

Shoreline Master Program

City of Entiat 2013



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Reader's Guide

Chelan County and its Cities developed and adopted Shoreline Master Programs (SMPs) in 1975 for the purpose of “focusing comprehensive, coordinated planning attention at the critical land-water interface” (page 1). The current SMP (1975 SMP) was developed more than 30 years ago and since then much has changed along Chelan County shorelines. In addition, knowledge of best development and conservation practices has evolved. There have also been changes in State laws and rules.

This Draft SMP has been prepared to meet the requirements of the Shoreline Management Act of 1971 (RCW 90.58), the implementing State rules codified as Chapter 173-26 of the Washington Administrative Code (WAC) “State Master Program Approval/Amendment Procedures and Master Program Guidelines” that were revised in 2003, and other applicable local, state, and federal laws. As was the case in 1975 and today, the SMP is developed locally, but must meet the Shoreline Management Act and implementing State rules, and is subject to approval by the Washington State Department of Ecology (Ecology) before it can be implemented.

The Draft SMP has been prepared under a grant agreement with Ecology. For planning purposes and as part of the grant agreement, the City of Entiat conducted a Vision Workshop in fall 2008 to capture citizen questions, concerns, goals, and aspirations regarding City shorelines. The Vision Workshop results have factored into the development of this Draft SMP.

The contents of this Draft Shoreline Master Program are structured as follows:

- Chapter 1 Authority and Purpose
- Chapter 2 Goals and Objectives
- Chapter 3 Shoreline Jurisdiction and Environment Designations
- Chapter 4 General Policies and Regulations
- Chapter 5 Shoreline Modifications and Uses
- Chapter 6 Nonconforming Uses and Development Standards
- Chapter 7 Shoreline Permits, Procedures and Administration
- Chapter 8 Definitions

To guide the reader, most sections or provisions show the source of the goal, policy, or regulation either in the body of the text or in parentheses, which may include citations to: the Shoreline Management Act (RCW 90.58), State Shoreline Master Program Guidelines (WAC 173-26), State Shoreline Management Permit and Enforcement Procedures (WAC 173-27), current Chelan County Shoreline Master Program

provisions, current City Comprehensive Plan elements, or other example SMPs recently adopted and approved by the State.

When reading the Draft SMP, it is useful to consider the definitions of the following terms that are based on definitions in the State Shoreline Master Program Guidelines (WAC 173-26-020):

- Shall or must: means a mandate; the action must be done.
- Should: means that the particular action is required unless there is a demonstrated, compelling reason, based on policy of the Shoreline Management Act and shoreline master program, against taking the action.
- May: means the action is acceptable, provided it conforms to the provisions of this shoreline master program and the Act.

In general, this Draft SMP uses the word “should” in goals, objectives, and policies, and “shall” in the regulations. Additional definitions are located in Chapter 8.

The Draft SMP has a high level of detail for the following reasons: 1) to allow for more shoreline applications to be approved administratively for an efficient and cost-effective process, 2) to cross-reference applicable state and federal laws to help consolidate requirements and be a resource for property owners and local government staff, and 3) to provide some certainty of interpretation and application, over an extended period of time, that benefits property owners and local government staff.

1 Authority and Purpose

1.1 The Shoreline Management Act

Washington State's citizens voted to approve the Shoreline Management Act of 1971 in November 1972. The findings and intent of the Shoreline Management Act (Act) are codified in RCW 90.58.020 as follows:

The legislature finds that the shorelines of the state are among the most valuable and fragile of its natural resources and that there is great concern throughout the state relating to their utilization, protection, restoration, and preservation. In addition it finds that ever increasing pressures of additional uses are being placed on the shorelines necessitating increased coordination in the management and development of the shorelines of the state. The legislature further finds that much of the shorelines of the state and the uplands adjacent thereto are in private ownership; that unrestricted construction on the privately owned or publicly owned shorelines of the state is not in the best public interest; and therefore, coordinated planning is necessary in order to protect the public interest associated with the shorelines of the state while, at the same time, recognizing and protecting private property rights consistent with the public interest. There is, therefore, a clear and urgent demand for a planned, rational, and concerted effort, jointly performed by federal, state, and local governments, to prevent the inherent harm in an uncoordinated and piecemeal development of the state's shorelines.

It is the policy of the state to provide for the management of the shorelines of the state by planning for and fostering all reasonable and appropriate uses. This policy is designed to insure the development of these shorelines in a manner which, while allowing for limited reduction of rights of the public in the navigable waters, will promote and enhance the public interest. This policy contemplates protecting against adverse effects to the public health, the land and its vegetation and wildlife, and the waters of the state and their aquatic life, while protecting generally public rights of navigation and corollary rights incidental thereto.

The legislature declares that the interest of all of the people shall be paramount in the management of shorelines of statewide significance. The department, in adopting guidelines for shorelines of statewide significance, and local government, in developing master programs for shorelines of statewide significance, shall give preference to uses in the following order of preference which:

- (1) *Recognize and protect the statewide interest over local interest;*
- (2) *Preserve the natural character of the shoreline;*
- (3) *Result in long term over short term benefit;*

- (4) *Protect the resources and ecology of the shoreline;*
- (5) *Increase public access to publicly owned areas of the shorelines;*
- (6) *Increase recreational opportunities for the public in the shoreline;*
- (7) *Provide for any other element as defined in RCW 90.58.100 deemed appropriate or necessary.*

In the implementation of this policy the public's opportunity to enjoy the physical and aesthetic qualities of natural shorelines of the state shall be preserved to the greatest extent feasible consistent with the overall best interest of the state and the people generally. To this end uses shall be preferred which are consistent with control of pollution and prevention of damage to the natural environment, or are unique to or dependent upon use of the state's shoreline. Alterations of the natural condition of the shorelines of the state, in those limited instances when authorized, shall be given priority for single family residences and their appurtenant structures, ports, shoreline recreational uses including but not limited to parks, marinas, piers, and other improvements facilitating public access to shorelines of the state, industrial and commercial developments which are particularly dependent on their location on or use of the shorelines of the state and other development that will provide an opportunity for substantial numbers of the people to enjoy the shorelines of the state. Alterations of the natural condition of the shorelines and shorelands of the state shall be recognized by the department. Shorelines and shorelands of the state shall be appropriately classified and these classifications shall be revised when circumstances warrant regardless of whether the change in circumstances occurs through man-made causes or natural causes. Any areas resulting from alterations of the natural condition of the shorelines and shorelands of the state no longer meeting the definition of "shorelines of the state" shall not be subject to the provisions of chapter 90.58 RCW.

Permitted uses in the shorelines of the state shall be designed and conducted in a manner to minimize, insofar as practical, any resultant damage to the ecology and environment of the shoreline area and any interference with the public's use of the water.

Under the Act, shoreline master programs are created and implemented based on a "cooperative program of shoreline management between local government and the state" (RCW 90.58.050). The roles of local governments and the state are:

"Local government shall have the primary responsibility for initiating the planning required by this chapter and administering the regulatory program consistent with the policy and provisions of this chapter. The department [of Ecology] shall act primarily in a supportive and review capacity with an emphasis on providing assistance to local government and on insuring compliance with the policy and provisions of this chapter."
(RCW 90.58.050)

In recognition of the Act and citizen ideas collected through a local shoreline planning process, the City of Entiat has developed this Shoreline Master Program (SMP), and shall continually implement and administer it through shoreline permits and reviews. The Washington State Department of Ecology (Ecology) reviews and approves local master programs and certain local permit decisions.

1.2 Authority

The Shoreline Management Act of 1971, Chapter 90.58 RCW, is the authority for the enactment and administration of this SMP.

1.3 Applicability

All proposed uses, activities, and development occurring within shoreline jurisdiction must conform to the intent and requirements of Chapter 90.58 RCW and this SMP whether or not a permit or other form of authorization is required. See Chapter 8 for the definition of shoreline jurisdiction (RCW 90.58.030 and WAC 173-26-020). See Chapter 3 for the location of Entiat's shoreline jurisdiction.

The shoreline permit procedures, policies and regulations established in this Shoreline Master Program shall apply city-wide to all nonfederal developments and uses undertaken on federal lands, and on lands subject to nonfederal ownership, lease or easement, even though such lands may fall within the external boundaries of a federal ownership. Federal lands include, but are not limited to, National Forests, National Parks, National Wilderness Areas, and lands owned by the Federal Bureau of Land Management (BLM) (WAC 173-27-060).

As recognized by RCW 90.58.350, the provisions of this SMP shall not affect treaty rights of Indian Nations or tribes.

1.4 Purpose and Intent

The purposes of this SMP are:

- A. To promote the public health, safety, and general welfare of the community by providing comprehensive policies and effective, reasonable regulations for development, use and protection of city shorelines (WAC 173-26-241(2)(a)(ii));
- B. To further assume and carry out the local government responsibilities established by the Act in RCW 90.58.050 including planning and administering the regulatory program consistent with the policy and provisions of the Act in RCW 90.58.020;
- C. Promote reasonable and appropriate use of the shorelines which will not jeopardize public and private interests (1975 SMP Overall Goal 1);

- D. Protect against adverse effects to the land, its vegetation and wildlife, and the waters and their aquatic life within city shorelines (1975 SMP Overall Goal 2) (WAC 173-26-241(2)(a)(ii));
- E. To encourage public and private uses of the shoreline that contribute to local economic health by expanding access to the resource.
- F. To give preference to those uses that are consistent with the control of pollution and prevention of damage to the natural environment, or are unique to or dependent upon uses of the state's shoreline areas (WAC 173-26-241(2)(a)(i));
- G. Reduce use conflicts by including provisions to prohibit or apply special conditions to those uses which are not consistent with the control of pollution and prevention of damage to the natural environment or are not unique to or dependent upon use of the state's shoreline. In implementing this provision, preference shall be given first to water-dependent uses, then to water-related uses and water-enjoyment uses (WAC 173-26-241(2)(a)(iii));
- H. Assure no net loss of ecological functions associated with the shoreline (WAC 173-26-241(2)(a)(iv));
- I. Protect rights of navigation (1975 SMP Overall Goal 3);
- J. Recognize and protect private property rights while implementing the policies of the Shoreline Management Act (1975 SMP Overall Goal 4);
- K. Maintain or recreate a high quality of environment along city shorelines (1975 SMP Overall Goal 5);
- L. Preserve and protect fragile natural resources and culturally significant features (1975 SMP Overall Goal 6);
- M. Increase public access to publicly owned areas of the shorelines where increased use levels are desirable (1975 SMP Overall Goal 7);
- N. Protect public and private properties from adverse effects of improper development in hazardous shoreline areas (1975 SMP Overall Goal 8); and
- O. Recognize the importance of an informed and responsible public, observing basic rules of good behavior in the use and enjoyment of all shorelines (1975 SMP Overall Goal 9).

1.5 Relationship to Other Codes, Ordinances, and Plans

All applicable federal, state, and local laws shall apply to properties in the shoreline jurisdiction.

Consistent with RCW 36.70A.480, the goals and policies of this SMP approved under chapter 90.58 RCW shall be considered an element of the City of Entiat Comprehensive Plan. All regulatory elements of this SMP, including, but not limited to definitions and use regulations, shall be considered a part of the City of Entiat's development regulations.

In the event provisions of this SMP conflict with provisions of Federal, State, or other local regulations, the provision that is most protective of shoreline resources shall prevail, when consistent with policies set out in the Act (RCW 90.58.900; WAC 173-26-221(6)(b)(ii)).

1.6 Liberal Construction

As provided for in RCW 90.58.900, the Act is exempted from the rule of strict construction; the Act and this SMP shall therefore be liberally construed to give full effect to the purposes, goals, objectives, and policies for which they were enacted (1975 SMP Section 40; RCW 90.58.900).

1.7 Severability

Should any section or provision of this SMP be declared invalid, such decision shall not affect the validity of this SMP as a whole (Common ordinance construction; RCW 90.58.910).

1.8 Effective Date

This SMP was adopted on the 14th day of March, 2013. This SMP's effective date is March 19, 2013.

2 Goals and Objectives

Per WAC 173-26-186(3), all relevant policy goals must be addressed in the planning policies of master programs. This section contains shoreline goals and objectives. Goals express the ultimate aim of the City and citizens along their shorelines. An objective identifies a measurable step that moves toward achieving a long-term goal. Goals and objectives provide a framework upon which the more detailed SMP shoreline use environments, policies, regulations, and administrative procedures are based in subsequent chapters.

WAC 173-26-186(5) states:

The policy goals of the act, implemented by the planning policies of master programs, may not be achievable by development regulation alone. Planning policies should be pursued through the regulation of development of private property only to an extent that is consistent with all relevant constitutional and other legal limitations (where applicable, statutory limitations such as those contained in chapter 82.02 RCW and RCW 43.21C.060) on the regulation of private property. Local government should use a process designed to assure that proposed regulatory or administrative actions do not unconstitutionally infringe upon private property rights. A process established for this purpose, related to the constitutional takings limitation, is set forth in a publication entitled, "State of Washington, Attorney General's Recommended Process for Evaluation of Proposed Regulatory or Administrative Actions to Avoid Unconstitutional Takings of Private Property," first published in February 1992. The attorney general is required to review and update this process on at least an annual basis to maintain consistency with changes in case law by RCW [36.70A.370](#).

2.1 Economic Development Element (RCW 90.58.100(2)(a))

Goal ED-1: Permit those commercial, industrial, recreational, and other developments requiring a shoreline location which may contribute to the economic well-being of the City, yet result in no net loss to the ecological functions and values of the watershed (based on 1975 SMP Goal A).

Objective ED-1: Encourage shoreline development that has a positive effect upon community economic and social activities and which results in no net loss of ecological functions and results in mitigation of adverse impacts to other shoreline resources and values.

Objective ED-2: Promote new water-dependent, water-related, and water-enjoyment economic development (WAC 173-26-241(2)(a)(iii)).

Objective ED-3: Promote environmental education as part of economic development activities.

Objective ED-4: Promote development that maintains the natural beauty viewsheds of the area which support the City through tourism and property value (Entiat Comprehensive Plan).

Objective ED-5: Encourage commercial waterfront developments that will promote adjacent commercial uses (Entiat Comprehensive Plan).

2.2 Public Access Element (RCW 90.58.100(2)(b))

Goal PA-1: Ensure public access to shorelines:

- Is safe, convenient, and diversified (1975 SMP Goal B);
- Makes provisions for public access to publicly owned shoreline jurisdiction areas (WAC 173-26-176(3), WAC 173-26-191(1)(b); based on 90.58.100(2));
- Avoids endangering life or adverse effects on property or fragile natural features (1975 SMP Goal B);
- Minimizes conflicts between the public and private property (1975 SMP Goal B);
- Enables the public to enjoy the physical and aesthetic qualities of natural shorelines of the state which shall be preserved to the greatest extent feasible consistent with the overall best interest of the state and the people generally (WAC 173-26-176(3)(b) from RCW 90.58.020).

Objective PA-1: Increase public access to shorelines by developing and implementing parks, recreation, and trails plans (WAC 173-26-221(4)(c)).

Objective PA-2: Coordinate with Chelan County PUD in renovation of Entiat City Park, to include trail; swimming beach; additional boat launches; and upgrades to existing camping, parking, and restroom facilities.

Objective PA-3: Require public access as part of public shoreline development where appropriate (WAC 173-26-221(4)(d)(ii)).

Objective PA-4: Protect and enhance visual and physical access to shorelines (WAC 173-26-221(4)(d)(iv)).

Objective PA-5: Assure that public access improvements do not result in a net loss of shoreline ecological functions.

2.3 Recreation Element (RCW 90.58.100(2)(c))

Goal REC-1: Promote diverse, convenient, and adequate recreational opportunities along public shorelines for local residents and visitors (1975 SMP Goal D).

Objective REC-1: Encourage cooperation among public agencies, non-profit groups, and private landowners and developers to increase and diversify recreational opportunities (WAC 173-26-241(3)(i)).

Objective REC-2: Ensure shoreline recreation facilities are preserved and enlarged as necessary to serve projected City growth in accordance with adopted levels of service (WAC 173-26-241(3)(i)).

Objective REC-3: Increase public access to shorelines by developing and implementing parks, recreation, and trails plans (WAC 173-26-221(4)(c)).

Objective REC-4: Coordinate with Chelan County PUD in renovation of Entiat City Park, to include trail; swimming beach; additional boat launches; and upgrades to existing camping, parking, and restroom facilities.

Objective REC-5: Develop planned Entiaqua Trail and Outdoor Learning Center on the Entiat River.

Objective REC-6: Develop waterfront trail to connect with PUD/City Park trail and Entiaqua Trail.

Objective REC-7: Develop green spaces and shelters in Waterfront Business District zone.

2.4 Circulation Element (RCW 90.58.100(2)(d))

Goal CIRC-1: Since major transportation and utility systems pre-exist near many shorelines, minimize conflicts between these systems and shoreline uses when considering circulation additions or modifications (1975 SMP Goal C).

Objective CIRC-1: Encourage multiple modes of transportation (WAC 173-26-241(3)(k)).

Objective CIRC-2: Promote non-motorized travel and public access opportunities (WAC 173-26-241(3)(k)).

Objective CIRC-3: Encourage water-dependent transportation where appropriate (RCW 90.58.020).

Objective CIRC-4: Locate new or expanded road corridors for motorized vehicles outside of shoreline jurisdiction unless there is no reasonably feasible alternative or location (WAC 173-26-241(3)(k)).

Objective CIRC-5: Locate new utilities outside shoreline jurisdiction unless water crossings are unavoidable or utilities are required for authorized shoreline uses consistent with this SMP.

2.5 Shoreline Use Element (RCW 90.58.100(2)(e))

Goal LU-1: Assure an appropriate pattern of sound development in suitable locations without diminishing the quality of the environment along shorelines (1975 SMP Goal E).

Objective LU-1: Give preference along the shoreline to water-oriented uses, consistent with the control of pollution and prevention of damage to the natural environment (RCW 90.58.020).

Objective LU-2: Encourage shoreline uses and development that enhance and/or increase public access to the shoreline or provide significant public benefit (WAC 173-26-241(3) (d), (f), (i), (j) and WAC 173-26-221(4)).

2.6 Conservation Element (RCW 90.58.100(2)(f))

Goal CONS-1: Protect shoreline resources by:

- Preserving unique, fragile, and scenic elements;
- Conserving non-renewable natural resources; and
- Managing renewable resources such as timber, water, and wildlife (1975 SMP Goal G).

Objective CONS-1: Provide for no net loss of shoreline ecological function.

Goal CONS-2: Encourage the restoration of shoreline areas which have been modified, blighted, or otherwise disrupted by natural or human activities (1975 SMP Goal I).

Objective CONS-2: Ensure restoration and enhancement is consistent with and prioritized based on adopted watershed and basin plans (WAC 173-26-186 (8)(c)).

2.7 Historic, Cultural, Scientific, and Educational Element (RCW 90.58.100(2)(g))

Goal HIST-1: Protect and restore areas having significant historic, cultural, educational or scientific values (1975 SMP Goal F).

Objective HIST-1: Identify and encourage the preservation of sites and structures with historical or archeological significance, particularly those that might generate tourist appeal (Entiat Comprehensive Plan).

Goal HIST-2: Protect shoreline features to prevent the destruction of, or damage to, any site having archaeological, historic, cultural, or scientific value through coordination

and consultation with the appropriate local, state, tribal and federal authorities (Recommendations by State Department of Archaeology and Historic Preservation (DAHP)).

Objective HIST-2: Protect sites in collaboration with appropriate tribal, state, federal, and local governments. Encourage cooperation among public and private parties in the identification, protection, and management of cultural resources (Recommendations by DAHP).

Objective HIST-3: When and/or where appropriate and feasible, make access to such sites available to parties of interest. Design and manage access to such sites in a manner that gives maximum protection to the resource (Recommendations by DAHP).

Objective HIST-4: Provide opportunities for education related to archaeological, historical and cultural features when and/or where appropriate and incorporate into public and private management efforts, programs and development (Recommendations by DAHP).

2.8 Flood Hazard Prevention Element (RCW 90.58.100(2)(h))

Goal FLOOD-1: Recognize the hydrologic functions of floodplains, and protect frequently flooded areas (WAC 173-26-241(4)).

Objective FLOOD-1: Discourage land use practices that may impede the flow of floodwater or cause danger to life or property. Mitigate the loss of floodplain storage capacity to avoid greater impact of flooding downstream (WAC 173-26-221(3) and Entiat Comprehensive Plan).

Objective FLOOD-2: Seek to map areas that are potential flood hazard areas and/or have experienced historical flooding events, but are not currently included in the Federal Emergency Management Agency's mapping efforts (Entiat Comprehensive).

Objective FLOOD-3: Implement channel migration zone plans prepared by WRIA 46, Chelan County or other agencies (Based on WAC 173-26—221(3)).

Objective FLOOD-4: Coordinate shoreline jurisdiction flood hazard prevention policies and regulations with Growth Management Act provisions to protect critical areas including frequently flooded areas.

3 Shoreline Jurisdiction and Environment Designations

3.1 Shoreline Jurisdiction

As defined by the Shoreline Management Act of 1971, shorelines include certain waters of the State plus their associated “shorelands.” The waterbodies designated as shorelines of the State are streams whose mean annual flow is 20 cubic feet per second (cfs) or greater and lakes whose area is greater than 20 acres. Certain shoreline waterbodies and their associated shorelands have elevated status under the Act if they are lakes equal to or larger than 1,000 acres or they are streams and rivers in Eastern Washington that are “...downstream of a point where the annual flow is measured at two hundred cubic feet per second or more, or those portions of rivers east of the crest of the Cascade range downstream from the first three hundred square miles of drainage area, whichever is longer” (RCW 90.58.030(2)(e)(v)(B)). These waterbodies are considered to be “shorelines of statewide significance,” and have unique supplemental provisions outlined in Section 3.4.

Shorelands are minimally defined as:

“those lands extending landward for 200 feet in all directions as measured on a horizontal plane from the ordinary high water mark; floodways and contiguous floodplain areas landward 200 feet from such floodways; and all wetlands and river deltas associated with the streams, lakes, and tidal waters which are subject to the provisions of this chapter....” (RCW 90.58.030)

The approximate shoreline jurisdiction is indicated on Figure 3.1 Entiat Environment Designations. The Entiat River and Lake Entiat (Columbia River) are the only two water bodies identified in the City of Entiat. The main purpose of the Figure 3.1 is to identify Environment Designations as defined in Section 3.2. The maps only approximately identify or depict the lateral extent of shoreline jurisdiction. The actual lateral extent of the shoreline jurisdiction shall be determined on a case-by-case basis based on the location of the ordinary high water mark (OHWM), floodway, and presence of associated wetlands.

In circumstances where shoreline jurisdiction does not include an entire parcel, only that portion of the parcel and any use, activity or development on that portion of the parcel is subject to this Shoreline Master Program. The other portions of the parcel are still subject to all City planning and zoning ordinances. City planning shall include concurrency planning with this SMP.

3.2 Environment Designations

3.2.1 Shoreline Jurisdiction

The City of Entiat contains two shorelines: the Columbia River (also known as Lake Entiat) and the Entiat River. Both waterbodies are Shorelines of Statewide Significance. Figure 3.1 identifies the environment designations and approximate shoreline jurisdictions along each waterbody.

3.2.2 Environment Designation System

This SMP is intended to meet the requirements in WAC 173-26-211. It states that:

Master programs shall contain a system to classify shoreline areas into specific environment designations. This classification system shall be based on the existing use pattern, the biological and physical character of the shoreline, and the goals and aspirations of the community as expressed through comprehensive plans as well as the criteria in this section. Each master program's classification system shall be consistent with that described in WAC 173-26-211 (4) and (5) unless the alternative proposed provides equal or better implementation of the act.

This SMP is consistent with these requirements, deviating from WAC 173-26-211 (4) and (5) with respect only to some environment designation names, or the addition of new environment designations where such provides local government with opportunity to provide further, but complementary, consistency with existing land management plans. Each environment designation contains a purpose statement, designation criteria, and management policies components.

3.2.3 Official Shoreline Map and Undesignated Shorelines

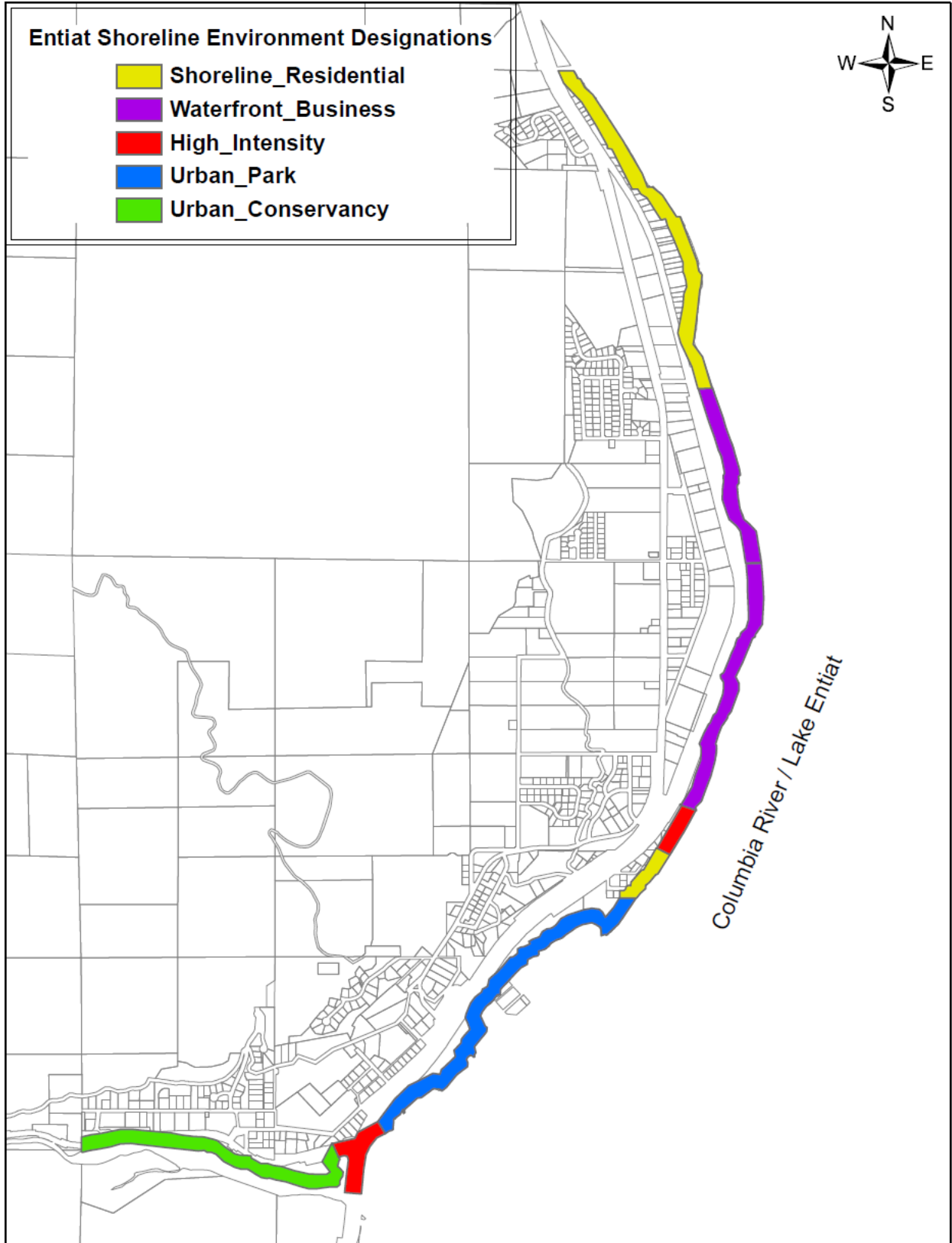
- A. Any areas within shoreline jurisdiction that are not mapped and/or designated due to minor mapping inaccuracies in the lateral extent of shoreline jurisdiction from the shoreline waterbody related to site-specific surveys of ordinary high water mark, floodway, and/or floodplain are automatically assigned the category of the contiguous waterward shoreline environment designation. Where the mapping inaccuracy results in inclusion of an unmapped associated wetland, shoreline jurisdiction shall extend to landward edge of the delineated wetland and that wetland shall be assigned an Aquatic environment designation.
- B. Any other areas of shoreline jurisdiction that were neither mapped as jurisdiction nor assigned an environment designation shall be assigned an Urban Conservancy designation until the shoreline can be redesignated through an SMP amendment.
- C. Any property shown in shoreline jurisdiction that does not meet the criteria for shoreline jurisdiction (e.g., is more than 200 feet from the OHWM or floodway, is

no longer in floodplain jurisdiction as documented by a Letter of Map Revision from FEMA, and does not contain associated wetlands) shall not be subject to the requirements of this SMP. Floodplain and floodway boundaries should be assessed using the most recently revised FEMA maps.

- D. Note that the actual location of the OHWM, floodplain, floodway, and wetland boundaries must be determined at the time a development is proposed. Wetland boundary and ordinary high water mark determinations are valid for five years.

3.2.4 Interpretation of Environment Designation Boundaries

- A. If disagreement develops as to the exact location of an environment designation boundary line, the Official Shoreline Maps shall prevail.
- B. Environmental designations shall follow parcel lines. In the event a designation line is unclear, the City's shoreline administrator will determine the delineation and designation.
- C. In the event of an environment designation mapping error, the Shoreline Administrator shall utilize the criteria contained in RCW 90.58.030(2), chapter 173-22 WAC, and the environment designation criteria contained in this SMP to establish the appropriate environment designation. Appeals of such interpretations may be filed pursuant to Section 7.13.
- D. All shoreline areas waterward of the OHWM shall be designated Aquatic.
- E. Upland environment designations shall apply to shorelands.
- F. Only one environment designation shall apply to a given shoreland area. In the case of parallel designations, designations shall be divided along an identified linear feature or clearly described boundary.



3.2.5 Environment Designations

A *Urban Conservancy*

A.1 Purpose

The purpose of the "Urban Conservancy" environment is to protect and restore ecological functions of open space, floodplain, and other sensitive lands where they exist in urban and developed settings, while allowing a variety of compatible uses.

A.2 Designation Criteria

An "Urban Conservancy" environment designation will be assigned to shorelines that are within areas planned for development that are compatible with maintaining or restoring the ecological functions of the area, and that are not generally suitable for water-dependent uses other than those uses that support public access and recreation, that are suitable for water-related or water-enjoyment uses; that may be designated as open space, floodplain or other sensitive areas that should not be more intensively developed; and those that retain important ecological functions, even though partially developed.

A.3 Management Policies

Development within the "Urban Conservancy" environment shall be consistent with the following policies:

- A. Uses that preserve the natural character of the area or promote preservation of open space, floodplain, or sensitive lands either directly or over the long term should be the primary allowed uses. Uses that result in restoration of ecological functions should be allowed if the use is otherwise compatible with the purpose of the environment and the setting.
- B. Standards should be established for shoreline stabilization measures, vegetation conservation, water quality, and shoreline modifications within the Urban Conservancy designation. These standards shall ensure that new development does not result in a net loss of shoreline ecological functions or further degrade other shoreline values.
- C. Public access and public recreation objectives should be implemented whenever feasible and significant ecological impacts can be mitigated.
- D. Water-oriented uses should be given priority over nonwater-oriented uses.

B Shoreline Residential

B.1 Purpose

The purpose of the "Shoreline Residential" environment is to accommodate residential development and appurtenant structures that are consistent with this chapter.

B.2 Designation Criteria

A "Shoreline Residential" environment designation will be assigned to the City's shorelands if they are predominantly single-family or multi-family residential development or are planned for residential development.

B.3 Management Policies

Development within the "Shoreline Residential" environment shall be consistent with the following policies:

- A. Commercial development should be limited to water-oriented uses and not conflict with the residential character of lands in the Shoreline Residential environment.
- B. Water-oriented recreational uses should be allowed.
- C. Adequate land area and services should be provided.
- D. Land division and development should be permitted only 1) when adequate buffers are provided to protect ecological functions and 2) where there is adequate access, water, sewage disposal, and utilities systems, and public services available and 3) where the environment can support the proposed use in a manner which protects or restores the ecological functions.
- E. Development standards for buffers, shoreline stabilization, vegetation conservation, critical area protection, and water quality should be established to protect and, where significant ecological degradation has occurred, restore ecological functions over time.
- F. Multi-family and multi-lot residential and recreational developments should provide public access to the shoreline and joint-use community recreational facilities.
- G. New residential development should be located and designed so that future shoreline stabilization is not required.

C Waterfront Business

C.1 Purpose

The purpose of the "Waterfront Business" environment is to accommodate water-oriented commercial and recreational uses, while protecting existing ecological functions and restoring ecological functions in areas that have been previously

degraded. The designation promotes a balance of waterfront public access, shoreline restoration, and water-oriented business development including, but not limited to mixed uses of marina, hotels, restaurants, retail businesses that serve waterfront users, and second-floor residential. Public access is anticipated to include shoreline trails flanked by human-scale buildings and appropriate landscaping per City codes.

C.2 Designation Criteria

A "Waterfront Business" environment designation will be assigned to those shorelands located within the City's waterfront business district subarea. Such shoreline areas include largely degraded portions of shoreline located between the Columbia River and the upland railroad right-of-way.

C.3 Management Policies

Development within the "Waterfront Business" environment shall be consistent with the following policies:

- A. In the "Waterfront Business" environment, first priority should be given to water-oriented uses, while protecting existing ecological functions and encouraging restoration of ecological function in areas that have been previously degraded. Nonwater-oriented uses may also be allowed where they do not conflict with or limit opportunities for water-oriented uses, or on sites where there is no direct access to the shoreline, but only if identified in shoreline use analysis or through special area planning as described in WAC 173-26-201(3)(d)(ix).
- B. Developments in the "Waterfront Business" environment should be managed so that they enhance and maintain the shorelines for a variety of urban uses, including recreation.
- C. Public access and public recreation objectives should be implemented whenever feasible and significant ecological impacts can be mitigated.
- D. New developments shall allow public access to the shoreline.
- E. Aesthetic objectives should be actively implemented by means such as sign control regulations, appropriate development siting, screening and architectural standards, and maintenance of natural vegetative buffers.
- F. Development standards for buffers, shoreline stabilization, vegetation conservation, critical area protection, and water quality should be established to protect and, where significant ecological degradation has occurred, restore ecological functions over time.
- G. No net loss of shoreline ecological functions shall occur as a result of new development. Where applicable, new development shall include environmental cleanup and restoration of the shoreline to comply with any relevant state and federal law.

- H. New development should be located and designed to avoid the need for future shoreline stabilization to the extent feasible.

D. Urban Parks

D.1 Purpose

The purpose of the “Urban Parks” designation is to provide public access to the shoreline for active and passive water-enjoyment uses. Examples of compatible uses in this designation include outdoor public access and recreation, swimming beaches, boating facilities, camping areas, trails, picnic shelters, restrooms, campfire facilities, and public open spaces.

D.2 Designation Criteria

An “Urban Park” environment designation should be assigned to shoreline areas if any of the following characteristics apply:

- A. The area is currently in use as a shoreline park.
- B. The area has been identified in a municipal planning process as a proposed or master planned park.
- C. The area is constrained by lot configuration or other characteristics that would preclude appropriate commercial or residential development based on the regulations in this SMP or local jurisdictional regulatory documents.

D.3 Management Policies

Development within the “Urban Parks” environment shall be consistent with the following policies:

- A. Uses that provide public access and public recreation and enjoyment of the water should be the primary allowed uses.
- B. Water-oriented uses should be given priority over non-water-oriented uses. Non-water-oriented uses may be allowed as accessory to water-oriented uses in a mixed-use development in such situations where they do not conflict with or limit opportunities for water-oriented uses.
- C. Standards should be established for vegetation conservation, shoreline stabilization, water quality, and critical area protection to ensure no net loss of ecological functions as a result of new development.
- D. Shoreline areas that may be appropriate for recreational use should be acquired or purchased and incorporated into the City’s public park and open space system.
- E. Linking shoreline parks and recreational areas should be encouraged.

- F. Recreational development should be sited to take advantage of key views or vistas.
- G. Recreational development should make provision for vehicular and pedestrian access.
- H. Recreational areas should be buffered from surrounding private property through the use of landscaping and other structures such as fencing where permissible under this plan.

E. High Intensity

E.1 Purpose

The purpose of the "High Intensity" environment is to provide for high-intensity water-oriented commercial, institutional, and transportation uses while protecting existing ecological functions and restoring ecological functions in areas that have been previously degraded.

E.2 Designation Criteria

A "High Intensity" environment designation will be assigned to shorelands designated for commercial or industrial use if they currently support or are suitable and planned for high-intensity commercial, transportation, or institutional uses that either include, or do not detract from, the potential for water-oriented uses, shoreline restoration, and/or public access.

E.3 Management Policies

Development within the "High Intensity" environment shall be consistent with the following policies:

- A. In the "High Intensity" environment, first priority should be given to water-dependent uses. Second priority should be given to water-related and water-enjoyment uses. Non-water-oriented uses should not be allowed except as part of mixed-use developments. Non-water-oriented uses may also be allowed in limited situations where they do not conflict with or limit opportunities for water-oriented uses or on sites where there is no direct access to the shoreline, but only if identified in shoreline use analysis or through special area planning as described in WAC 173-26-201(3)(d)(ix).
- B. Developments in the "High Intensity" environment should be managed so that they enhance and maintain the shorelines for a variety of urban uses, with priority given to water-dependent, water-related, and water-enjoyment uses.
- C. Where feasible, visual and physical public access should be required as provided for in Sections 4.4 of this SMP.

- D. Aesthetic objectives should be actively implemented in development proposals and should be in compliance with sign control regulations, appropriate development siting, screening and architectural standards, and maintenance of natural vegetative buffers.
- E. No net loss of shoreline ecological functions shall occur as a result of new development. Where applicable, new development shall include environmental cleanup and restoration of the shoreline to comply with any relevant state and federal law.
- F. Full utilization of existing urban areas should be achieved before considering expanding this environment designation through future SMP amendments. Reasonable long-range projections of regional economic need should guide the amount of shoreline designated "High Intensity." During an analysis of shoreline uses, consideration should be given to the potential for displacement of nonwater-oriented uses with water-oriented uses when analyzing full utilization of urban waterfronts and before considering expansion of such areas. In order to make maximum use of the available shoreline resource and to accommodate future water-oriented uses, shoreline restoration and/or public access, the redevelopment and renewal of substandard, degraded, obsolete urban shoreline areas is encouraged.

F. Aquatic

F.1 Purpose

The purpose of the "Aquatic" environment is to protect, restore, and manage the unique characteristics and resources of the areas waterward of the OHWM.

F.2 Designation Criteria

An "Aquatic" environment designation will be assigned to shoreline areas waterward of the OHWM.

F.3 Management Policies

Development within the "Aquatic" environment shall be consistent with the following policies:

- A. New over-water structures should be prohibited except for water-dependent uses, public access, necessary shoreline crossings, or ecological restoration.
- B. The size of new over-water structures should be limited to the minimum necessary to support the structure's intended use.
- C. In order to reduce the impacts of shoreline development and increase effective use of water resources, multiple uses of over-water facilities should be encouraged.

- D. All developments and uses on navigable waters or their beds should be located and designed to minimize interference with surface navigation, to consider impacts to public views, and to allow for the safe, unobstructed passage of fish and wildlife, particularly those species dependent on migration.
- E. Uses that adversely impact the ecological functions of critical freshwater habitats should not be allowed. Where those uses are necessary to achieve the objectives of RCW 90.58.020, their impacts shall be mitigated according to the sequence defined in Chapter 4.2, Ecological Protection and Critical Areas.
- F. Shoreline uses and modifications should be designed and managed to prevent degradation of water quality and alteration of natural hydrographic conditions.

3.3 Shoreline Use Preferences

This SMP adopts the following policy provided in RCW 90.58.020, and fully implements it to the extent of its authority under this SMP:

It is the policy of the State to provide for the management of the shorelines of the State by planning for and fostering all reasonable and appropriate uses. This policy is designed to insure the development of these shorelines in a manner which, while allowing for limited reduction of rights of the public in the navigable waters, will promote and enhance the public interest. This policy contemplates protecting against adverse effects to the public health, the land and its vegetation and wildlife, and the waters of the State and their aquatic life, while protecting generally public rights of navigation and corollary rights incidental thereto...

