the methodology identified in the most current Parks and Recreation System Development Charges Methodology Report.

RESPONSE: Section Not Applicable.

16.142.040 - Visual Corridors

A. Corridors Required

New developments located outside of the Old Town Overlay with frontage on Highway 99W, or arterial or collector streets designated on Figure 8-1 of the Transportation System Plan shall be required to establish a landscaped visual corridor according to the following standards:

In residential developments where fences are typically desired adjoining the above described major street the corridor may be placed in the road right-of-way between the property line and the sidewalk. In all other developments, the visual corridor shall be on private property adjacent to the right-of-way.

B. Landscape Materials

The required visual corridor areas shall be planted as specified by the review authority to provide a continuous visual and/or acoustical buffer between major streets and developed uses. Except as provided for above, fences and walls shall not be substituted for landscaping within the visual corridor. Uniformly planted, drought resistant street trees and ground cover, as specified in Section 16.142.060, shall be planted in the corridor by the developer. The improvements shall be included in the compliance agreement. In no case shall trees be removed from the required visual corridor.

C. Establishment and Maintenance

Designated visual corridors shall be established as a portion of landscaping requirements pursuant to Chapter 16.92. To assure continuous maintenance of the visual corridors, the review authority may require that the development rights to the corridor areas be dedicated to the City or that restrictive covenants be recorded prior to the issuance of a building permit.

D. Required Yard

Visual corridors may be established in required yards, except that where the required visual corridor width exceeds the required yard width, the visual corridor



requirement shall take precedence. In no case shall buildings be sited within the required visual corridor, with the exception of front porches on townhomes, as permitted in Section 16.44.010(E)(4)(c).

E. Pacific Highway 99W Visual Corridor

- 1. Provide a landscape plan for the highway median paralleling the subject frontage. In order to assure continuity, appropriate plant materials and spacing, the plan shall be coordinated with the City Planning Department and ODOT.
- 2. Provide a visual corridor landscape plan with a variety of trees and shrubs. Fifty percent (50%) of the visual corridor plant materials shall consist of groupings of at least five (5) native evergreen trees a minimum of ten (10) feet in height each, spaced no less than fifty (50) feet apart, if feasible. Deciduous trees shall be a minimum of four (4) inches DBH and twelve (12) feet high, spaced no less than twenty-five (25) feet apart, if feasible.

Editor's note– Ord. No. 2011-009, § 2, adopted July 19, 2011, amended the Code by adding a new § 16.142.030, and renumbering former §§ 16.142.030– 16.142.080 as new §§ 16.142.040–16.142.090.

RESPONSE: Section Not Applicable.

16.142.050 - Park Reservation

Areas designated on the Natural Resources and Recreation Plan Map, in Chapter 5 of the Community Development Plan, which have not been dedicated pursuant to Section 16.142.030 or 16.134.020, may be required to be reserved upon the recommendation of the City Parks Board, for purchase by the City within a period of time not to exceed three (3) years.

(Ord. No. 2011-009, § 2, 7-19-2011; Ord. No. 2010-015, § 2, 10-5-2010; Ord. 2006-021; 91-922, § 3)

Note-See editor's note, § 16.142.040.

RESPONSE: Section Not Applicable.

16.142.060 - Street Trees

A. Installation of Street Trees on New or Redeveloped Property.

Trees are required to be planted to the following specifications along public streets abutting or within any new development or re-development. Planting of such trees shall be a condition of development approval. The City shall be subject to the same standards for any developments involving City-owned property, or when constructing or reconstructing City streets. After installing street trees, the property owner shall be responsible for maintaining the street trees on the owner's property or within the right-of-way adjacent to the owner's property.

1. Location: Trees shall be planted within the planter strip along a newly created or improved streets. In the event that a planter strip is not required or available, the trees shall be planted on private property within the front



yard setback area or within public street right-of-way between front property lines and street curb lines or as required by the City.

- 2. Size: Trees shall have a minimum trunk diameter of two (2) caliper inches, which is measured six inches above the soil line, and a minimum height of six (6) feet when planted.
- 3. Types: Developments shall include a variety of street trees. The trees planted shall be chosen from those listed in 16.142.080 of this Code.
- 4. Required Street Trees and Spacing:
 - a. The minimum spacing is based on the maximum canopy spread identified in the recommended street tree list in section 16.142.080 with the intent of providing a continuous canopy without openings between the trees. For example, if a tree has a canopy of forty (40) feet, the spacing between trees is forty (40) feet. If the tree is not on the list, the mature canopy width must be provided to the planning department by a certified arborist.
 - b. All new developments shall provide adequate tree planting along all public streets. The number and spacing of trees shall be determined based on the type of tree and the spacing standards described in a. above and considering driveways, street light locations and utility connections. Unless exempt per c. below, trees shall not be spaced more than forty (40) feet apart in any development.
 - c. A new development may exceed the forty-foot spacing requirement under section b. above, under the following circumstances:
 - (1) Installing the tree would interfere with existing utility lines and no substitute tree is appropriate for the site; or (2) There is not adequate space in which to plant a street tree due to driveway or street light locations, vision clearance or utility connections, provided the driveways, street light or utilities could not be reasonably located elsewhere so as to accommodate adequate room for street trees; and
 - (3) The street trees are spaced as close as possible given the site limitations in (1) and (2) above.
 - (4) The location of street trees in an ODOT or Washington County right-of-way may require approval, respectively, by ODOT or Washington County and are subject to the relevant state or county standards.
 - (5) For arterial and collector streets, the City may require planted medians in lieu of paved twelve-foot wide center turning lanes, planted with trees to the specifications of this subsection.

B. Removal and Replacement of Street Trees.

The removal of a street tree shall be limited and in most cases, necessitated by the tree. A person may remove a street tree as provided in this section. The person



removing the tree is responsible for all costs of removal and replacement. Street trees less than five (5) inches DBH can be removed by right by the property owner or his or her assigns, provided that they are replaced. A street tree that is removed must be replaced within six (6) months of the removal date.

- 1. Criteria for All Street Tree Removal for trees over five (5) inches DBH. No street tree shall be removed unless it can be found that the tree is:
- a. Dying, becoming severely diseased, or infested or diseased so as to threaten the health of other trees, or
 - b. Obstructing public ways or sight distance so as to cause a safety hazard, or
 - c. Interfering with or damaging public or private utilities, or
 - d. Defined as a nuisance per City nuisance abatement ordinances.
- 2. Street trees between five (5) and ten (10) inches DBH may be removed if any of the criteria in 1. above are met and a tree removal permit is obtained.
 - a. The Tree Removal Permit Process is a Type I land use decision and shall be approved subject to the following criteria:
 - (1) The person requesting removal shall submit a Tree Removal Permit application that identifies the location of the tree, the type of tree to be removed, the proposed replacement and how it qualifies for removal per Section 1. above.
 - (2) The person shall post a sign, provided by the City, adjacent to the tree for ten (10) calendar days prior to removal that provides notice of the removal application and the process to comment on the application.
 - (3) If an objection to the removal is submitted by the City or to the City during the ten (10) calendar day period, an additional evaluation of the tree will be conducted by an arborist to determine whether the tree meets the criteria for street tree removal in Section 1. above. The person requesting the Tree Removal Permit shall be responsible for providing the arborist report and associated costs.
 - (4) Upon completion of the additional evaluation substantiating that the tree warrants removal per Section 1. above or if no objections are received within the ten-day period, the tree removal permit shall be approved.
 - (5) If additional evaluation indicates the tree does not warrant removal, the Tree Removal Permit will be denied.
- 3. Street trees over ten (10) inches DBH may be removed through a Type I review process subject to the following criteria.
 - a. The applicant shall provide a letter from a certified arborist identifying:
 - (1) The tree's condition,



- (2) How it warrants removal using the criteria listed in Section 1. above, and identifying any reasonable actions that could be taken to allow the retention of the tree.
- b. The applicant shall provide a statement that describes whether and how the applicant sought assistance from the City, HOA or neighbors to address any issues or actions that would enable the tree to be retained.
- c. The person shall post a sign, provided by the City, adjacent to the tree for ten (10) calendar days prior to removal that provides notice of the removal application and the process to comment on the application.
- d. Review of the materials and comments from the public confirm that the tree meets the criteria for removal in Section 1. above.
- C. Homeowner's Association Authorization.

The Planning Commission may approve a program for the adoption, administration and enforcement by a homeowners' association (HOA) of regulations for the removal and replacement of street trees within the geographic boundaries of the association.