In the implementation of this policy, the public's opportunity to enjoy the physical and aesthetic qualities of natural shorelines of the State shall be preserved to the greatest extent feasible consistent with the overall best interest of the State and the people generally. To this end uses shall be preferred which are consistent with control of pollution and prevention of damage to the natural environment, or are unique to or dependent upon use of the state's shoreline. Alterations of the natural condition of the shorelines of the state, in those limited instances when authorized, shall be given priority for single family residences and their appurtenant structures, ports, shoreline recreational uses including but not limited to parks, marinas, piers, and other improvements facilitating public access to shorelines of the state, industrial and commercial developments which are particularly dependent on their location on or use of the shorelines of the state and other development that will provide an opportunity for substantial numbers of the people to enjoy the shorelines of the state....

Permitted uses in the shorelines of the State shall be designed and conducted in a manner to minimize, insofar as practical, any resultant damage to the ecology and environment of the shoreline area and any interference with the public's use of the water.

When determining allowable uses and resolving use conflicts on shorelines within jurisdiction consistent with the above policy, the following preferences and priorities as listed in WAC 173-26-201(2)(d) shall be applied in the order presented below:

- (i) Reserve appropriate areas for protecting and restoring ecological functions to control pollution and prevent damage to the natural environment and public health.*
- (ii) Reserve shoreline areas for water-dependent and associated water related uses ... Local governments may prepare master program provisions to allow mixed-use developments that include and support water-dependent uses and address specific conditions that affect water-dependent uses.*
- (iii) Reserve shoreline areas for other water-related and water-enjoyment uses that are compatible with ecological protection and restoration objectives.*
- (iv) Locate single-family residential uses where they are appropriate and can be developed without significant impact to ecological functions or displacement of water-dependent uses.*
- (v) Limit non-water-oriented uses to those locations where the above described uses are inappropriate or where non-water-oriented uses demonstrably contribute to the objectives of the Shoreline Management Act.*

3.4 Use Matrix and Development Standards

- A. Table 3-1 indicates which uses and modifications may be allowed or are prohibited in shoreline jurisdiction within each shoreline environment. Accessory uses shall be subject to the same shoreline permit process and SMP provisions as their primary use. Where there is a conflict between the chart and the written provisions in this SMP, the written provisions shall apply.
- B. An accessory use shall not be established on a property prior to the establishment of its primary use.
- C. Authorized uses and modifications are only allowed in shoreline jurisdiction where the underlying zoning allows for it and subject to the policies and regulations of this SMP.
- D. Any use, development or modification not classified elsewhere in the Shoreline Master Program or listed below shall require a Conditional Use Permit.
- E. Uses and modifications identified as "SD/E" are either allowed with a Shoreline Substantial Development Permit or may be exempt from the requirement to obtain a Shoreline Substantial Development Permit. The definition of Substantial Development is included in Chapter 8. Exemptions are defined in Section 7.6. Uses and modifications that are exempt from permitting are not exempt from the

requirements Act or this SMP, and must be consistent with the applicable policies and provisions.

- F. If any part of a proposed development is not eligible for exemption, a Shoreline Permit is required for the entire proposed development project.
- G. A development or use that is listed as a conditional use pursuant to this SMP or is an unlisted use, must obtain a Conditional Use Permit even though the development or use does not require a Substantial Development Permit.
- H. To preserve the existing and planned character of the shoreline consistent with the purposes of the shoreline environment designations, shoreline development standards regarding shoreline buffers, lot frontage, side setbacks, and height are provided in Table 12-2. In addition, shoreline developments shall comply with all density, lot area, setback and other dimensional requirements of the responsible local government zoning and subdivision codes.
- I. When a development or use is proposed that does not comply with the shoreline buffer, lot frontage, side yard setback, and other dimensional performance standards of this SMP not otherwise allowed by administrative reduction or administrative modification, such development or use can only be authorized by approval of a Variance. Departures from the maximum height limit shall be subject to approval of a Shoreline Conditional Use Permit, including a view corridor analysis and demonstration that criteria are met consistent with Section 7.7.
- J. Except as otherwise stated, the responsible local government Comprehensive Plan, zoning regulations, subdivision regulations, health regulations, and other adopted regulatory provisions apply within shoreline jurisdiction. In the event the provisions of this SMP conflict with provisions of other responsible local government regulations, the more protective of shoreline ecological functions and processes shall prevail.
- K. Where a use or modification may occur in the Aquatic environment as indicated in Table 3-1 and in the corresponding regulations for that use, the more restrictive permit process or prohibition on that use as may be indicated for the adjacent shoreland environment applies to that use in the Aquatic environment.

TABLE 3.1 SHORELINE USE AND MODIFICATION MATRIX

<p>The chart is coded according to the following legend.</p> <p>SD/E = Allowed by Shoreline Substantial Development Permit or shoreline exemption requirements</p> <p>CU= Conditional Use</p> <p>X = Prohibited; the use is not eligible for a Variance or Conditional Use Permit</p> <p>(-) = Subject to use limitations in Chapters 4 & 5; otherwise prohibited</p> <p>-- = Not applicable</p>							
	Urban Conservancy	Shoreline Residential	Waterfront Business	Urban Parks	High Intensity	Aquatic	
	Agriculture	X	SD/E	X	X	X	X
	Aquaculture	X	X	X	X	X	X
	Boating Facilities: Marinas and Boat Launches						
	Community piers	X	SD/E	SD/E	X	X	SD/E
	Marinas and commercial piers	X	X	SD/E	CU	X	SD/E
Public boat launch	SD/E	X	SD/E	SD/E	X	SD/E	
Private commercial boat launch	X	X	SD/E	X	X	SD/E	
Private community boat launch	X	SD/E	SD/E	X	X	SD/E	
Breakwaters/jetties/rock weirs/groins	CU	CU	CU	CU	CU	CU1	
Commercial Uses							
Water-dependent uses	X	X	SD/E	CU	SD/E	CU	
Water-related	X	X	SD/E	CU	SD/E	CU	
Water-enjoyment uses	X	X	SD/E	CU	SD/E	CU	
Nonwater-oriented uses	X	X	SD/E(-)	X	SD/E(-)	X	
Mixed use commercial	X	X	SD/E	X	X	X	
Mixed use residential	X	X	SD/E (-)	X	X	X	
Dredging and dredge materials disposal							
Dredging	CU	CU	CU	CU	CU	SD/E(-)	

<p>The chart is coded according to the following legend.</p> <p>SD/E = Allowed by Shoreline Substantial Development Permit or shoreline exemption requirements</p> <p>CU= Conditional Use</p> <p>X = Prohibited; the use is not eligible for a Variance or Conditional Use Permit</p> <p>(-) = Subject to use limitations in Chapters 4 & 5; otherwise prohibited</p> <p>-- = Not applicable</p>							
	Urban Conservancy	Shoreline Residential	Waterfront Business	Urban Parks	High Intensity	Aquatic	
	In-water disposal	--	--	--	--	--	CU
	Upland disposal outside of CMZ/ floodplain	CU	CU	CU	CU	CU	--
	Upland disposal inside of CMZ/ floodplain	CU	CU	CU	CU	CU	--
	Fill						
	Upland outside of CMZ/ floodplain	SD/E	SD/E	SD/E	SD/ E	SD/E	--
Upland inside of CMZ/ floodplain	CU	CU	CU	CU	CU	--	
In-water restoration or mitigation	SD/E	SD/E	SD/E	SD/ E	SD/E	SD/E	
In-water non-restoration	--	--	--	--	--	CU	
Forest Practices	X	X	X	X	X	X	
Industrial Uses							
Water-dependent uses	X	X	X	X	SD/E	CU	
Water-related uses	X	X	X	X	SD/E	X	
Nonwater-oriented uses	X	X	X	X	SD/E(-)	X	
Accessory	X	X	X	X	SD/E	CU	
Public Facilities							
Water-oriented	SD/E	X	SD/E	CU	SD/E	CU	
Nonwater-oriented	CU(-)	X	CU(-)	CU(-)	CU(-)	X	
In-Water Structures	SD/E	SD/E	SD/E	SD/ E	SD/E	SD/E	

The chart is coded according to the following legend. SD/E = Allowed by Shoreline Substantial Development Permit or shoreline exemption requirements CU= Conditional Use X = Prohibited; the use is not eligible for a Variance or Conditional Use Permit (-) = Subject to use limitations in Chapters 4 & 5; otherwise prohibited -- = Not applicable	Urban Conservancy	Shoreline Residential	Waterfront Business	Urban Parks	High Intensity	Aquatic
Mining						
Upland mining outside of CMZ/ floodplain	X	X	SD/E	X	X	--
Upland mining inside of CMZ/ floodplain	X	X	CU	X	X	--
In-water mining (commercial)	--	--	--	--	--	X
In-water mining (recreational)	--	--	--	--	--	X
Private Moorage Facilities (permitted on Columbia River only)						
Buoys	--	SD/E	SD/E	--	--	SD/E
Residential piers and docks	SD/E	SD/E	CU	X	SD/E	SD/E
Watercraft lifts (canopies prohibited)	X	SD/E	CU	X	X	SD/E
Private boat launches	X	X	X	X	X	X
Recreational Uses2						
Water-dependent	SD/E	SD/E	SD/E	SD/E	SD/E	SD/E
Water-related	SD/E	SD/E	SD/E	SD/E	SD/E	SD/E
Water-enjoyment	SD/E	SD/E	SD/E	SD/E	SD/E	SD/E
Nonwater-oriented	CU	CU	CU	SD/E	CU	X
Residential Uses						
Single-family/Duplex	SD/E	SD/E	SD/E	X	X	X

<p>The chart is coded according to the following legend.</p> <p>SD/E = Allowed by Shoreline Substantial Development Permit or shoreline exemption requirements</p> <p>CU= Conditional Use</p> <p>X = Prohibited; the use is not eligible for a Variance or Conditional Use Permit</p> <p>(-) = Subject to use limitations in Chapters 4 & 5; otherwise prohibited</p> <p>-- = Not applicable</p>						
	Urban Conservancy	Shoreline Residential	Waterfront Business	Urban Parks	High Intensity	Aquatic
Multi-family	SD/E	SD/E	X	X	X	X
Over-water	X	X	X	X	X	X
Floating	--	--	--	--	--	X
Liveaboards	--	--	--	--	--	X
Shoreline habitat and natural systems enhancement projects	SD/E	SD/E	SD/E	SD/E	SD/E	SD/E
Shoreline Stabilization						
Bioengineering	SD/E	SD/E	SD/E	SD/E	SD/E	SD/E
Hard structural shoreline stabilization	CU	CU	CU	CU	CU	CU
Soft structural shoreline stabilization	SD/E	SD/E	SD/E	SD/E	SD/E	SD/E
Dikes, levees	CU	CU	CU	CU	CU	--
Transportation and Parking						
Local	SD/E (-)	SD/E (-)	SD/E(-)	SD/E	SD/E(-)	CU
Regional	CU	CU	CU	CU	CU	CU
Utilities						
Small	SD/E	SD/E	SD/E	SD/E	SD/E	CU
Large	CU	CU	CU	CU	CU	CU

1 Those structures installed to protect or restore ecological functions, such as woody debris installed in streams, may be processed as a Substantial Development Permit.

2 When the use is also commercial, it is also subject to Commercial use standards and matrix allowances

TABLE 3.2 SHORELINE DEVELOPMENT STANDARDS MATRIX

Standard	Urban Conservancy	Shoreline Residential	Waterfront Business	High Intensity	Aquatic
Note: All dimensions are in feet. n/a = not applicable TBD = To be Determined					
Shoreline Buffer – All Uses	See Section 12.4.5 of this SMP.				
Shoreline Lot Frontage Minimum – Residential	85	85	-	0	n/a
Side Yard Setback Minimum – Residential	5	5	5	0	n/a
Height Limit Maximum	35	35	35	35	35

3.5 Shorelines of Statewide Significance

3.5.1 Designation Criteria

Shorelines of Statewide Significance include those lakes, whether natural, artificial, or a combination thereof, with a surface area greater than or equal to 1,000 acres measured from the OHWM, and natural rivers or segments thereof downstream of a point where the annual flow is measured at two hundred (200) cubic feet per second or more, or those portions of rivers east downstream from the first three hundred (300) square miles of drainage area, whichever is longer.

3.5.2 Use Preferences

In accordance with RCW 90.58.020, the following management and administrative policies are hereby adopted for all Shorelines of Statewide Significance in Entiat, as defined in RCW 90.58.030(2)(e) and listed in Sections 9.3.4 through 14.3.4 of this SMP. Consistent with the policy contained in RCW 90.58.020, preference shall be given to the uses in the following order of preference that are consistent with the statewide interest in such shorelines. These are uses that:

- (1) *Recognize and protect the statewide interest over local interest;*
- (2) *Preserve the natural character of the shoreline;*
- (3) *Result in long term over short term benefit;*
- (4) *Protect the resources and ecology of the shoreline;*
- (5) *Increase public access to publicly owned areas of the shorelines;*
- (6) *Increase recreational opportunities for the public in the shoreline;*

(7) Provide for any other element as defined in RCW 90.58.100 deemed appropriate or necessary. (WAC 173-26-251(2))

Uses that are not consistent with these preferences should not be permitted on Shorelines of Statewide Significance.

3.5.3 Policies

Consistent with the use preferences for Shorelines of Statewide Significance contained in RCW 90.58.020 and identified in Section 3.4.2, the City will base decisions administering this SMP on the following policies in order of decreasing priority (WAC 173-26-251(3)(a-e) and WAC 173-26-251(2)):

- A. Recognize and protect the state-wide interest over local interest.
 - 1. Solicit comments and opinions from groups and individuals representing state-wide interests by circulating amendments to the Master Program, and any proposed amendments affecting Shorelines of Statewide Significance, to state agencies, affected Tribes, adjacent jurisdictions, citizen's advisory committees and local officials, and state-wide interest groups.
 - 2. Recognize and take into account state agencies' policies, programs, and recommendations in developing and administering use regulations and in approving shoreline permits.
 - 3. Solicit comments, opinions, and advice from individuals with expertise in ecology and other scientific fields pertinent to shoreline management.
- B. Preserve the natural character of the shoreline.
 - 1. Designate and administer shoreline environments and use regulations to protect and restore the ecology and environment of the shoreline as a result of human intrusions on shorelines.
 - 2. Restore, enhance, and/or redevelop those areas where intensive development already exists in order to reduce adverse impact on the environment and to accommodate future growth rather than allowing high-intensity uses to extend into low-intensity use or underdeveloped areas.
 - 3. Protect and restore existing diversity of vegetation and habitat values, wetlands, and riparian corridors associated with shoreline areas.
 - 4. Protect and restore habitats for State-listed "priority species."
- C. Support actions that result in long-term benefits over short-term benefits.
 - 1. Evaluate the short-term economic gain or convenience of developments relative to the long-term and potentially costly impairments to the natural shoreline.

2. Preserve resources and values of Shorelines of Statewide Significance for future generations and restrict or prohibit development that would irretrievably damage shoreline resources.
 3. Ensure the long-term protection of ecological resources of statewide importance, such as anadromous fish habitats, forage fish spawning and rearing areas, and unique environments.
- D. Protect the resources and ecology of the shoreline.
1. All shoreline development should be located, designed, constructed, and managed consistent with mitigation sequencing provisions outlined in Section 4.2.2 to minimize adverse impacts to regionally important wildlife resources, including spawning, nesting, rearing and habitat areas, and migratory routes and result in no net loss of shoreline ecosystems and ecosystem-wide processes.
 2. Actively promote aesthetic considerations when contemplating new development, redevelopment of existing facilities, or general enhancement of shoreline areas.
- E. Increase public access to publicly owned areas of the shoreline.
1. Give priority to developing paths and trails to shoreline areas and linear access along the shorelines, especially those trail corridors that would be a regional recreational and transportation resource.
 2. Locate development landward of the OHWM so that access is enhanced and opportunities for access are not precluded.
- F. Increase recreational opportunities for the public on the shoreline.
1. Plan for and encourage development of facilities for public recreational use of the shoreline.
 2. Reserve areas for lodging and related facilities on uplands well away from the shorelines, with provisions for non-motorized access to the shoreline.

4 General Policies and Regulations

Chapter 4 presents general policies and regulations that apply to any developments, uses, or activities in any environment designation in order to protect environmental and cultural resources, reduce likelihood of harm to life or property from hazardous conditions, and promote access to shorelines.

The chapter is divided into two sections. The Policies in Section 4.1 are statements of principles that guide and determine present and future decisions. The Regulations in Section 4.2 are rules that govern developments, uses, or activities.

4.1 Policies

4.1.1 No Net Loss of Ecological Function Policies

- A. No net loss of ecological functions. Shoreline use and development should be carried out in a manner that prevents or mitigates adverse impacts, both on site and to the extent that impacts may propagate up or downstream, so that the resulting ecological condition does not become worse than the current condition. This means that each action should assure no net loss of ecological functions and processes relative to the existing watershed condition, protecting critical areas, and protecting shorelines in a manner consistent with all relevant constitutional and other legal limitations on the regulation of private property. Shoreline ecological functions that should be protected include, but are not limited to, fish and wildlife habitat, food chain support, and water temperature maintenance. Shoreline processes that should be protected include, but are not limited to, water flow; erosion and accretion; infiltration; ground water recharge and discharge; sediment delivery, transport, and storage; large woody debris recruitment; organic matter input; nutrient and pathogen removal; and stream channel formation/maintenance.
- B. Consider project and cumulative impacts. In assessing the potential for net loss of ecological functions or processes, project-specific and cumulative impacts should be considered on a watershed basis.
- C. Development standards should protect functions. Development standards for density, frontage, impervious surface, shoreline stabilization, vegetation conservation, buffers, critical areas, and water quality should protect existing shoreline ecological functions and processes. During permit review, the Shoreline Administrator should consider the expected impacts associated with proposed shoreline development when assessing compliance with this policy.
- D. No net loss incorporates the following concepts:

1. The existing condition of shoreline ecological functions should not deteriorate due to permitted development. The existing condition baseline is documented in the shoreline inventory and characterization (see Appendix C). Shoreline functions may improve through shoreline restoration.
 2. New adverse impacts to the shoreline environment that result from planned development should be avoided. When this is not possible, impacts should be minimized through mitigation sequencing.
 3. Mitigation for development projects alone cannot prevent all cumulative adverse impacts to the shoreline environment, so restoration is also needed.
- E. Conserve native vegetation. Where new developments, uses and/or redevelopments are proposed, existing native shoreline vegetation should be conserved to maintain shoreline ecological functions and processes. Vegetation conservation and restoration should be used to mitigate the direct, indirect, and cumulative impacts of shoreline development, wherever feasible. Important functions of shoreline vegetation may include, but are not limited to:
1. Providing shade necessary to maintain water temperatures required by salmonids and other organisms that require cool water for all or a portion of their life cycles.
 2. Regulating microclimate in riparian and nearshore areas including water retention and land temperature control.
 3. Providing organic inputs necessary for aquatic life and other wildlife, including providing food in the form of various insects and other benthic macroinvertebrates.
 4. Stabilizing banks, minimizing erosion and sedimentation, and reducing the occurrence and severity of landslides.
 5. Reducing fine sediment input into the aquatic environment by minimizing erosion, aiding infiltration, and retaining runoff.
 6. Improving water quality through filtration and vegetative uptake of nutrients and pollutants.
 7. Providing a source of large woody debris to moderate flows, create hydraulic roughness, form pools, and increase structural diversity for salmonids and other species.
 8. Providing habitat elements for riparian-associated species, including downed wood, snags, migratory corridors, food, and cover (list based on WAC 173-26-221(5)(b)).
- F. Native plant list. A native plant list has been developed that identifies native species most suitable for shoreline restoration and enhancement projects. Plants

utilized in shoreline buffers should be native as indicated by the Washington Native Plant Society. Ecosystem-friendly, non-native plantings may be allowed in some areas as approved by WDFW.

- G. Noxious and invasive weeds. Encourage management and control of noxious and invasive weeds. Control of such species should be done in a manner that retains onsite native vegetation, provides for erosion control, and protects water quality. Use of non-toxic or natural controls is preferred (WAC 173-26-221(5)(c)(i)).
- H. No net loss of water quality is addressed in the following section.

4.1.2 Water Quality, Stormwater, and Nonpoint Pollution Policies

- A. Do not degrade waters. The location, construction, operation, and maintenance of all shoreline uses and developments should maintain or enhance the quantity and quality of surface and groundwater over the long term.
- B. Assess and mitigate stormwater impacts. New developments or expansions or retrofits of existing developments should assess the effects of additional stormwater runoff volumes and velocities, and mitigate potential adverse effects on shorelines through design and implementation of appropriate stormwater management facilities.
- C. Low impact development. Use of low impact development (LID) techniques for minimization of impervious surfaces and management of stormwater runoff is encouraged.
- D. Minimize need for chemical applications. Shoreline use and development, including invasive or noxious weed control, should minimize the need for chemical fertilizers, pesticides or other similar chemical treatments to prevent contamination of surface and ground water and/or soils and adverse effects on shoreline ecological functions and values.
- E. Provide and maintain buffers. Appropriate buffers along all wetlands, streams, and lakes should be provided and maintained for new development in a manner that avoids the need for chemical treatment for vegetation management and be consistent with critical areas ordinances and best management practices.
- F. Existing development. For existing development, implementation of management plans that minimize or avoid the need for chemical treatments of vegetation in shoreline buffers is encouraged. When lands owned by a responsible local government are leased to private parties, a vegetation management plan should be negotiated during lease renewal.

4.1.3 Flood Hazard Reduction Policies

The following provisions apply to actions taken to reduce flood damage or hazard and to uses, development, and shoreline modifications that may increase flood hazards. Flood hazard reduction measures may consist of nonstructural measures, such as shoreline buffers, land use controls, wetland restoration, dike removal, use relocation, biotechnical measures, and storm water management programs, and of structural measures, such as dikes, levees, revetments, floodwalls, channel realignment, and elevation of structures consistent with the National Flood Insurance Program.

Although some flood hazard reduction measures may serve a dual function as shoreline stabilization, their primary purpose is to control the location of flood waters directly. Alternatively, the primary purpose of shoreline stabilization measures is to prevent erosion of land from currents and waves originating in the shoreline waterbody (rather than upland sources of erosion), which is a more indirect control of the location of flood and non-flood water. Shoreline stabilization is addressed in Section 5.2.18.

The City's Comprehensive Plan, along with such plans as the Chelan County Multi-jurisdictional Natural Hazard Mitigation Plan, Entiat WRIA 46 watershed plans, and channel migration plans from other agencies have been developed to encourage flood hazard reduction. The City's Critical Area Code and stormwater regulations implement the policies and plans.

- A. Implement flood hazard plans and regulations. Ensure public and private development applications site and design flood control measures consistent with appropriate engineering principles, including guidelines of the Natural Resource Conservation Service, the U.S. Army Corps of Engineers, Chelan County Multi-Jurisdiction Natural Hazard Mitigation Plan, watershed plans, channel migration zone plans, restoration plans, critical area regulations, floodplain regulations, and stormwater management plans and regulations in order to prevent flood damage, maintain the natural hydraulic capacity of floodways, and conserve limited resources such as fish habitat, water, and soil (WAC 173-26-221(3)(b)(ii) and (iii)).
 1. The City should seek to map areas that are potential flood hazard areas and/or have experienced historical flooding events, such as the Channel Migration Zone, but are not currently included in the Federal Emergency Management Agency's mapping efforts (Comprehensive Plan Policy LU 13.14).
 2. The City should promote the preservation of the remaining significant natural drainages that are an important part of the stormwater drainage system (Comprehensive Plan Policy LU 13.8).

3. Frequently flooded areas should be allocated uses for which they are best suited and discourage obstructions to flood-flows and uses which pollute or deteriorate natural waters and water courses (Comprehensive Plan Policy LU 13.7).
4. Land use practices that may impede the flow of flood water or cause danger to life or property should be discouraged. This includes, but is not limited to, filling, dumping, storage of materials, structures, buildings, and any other works which, when acting alone or in combination with other existing or future uses, would cause damaging flood heights and velocities by obstructing flows (Comprehensive Plan Policy LU 13.3).
5. The City should permit and encourage land uses compatible with the preservation of the natural vegetation which is a principal factor in the maintenance of constant rates of water flow through the year and which sustain many species of wildlife and plant growth (Comprehensive Plan Policy LU 13.4).
6. Development within the floodway portion of a floodplain that would alter the course and flow of flood waters and result in damages to other property owners or natural areas shall be prohibited (Comprehensive Plan Policy LU 13.10).
7. The design of new developments located in regulatory floodplains should incorporate flood damage protection measures (Comprehensive Plan Policy LU 13.11).
8. The installation of new or replacement public facilities, utilities or other public improvements within designated floodplains should utilize prevailing flood damage prevention methods, and where feasible give preference to nonstructural flood hazard reduction measures over structural measures (Comprehensive Plan Policy LU 13.12).
9. New development which has the potential to alter and/or obstruct frequently flooded areas should be controlled, thereby avoiding unacceptable increases in flood elevations, reducing flood damage, and allowing proper conveyance of flood flows (Comprehensive Plan Policy LU 13.13).
10. The City should require new development to collect, treat, and dispose of its stormwater runoff in an engineered system on-site, or in a private or public system capable of carrying and disposing of the additional volumes (Comprehensive Plan Policy LU 13.15).
11. Considerations for surface water runoff, floodplain issues, and maintaining water quality should be incorporated during the design and

- construction of new developments, including roads and utility corridors (Comprehensive Plan Policy LU 10.21).
12. The City should reduce danger to health by protecting surface and groundwater supplies from the impairment which results from incompatible land uses by providing safe and sanitary drainage (Comprehensive Plan Policy LU 13.1).
 13. The development of structures in areas unfit for human usage by reason of danger from flooding, unsanitary conditions, or other hazards should be prevented (Comprehensive Plan Policy LU 13.6).
 14. No net loss of ecological functions. Flood protection measures should result in no net loss of ecological functions and ecosystem-wide processes associated with rivers, streams, and lakes (WAC 173-26-221(3)(b)(iv)).
 15. Non-structural methods preferred. Where feasible, non-structural methods to protect, enhance, and restore shoreline ecological functions and processes and other shoreline resources should be encouraged as an alternative to structural flood control works. Non-structural methods may include, but are not limited to, shoreline buffers, land use controls, use relocation, wetland restoration, dike removal, biotechnical measures, stormwater management programs, land or easement acquisition, voluntary protection and enhancement projects, or incentive programs (WAC 173-26-221(3)(b)(i) and (vi)).
 16. Avoid structural flood control works. New or expanding development or uses in the shoreline, including subdivision of land, that would likely require structural flood control works within a river, channel migration zone, floodway, or lake should not be allowed (WAC 173-26-221(3)(c)(i)).
 17. When non-structural flood control is infeasible. New structural flood control works should only be allowed in shoreline jurisdiction when it can be demonstrated by a scientific and engineering analysis that they are necessary to protect existing development or mitigate or resolve existing stormwater problems, that negative impacts to ecological functions and priority species and habitats can be successfully mitigated so as to assure no net loss, that appropriate vegetation conservation actions are undertaken, and where non-structural flood hazard reduction measures are infeasible (WAC 173-26-221(3)(c)(ii)).
 18. Flood control works and shoreline uses, development, and modifications should be located, designed, constructed, and maintained so their resultant effects on geo-hydraulic shoreline processes will not cause significant damage to other properties or shoreline resources, and so that the physical integrity of the shoreline corridor is maintained.

19. Development proposals and restoration projects should evaluate alternative flood control measures, and are encouraged to:
 - a. plan for and facilitate returning river and stream corridors to more natural hydrological conditions (WAC 173-26-221(3)(b)(v)),
 - b. recognize that seasonal flooding is an essential natural process (WAC 173-26-221(3)(b)(v)), and
 - c. consider removal or relocation of structures in flood prone areas (WAC 173-26-221(3)(b)(vi)).

4.1.4 Archaeological and Historic Resources Policies

- A. Preservation, Restoration, Education. Whenever possible, archeological or historic sites should be preserved for scientific study and public observation. In areas known to contain significant archaeological and historic data, a condition should be placed on shoreline permits which would allow for site inspection and evaluation to ensure proper salvage of such data (1975 SMP Policy 16.a).
- B. Impact Avoidance. Due to the limited and irreplaceable nature of the resource(s), prevent the destruction of or damage to any site having historic, cultural, scientific, or educational value as identified by the appropriate authorities (including affected Tribes and the Washington State Department of Archaeology and Historic Preservation) or unidentified resources that have been inadvertently uncovered.

Any proposed site development and/or associated site demolition work should be planned and carried out so as to avoid impacts to the cultural resource or to minimize impacts and provide appropriate mitigation.
- C. Consultation. Consultation with professional archaeologists and historians is encouraged to identify areas containing potentially valuable archaeological data, and to establish procedures for salvaging data. Appropriate agencies to consult include, but are not limited to, the Confederated Tribes and Bands of the Yakama Nation, Confederated Tribes of the Colville Reservation, and the Washington State Department of Archaeology and Historic Preservation (DAHP) (1975 SMP Policy 16.b).
- D. Adjacent Cultural Site. If development or demolition is proposed adjacent to an identified historic, cultural or archaeological site, then the proposed development should be designed and operated so as to be compatible with continued protection of the historic, cultural or archaeological site (Recommended by DAHP).

4.1.5 Critical Areas Policies

Critical areas policies are included in Appendix A. Entiat Critical Areas 2012.

4.1.6 Public Access Policies

WAC 173-26-221(4)(b)Principles. Local master programs shall:

- (i) Promote and enhance the public interest with regard to rights to access waters held in public trust by the state while protecting private property rights and public safety.
 - (ii) Protect the rights of navigation and space necessary for water-dependent uses.
 - (iii) To the greatest extent feasible consistent with the overall best interest of the state and the people generally, protect the public's opportunity to enjoy the physical and aesthetic qualities of shorelines of the state, including views of the water.
- A. Variety of types of public access. Public access includes the ability of the general public to reach, touch, and enjoy the water's edge, to travel on the waters of the state, and to view the water and the shoreline from adjacent locations.
- B. Increase public access where appropriate. Entiat should seek to increase the amount and diversity of public access to shorelines consistent with its Parks, Recreation, and Open Space Plan; the natural shoreline character; property rights; public rights under the Public Trust Doctrine; and public safety.
- C. Priorities. Public access should be maintained, enhanced, and increased in accordance with the following priorities unless found infeasible:
1. Maintain existing public access sites and facilities, rights of way, and easements.
 2. Provide new or enhance existing public access opportunities on existing public lands and easements.
 3. Encourage public access to shorelines as part of shoreline development activities.
- D. Public access planning standards. Entiat should implement planning standards that are consistent with its adopted Comprehensive Plan and Parks, Recreation, and Open Space Plan. These include:
1. The City of Entiat should encourage the Renovation of City/PUD Park to include trail; swimming beach; fire pits; additional boat launches; and upgrades to existing camping, parking, and restroom facilities (Parks Plan Goal G-1).
 2. The City of Entiat should develop the planned Entiaqua trail and outdoor learning center on Entiat River (Parks Plan G-2).
 3. The City of Entiat should develop a waterfront trail to connect with trail at PUD/City Park and cross highway to Columbia Breaks Fire Interpretive Center (Parks Plan G-3).

4. The City of Entiat should develop green spaces and shelters in waterfront business district (Parks Plan G-4).
 5. The City of Entiat should create loop trail for walking, biking, and cross-country skiing (Parks Plan G-8).
- E. Safety and environment. Design of public access should be consistent with public safety and preservation/conservation of the natural amenities. Where public access is determined to be incompatible due to reasons of safety, security, or impact to the shoreline, the proponent should consider alternate methods of providing public access, such as offsite improvements, viewing platforms, separation of uses through site planning and design and restricting hours of public access. Off-site public access improvements may be allowed if such improvements would provide a greater public benefit and reduce safety and environmental impacts.
- F. Roads, streets, and alleys abutting bodies of water. Roads, streets, and alleys abutting bodies of water should be preserved, maintained, consolidated, enhanced, and/or created for public access. Vacations of roads, streets, and alleys should be discouraged and only allowed in strict compliance with RCW 35.79.035 (Streets and Alleys).
- G. Fishing easements. In consultation with the Washington Department of Fish and Wildlife, City of Entiat should review fishing easements on the Entiat River. The City should work in partnership with the Washington Department of Fish and Wildlife, Chelan County Public Utility District, land trusts, and others to improve public access to the fishing easements. Actions may include improving access on unused sites, consolidating access points for maintenance purposes, or land surplus, exchanges or purchases, etc.

4.2 Regulations

4.2.1 No Net Loss of Ecological Functions Regulations

The Shoreline Management Act (SMA) provides a broad policy framework for protecting the natural resources and ecology of the shoreline environment. The SMP Guidelines establish the standard of “no net loss” of shoreline ecological functions as the means of implementing that framework through shoreline master programs. WAC 173-26-186(8) directs that master programs “include policies and regulations designed to achieve no net loss of those ecological functions.”

Over time, the existing condition of shoreline ecological functions should remain the same as the SMP is implemented. Simply stated, the no net loss standard is designed to halt the introduction of new impacts to shoreline ecological functions resulting from new development. Both protection and restoration are needed to achieve no net loss. Restoration activities also may result in improvements to shoreline ecological functions

over time. Requirements for protection and restoration are triggered by development. Existing facilities or properties not proposing new development will not be required to participate in restoration activities, but are not precluded from doing so voluntarily.

At minimum, all project proposals must show an end result of no net loss of shoreline ecological function. Each applicant must clearly document how no net loss will be achieved. The Shoreline Administrator will determine whether the applicant's proposal meets the no net loss requirements of the Act. The City may, and applicants are encouraged to, confer with a qualified biologist, geologist, arborist, or other professional as necessary, to make the determination of no net loss if they are proposing an alternative to the general buffer and mitigation requirements of this plan. If specified buffer and mitigation requirements are followed, determination by an outside professional will not be required.

- A. When required, each applicant for a shoreline permit must also submit a fully completed SEPA environmental checklist. The administrator will determine whether the checklist identifies any potential adverse impacts to shoreline ecological function or to existing critical areas. If the proposed project shows a potential for adverse impacts to shoreline functions or critical areas, the applicant will be required to provide a detailed mitigation sequencing plan.
- B. Mitigation sequencing. When required, applicants shall create a mitigation plan which demonstrates that all reasonable efforts have been taken to mitigate potential adverse impacts to ecological function resulting from new development and redevelopment in shorelines in the following prioritized order (WAC 173-26-201(2)(e)(i)):
 - 1. Avoiding the impact altogether by not taking a certain action or parts of an action (for instance, altering the site plan or development to avoid direct impact to shoreline functions);
 - 2. Minimizing impacts by limiting the degree or magnitude of the action and its implementation, by using appropriate technology, or by taking affirmative steps, such as project redesign, relocation, or timing to avoid or reduce impacts;
 - 3. Rectifying the impact by repairing, rehabilitating, or restoring the affected environment to the conditions existing at the time of the initiation of the project;
 - 4. Reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action;
 - 5. Compensating for the impact by replacing, enhancing, or providing substitute resources or environments; and

6. Monitoring the impact and the compensation projects and taking appropriate corrective measures.
 7. Lower priority measures shall be applied only where higher priority measures are determined to be infeasible or inapplicable.
- C. Mitigation shall be required for projects within shoreline jurisdiction (including those waterward of the OHWM) that have impacts resulting in a net loss of ecological functions. All mitigation activities shall follow an approved mitigation plan.
- D. Mitigation Plan. Mitigation plan elements, including monitoring and maintenance, shall be included in the plan consistent with mitigation plan requirements outlined below:
1. The mitigation plan shall be prepared by a biologist who is knowledgeable of habitat and water quality functions in North Central Washington. The mitigation plan shall demonstrate that when implemented there shall be no net loss of ecological function. The mitigation plan shall identify how impacts from the proposed project shall be mitigated, as well as the necessary monitoring the contingency actions for continued maintenance.
 2. The mitigation plan shall contain a report, including but not limited to, the following information:
 - a. Vicinity maps , regional 1:24,000 and local 1:4,800;
 - b. Location maps at a scale sufficient to depict all features of the site;
 - c. A map or maps indicating the boundary of the habitat area, wetland, or shoreline; the width and length of all existing and proposed structures, utilities, roads, easements; wastewater and stormwater facilities; adjacent land uses, zoning districts and environmental designations;
 - d. A description of the proposed project include the nature, density, and intensity of the proposed development and the associated grading, structures, roads, easements, wastewater facilities, stormwater facilities, utilities, etc. in sufficient detail to allow analysis of such land use change upon the shoreline;
 - e. A detailed discussion of surface and subsurface hydrologic features both on and adjacent to the site where the City determines appropriate;
 - f. A description of the vegetation in the area, on the overall project site, and adjacent to the site;
 - g. A detailed description of the proposed project's effect on the area and a discussion of any federal, state, or local management

- recommendations which have been developed for the species or habitats in the area;
- h. A discussion of mitigation sequencing as described above;
 - i. A detailed discussion of on-going management practices which will protect the shoreline functions after the project site has been fully developed, including proposed monitoring, contingency, maintenance, and surety programs.
3. Prior to issuance of a certificate of occupancy or final inspection, the applicant shall provide a final as-built plan of any completed improvements authorized or required under this subsection.
 4. When compensatory measures are appropriate pursuant to the mitigation priority sequence above, preferential consideration shall be given to measures that replace the impacted functions directly and in the immediate vicinity of the impact. However, alternative compensatory mitigation within the watershed that addresses limiting factors or identified critical needs for shoreline resource conservation based on watershed or comprehensive resource management plans and/or the Shoreline Restoration Plan applicable to the area of impact may be authorized. Authorization of compensatory mitigation measures may require appropriate safeguards, terms or conditions as necessary to ensure no net loss of ecological functions (WAC 173-26-201(2)(e)(ii)(B)).
- E. Buffers. Shoreline buffers are designated to assist in the achievement of no net loss of ecological function. Buffers may be reduced as defined in the buffer reduction tables, or where mitigation plans successfully demonstrate no net loss. However, buffers shall be the primary means to preserve shoreline function and shall be minimized only where appropriate mitigation is proposed to compensate for any loss. Buffers may be eliminated for water-dependent uses, but mitigation plans must still demonstrate no net loss of ecological function. The following table establishes buffers to be measured from the OHWM for uses and developments in each environment designation.

TABLE 4.3 SHORELINE BUFFERS BY ENVIRONMENT DESIGNATION

Environment Designation	Standard Buffer	Standard Reduced Buffer	Maximum Reduced Buffer
Urban Conservancy	100'	75'	50'
Shoreline Residential	50'	37.5'	25'
Urban Parks	50'	37.5'	25'

Waterfront Business	50'	37.5'	25'
High Intensity	50'	37.5'	25'

For use of either the standard reduced buffer or the maximum reduced buffer, the applicant must submit a mitigation plan that addresses the specific habitat components and/or ecological functions that may be lost as a result of either reduction mechanism. Applicants who obtain approval for a reduction in the buffer must record the final approved buffer and corresponding conditions, including maintenance of the conditions throughout the life of the development, in a form acceptable to the City and recorded with the County Auditor.

1. **Standard Buffer Reduction.** Reductions of up to twenty-five (25) percent of the standard buffer may be approved if the applicant demonstrates to the satisfaction of the Shoreline Administrator that:
 - a. A mitigation plan, pursuant to Subsection 4.2.1 D, indicates that enhancing the buffer (by removing invasive plants, planting native vegetation, installing habitat features such as downed logs or snags, or other means) will result in a reduced buffer that functions at a higher level than the existing standard buffer; or
 - b. Conditions unique to the site, including existing uses, developments (developed prior to the adoption of this SMP), or naturally existing topographic barriers exist between the proposed development and the OHWM, which substantially prevent or impair delivery of most riparian functions from the subject upland property to the waterbody. (Permit administrator may reduce front yard and side yard setbacks in order to reduce infringement into required buffer areas.); and
 - c. The buffer has not been reduced under any other provisions of this chapter. The buffer has not been varied or reduced by any prior actions administered by the city. Sites which utilize buffer width averaging are not eligible for any future buffer width reductions under any other provisions of the Program, except as administered under shoreline variances.
2. **Buffer Averaging.** Appendix A, Section 17.10.450(C) identifies the conditions necessary to allow Wetland buffer averaging.
3. **Maximum Buffer Reduction.**
 - a. If the applicant can demonstrate that a use or development cannot be accommodated or accomplished outside of the standard or standard reduced buffer, a reduction in the buffer width not

exceeding fifty (50) percent of the required standard buffer may be approved administratively. The applicant must demonstrate need for any buffer reduction greater than 25 percent by submitting the following:

- i. A site plan showing clearly the boundaries of the parcel, shoreline jurisdiction, the standard buffer, the standard reduced buffer, and the proposed reduced buffer, yard setback, existing and proposed developments, railroad and road setbacks.
 - ii. A narrative description of the design alternatives considered as part of each mitigation sequencing step outlined in Section 4.2.1.B, and how the applicant's proposal incorporates mitigation sequencing to the maximum extent practicable.
 - iii. A narrative description of the spatial needs of the proposed use. Adequate space for a single-family residence and associated yard is considered to be available when the buildable lot depth after application of either the standard buffer or standard reduced buffer is fifty (50) feet or greater between the front yard setback line and the buffer. For other uses, the Shoreline Administrator will decide what the minimum space requirements are based on the information provided by the applicant. The approved reduction may be no more than that necessary to accommodate the allowed use.
- b. The Shoreline Administrator may approve a maximum buffer reduction according to the following review criteria:
- i. The applicant has demonstrated a hardship whereby the proposed use could not be accommodated without a reduced buffer, and the approved buffer reduction is no more than that necessary to accommodate the proposed shoreline use.
 - ii. The applicant's mitigation plan demonstrates that the selected mitigation options in Subsection 4.2.1B achieve an equal or greater protection of ecological functions than the standard buffer.
 - iii. The applicant's mitigation plan demonstrates that existing conditions on the site, including existing uses, developments (developed prior to the adoption of this SMP), or naturally

existing topographic barriers exist between the proposed development and the OHWM, substantially prevent or impair delivery of most riparian functions from the subject upland property to the waterbody.

- iv. The buffer has not been reduced under any other provisions of this chapter. The buffer has not been varied or reduced by any prior actions administered by the city. Sites which utilize buffer width averaging are not eligible for any future buffer width reductions under any other provisions of the Program, except as administered under shoreline variances.
4. Requirements to stay out of the buffer do not apply to those portions of water-dependent or direct shoreline public access development (e.g. trails leading down to fishing piers, roads to boat launches, etc.) related to improvements or uses adjacent to the water’s edge (piers, docks, or similar structures). When approved, these types of developments will still be required to follow mitigation sequencing guidelines. The applicant must provide a mitigation plan that successfully demonstrates no net loss of ecological function, overall. Where space is available, the required native vegetation shall be planted in the shoreline buffer area that is not being used for water-dependent or public access uses. Where opportunities to mitigate in kind and on site are not available or adequate, the mitigation plan may include off-site or out-of-kind mitigation, or contributions to a fee in lieu restoration program when established. When off-site mitigation is proposed, projects included in the Restoration Plan found in Appendix E of this SMP shall be considered first.

Shoreline Buffer Reduction Options		Reduction Allowance
<i>Water Related Conditions or Actions</i>		
1	Presence of non-structural or soft structural shoreline stabilization measures located at, below, or within 5 feet landward of the OHWM along at least 75 percent of the linear shoreline frontage of the subject property. This can include the removal of an existing hard structural shoreline stabilization measure and subsequent restoration of the shoreline to a natural or semi-natural state, including restoration of topography, and substrate composition. This option cannot be used in conjunction with Option 2 below.	35 percent
2	Presence of non-structural or soft structural shoreline stabilization measures located at, below, or within 5 feet landward of the OHWM along at least 25 percent of the linear shoreline frontage of the subject property. This may include the removal of an existing hard structural shoreline	20 percent

Shoreline Buffer Reduction Options		Reduction Allowance
	stabilization measure and subsequent restoration of the shoreline to a natural or semi-natural state, including creation or enhancement of nearshore shallow-water habitat, beach/substrate composition. This option cannot be used in conjunction with Option 1 above.	
3	Opening of previously piped on-site watercourse to allow potential rearing opportunities for native fish for a minimum of 25 feet in length. Opened watercourses must be provided with a native planted buffer at least 10 feet wide on both side of the stream, and must not encumber adjacent properties without express written permission of the adjacent property owner. A qualified professional must design opened watercourses. The opened watercourse shall be exempt from the buffer requirements and standards of Appendix A.	15 percent
4	Existing hard structural shoreline stabilization measures are setback from the OHWM more than five (5) feet and/are sloped at a maximum 3 vertical (v): 1 horizontal (h) angle to provide dissipation of wave energy and increase the quality or quantity of nearshore habitat.	20 percent
5	Install large woody debris (minimum three pieces), plant and maintain aquatic emergent vegetation (minimum 25 ft ²), or restore aquatic substrate (minimum 250 ft ²) depending on the site's particular ecological condition and needs.	10 percent
6	Implement any other enhancement measure indicated by the Shoreline Restoration Plan, to an extent proportional to the proposed project's impacts.	10 percent
<i>Upland Related Conditions or Actions</i>		
7	Installation of biofiltration/infiltration mechanisms in lieu of piped discharge to the shoreline waterbody, such as mechanisms that infiltrate or disperse surface water on the surface of the subject property. These mechanisms shall be sized to store a minimum of 70% of the annual volume of runoff water from the subject property, for sites with poor soils, or 99% of the annual volume of runoff water from the subject property, for sites with well-draining soils. This mechanism shall apply to sites where the total new or replaced impervious surface is less than or equal to 5,000 square feet. The mechanisms shall be designed to meet the requirements of Ecology's <i>Stormwater Management Manual for Eastern Washington</i> .	20 percent
8	Installation of pervious material for 50 percent of all new pollution generating surfaces such as driveways, parking or private roads that allows water to pass through at rates similar to pre-developed conditions.	15 percent

Shoreline Buffer Reduction Options		Reduction Allowance
9	Restoring at least 20 percent of the total lot area outside of the reduced buffer and any critical areas and their associated buffers as native vegetation.	10 percent
10	Implement any other enhancement measure indicated by the Shoreline Restoration Plan, to an extent proportional to the proposed project's impacts.	10 percent

5. Public facilities and other water-oriented uses. Consistent with the use allowances for each environment designation, other essential public facilities, public access facilities, and their accessory uses and developments should be located outside the shoreline buffer, but may be located in the shoreline buffer as set out above through the shoreline buffer reduction options. All other intrusion into the buffer areas must apply for a variance. These uses and modifications must be designed to successfully demonstrate no net loss of ecological function overall.
6. Water dependent uses. Consistent with the use allowances for each environment designation, water-dependent uses and activities may be located at the water's edge, or as prescribed by conditions added to a permit. Water dependent accessory uses, developments and activities should be located outside the standard or reduced shoreline buffer unless at least one of the following is met:
 - a. The accessory use's location in the buffer is necessary for operation of the water dependent use or activity (e.g., a road to a boat launch),
 - b. For public access to the shoreline where it does not conflict or limit opportunities for other water-oriented uses that are already established and whose use is primarily related to access to, enjoyment, and use of the water.
 - c. The applicant's lot/site has topographical constraints such that no other location outside the buffer or reduced buffer, yet within the proposed development is feasible (e.g., the water-dependent use or activity is located on a parcel entirely or substantially encumbered by the required buffer). In these cases, a shoreline variance permit is required.
 - d. All non-water-dependent developments proposed to be located closer than the shoreline buffer or reduced buffer must obtain a Shoreline Variance. Applicants are encouraged to consider the

options of buffer averaging, buffer reduction, and options of mitigation sequencing prior to applying for a Shoreline Variance.

- e. In these circumstances, these uses and modifications accessory to water dependent uses must be designed and located to ensure the development will not result in a net loss of shoreline ecological functions or have significant adverse impacts to other shoreline uses, resources, and values provided for in RCW 90.58.020, such as navigation, recreation and public access; shall minimize intrusion into the buffer; and shall also be consistent with Section 4.2.5 Public Access.
- F. Passive allowed activities. Education, scientific research, and passive recreational activities, including, but not limited to: fishing, bird watching, hiking, hunting, boating, horseback riding, skiing, swimming, canoeing, and bicycling, are allowed within shoreline jurisdiction and within established shoreline and critical area buffers provided the activity does not alter the buffers by introducing impervious surfaces; removing native vegetation; or changing existing topography, water conditions, or water sources.
- G. Site investigation allowed. Site investigative work necessary for land use application submittals such as surveys, soil logs, drainage tests and other related activities, may occur within shoreline jurisdiction and within shoreline and critical area buffers established in this SMP. In every case, buffer impacts should be avoided and/or minimized and disturbed areas shall be immediately restored.
- H. Siting of roads. Where other options are available and feasible, new roads or road expansions shall not be built within shoreline jurisdiction. Crossings, where necessary, shall cross shoreline and critical area buffers at as near right angles as possible, unless an alternate path would minimize disturbance of native vegetation or result in avoidance of other critical areas such as wetlands. If no alternative exists to placing a roadway in shoreline jurisdiction, a mitigation plan prepared by a qualified professional must be submitted, and must be consistent with the provisions of Section 4.2.1.D.
- I. Utilities. Where no other practical alternative exists to the excavation for and placement of wells, tunnels, utilities, or on-site septic systems in a shoreline and critical area buffer, these uses may be permitted if also allowed under Section 5.20, Utilities. A mitigation plan must be prepared by a qualified professional, and must be consistent with the provisions of Section 4.2.1.D.
- J. Trails. Trails and associated facilities may be permitted in shoreline buffers, but should conform to design guidelines found in Public Access sections of this SMP. A mitigation plan must be prepared by a qualified professional, and must be consistent with the provisions of Section 4.2.1.D.

K. Existing uses may continue. Existing legally established structures, uses and developments, including residential appurtenances, may be maintained, repaired, and operated within shoreline jurisdiction and within shoreline and critical area buffers established in this SMP.

1. Roads and Railways. Where a legally established road or railway transects a shoreline or stream buffer prior to the effective date of this SMP, the Shoreline Administrator may approve a modification of the minimum required buffer width to the waterward edge of the improved road or railway if the part of the buffer on the upland side of the road or railway sought to be reduced:
 - a. does not provide additional protection of the shoreline waterbody or stream; and
 - b. provides insignificant biological, geological, or hydrological buffer functions relating to the waterward portion of the buffer adjacent to the shoreline waterbody or stream.
2. Other Developments. Where an existing and legally established development occupying more than 50 percent of the width of the waterward lot transects a shoreline or stream buffer prior to the effective date of this SMP, the Shoreline Administrator may approve a modification of the minimum required buffer width to the upland edge of the waterward legal lot if the part of the buffer on the upland legal lot sought to be reduced:
 - a. does not provide additional protection of the shoreline waterbody or stream; and
 - b. provides insignificant biological, geological or hydrological buffer functions relating to the waterward portion of the buffer adjacent to the shoreline waterbody or stream.

L. Conserve vegetation. The Shoreline Management Act requires that local governments implement planning provisions that address vegetation conservation and restoration, and regulatory provisions that address conservation of vegetation; as necessary to assure no net loss of shoreline ecological functions and ecosystem-wide processes, to avoid adverse impacts to soil hydrology, and to reduce the hazard of slope failures or accelerated erosion. Shoreline developments shall address conservation and maintenance of vegetation through compliance with this Section.

1. The *City of Entiat -- Shoreline Inventory and Biologic Critical Areas Reconnaissance*, completed in August of 2009, serves as the baseline for existing vegetation on the shorelines of the City of Entiat. Development applicants are encouraged to use this baseline as a foundation for

opportunities to improve existing conditions with each development. At a minimum, developments must maintain the quantity and functional quality of shoreline vegetation identified on each site and any new vegetative growth occurring.

- a. Minimize clearing. Vegetation clearing within shoreline jurisdiction shall be limited to the minimum necessary to accommodate approved shoreline development. The mitigation plan must utilize only approved vegetation, and should be designed to compensate for temporal loss of function and address the specific functions adversely impacted by the unauthorized vegetation removal. In the case of a critical wildlife habitat corridor project, an exception to these provisions applies and a planting plan should be submitted and reviewed in order to assist the applicant's goals of non-native removal.
- b. Non-native vegetation. Hand removal or spot-spraying of invasive or noxious weeds is encouraged. The proposed removal of other non-native vegetation shall be incorporated in mitigation plans, as necessary, to prevent erosion and facilitate establishment of a stable community of native plants. In the case of a critical wildlife habitat corridor project, an exception to these provisions applies and a planting plan should be submitted and reviewed in order to assist the applicant's goals of non-native removal.
- c. Tree Pruning and Removal. Selective pruning of trees for safety or view protection is allowed if consistent with the provisions of D below. Where trees pose a significant safety hazard as indicated in a written report by a certified arborist, home safety inspector, City building inspector, or other qualified professional, they may be removed from shoreline and critical area buffers if the hazard cannot be removed by topping or other technique that maintains some habitat function. All other tree removal in shoreline jurisdiction shall be minimized through site design, and mitigated.
- d. Tree Retention. To maintain the ecological functions that trees provide to the shoreline environment, significant trees shall be retained as follows:
 - i. Within shoreline jurisdiction, significant trees shall not be removed or topped for the purpose of creating views. Tree removal activities would include direct or indirect actions, including, but not limited to: (1) clearing, damaging or poisoning resulting in an unhealthy or dead tree; (2) removal

- of at least half of the live crown; or (3) damage to roots or trunk that is likely to destroy the tree's structural integrity.
 - ii. Within any shoreline buffer, significant trees shall be retained to the maximum extent possible, except where the tree is dead, diseased, dying or hazardous as determined by a qualified professional. The applicant shall be encouraged to retain viable trees in other areas on-site.
 - iii. If removal of a significant tree in the shoreline buffer area is approved, a one-for-one replacement is required. The required minimum size of the replacement tree(s) shall be five (5) feet tall for a conifer and one and three-quarters inches (1 ³/₄) caliper for deciduous or broad-leaf evergreen tree.
 - iv. For required replacement trees, a planting plan showing location, size and species of the new trees is required. All replacement trees in the shoreline buffer must be native species.
 - v. Hydrologic connections. Protect hydrologic connections between waterbodies and associated wetlands.
- M. Cumulative effects. The cumulative effects of individual development proposals shall be identified and evaluated to assure that no net loss standards are achieved. The cumulative impacts analysis conducted by the applicant for the project should follow the framework of the cumulative impacts analysis completed for this Shoreline Master Program. Where the project deviates from the assumptions of the programmatic analysis, additional project-related analysis should be completed demonstrating how the goal of no net loss of ecological functions will be met in spite of those deviations. Depending on the project, additional mitigation may be required to offset cumulative impacts.
- N. Applicability. The provisions of this Section shall apply to any use, alteration or development within shoreline jurisdiction, whether or not a shoreline permit or written statement of exemption is required.

4.2.2 Water Quality, Stormwater, and Nonpoint Pollution Regulations

- A. Do not degrade waters. Shoreline use and development shall incorporate measures to protect and maintain surface and groundwater quantity and quality in accordance with all applicable laws (WAC 173-26-221(6)(b)(i)).
- B. Requirements for new development. New development shall provide stormwater management facilities designed, constructed, and maintained in accordance with the current Stormwater Management Manual for Eastern

Washington in effect at the time, including the use of best management practices. Deviations from these standards may be approved where it can be demonstrated that off-site facilities would provide better treatment, or where common retention, detention and/or water quality facilities meeting such standards have been approved as part of a comprehensive stormwater management plan. Additionally, new development shall implement low impact development techniques where feasible and necessary to fully implement the core elements of the Stormwater Management Manual for Eastern Washington (WAC 173-26-221(6)(b)(ii)).

- C. Maintain storm drainage facilities. Maintenance of storm drainage facilities on private property shall be the responsibility of the property owner(s). This responsibility and the provision for maintenance shall be clearly stated on any recorded subdivision, short plat, or binding site plan map, building permit, property conveyance documents, maintenance agreements and/or improvement plans.
- D. Use Best Management Practices (BMPs) for control of erosion and sedimentation shall be implemented for all development in shoreline jurisdiction through an approved temporary erosion and sediment control (TESC) plan, identified in the Stormwater Management Manual for Eastern Washington, as amended, or administrative conditions, in accordance with the current federal, state, and/or local stormwater management standards in effect at the time.
- E. Sewage management. All new developments within the shoreline jurisdiction of the City of Entiat shall be required to connect to municipal wastewater services.
- F. Materials requirements. All materials that may come in contact with water shall be constructed of materials, such as untreated wood, concrete, approved plastic composites or steel, that will not adversely affect water quality or aquatic plants or animals. Materials used for decking or other structural components shall be approved by applicable state agencies for contact with water to avoid discharge of pollutants from wave splash, rain, or runoff. Wood treated with creosote, copper chromium arsenic, or pentachlorophenol is prohibited in shoreline waterbodies (WAC 173-26-221(6)(b)(i-ii)).

4.2.3 Flood Hazard Reduction Regulations

Avoid increase in flood hazards. Development in floodplains shall not significantly or cumulatively increase flood hazards. Development shall be consistent with all local regulations including critical areas regulations (SMP Appendix A), stormwater regulations (Section 4.2.2 of this SMP), in-water structure regulations (Section 5.2.15 of this SMP), as well as guidelines of the Natural Resource Conservation Service, the U.S.

Army Corps of Engineers, and the Chelan County Multi-jurisdiction Natural Hazard Mitigation Plan (WAC 173-26-221(3)(c)(i)).

A. Channel migration zone (CMZ) Map.

1. A channel migration zone map of the Entiat River, prepared consistent with WAC 173-26-221(3)(b), is included below. This map provides complete coverage of waterbodies in the City of Entiat that have potential for channel migration. The City shall utilize this map in shoreline application reviews.
2. Applicants for shoreline development or modification may submit a site-specific channel migration zone study if they do not agree with the map below.



FIGURE 4.1 ENTIAAT RIVER CHANNEL MIGRATION ZONE

- B. Documentation. Documentation of alternate channel migration zone boundaries must be prepared consistent with WAC 173-26-221(3)(b), and may include, but is not limited to, historic aerial photographs, topographic mapping, flooding records, and field verification (based on WAC 173-26-221(3)(b)) and comments by state and federal agencies).
- C. Uses and activities authorized in floodway or CMZ. The following uses and activities may be authorized where appropriate and/or necessary within the channel migration zone (CMZ) or floodway (WAC 173-26-221(3)(c)(i)):

1. Actions that protect or restore the ecosystem-wide processes or ecological functions or development with a primary purpose of protecting or restoring ecological functions and ecosystem-wide processes.
 2. Forest practices in compliance with the Washington State Forest Practices Act and its implementing rules.
 3. Existing and ongoing agricultural practices provided that no new restrictions to channel movement occur.
 4. Mining when conducted in a manner consistent with Section 5.2.16 Mining, and the shoreline environment designation.
 5. Bridges, utility lines, public stormwater facilities and outfalls, and other public utility and transportation structures where no other feasible alternative exists or the alternative would result in unreasonable and disproportionate costs and the long-term maintenance or repair costs are not significantly different between options inside or outside of the floodway or channel migration zone. For the purposes of this section “unreasonable and disproportionate” means that locations outside of the floodway or channel migration zone would add more than 20% to the total project cost. Where such structures are allowed, mitigation shall address impacted functions and processes in the affected shoreline.
 6. Repair and maintenance of an existing legally established use, provided that channel migration is not further limited, or flood hazards to other uses increased, and that the repair and maintenance activities include appropriate protection of ecological functions.
 7. Development in incorporated municipalities and designated urban growth areas, as defined in Chapter 36.70A RCW, where structures exist that prevent active channel movement and flooding and where necessary for protection of existing structures or public safety.
 8. Modifications or additions to an existing nonagricultural legal use, provided that channel migration is not further limited and that the new development includes appropriate protection of ecological functions.
 9. Measures to reduce shoreline erosion, provided that it is demonstrated that the erosion rate exceeds that which would normally occur in a natural condition, that the measures do not interfere with fluvial hydrological and geo-morphological processes normally acting in natural conditions, and that the measures include appropriate mitigation of impacts to ecological functions associated with the river or stream.
- D. Structural flood hazard reduction measures. New structural flood hazard reduction measures in shoreline jurisdiction shall be allowed only when it can be demonstrated by a scientific and engineering analysis that they are necessary to

protect existing development, that nonstructural measures are not feasible, that impacts on ecological functions and priority species and habitats can be successfully mitigated so as to assure no net loss, and that appropriate vegetation conservation actions are undertaken consistent with SMP Section 4.2.1 No Net Loss of Ecological Function (WAC 173-26-221(3)(c)(ii)). Structural flood hazard reduction measures shall be consistent with the Chelan County Multi-Jurisdiction Natural Hazard Mitigation Plan.

- E. Placement of structural flood hazard reduction measures. New structural flood hazard reduction measures shall be placed landward of associated wetlands and designated shoreline buffers, except for actions that increase ecological functions, such as wetland restoration; provided no other alternative to reduce flood hazard to existing development is feasible. The need for, and analysis of feasible alternatives to, structural improvements shall be documented through a geotechnical analysis (WAC 173-26-221(3)(c)(iii)).
- F. Public access. See Section 4.2.5 (WAC 173-26-221(3)(c)(iv)).
- G. Gravel removal. The removal of gravel for flood management purposes shall be consistent with Section 5.2.11, Dredging and Dredge Material Disposal and Section 5.2.16, Mining, and be allowed only after a biological and geomorphological study shows that extraction has a long-term benefit to flood hazard reduction, does not result in a net loss of ecological functions, and is part of a comprehensive flood management solution. (WAC 173-26-221(3)(c)(v))
- H. New development. New development on lots containing an identified channel migration zone shall only be approved when it can be reasonably foreseeable that the development or use would not require structural flood hazard reduction measures within the channel migration zone or floodway during the life of the development or use consistent with the following (WAC 173-26-221(3)(c)(i)).
 - 1. Floodway: New development shall be subject to applicable floodway regulations in Appendix A.
 - 2. Channel Migration Zone:
 - a. New development in the channel migration zone shall be subject to Chapter 5 Geologically Hazardous Areas Regulations.
 - b. New development in the channel migration zone is also allowed subject to:
 - i. Structures are located on an existing legal lot created prior to the adoption of this SMP;
 - ii. A feasible alternative location outside of the channel migration zone is not available on-site; and
 - iii. To the extent feasible, the structure and supporting infrastructure is located the farthest distance from the

OHWL, unless the applicant can demonstrate that an alternative location is the least subject to risk.

- c. New subdivisions of lots containing an identified channel migration zone are not allowed.
- I. Vegetation conflicts with flood hazard reduction measures. In those instances where management of vegetation as required by this SMP conflicts with vegetation provisions included in state, federal, or other flood hazard agency documents governing licensed or certified flood hazard reduction measures, the vegetation management requirements of this SMP will not apply. However, the applicant shall submit documentation of these conflicting provisions with any shoreline permit applications, which shall include evidence that the flood hazard reduction measure is currently state or federally licensed or currently state or federally certified, and shall comply with all other provisions of this section and this SMP that are not strictly governed by certifying or licensing agencies requirements.

4.2.4 Archaeological and Historic Resources Regulations

- A. Known Archaeological Resources. The responsible local government shall require that permits issued in areas documented to contain archaeological resources require a site inspection or evaluation by a professional archaeologist in coordination with affected Indian tribes (WAC 173-26-221(1)(c)).
- B. Uncovered Archaeological Resources. Developers and property owners shall immediately stop work and notify the responsible local government, the Washington State Department of Archaeology and Historic Preservation, and affected Indian tribes if archaeological resources are uncovered during excavation (WAC 173-26-221(1)(c)).
- C. Historic Resources. Where an area is documented to contain historic resources, the city may require an evaluation of the resource, and appropriate conditions, which may include preservation and/or retrieval of data, proposal modifications to reduce impacts, or other mitigation authorized through the State Environmental Policy Act, or other local, state, or federal laws. Archaeological sites located both in and outside shoreline jurisdiction are subject to chapter 27.44 RCW (Indian graves and records) and chapter 27.53 RCW (Archaeological sites and records) and development or uses that may impact such sites shall comply with chapter 25-48 WAC, as well as the provisions of this master program (based on 1975 SMP Section 27.1 and WAC 173-26-221(1)).

4.2.5 Critical Areas Regulations

Regulations for Critical Areas within shoreline jurisdiction are located in Appendix A. Entiat Critical Areas 2012.

4.2.6 Public Access Regulations

The City's shoreline public access plan provides for a connected network of parks and open space connected by trails. The City's Parks, Recreation, and Open Space Plan provided in Appendix D provides more effective public access than individual project requirements for public access, as provided for in WAC 173-26-221(4)(d)(iii)(A). The City shall review shoreline developments for consistency with the Parks, Recreation, and Open Space Plan.

- A. Public and recreation shoreline uses and activities. Shoreline public access shall be required for the following shoreline uses and activities:
 - 1. Shoreline recreation pursuant to Section 5.15 (WAC 173-26-241(3)(i));
 - 2. New structural public flood hazard reduction measures, such as dikes and levees (WAC 173-26-221 (3) (c) (iv));
 - 3. Shoreline development by public entities, including local governments, port districts, state agencies, and public utility districts (WAC 173-26-221 (4) (d) (ii)); and
 - 4. New marinas when water-enjoyment uses are associated with the marina (WAC 173-26-241(3)(c)).
 - 5. New commercial or industrial use proposed for locations on land in public ownership (WAC 173-26-241(f)).
- B. Private development. Shoreline development along designated trail routes per Appendix D shall be designed to incorporate designated trail routes as part of the project.
- C. Exceptions: Public access shall not be required if an applicant/proponent demonstrates to the satisfaction of the City at least one of the criteria 1 through 7 are met and that alternatives have been considered per criteria 8 (based on WAC 173-26-221(4)(d)(iii)):
 - 1. The development consists of less than 5 dwelling units;
 - 2. Unavoidable health or safety hazards to the public exist and cannot be prevented by any practical means;
 - 3. Inherent security requirements of the use cannot be satisfied through the application of alternative design features or other solutions;
 - 4. Significant environmental impacts will result from the public access that cannot be mitigated;

5. Significant undue and unavoidable conflict between any access provisions and the proposed use and/or adjacent uses would occur and cannot be mitigated;
6. The subject site is separated from the shoreline waterbody by intervening public or private improvements such as highways, railroads, existing structures, or similar significant intervening improvements, and public access is not desirable or feasible;
7. Based on the shoreline public access plan in Appendix D, adequate public access already exists along the subject shoreline or is planned in adopted local government shoreline public access plans and there are no gaps or enhancements required to be addressed;
8. Except in the case of C1 and C7, all feasible alternatives have been exhausted, including, but not limited to:
 - a. where physical access is not feasible, providing for visual access instead;
 - b. regulating access by such means as limiting hours of use to daylight hours;
 - c. designing separation of uses and activities, i.e., fences, terracing, hedges, landscaping, signage, etc; or
 - d. provision of an off-site public access or a fee-in-lieu pursuant to Subsection 5 that allows public access at a site physically separated from, but capable of serving the proposal.

D. Off-site Public Access or Fee-in-Lieu.

1. Off-site public access may be permitted by the City where it results in an equal or greater public benefit than on-site public access, or when on-site limitations of security, environment, or feasibility are present. Off-site public access may be visual or physical in nature. Off-site public access may include, but is not limited to, enhancing a nearby public property (e.g. existing public recreation site; existing public access; road, street or alley abutting a body of water; or similar) in accordance with City standards; providing, improving or enhancing public access on another property under the control of the applicant/proponent; or another equivalent measure.
2. Instead of on-site or off-site public access improvements, the City may require or an applicant may propose a fee-in-lieu. A fee-in-lieu may be assessed through the SEPA process or RCW 82.02.020, where appropriate, such as where the off-site improvement is best accomplished by the City at a later date or better implements the City's Parks, Recreation, and Open Space Plan in Appendix D. The cost of providing the off-site public access

shall be proportionate to the total long-term cost of the proposed development. The fee-in-lieu agreements or mitigation measures shall address the responsibility and cost for operation and maintenance (based on WAC 173-26-221(4)(d)(iii)).

E. Design Standards.

1. Lake Entiat Trail. Trail widths shall be in conformance with federal Americans with Disabilities Act (ADA) requirements, American Association of State Highway Transportation Officials (AASHTO) standards, and the Lake Entiat Waterfront Master Plan and shall only be allowed if the lot size is feasible to accommodate the trail in compliance with the vegetation conservation standards as well as the above standards.
2. Entiaqua Trail. Trail widths shall be in conformance with ADA requirements; AASHTO standards; and City of Entiat adopted Park, Recreation, and Open Space Plan.
3. Entiat River Outdoor Learning Center. Trail widths shall be in conformance with approved plans and shall meet ADA and AASHTO standards.

F. Buffering Private Property. Public access facilities shall be compatible with adjacent private properties through the use of buffering or other techniques to define the separation between public and private space, including but not limited to: natural elements such as logs, vegetation, fencing, and elevation separations.

G. Connectivity. Physical public access shall be designed to connect to existing or future public access features on adjacent or abutting properties, or shall connect to existing public rights-of-way, consistent with design and safety standards.

H. Roads, Streets, and Alleys. The City may not vacate any road, street, or alley abutting a body of water except as provided under RCW 35.79.035.

I. Environmental Protection. Public access shall be designed to achieve no net loss of ecological functions. Where impacts are identified, mitigation shall be required. (WAC 173-26-221(4)(d)(iv))

J. Conditions of Approval. The City may condition public access proposals to ensure compatibility with the Parks, Recreation, and Open Space Plan in Appendix D, compatibility with existing public access or transportation facilities, address environmental conditions or environmental impacts, compatibility with adjacent properties. Conditions may include, but are not limited to the following:

1. Use materials appropriate to the character and environmental condition;
2. Include barrier free designs to meet Americans with Disabilities Act;

3. Provide auxiliary facilities such as parking, restrooms, refuse containers or other amenities;
4. Provide landscaping;
5. Provide signage with the appropriate State, County or City logo and hours of access;
6. Establish operation and maintenance responsibilities;
7. Identify dedication and recording requirements;
8. Determine timing of public access installation in relation to the construction of the proposal; and
9. Determine ongoing availability to the public or community for which it is designed.

5 Shoreline Modifications and Uses

Chapter 5 presents specific policies and regulations that apply to particular modifications of the shoreline area, developments, uses, or activities in any environment designation. It also provides policies and standards addressing preferred layouts of shoreline development and appropriate signage serving the intended use and recognizing shoreline locations.

The first section is policies. Policies are statements of principles that guide and determine present and future decisions. The second section is regulations. Regulations are rules that govern developments, uses, or activities. The Environment Designations, General Regulations, Use Matrices and Development Standards sections found in Section 3, as well as Appendices A and B, are considered part of the regulations.

5.1 Policies

5.1.1 General Upland Shoreline Modification and Use Policies

- A. Designs Avoid Sensitive Areas. Development and uses should be designed in a manner that directs land alteration to the least sensitive portions of the site to maximize vegetation conservation; minimize impervious surfaces and runoff; protect riparian, nearshore and wetland habitats; protect wildlife and habitats; protect archaeological, historic and cultural resources; and preserve aesthetic values.
- B. Location of Non-water-Oriented Accessory Uses. Non-water-oriented accessory development or use that does not require a shoreline location should be located landward of shoreline jurisdiction unless such development is required to serve approved water-oriented uses and/or developments. When sited within shoreline jurisdiction, uses and/or developments such as parking, service buildings or areas, access roads, utilities, signs, and materials storage should be located landward of shoreline, riparian and/or wetland buffers and landward of water-oriented developments and/or other approved uses (based on use preferences in RCW 90.58.020, WAC 173-26-201(2)(d), WAC 173-26-241 (2)(a)(iii) and 173-26-211(3)(b)).
- C. Minimize Impacts on Shoreline and Upland Uses. Development should be located, designed, and managed to minimize impacts on shoreline or upland uses through bulk and scale restrictions, buffers, light shielding, noise attenuation, and other measures (WAC 173-26-211(4)(a)(iv)).
- D. Vistas and Viewpoints. Vistas and viewpoints should not be degraded and visual access to the water from such vistas should not be impaired by the placement of signs (1975 SMP Policy 7c).

- E. Plan for the enhancement of impaired ecological functions where feasible and appropriate while accommodating permitted uses. As shoreline modifications occur, incorporate all feasible measures to protect ecological shoreline functions and ecosystem-wide processes.
- F. Avoid and reduce significant ecological impacts according to the mitigation sequence in WAC 173-26-201(2)(e).

5.1.2 General Aquatic Shoreline Modification and Use Policies

- A. Protect beneficial uses, including ecological functions and water-dependent uses. Shoreline modifications and uses should be designed to protect against adverse impacts to the public health, to the land and its vegetation and wildlife, and to the waters of the state and their aquatic life. Shoreline modifications and uses should be designed, located and operated in a manner that supports long-term beneficial use of the shoreline and protects and maintains shoreline ecological functions and processes. Modifications should not be permitted where it would result in a net loss of shoreline ecological functions, adversely affect the quality or extent of habitat for native species, adversely impact other habitat conservation areas, or interfere with navigation or other water-dependent uses.
- B. Minimize and mitigate unavoidable impacts. All significant adverse impacts to the shoreline should be avoided or, if that is not possible, minimized to the extent feasible and then mitigated.
- C. Protect water quality and hydrograph. Shoreline modifications and uses should be designed and managed to prevent degradation of water quality and alteration of natural hydrographic conditions.

5.1.3 Agriculture Policies

The City of Entiat has no existing agricultural properties along its shorelines. None of the current or long-term zoning plans for the City include agricultural uses within shoreline jurisdiction.

5.1.4 Aquaculture Policies

Aquaculture is the culture or farming of fish, shellfish, or other aquatic plants and animals. Aquaculture does not include the harvest of wild geoduck associated with the state managed wildstock geoduck fishery.

This activity is of statewide interest. Properly managed, it can result in long-term over short-term benefit and can protect the resources and ecology of the shoreline.

- A. **Water-dependent and preferred use.** Aquaculture is a water-dependent use and, when consistent with control of pollution and avoidance of adverse impacts

to the environment and preservation of habitat for resident or anadromous native species, is a preferred use of the shoreline (WAC 173-26-241(3)(b)).

- B. **Recognize limited availability of suitable locations.** Potential locations for aquaculture activities are relatively restricted because of specific requirements related to water quality, temperature, oxygen content, currents, adjacent land use, wind protection and navigation.
- C. **Recognize and facilitate non-commercial aquaculture.** Aquaculture can be commercial or non-commercial. Commercial aquaculture is not permitting in the City of Entiat. Non-commercial aquaculture is used for the purpose of enhancement and restoration of fish and wildlife resources. The goals and objectives of non-commercial aquaculture include, but are not limited to, supplementation, conservation, restoration, supplementation, mitigation, recreation, education, reintroduction, research, and harvest. Non-commercial aquaculture is location dependent because of the requirement for natal waters. Permitting should be streamlined for facilities that support propagation and acclimation of desirable salmonid species, particularly those covered by the Upper Columbia Salmon Recovery Plan.
- D. **Preference for lower-impact methods.** Preference should be given to those forms of aquaculture that involve lesser environmental and visual impacts, and lesser impacts to native plant and animal species. In general, projects that require either no structures or submerged structures are preferred over those that involve substantial floating structures. Projects that involve little or no substrate modification are preferred over those that involve substantial modification. Projects that involve little or no supplemental food sources, pesticides, herbicides or antibiotic application are preferred over those that involve such practices.
- E. **Protect ecological functions.** Aquaculture activities should be designed, located and operated in a manner that supports long-term beneficial use of the shoreline and protects and maintains shoreline ecological functions and processes. Aquaculture should not be permitted where it would result in a net loss of shoreline ecological functions, adversely affect the quality or extent of habitat for native species, adversely impact other habitat conservation areas, or interfere with navigation or other water-dependent uses.
- F. **Prevent cumulative adverse effects.** Aquaculture that involves risk of cumulative adverse effects on water quality, sediment quality, benthic and other aquatic organisms, and/or wild fish populations through potential contribution of antibiotic resistant bacteria, escapement of non-native species, or other adverse effects on ESA-listed species should not be permitted unless the potential benefits outweigh the potential risks as determined by the appropriate state or federal agencies..

- G. **Consult with stakeholders.** The local jurisdiction should actively seek substantive comment on any shoreline permit application for aquaculture from all appropriate Federal, State, Tribal and local agencies and the general public regarding potential adverse impacts. Comments of nearby residents or property owners directly affected by a proposal should be considered and evaluated, especially in regard to use compatibility and aesthetics.
- H. **Coordinate with Tribes.** The rights of treaty tribes to aquatic resources within their usual and accustomed areas should be addressed through the permit review process. Direct coordination between the applicant and the tribe should be encouraged.
- I. **Consider beneficial and adverse impacts.** Consideration should be given to both the potential beneficial impacts and potential adverse impacts that aquaculture development might have on the physical environment; on other existing and approved land and water uses, including navigation; and on the aesthetic qualities of a project area.
- J. **Restrictions on experimental aquaculture.** Experimental aquaculture means an aquaculture activity that uses methods or technologies that are unprecedented or unproven in the State of Washington. The technology associated with some forms of aquaculture is still experimental and in formative stages. Therefore, some latitude should be given when implementing the regulations of this section in the development of this use. However, experimental aquaculture projects in waterbodies should be limited in scale and should be approved for a limited period of time, as specified by the regulatory agency.
- K. **Protect existing aquaculture.** Legally established aquaculture enterprises, including authorized experimental projects, should be protected from incompatible uses that may seek to locate nearby. Uses or developments that have a high probability of damaging or destroying an existing aquaculture operation are not consistent with these policies.

5.1.5 Boating Facilities Policies (Marinas/Community Piers/Boat Launches)

- A. Recognize that most portions of public boating facilities are water-dependent uses. Boating facilities, including community docks, portions of marinas, and public boat launches, are water-dependent uses. When facilitating public access or providing an opportunity for substantial numbers of people to enjoy the shoreline, these uses should be given priority for shoreline location. Shorelines particularly suitable for marinas and public boat launches are limited and should be identified and reserved to prevent irreversible commitment for other uses having less stringent site requirements.

- B. Plan and coordinate marinas regionally. Regional needs for marina and boat launch facilities should be carefully considered in reviewing new proposals as well as in allocating shorelines for such development. Such facilities should be coordinated with park and recreation plans and, where feasible, collocated with other compatible water-dependent uses. Review of such facilities should be coordinated with recreation providers, including other local governments, adjacent counties, the Washington State Parks and Recreation Commission, and the Washington State Department of Natural Resources, to efficiently provide recreational resources, avoid unnecessary duplication, and minimize adverse impacts to shoreline ecological functions and processes (consistent with principles in WAC 173-26-231(2)(b, d)).
- C. Minimize modifications. Boating facilities that minimize the amount of shoreline modification, in-water structure, and overwater cover are preferred (consistent with principles in WAC 173-26-231(2)(b, d)).
- D. Balance public access and ecological functions. New marinas should provide physical and/or visual public shoreline access, particularly where water-enjoyment uses are associated with the marina, to the extent compatible with shoreline ecological functions and processes and adjacent shoreline use (WAC 173-26-241(3)(c)(iv)).
- E. Limitations on accessory uses. Accessory uses at boating facilities should be limited to water-oriented uses, or uses that provide physical and/or visual shoreline access for substantial numbers of the general public. Nonwater-dependent accessory uses should be located outside of the shoreline buffer whenever possible.
- F. Protect other water-dependent uses. Boating facilities should be located, designed, and operated so that other appropriate water-dependent uses are not adversely affected.
- G. Minimize impacts to adjacent uses and users. Boating facilities should be located, designed, constructed, and maintained to avoid or minimize adverse proximity impacts such as noise, light, and glare; aesthetic impacts to adjacent land uses; and impacts to public visual access to the shoreline.
- H. Site facilities appropriately. New boating facilities should be located only at sites where suitable environmental conditions, shoreline configuration, access, and neighboring uses are present (WAC 173-26-241(3)(c)(i)).
- I. No net loss of ecological functions. Boating facilities should be located and designed to ensure no net loss of ecological functions or other significant adverse impacts, and should, where feasible, enhance degraded and/or scarce shoreline features (WAC 173-26-241(3)(c)(vi)).

- J. Consider navigation and other recreation opportunities. Boating facilities should not unduly obstruct navigable waters and should consider adverse effects to recreational opportunities such as fishing, pleasure boating, swimming, beach walking, picnicking, and shoreline viewing.