- 1. An HOA that seeks to adopt and administer a street tree program must submit an application to the City. The application must contain substantially the following information:
 - a. The HOA must be current and active. The HOA should meet at least quarterly and the application should include the minutes from official HOA Board meetings for a period not less than eighteen (18)

months (six (6) quarters) prior to the date of the application. b. The application must include proposed spacing standards for street trees that are substantially similar to the spacing standards set forth in 16.142.060.A above.

- c. The application must include proposed street tree removal and replacement standards that are substantially similar to the standards set forth in 16.142.060.B above.
- d. The application should include a copy of the HOA bylaws as amended to allow the HOA to exercise authority over street tree removal and replacement, or demonstrate that such an amendment is likely within ninety (90) days of a decision to approve the application.
- e. The application should include the signatures of not less than seventy-five (75) percent of the homeowners in the HOA in support of the application.
- 2. An application for approval of a tree removal and replacement program under this section shall be reviewed by the City through the Type IV land use process. In order to approve the program, the City must determine:
 - a. The HOA is current and active.
 - b. The proposed street tree removal and replacement standards are substantially similar to the standards set forth in 16.142.060.B above.

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- c. The proposed street tree spacing standards are substantially similar to the standards set forth in 16.142.060.A above.
- d. The HOA has authority under its bylaws to adopt, administer and enforce the program.
- e. The signatures of not less than seventy-five (75) percent of the homeowners in the HOA in support of the application.
- 3. A decision to approve an application under this section shall include at least the following conditions:
 - a. Beginning on the first January 1 following approval and on January 1 every two (2) years thereafter, the HOA shall make a report to the city planning department that provides a summary and description of action taken by the HOA under the approved program. Failure to timely submit the report that is not cured within sixty (60) days shall result in the immediate termination of the program. b. The HOA shall comply with the requirements of Section 12.20 of the Sherwood Municipal Code.
- 4. The City retains the right to cancel the approved program at any time for failure to substantially comply with the approved standards or otherwise comply with the conditions of approval.
 - a. If an HOA tree removal program is canceled, future tree removals shall be subject to the provisions of section 16.142.060. b. A decision by the City to terminate an approved street tree program shall not affect the validity of any decisions made by the HOA under the approved program that become final prior to the date the program is terminated.
 - c. If the city amends the spacing standards or the removal and replacement standards in this section (SZCDC 16.142.060) the City may require that the HOA amend the corresponding standards in the approved street tree program.
- 5. An approved HOA tree removal and replacement program shall be valid for five (5) years; however the authorization may be extended as approved by the City, through a Type II Land Use Review.
- D. Exemption from Replacing Street Trees.

A street tree that was planted in compliance with the Code in effect on the date planted and no longer required by spacing standards of section A.4. above may be removed without replacement provided:

- 1. Exemption is granted at the time of street tree removal permit or authorized homeowner's association removal per Section 16.142.060.C. above.
- 2. The property owner provides a letter from a certified arborist stating that the tree must be removed due to a reason identified in the tree removal criteria listed in Section 16.142.060.B.1. above, and
- 3. The letter describes why the tree cannot be replaced without causing continued or additional damage to public or private utilities that could not be prevented through reasonable maintenance.
- E. Notwithstanding any other provision in this section, the city manager or the manager's designee may authorize the removal of a street tree in an

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emergency situation without a tree removal permit when the tree poses an immediate threat to life, property or utilities.

A decision to remove a street tree under this section is subject to review only as provided in ORS 34.100.

F. Trees on Private Property Causing Damage.

Any tree, woodland or any other vegetation located on private property, regardless of species or size, that interferes with or damages public streets or utilities, or causes an unwarranted increase in the maintenance costs of same, may be ordered removed or cut by the City Manager or his or her designee. Any order for the removal or cutting of such trees, woodlands or other vegetation, shall be made and reviewed under the applicable City nuisance abatement ordinances.

G. Penalties. The abuse, destruction, defacing, cutting, removal, mutilation or other misuse of any tree planted on public property or along a public street as per this Section, shall be subject to the penalties defined by Section 16.02.040, and other penalties defined by applicable ordinances and statutes, provided that each tree so abused shall be deemed a separate offense.

Note-See editor's note, § 16.142.040.

RESPONSE: No existing street trees are being removed or proposed due to the existing utility easement behind the existing sidewalk.