5.1.6 Private Moorage Facilities Policies

- A. Moorage as water-dependent use. Moorage associated with a single-family residence is considered a water-dependent use provided that it is designed and used as a facility to access watercraft (WAC 173-26-231(3)(b)).
- B. Preferred moorage. To minimize continued proliferation of individual private moorage, reduce the amount of over-water and in-water structures, and reduce potential long-term impacts associated with those structures, mooring buoys are preferred over docks and shared (either joint-use docks or community docks) or public moorage facilities are preferred over single-user moorage (WAC 173-26-231(3)(b) and consistent with WAC 173-26-231(2)(b, d)).
- C. Avoid impacts to ecological functions. Moorage should be sited and designed to avoid adversely impacting shoreline ecological functions or processes, and any unavoidable impacts to ecological functions should be mitigated (WAC 173-26-231(2)(b, d) and WAC 173-26-231(3)(b)).
- D. Minimize interference with navigation and other uses. Moorage should be spaced and oriented in a manner that minimizes hazards and obstructions to public navigation rights and corollary rights thereto such as, but not limited to, fishing, swimming, and pleasure boating.
- E. Minimize size. Moorage should be restricted to the minimum size necessary to meet the needs of the proposed use. The length, width, and height of over-water structures and other developments regulated by this section should be no greater than that required for safety and practicality for the primary use (WAC 173-26-321(2)(b) and (3)(b)).
- F. Materials. Moorage should be constructed of materials that will not adversely affect water quality or aquatic plants and animals in the long term, and have been approved by applicable state agencies (WAC 173-26-321(3)(b)).

5.1.7 Recreational Development Policies

- A. Promote recreation and public access. Developments and uses should be designed and operated to provide the public with recreational areas, facilities, and access to the shorelines (based on 1975 SMP Policy 17.a).
- B. Support facilities and access. Recreational areas should be supported by multi-use trails and parking to prevent undue concentration and pressure on fragile natural areas. The trails and parking area should be planned, located, and

designed to ensure the routes will have the least possible adverse effect on unique or fragile shoreline features, will not result in a net loss of shoreline ecological functions or adversely impact existing or planned water-dependent uses. Parking is not a preferred shoreline use, and should be located only as necessary to support an authorized use, minimizing environmental and visual impacts.

- C. Pedestrian-oriented. Direct access to the water should be via designated paths, walkways, or other pedestrian-oriented features. Vehicular traffic on beaches and fragile shorelines should be prohibited (1975 SMP Policy 17.c).
- D. Grounds management. The use of fertilizers and pesticides to maintain recreational facilities such as golf courses, parks, and playfields should be closely monitored to prevent contamination of waterbodies by runoff (1975 SMP Policy 17.e). Non-chemical management methods are preferred over chemical management where feasible and practical.
- E. Prevent impact to private property. The location, design, construction and operation of recreational facilities should prevent undue adverse impacts on adjacent or nearby private properties (1975 SMP Policy 17.f).
- F. Scenic views and vistas. Scenic views and vistas should be preserved in the design of recreational facilities, wherever practical (1975 SMP Policy 17.g).
- G. Develop waterfront trail to connect with trail at PUD/City Park and cross highway to Columbia Breaks Fire Interpretive Center (Comprehensive Plan Goal 10).
- H. Develop green spaces and shelters in waterfront business district (Comprehensive Plan Goal 11).
- I. Encourage local developers and entrepreneurs to build private recreational facilities (Comprehensive Plan Land Use Policy LU 17.2).
- J. Identify and encourage the preservation of sites and structures with historical or archaeological significance, particularly those that might generate tourist appeal (Comprehensive Plan Land Use Policy LU 3.3).
- K. Support partnerships with other public agencies and private entities which provide recreational facilities within the UGA and in the broader, surrounding area (Comprehensive Plan Land Use Policy CF 1.15).

5.1.8 Residential Development Policies

- A. Compatibility with shoreline. All subdivisions and residential development should be designed at a level of site coverage and density compatible with the physical capabilities of the shoreline and water in order to minimize probabilities of damage to life, property and the environment (1975 SMP Policy 5a).
- B. Residential development, including appurtenant structures and uses, should be sufficiently set back from steep slopes and shorelines vulnerable to erosion so that

structural improvements, including bluff walls and other stabilization structures, are not required to protect such structures and uses.

- C. Cluster development. Cluster development should be encouraged outside shoreline jurisdiction wherever feasible to minimize shoreline impacts by residential development, to maintain both on-site and off-site aesthetic appeal, and to minimize disruption of the natural shoreline (1975 SMP Policy 5b).
- D. Encourage restoration and environmental design. Ecological restoration and measures to minimize environmental impacts, such as low impact development and vegetation conservation and enhancement, should be encouraged (based on principles of environmental impact mitigation in WAC 173-26-201(2)(e), vegetation conservation in WAC 173-26-221(5), low impact development principles, and example SMPs).
- E. Aesthetics. All subdivisions and residential development should be designed to adequately protect and/or improve the water and shoreline aesthetic qualities (1975 SMP Policy 5c). Plats and subdivisions should be designed, configured and developed in a manner that assures that no net loss of ecological functions results from the plat or subdivision at full build-out of all lots; and prevents the need for new shoreline stabilization or flood hazard reduction measures that would cause significant impacts to other.
- F. Overwater residential development. New over-water residential development should be prohibited (1975 SMP Policy 5d).
- G. Floating homes. New floating homes should be prohibited. Existing, legally established, floating homes may continue and should be managed in accordance with the policies on marinas and docks and applicable non-conforming regulations (1975 SMP Policy 5h and WAC 173-26-241(3)(j)).
- H. Adequate utilities. Residential development should have adequate provision for sanitary sewage disposal, storm drainage, and water supply which minimizes harmful effects on shorelines (1975 SMP Policy 5f).
- I. Focus residential development into areas with utilities and streets. Residential development should be encouraged upland of areas presently having such improvements as utilities and streets so as to minimize additional expenditures of public funds, maximize use of existing public facilities, and not decrease availability of open space (1975 SMP Policy 5g).
- J. Provide public access. New multi-unit residential development, including the subdivision of land for more than four parcels, should provide community and/or public access.
- K. Scenic views. Residential development should be designed to avoid or minimize impacts to scenic views and vistas (based on 1975 SMP Policy 5j) and:

1. Provide for an adequate mix of housing types to meet the needs of existing and future residents (Comprehensive Plan Land Use Policy LU 2.1).
2. Protect existing established neighborhoods from the disruption of incompatible uses (Comprehensive Plan Land Use Policy LU 2.6).
3. Require development standards for multi-family dwellings that include provisions for adequate, useable open space located on the project site, and for appropriate buffering methods to lessen the impact of parking, refuse storage and other facilities on-site (Comprehensive Plan Land Use Policy LU 2.8).

5.1.9 Breakwaters, Jetties, Groins, and Weirs Policies

- A. Breakwaters, jetties, groins and weirs are generally intended to protect harbors, moorages and navigation activity from wave and wind action by creating stillwater areas along shore. A secondary purpose is to protect shorelines from wave-caused erosion.
- B. Allowed circumstances. Breakwaters, jetties, groins, and weirs located waterward of the OHWM shall be allowed only where necessary to support water-dependent uses, public access, shoreline stabilization, or other specific public purpose (WAC 173-26-231(3)(d)).
- C. Regional benefit and no net loss of ecological functions. Breakwaters, jetties, groins and weirs should be permitted only for water-dependent uses when the benefits to the region outweigh short-term resource losses from such works, and only where mitigated to provide no net loss of shoreline ecological functions and processes (WAC 173-26-231(2)(b, d)).
- D. Use less-impacting alternatives. Alternative structures, including floating, portable, or submerged breakwater structures, or several smaller discontinuous structures, should be considered where physical conditions make such alternatives with less impact feasible (consistent with WAC 173-26-231(2)(b, d)).
- E. Shoreline Conditional Use Permit required. Breakwaters, jetties, groins, weirs, and similar structures should require a Shoreline Conditional Use Permit, except for those structures installed to protect or restore ecological functions, such as woody debris installed in streams (WAC 173-26-231(3)(d)).
- F. Protect critical areas. Breakwaters, jetties, groins, and weirs shall be designed to protect critical areas and shall provide for mitigation according to the sequence defined in Section 4.2.1(B).

5.1.10 Commercial & Light Industrial Development Policies

- A. Encourage water-oriented uses. Water-oriented commercial and/or light industrial developments which provide an opportunity for substantial numbers of people to enjoy the amenities of the shorelines should be encouraged to locate near the water.
- B. Nonwater-oriented commercial and/or light industrial development should be encouraged to locate landward or outside shoreline jurisdiction (1975 SMP policy 6a).
- C. Commercial and/or light industrial use preferences. Preference should be given for water-dependent commercial and/or light industrial uses above water-related uses. Water-related uses should have priority above water-enjoyment uses. All water-oriented commercial and/or light industrial uses have preference over nonwater-oriented commercial uses (WAC 173-26-241(3)(d)).
- D. Location in existing commercial and/or light industrial areas. New commercial and/or light industrial development should be encouraged to locate in those areas where current commercial and/or light industrial uses exist (1975 SMP policy 6b).
- E. Nonwater-dependent commercial and/or light industrial uses should not be allowed over water except in existing structures or in the limited instances in which they are accessory to and support water-dependent uses.
- F. Commercial and/or light industrial development should not result in a net loss of shoreline ecological functions or have significant adverse impact to other shoreline uses, resources, and values such as navigation, recreation, and public access.
- G. Parking. Parking facilities should be located landward or outside shoreline jurisdiction unless supporting an authorized use.
- H. Views. New commercial and/or light industrial development should not significantly reduce scenic vistas and views (1975 SMP policy 6d).

5.1.11 Dredging and Dredge Material Disposal Policies (based on WAC 173-26-231(2) and (3)(f))

- A. New development should be sited and designed to avoid or, if that is not possible, to minimize the need for new and maintenance dredging. Dredging for the purpose of establishing, expanding, or relocating or reconfiguring navigation channels and basins should be allowed where necessary for assuring safe and efficient accommodation of existing navigational uses and then only when significant ecological impacts are minimized and when mitigation is provided. Maintenance dredging of established navigation channels and basins should be

restricted to maintaining previously dredged and/or existing authorized location, depth, and width.

- B. Dredging of bottom materials for the primary purpose of obtaining material for landfill, construction, or beach nourishment should not be permitted except when the material is necessary for the restoration of ecological functions. When allowed, the site where the fill is to be placed must be located waterward of the ordinary high-water mark.
- C. Minor dredging. Minor dredging as part of ecological restoration or enhancement, beach nourishment, public access or public recreation should be permitted if consistent with this SMP.
- D. Disposal. Spoil disposal on land outside of shoreline jurisdiction is generally preferred over open water disposal. Disposal of dredged material on shorelands or wetlands within a river's channel migration zone should be discouraged.
- E. Cooperative management programs. Long-term cooperative management programs that rely primarily on natural processes, and involve land owners and applicable local, State and Federal agencies and tribes, should be pursued to prevent or minimize conditions which make dredging necessary.
- F. Siting and design. New development should be sited and designed to avoid or, where avoidance is not possible, to minimize the need for new maintenance dredging.
- G. Ecological impacts. Dredging and dredge material disposal shall be done in a manner that avoids or minimizes significant ecological impacts. Impacts that cannot be avoided should be mitigated in a manner that assures no net loss of shoreline ecological functions.
- H. Navigation channels and basins. Dredging for the purpose of establishing, expanding, relocating or reconfiguring navigation channels and basins should be allowed where necessary for assuring safe and efficient accommodation of existing navigational uses and then only when significant ecological impacts are minimized and when mitigation is provided. Maintenance dredging of established navigation channels and basins should be restricted to maintaining previously dredged and/or existing authorized locations, depths and widths.

5.1.12 Fill Policies (based on WAC 173-26-231(2) and (3)(c))

- A. Minimize fill and excavation. Fill and excavation should only be permitted to the minimum extent necessary to accommodate an approved shoreline use or development and with assurance of no net loss of shoreline ecological functions and processes. Enhancement and voluntary restoration of landforms and habitat are encouraged.

- B. Location. Fills and excavation should be located and developed so that water quality, hydrologic and runoff patterns are not altered.
- C. Shoreline stabilization. Fill should not be allowed where shoreline stabilization works would be required to maintain the materials placed.
- D. Restoration. Excavation and grading may be permitted landward of the OHWM of a waterbody for projects with the primary purpose of restoring ecological functions and natural character.
- E. Creation of uplands. Fill in waterbodies, floodways, channel migration zones, and/or wetlands should not be permitted for creation of new uplands, unless it is part of an approved ecological restoration activity.

5.1.13 Forest Practices Policies

No Forest resource lands exist within the Entiat urban growth boundary. Therefore, no goals and policies have been generated for forest practices.

5.1.14 Industrial Development Policies

The City of Entiat has no waterfront industrial zones. A light industrial zone exists upland of the waterfront (outside of the 200' shoreline jurisdiction). No new heavy industrial use is allowed within the City limits. Therefore, no goals and policies have been generated for industry.

5.1.15 In-Water Structures Policies

- A. Long-term compatibility. In-water structures should be planned and designed to be compatible with appropriate multiple uses of resources over the long-term, especially in Shorelines of Statewide Significance. Appropriate multiple uses include, but are not limited to, public access, recreation, and fish migration.
- B. Considerations. The location, design, construction and maintenance of in-water structures should give due consideration to the full range of public interests; watershed processes, including prevention of damage to other properties and other shoreline resources from alterations to geologic and hydrologic processes; and ecological functions, with special emphasis on protecting and restoring priority habitats and species.
- C. Siting and design. In-water structures shall be sited and designed consistent with appropriate engineering principles, including, but not limited to, guidelines of the Washington Department of Fish and Wildlife, Natural Resources Conservation Service, and the U.S. Army Corps of Engineers. Planning and design of in-water structures should be consistent with and incorporate elements from applicable watershed management and restoration plans and/or surface water management plans.

- D. Non-structural and non-regulatory alternatives. Non-structural and non-regulatory methods to protect, enhance, and restore shoreline ecological functions and processes and other shoreline resources should be encouraged as an alternative to in-water structures. Non-regulatory and non-structural methods may include public facility and resource planning, land or easement acquisition, education, voluntary protection and enhancement projects, or incentive programs.
- E. Prohibited development and uses. New or expanding development or uses in the shoreline, including subdivision of land, that would likely require structural flood control works within a stream, channel migration zone, or floodway should not be allowed.
- F. Enhance ecological function. In-water structure proposals should incorporate native vegetation to enhance ecological functions, create a more natural appearance, improve ecological processes, and provide more flexibility for long-term shoreline management. Such features include vegetated berms; vegetative stabilization including brush matting and buffer strips; and retention of existing trees, shrubs and grasses on stream banks, if possible.

5.1.16 Mining Policies

Mining activities permitted prior to the adoption of this SMP will be allowed to continue under the current permit. No future mining activities will be allowed within shoreline jurisdiction in the City of Entiat.

5.1.17 Shoreline Habitat and Natural Systems Enhancement Projects Policies (based on WAC 173-26-231(3)(g))

Shoreline habitat and natural systems enhancement and restoration projects include those activities proposed and conducted specifically for the purpose of establishing, restoring, or enhancing habitat for priority species in shorelines.

- A. Design. Restoration and enhancement of shorelines should be designed using principles of landscape and conservation ecology and should restore or enhance chemical, physical, and biological watershed processes that create and sustain shoreline habitat structures and functions.
- B. Improve shoreline ecological functions. Restoration and enhancement actions should improve shoreline ecological functions and processes and should target meeting the needs of sensitive plant, fish, and wildlife species as identified by resource agencies such as the Washington Department of Fish and Wildlife, Washington Department of Natural Resources, National Marine Fisheries Service and/or U.S. Fish and Wildlife Service.

- C. Pursue funding. The responsible local government should, and private entities are encouraged to, seek funding from State, Federal, private and other sources to implement restoration, enhancement, and acquisition projects, particularly those that are identified in the Restoration Plan of this SMP or the local watershed plans.
- D. Streamline review. The responsible local government should develop processing guidelines that will streamline the review of restoration-only projects.
- E. Coordination. Restoration and enhancement projects should be coordinated with local public utility and conservation districts.
- F. Alternative mechanisms. Allow for the use of tax incentive programs, mitigation banking, grants, land swaps, or other programs, as they are developed, to encourage restoration and enhancement of shoreline ecological functions and to protect habitat for fish, wildlife and plants.

5.1.18 Shoreline Stabilization Policies

Shoreline stabilization includes actions taken to address erosion impacts to property and dwellings, businesses, or structures caused by natural processes such as current, flood, wind, or wave action. These actions include structural and nonstructural methods. Nonstructural methods include shoreline buffers, vegetative plantings, relocation of the structure to be protected, groundwater management, planning and regulatory measures to avoid the need for structural stabilization.

Shorelines are by nature unstable, although in varying degrees. Erosion and accretion are natural processes that provide ecological functions and thereby contribute to sustaining the natural resource and ecology of the shoreline. Human use of the shoreline has typically led to hardening of the shoreline for various reasons including reduction of erosion or providing useful space at the shore or providing access to docks and piers. The impacts of hardening any one property may be minimal but cumulatively the impact of this shoreline modification is significant.

Shoreline hardening typically results in adverse impacts to shoreline ecological functions such as:

- ◆ Beach starvation. Sediment supply to nearby beaches is cut off, leading to "starvation" of the beaches for the gravel, sand, and other fine-grained materials that typically constitute a beach.
- ◆ Habitat degradation. Vegetation that shades the upper beach or bank is eliminated, thus degrading the value of the shoreline for many ecological functions, including spawning habitat for salmonids and forage fish.
- ◆ Sediment impoundment. As a result of shoreline hardening, the sources of sediment on beaches (eroding "feeder" bluffs) are progressively lost and

longshore transport is diminished. This leads to lowering of down-drift beaches, the narrowing of the high tide beach, and the coarsening of beach sediment. As beaches become more coarse, less prey for juvenile fish is produced. Sediment starvation may lead to accelerated erosion in down-drift areas.

- ◆ Exacerbation of erosion. The hard face of shoreline armoring, particularly concrete bulkheads, reflects wave energy back onto the beach, exacerbating erosion.
- ◆ Ground water impacts. Erosion control structures often raise the water table on the landward side, which leads to higher pore pressures in the beach itself. In some cases, this may lead to accelerated erosion of sand-sized material from the beach.
- ◆ Hydraulic impacts. Shoreline armoring generally increases the reflectivity of the shoreline and redirects wave energy back onto the beach. This leads to scouring and lowering of the beach, to coarsening of the beach, and to ultimate failure of the structure.
- ◆ Loss of shoreline vegetation. Vegetation provides important "softer" erosion control functions. Vegetation is also critical in maintaining ecological functions.
- ◆ Loss of large woody debris. Changed hydraulic regimes and the loss of the high tide beach, along with the prevention of natural erosion of vegetated shorelines, lead to the loss of beached organic material. This material can increase biological diversity, can serve as a stabilizing influence on natural shorelines, and is habitat for many aquatic-based organisms, which are, in turn, important prey for larger organisms.
- ◆ Restriction of channel movement and creation of side channels. Hardened shorelines along rivers slow the movement of channels, which, in turn, prevents the input of larger woody debris, gravels for spawning, and the creation of side channels important for juvenile salmon rearing, and can result in increased floods and scour.

Additionally, hard structures, especially vertical walls, often create conditions that lead to failure of the structure. In time, the substrate of the beach coarsens and scours down to bedrock or a hard clay. The footings of bulkheads are exposed, leading to undermining and failure. This process is exacerbated when the original cause of the erosion and "need" for the bulkhead was from upland water drainage problems. Failed bulkheads and walls adversely impact beach aesthetics, may be a safety or navigational hazard, and may adversely impact shoreline ecological functions.

"Hard" structural stabilization measures refer to those with solid, hard surfaces, such as concrete bulkheads, while "soft" structural measures rely on less rigid materials,

such as biotechnical vegetation measures or beach enhancement. There is a range of measures varying from soft to hard that include:

Vegetation enhancement; Upland drainage control; Biotechnical measures; Beach enhancement; Anchor trees; Gravel placement; Rock revetments; Gabions; Concrete groins; Retaining walls and bluff walls; Bulkheads; and Seawalls.

Generally, the harder the construction measure, the greater the impact on shoreline processes, including sediment transport, geomorphology, and biological functions.

- A. Ecological functions and processes. Shoreline stabilization should be located, designed, and maintained to protect and maintain shoreline ecological functions, ongoing shoreline processes, and the integrity of shoreline features. Ongoing stream or lake processes and the probable effects of proposed shoreline stabilization on other properties and shoreline features should be considered. Shoreline stabilization should not be developed for the purpose of filling shorelines.
- B. Alternatives. Structural shoreline stabilization measures should only be used when more natural, flexible, non-structural methods such as placing the development farther from the OHWM, planting vegetation, or installing on-site drainage improvements, beach nourishment and bioengineering have been determined infeasible. Alternatives for shoreline stabilization should be based on the following hierarchy of preference:
 1. No action. Allow the shoreline to retreat naturally, increase buffers, and relocate structures.
 2. Flexible defense works constructed of natural materials including soft shore protection, bioengineering, including beach nourishment, protective berms, or vegetative stabilization.
 3. Rigid works constructed of artificial materials such as riprap or concrete.
- C. Future stabilization. Structures should be located and designed to avoid the need for future shoreline stabilization where feasible. Land subdivisions should be designed to assure that future development of the created lots will not require shoreline stabilization for reasonable development to occur.
- D. Protect existing structures. New or expanded structural shoreline stabilization should only be permitted where demonstrated to be necessary to protect an existing primary structure, including residences, that is in danger of loss or substantial damage, and where mitigation of impacts would not cause a net loss of shoreline ecological functions and processes.
- E. Enhancement, restoration and remediation. New or expanded structural shoreline stabilization being established to protect project for the restoration of ecological functions for enhancement, restoration, or hazardous substance

remediation projects should only be allowed when non-structural measures, vegetation planting, or on-site drainage improvements would be insufficient to achieve enhancement, restoration or remediation objectives and the erosion control structure will not result in a net loss of shoreline ecological functions.

- F. Site-specific design. Shoreline stabilization on streams should be located and designed to fit the physical character and hydraulic energy potential of a specific shoreline reach, which may differ substantially from adjacent reaches.
- G. Public access and other uses. Shoreline stabilization should not be permitted when it interferes with public access to shorelines of the state, nor with other appropriate shoreline uses including, but not limited to, navigation or private recreation.
- H. Non-regulatory methods. In addition to conformance with the regulations in this section, non-regulatory methods to protect, enhance, and restore shoreline ecological functions and other shoreline resources should be encouraged for shore stabilization. Non-regulatory methods may include public facility and resource planning, technical assistance, education, voluntary enhancement and restoration projects, or other incentive programs.
- I. Coordination. Shoreline stabilization should be developed in a coordinated manner among affected property owners and public agencies, particularly those that cross jurisdictional boundaries, to address ecological and geo-hydraulic processes, sediment conveyance, and beach management issues. Where beach erosion threatens existing development, a comprehensive program for shoreline management should be established by the multiple affected property owners.
- J. Public or quasi-public developments. When shoreline stabilization is proven necessary, provisions for multiple use, restoration, and/or public shoreline access should be incorporated into the location, design and maintenance of shoreline stabilization for public or quasi-public developments whenever safely compatible with the primary purpose. Shoreline stabilization on publicly owned shorelines should not be allowed to decrease long-term public use of the shoreline.
- K. Materials. Materials used for construction of shoreline stabilization should be selected for long-term durability, ease of maintenance, compatibility with local shoreline features including aesthetic values, and flexibility for future uses.
- L. Adjacent properties. New development that would require shoreline stabilization which causes significant impacts to adjacent or down-current properties and shoreline areas should not be allowed.

5.1.19 Transportation and Parking Policies

- A. Circulation. Public agencies and developments should provide circulation facilities including roads, streets, alleys, pedestrian, bicycle, and public transportation facilities consistent with federal, state, or local standards and sufficient to meet adopted levels of service (WAC 173-26-241(3)(k)). Promote the improvement of transportation systems to serve present and future residential, commercial, and industrial land uses (Comprehensive Plan Policy T 2.1).
- B. Essential public facilities. Comprehensive Plans, which include Shoreline Master Programs Goals and Policies, may not preclude the siting of essential public facilities, which may include those listed in WAC 365-196-550 and the city may impose reasonable permitting requirements and require mitigation of the essential public facility's adverse effects. Essentially public facility planning and design should need to be in compliance with the policies and regulations in this SMP to the greatest extent feasible.
- C. Minimize land consumption. When transportation facilities must be located along shorelines, efforts should be made to minimize the amount of land consumed. Where feasible, such transportation facilities should be sufficiently set back so that a usable shoreline area remains (1975 SMP Policy 15a).
- D. Erosion and groundwater. Roads in shoreline areas should be designed and maintained to prevent erosion and to permit a natural movement of groundwater (1975 SMP Policy 15b).
- E. Protect shorelands. All construction should be designed to protect the adjacent shorelands from erosion, uncontrolled drainage, slides, pollution, and other factors detrimental to the environment (1975 SMP Policy 15c). Transportation and parking facilities should be planned, located, and designed where routes will have the least possible adverse effect on unique or fragile shoreline features, and will not result in a net loss of shoreline ecological functions or adversely impact existing or planned water-dependent uses.
- F. Fit topography. Road locations should be planned to fit the topography so that minimum alterations of natural conditions will be necessary (1975 SMP Policy 15d).
- G. Scenic highways and bridges. Scenic highways and major bridge crossings should have provisions for safe pedestrian and other non-motorized travel. Also, provision should be made for sufficient viewpoints, rest areas and picnic areas along shorelines of the state (based on 1975 SMP Policy 15e).
- H. Maintain old highways. Extensive loops or sections of old highways with high aesthetic quality or multi-use potential should be kept in service (based on 1975 SMP Policy 15f).

- I. Coordinate land use and transportation. Since land use and transportation facilities are so highly interrelated, the plans for each should be closely coordinated and consider shoreline goals, objectives, policies, and standards (1975 SMP Policy 15h).
- J. Parking. Ensure that adequate provisions are made for off-street parking needs associated with new development (Comprehensive Plan Policy T 2.4). Parking facilities in shorelines are not a preferred use and should be allowed only as necessary to support an authorized use. Parking facilities should be located as far inland as possible from the OHWM (1975 SMP Policy 6c).

5.1.20 Utilities Policies

- A. All utility facilities should be designed and located to assure no net loss of shoreline ecological functions, preserve the natural landscape, and minimize conflicts with present and planned land and shoreline uses while meeting the needs of future populations in areas planned to accommodate growth.
- B. Utility production and processing facilities, such as power plants and sewage treatment plants, or parts of those facilities, that are nonwater-oriented should not be allowed in shoreline areas unless it can be demonstrated that no other feasible option is available.
- C. Transmission facilities for the conveyance of services, such as power lines, cables, and pipelines, should be located outside of the shoreline area where feasible and when necessarily located within the shoreline area shall assure no net loss of shoreline ecological functions.
- D. Utilities should be located in existing rights of way and corridors whenever possible.
- E. Development of pipelines and cables on bedlands, particularly those running roughly parallel to the shoreline, and development of facilities that may require periodic maintenance which disrupt shoreline ecological functions should be discouraged except where no other feasible alternative exists. When permitted, provisions shall assure that the facilities do not result in a net loss of shoreline ecological functions or significant impacts to other shoreline resources and values.
- F. Coordination. Require timely and effective coordination for all public and private utility trenching activities (Comprehensive Plan Utilities Policy U 1.2).
- G. Meet demand for utilities. Utilities should be located to meet the needs of current underserved areas or future growth (based on 1975 SMP Policy 14d).
- H. Concurrency. Development approvals shall be subject to a requirement that utilities will be fully operational concurrently with the use and occupancy of the development (Comprehensive Plan Utilities Policy U 1.1).

- I. Use existing corridors. Intensified use of existing utility corridors should be encouraged, as opposed to the addition of new corridors. Efforts should be made to reduce the visual impact of existing utility corridors (based on 1975 SMP Policy 14c).
- J. Consolidation. Encourage the consolidation of utility facilities such as towers, poles, antennas, substation sites, trenches, easements and communication facilities where feasible (Comprehensive Plan Utilities Policy U 1.3).
- K. Minimize visual impact. Whenever utilities must be placed in a shoreline area, the location should be chosen so as to minimize their visual impact. Whenever feasible, utilities should be placed underground or designed to do minimal damage to aesthetic qualities of the shoreline area (1975 SMP Policy 14b).
- L. Upland and underwater utilities. Upland locations are recommended for utility pipelines and cables. If an underwater location becomes necessary, easements for the utility must include proper provisions to insure against substantial or irrevocable damage to the waterway or the resident aquatic ecosystems (1975 SMP Policy 14e).
- M. Erosion Control. Utility installations occurring near waterways or in areas where erosion from disturbed soils could enter surface waters shall be regulated in such a manner so as to not adversely affect water quality (Comprehensive Plan Utilities Policy U 3.2).
- N. Restoration of disturbed areas. Upon completion of installation or maintenance projects on shorelines, banks should be restored to pre-project configuration where feasible, replanted with suitable plant species, and maintained until the newly planted vegetation is established consistent with Vegetation Conservation policies and standards in Section 4.5 (1975 SMP Policy 14a). Soils disturbed by utility installation activities shall be reclaimed in a timely manner to protect water quality and revegetate fragile hillside areas (Comprehensive Plan Utilities Policy U 3.3).

5.2 Regulations

5.2.1 General Upland Shoreline Modification and Use Regulation

- A. Design features for compatibility. Shoreline use and development activities shall be designed to complement the character and setting of the property, minimize noise and glare, and avoid impacts to view corridors. Shoreline applicants shall demonstrate efforts to minimize potential impacts to the extent feasible, including (WAC 173-26-211(4)(a)(iv) and 221(4)(d)(iv)):
 - 1. Buildings shall incorporate architectural features that reduce scale such as setbacks, pitched roofs, offsets, angled facets, and recesses.

2. Building surfaces on or adjacent to the water shall employ materials that minimize reflected light.
 3. Building mechanical equipment shall be incorporated into building architectural features, such as pitched roofs, to the maximum extent possible. Where mechanical equipment cannot be incorporated into architectural features, a visual screen shall be provided consistent with building exterior materials that obstructs views of such equipment.
 4. Outdoor storage shall be screened from public view through techniques such as landscaping, berming, fencing and/or other equivalent measures.
 5. Property screening in the form of fences or berms shall not block visual access to the shoreline, and shall be subject to Section 5.1.2.D below.
- B. Preference for water-oriented facility location. Preference shall be given first to water-dependent uses, then to water-related uses and water-enjoyment uses. Shoreline developments shall locate the water-oriented portions of their developments along the shoreline and place all other facilities landward or outside shoreline jurisdiction (based on use preferences in RCW 90.58.020, WAC 173-26-241 (2)(a)(iii) and 173-26-211(3)(b)).
- C. Minimize changes to topography. Shoreline uses and modifications should be designed and managed to prevent degradation of water quality and alteration of natural hydrographic conditions. To the extent feasible, design of structures shall conform to natural contours and minimize disturbance to soils and native vegetation. Vehicle and pedestrian circulation systems shall be designed to minimize clearing, grading and alteration of topography and natural features. Roadway and driveway alignment shall follow the natural contours of the site and minimize width to the extent feasible while meeting applicable government standards (based on 1975 SMP Policy 15d as well as principles of environmental impact mitigation in WAC 173-26-201(2)(e), vegetation conservation in WAC 173-26-221(5), low impact development principles, and example SMPs).
- D. Soil disturbance. All disturbed areas shall be restored and protected from erosion using vegetation and other means.
- E. Clearing for Development of View corridors.
1. View Corridors. The development or maintenance of view corridors can provide opportunities for visual access to waterbodies associated with waterfront lots. One view corridor, limited to 25 percent of the width of the lot, or 25 feet, whichever distance is less, may be permitted per lot, when consistent with the provisions of Appendix A, Critical Areas Regulations; and this Section. A mitigation plan as required by C above must be submitted for review and approval. In addition to the submittal

of a complete mitigation plan, an applicant must submit the following materials:

- a. A graphic and/or site photos for the entire shoreline frontage which demonstrates that the existing or proposed development does or will not have a view corridor of the waterbody, taking into account site topography and the location of existing shoreline vegetation on the parcel.
 - b. Demonstration that where the applicant already has an accessible shoreline physical access corridor per the Vegetation Conservation sections of each responsible local government, the view corridor will be located over, to the maximum amount feasible, the existing shoreline physical access corridor to minimize alteration of the shoreline buffer.
2. Applications for view corridors must also be consistent with the following standards:
- a. Native vegetation removal shall be prohibited, unless the entire shoreline buffer consists of native vegetation. Under those circumstances, native vegetation removal may be allowed provided that the view corridor is located to minimize removal of native trees, shrubs, and groundcovers, in that order.
 - b. Pruning of native trees shall be conducted such that the tree's long-term health shall not be compromised. Native shrubs shall not be pruned to a height less than 6 feet. No tree topping shall occur. Pruning of vegetation waterward of the OHWM is prohibited.
 - c. Non-native vegetation within a view corridor may be removed when the mitigation plan can demonstrate a net gain in site functions, and where any impacts are mitigated.
 - d. Whenever possible, view corridors shall be located in areas dominated with non-native vegetation and invasive species.
 - e. A view corridor may be issued once for a property. No additional vegetation pruning for the view corridor is authorized except as may be permitted to maintain the approved view corridor from regrowth. Limitations and guidelines for this maintenance shall be established in the mitigation plan.
3. Where commercial, industrial, mixed use, multi-family and/or multi-lot developments are proposed, primary structures shall provide for view corridors between buildings through the use of building separation, setbacks, upper story setbacks, pitched roofs, and other mitigation. The location of sensitive view corridors may be determined through review of shoreline public access plans (Appendix D), location of Federal- or State-designated scenic highways, government-prepared view studies, SEPA documents, or applicant-prepared studies. Per WAC 173-27-180,

applicants shall provide a depiction of the impacts to views from existing residential uses and public areas (WAC 173-26- 221(4)(d)(iv)).

4. Modification of height standards. RCW 90.58.320 requires that no permit shall be issued pursuant to this chapter for any new or expanded building or structure of more than thirty-five feet above average grade level on shorelines of the state that will obstruct the view of a substantial number of residences on areas adjoining such shorelines except where a master program does not prohibit the same and then only when overriding considerations of the public interest will be served. The City may allow an increase in height above applicable SMP height standards only where the applicant can demonstrate that the views of a substantial number of residences will not be obstructed, consistent with the criteria in 2a and 2b below.
 - a. The applicant shall prepare a view analysis conducted consistent with Section 7.4.D. The analysis shall address such considerations as cumulative view obstruction within a 1,000-foot radius, with implementation of the proposed development combined with those of other developments that exceed 35-feet in height. The cumulative impact analysis shall address overall views that are lost, compromised, and/or retained; available view corridors; and surface water views lost, compromised, and/or retained. Phased developments shall provide this analysis to include all buildings proposed to be greater than 35 feet, and analyze the cumulative effect of the total project.
 - b. Applicants proposing building or structure heights above 35 feet, but consistent with underlying zoning allowances, may be approved as part of a Substantial Development Permit if the following criteria are met:
 - i. The building or structure will not impact a substantial number of residences. The applicant shall review residences involved on or in an area adjoining the project area. Public comment shall be considered in the review.
 - ii. The development will not cause an obstruction of view from public properties or a substantial number of residences. The applicant shall demonstrate through photographs, videos, photo-based simulations, or computer-generated simulations that the proposed development will obstruct less than 30% of the surface water view of the shoreline enjoyed by a substantial number of residences (which is not

already obstructed by existing development) on areas adjoining such shorelines.

- c. Building heights above 35 feet, but inconsistent with underlying zoning allowances, require authorization via a Shoreline Conditional Use Permit pursuant to Section 7.7 of this Shoreline Master Program, as well as a Variance pursuant to Title 14 of the Entiat Municipal Code (EMC).
- F. Lighting. Interior and exterior lighting shall be designed and operated to avoid illuminating nearby properties or public areas; prevent glare on adjacent properties, public areas, or roadways to avoid infringing on the use and enjoyment of such areas and to prevent hazards. Methods of controlling spillover light include, but are not limited to, limits on height of structure, limits on light levels of fixtures, light shields, setbacks, buffer areas, and screening (WAC 173-26-211(4)(a)(iv)).
- G. Sign regulations. See Appendix B. Entiat Sign Code.

5.2.2 General Aquatic Shoreline Modification and Use Regulations

These regulations apply to all modifications and uses taking place waterward of the OHWM, whether or not a shoreline permit or written statement of exemption is required.

The following regulations shall apply to in-water work, including, but not limited to, installation of new structures, repair of existing structures, restoration projects, and aquatic vegetation removal:

- A. Siting and design requirements. In-water structures and activities shall be sited and designed to avoid the need for future shoreline stabilization activities and dredging, giving due consideration to watershed functions and processes, with special emphasis on protecting and restoring priority habitat and species. Modifications and uses located in the Aquatic environment shall be the minimum size necessary.
- B. New over-water structures are only allowed for water-dependent uses, public access, or ecological restoration.
 - 1. The size of new over-water structures should be limited to the minimum necessary to support the structure's intended use.
 - 2. Multiple use of over-water facilities is encouraged.
- C. All developments and uses on navigable waters or their beds should be located and designed to minimize interference with surface navigation, to consider

impacts to public views, and to allow for the safe, unobstructed passage of fish and wildlife, particularly those species dependent on migration.

- D. Uses that adversely impact the ecological functions of critical freshwater habitats are not allowed except where necessary to achieve the objectives of RCW 90.58.020, and then only when their impacts are mitigated according to the mitigation sequencing found in Section 4.2.1, to assure no net loss of ecological functions.
 - 1.
- E. Buffers. Shoreland portions of water-dependent in-water structures, activities and uses may be located within the shoreline buffers established in this SMP.
- F. Required permits. Projects involving in-water work must obtain all applicable state and federal permits or approvals, including, but not limited to, those from the U.S. Army Corps of Engineers, Ecology, Washington Department of Fish and Wildlife, or Washington Department of Natural Resources.
- G. Timing restrictions. Projects involving in-water work shall comply with timing restrictions as set forth by state and federal project approvals.
- H. Structure removal. Removal of existing structures shall be accomplished so the structure and associated material does not re-enter the waterbody.
- I. Disposal of waste material. Waste material, such as construction debris, silt, excess dirt or overburden resulting from in-water structure installation, shall be deposited outside of shoreline jurisdiction in an approved upland disposal site. Proposals to temporarily store waste material or re-use waste materials within shoreline jurisdiction may be approved provided that use of best management practices is adequate to prevent erosion or water quality degradation.
- J. Hazardous materials. Extreme care shall be taken to ensure that no petroleum products, hydraulic fluid, fresh cement, sediments, sediment-laden water, chemicals, or any other toxic or deleterious materials are allowed to enter or leach into the waterbody during in-water activities. Necessary refueling of motorized equipment, other than watercraft, shall be done as far from the adjacent waterbody as is possible. Appropriate spill clean-up materials must be on-site at all times, and any spills must be contained and cleaned immediately after discovery.
- K. Prevent siltation of adjacent areas. In-water work shall be conducted in a manner that causes little or no siltation to adjacent areas. A sediment control curtain shall be deployed in those instances where siltation is expected. The curtain shall be maintained in a functional manner that contains suspended sediments during project installation.
- L. Below-OHWM excavations. Any trenches, depressions, or holes created below the OHWM shall be backfilled prior to inundation by high water or wave action.