16.142.070 - Trees on Property Subject to Certain Land Use Applications

A. Generally

The purpose of this Section is to establish processes and standards which will minimize cutting or destruction of trees and woodlands within the City. This Section is intended to help protect the scenic beauty of the City; to retain a livable environment through the beneficial effect of trees on air pollution, heat and glare, sound, water quality, and surface water and erosion control; to encourage the retention and planting of tree species native to the Willamette Valley and Western Oregon; to provide an attractive visual contrast to the urban environment, and to sustain a wide variety and distribution of viable trees and woodlands in the community over time.

B. Applicability

All applications including a Type II - IV land use review, shall be required to preserve trees or woodlands, as defined by this Section to the maximum extent feasible within the context of the proposed land use plan and relative to other codes, policies, and standards of the City Comprehensive Plan.

C. Inventory

1. To assist the City in making its determinations on the retention of trees and woodlands, land use applications including Type II - IV development shall include a tree and woodland inventory and report. The report shall be



prepared by a qualified professional and must contain the following information:

- a. Tree size (in DBH and canopy area)
- b. Tree species
- c. The condition of the tree with notes as applicable explaining the assessment
- d. The location of the tree on the site
- e. The location of the tree relative to the planned improvements
- f. Assessment of whether the tree must be removed to accommodate the development
- g. Recommendations on measures that must be taken to preserve trees during the construction that are not proposed to be removed.
- 2. In addition to the general requirements of this Section, the tree and woodland inventory's mapping and report shall also include, but is not limited to, the specific information outlined in the appropriate land use application materials packet.

- 3. Definitions for the inventory purposes of this Section
 - a. A tree is a living woody plant having a trunk diameter as specified below at Diameter at Breast Height (DBH). Trees planted for commercial agricultural purposes, and/or those subject to farm forest deferral, such as nut and fruit orchards and Christmas tree farms, are excluded from this definition and from regulation under this Section, as are any living woody plants under six (6) inches at DBH. All trees six (6) inches or greater shall be inventoried. b. A woodland is a biological community dominated by trees covering a land area of 20,000 square feet or greater at a density of at least fifty (50) trees per every 20,000 square feet with at least fifty percent (50%) of those trees of any species having a six (6) inches or greater at DBH. Woodlands planted for commercial agricultural purposes and/or subject to farm forest deferral, such as nut and fruit orchards and Christmas tree farms, are excluded from this definition, and from regulation under this Section.
 - c. A large stature tree is over 20 feet tall and wide with a minimum trunk diameter of 30 inches at DBH.

D. Retention requirements

1. Trees may be considered for removal to accommodate the development including buildings, parking, walkways, grading etc., provided the development satisfies of D.2 or D.3, below.

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2. Required Tree Canopy - Residential Developments (Single Family Attached, Single Family Detached and Two - Family) Each net development site shall provide a variety of trees to achieve a minimum total tree canopy of 40 percent. The canopy percentage is based on the expected mature canopy of each tree by using the equation πr 2 to calculate the expected square footage of canopy for each tree. The expected mature canopy is counted for each tree regardless of an overlap of multiple tree canopies.

The canopy requirement can be achieved by retaining existing trees or planting new trees. Required street trees can be used toward the total on site canopy required to meet this standard. The expected mature canopy spread of the new trees will be counted toward the needed canopy cover. A certified arborist or other qualified professional shall provide the estimated tree canopy of the proposed trees to the planning department for review. 3. Required Tree Canopy - Non-Residential and Multi-family Developments Each net development site shall provide a variety of trees to achieve a minimum total tree canopy of 30 percent. The canopy percentage is based on the expected mature canopy of each tree by using the equation πr 2 to calculate the expected square footage of each tree. The expected mature canopy is counted for each tree even if there is an overlap of multiple tree canopies.

The canopy requirement can be achieved by retaining existing trees or planting new trees. Required landscaping trees can be used toward the total on site canopy required to meet this standard. The expected mature canopy spread of the new trees will be counted toward the required canopy cover. A certified arborist or other qualified professional shall provide an estimated tree canopy for all proposed trees to the planning department for review as a part of the land use review process.



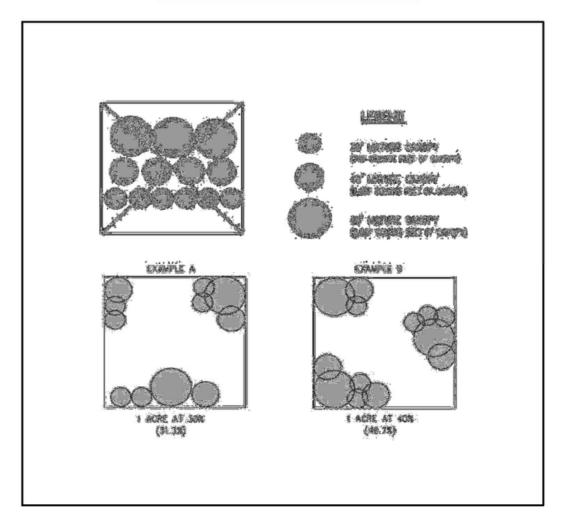
pi occosi			
	Residential (single family & two family developments)	Old Town & Infill developments	Commercial, Industrial, Institutional Public and Multi-family
Canopy Requirement	40%	N/A	30%
Counted Toward the Canopy Requirement			
Street trees included in canopy requirement	Yes	N/A	No
Landscaping requirements included in canopy requirement	N/A	N/A	Yes
Existing trees onsite	Yes ×2	N/A	Yes x2
Planting new trees onsite	Yes	N/A	Yes

Mature Canopy in Square Feet Equation πr^2 or (3.14159*radius 2) (This is the calculation to measure the square footage of a circle.

The Mature Canopy is given in diameter. In gardening and horticulture reference books, therefore to get the radius you must divide the diameter in half.

Canopy Calculation Example: Pin Oak Mature canopy = 35' $(3.14159* 17.5^2) = 962$ square feet





- 4. The City may determine that, regardless of D.1 through D.3, that certain trees or woodlands may be required to be retained. The basis for such a decision shall include; specific findings that retention of said trees or woodlands furthers the purposes and goals of this Section, is feasible and practical both within the context of the proposed land use plan and relative to other policies and standards of the City Comprehensive Plan, and are:
 - a. Within a Significant Natural Area, 100-year floodplain, City greenway, jurisdictional wetland or other existing or future public park or natural area designated by the City Comprehensive Plan, or b. A landscape or natural feature as per applicable policies of the City Comprehensive Plan, or are necessary to keep other identified trees or woodlands on or near the site from being damaged or destroyed due to windfall, erosion, disease or other natural processes, or c. Necessary for soil stability and the control of erosion, for managing and preserving surface or groundwater quantities or quality, or for the maintenance of a natural drainageway, as per Clean Water



Services stormwater management plans and standards of the City Comprehensive Plan, or

- d. Necessary in required buffers between otherwise incompatible land uses, or from natural areas, wetlands and greenways, or
- e. Otherwise merit retention because of unusual size, size of the tree stand, historic association or species type, habitat or wildlife preservation considerations, or some combination thereof, as determined by the City.
- 5. Tree retention requirements for properties located within the Old Town Overlay or projects subject to the infill standards of Chapter 16.68 are only subject to retention requirements identified in D.4. above.
- 6. The Notice of Decision issued for the land use applications subject to this Section shall indicate which trees and woodlands will be retained as per subsection D of this Section, which may be removed or shall be retained as per subsection D of this Section and any limitations or conditions attached thereto.
- 7. All trees, woodlands, and vegetation located on any private property accepted for dedication to the City for public parks and open space, greenways, Significant Natural Areas, wetlands, floodplains, or for storm water management or for other purposes, as a condition of a land use approval, shall be retained outright, irrespective of size, species, condition or other factors. Removal of any such trees, woodlands, and vegetation prior to actual dedication of the property to the City shall be cause for reconsideration of the land use plan approval.

E. Tree Preservation Incentive

Retention of existing native trees on site which are in good health can be used to achieve the required mature canopy requirement of the development. The expected mature canopy can be calculated twice for existing trees. For example, if one existing tree with an expected mature canopy of 10 feet (78.5 square feet) is retained it will count as twice the existing canopy (157 square feet).