- M. Concrete management. Fresh concrete or concrete by-products shall not be allowed to enter the waterbody at any time during in-water installation. All forms used for concrete shall be completely sealed to prevent the possibility of fresh concrete from entering the waterbody.
- N. Protection of bank and vegetation. Alteration or disturbance of the bank and bank vegetation shall be limited to that necessary to perform the in-water work. All disturbed areas shall be restored and protected from erosion using vegetation or other means.
- O. Trash removal required. All trash and unauthorized fill, including concrete blocks or pieces, bricks, asphalt, metal, treated wood, glass, and paper, found below the OHWM at the time of project implementation shall be removed if the project includes use of equipment suited for that purpose. Where the trash or fill is visibly providing some habitat function, consultation with Washington Department of Fish and Wildlife and/or the U.S. Army Corps of Engineers should occur before removal. Disposal should occur in an approved upland disposal location, landward of the OHWM and the channel migration zone. See Sections 5.2.11, Dredging and Dredge Material Disposal and 5.2.12, Fill for additional policies and regulations regarding dredging, fill and disposal.
- P. Notification when fish harmed. If at any time, as a result of in-water work, fish are observed to be in distress or killed, immediate notification shall be made to appropriate state or federal agency(ies), including the Washington Department of Fish and Wildlife, National Marine Fisheries Service and/or U.S. Fish and Wildlife Service.
- Q. Notification of water quality problems. If at any time, as a result of in-water work, water quality problems develop, immediate notification shall be made to the appropriate state or federal agency(ies), including Ecology, National Marine Fisheries Service and/or U.S. Fish and Wildlife Service.
- R. Retain natural features. Natural in-water features such as snags, uprooted trees, or stumps should be left in place unless it can be demonstrated that they are actually causing bank erosion, higher flood stages, or a hazard to navigation or human safety.
- S. Floatation materials. Floatation material (floats, buoys) must be encapsulated within a shell that prevents breakup or loss of the floatation material into the water, and is not readily subject to damage by ultraviolet radiation or abrasion. During maintenance, existing un-encapsulated floatation material must be replaced.
- T. Anchors. Floats, rafts and mooring buoys must use helical screw anchors or other embedded anchors and midline floats or other technologies to prevent anchors or

lines from dragging or scouring. If the substrate is too hard, a 5-gallon bucket filled with cured concrete may be used.

- U. Mitigation. All aquatic shoreline modifications and uses are subject to the mitigation sequencing requirements in Section 4.2.1, No Net Loss of Ecological Function, with appropriate mitigation required for any unavoidable impacts to ecological functions. If critical areas in shoreline jurisdiction are impacted, the project is also subject to relevant requirements of Appendix A, Critical Areas Regulations.

5.2.3 Agriculture Regulations

The City of Entiat has no existing agricultural properties along its shorelines. None of the current or long-term zoning plans for the City include agricultural uses within shoreline jurisdiction. New agricultural uses are prohibited except those associated with private residential gardening uses.

5.2.4 Aquaculture Regulations

Aquaculture is the culture or farming of food fish, shellfish, or other aquatic plants and animals.

A. Location.

1. Water-dependent portions of non-commercial aquaculture facilities and their necessary accessories may be located waterward of the OHWM or in the shoreline buffer. Water intakes and discharge structures, water and power conveyances, and fish collection and discharge structures are all considered water-dependent or accessory to water-dependent.
2. All other elements of commercial and non-commercial facilities shall be located outside the shoreline buffer, unless proximity to the water-dependent project elements is critical to the successful implementation of the facility's purpose.
3. Sites shall be selected to avoid and minimize the need for and degree of floodplain or floodway alteration, channel migration zone alteration, shoreline stabilization, native vegetation removal, and/or wetland alteration. Recognizing the limited number of sites that are suitable for non-commercial aquaculture, applicants for non-commercial aquaculture operations shall only be required to demonstrate that the location of the proposed facilities on the available site avoids and minimizes impacts to any on-site critical areas and habitats to the maximum extent feasible.
4. To the extent that a location in channel migration zones, floodplains or floodways, or wetlands is necessary for non-commercial aquaculture

facilities, low-intensity, moderate-intensity and high-intensity aquaculture is preferred in that order as defined in Chapter 8.

- B. **Substrate modification.** Aquaculture that involves substantial aquatic substrate modification or sedimentation through dredging, trenching, digging, or other similar mechanisms, shall not be permitted in areas where the proposal would have long-term adverse impacts on important fish or wildlife habitats. If substrate modification will not have long-term adverse impacts or the adverse impacts will be short-term, the applicant shall further demonstrate that the degree of proposed substrate modification is the minimum necessary for feasible aquaculture operations at the site.
- D. **Agency review.** All aquaculture projects shall be reviewed by local, State and Federal agencies, and FERC-licensed hydro-projects.
- E. **New aquatic species.** New aquatic species that were not previously found or cultivated in Chelan County shall not be introduced into fresh waters without prior written approval of the Director of the Washington Department of Fish and Wildlife and the Director of the Washington Department of Health.
- F. **Fish kill.** In the event of a fish kill at the site of a net pen facility, the aquaculture operator shall immediately report to the Chelan-Douglas Health District and Washington Department of Fish and Wildlife stating the cause of death and shall detail remedial action(s) to be implemented to prevent reoccurrence.
- G. **U.S. Coast Guard requirements.** All floating and submerged aquaculture structures and facilities in navigable waters shall be marked in accordance with U.S. Coast Guard requirements.
- H. **Coordination with Tribes.** The rights of treaty tribes to aquatic resources within their usual and accustomed areas shall be addressed through direct coordination between the applicant and the affected tribe(s) during the permit review process.
- I. **Submerged and floating structures.** The installation of submerged structures and floating structures shall be allowed only when the applicant demonstrates that no alternative method of operation is feasible.
- J. **Potential impacts.** If uncertainty exists regarding potential impacts of a proposed aquaculture activity, and for all experimental aquaculture activities, baseline and periodic operational monitoring by a qualified professional may be required, at the applicant's expense, and shall continue until adequate information is available to determine the success of the project and/or the magnitude of any probable significant adverse environmental impacts. Aquaculture operators may submit monitoring reports prepared by qualified professional as part of

monitoring required by other state or federal agencies. Permits for such activities shall include specific performance measures and provisions for adjustment or termination of the project at any time if monitoring indicates significant, adverse environmental impacts that cannot be adequately mitigated.

- K. **Over-water structures.** For aquaculture projects using over-water structures, storage of necessary tools and apparatus waterward of the OHWM shall be limited to containers of not more than 3 feet in height, as measured from the surface of the raft or dock; provided that, in locations where the visual impact of the proposed aquaculture structures will be minimal, the shoreline administrator may authorize storage containers of greater height. In such cases, the burden of proof shall be on the applicant. Materials that are not necessary for the immediate and regular operation of the facility shall be stored outside of the shoreline buffer if feasible.
- L. **Permanent instream facilities.** Permanent instream facilities must be properly anchored or keyed to prevent the channel from migrating around it and causing erosion or creating a safety hazard, and must evaluate and mitigate any potential adverse effects on adjacent properties upstream and downstream.
- M. **Product processing.** No processing of any aquaculture product, except for the sorting or culling of the cultured organism and the washing or removal of surface materials or organisms after harvest, shall occur in or over the water unless specifically approved by permit.
- N. **Waste disposal.** Aquaculture wastes shall be disposed of in a manner that will ensure strict compliance with all applicable governmental waste disposal standards, including, but not limited to, the Federal Clean Water Act, Section 401, and the Washington State Water Pollution Control Act (RCW 90.48).
- O. **Construction, maintenance and bonding.** Aquaculture structures and equipment shall be of sound construction and shall be so maintained. Abandoned or unsafe structures and/or equipment shall be removed or repaired promptly by the owner. Where any structure might constitute a potential hazard to the public in the future, the City of Entiat may require the posting of a bond commensurate with the cost of removal or repair.

5.2.5 Boating Facilities Regulations (Marinas/Community Piers/Boat Launches)

Boating facilities, including marinas, and public boat launches shall be subject to the regulations of this Section. Buoys associated with these facilities are also subject to these policies and regulations, as well as the general location and design standards found in Section 5.2.6.F. Regulations for private moorage facilities, including community docks and boat launches, are located in Section 5.2.6, Private Moorage Facilities.

All boating facilities that extend onto State-owned aquatic lands must also comply with Washington Department of Natural Resources standards and regulations.

A. Location Standards (based on WAC 173-26-241(3)(c)(i, ii, iv)).

1. Boating facilities shall not be permitted within the following shoreline habitats because of their scarcity, biological productivity, and sensitivity, unless no alternative location is feasible, in which case a shoreline conditional use permit is required, the project would result in a net enhancement of shoreline ecological functions, and the proposal is otherwise consistent with this SMP:
 - a. Wetlands with emergent vegetation (marsh type areas), or
 - b. Spawning and holding areas for anadromous fish.
2. New boating facilities shall not be permitted in areas of active channel migration, areas where long-term maintenance dredging will be required, where a flood hazard will be created, or where loss of shoreline ecological functions and processes cannot be mitigated.
3. Waterward access to boating facilities shall not be located within 100 feet of beaches commonly used for swimming, valuable fishing areas, or commercial navigation areas, unless no alternative boating facilities and no alternative location exists and mitigation is provided to minimize impacts to such areas and protect the public health, safety, and welfare.
4. Boating facilities shall be located only where adequate utility services are available, or where they can be provided concurrent with the development.
5. Long-term boat storage is prohibited within shoreline jurisdiction.

B. Facility Design.

1. Consistent with requirements for mitigation sequencing in Section 4.2.1, No Net Loss of Ecological Function and provisions in Section 5.2.2, General Aquatic Shoreline Modification and Use Regulations of this SMP, all public and private boating facilities shall be designed and located to avoid and minimize impacts. All unavoidable impacts must be mitigated.
2. All public boating facilities, including marinas, and boat launches shall be the minimum size necessary to accommodate the anticipated demand. Specifically, the amount of overwater cover, the size and number of in-water structures, the waterward length of the facility, and the extent of any necessary associated shoreline stabilization or modification shall be minimized. Specific sizing of all public boating facility components shall be based on the results of the analyses conducted under Subsection F below, with the following limitations:

3. Design of ramps, piers, floats, and all other over-water boating structures will be subject to the requirements of the Corps of Engineers at the time of application. All over-water structures must comply with Federal regulations and permitting requirements.
 4. New over-water residences, including floating homes, are not a preferred use and shall be prohibited.
- C. Site Design and Operation.
1. Boating facilities shall be designed so that lawfully existing or planned public shoreline access is not blocked, obstructed, nor made dangerous (WAC 173-26-241(3)(c)(i, iv)).
 2. Marinas and boat launches shall provide physical and/or visual public access for as many water-oriented recreational uses as possible, commensurate with the scale of the proposal. Features for access could include, but are not limited to, walk-on access, fishing platforms, and underwater diving and viewing platforms.
 3. Public and community access areas shall provide space and facilities for physical and visual access to waterbodies, including feasible types of shore recreation.
 4. Covered moorage, including watercraft lift canopies, is prohibited (consistent with WAC 173-26-231(2)(b) and WAC 173-26-241(3)(c)(vi)).
 5. Accessory uses at marinas or boat launches shall be limited to water-oriented uses or uses that support physical or visual shoreline access for substantial numbers of the general public. Accessory development may include, but is not limited to, parking, non-hazardous waste storage and treatment, stormwater management facilities, and utilities where these are necessary to support the water-oriented use.
 6. Boating facilities shall be located where water depths are adequate to avoid the need for new and maintenance dredging and thereby minimize potential loss of shoreline ecological functions or processes.
 7. Width, length, and slip numbers for public and private piers and marinas shall be based on a public needs analysis and /or market demand analysis.
- D. Parking and Vehicle Access (WAC 173-26-241(3)(c)(i)).
1. Parking facilities shall meet zoning standards; provided that, at a minimum, one (1) vehicle space shall be maintained for every four (4) moorage spaces and for every 400 square feet of interior floor space devoted to accessory retail sales or service use. Bicycle parking shall be provided commensurate with the anticipated demand.

2. The traffic generated by such a facility must be accommodated by the streets serving the proposed facility in accordance with responsible local government adopted levels of service.
 3. Parking that does not require a shoreline location in order to carry out its functions shall:
 - a. Be sited outside of shoreline jurisdiction unless no feasible alternative location exists; or
 - b. Be planted or landscaped, preferably with native vegetation, to provide a visual and noise buffer for adjoining dissimilar uses or scenic areas;
 - c. Observe critical area and shoreline buffers; and
 - d. Be designed to incorporate low-impact development practices, such as pervious surfaces and bioswales, to the extent feasible.
 4. At public boat launches, trailer parking spaces at least 10 feet by 40 feet shall be provided commensurate with projected demand.
- E. Waste Disposal (WAC 173-26-241(3)(c)(ii, vi)).
1. Discharge of solid waste or sewage into a waterbody is prohibited. Garbage or litter receptacles shall be provided and maintained by the operator at several locations convenient to users. Marinas shall provide adequate restroom and sewage disposal facilities (pump out, holding, and/or treatment facilities) in compliance with applicable health regulations.
 2. Marina operators shall post all regulations pertaining to handling, disposal, and reporting of waste, sewage, fuel, oil, or toxic materials where all users may easily read them.
 3. Fail-safe facilities and procedures for receiving, storing, dispensing, and disposing of oil or hazardous products, as well as a spill response plan for oil and other products, shall be required of new marinas and expansion or substantial alteration of existing marinas. Compliance with Federal or State law may fulfill this requirement. Handling of fuels, chemicals, or other toxic materials must be in compliance with all applicable Federal and State water quality laws as well as health, safety, and engineering requirements. Rules for spill prevention and response, including reporting requirements, shall be posted on site.
- F. Submittal Requirements.
1. Applicants shall provide an assessment of market demand for new or expanded boating facilities, including, but not limited to, the following: (consistent with WAC 173-26-231(2)(b))

- a. The total amount of moorage proposed (except for boat launch proposals);
 - b. The proposed supply, as compared to the existing supply, within the service range of the proposed facility, including vacancies or waiting lists at existing facilities;
 - c. The expected service population and boat ownership characteristics of the population; and
 - d. Existing approved facilities, or pending applications within the service area of the proposed new facility.
2. Applicants for new or expanded boating facilities shall provide habitat surveys, critical area studies, and mitigation plans consistent with Section 4.2.1, No Net Loss of Ecological Function and Appendix A, Critical Areas Regulations. The mitigation plan shall discuss how the proposed project avoids, minimizes, or mitigates adverse impacts consistent with the facility's sizing needs, which are to be based on the results of any habitat survey/critical area study and the market demand analysis prepared under F.1 above. A slope bathymetry map may be required when deemed beneficial by the Shoreline Administrator for the review of the project proposal.
 3. Applicants for new or expanded boating facilities shall provide an assessment of existing water-dependent uses in the vicinity, including, but not limited to, navigation, fishing, hunting, pleasure boating, swimming, beach walking, picnicking, and shoreline viewing and document potential adverse impacts and mitigating measures. The City will assist the applicant in identification of area water-dependent uses. Impacts on these resources shall be considered in review of proposals and specific conditions to avoid or minimize impacts may be imposed.
 4. New boat launches shall be approved only if they provide public access to public waters that are not adequately served by existing access facilities, or if use of existing facilities is documented to exceed the designed capacity. Prior to providing boat launches at a new location, documentation shall be provided demonstrating that expansion of existing launch facilities would not be adequate to meet demand (consistent with WAC 173-26-231(2)(b)).

5.2.6 Private Moorage Facilities Regulations

The purpose of this section is to provide regulations for the location and design of private docks (serving up to four single-family residences), community docks and piers (serving multi-family developments of five or more units), boatlifts, swim floats, buoys,

and moorage piles. Dock is a general term for the structure or group of structures that provides boat moorage or other uses. A dock may be made up of piers (which are structures on fixed piles) and floats (which float on the water's surface and are typically attached to piles so that they may rise and fall with changes in the water's elevation). Swim floats are addressed in Section 5.2.6(G) below.

All moorage facilities that extend onto State-owned aquatic lands must also comply with Washington Department of Natural Resources standards and regulations.

- A. Location standards. Docks, swim floats, buoys, watercraft lifts, and moorage piles shall be located according to the following criteria:
 - 1. Docks, boatlifts, swim floats, buoys, watercraft lifts, and moorage piles shall be sited to avoid adversely impacting shoreline ecological functions or processes (WAC 173-26-321(2)(d)).
 - 2. Docks, boatlifts, swim floats, buoys, watercraft lifts, and moorage piles shall be spaced and oriented in a manner that minimizes hazards and obstructions to public navigation rights and corollary rights thereto such as, but not limited to, fishing, swimming, and pleasure boating.
 - 3. Docks, boatlifts and private boat launches are prohibited on the Entiat River. Covered docks or other covered structures, are not permitted waterward of the OHWM (WAC 173-26-321(2)(b, d)).
 - 4. Docks, boatlifts, swim floats, buoys, watercraft lifts, and moorage piles shall only be approved as an accessory to an existing principle permitted and established use, or may be permitted concurrently with a principle use.
- B. General design standards. Docks, boatlifts, swim floats, watercraft lifts, and moorage piles shall be designed according to the following criteria:
 - 1. If moorage is to be provided as part of a new residential development of two or more dwelling units or lots, joint-use or community dock facilities shall be required, when feasible, rather than allow individual docks for each residence. New residential developments shall contain a restriction on the face of the plat prohibiting individual docks. A site for shared moorage should be owned in undivided interest by property owners or managed by the homeowner's association as a common easement within the residential development within the subdivision. Community dock facilities shall be available to property owners in the residential development for community access. If shared moorage is provided, the applicant shall file at the time of building permit submittal for the dock a legally enforceable joint use agreement or other legal instrument that, at a minimum, addresses the following:
 - a. Provisions for maintenance and operation;
 - b. Easements or tracts for community access; and

- c. Provisions for joint or community use for all benefiting parties.
 2. All over- and in-water structures shall be constructed and maintained in a safe and sound condition. Abandoned or unsafe structures or materials, including treated wood, pilings, derelict structures, vessels, buoys, and equipment, shall be repaired promptly by the owner or removed.
 3. Lighting associated with overwater structures shall be beamed, hooded or directed to avoid causing glare on adjacent properties or waterbodies. Illumination levels shall be the minimum necessary for safety (WAC 173-26-321(2)(b, d)).
 4. Temporary moorages shall be allowed for vessels used in the construction of shoreline facilities. The design and construction of temporary moorages shall be such that upon termination of the project, the aquatic habitat in the affected area can be returned to its original (pre-construction) condition within one year at no cost to the environment or the public.
 5. No skirting is allowed on any structure (WAC 173-26-321(2)(b, d)).
 6. If a dock is provided with a safety railing, such railing shall not exceed 36 inches in height and shall be an open framework, following appropriate safety standards in accordance with the IBC, that do not unreasonably interfere with shoreline views of adjoining properties.
 7. Moorage facilities shall be marked with reflectors, or otherwise identified to prevent unnecessarily hazardous conditions for water surface users during the day or night. Exterior finish of all structures shall be generally non-reflective.
 8. Private moorage for float planes may be permitted accessory to existing or concurrently proposed moorage where construction would not adversely affect shoreline functions or processes, including wildlife use, or interfere with navigation. Mitigation may be required to compensate for the greater intensity of activity associated with the use.
- C. Single or Joint-use Dock dimensional and materials standards. The following dimensional standards shall apply to all new docks serving four or fewer single-family residences. Deviations from the dimensional standards must be approved through a Shoreline Variance.
1. Width.
 - a. Piers and ramps shall not exceed 4 feet in width. Floats shall not exceed 8 feet in width. Pier and ramp widths may be increased to 5 feet when the applicant can demonstrate a specific need for access consistent with Americans with Disabilities Act requirements and if all other State and Federal permits are obtained.

- b. Fingers shall not exceed 4 feet in width.
- 2. Length.
 - a. Piers and/or ramps shall extend at least 20 feet perpendicular from the OHWM.
 - b. Floats may not exceed 20 feet in length. The length of the pier must be sufficient to extend the float such that water depth at the landward edge of floats is sufficient for safe boat moorage, and must be at least 20 feet long.
- 3. Area.
 - a. The area of new docks shall be limited by the maximum width and length allowed in Section 5.14.2.C.1 and Section 5.14.2.C.2. Only one float is allowed per single-use dock. A maximum of two floats is allowed for joint-use docks.
- 4. Height. The bottom of any piers or the landward edge of any ramp must be at least 2 feet above the OHWM. The freeboard height on all floats must be at least 10 inches.
- 5. Dock Support Piles.
 - a. Piling shall be structurally sound and cured prior to placement in the water.
 - b. Pilings shall not be treated with pentachlorophenol, creosote, or comparably toxic compounds.
 - c. Pilings shall not extend beyond the end of the dock.
 - d. Pilings shall not exceed 4 inches in diameter. If a piling is encased in a sleeve, the piling plus sleeve diameter shall not exceed 5 inches. Piles up to 8 inches in diameter may be approved by the Shoreline Administrator without a Shoreline Variance if the designing engineer documents need for larger piles for safety or structural reasons.
 - e. Pilings or piling sleeves shall be white in color.
 - f. Pilings shall be spaced at least 18 feet apart on the same side of any component of the pier or float. The pier and floats are separate components. Closer pile spacing may be approved by the Shoreline Administrator without a Shoreline Variance if the designing engineer documents need for reduced pile spacing for safety or structural reasons.
 - g. A maximum of 10 piles per overwater structure is permitted, unless reduced pile spacing consistent with subsection F above creates a need for additional piles.
- 6. Spacing.

- a. Overwater structures, including any accessory watercraft lifts, shall be spaced a minimum of 10 feet from the side property lines. Joint-use structures may abut or overlap property lines provided the adjacent property owners have mutually agreed to the structure location, and the agreement is recorded through contract or covenant with the County Auditor's Office.
- b. For those new docks located adjacent to larger existing overwater structures, such as marinas or community docks, the responsible local government may require a greater separation between moorage structures to reduce potential navigation and use conflicts.
- c. No new structure may be installed within 100 feet of the outlet of any river or stream.

7. Decking/Materials.

- a. Grating or clear translucent material shall cover the entire surface area of the pier, ramp and/or float. The open area of grating shall be at least 60% and clear translucent materials shall have greater than 90% light transmittance as rated by the manufacturer.
- b. Float materials contacting the water shall be white in color or transparent.
- c. Flotation materials shall be permanently encapsulated.

D. Community Piers.

- 1. Community piers shall be no wider than 8 feet.
- 2. Community piers and marinas shall not extend more than 200 feet perpendicular to the OHWM without a Shoreline Variance unless additional length is needed to reach 12 feet of moorage depth. Piers may be no greater than 1/3 the width of the water body measured perpendicular from the applicant's shoreline. The extra length will not be allowed if the extension would interfere with navigation or other public uses of the water.
- 3. Community piers shall be designed to accommodate no more than 1 boat per waterfront residential unit, or residential unit that shares a legal interest in a community waterfront parcel, served by the pier. One additional boat moorage location for guests may be included in the design for every ten waterfront residential units served, with a minimum of one guest location for developments under ten waterfront units and rounding to the nearest whole number for other fractions of ten waterfront units.

- E. Mooring piles. Mooring piles are located adjacent to docks to provide a supplementary point to which a boat could be tied for additional security and

stability. They are preferred over fingers or other over-water structures that often serve the same purpose, and are not independently locations for moorage. Mooring piles are not allowed in addition to buoys. Mooring piles may be allowed as an accessory to docks, provided:

1. All piles shall be located not farther than 10 feet to the side of a dock, and must be at least 10 feet from side property lines.
2. In no case may a pile be placed farther waterward than the end of the dock.
3. The height of the piles shall be between 2 and 6 feet above the OHWM.

F. Mooring Buoys.

1. Each waterfront single-family residence or parcel may be allowed one moorage buoy in addition to a dock on the Columbia River.
2. Mooring buoys shall be placed at a distance specified by State and Federal agencies with jurisdiction to avoid nearshore habitat and to minimize obstruction to navigation. However, buoys shall not extend farther waterward of the OHWM than 200 feet and no closer than 50 feet, and shall be anchored at least 25 feet from side property lines or at the center of a parcel when the lot is less than 50 feet wide. Private buoys shall not be placed within 100 feet of a public facility or park.
3. At a minimum, the buoy shall be placed so that the boat will not ground at any time and is in water at least 7 feet deep at ordinary high water (based on Corps Programmatic and DNR regulation).
4. A radius of 100 feet from the proposed buoy shall be clear of existing buoys, docks, and other hazards (DNR regulations).
5. A mooring buoy shall secure no more than two boats.
6. Anchor, buoy, and moored vessel are not located over or within 25 feet of vegetated shallows (except where such vegetation is limited to State-designated noxious weeds).
7. Anchor, buoy, and moored vessel are not to be located over or within 300 feet of spawning habitat for listed or proposed fish species, or over or within 25 feet of spawning habitat for other native fish species.
8. Anchors should be helical screw anchors or other embedded anchors. If substrate is too hard, a 5-gallon bucket filled with cured concrete may be used. Other design features shall meet Washington Department of Fish and Wildlife, U.S. Army Corps of Engineers and/or Department of Natural Resources standards.

G. Swim floats.

1. Private swim floats should be no longer than 8 feet and no wider than 8 feet.

2. Where private swim floats are allowed, they must utilize the least impacting anchor method available and suited to the site-specific location. Anchors and other design features shall meet Washington Department of Fish and Wildlife and/or Department of Natural Resources standards.
3. Swim floats shall be placed at a distance specified by State and Federal agencies to avoid nearshore habitat and to minimize obstruction to navigation, and must be located at least 10 feet from side property lines.
4. Only one swim float may be approved per shoreline fronting lot. Private swim floats on the Columbia River may only be approved when no other overwater structures are present. Swim floats supplementary to an existing dock may be approved on Lake Chelan and other waterbodies only when necessary for safety or to accommodate the expected level of swim use.

H. Mitigation.

1. Consistent with the mitigation sequencing steps outlined in Section 4.2.1, No Net Loss of Ecological Function, new or expanded overwater and in-water structures, including watercraft lifts, should be first designed to avoid and minimize impacts, prior to pursuing mitigation (WAC 173-26-321(3)(b)).
2. Mitigation proposals shall provide one unit of mitigation for each unit of lost function unless justified as outlined in regulation 4.2.1.D. The mitigation provided shall be consistent with Section 4.2.1, No Net Loss of Ecological Function. The proposed mitigation plan shall include a discussion of how the proposed mitigation adequately compensates for any lost functions. Applicants should consult with other permit agencies, such as Washington Department of Fish and Wildlife, Department of Ecology, and/or U.S. Army Corps of Engineers, for additional specific mitigation requirements.
3. Appropriate mitigation may include one or more of the following measures, or other measures when consistent with objective of compensating for ecological function impacts:
 - a. Removal of any additional existing over-water and/or in-water structures that are not the subject of the application or otherwise required to be removed.
 - b. For dock additions, partial dock replacements or other modifications approved under this section, replacement of areas of existing solid over-water cover with grated material or use of grating on those altered portions of piers if they are not otherwise required to be grated .

- c. When plantings are chosen as mitigation, they should be placed in the established buffer or riparian area. Planting shall consist of trees and shrubs native to Chelan County and typically found in undisturbed riparian areas or shrub steppe areas as appropriate. When shoreline plantings are the only mitigation option for a given pier proposal, the additional overwater cover shall be compensated for at a 1:1 planting area ratio (unless modified as described in Section 4.2.1.L) with required trees planted on 12-foot centers and shrubs planted on 6-foot centers.
 - d. Removal of hardened shoreline, including existing launch ramps, and replacement with native vegetation.
 - e. Removal of man-made debris waterward of the OHWM, such as car bodies, oil drums, concrete or asphalt debris, remnant docks, or other material detrimental to ecological functions and ecosystem-wide processes.
 - f. Participation in an approved mitigation banking or in-lieu-fee program.
- I. Replacement of Existing Docks. Proposals involving replacement of the entire existing private dock are considered a new moorage facility and must meet the dimensional, materials and mitigation standards for new private docks as described in Section 5.2.6.B and C.
- J. Additions to Private Dock. Proposals involving the modification and/or enlargement of existing private docks must comply with the following measures:
- 1. The applicant must demonstrate to the satisfaction of the responsible local government that there is a need for the enlargement of an existing dock. Proposals that demonstrate an enlargement is necessary due to safety concerns or inadequate depth of water will be considered.
 - 2. Enlarged portions of docks must comply with the dimensional, materials and mitigation standards for new private docks as described in Section 5.2.6.B and C. Dock additions that result in the completed structure exceeding the area limits for reasons not specifically allowed above may only be approved through a Shoreline Variance.
- K. Repair of Existing Private Dock. Maintenance and repair proposals using treated materials must use only chemicals approved by the appropriate State or Federal agencies, and must be cured prior to placement in or over the water. All other materials requirements of this section shall also be met.

5.2.7 Recreational Development Regulations

- A. Design. Recreational uses and facilities shall be designed to be primarily related to access, enjoyment and use of the water and shorelines of the state (WAC 173-26-241(3)(i)).
- B. Use consistency. Proposed recreation uses shall be designed, located, and operated consistent with the purpose and intensity of the shoreline environment designation and environmental conditions, and operated in a manner that assumes no net loss of shoreline ecological functions (WAC 173-26-241(3)(i)).
- C. Accessory uses. Accessory uses and support facilities such as maintenance facilities and parking lots shall be consolidated and located in upland areas outside shoreline, wetland, and riparian buffers to the extent feasible. Where such accessory uses may be allowed in shoreline buffers, as outlined in Section 4.5.2, Vegetation Conservation and Shoreline Buffers, they must be designed and located to minimize intrusion into the buffer and should also be consistent with Section 4.2.1, No Net Loss of Ecological Function and Section 4.2.5, Public Access (WAC 173-26-201(2)(d), WAC 173-26-241 (2)(a)(iii) ,WAC 173-26-211(3)(b), and WAC 173-26-241(3)(i)).
- D. Public access. See SMP Section 4.4. Where recreation facilities for public access include overwater structures, such as public view or fishing platforms, those overwater structures should comply with relevant requirements of SMP Section 5.5, Boating Facilities (WAC 173-26-241(3)(i)).
- E. Fertilizer and chemical management. For recreation developments such as golf courses and playfields that require the use of fertilizers, pesticides, or other chemicals, the applicant shall submit plans demonstrating the best management practices (BMPs) and methods to be used to prevent these chemical applications and resultant leachate from entering adjacent waterbodies. These BMPs shall be incorporated as part of shoreline permit compliance. Non-chemical management methods are preferred over chemical management where feasible and practical (Implements Policy 5.15.1.E above from 1975 SMP).
- F. Compatibility with adjacent private properties. Recreational facilities shall make adequate provisions, such as screening, buffer strips, fences, and signs, to prevent overflow onto adjacent private properties (WAC 173-26-221(4)(b)).
- G. Adequate utilities and services. Proposals for recreational development shall include facilities for water supply, wastewater, and garbage disposal in conformance with the City of Entiat Standard Plan Guidebook 2008, as amended.
- H. New public trails. New public trails (and associated facilities) to be located in new parks or on public land, running parallel with the shoreline, shall be permitted in the outer 25% of shoreline buffers to the greatest extent feasible. Those trails that cannot be located in the outer 25% of the buffer due to site

constraints or avoidance of other critical areas shall be designed utilizing mitigation sequencing to minimize and/or mitigate shoreline ecological impacts. Those trails that provide direct shoreline access (e.g. fishing access, hand boat launch, swimming area, etc.) perpendicular to the shoreline are allowed down to the OHWM. Both types of trails may utilize shoreline buffer averaging and shoreline buffer reduction, but shall conform to design guidelines found in Section 4.2.5 Public Access and provisions of Section 4.2.1, No Net Loss of Ecological Function, and appropriate requirements of Appendix A.

- I. Redevelopment of shoreline trails. Redevelopment of trails in existing parks or on existing public lands shall implement applicable redevelopment standards found in Section 4.2.1.B. Redevelopment of trails to be located inside critical areas buffers shall provide a mitigation plan prepared by a qualified professional, and must be consistent with the provisions of Section 4.2.1, No Net Loss of Ecological Function and appropriate requirements of Appendix A. Redevelopment proposals shall include the following in their permit applications:
 - 1. Square footage of previous (existing) pervious and impervious trails,
 - 2. Square footage of proposed pervious and impervious trails,
 - 3. Mitigation sequencing proposed for intrusion into critical area buffers,
 - 4. BMPs proposed to reduce stormwater entering waterbody.
 - 5. BMPs proposed to improve existing stormwater handling onsite,
 - 6. BMPs proposed to reduce entrance of fertilizers, pesticides, or other chemicals into the waterbody, and
 - 7. Vegetation management procedures proposed to maintain and/or improve shoreline ecological function next to the trails.
- J. Parking is not a preferred shoreline use and shall be located in shoreline jurisdiction only as necessary to support an authorized use, minimizing environmental and visual impacts. Parking shall be located outside critical area and shoreline buffers unless one of the following is met:
- K. ADA Parking Requirements. Placing of the limited number of needed ADA parking spaces within the shoreline buffer facilitates better and safer public access to the shoreline.
- L. Parking is located on a parcel landward of allowed uses and the applicant's lot/site has topographical constraints such that no other location outside the buffer yet within the proposed development is feasible (e.g., the use or activity is located on a parcel entirely or substantially encumbered by the required buffer).

5.2.8 Residential Development Regulations

- A. Subdivisions and plats. Subdivisions and plats shall (WAC 173-26-241(3)(j)):

1. Comply with all applicable subdivision, critical area, and zoning regulations.
 2. Include facilities for water supply, wastewater, stormwater, solid waste, access, utilities and other support facilities in conformance with City of Entiat Standard Plan Guide Book 2008, as amended, and which do not result in harmful effects on the shoreline or waters. All residential developments are required to connect to municipal water supply and wastewater treatment. Be designed to prevent the need for new shoreline stabilization or flood hazard reduction measures per Section 4.2.3.
 3. Be designed, configured and developed in a manner that assures that no net loss of ecological functions results from division of land at full build-out of all lots and throughout all phases of development.
 4. Be required to cluster residential units and structures where necessary and when allowed by zoning and other city codes to avoid critical areas and to preserve natural features and minimize physical impacts.
 5. Identify locations for community access, community or joint use docks, marinas, or conservation and utility easements, where proposed.
- B. Environmental protection. Residential development including accessory uses and appurtenant structures shall (WAC 173-26-241(3)(j)):
1. Meet all applicable critical area, vegetation conservation, and water quality standards of Chapter 4, Appendix A, and other Vegetation Conservation sections of this SMP, and shall be authorized only after approval of a site development plan indicating the total disturbance footprint. The disturbance footprint shall include:
 - a. All driveways and parking areas,
 - b. Wildfire defensible space,
 - c. Building footprints,
 - d. Water access pathway location and width, not to exceed 4 feet, and
 - e. Location of storage and staging of materials and equipment during construction.
 2. Be sufficiently set back from steep slopes and shorelines vulnerable to erosion so that structural improvements, including bluff walls and other stabilization structures, are not required to protect such structures and uses. To accomplish this, the responsible local government shall apply buffers established in Appendix A, may apply greater buffers, and shall apply applicable shoreline buffers found in Vegetation Conservation sections of this SMP.
 3. Be located, designed, and constructed in a manner that assures no net loss of shoreline ecological functions.

- C. The construction of home(s) inside the buffer (utilizing a buffer reduction) shall require development of a shoreline impact assessment. The review of the assessment may require the applicant to prepare a mitigation plan as specified in Section 4.2.1.D of this SMP.
- D. Prior to any clearing, construction, or other activity within the approved disturbance footprint, the landward boundary of buffers shall be marked with permanent or temporary fencing approved by the City administrator, sufficient to prevent any incidental incursion into, or disturbance to the buffer, by equipment, vehicles, building materials or other means.
- E. Whenever feasible while meeting Chelan-Douglas Health District or Washington State Health Department standards, all components of on-site sewage treatment system including subsurface soil absorption systems, shall be located landward of the residential structures they serve.
- F. Buildings constructed in areas of 20 percent or greater slope, or slide-prone areas, shall conform to the requirements for geologically hazardous areas.
- G. Except for minimal pathways no greater than 4 feet in width (to afford access to allowed docks, boat access, or swimming areas) native plant communities and species in buffers shall not be disturbed for any reason.
- H. Public access. See SMP Section 4.2.5 (WAC 173-26-241(3)(j)).
- I. Over-water residences and floating homes. New over-water residences and floating homes shall be prohibited.
- J. Accessory uses. Residential accessory uses or appurtenances shall not be located in required shoreline buffers unless specifically authorized in Vegetation Conservation standards and Appendix A. Residential accessory uses shall be prohibited over the water unless clearly water-dependent for recreational or personal use (based on WAC 173-26-241 (2)(a)(iii) and 173-26-211(3)(b)).
- K. Underground Utilities. See Section 5.2.20.

5.2.9 Breakwaters, Jetties, Groins, and Weirs Regulations

- A. No net loss of ecological functions. New, expanded or replacement structures shall only be permitted if it can be demonstrated that the proposed measures will not result in a net loss of shoreline ecological functions and that they support water-dependent uses, public access, shoreline stabilization, or other specific public purpose (WAC 173-26-231(3)(b, d)).
- B. Conditional Use Permit required. Breakwaters, jetties, groins, weirs, and similar structures shall require a Conditional Use Permit, except for those structures installed to protect or restore ecological functions, such as woody debris installed in streams (WAC 173-26-231(3)(d)).

- C. Limitations on groins. Groins are prohibited except as a component of a professionally designed community or public beach management program that encompasses an entire reach for which alternatives are infeasible, or where installed to protect or restore shoreline ecological functions or processes (consistent with WAC 173-26-231(2)(b, d, e)).
- D. Limit size of structures. The size of breakwaters, jetties, groins, and weirs shall be limited to the minimum necessary to provide protection for the structure or use it is intended to protect (WAC 173-26-231(2)(b)).
- E. Use less-impacting alternatives. Jetties and breakwaters are prohibited except as an integral component of a professionally designed marina. Where permitted, floating, portable, or submerged breakwater structures, or smaller discontinuous structures, are preferred where physical conditions make such alternatives with less impact feasible.
- F. Professional design. Proposed designs for new or expanded structures shall be designed and certified by qualified professionals, including an engineer and a biologist.

5.2.10 Commercial & Light Industrial Development Regulations

- A. Water-oriented uses allowed. Water-dependent, water-related, and water-enjoyment uses are permitted where allowed by zoning and this SMP. Water-dependent commercial and/or light industrial uses shall be given preference over water-related and water-enjoyment commercial and/or light industrial uses. The applicant shall demonstrate to the satisfaction of the City that proposed uses meet the definitions of water-dependent, water-related, or water-enjoyment (water-oriented commercial and/or light industrial use) (WAC 173-26-241(3)(d)).
- B. Residential uses as part of commercial and/or light industrial mixed use development. Nonwater-oriented commercial and/or light industrial uses, including but not limited to residential uses, are prohibited, except those uses that are part of a mixed-use project, provided:
 1. The mixed-use project includes one or more water-dependent uses.
 2. Water-dependent commercial and/or light industrial uses as well as other water-oriented commercial and/or light industrial uses have preferential locations along the shoreline.
 3. The underlying zoning district permits residential uses together with commercial and/or light industrial uses.
 4. Public access is provided for significant number of persons in accordance with Section 4.4 and/or ecological restoration is provided as a public benefit.
 5. Residential uses meet requirements of Section 5.2.8 of this SMP.

- C. Nonwater-oriented commercial and light industrial uses limited. In areas designated for commercial and light industrial use, nonwater-oriented commercial and light industrial uses are allowed if the site is physically separated from the shoreline by another property or public right of way. New nonwater-oriented commercial and light industrial development is prohibited in shoreline jurisdiction, except where such use provides a significant public benefit with respect to the Act's objectives, such as providing public access and ecological restoration and meets one of the following conditions (WAC 173-26-241(3)(d)):
1. It is part of a mixed-use project that includes water-dependent uses and provides significant public benefit such as providing public access and ecological function; or
 2. Navigation is severely limited at the site and the commercial and/or light industrial use provides a significant public benefit such as providing public access and ecological function.
- D. Overwater uses. Nonwater-dependent commercial and/or light industrial uses shall not be located over water except in existing structures or in the limited instances where they are auxiliary to and necessary in support of water-dependent uses (WAC 173-26-241(3)(d)).
- E. Accessory uses to water-oriented commercial and/or light industrial activities. Accessory commercial and light industrial development that does not require a shoreline location shall be located landward of the water-oriented portions of the development and comply with shoreline buffers. Accessory uses may be allowed in existing structures or where necessary in support of water-oriented uses. Accessory development includes, but is not limited to, parking, storage and service areas, and circulation (WAC 173-26-201(2)(d), WAC 173-26-241 (2)(a)(iii), WAC 173-26-211(3)(b)), and WAC 173-26-241(3)(d)).
- F. Environmental protection. Commercial and/or light industrial development shall be located, designed, and constructed in a manner that assures no net loss of shoreline ecological functions and without significant adverse impacts to other preferred land uses and public access features (WAC 173-26-241(3)(d)).
- G. Public access. See Section 4.4 (WAC 173-26-241(3)(d)).

5.2.11 Dredging and Dredge Material Disposal Regulations (based on WA 173-26-231(2) and (3)(f))

As regulated in this SMP, dredging is the excavation or displacement of the bottom or shoreline of a waterbody for purposes of flood control, navigation, and restoration. This section is not intended to cover other excavations waterward of the ordinary high water mark that are incidental to construction of an otherwise authorized use or

modification (e.g., shoreline crossings, bulkhead replacements). These in-water substrate modifications should be conducted pursuant to regulations found in Section 5.2.2, General Aquatic Shoreline Modification and Use Regulations and regulations found in sections of this Master Program governing the use or modification with which the excavation is associated, such as Section 5.2.5, Boating Facilities or Section 5.2.18, Shoreline Stabilization.

- A. Siting and design. New development shall be sited and designed to avoid or, if that is not possible, to minimize the need for new and maintenance dredging.
- B. Allowed dredging activities. Dredging for the purpose of establishing, expanding, relocating, or reconfiguring navigation channels and basins should be allowed where necessary for assuring safe and efficient accommodation of existing navigational uses and then only when significant ecological impacts are minimized and when mitigation is provided. Maintenance dredging of established navigation channels and basins should be restricted to maintaining previously dredged and/or existing authorized location, depth, and width. Dredging shall only be permitted for the following activities:
 - 1. Development of essential public facilities when there are no feasible alternatives.
 - 2. Maintenance of irrigation reservoirs, drains, canals, or ditches for agricultural purposes.
 - 3. Restoration or enhancement of shoreline ecological functions and processes benefiting water quality and/or fish and wildlife habitat.
 - 4. Dredging for the purpose of obtaining fill material is prohibited, except when the material is necessary for the restoration of ecological functions.
- C. Maintain ecological functions and processes. The physical alignment and ecological functions and processes of shoreline waterbodies shall be maintained, except to improve hydraulic function, water quality, fish or wildlife habitat, or fish passage. Consistent with the mitigation sequencing steps outlined in Section 4.2.1, No Net Loss of Ecological Function, dredging and dredge disposal proposals should be first designed to avoid and minimize impacts, prior to pursuing mitigation. When required, mitigation plans shall be prepared by a qualified professional and shall be consistent with the relevant plan requirements of the appropriate responsible government in Appendix A, Critical Areas Regulations.
- D. Conditions may be applied. Limitations on dredge or disposal operation may be imposed to reduce proximity impacts, protect the public safety and assure compatibility with the interests of other shoreline users. Conditions may include limits on periods and hours of operation, type of machinery, and may require

provision of landscaped buffer strips and/or fencing to address noise and visual impacts at land disposal or transfer sites.

- E. On-Shoreland Dredging Disposal. Circumstances when disposal is allowed. Dredge material disposal within shoreline jurisdiction is permitted when the following conditions are met:
1. Shoreline ecological functions and processes will be preserved, restored or enhanced, including protection of surface and groundwater; and
 2. Erosion, sedimentation, floodwaters or runoff will not increase adverse impacts to shoreline ecological functions and processes or property.
 3. Disposal of dredge material on shorelands or wetlands within a river's channel migration zone is discouraged. In the limited instances where it is allowed, such a disposal requires a conditional use permit.
- F. Circumstances when open water dredge disposal is allowed. Dredge material disposal in open waters may be approved only when authorized by applicable agencies, which may include the U.S. Army Corps of Engineers pursuant to Section 10 (Rivers and Harbors Act) and Section 404 (Clean Water Act) permits, and Washington State Department of Fish and Wildlife Hydraulic Project Approval (HPA); and when one of the following conditions apply:
1. Land disposal is infeasible, less consistent with this SMP, or prohibited by law; or
 2. Nearshore disposal as part of a program to restore or enhance shoreline ecological functions and processes is not feasible.
- G. Open water dredge disposal conditions. Dredge materials approved for disposal in open waters shall comply with the following conditions:
1. Offshore habitat will be protected, restored, or enhanced;
 2. Adverse effects on water quality or biologic resources from contaminated materials will be mitigated;
 3. Shifting and dispersal of dredge material will be minimal; and
 4. Water quality will not be adversely affected.
- H. Submittal requirements. The following information shall be required for all dredging applications:
1. A description of the purpose of the proposed dredging and an analysis of compliance with the policies and regulations of this SMP.
 2. A detailed description of the existing physical character, shoreline geomorphology, and biological resources provided by the area proposed to be dredged, including:
 - a. A site plan map outlining the perimeter of the proposed dredge area. The map must also include the existing bathymetry and have data points at a minimum of 2-foot depth increments.

- b. A critical areas study.
 - c. A mitigation plan if necessary to address any identified impacts to ecological functions or processes.
 - d. Information on stability of bedlands adjacent to proposed dredging and spoils disposal areas.
3. A detailed description of the physical, chemical and biological characteristics of the dredge materials to be removed, including:
 - a. Physical analysis of material to be dredged (material composition and amount, grain size, organic materials present, source of material, etc.).
 - b. Chemical analysis of material to be dredged (volatile solids, chemical oxygen demand (COD), grease and oil content, mercury, lead and zinc content, etc.).
 - c. Biological analysis of material to be dredged.
4. A description of the method of materials removal, including facilities for settlement and movement.
5. Dredging procedure, including the length of time it will take to complete dredging, method of dredging, and amount of materials removed.
6. Frequency and quantity of project maintenance dredging.
7. Detailed plans for dredge spoil disposal, including specific land disposal sites and relevant information on the disposal site, including, but not limited to:
 - a. Dredge material disposal area;
 - b. Physical characteristics including location, topography, existing drainage patterns, surface and ground water;
 - c. Size and capacity of disposal site;
 - d. Means of transportation to the disposal site;
 - e. Proposed dewatering and stabilization of dredged material;
 - f. Methods of controlling erosion and sedimentation; and
 - g. Future use of the site and conformance with land use policies and regulations.
 - h. Total initial dredge volume.
 - i. Plan for disposal of maintenance spoils for at least a 50-year period, if applicable.
 - j. Hydraulic modeling studies sufficient to identify existing geo-hydraulic patterns and probable effects of dredging.

5.2.12 Fill Regulations (based on WAC 173-26-231(2) and (3)(c))

Fill regulations in this section apply to fills in aquatic and upland environments. "Fill" is the addition of soil, sand, rock, gravel, sediment, earth retaining structure, or other material to an area waterward of the OHWM, in wetlands, or on shorelands in a manner that raises the elevation or creates dry land.

- A. Protect ecological function. All fills shall be located, designed and constructed to protect shoreline ecological functions and ecosystem-wide processes, including channel migration. Fill shall be minimized to the maximum extent practicable and necessary to accommodate approved shoreline uses and development activities that are consistent with this SMP.
- B. Permissible fill and excavation. Fill and excavation (for reasons other than ecological restoration) within wetlands, floodways, channel migration zones, or waterward of the OHWM shall only be permitted by conditional use permit (except for ecological restoration) in limited instances for the following purposes and when other required state or federal permits have been obtained, with due consideration given to specific site conditions, and only along with approved shoreline use and development activities that are consistent with this SMP, such as:
 - 1. Water-dependent uses, public access, and cleanup and disposal of contaminated sediments as part of an interagency environmental clean-up plan;
 - 2. Disposal of dredged material considered suitable under, and conducted in accordance with, the Dredged Material Management Program of the Department of Natural Resources;
 - 3. Expansion or alteration of transportation facilities of statewide significance currently located on the shoreline where alternatives to fill are infeasible;
 - 4. Ecological restoration or enhancement, including, but not limited to, beach nourishment, habitat creation, culvert upgrades to improve fish and flow passage, or bank restoration when consistent with an approved restoration plan; or
- C. Shoreline stabilization. Fills or excavation shall not be located where shoreline stabilization will be necessary to protect materials placed or removed.
- D. Physical and visual consistency. Fills, beach nourishment and excavation shall be designed to blend physically and visually with existing topography whenever possible, so as not to interfere with long term appropriate use including lawful access and enjoyment of scenery.
- E. Maximum slopes. Cut and fill slopes shall generally be sloped no steeper than one foot vertical for every three feet horizontal (1:3) unless a specific engineering

analysis has been provided, and it can be determined that the fill blends physically and visually with existing topography.

- F. Erosion control. A temporary erosion and sediment control (TESC) plan, including BMPs, consistent with the Stormwater Management Manual for Eastern Washington shall be provided for all proposed fill and excavation activities, and approved by the Shoreline Administrator prior to commencement of activity. Disturbed areas shall be immediately protected from erosion using weed-free straw, mulches, hydroseed, or similar methods and revegetated, as applicable.

5.2.13 Forest Practices Regulations

No Forest resource lands exist within the Entiat urban growth boundary. Therefore, no regulations been generated for forest practices. New forest practices are prohibited.

5.2.14 Industrial Use Regulations

The City of Entiat has no waterfront industrial zones. A light industrial zone exists upland of the waterfront (outside of the 200' shoreline jurisdiction). No new heavy industrial use is allowed within the City limits. Heavy industrial uses are prohibited in shoreline jurisdiction. Light industrial uses proposed in shoreline jurisdiction shall be consistent with Section 5.1.10 Commercial and Light Industrial Policies and comply with Section 5.2.10 Commercial and Light Industrial Regulations.

5.2.15 In-Water Structures Regulations

In-water structures include those placed by humans within streams, rivers and lakes for hydroelectric generation, irrigation, water supply, flood control, transportation, utilities, fish habitat enhancement, recreation, or other purpose. Structures placed waterward of the OHWM have the potential to cause water impoundment or the diversion, obstruction, or modification of water, and are therefore regulated by this section. In-stream structures shall provide for the protection and preservation of ecosystem-wide processes, ecological functions, and cultural resources, including, but not limited to, fish and fish passage wildlife and water resources, shoreline critical areas, hydrogeological processes, and natural scenic vistas. The location and planning of in-stream structures shall give due consideration to the full range of public interests, watershed functions and processes, and environmental concerns, with special emphasis on protecting and restoring priority habitats and species.

- A. Prohibited projects. Channelization projects that damage fish and wildlife resources, degrade recreation and aesthetic resources, result in a net loss of ecological functions or result in high flood stages and velocities are prohibited.

- B. Soil stabilization. Upland cut-and-fill slopes and back-filled areas resulting from installation of in-water structures shall be stabilized with brush matting and buffer strips and revegetated with native grasses, shrubs, or trees to prevent loss of shoreline ecological functions and processes.
- C. Water quality. In-water structures shall be constructed and maintained in a manner that does not degrade the quality of affected waters. The responsible local government shall require reasonable conditions to achieve this objective.
- D. Prohibited structures. No motor vehicles, appliances, other similar structures or parts thereof; nor structure demolition debris; nor any other solid waste shall be used as in-water structures.
- E. Natural features. Natural in water features such as snags, uprooted trees, or stumps shall be left in place unless it can be demonstrated that they are actually causing bank erosion or higher flood stages or pose a hazard to navigation or human safety.
- F. Design. In-water structures shall be designed by a qualified professional. In-water structures shall allow for natural groundwater movement and surface runoff, and shall preserve valuable recreation resources and aesthetic values such as point and channel bars, islands, and braided channels. In-water structures shall not be a safety hazard or obstruct water navigation.
- G. Dam siting and design. The design of all dams and the suitability of the proposed site for dam construction shall be certified by a professional engineer licensed in the State of Washington. The professional design shall include a maintenance schedule.
- H. Dam maintenance agreement and bond. For all dams that are not regulated by either the Federal Energy Regulatory Commission licensing procedures, or the Ecology reservoir permit requirements, a maintenance agreement and construction bond shall be filed with the responsible local government prior to construction. The maintenance agreement shall specify who is responsible for maintenance, shall incorporate the maintenance schedule specified by the design engineer, shall require annual inspections by a civil engineer licensed in the State of Washington, and shall stipulate abandonment procedures which shall include, where appropriate, provisions for site restoration.
- I. Permits. Construction of in-water structures may not commence without having obtained all applicable Federal, State, and local permits and approvals, including, but not limited to, an HPA from Washington Department of Fish and Wildlife.
- J. Public access. Design of in-water structures shall include access to public shorelines whenever possible, unless it is demonstrated that public access would cause unavoidable public health and safety hazards, security problems,

unmitigatable ecological impacts, unavoidable conflicts with proposed uses, or unreasonable cost. At a minimum, in-water structures should not decrease public access or use potential of shorelines.

5.2.16 Mining Regulations

New mining projects shall be prohibited within shoreline jurisdiction in the City of Entiat. Expansion of existing commercial mining prohibited.

5.2.17 Shoreline Habitat and Natural Systems Enhancement Project Regulations (based on WAC 173-26-231(3)(g))

- A. Approved plan. Restoration and enhancement shall be carried out in accordance with an approved shoreline restoration plan.
- B. Protect adjacent resources. All shoreline restoration and enhancement projects shall protect the integrity of adjacent natural resources, including aquatic habitats and water quality.
- C. Maintenance and monitoring. Long-term maintenance and monitoring shall be included in restoration or enhancement proposals.
- D. Adverse affects. Shoreline restoration and enhancement may be allowed if the project applicant demonstrates that no significant change to sediment transport or river current will result and that the enhancement will not adversely affect ecological processes, properties, or habitat.
- E. Use of best information and BMPs. Shoreline restoration and enhancement projects shall be designed using the best available scientific and technical information, and implemented using best management practices.
- F. Permitted. Shoreline restoration and ecological enhancement projects may be permitted in all shoreline environments, provided the project's purpose is the restoration of the natural character and ecological functions of the shoreline.
- G. Relief for OHWM shifts. Applicant's seeking to perform restoration projects are advised to work with the City to assess whether and how the proposed project allows relief under RCW 90.58.580, in the event that the project shifts the OHWM landward.
 - 1. If repair or replacement shoreline stabilization measures intended to improve ecological functions shift the OHWM landward of the pre-modification location and result in expansion of the shoreline jurisdiction on any property other than the subject property, the plan shall not be approved until the applicant submits a copy of a statement signed by the property owners of all affected properties, in a form approved by the responsible local government and recorded at the Chelan County Auditor's Office, consenting to the shoreline jurisdiction creation and/or increase on such property.

5.2.18 Shoreline Stabilization Regulations

Structural shoreline stabilization often results in vegetation removal and damage to near-shore habitat and shoreline corridors. Therefore, shoreline stabilization provisions shall also be consistent with Section 4.2.1 No Net Loss of Ecological Function, and where applicable, each jurisdiction's respective critical areas regulations found in Appendix A.

In order to implement RCW 90.58.100(6) and avoid or mitigate adverse impacts to shoreline ecological functions where shoreline alterations are necessary to protect single-family residences and principal appurtenant structures in danger from active shoreline erosion, this master program includes standards setting forth the circumstances under which alteration of the shoreline is permitted, and standards for the design and type of protective measures and devices allowed.

- A. General. The purpose of this section is to provide standards and guidelines for the location and design of hard structural and soft structural shoreline stabilization measures that have the potential to adversely impact the shoreline natural environment. New development, however, shall be located and designed to avoid the need for future shoreline stabilization to the extent feasible. New development on steep slopes or bluffs shall be set back sufficiently to ensure that shoreline stabilization is unlikely to be necessary during the life of the structure, as demonstrated by a geotechnical analysis. New development that would require shoreline stabilization which causes a net loss of ecological functions or erosion to adjacent or down-current properties and shoreline areas shall be prohibited. In all cases, the feasibility of soft structural shoreline stabilization shall be evaluated prior to hard structural stabilization. Shoreline stabilization shall be designed so that net loss of ecological functions does not occur. (WAC 173-26-231(3)(a)(iii)(A)).
- B. New or enlarged structural shoreline stabilization. New structural shoreline stabilization measures, including both hard and soft structural shoreline stabilization measures, shall include measures installed to address erosion impacts. Enlargement of an existing structural shoreline stabilization shall include additions to or increases in size (such as height, width, length, or depth) to existing shoreline stabilization measures and these enlargements shall be considered new structures. New or enlarged structural stabilization measures shall not be allowed, except as follows:
 1. To protect an existing primary structure, including residences, when conclusive evidence, documented by a geotechnical analysis, is provided that the structure is in danger from shoreline erosion caused by currents or waves. Normal sloughing, erosion of steep bluffs, or shoreline erosion

itself, without a scientific or geotechnical analysis, is not demonstration of need. The geotechnical analysis should evaluate on-site drainage issues and address drainage problems away from the shoreline edge before considering hard or soft structural shoreline stabilization (WAC 173-26-231(3)(a)(iii)(B)(I)), or

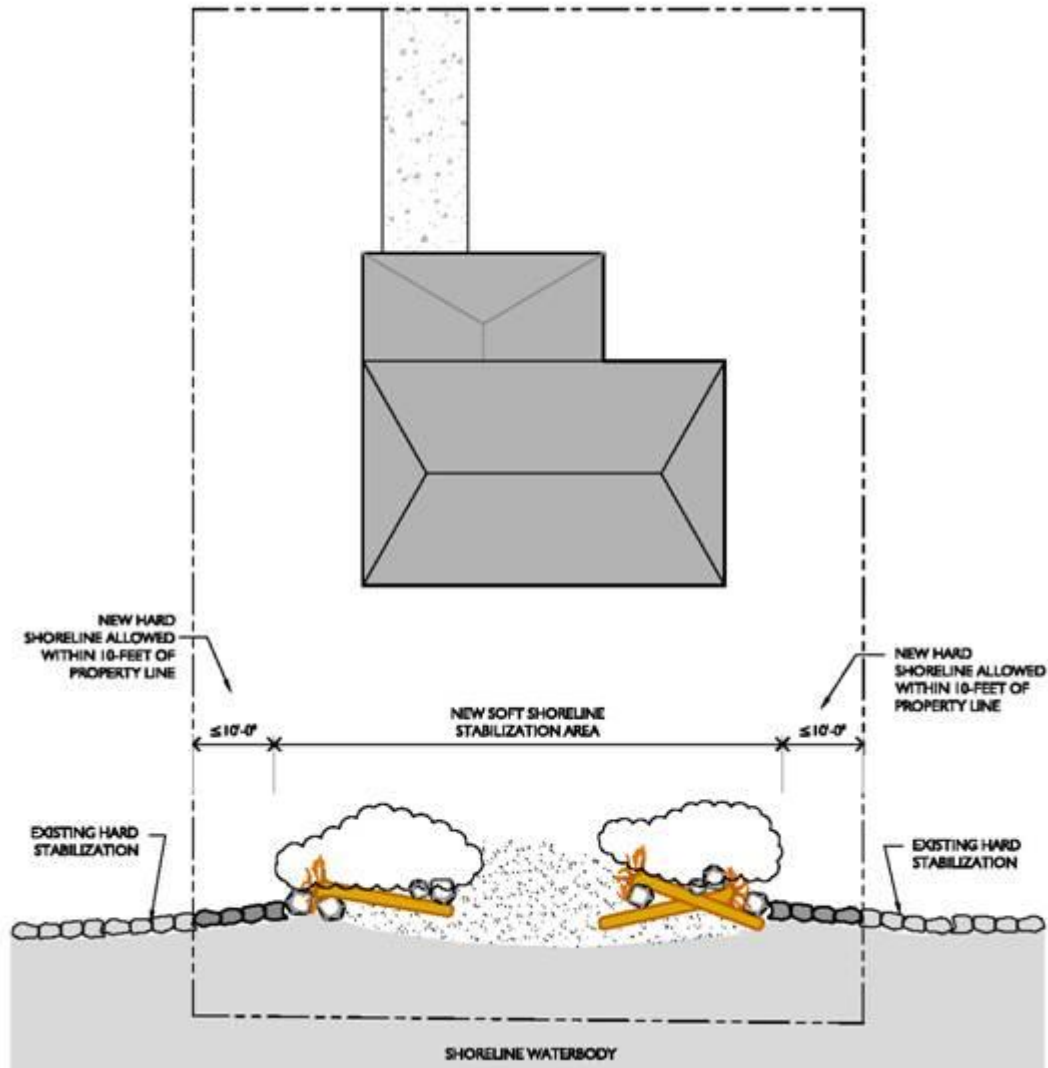
2. In support of new nonwater-dependent development, including single-family residences, when all of the conditions below apply:
 - a. The erosion is not being caused by upland conditions, such as drainage and the loss of vegetation.
 - b. Nonstructural measures, such as placing the development farther from the shoreline, planting vegetation, or installing on-site drainage improvements, are not feasible or not sufficient to adequately address erosion impacts.
 - c. The need to protect primary structures from damage due to erosion is demonstrated through a geotechnical report. The damage must be caused by natural processes, such as currents or waves (WAC 173-26-231(3)(a)(iii)(B)(II)), or
 3. In support of water-dependent development when all of the conditions below apply:
 - a. The erosion is not being caused by upland conditions, such as drainage and the loss of vegetation.
 - b. Nonstructural measures, such as planting vegetation, or installing on-site drainage improvements, are not feasible or not sufficient to adequately address erosion causes or impacts.
 - c. The need to protect primary structures, including residences, from damage due to erosion is demonstrated through a geotechnical report (WAC 173-26-231(3)(a)(iii)(B)(III)), or
 4. To protect projects for the restoration of ecological functions or for hazardous substance remediation projects pursuant to Chapter 70.105D RCW when nonstructural measures, planting vegetation, or installing on-site drainage improvements, are not feasible or not sufficient to adequately address erosion causes or impacts (WAC 173-26-231(3)(a)(iii)(B)(IV)), or
 5. To protect property for purposes of public safety and public access.
- C. Repair of existing shoreline stabilization measures. This section allows repair and maintenance of existing shoreline stabilization measures, subject to all of the following standards. [Note: repair and replacement of shoreline stabilization structures may meet the criteria for exemption from a Shoreline Substantial

Development Permit, but they are not exempt from the policies and regulations of this Section or the SMP.]

1. Maintenance and repair shall include modifications or improvements to an existing shoreline stabilization measure that are designed to ensure the continued function of the stabilization measure by preventing failure of any part of the stabilization measure.
 2. Modifications or improvements that include additions to, or increases in, size of existing shoreline stabilization measures shall be considered new structures, and are not a repair.
 3. Replacement of greater than 50 percent or 35 feet, whichever is smaller, of linear length of existing shoreline stabilization on a waterfront parcel is not considered a repair for purposes of these regulations, and must be designed and reviewed as a replacement subject to the provisions contained in Subsection 5.18.2.D below. For shoreline stabilization projects, "replacement" occurs when the existing structure, including its footing or bottom course of rock, is removed prior to placement of new shoreline stabilization materials. Repairs that involve only removal of material above the footing or bottom course of rock are not considered replacements. Replacement of existing shoreline stabilization may still qualify for an exemption from a Shoreline Substantial Development Permit as listed in Section 7.6.3 of this SMP. See Chapter 6 for regulations pertaining to non-conforming uses and structures.
 4. Areas of temporary disturbance within the shoreline buffer shall be expeditiously restored to their pre-project condition or better.
 5. The placement of a new shoreline stabilization structure landward of a failing shoreline stabilization structure shall be considered a new structure, and is not maintenance or repair.
- D. Replacement. The following standards apply to replacement of existing hard and soft structural shoreline stabilization measures:
1. For purposes of this section, "replacement" means the construction of a new structure to perform a shoreline stabilization function of an existing structure that can no longer adequately serve its purpose. Additions to or increases in size of existing shoreline stabilization measures shall also be considered new structures (WAC 173-26-231(3)(a)(iii)(C)).
 2. Replacement shall be treated as a new shoreline stabilization measure subject to these restrictions. A geotechnical analysis is not required for replacements of existing hard or soft structural shoreline stabilization with a similar or softer measure if the applicant demonstrates need to protect principal uses or structures from erosion caused by waves or other natural

processes operating at or waterward of the OHWM (WAC 173-26-231(3)(a)(iii)(C)).

3. Replacement hard structural shoreline stabilization measures shall not encroach waterward of the OHWM or waterward of the existing shoreline stabilization measure unless the residence was occupied prior to January 1, 1992, and there are overriding safety or environmental concerns. In such cases, the replacement structure shall abut the existing shoreline stabilization structure. All other replacement hard structural shoreline stabilization measures shall be located at or landward of the existing shoreline stabilization structure (WAC 173-26-231(3)(a)(iii)(C)).
 4. The replacement structures should be designed, located, sized, and constructed to assure no net loss of ecological functions.
 5. Soft shoreline stabilization measures that provide restoration of shoreline ecological functions may be permitted waterward of the ordinary high-water mark. (WAC 173-26-231(3)(a)(iii)(C)).
- E. General design standards. When a hard or soft structural shoreline stabilization measure is demonstrated to be necessary, the following design standards shall be incorporated into the stabilization design:
1. Soft structural shoreline stabilization measures shall be used to the maximum extent practicable for new, enlarged, or replacement shoreline stabilization measures, limiting hard structural shoreline stabilization measures to the portion or portions of the site where necessary to protect or support existing shoreline structures or trees, or where necessary to connect to existing shoreline stabilization measures on adjacent properties. Hard structural shoreline stabilization transition areas between the applicant's otherwise soft shoreline measure and the adjacent hardened shoreline, when needed on the subject property to prevent destabilization of adjacent hardened shorelines, should be minimized and extend into the subject property from the property line no more than 10 feet.



2. For enlarged or replacement soft and hard structural shoreline stabilization measures, the following location and design standards are preferred in descending order:
 - a. Conduct excavation activities associated with the soft or hard structural shoreline stabilization landward of the existing OHWM. Any excavation activities waterward of the OHWM shall require a shoreline conditional use permit.
 - b. Where a, above, is not practicable because of overriding safety or environmental concerns, conduct necessary excavation and fill activities waterward of the existing OHWM as needed to

implement a soft structural shoreline stabilization technique or to mitigate the impacts of hard structural shoreline stabilization.

3. All approved new, enlarged, repair, or replacement shoreline stabilization measures must minimize and mitigate any adverse impacts to ecological functions resulting from short-term construction activities, consistent with Section 4.2.1, No Net Loss of Ecological Function and Appendix A, Critical Areas Regulations. Impact minimization techniques may include compliance with appropriate timing restrictions, use of best management practices to prevent water quality impacts related to upland or in-water work, and stabilization of exposed soils following construction.
4. All new, enlarged, or replacement hard structural shoreline stabilization measures should minimize any long-term adverse impacts to ecological functions by incorporating the following measures into the design:
 - a. Limiting the size of hard structural shoreline stabilization measures to the minimum necessary, including height, depth, and mass.
 - b. Shifting the hard structural shoreline stabilization landward and/or sloping the hard structural shoreline stabilization landward to provide some dissipation of wave energy and increase the quality or quantity of nearshore shallow-water habitat.
5. Approved new and enlarged shoreline stabilization measures shall mitigate any adverse impacts to ecological functions by incorporating the following measures at a minimum into the design if appropriate for local conditions:
 - a. Restoration of appropriate substrate conditions waterward of the OHWM, to include substrate composition and gradient. The material should be sized and placed to remain stable during a two-year flood event on rivers and under typical boat- and wind-driven wave conditions on lakes, including storm events.
 - b. When plantings are chosen as mitigation, restoration plantings shall consist of trees and shrubs designed to improve habitat functions, and native to Chelan County. The planting plan must be approved by all other State and Federal agencies with jurisdiction.
 - c. Additional mitigation measures may be required by the city, or State or Federal agencies, depending on the level of impact.
6. The shoreline stabilization measure shall be designed to not significantly interfere with normal surface and/or subsurface drainage into the adjacent waterbody.
7. The shoreline stabilization measure shall be designed so as not to constitute a hazard to navigation.

8. Stairs or other water access measures may be incorporated into the shoreline stabilization (e.g., steps integrated into the bulkhead, ramp, coved area with shallow entry), but shall not extend waterward of the shoreline stabilization measure and the OHWM.
 9. The shoreline stabilization measure shall be designed to ensure that it does not restrict appropriate public access to the shoreline. When a structural shoreline stabilization measure is required at a public access site, provisions for safe access to the water shall be incorporated into the shoreline stabilization structure design (e.g., steps integrated into the bulkhead, ramp, coved area with shallow entry). Access measures should not extend farther waterward than the face of the shoreline stabilization measure and the OHWM.
 10. Shoreline stabilization measures shall not extend waterward more than the minimum amount necessary to achieve effective stabilization, except for those elements that enhance shoreline ecological functions and minimize impacts.
 11. When repair or replacement shoreline stabilization measures intended to improve ecological functions shift the OHWM landward of the pre-modification location, any buffers from the OHWM or lot area for the purposes of calculating lot coverage shall be measured from the pre-modification location. The pre-modification OHWM shall be recorded in a form approved by the responsible local government and recorded at the Chelan County Auditor's Office.
- F. Specific hard structural shoreline stabilization design standards. In those limited instances when hard structural shoreline stabilization measures, such as bulkheads, are demonstrated to be necessary as outlined in H.1 below, the following standards shall be incorporated into the design:
1. When hard structural shoreline stabilization is approved on a site where hard structural shoreline stabilization is not located on adjacent properties, the construction of hard structural shoreline stabilization shall tie in with the existing contours of the adjoining properties, as feasible, such that the proposed stabilization would not cause erosion of the adjoining properties.
 2. When hard structural shoreline stabilization is approved on a site where hard structural shoreline stabilization is located on adjacent properties, the proposed stabilization may tie in flush with existing stabilization measures on adjoining properties, provided that the new stabilization does not extend waterward of the OHWM, except as necessary to make the connection to the adjoining stabilization, and does not extend onto the

adjacent property. In such circumstances, the remaining portion of the stabilization shall be placed landward of the existing OHWM such that no net intrusion into the waterbody occurs nor does net creation of uplands occur. Fill behind hard structural shoreline stabilization shall be limited to 1 cubic yard per running foot of stabilization. Any filling in excess of this amount shall be considered a regulated activity subject to the regulations in this Chapter pertaining to fill activities and the requirement for obtaining a Shoreline Substantial Development Permit or Shoreline Conditional Use Permit.

- G. Specific soft structural shoreline stabilization design standards. In addition to applicable general design standards and hard structural shoreline stabilization standards above, the following standards shall be incorporated into the design:
1. The soft shoreline stabilization design shall provide sufficient protection of adjacent properties by tying in with the existing contours of the adjoining properties to prevent erosion at the property line. Projects that include necessary use of hard structural shoreline stabilization measures, as indicated by the appropriate study prepared per H below, only near the property lines to tie in with adjacent properties shall be permitted as soft shoreline stabilization measures. The length of hard structural shoreline stabilization transition area to adjacent properties should be minimized to the maximum extent practicable, and extend into the subject property from adjacent properties no more than 10 feet. The hard structural shoreline stabilization transition area shall not extend waterward of the OHWM, except as necessary to make the connection to the adjoining stabilization, and shall not extend onto the adjacent property.
 2. The soft shoreline stabilization design shall size and arrange any gravels, cobbles, logs, and boulders so that the project remains stable during a two-year flood event on rivers and under typical boat- and wind-driven wave conditions on lakes, including storm events, and dissipates wave and current energy, without presenting extended linear faces to oncoming waves or currents.
- H. Submittal requirements. In addition to submitting an application for the appropriate shoreline permit, the applicant shall submit the following as part of a request to construct a new, enlarged, or replacement shoreline stabilization measure:
1. For a new or enlarged hard or soft structural shoreline stabilization measure, a geotechnical report must be prepared by a qualified professional with an engineering license. The report shall include the following:

- a. An assessment of the necessity for structural shoreline stabilization by estimating time frames and rates of erosion and reporting on the urgency associated with the specific situation. New hard structural shoreline stabilization measures shall not be authorized, except when a report confirms that there is a significant possibility that an existing structure will be damaged within three years as a result of shoreline erosion in the absence of such hard structural shoreline stabilization measures, or where waiting until the need is immediate results in the loss of opportunity to use measures that would avoid impacts on ecological functions. Where the geotechnical report confirms a need to prevent potential damage to a primary structure, but the need is not as immediate as three years, that report may still be used to justify more immediate authorization to protect against erosion using soft measures (WAC 173-26-231(3)(a)(iii)(D)).
 - b. An assessment of the cause of erosion, looking at processes occurring both waterward and landward of the OHWM (WAC 173-26-231(3)(a)(iii)(B)(I)).
 - c. An assessment of alternative measures to shoreline stabilization, including:
 - i. Placing the development farther from the OHWM.
 - ii. Correcting any on-site groundwater or drainage issues that may be causing shoreline erosion.
 - d. Where structural shoreline stabilization is determined to be necessary, the assessment must evaluate the feasibility of using soft shoreline stabilization measures in lieu of hard structural shoreline stabilization measures. Soft shoreline stabilization may include the use of gravels, cobbles, boulders, and logs, as well as vegetation (WAC 173-26-231(3)(a)(iii)(E)).
 - e. Design recommendations for minimum sizing of hard structural or soft structural shoreline stabilization materials, including gravel and cobble beach substrates necessary to dissipate wave energy, eliminate scour, and provide long-term shoreline stability.
2. For replacements of existing hard structural shoreline stabilization measures with a similar measure, the applicant shall submit a written narrative providing a demonstration of need. The narrative must be prepared by a qualified professional. The demonstration of need shall consist of the following (WAC 173-26-231(3)(a)(iii)(C)):

- a. An assessment of the necessity for continued structural shoreline stabilization, considering site-specific conditions such as water depth, orientation of the shoreline, wave fetch or flow velocities, and location of the nearest primary structure.
 - b. An assessment of erosion potential resulting from the action of waves or other natural processes operating at or waterward of the OHWM in the absence of the hard structural shoreline stabilization.
 - c. An assessment of alternative measures to shoreline stabilization, including:
 - i. Relocating the development farther from the OHWM.
 - ii. Correcting any on-site groundwater or drainage issues that may be causing shoreline erosion.
 - d. An assessment of the feasibility of using soft shoreline stabilization measures in lieu of hard structural shoreline stabilization measures. Soft structural shoreline stabilization may include the use of gravels, cobbles, boulders, and logs, as well as vegetation.
 - e. Design recommendations for minimizing impacts of any necessary hard structural shoreline stabilization.
3. A demonstration of need may be waived when an existing hard structural shoreline stabilization measure is proposed to be repaired or replaced using soft structural shoreline stabilization measures, resulting in significant restoration of shoreline ecological functions or processes.
 4. For all structural shoreline stabilization measures, including soft structural shoreline stabilization, detailed construction plans, including, but not limited to, the following:
 - a. Plan and cross-section views of the existing and proposed shoreline configuration, showing accurate existing and proposed topography, Chelan County PUD project boundary (G-line), and OHWM.
 - b. Detailed construction sequence and specifications for all materials, including gravels, cobbles, boulders, logs, and vegetation. The sizing and placement of all materials shall be selected to accomplish the following objectives:
 - i. Protect the primary structures from erosion and other damage over the long term, and accommodate the normal amount of alteration from currents and wind- or boat-driven waves;
 - ii. Allow safe passage and migration of fish and wildlife; and
 - iii. Minimize or eliminate juvenile salmon predator habitat.

- c. For projects that include native vegetation, a detailed five-year vegetation maintenance and monitoring program to include the following:
 - i. Goals and objectives of the shoreline stabilization plan;
 - ii. Success criteria by which the implemented plan will be assessed;
 - iii. A five-year maintenance and monitoring plan, consisting of at least one site visit per year by a qualified professional, with annual progress reports submitted to the Shoreline Administrator and all other agencies with jurisdiction; and
 - iv. A contingency plan in case of failure.

5.2.19 Transportation and Parking Regulations

- A. Roads and railroads limited in shoreline jurisdiction. Where other options are available and feasible, new roads, road expansions or railroads shall not be built within shoreline jurisdiction. If subdivisions are being proposed, new road placement shall be evaluated at the time of the plat application, or site development planning (WAC 173-26-241(3)(k)).
- B. Criteria for road or railroad placement within shoreline jurisdiction. When road placement or road expansions are unavoidable in the shoreline jurisdiction, proposed transportation facilities shall be planned, located, and designed to achieve the following (WAC 173-26-241(3)(k)):
 - 1. Minimize possible adverse effects on unique or fragile shoreline features;
 - 2. Maintain no-net-loss of shoreline ecological functions and implement mitigation standards of Section 4.2.1, No Net Loss of Ecological Function;
 - 3. Avoid adverse impacts on existing or planned water-dependent uses; and
- C. Visual access. Public roads, within shoreline jurisdiction, shall, where possible, provide and maintain visual access to scenic vistas. Visual access may include, but is not limited to, turn-outs, rest areas, and picnic areas (1975 SMP Section 26(d)).
- D. Shoreline crossings. Shoreline crossings and culverts shall be designed to minimize impact to riparian and aquatic habitat and shall allow for fish passage. Crossings shall occur as near to perpendicular with the waterbody as possible, unless an alternate path would minimize disturbance of native vegetation or result in avoidance of other critical areas such as wetlands (similar to Chelan County Code 11.78.150).
- E. Shoreline crossings for private property. Crossings that are to be used solely for access to private property shall be designed, located, and constructed to provide access to more than one lot or parcel of property (1975 SMP Section 26(f)).
- F. Floodway. See Section 4.2.3.

- G. Construction standards. Construction standards of the appropriate governmental agency, together with SMP standards, shall be conditions for granting shoreline permits. Seasonal work windows may be required based on federal or state requirements, or if the proposal involves crossing shorelines or altering the waterbody (1975 SMP Section 26(c)).
- H. Trails. See public access standards in Section 4.2.5.
- I. Parking facilities. Parking facilities in shorelines are not a preferred use and shall be allowed only as necessary to support an authorized use. For the purposes of this section, authorized means a use or activity included in the use matrix and associated definitions in Chapter 8. Parking that does not require a shoreline location to support an authorized use shall (WAC 173-26-241(3)(k)):
 - 1. Be sited outside of shoreline jurisdiction unless no feasible alternative location exists outside of the shoreline; or
 - 2. Be planted or landscaped, preferably with native vegetation, to provide a visual and noise buffer for adjoining dissimilar uses or scenic areas;
 - 3. Observe critical area and shoreline buffers; and
 - 4. Be designed to incorporate low-impact development practices, such as pervious surfaces and bioswales, to the extent feasible.

5.2.20 Utilities Regulations

Utilities provisions apply to services and facilities that produce, convey, store, or process power, gas, sewage, communications, oil, waste, and the like. On-site utility features serving a primary use, such as water or sewer lines to residences, are "accessory utilities" and shall be considered a part of the primary use. Standards for the primary use shall be consulted.

- A. Design considerations. Utility systems are permitted provided such systems (WAC 173-26-241(3)(l)):
 - 1. Are designed and constructed to meet all adopted engineering standards of the responsible local government (based on 1975 SMP Section 25.1.10);
 - 2. Avoid paralleling the shoreline or following a down-valley course near the channel, except where located in an existing road or easement footprint; and
 - 3. Do not alter processes affecting the rate of channel migration or shoreline erosion.
- B. Preference – existing footprints. Preference shall be given to utility systems contained within the footprint of an existing right-of-way or utility easement over new locations for utility systems (WAC 173-26-241(3)(l)).
- C. Undergrounding required. All utility systems shall be underground except where environmental or geological conditions makes undergrounding

prohibitive or the cost is disproportionate to the cost of the proposal; provided that facilities which are infeasible to underground are exempt from undergrounding, including but not limited to electric transmission lines in excess of 15kV and public stormwater facilities, outfalls, and associated structures (1975 SMP Section 25.1.2). For the purposes of this Section, disproportionate means the undergrounding requirement would add more than 20% to the total project cost.