F. Additional Preservation Incentives

- 1. General Provisions. To assist in the preservation of trees, the City may apply one or more of the following flexible standards as part of the land use review approval. To the extent that the standards in this section conflict with the standards in other sections of this Title, the standards in this section shall apply except in cases where the City determines there would be an unreasonable risk to public health, safety, or welfare. Flexibility shall be requested by the applicant with justification provided within the tree preservation and protection report as part of the land use review process and is only applicable to trees that are eligible for credit towards the effective tree canopy cover of the site. A separate adjustment application as outlined in Section 16.84.030.A is not required.
- 2. Flexible Development Standards. The following flexible standards are available to applicants in order to preserve trees on a development site. These standards cannot be combined with any other reductions authorized by this code.
 - a. Lot size averaging. To preserve existing trees in the development plan for any Land Division under Division VII, lot size may be averaged to allow lots less than the minimum lot size required in the underlying zone as long as the average lot area is not less than that allowed by the underlying zone. No lot area shall be less than 80 percent of the minimum lot size allowed in the zone;



b. Setbacks. The following setback reductions will be allowed for lots preserving existing trees using the criteria in subsection (1) below. The following reductions shall be limited to the minimum reduction necessary to protect the tree.

- (1) Reductions allowed:
- (a.) Front yard up to a 25 percent reduction of the dimensional standard for a front yard setback required in the base zone. Setback of garages may not be reduced by this provision.
- (b.) Interior setbacks up to a 40 percent reduction of the dimensional standards for an interior side and/or rear yard setback required in the base zone.
- (c.) Perimeter side and rear yard setbacks shall not be reduced through this provision.

c. Approval criteria:

- (1.) A demonstration that the reduction requested is the least required to preserve trees; and
- (2.) The reduction will result in the preservation of tree canopy on the lot with the modified setbacks; and
- (3.) The reduction will not impede adequate emergency access to the site and structure.
- 3. Sidewalks. Location of a public sidewalk may be flexible in order to preserve existing trees or to plant new large stature street trees. This flexibility may be accomplished through a curb-tight sidewalk or a meandering public sidewalk easement recorded over private property and shall be reviewed on a case by case basis in accordance with the provisions of the Engineering Design Manual, Street and Utility Improvement Standards. For preservation, this flexibility shall be the minimum required to achieve the desired effect. For planting, preference shall be given to retaining the planter strip and separation between the curb and sidewalk wherever practicable. If a preserved tree is to be utilized as a street tree, it must meet the criteria found in the Street Tree section, 16.142.060.
- 4. Adjustments to Commercial and Industrial development Standards. Adjustments to Commercial or Industrial Development standards of up to 20 feet additional building height are permitted provided;
 - a. At least 50% of a Significant Tree stand's of canopy within a development site (and not also within the sensitive lands or areas that areas dedicated to the City) is preserved;
 - b. The project arborist or qualified professional certifies the preservation is such that the connectivity and viability of the remaining significant tree stand is maximized;
 - c. Applicable buffering and screening requirements are met;
 - d. Any height adjustments comply with state building codes;
 - e. Significant tree stands are protected through an instrument or action subject to approval by the City Manager or the City manager's designee that demonstrates it will be permanently preserved and managed as such;



- (1.) A conservation easement;
- (2.) An open space tract;
- (3.) A deed restriction; or
- (4.) Through dedication and acceptance by the City.

G. Tree Protection During Development

The applicant shall prepare and submit a final Tree and Woodland Plan prior to issuance of any construction permits, illustrating how identified trees and woodlands will be retained, removed or protected as per the Notice of Decision. Such plan shall specify how trees and woodlands will be protected from damage or destruction by construction activities, including protective fencing, selective pruning and root treatments, excavation techniques, temporary drainage systems, and like methods. At a minimum, trees to be protected shall have the area within the drip line of the tree protected from grading, stockpiling, and all other construction related activity unless specifically reviewed and recommended by a certified arborist or other qualified professional. Any work within the dripline of the tree shall be supervised by the project arborist or other qualified professional onsite during construction.

H. Penalties

Violations of this Section shall be subject to the penalties defined by Section 16.02.040, provided that each designated tree or woodland unlawfully removed or cut shall be deemed a separate offense.

(Ord. No. 2012-003, § 2, 5-1-2012; Ord. No. 2011-009, § 2, 7-19-2011; Ord. 2006-021; Ord. 91-922, § 3)

Note-See editor's note, § 16.142.040.

RESPONSE: 30% tree canopy coverage is proposed. See L1.0 landscape plan included in this submittal.



Thank you,

Darin Bouska

NW Precision Design