- D. Minimum clearing. Where utility systems must be located in shoreline jurisdiction areas, clearing necessary for installation or maintenance shall be kept to the minimum width necessary to prevent interference by trees and other vegetation with proposed transmission facilities. Impacts associated with removal or clearing shall be mitigated on the property (1975 SMP Section 25.1.2).
- E. Restoration of disturbed areas. Upon completion of utility system installation, or any maintenance project, the disturbed area shall be re-graded to compatibility with the natural terrain and replanted to prevent erosion and provide appropriate vegetative cover, including meeting standards of Section 4.2.1, No Net Loss of Ecological Function and Appendix A, Critical Areas Regulations (1975 SMP Section 25.1.2).
- F. Underwater utilities. If an underwater location is necessary, the design, installation and operation shall minimize impacts to the waterway or the resident aquatic ecosystems (based on 1975 SMP 25.1.2). Seasonal work windows may be made a condition of approval. Standards of Section 5.2.118, Dredging and Dredge Material Disposal; Section 4.2.1, No Net Loss of Ecological Function; and Section 5.2.2, General Aquatic Shoreline Modification and Use Regulations must be met.
- G. Nonwater-oriented processing and production facilities. Nonwater-oriented utility production and processing facilities, such as power plants and sewage treatment plants, or parts of those facilities that are nonwater-oriented, shall not be allowed in shoreline areas unless it can be demonstrated that no other feasible option is available.
- H. No net loss of ecological function. All utility system projects and maintenance shall be designed, located, and installed in a manner which results in no-net-loss of ecological function.
- I. Utility production and processing facilities, such as power plants and sewage treatment plants, or parts of those facilities that are non-water-oriented shall not be allowed in shoreline areas unless it can be demonstrated that no other feasible option is available. Where no other practical alternative exists to the excavation for and placement of well, tunnels, utilities, or on-site septic systems in a shoreline and critical area buffer, a mitigation plan must be prepared by a qualified professional, and must be consistent with the provisions of Section

4.2.1, No Net Loss of Ecological Function, and appropriate requirements of Appendix A.

6 Nonconforming Structures and Uses (WAC 173-27-080)

Within the use environments established by this SMP there exist uses, structures and lots which were lawfully established or created, but which would be prohibited, regulated or restricted under the terms of this SMP or future amendments. The intent of this section is to allow these nonconformities to continue but not to encourage their perpetuation or survival. Nonconformities are declared by this title to be incompatible with permitted uses, structures and lots in the districts involved. It is further the intent of this title that nonconformities shall not be enlarged upon, expanded, or increase in intensity of use.

6.1 Policies

The following policies on nonconforming structures, uses, and lots are intended to guide the application of nonconforming standards:

- A. Nonconforming uses and structures that were legally established prior to the adoption of this SMP may continue according to City of Entiat standards.
- B. Transitions from nonconforming uses to conforming uses should be encouraged.
- C. Expansion of nonconforming structures should be prohibited.
- D. The SMP no-net-loss of ecological function objective should guide review of changes to nonconforming uses and new development on nonconforming vacant lots. This objective may be addressed in an area-wide manner, consistent with the SMP cumulative impacts analysis.

6.2 Regulations

The following standards shall apply to nonconforming uses and structures.

6.2.1 Nonconforming Uses

- A. A legal nonconforming use in existence as of the effective date of the SMP may be continued but shall not be enlarged upon, expanded, increased in intensity, or extended or replaced.
- B. A nonconforming use shall not be changed to any other use unless changed to a conforming use. A nonconforming use, if changed to a conforming use, may not thereafter be changed to a nonconforming use.
- C. No nonconforming use shall be enlarged, increased or extended to occupy a greater area of land than was occupied on the effective date of the ordinance codified in this title or amendment thereto.

- D. No nonconforming use shall be moved in whole or in part to any portion of the lot or parcel other than that part occupied by such use on the effective date of adoption or amendment of the ordinance codified in this title.
- E. If a nonconforming use is discontinued or abandoned from active use for a period of one year, further use of the property shall conform to the provisions of this SMP.

6.2.2 Nonconforming Structures

- A. A structure which is legally established prior to the effective date of this SMP and is hereby deemed nonconforming by reason of restrictions on area, lot coverage, height, required setbacks, or other requirements concerning structures may be continued so long as it remains otherwise lawful.
- B. A nonconforming structure shall not be altered, extended, enlarged, or otherwise physically changed in any manner that would have the effect of increasing its amount or degree of nonconformity.
- C. A structure with one or more nonconformity may be extended when said addition or extension would be no less conforming as to setback distance than the existing structure.
- D. If a nonconforming development is damaged to an extent not exceeding seventy-five percent of the replacement cost of the original development, it may be reconstructed to those configurations existing immediately prior to the time the development was damaged, provided that application is made for the permits necessary to restore the development within six months of the date the damage occurred, all permits are obtained and the restoration is completed within two years of permit issuance (WAC 173-27-080(8)).
- E. Nothing in this title shall be deemed to prevent the normal maintenance and repair of a nonconforming structure or its restoration to a safe condition when declared to be unsafe by any official charged with protecting the public safety.

6.2.3 Nonconforming Lots

Lots which were lots of record on the date of adoption of the SMP, or amendment thereto, which contain less than the required width, depth, or area as required by this SMP shall be considered buildable lots in all respects; provided, that any structures proposed to be built meet all of the dimensional requirements of the zoning district in which the lot is located. However, a lot which is nonconforming by virtue of the lack of its adequate access to a public street as required in the Entiat Municipal Code shall not be considered a buildable lot. Structures and customary accessory buildings on nonconforming lots with insufficient development space outside of riparian buffers shall be

setback from the OHWM to the greatest extent feasible to minimize impacts to the buffer (see Table 4.2-1).

6.2.4 Nonconforming Signs

Any sign lawfully existing under all codes and regulations prior to the adoption of the SMP may be continued and maintained as a legal nonconforming sign, provided:

- A. No sign shall be changed in any manner that increases its noncompliance with the applicable sign provisions.
- B. If the sign is structurally altered or moved, its legal nonconforming status shall be void and the sign will be required to conform to the provisions of the SMP.
- C. The sign is not hazardous or abandoned.
- D. The burden of establishing the legal nonconformity of a sign under this section is the responsibility of the person or persons, firm, or corporation claiming legal status of a sign. The approval of an asserted nonconformity is a limited administrative function of the mayor.

7 Shoreline Permits, Procedures, and Administration

7.1 Roles and Responsibilities

- A. The Shoreline Master Program Administrator in the City of Entiat is the Mayor. The Administrator, or his/her designee (typically the City Planner or Community Development Director), shall make administrative decisions and interpretations of the policies and regulations of this SMP and the Act. In addition, the Shoreline Administrator shall:
1. Grant or deny Shoreline Substantial Development Permits.
 2. Grant or deny exemptions from Shoreline Substantial Development Permit requirements of this SMP per Section 7.6.3.
 3. Make field inspections as needed, and prepare or require reports on shoreline permit applications.
 4. Make written recommendations to the Hearing Examiner.
 5. Advise interested persons and prospective applicants as to the administrative procedures and related components of this SMP.
 6. Collect fees for all necessary permits as provided in City ordinances or resolutions. The determination of which fees are required shall be made by the City.
- B. In the City of Entiat, the Shoreline Administrator shall have the authority to grant or deny Shoreline Substantial Development Permits, time extensions to shoreline permits, and revisions. The Hearing Examiner shall have the authority to grant or deny Shoreline Variances and Shoreline Conditional Use Permits under this SMP. Shoreline Variances and Conditional Use Permits must also be approved by the Department of Ecology. The Hearing Examiner shall also decide on appeals of decisions issued by the Administrator of this SMP.
- C. The Entiat City Council shall maintain a policy role, adopting or rejecting all proposed amendments to this SMP, after consideration of the recommendation of the City of Entiat Planning Commission.
- D. The City of Entiat Planning Commission shall make recommendations for amendments of this SMP to the Entiat City Council.

7.1.2 SEPA Official

The responsible SEPA official in the City of Entiat is the Mayor. The SEPA official or his/her designee (typically the City Planner or Community Development Director) is authorized to conduct environmental review of all use and development activities subject to this SMP, pursuant to WAC 197-11 and RCW 43.21C. The responsible SEPA official is designated in accordance with the city's SEPA implementation ordinance.

7.1.3 Hearing Examiner

The Hearing Examiner shall have the authority to:

- A. Grant or deny variances from this SMP.
- B. Grant or deny conditional uses under this SMP.
- C. Decide on appeals from decisions issued by the Shoreline Administrator.

7.1.4 Planning Commission

Planning Commission is vested with the responsibility to review the Master Program as part of regular SMP updates required by RCW 90.58.080 as a major element of the city's planning and regulatory program, and make recommendations for amendments thereof to the City Council.

7.1.5 City Council

The Entiat City Council is vested with authority to:

- A. Initiate an amendment to this SMP according to the procedures prescribed in WAC 173-26-100.
- B. Adopt all amendments to this SMP, after consideration of the recommendation of the planning commission. Substantive amendments shall become effective immediately upon approval by Ecology.

7.2 Interpretation

The Administrator shall provide administrative interpretations in accordance with Entiat Municipal Code Section 14.04.010.

The City shall consult with Ecology to ensure that any formal written interpretations are consistent with the purpose and intent of chapter 90.58 RCW and 173-26-140 WAC.

7.3 Statutory Noticing Requirements

Noticing requirements for permits issued under the SMP in the City of Entiat shall be in accordance with Entiat Municipal Code Chapters 14.06 and 14.08.

At a minimum, the City shall provide notice in accordance with WAC 173-27-110, and may provide for additional noticing requirements. Per WAC 173-27-120 the City shall comply with special procedures (public notice timelines, appeal periods, etc.) for limited utility extensions and bulkheads.

7.4 Application Requirements

A complete application for a Shoreline Substantial Development, Shoreline Conditional Use, or Shoreline Variance Permit, or shoreline exemption shall contain, at a minimum,

the information listed in WAC 173-27-180. In addition, the applicant shall provide the following materials:

- A. An assessment of the existing ecological functions and/or processes provided by topographic, physical and vegetation characteristics of the site, to accompany development proposals, provided that proposals for single-family residences shall be exempt from this requirement if proposal is located outside of required buffers.
- B. Site plan or division of land depicting to scale the location of buildable areas, existing and proposed impervious surfaces (buildings accessory structures, driveways, and allowed landscaping and yards (including proposed water access trails, view corridors, wildfire defensible space, if applicable), general location of utilities, well and septic system, if applicable and location of storage and staging of materials and equipment during construction. Plans shall show area calculations of each feature.
- C. The location of any mapped or known channel migration zone (see Section 4.3.2, Flood Hazard Reduction), floodplain and/or floodway boundary, Rocky Reach project boundary, critical areas, and buffers on and in the vicinity of the project site.
- D. Where a view analysis is required per WAC 173-27-180 due to location of nearby residential or public properties or designated scenic highways, it shall address the following:
 1. The analysis shall include vacant existing parcels of record as well as existing structures. Vacant parcels of record shall be assumed to be developed with structures complying with the applicable regulations of the jurisdiction and the maximum height limitation allowed under the SMP.
 2. The view corridor analysis shall include residential buildings or public properties located outside of the shoreline jurisdiction if it can be clearly demonstrated that the subject property has significant water views.

The Shoreline Master Program Administrator may vary or waive the additional requirements of Section 7.4 according to administrative application requirements on a case by case basis, but all applications for a substantial development, conditional use, or variance permit shall contain the information found in WAC 173-27-180. The Shoreline Master Program Administrator may require additional specific information depending on the nature of the proposal and the presence of sensitive ecological features or issues related to compliance with other County or City requirements, and the provisions of this SMP.

Section 14.080.030 of the Entiat Municipal Code provides the minimum application requirements and codifies the form upon which the application must be submitted.

7.5 Shoreline Substantial Development Permits (WAC 173-27-150)

7.5.1 Permit Required

A Shoreline Substantial Development Permit shall be required for all development of shorelines, unless the proposal is specifically exempt per Section 7.6.

7.5.2 Permit Review Criteria

In order for the permit to be approved, the decision maker must find that the proposal is affirmatively consistent with the following criteria:

- A. Is the proposal consistent with the policies and procedures of the Act (RCW 90.58),
- B. Is the proposal consistent with the provisions of Chapter 173-27 WAC, Shoreline Management Permit and Enforcement Procedures, and
- C. Is the proposal consistent with this SMP?

7.5.3 Conditions of Approval

The city may attach conditions to the approval of permits as necessary to assure consistency of the project with the Act and this SMP. Additionally, nothing shall interfere with the city's ability to require compliance with all other applicable laws and plans.

7.6 Exemptions from Shoreline Substantial Development Permits

(Section based on WAC 173-27-040; RCW 90.58.030 (3)(e), 90.58.140(9), 90.58.147, 90.58.355 and 90.58.515)

7.6.1 Compliance with Applicable Regulations Required

An exemption from the Shoreline Substantial Development Permit process is not an exemption from compliance with the Act or this SMP, or from any other regulatory requirements. To be authorized, all uses and development must be consistent with the policies, requirements, and procedures of this SMP and the Act.

7.6.2 Interpretation of Exemptions

- A. Exemptions shall be construed narrowly. Only those developments that meet the precise terms of one or more of the listed exemptions may be granted exemption from the Shoreline Substantial Development Permit process.
- B. A development or use that is listed as a conditional use pursuant to this SMP or is an unlisted use, must obtain a Shoreline Conditional Use Permit even though

the development or use does not require a Shoreline Substantial Development Permit. When a development or use is proposed that does not comply with the bulk, dimensional, and performance standards of this SMP, such development or use can only be authorized by approval of a Shoreline Variance.

- C. The burden of proof that a development or use is exempt from the permit process is on the applicant.
- D. If any part of a proposed development is not eligible for exemption, a Shoreline Permit is required for the entire proposed development project.
- E. The city may attach conditions to the approval of exempted developments and/or uses as necessary to assure consistency of the project with the Act and this SMP. Additionally, nothing shall interfere with the City's ability to require compliance with all other applicable laws and plans.

7.6.3 Exemptions

For those uses and modifications that meet one of the exemptions outlined below, a Shoreline Permit is not required if Table 3-1, in Section 3, indicates "SD/E." However, if "CU" is listed for the use or modification in Table 3-1, that use or modification is not eligible for an exemption.

The city shall exempt from the Shoreline Substantial Development Permit requirement the shoreline developments listed below, or as thereafter amended in WAC 173-27-040; RCW 90.58.030 (3)(e), 90.58.140(9), 90.58.147, 90.58.355, and 90.58.515. Letters of Exemption are required for exempt activities and shall be issued consistent with Section 7.6.4.

- A. Any development of which the total cost or fair market value, whichever is higher, does not exceed six thousand, four hundred, and sixteen dollars (\$6,416), if such development does not materially interfere with the normal public use of the water or shorelines of the state. The dollar threshold established in this subsection must be adjusted for inflation by the office of financial management every five years, beginning July 1, 2007, based upon changes in the consumer price index during that time period. "Consumer price index" means, for any calendar year, that year's annual average consumer price index, Seattle, Washington area, for urban wage earners and clerical workers, all items, compiled by the Bureau of Labor and Statistics, United States Department of Labor. The office of financial management must calculate the new dollar threshold and transmit it to the office of the code reviser for publication in the *Washington State Register* at least one month before the new dollar threshold is to take effect. For purposes of determining whether or not a permit is required, the total cost or fair market value shall be based on the value of development that is occurring on shorelines of the state as defined in RCW [90.58.030](#) (2)(c). The total

cost or fair market value of the development shall include the fair market value of any donated, contributed or found labor, equipment or materials;

- B. Normal maintenance or repair of existing legally established structures or developments, including damage by accident, fire, or elements. (For repair or replacement of nonconforming structures, see Section 6.) "Normal maintenance" includes those usual acts to prevent a decline, lapse, or cessation from a lawfully established condition. "Normal repair" means to restore a development to a state comparable to its original condition, including but not limited to its size, shape, configuration, location, and external appearance, within a reasonable period after decay or partial destruction, except where repair causes substantial adverse effects to shoreline resource or environment. Replacement of a structure or development may be authorized as repair where such replacement is the common method of repair for the type of structure or development and the replacement structure or development is comparable to the original structure or development including but not limited to its size, shape, configuration, location, and external appearance and the replacement does not cause substantial adverse effects to shoreline resources or environment.
- C. Construction of the normal protective bulkhead common to single-family residences. A "normal protective" bulkhead includes those structural and nonstructural developments installed at or near, and parallel to, the OHWM for the sole purpose of protecting an existing single-family residence and appurtenant structures from loss or damage by erosion. A normal protective bulkhead is not exempt if constructed for the purpose of creating dry land. When a vertical or near vertical wall is being constructed or reconstructed, not more than one cubic yard of fill per one foot of wall may be used as backfill. When an existing bulkhead is being repaired by construction of a vertical wall fronting the existing wall, it shall be constructed no further waterward of the existing bulkhead than is necessary for construction of new footings. When a bulkhead has deteriorated such that an OHWM has been established by the presence and action of water landward of the bulkhead then the replacement bulkhead must be located at or near the actual OHWM. Beach nourishment and bioengineered erosion control projects may be considered a normal protective bulkhead when any structural elements are consistent with the above requirements and when the project has been approved by the Department of Fish and Wildlife.
- D. Emergency construction necessary to protect property from damage by the elements. An "emergency" is an unanticipated and imminent threat to public health, safety, or the environment which requires immediate action within a time too short to allow full compliance with this chapter. Emergency construction does not include development of new permanent protective structures where

none previously existed. Where new protective structures are deemed by the administrator to be the appropriate means to address the emergency situation, upon abatement of the emergency situation the new structure shall be removed or any permit which would have been required, absent an emergency, pursuant to chapter 90.58 RCW, WAC 173-27-040, or this Shoreline Master Program, obtained. All emergency construction shall be consistent with the policies of chapter 90.58 RCW and this Shoreline Master Program. As a general matter, flooding or other seasonal events that can be anticipated and may occur but that are not imminent are not an emergency;

- E. Construction and practices normal or necessary for farming, irrigation, and ranching activities, including agricultural service roads and utilities on shorelands, construction of a barn or similar agricultural structure, and the construction and maintenance of irrigation structures including but not limited to head gates, pumping facilities, and irrigation channels: Provided, that a feedlot of any size, all processing plants, other activities of a commercial nature, alteration of the contour of the shorelands by leveling or filling other than that which results from normal cultivation, shall not be considered normal or necessary farming or ranching activities. A feedlot shall be an enclosure or facility used or capable of being used for feeding livestock hay, grain, silage, or other livestock feed, but shall not include land for growing crops or vegetation for livestock feeding and/or grazing, nor shall it include normal livestock wintering operations;
- F. Construction or modification of navigational aids such as channel markers and anchor buoys;
- G. Construction on shorelands by an owner, lessee or contract purchaser of a single-family residence for their own use or for the use of their family, which residence does not exceed a height of thirty-five feet above average grade level and which meets all requirements of the state agency or local government having jurisdiction thereof, other than requirements imposed pursuant to chapter 90.58 RCW. See Chapter 8 for definitions of single-family residence and residential appurtenances.¹ Construction authorized under this exemption shall be located landward of the OHWM;
- H. Construction of a dock, including a community dock, designed for pleasure craft only, for the private noncommercial use of the owner, lessee, or contract purchaser of single-family and multiple-family residences. A dock is a landing and moorage facility for watercraft and does not include recreational decks, storage facilities or other appurtenances. This exception applies if in fresh waters

the fair market value of the dock does not exceed ten thousand dollars (\$10,000), but if subsequent construction having a fair market value exceeding two thousand five hundred dollars (\$2,500) occurs within five years of completion of the prior construction, the subsequent construction shall be considered a substantial development for the purpose of this Shoreline Master Program.

- I. Operation, maintenance, or construction of canals, waterways, drains, reservoirs, or other facilities that now exist or are hereafter created or developed as a part of an irrigation system for the primary purpose of making use of system waters, including return flow and artificially stored ground water from the irrigation of lands;
- J. The marking of property lines or corners on state-owned lands, when such marking does not significantly interfere with normal public use of the surface of the water;
- K. Operation and maintenance of any system of dikes, ditches, drains, or other facilities existing on September 8, 1975, which were created, developed, or utilized primarily as a part of an agricultural drainage or diking system;
- L. Any project with a certification from the Governor pursuant to chapter 80.50 RCW, Energy Facilities -Site Locations;
- M. Site exploration and investigation activities that are prerequisite to preparation of an application for development authorization under this chapter, if:
 - 1. The activity does not interfere with the normal public use of the surface waters;
 - 2. The activity will have no significant adverse impact on the environment including but not limited to fish, wildlife, fish or wildlife habitat, water quality, and aesthetic values;
 - 3. The activity does not involve the installation of any structure, and upon completion of the activity the vegetation and land configuration of the site are restored to conditions existing before the activity;
 - 4. A private entity seeking development authorization under this section first posts a performance bond or provides other evidence of financial responsibility to the city to ensure that the site is restored to preexisting conditions; and
 - 5. The activity is not subject to the permit requirements of RCW 90.58.550, Oil or natural gas exploration in marine waters;
- N. The process of removing or controlling aquatic noxious weeds, as defined in RCW 17.26.020, through the use of an herbicide or other treatment methods applicable to weed control that are recommended by a final environmental impact statement published by the department of agriculture or the department of ecology jointly with other state agencies under chapter 43.21C RCW;

- O. Watershed restoration projects as defined below. The city shall review the projects for consistency with the Shoreline Master Program in an expeditious manner and shall issue its decision along with any conditions within forty-five days of receiving all materials necessary to review the request for exemption from the applicant. No fee may be charged for accepting and processing requests for exemption for watershed restoration projects as used in this section.
1. "Watershed restoration project" means a public or private project authorized by the sponsor of a watershed restoration plan that implements the plan or a part of the plan and consists of one or more of the following activities:
 - a. A project that involves less than ten (10) miles of stream reach, in which less than twenty-five (25) cubic yards of sand, gravel, or soil is removed, imported, disturbed, or discharged, and in which no existing vegetation is removed except as minimally necessary to facilitate additional plantings;
 - b. A project for the restoration of an eroded or unstable stream bank that employs the principles of bioengineering, including limited use of rock as a stabilization only at the toe of the bank, and with primary emphasis on using native vegetation to control the erosive forces of flowing water; or
 - c. A project primarily designed to improve fish and wildlife habitat, remove or reduce impediments to migration of fish, or enhance the fishery resource available for use by all of the citizens of the state, provided that any structure, other than a bridge or culvert or instream habitat enhancement structure associated with the project, is less than two hundred square feet in floor area and is located above the OHWM of the stream.
 2. "Watershed restoration plan" means a plan developed or sponsored by the Washington Departments of Fish and Wildlife, Ecology, or Transportation; a federally recognized Indian tribe acting within and pursuant to its authority; a city; a county; or a conservation district that provides a general program and implementation measures or actions for the preservation, restoration, re-creation, or enhancement of the natural resources, character, and ecology of a stream, stream segment, drainage area, or watershed for which agency and public review has been conducted pursuant to chapter 43.21C RCW, the State Environmental Policy Act;
- P. A public or private project that is designed to improve fish or wildlife habitat or fish passage, when all of the following apply:

1. The project has been approved in writing by the State of Washington department of Fish and wildlife;
2. The project has received hydraulic project approval by the State of Washington Department of Fish and Wildlife pursuant to chapter 77.55 RCW; and
3. The city has determined that the project is substantially consistent with the local shoreline master program. The city shall make such determination in a timely manner and provide it by letter to the project proponent. Fish habitat enhancement projects that conform to the provisions of WAC 173-27-040(2), RCW 77.55.181, and are determined to be consistent with local shoreline master programs.

7.6.4 Letters of Exemption – Required

Letters of exemption shall be issued by the shoreline administrator when an exemption per Section 7.6.3 applies, or is otherwise required by the provisions of WAC 173-27-050.

7.7 Shoreline Conditional Use Permit (WAC 173-27-160)

7.7.1 Determination of Conditional Use Permits

- A. Uses specifically classified or set forth in this Shoreline Master Program as conditional uses shall be subject to review and condition by the Hearing Examiner and by the Department of Ecology
- B. Other uses which are not classified or listed or set forth in this SMP may be authorized as conditional uses provided the applicant can demonstrate consistency with the requirements of this Section and the requirements for conditional uses contained in this SMP.
- C. Uses which are specifically prohibited by this SMP may not be authorized as a conditional use.

7.7.2 Review Criteria

- A. Conditional use criteria. An applicant proposing a conditional use shall demonstrate compliance with review criteria below or as thereafter amended in WAC 173-27-160.
 1. Is the proposed use consistent with the policies of RCW 90.58.020 and this SMP?
 2. Will the proposed use interfere with the normal public use of public shorelines?
 3. Will the proposed use of the site and design of the project be compatible with other authorized uses within the area and with uses planned for the area under the comprehensive plan and this SMP?

4. Will the proposed use cause no significant adverse effects to the shoreline environment in which it is to be located?
 5. Will the public interest suffer no substantial detrimental effect?
- B. Consideration of cumulative impact. In the granting of all Conditional Use Permits, consideration shall be given to the cumulative impact of additional requests for like actions in the area. For example, if Conditional Use Permits were granted for other developments in the area where similar circumstances exist, the total of the conditional uses shall also remain consistent with the policies of RCW 90.58.020 and shall not produce substantial adverse effects to the shoreline environment.
1. The applicant shall prepare a cumulative impact analysis documenting other properties or uses on the same waterbody that are similarly situated and could request a similar conditional use permit. The City and Hearing Examiner shall determine whether the additional potential for conditional use permits will produce substantial adverse effects to the shoreline environment considering the characteristics of the proposed use, the ability to achieve no-net-loss of ecological function principles, and capability of accommodating preferred shoreline uses in the future if the conditional use and cumulative potential requests occur.

7.7.3 Conditions of Approval

In authorizing a conditional use, special conditions may be attached to the permit by the City or Ecology to prevent undesirable effects of the proposed use and/or to assure consistency of the project with the Act and this SMP. Additionally, nothing shall interfere with the City's ability to require compliance with all other applicable laws and plans.

7.8 Shoreline Variance Permits (WAC 173-27-170)

7.8.1 Purpose

The purpose of a variance is to grant relief to specific bulk or dimensional requirements set forth in this Shoreline Master Program where there are extraordinary or unique circumstances relating to the property such that the strict implementation of this Shoreline Master Program would impose unnecessary hardships on the applicant or thwart the policies set forth in RCW 90.58.020. Variances from the use regulations of the SMP are prohibited.

7.8.2 Review Criteria

Shoreline Variances may be authorized, provided the applicant can demonstrate compliance with the following criteria or as thereafter amended in WAC 173-27-170.

- A. General provisions. Shoreline Variance permits should be granted in circumstances where denial of the permit would result in a thwarting of the policy enumerated in RCW 90.58.020. In all instances the applicant must demonstrate that extraordinary circumstances exist and the public interest shall suffer no substantial detrimental effect.
- B. Shoreline variances landward of the OHWM. Shoreline Variance permits for development and/or uses that will be located landward of the OHWM, as defined in RCW 90.58.030 (2)(b), and/or landward of any wetland as defined in RCW 90.58.030 (2)(h), may be authorized provided the applicant demonstrates all of the following:
1. Would the strict application of the bulk, dimensional, or performance standards set forth in this SMP preclude or significantly interfere with reasonable use of the property?
 2. Is the hardship described in B.1 above specifically related to the property, and is the hardship the result of unique conditions such as irregular lot shape, size, or natural features and the application of this SMP, and not, for example, from deed restrictions or the applicant's own actions?
 3. Is the design of the project compatible with other authorized uses within the area and with uses planned for the area under the comprehensive plan and shoreline master program and will the project design avoid adverse impacts to the shoreline environment?
 4. Will the variance constitute a grant of special privilege not enjoyed by the other properties in the area?
 5. Is the variance requested the minimum necessary to afford relief?
 6. Will the public interest suffer no substantial detrimental effect?
- C. Shoreline variances waterward of OHWM. Shoreline Variance permits for development and/or uses that will be located waterward of the OHWM, as defined in RCW 90.58.030 (2)(b), or within any wetland as defined in RCW 90.58.030 (2)(h), may be authorized provided the applicant demonstrates all of the following:
1. Would the strict application of the bulk, dimensional, or performance standards set forth in this SMP preclude all reasonable use of the property?
 2. Is the proposal consistent with the variance criteria established under subsection 7.8.2.B.2 through B.6 of this section?
 3. Will the public rights of navigation and use of the shorelines not be adversely affected?
- D. Additional criteria for exceeding maximum height. Applicants proposing to exceed maximum height limits shall also comply with the following criteria:

1. Does the building or structure impact a substantial number of residences? Are the residences involved on or in an area adjoining the project area? Is there an obstruction of view?
 2. Has the applicant demonstrated through photographs, videos, photo-based simulations, or computer-generated simulations that the proposed development will obstruct less than 30% of the view of the shoreline enjoyed by a substantial number of residences or from public properties on areas adjoining such shorelines?
 3. Has the applicant located and oriented structures on the subject property in a manner that diminishes the potential view impact? For example, side yard setbacks may need to be increased. No side yard setbacks shall be reduced to accommodate the proposed structure.
 4. Has the applicant demonstrated extraordinary circumstances?
- E. Cumulative impacts. In the granting of all Shoreline Variance permits, consideration shall be given to the cumulative impact of additional requests for like actions in the area. For example if variances were granted to other developments and/or uses in the area where similar circumstances exist, the total of the variances shall also remain consistent with the policies of RCW 90.58.020 and shall not cause substantial adverse effects to the shoreline environment.
1. The applicant shall prepare a cumulative impact analysis documenting other properties or uses on the same waterbody that are similarly situated and could request a similar variance. The city and Hearing Examiner shall determine whether the additional potential for variances will produce substantial adverse effects to the shoreline environment considering the characteristics of the proposed variance request, the ability to achieve no-net-loss of ecological function principles, and capability of accommodating preferred shoreline uses in the future if the variance and cumulative potential requests occur.
 2. For requests to exceed maximum heights, the analysis shall address such considerations as cumulative view obstruction results of height adjustments (within a 1,000-foot radius) of the proposed development combined with those of other developments that exceed the 35-foot height limitation, environmental benefits (enhancement or restoration), public access/open space benefits, and economic benefits. The cumulative impact analysis shall address overall views that are lost, compromised, and/or retained; available view corridors; and surface water views lost, compromised, and/or retained.

7.8.3 Conditions of Approval

In authorizing a variance, special conditions may be attached to the Variance permit by the City or Ecology to prevent undesirable effects of the proposed development or activity and/or to assure consistency of the project with the Act and this SMP.

Additionally, nothing shall interfere with the City's ability to require compliance with all other applicable laws and plans.

7.9 Permit Conditions

In granting, revising, or extending a shoreline permit, the city may attach such conditions, modifications, or restrictions thereto regarding the location, character, and other elements of the proposed development deemed necessary to assure that the development will be consistent with the policy and provisions of the Act and this SMP, as well as the supplemental authority provided in RCW 43.21C, as applicable. In cases involving unusual circumstances or uncertain effects, a condition may be imposed to require monitoring with future review or re-evaluation to assure conformance with the Act and this SMP. If the monitoring plan is not implemented, the permittee may be found to be noncompliant and the permit may be rescinded (WAC 173-27-045, 150, 160, 170 and example SMPs).

7.10 Duration of Permits (WAC 173-27-090)

Time duration requirements for Shoreline Substantial Development, Shoreline Variance, and Shoreline Conditional Use Permits shall be consistent with the following provisions.

- A. General provisions. The time requirements of this section shall apply to all Shoreline Substantial Development Permits and to any development authorized pursuant to a Shoreline Variance or Shoreline Conditional Use Permit authorized by this Chapter. The effective date of authorization is the date the final permit is achieved for the development, whether that is a shoreline permit, a building permit, or other required permit. Upon a finding of good cause, based on the requirements and circumstances of the project proposed and consistent with the policy and provisions of this SMP and this chapter, the city may adopt different time limits from those set forth in Subsections 7.10.B and C of this section as a part of an action on a Shoreline Substantial Development Permit.
- B. Commencement. Construction activities shall be commenced or, where no construction activities are involved, the use or activity shall be commenced within two years of the effective date of a Shoreline Substantial Development Permit, Shoreline Conditional Use Permit, or Shoreline Variance. However, the City may authorize a single extension for a period not to exceed one year from approval of the shoreline permit(s) based on reasonable factors. Additional

extensions may be available for circumstances outside the control of the applicant. An extension request must be filed with a complete extension application submittal before the expiration date, and notice of the proposed extension shall be given to the Department of Ecology and to parties of record on the Shoreline Substantial Development Permit, Shoreline Conditional Use Permit, or Shoreline Variance.

- C. Termination. Authorization to conduct development activities shall terminate five years after the effective date of a Shoreline Substantial Development Permit, Shoreline Conditional Use Permit, or Shoreline Variance. However, the city may authorize a single extension for a period not to exceed one year from approval of the shoreline permit(s) based on reasonable factors. An extension request must be filed with a complete extension application submittal before the expiration date, and notice of the proposed extension shall be given to the Department of Ecology and to parties of record on the Shoreline Substantial Development Permit, Shoreline Conditional Use Permit, or Shoreline Variance.
- D. Effective date. The effective date of a Shoreline Substantial Development Permit, Shoreline Conditional Use Permit, or Shoreline Variance shall be the date of receipt by Ecology as provided in RCW 90.58.140(6). The permit time periods in subsections B and C of this section do not include the time during which a use or activity was not actually pursued due to pending administrative appeals or legal actions or due to the need to obtain any other government permits and approvals for the development that authorize the development to proceed, including all reasonably related administrative or legal actions on any such permits or approvals. All other government permits must be applied for within 90 days of receipt of the shoreline permit(s). The applicant shall be responsible for informing the city of other permit applications that are pending, and of any related administrative and legal actions on any permit or approval that may delay the process. If the applicant fails to notify the city of other pending permits or approvals the date of the last action by the city shall be the effective date.
- E. Revisions. Revisions to permits under Section 7.14 may be authorized after original permit authorization has expired, provided that this procedure shall not be used to extend the original permit time requirements or to authorize substantial development after the time limits of the original permit. The city will allow a maximum of two revisions on the original application. Any additional revisions will require a new permit application.
- F. Notification to Ecology. The city shall notify Ecology in writing of any change to the effective date of a permit, as authorized by this section, with an explanation of the basis for approval of the change. Any change to the time limits of a permit

other than those authorized by RCW 90.58.143 as amended shall require a new permit application.

7.11 Initiation of Development (WAC 173-27-190)

- A. Amortization to begin construction. Each permit for a Substantial Development, Shoreline Conditional Use, or Shoreline Variance, issued by the city shall contain a provision that construction pursuant to the permit shall not begin and is not authorized until twenty-one (21) days from the date of receipt with Ecology as defined in RCW 90.58.140(6) and WAC 173-27-130, or until all review proceedings initiated within twenty-one (21) days from the date of receipt of the decision have been completed, except as provided in RCW 90.58.140 (5)(a) and (b). The date of receipt for a Substantial Development Permit means that date the applicant receives written notice from Ecology that it has received the decision. With regard to a permit for a Shoreline Variance or a Shoreline Conditional Use, date of receipt means the date the city or applicant receives the written decision of Ecology. (Section 36, SB 2935-2)
- B. Forms. Permits for Substantial Development, Shoreline Conditional use, or Shoreline Variance include the City of Entiat Shoreline Substantial Development permit packet and the JARPA combined permit application form. Such forms will be supplied by the city.
- C. Data sheet. A permit data sheet shall be submitted to Ecology with each shoreline permit. The permit data sheet form shall be consistent with WAC 173-27-990.

7.12 Review Process

- A. The application shall be reviewed by the City in accordance with the permit review procedures and timelines specified in the Entiat Municipal Code Chapter 14.08.
- B. After a Shoreline Conditional Use or Shoreline Variance application has been approved by the city, Ecology shall review the permit and make its final decision, in accordance with WAC 173-27-200.

7.12.1 Authority and purpose (WAC 173-27-240)

This part is adopted under RCW [90.58.200](#) and [90.58.210](#) to implement the enforcement responsibilities of the department and local government under the Shoreline Management Act. The act calls for a cooperative program between local government and the state. It provides for a variety of means of enforcement, including civil and criminal penalties, orders to cease and desist, orders to take corrective action, and

permit rescission. The following should be used in addition to other mechanisms already in place at the local level and does not preclude other means of enforcement.

7.12.2 Definitions (WAC 173-27-250)

The definitions contained in WAC [173-27-030](#) shall apply in this part also except that the following shall apply when used in this part of the regulations:

(1) "Permit" means any form of permission required under the act prior to undertaking activity on shorelines of the state, including substantial development permits, variances, conditional use permits, permits for oil or natural gas exploration activities, permission which may be required for selective commercial timber harvesting, and shoreline exemptions; and

(2) "Exemption" means authorization from local government which establishes that an activity is exempt from substantial development permit requirements under WAC [173-27-040](#), but subject to regulations of the act and the local master program.

7.12.3 Policy (WAC 173-27-260)

These regulations should be used by local government in carrying out enforcement responsibilities under the act, unless local government adopts separate rules to implement the act's enforcement provision.

Enforcement action by the department or local government may be taken whenever a person has violated any provision of the act or any master program or other regulation promulgated under the act. The choice of enforcement action and the severity of any penalty should be based on the nature of the violation, the damage or risk to the public or to public resources, and/or the existence or degree of bad faith of the persons subject to the enforcement action.

7.12.4 Order to cease and desist (WAC 173-27-270)

Local government and/or the department shall have the authority to serve upon a person a cease and desist order if an activity being undertaken on shorelines of the state is in violation of chapter [90.58](#) RCW or the local master program.

(1) Content of order. The order shall set forth and contain:

(a) A description of the specific nature, extent, and time of violation and the damage or potential damage; and

(b) A notice that the violation or the potential violation cease and desist or, in appropriate cases, the specific corrective action to be taken within a given time. A civil penalty under WAC [173-27-280](#) may be issued with the order.

(2) Effective date. The cease and desist order issued under this section shall become effective immediately upon receipt by the person to whom the order is directed.

(3) Compliance. Failure to comply with the terms of a cease and desist order can result in enforcement actions including, but not limited to, the issuance of a civil penalty.

7.12.5 Civil penalty (WAC 173-27-280)

(1) A person who fails to conform to the terms of a substantial development permit, conditional use permit or variance issued under RCW [90.58.140](#), who undertakes a development or use on shorelines of the state without first obtaining a permit, or who fails to comply with a cease and desist order issued under these regulations may be subject to a civil penalty by local government. The department may impose a penalty jointly with local government, or alone only upon an additional finding that a person:

(a) Has previously been subject to an enforcement action for the same or similar type of violation of the same statute or rule; or

(b) Has been given previous notice of the same or similar type of violation of the same statute or rule; or

(c) The violation has a probability of placing a person in danger of death or bodily harm; or

(d) Has a probability of causing more than minor environmental harm; or

(e) Has a probability of causing physical damage to the property of another in an amount exceeding one thousand dollars.

(2) In the alternative, a penalty may be issued to a person by the department alone, or jointly with local government for violations which do not meet the criteria of subsection (1)(a) through (e) of this section, after the following information has been provided in writing to a person through a technical assistance visit or a notice of

correction:

(a) A description of the condition that is not in compliance and a specific citation to the applicable law or rule;

(b) A statement of what is required to achieve compliance;

(c) The date by which the agency requires compliance to be achieved;

(d) Notice of the means to contact any technical assistance services provided by the agency or others; and

(e) Notice of when, where, and to whom a request to extend the time to achieve compliance for good cause may be filed with the agency.

Furthermore, no penalty shall be issued by the department until the individual or business has been given a reasonable time to correct the violation and has not done so.

(3) Amount of penalty. The penalty shall not exceed one thousand dollars for each violation. Each day of violation shall constitute a separate violation.

(4) Aiding or abetting. Any person who, through an act of commission or omission procures, aids or abets in the violation shall be considered to have committed a violation for the purposes of the civil penalty.

(5) Notice of penalty. A civil penalty shall be imposed by a notice in writing, either by certified mail with return receipt requested or by personal service, to the person incurring the same from the department and/or the local government, or from both jointly. The notice shall describe the violation, approximate the date(s) of violation, and shall order the acts constituting the violation to cease and desist, or, in appropriate cases, require necessary corrective action within a specific time.

7.12.6 Appeal of civil penalty (WAC 173-27-290)

(1) Right of appeal. Persons incurring a penalty imposed by the department or imposed jointly by the department and local government may appeal the same to the shorelines hearings board. Appeals to the shorelines hearings board are adjudicatory proceedings subject to the provisions of chapter [34.05](#) RCW. Persons incurring a penalty imposed by local government may appeal the same to the local government legislative

authority.

(2) Timing of appeal. Appeals shall be filed within thirty days of the date of receipt of the penalty. The term "date of receipt" has the same meaning as provided in RCW [43.21B.001](#).

(3) Penalties due.

(a) Penalties imposed under this section shall become due and payable thirty days after receipt of notice imposing the same unless application for remission or mitigation is made or an appeal is filed. Whenever an application for remission or mitigation is made, penalties shall become due and payable thirty days after receipt of local government's and/or the department's decision regarding the remission or mitigation. Whenever an appeal of a penalty is filed, the penalty shall become due and payable upon completion of all review proceedings and upon the issuance of a final decision confirming the penalty in whole or in part.

(b) If the amount of a penalty owed the department is not paid within thirty days after it becomes due and payable, the attorney general, upon request of the department, shall bring an action in the name of the state of Washington to recover such penalty. If the amount of a penalty owed local government is not paid within thirty days after it becomes due and payable, local government may take actions necessary to recover such penalty.

(4) Penalty recovered. Penalties recovered by the department shall be paid to the state treasurer. Penalties recovered by local government shall be paid to the local government treasury. Penalties recovered jointly by the department and local government shall be divided equally between the department and the local government unless otherwise stipulated in the order.

7.12.7 Criminal penalty (173-27-300)

The procedures for criminal penalties shall be governed by RCW [90.58.220](#).

7.13 Appeals

7.13.1 Appeals of Shoreline Administrator Determinations and Decisions

Administrative review decisions by the Administrator, based on a provision of this SMP, may be the subject of an appeal to the Hearing Examiner by any aggrieved person. Such appeals shall be an open record hearing before the Hearing Examiner.

Appeals must be submitted within fourteen (14) calendar days after the date of decision or written interpretation together with the applicable appeal fee.

Appeals submitted by the applicant or aggrieved person shall contain:

- A. The decision being appealed;
- B. The name and address of the appellant and his/her interest(s) in the application or proposed development;
- C. The specific reasons why the appellant believes the decision to be erroneous, including identification of each finding of fact, each conclusion, and each condition or action ordered which the appellant alleges is erroneous. The appellant shall have the burden of proving the decision is erroneous;
- D. The specific relief sought by the appellant; and
- E. The appeal fee established by the responsible local government.

Per WAC 173-27-120 the city shall comply with special procedures for limited utility extensions and bulkheads.

7.13.2 Appeals to Shorelines Hearings Board

Appeals to the Shoreline Hearings Board of a decision on a Shoreline Substantial Development Permit, Shoreline Conditional Use Permit, Shoreline Variance, or a decision on an appeal of an administrative action, may be filed by the applicant or any aggrieved party pursuant to RCW 90.58.180 within twenty-one (21) days of receipt of the final decision by the city with Ecology as provided for in RCW 90.58.140(6) (RCW 90.58.180).

7.14 Amendments to Permits (WAC 173-27-100)

7.14.1 Revision – When Required

- A. A permit revision is required whenever the applicant proposes substantive changes to the design, terms or conditions of a project from that which is approved in the permit. Changes are substantive if they materially alter the project in a manner that relates to its conformance to the terms and conditions of the permit, this SMP, and/or the policies and provisions of chapter 90.58 RCW. Changes which are not substantive in effect do not require approval of a revision.
- B. When an applicant seeks to revise a permit, the city shall request from the applicant detailed plans and text describing the proposed changes. Proposed changes must be within the scope and intent of the original permit, otherwise a new permit may be required, pursuant to Section 7.14.2.

7.14.2 Determination of Scope and Intent

- A. The city's shoreline administrator will have the authority to determine whether the proposed changes are within the scope and intent of the original permit, and are consistent with this SMP and the Act. Proposed changes that are not determined to be within the original scope and intent will require a new permit application. If the applicant does not agree with the decision of the administrator, the decision may be appealed to the Hearing Examiner. "Within the scope and intent of the original permit" means all of the following:
1. No additional over water construction is involved except that pier, dock, or float construction may be increased by five hundred (500) square feet or ten percent (10%) from the provisions of the original permit, whichever is less;
 2. Ground area coverage and height may be increased a maximum of ten percent (10%) from the provisions of the original permit;
 3. The revised permit does not authorize development to exceed height, lot coverage, setback, or any other requirements of this SMP except as authorized under a Shoreline Variance granted as the original permit or a part thereof;
 4. Additional or revised landscaping is consistent with any conditions attached to the original permit and with this SMP;
 5. The use authorized pursuant to the original permit is not changed; and
 6. No adverse environmental impact will be caused by the project revision.

7.14.3 Timing of Revision Authorization

Revisions to permits may be authorized after original permit authorization has expired under RCW 90.58.143. The timing and purpose of such revisions shall be limited to authorization of changes which are consistent with WAC 173-27-100 and which would not require a permit for the development or change proposed under the terms of chapter 90.58 RCW and this SMP. If the proposed change constitutes substantial development then a new permit is required. Provided, this subsection shall not be used to extend the time requirements or to authorize substantial development beyond the time limits of the original permit.

7.14.4 Filing of Revision

- A. The revision approval, including the revised site plans and text consistent with the provisions of Section 7.4 and 7.14 as necessary to clearly indicate the authorized changes, and the final ruling on consistency with this section shall be filed with Ecology. In addition, the city shall notify parties of record of their action.

- B. If the revision to the original permit involves a Shoreline Conditional Use Permit or Shoreline Variance, the city shall submit the revision to Ecology for approval, approval with conditions, or denial, and shall indicate that the revision is being submitted under the requirements of this subsection. Ecology shall render and transmit to the city and the applicant its final decision within fifteen (15) days of the date of Ecology's receipt of the submittal from local government. The city shall notify parties of record of Ecology's final decision.

7.14.5 Effective Date of Revised Permit

The effective date of the revised permit shall be the date of receipt by Ecology as provided in RCW 90.58.140(6).

7.14.6 Appeal of Revised Permit

- A. Filing. Appeals of a revised permit shall be in accordance with RCW 90.58.180 and shall be filed within twenty-one (21) days from the date of receipt of the city's action by Ecology or, when appropriate under Subsections 7.7 and 7.8, the date Ecology's final decision is transmitted to the city and the applicant.
- B. Basis of appeals. Appeals shall be based only upon contentions of noncompliance with the provisions of Subsection 7.14.1.
- C. Risk. Construction pursuant to the revision shall not begin and is not authorized until twenty-one (21) days from the date of receipt with Ecology as defined in RCW 90.58.140(6) and WAC 173-27-130, or until completion of all review proceedings initiated within twenty-one (21) days from the date of receipt of the decision. Any construction undertaken pursuant to that portion of a revised permit not authorized under the original permit is at the applicant's own risk.
- D. Scope of decision. If an appeal is successful in proving that a revision is not within the scope and intent of the original permit, the decision shall have no bearing on the original permit.

In addition, for administrative appeals, see Entiat Municipal Code Section 14.10.030.

8 Definitions

The terms used throughout this Shoreline Master Program shall be defined and interpreted as indicated below. When consistent with the context, words used in the present tense shall include the future; the singular shall include the plural, and the plural the singular. Definitions established by WAC 173 have been incorporated herein and should these definitions in the WAC be amended, the most current WAC definition shall apply. Except where specifically defined in this chapter, the RCW or the WAC, all words used in this Shoreline Master Program shall carry their usual and customary meanings.

A

Accessory. Any use or development incidental to and subordinate to a primary use of a shoreline use or development. The terms accessory and appurtenant are synonymous. See also APPURTENANCE, RESIDENTIAL. (example SMPs)

Act. The Washington State Shoreline Management Act, chapter 90.58 RCW. (WAC 173-26-020(1))

Adequate. Sufficient to satisfy an adopted requirement. If the responsible local government does not have an adopted requirement, adequate means to meet a need or demand generated by the proposed shoreline development or use as determined by the authority responsible to determine compliance with the Shoreline Master Program per Chapter 7.

Adverse Impact. An impact that can be measured or is tangible and has a reasonable likelihood of causing moderate or greater harm to ecological functions or processes or other elements of the shoreline environment.

Agricultural Activities. Agricultural uses and practices including, but not limited to: producing, breeding, or increasing agricultural products; rotating and changing agricultural crops; allowing land used for agricultural activities to lie fallow in which it is plowed and tilled but left unseeded; allowing land used for agricultural activities to lie dormant as a result of adverse agricultural market conditions; allowing land used for agricultural activities to lie dormant because the land is enrolled in a local, state, or federal conservation program, or the land is subject to a conservation easement; conducting agricultural operations; maintaining, repairing, and replacing agricultural equipment; maintaining, repairing, and replacing agricultural facilities; and maintaining agricultural lands under production or cultivation. (WAC 173-26-020(3)(a)) See also EXISTING AND ONGOING AGRICULTURAL ACTIVITIES.

AGRICULTURAL-COMMERCIAL. The following activities are considered agricultural-commercial activities:

- A. “Agricultural tourism” refers to the act of visiting a working farm or any agricultural, horticultural or agribusiness operation for the purpose of enjoyment, education or active involvement in the activities of the farm or operation.
- B. “Nursery” means land or structures, such as greenhouses, used to raise plants, flowers and shrubs for sale.
- C. “Roadside stand” means a temporary use which is primarily engaged in the sale of fresh agricultural products, locally grown on- or off-site, but may include, incidental to fresh produce sale, the sale of limited prepackaged food products and non-food items. This use is to be seasonal in duration, open for the duration of the harvest season. For existing roadside stands see Agricultural Activities and Agricultural Equipment and Agricultural Facilities.
- D. “Value added operation” means any activity or process that allows farmers to retain ownership and that alters the original agricultural product or commodity for the purpose of gaining a marketing advantage. Value added operations may include bagging, packaging, bundling, pre-cutting, food and beverage service, etc.
- E. “Winery” means a facility where fruit or other products are processed (i.e., crushed, blended, aged, and/or bottled) and may include as incidental and/or accessory to the principal use a tasting room, food and beverage service, places of public/private assembly, and/or retail sales area.

Agricultural Equipment and Agricultural Facilities. Include, but are not limited to:

- A. The following used in agricultural operations: Equipment; machinery; constructed shelters, buildings, and ponds; fences; water diversion, withdrawal, conveyance, and use equipment and facilities including, but not limited to, pumps, pipes, tapes, canals, ditches, and drains;
- B. Corridors and facilities for transporting personnel, livestock, and equipment to, from, and within agricultural lands;
- C. Farm residences and associated equipment, lands, and facilities; and
- D. Roadside stands and on-farm markets for marketing fruit or vegetables. (WAC 173-26-020(3)(c))

Agricultural Land. Areas on which agricultural activities are conducted as of the date of adoption of this SMP pursuant to the State Shoreline Guidelines as evidenced by aerial photography or other documentation. After the effective date of this SMP, land converted to agricultural use is subject to compliance with the requirements herein. (WAC 173-26-020(3)(d))

Agricultural Products. Includes, but is not limited to, horticultural, viticultural, floricultural, vegetable, fruit, berry, grain, hops, hay, straw, turf, sod, seed, and apiary products; feed or forage for livestock; Christmas trees; hybrid cottonwood and similar hardwood trees grown as crops and harvested within twenty (20) years of planting; and livestock including both the animals themselves and animal products including, but not limited to, meat, poultry and poultry products, and dairy products. (WAC 173-26-020(3)(b))

Alteration. Any human induced change in an existing condition of a shoreline, critical area and/or its buffer. Alterations include, but are not limited to grading, filling, channelizing, dredging, clearing (vegetation), draining, construction, compaction, excavation, or any other activity that changes the character of the area.

Amendment. A revision, update, addition, deletion, and/or reenactment to an existing shoreline master program. (WAC 173-26-020(4))

Anadromous Fish. Fish species that spend most of their lifecycle in saltwater, but return to freshwater to reproduce.

Applicable. The shoreline goal, objective, policy, or standard is relevant or appropriate, or the shoreline development meets the threshold upon which a requirement is based as determined by the authority responsible to determine compliance with the Shoreline Master Program per Chapter 7.

Applicant. The developer, person, party, firm, corporation, or other entity that proposes any use or development within shoreline jurisdiction.

Approval. An official action by a local government legislative body agreeing to submit a proposed shoreline master program or amendments to the department for review and official action pursuant to this chapter; or an official action by the department to make a local government shoreline master program effective, thereby incorporating the approved shoreline master program or amendment into the state master program. (WAC 173-26-020(5))

Appurtenance, Residential. Improvement necessarily connected to the use and enjoyment of a single-family residence when located landward of the OHWM or the perimeter of a critical area and outside their corresponding required buffers, except as otherwise allowed through this Program. Appurtenances may include, but are not limited to, a garage and/or shop; driveway; utilities; water craft storage (upland); swimming pools; hot tubs; sport courts; shoreline stabilization (consistent with SMP Section 5.2.18); retaining walls (consistent with SMP Section 5.2.18); fences; yards; saunas; antennas; decks; walkways; and installation of a septic tank and drainfield and grading which does not exceed two hundred fifty cubic yards and which does not

involve placement of fill in any wetland or waterward of the OHWM (based on WAC 173-27-040). The terms “appurtenant” and “accessory” are synonymous.

Aquatic. Pertaining to those areas waterward of the OHWM.

Aquaculture. Aquaculture is defined as the propagation and rearing of aquatic organisms in controlled or selected aquatic environments for any commercial, recreational, or public purpose. The broad term “aquaculture” refers to the breeding, rearing, and harvesting of plants and animals in all types of water environments, including ponds, rivers, and lakes. Aquaculture can take place in the natural environment or in a manmade environment. Using aquacultural techniques and technologies, researchers and the aquaculture industry are “growing,” “producing,” “culturing,” “ranching”, and “farming” all types of freshwater species. Aquaculture can be classified as either commercial aquaculture or non-commercial aquaculture.

A. Commercial Aquaculture: Commercial aquaculture is defined as the rearing of aquatic organisms, including the incidental preparation of these products for human use, with the goal of maximizing profit.

B. Non-Commercial Aquaculture: Non-commercial aquaculture is defined as fish and wildlife activities that are not primarily for profit and are supported by a recognized federal, tribal, or state resource manager.

1. Low Intensity Non-Commercial Aquaculture: Activities which support non-commercial aquaculture, including well and water supply development, surveys, ground disturbance of less than 10 cubic yards, no permanent structures, and minimal land clearing.
2. Medium Intensity Non-Commercial Aquaculture: Activities which support non-commercial aquaculture, including well and water supply development, surveys, development of acclimation ponds or other acclimation vessels, and removable/portable structures.
3. High Intensity Non-Commercial Aquaculture: Activities which support non-commercial aquaculture including well and water supply development, surveys, development of acclimation ponds, and permanent structures.

Archaeological Object. An object that comprises the physical evidence of an indigenous and subsequent culture including material remains of past human life including monuments, symbols, tools, facilities, graves, skeletal remains and technological by-products. (State DAHP recommendations)

Archaeological Resource/Site. A geographic locality in Washington, including, but not limited to, submerged and submersible lands and the bed of the sea within the state's jurisdiction, that contains archaeological objects. (State DAHP recommendations)

Archaeological. Having to do with the scientific study of material remains of past human life and activities. (State DAHP recommendations)

Archaeologist, Professional. A person who meets qualification standards promulgated by DAHP and the National Park Service and published in 36 CFR Part 61 and which define minimum education and experience required to perform identification, evaluation, registration and treatment activities for archaeological sites. In some cases, additional areas or levels of expertise may be needed, depending on the complexity of the task and the nature of the properties involved. (Based on <http://www.dahp.wa.gov/pages/EnvironmentalReview/Consultants.htm>)

Associated Wetlands. Wetlands that are in proximity to tidal waters, lakes, rivers or streams that are subject to the Act and either influence or are influenced by such waters. (WAC 173-22-030(1)) Factors used to determine proximity and influence include, but are not limited to: location contiguous to a shoreline waterbody, formation by tidally influenced geo-hydraulic processes, presence of a surface connection including through a culvert or tide gate, location in part or whole within the floodplain of a shoreline, periodic inundation, and/or hydraulic continuity.

AUTHORIZED USE. Any use allowed in shoreline jurisdiction either by appropriate shoreline permit or letter of exemption.

Average grade level. The average of the natural or existing topography of the portion of the lot, parcel, or tract of real property which will be directly under the proposed building or structure. In the case of structures to be built over water, average grade level shall be the elevation of the ordinary high water mark. Calculation of the average grade level shall be made by averaging the ground elevations at the midpoint of all exterior walls of the proposed building or structure." (WAC 173-27-030(3))

B

Beach. The zone of unconsolidated material that is moved by waves and wind currents, extending landward to the shoreline.

Beach enhancement/restoration. Process of restoring a beach to a state more closely resembling a natural beach, using beach feeding, vegetation, drift sills and other nonintrusive means as applicable. See also ENHANCEMENT.

Berm. A linear mound or series of mounds of sand and/or gravel generally paralleling the water at or landward of the OHWM. Also, a linear mound used to screen an adjacent activity, such as a parking lot, from transmitting excess noise and glare.

Best Management Practices. Conservation practices or systems of practices and management measures, often promulgated by state and federal agencies or the responsible local government, that:

- A. Control soil loss and reduce water quality degradation caused by nutrients, animal waste, toxins, and sediment;
- B. Minimize adverse impacts to surface water and ground water flow, circulation patterns, and to the chemical, physical, and biological characteristics of waters, wetlands, and other fish and wildlife habitats;
- C. Control site runoff, spillage or leaks, sludge or water disposal, or drainage from raw material.

Bioengineering. The use of biological elements, such as the planting of vegetation, often in conjunction with engineered systems, to provide a structural shoreline stabilization measure with minimal negative impact to the shoreline ecology.

Biofiltration system. A stormwater or other drainage treatment system that utilizes as a primary feature the ability of plant life to screen out and metabolize sediment and pollutants. Typically, biofiltration systems are designed to include grassy swales, retention ponds and other vegetative features.

Boathouse. Any roofed and enclosed structure built onshore or offshore for storage of watercraft or float planes. See also Covered Moorage.

BOATING FACILITIES. Developments and uses that support access to shoreline waters for purposes of boating, including marinas, community piers serving more than four single-family residences or multi-family units, and public boat launches.

Boat launch. Any structure used for transferring watercraft between uplands and the water. Boat launches are typically launch ramps, but may also include other mechanisms such as a hoist or crane often used at dry storage locations. See also LAUNCH RAMP.

Bog. A wet, spongy, poorly drained area which is usually rich in very specialized plants, contains a high percentage of organic remnants and residues, and frequently is associated with a spring, seepage area, or other subsurface water source. A bog sometimes represents the final stage of the natural process of eutrophication by which lakes and other bodies of water are very slowly transformed into land areas.

Breakwater. An offshore structure that is generally built parallel to shore that may or may not be connected to land, and may be floating or stationary. The primary purpose is to protect harbors, moorages and navigation activity from wave and wind action by

creating stillwater areas along shore. A secondary purpose is to protect shorelines from wave caused erosion.

Buffer or SHORELINE Buffer. The area adjacent to a shoreline that separates and protects the waterbody from adverse impacts associated with adjacent land uses. It is designed and designated to remain vegetated in an undisturbed and natural condition to protect an adjacent aquatic or wetland site from upland impacts, to provide habitat for wildlife, to afford limited public access, and to accommodate certain other specified uses that benefit from a shoreline location. The dimensions of the shoreline buffer are established in the Vegetation Conservation sections of this SMP.

Building. Any combination of materials constructed, placed or erected permanently on the ground or attached to something having a permanent location on the ground, for the purpose of shelter, support or enclosure of persons, animals or property, or when supporting any use, occupancy or function. Excluded from this definition are structures waterward of the OHWM, all forms of vehicles even though immobilized, residential fences, retaining walls less than three feet in height, rockeries and similar improvements of a minor nature. The terms building and structure are synonymous.

Bulkhead. A solid wall erected generally parallel to and at or near the OHWM for the purpose of protecting adjacent uplands from waves or current action.

Buoy, MOORING. An anchored float for the purpose of mooring vessels .

Buoy, navigation. An anchored float for the purpose of identifying navigational hazards or directing watercraft traffic.

C

Channel Migration Zone (CMZ). The area along a river or stream within which the channel(s) can reasonably be expected to migrate over time as a result of natural and normally occurring hydrological and related processes when considered with the characteristics of the river and its surroundings. (WAC 173-26-020(6)) It encompasses that area of current and historic lateral stream channel movement that is subject to erosion, bank destabilization, rapid stream incision, and/or channel shifting, as well as adjacent areas that are susceptible to channel erosion.

Channelization. The straightening, relocation, deepening or lining of stream channels, including construction of continuous revetments or levees for the purpose of preventing gradual, natural meander progression.

City/CITIES. Local governments with shorelines in Chelan County. Cities include, but are not limited to, the Cities of Cashmere, Chelan, Entiat, Leavenworth, and Wenatchee and those that may incorporate in accordance with applicable State and County laws.

Clearing. The destruction or removal of vegetation ground cover, shrubs and trees including, but not limited to, root material removal and/or topsoil removal.

Commercial Development. Those developments whose primary use is for retail, service or other commercial business activities. Included in this definition are developments such as hotels, motels, bed and breakfast establishments, or other commercial accommodations, shops, restaurants, banks, professional offices, grocery stores, laundromats, recreational vehicle parks, and indoor or intensive outdoor commercial recreation facilities.

Commercial Uses. Commercial uses are those activities engaged in commerce and trade and involving the exchange of money, including but not limited to, retail, services, wholesale, or business trade activities. Examples include, but are not limited to, hotels, motels, or other commercial accommodations, grocery stores, restaurants, shops, commercial recreation facilities, and offices.

COMMUNITY ACCESS. The ability of all property owners or members of a residential development to reach and use the waters of the State, the water/land interface, and associated shoreline area. It includes physical access that is either lateral (areas paralleling the shore) or perpendicular (an easement or community corridor to the shore), and/or visual access facilitated by scenic roads and overlooks, viewing platforms, and other community sites or facilities. Community access is not intended for the general public. (example SMPs)

COMMUNITY PIER. A private water-related facility designed for moorage of pleasure craft as its primary use that serves a specified residential development of more than four single-family residences or multi-family units. Other water-enjoyment uses, such as fishing or viewing, may occur on community piers.

Conditional use, SHORELINE. A use, development, or substantial development which is classified as a Conditional Use or is not classified within this SMP. Those activities identified as conditional uses or not classified in this SMP must be treated according to the review criteria established in WAC 173-27-160. (WAC 173-27-030)

Conservation. The prudent management of rivers, streams, wetlands, wildlife and other environmental resources in order to preserve and protect them. This includes the careful use of natural resources to prevent depletion or harm to the environment.

Conservation Easement. A legal agreement that the property owner enters into to restrict uses of the land for purposes of natural resources conservation. The easement is recorded on a property deed, runs with the land, and is legally binding on all present and future owners of the property.

Contaminant. Any chemical, physical, biological, or radiological substance that does not occur naturally in ground water, air, or soil or that occurs at concentrations greater than those in the natural levels. (WAC 173-200)

County. Chelan County, Washington.

Covered moorage. Boat moorage, with or without walls, that has a roof to protect the vessel. See also BOATHOUSE.

Critical Aquifer Recharge Area. Areas designated by WAC 365-190-080(2) that are determined to have a critical recharging effect on aquifers (i.e., maintain the quality and quantity of water) used for potable water as defined by WAC 365-190-030(2).

Critical Area. Critical Areas include the following areas and ecosystems:

- (a) Wetlands; (b) areas with a critical recharging effect on aquifers used for potable waters; (c) fish and wildlife habitat conservation areas; (d) frequently flooded areas; and (e) geologically hazardous areas.

The provisions of WAC 365-190-080 through 365-190-130, to the extent standards for certain types of critical areas are not provided by this section and of WAC 173-26-221 subsection (3) flood hazard reduction, and to the extent consistent with the WAC 173-26 guidelines are also applicable to and provide further definition of critical area categories and management policies.

Critical Habitat. Habitat areas with which endangered, threatened, sensitive or monitored plant, fish, or wildlife species have a primary association (e.g., feeding, breeding, rearing of young, migrating). Such areas are identified in WCC 16.16 with reference to lists, categories, and definitions promulgated by the Washington Department of Fish and Wildlife as identified in WAC 232-12-011 or 232-12-014; in the Priority Habitat and Species (PHS) program of the Department of Fish and Wildlife; or by rules and regulations adopted by the U.S. Fish and Wildlife Service, National Marine Fisheries Service, or other agency with jurisdiction for such designations.

D

DAHP. The State of Washington Department of Archaeology and Historic Preservation.

Department of Ecology or ECOLOGY. The Washington State Department of Ecology. (WAC 173-27-030)

Development. A use consisting of the construction or exterior alteration of structures; dredging; drilling; dumping; filling; removal of any sand, gravel, or minerals; bulkheading; driving of piling; placing of obstructions; or any project of a permanent or temporary nature which interferes with the normal public use of the surface of the waters of the state subject to Chapter 90.58 RCW at any stage of water level. (RCW 90.58.030(3)(d).)

Development regulations. The controls placed on development or land uses by local government, including, but not limited to, zoning ordinances, critical areas ordinances,

all portions of a shoreline master program other than goals and policies approved or adopted under Chapter 90.58 RCW, planned unit development ordinances, subdivision ordinances, and binding site plan ordinances together with any amendments thereto. (WAC 173-26-020(8))

Dike. An artificial embankment or revetment normally set back from the bank or channel in the floodplain for the purpose of keeping floodwaters from inundating adjacent land.

Dock. All platform structures or anchored devices in, suspended over, or floating on waterbodies to provide moorage for pleasure craft (including watercraft and float planes) or landing for water-dependent recreation including, but not limited to, piers, floats, swim floats, float plane moorages, and water ski jumps. Excluded are launch ramps. Docks often consist of a nearshore pier with a ramp to an offshore float. See also PIER

Document of record. The most current shoreline master program officially approved or adopted by rule by the Department of Ecology for a given local government jurisdiction, including any changes resulting from appeals filed pursuant to RCW 90.58.190. (WAC 173-26-020(9))

Dredging. Excavation or displacement of the bottom or shoreline of a waterbody for purposes of flood control, navigation, or restoration. Dredging, as regulated in this SMP under Section 5.8, is not intended to cover other excavations waterward of the ordinary high water mark that are incidental to construction of an otherwise authorized use or modification (e.g., shoreline crossings, bulkhead replacements).

E

Ecological functions (or shoreline functions). The work performed or role played by the physical, chemical, and biological processes that contribute to the maintenance of the aquatic and terrestrial environments that constitute the shoreline's natural ecosystem. (WAC 173-26-020(11))

ECOLOGY. See DEPARTMENT OF ECOLOGY.

Ecosystem-wide processes. The suite of naturally occurring physical and geologic processes of erosion, transport, and deposition and specific chemical processes that shape landforms within a specific shoreline ecosystem and determine both the types of habitat and the associated ecological functions. (WAC 173-26-020(12))

Emergency/EMERGENCY CONSTRUCTION. An unanticipated and imminent threat to public health, safety, or the environment which requires immediate action within a time too short to allow full compliance with the master program. Emergency construction is construed narrowly as that which is necessary to protect property and facilities from the elements. Emergency construction does not include development of

new permanent protective structures where none previously existed. Where new protective structures are deemed by the administrator to be the appropriate means to address the emergency situation, upon abatement of the emergency situation the new structure shall be removed or any permit which would have been required, absent an emergency, pursuant to Chapter 90.58 RCW, these regulations, or this SMP, shall be obtained. All emergency construction shall be consistent with the policies of Chapter 90.58 RCW and this SMP. As a general matter, flooding or seasonal events that can be anticipated and may occur but that are not imminent are not an emergency. (RCW 90.58.030(3eiii))

Enhancement. Alteration of an existing resource to improve or increase its characteristics, functions, or processes without degrading other existing ecological functions. Enhancements are to be distinguished from resource creation or restoration projects. See also BEACH ENHANCEMENT/RESTORATION.

Erosion. The wearing away of land by the action of natural forces.

Excavation. The disturbance, displacement and/or disposal of unconsolidated earth material such as silt, sand, gravel, soil, rock or other material from all areas landward of OHWM.

Exemption. Certain specific developments as listed in WAC 173-27-040 are exempt from the definition of substantial developments and are therefore exempt from the Shoreline Substantial Development Permit process of the SMA. An activity that is exempt from the substantial development provisions of the SMA must still be carried out in compliance with policies and standards of the Act and this SMP. Conditional use and/or variance permits may also still be required even though the activity does not need a Shoreline Substantial Development Permit. (RCW 90.58.030(3e); WAC 173-27-040.)

Existing and ongoing agricultural activities. Those activities conducted on lands defined in RCW 36.70A.030 and those activities involved in the production of crops and livestock, including, but not limited to, operation and maintenance of existing farm and stock ponds or drainage ditches, irrigation systems, changes between agricultural activities, and maintenance or repair of existing serviceable structures and facilities. Activities that result in the filling of an area or bring an area into agricultural use are not part of an ongoing activity. An operation ceases to be ongoing when the area on which it was conducted has been converted to a non-agricultural use, or has lain idle for more than five (5) years unless that idle land is registered in a federal or state soils conservation program. Forest practices are not included in this definition. (term used in WAC 173-26-221(3); defined based on example SMPs and Growth Management Act) See also AGRICULTURAL ACTIVITIES.

F

Fair market value. The open market bid price for conducting the work, using the equipment and facilities, and purchase of the goods, services, and materials necessary to accomplish the development. This would normally equate to the cost of hiring a contractor to undertake the development from start to finish, including the cost of labor, materials, equipment and facility usage, transportation, and contractor overhead and profit. The fair market value of the development shall include the fair market value of any donated, contributed, or found labor, equipment, or materials. (WAC 173-27-030)

Feasible. For the purpose of this master program, that an action, such as a development project, mitigation, or preservation requirement, meets all of the following conditions:

- A. The action can be accomplished with technologies and methods that have been used in the past, or studies or tests have demonstrated that such approaches are currently available and likely to achieve the intended results.
- B. The action provides a reasonable likelihood of achieving its intended purpose. Reasonable means acceptable and according to common sense or normal practice.
- C. The action does not physically preclude achieving the project's primary intended use. (WAC 173-26-020(13))

In cases where these guidelines require certain actions unless they are infeasible, the burden of proving infeasibility is on the applicant.

In determining an action's infeasibility, the responsible local government may weigh the action's relative public costs and public benefits, considered in the short- and long-term time frames. (WAC 173-26-020(13)) See INFEASIBLE

Feed lot. A confined area or structure for feeding, breeding or holding livestock for eventual sale or slaughter and in which animal waste accumulates faster than it can naturally dissipate without creating a potential for a health hazard, particularly with regard to surface and groundwater; but not including barns, pens or other structures used in a dairy operation or structures on farms holding livestock primarily during winter periods. (Chelan County Code 14.98.020 Definitions)

Fill. The addition of soil, sand, rock, gravel, sediment, earth retaining structure, or other material to an area waterward of the OHWM, in wetlands, or on shorelands in a manner that raises the elevation or creates dry land. (WAC 173-26-020(14))

FLOATING HOMES. Any floating structure that is designed, or has been substantially and structurally remodeled or redesigned, to serve primarily as a residence. "Floating homes" include house boats, house barges, or any floating structures that serve primarily as a residence and do not qualify as a vessel. A floating structure that is used as a residence and is capable of navigation, but is not designed primarily for navigation,

nor normally is capable of self propulsion and use as a means of transportation is a floating home, not a vessel. (WAC 332-30-106)

Floats. A detached, anchored platform that is free to rise and fall with water levels, used for boat mooring, swimming or similar recreational activities that is not anchored or accessed directly from the shoreline.

FLOOD CONTROL WORKS. Methods or facilities designed to reduce flooding of adjacent lands, to control or divert stream flow, to retard bank erosion, or to create a reservoir.

A. Nonstructural measures include, but are not limited to, shoreline buffers, land use controls, wetland restoration, dike removal, use relocation, biotechnical measures, storm water management programs, land or easement acquisition, voluntary protection and enhancement projects, or incentive programs.

B. Structural measures include, but are not limited to, dikes, levees, revetments, floodwalls, channel realignment.

Floodplain. Synonymous with one hundred-year floodplain and means that land area susceptible to inundation with a one percent chance of being equaled or exceeded in any given year. The limit of this area shall be based upon flood ordinance regulation maps or a reasonable method which meets the objectives of the Act. (WAC 173-26-020(15))

Floodway. The area, as identified in a master program, that either: (i) Has been established in federal emergency management agency flood insurance rate maps or floodway maps; or (ii) consists of those portions of a river valley lying streamward from the outer limits of a watercourse upon which flood waters are carried during periods of flooding that occur with reasonable regularity, although not necessarily annually, said floodway being identified, under normal condition, by changes in surface soil conditions or changes in types or quality of vegetative groundcover condition. Regardless of the method used to identify the floodway, the floodway shall not include those lands that can reasonably be expected to be protected from flood waters by flood control devices maintained by or maintained under license from the federal government, the state, or a political subdivision of the state. (RCW 90.58.030(2)(g))

Forest Practices. Any activity conducted on or directly pertaining to forest land and relating to growing, harvesting, or processing timber, including but not limited to: road and trail construction; harvesting, final and intermediate; precommercial thinning; reforestation; fertilization; prevention and suppression of diseases and insects; salvage of trees; and brush control. Forest practices do not include preparatory work such as tree marking, surveying and road flagging, and removal or harvesting of incidental vegetation from forest lands such as berries, ferns, greenery, mistletoe, herbs, mushrooms, and other products which cannot

normally be expected to result in damage to forest soils, timber, or public resources. (Chelan County Code 14.20.030)

Frequently flooded area. Means an area subject to flooding, as defined by the Flood Insurance Rate Maps (FIRM), once every one hundred years.

G

Geotechnical analysis. A scientific study or evaluation conducted by a qualified expert that includes a description of the ground and surface hydrology and geology, the affected land form and its susceptibility to mass wasting, erosion, and other geologic hazards or processes, conclusions and recommendations regarding the effect of the proposed development on geologic conditions, the adequacy of the site to be developed, the impacts of the proposed development, alternative approaches to the proposed development, and measures to mitigate potential site-specific and cumulative impacts of the proposed development, including the potential adverse impacts to adjacent and down-current properties. Geotechnical reports shall conform to accepted technical standards and must be prepared by qualified engineers or geologists who are knowledgeable about the regional and local shoreline geology and processes. (WAC 173-26-020(16))

Geotechnical report. See GEOTECHNICAL ANALYSIS.

Grade. See average grade level.

Grading. The movement or redistribution of the soil, sand, rock, gravel, sediment, or other material on a site in a manner that alters the natural contour of the land. (WAC 173-26-020(17))

Grassy Swale. A vegetated drainage channel that is designed to remove various pollutants from storm water runoff through biofiltration.

GRAY WATER. Sewage from bathtubs, showers, bathroom sinks, washing machines, dishwashers, and kitchen sinks. It includes sewage from any source in a residence or structure that has not come into contact with toilet wastes.

Groins. A barrier type of structure extending from the backshore or stream bank into a waterbody for the purpose of the protection of a shoreline and adjacent uplands by influencing the movement of water or deposition of materials.

Groundwater. All water that exists beneath the land surface or beneath the bed of any stream, lake or reservoir, or other body of surface water within the boundaries of the state, whatever may be the geological formation or structure in which such water stands or flows, percolates or otherwise moves (Chapter 90.44 RCW).

Growth Management Act. RCW 36.70A and 36.70B, as amended.

Guidelines. Those standards adopted by the Department of Ecology into the Washington Administrative Code (WAC) to implement the policy of Chapter 90.58 RCW for regulation of use of the shorelines of the state prior to adoption of master programs. Such standards also provide criteria for local governments and the Department of Ecology in developing and amending master programs. (WAC 173-26-020(18))

H

Habitat. The place, including physical and biotic conditions, where a plant or animal usually occurs or could occur and is fundamentally linked to the actual or potential distribution and abundance of species. A species may use a habitat or a structural component of the habitat for all or part of its lifecycle, and may adapt to use various habitats. Habitat is scale-dependent and refers to a large geographic area, a species' home range, a local setting, or a site-specific feature. Habitat may perform a specific function for a species or multiple species, and may include those elements necessary for one or more species to feed, migrate, breed, or travel.

Hard Structural Shoreline Stabilization. Shoreline erosion control practices using hardened structures that armor and stabilize the shoreline from further erosion. Hard structural shoreline stabilization typically uses concrete, boulders, dimensional lumber or other materials to construct linear, vertical or near-vertical faces. These include bulkheads, rip-rap, groins, and similar structures.

Height. The vertical dimension measured from average grade to the highest point of a structure; provided that, antennas, chimneys, and similar appurtenances shall not be used in calculating height, unless such appurtenance obstructs the view of a substantial number of adjacent residences. Temporary construction equipment is excluded in this calculation. (WAC 173-27-030)

Historic Preservation Professional. Individuals who meet standards promulgated by the DAHP as well as the National Park Service and published in 36 CFR Part 61. These standards address minimum education and experience required to perform identification, evaluation, registration and treatment activities for historic properties. In some cases, additional areas or levels of expertise may be needed, depending on the complexity of the task and the nature of the properties involved. (Based on <http://www.dahp.wa.gov/pages/EnvironmentalReview/Consultants.htm>)

Historic Site. Sites that are eligible or listed on the Washington Heritage Register, National Register of Historic Places or any locally developed historic registry formally adopted by the responsible local government. (State DAHP recommendations)

Hydrological. Referring to the science related to the waters of the earth including surface and ground water movement, evaporation and precipitation. Hydrological

functions in shoreline include, water movement, storage, flow variability, channel movement and reconfiguration, recruitment and transport of sediment and large wood, and nutrient and pollutant transport, removal and deposition.

I

Impervious surface. A hard surface area which either prevents or retards the entry of water into the soil mantle as under natural conditions prior to development. A hard surface area which causes water to run off the surface in greater quantities or at an increased rate of flow from the flow present under natural conditions prior to development. Common impervious surfaces include, but are not limited to, roof tops, walkways, patios, driveways, parking lots or storage areas, concrete or asphalt paving, gravel roads, packed earthen materials, and oiled, macadam or other surfaces which similarly impede the natural infiltration of stormwater. For purposes of determining whether thresholds for application of core elements are exceeded, open, uncovered retention or detention facilities shall not be considered as impervious surfaces. Open, uncovered retention or detention facilities shall be considered impervious surfaces for purposes of runoff modeling. (Chelan County Code 13.18.020 (16))

INFeasible. To determine that an action, such as a development project, mitigation, or preservation requirement, is infeasible, the following conditions are found:

- A. The action cannot be accomplished with technologies and methods that have been used in the past, or studies or tests have demonstrated that such approaches are currently not available or unlikely to achieve the intended results.
- B. The action provides is not likely to achieve its intended purpose.
- C. The action precludes achieving the project's primary intended use.
- D. The action's relative public costs and public benefits, considered in the short- and long-term time frames, show the costs far outweigh the benefits.

In cases where these guidelines require certain actions unless they are infeasible, the burden of proving infeasibility is on the applicant. In determining an action's infeasibility, the responsible local government may weigh the action's relative public costs and public benefits, considered in the short- and long-term time frames. (WAC 173-26-020(13)) See FEASIBLE.

Industrial development. Facilities for processing, manufacturing, and storage of finished or semi-finished goods, including but not limited to oil, metal or mineral product refining, power generating facilities, including hydropower, ship building and major repair, storage and repair of large trucks and other large vehicles or heavy equipment, related storage of fuels, commercial storage and repair of fishing gear, warehousing construction contractors' offices and material/equipment storage yards,

wholesale trade or storage, and log storage on land or water, together with necessary accessory uses such as parking, loading, and waste storage and treatment. Excluded from this definition are mining including onsite processing of raw materials, and off site utility, solid waste, road or railway development, and methane digesters that are accessory to an agricultural use.

Industrial Uses. The production, processing, manufacturing, or fabrication of goods or materials, including warehousing and storage of materials or production.

Infiltration. The passage or movement of water into the soil surface.

Institutional. Those public and/or private facilities including, but not limited to, police and fire stations, libraries, activity centers, schools, educational centers, water-oriented research facilities, and similar uses. These may also be called public facilities.

In-WATER structure. Structure placed by humans within a stream, river or lake waterward of the OHWM that either causes or has the potential to cause water impoundment or the diversion, obstruction, or modification of water flow. In-water structures may include those for hydroelectric generation, irrigation, water supply, flood control, transportation, utility service transmission, fish habitat enhancement, or other purpose.

Invasive species. A species that is 1) non-native (or alien) to Chelan County and 2) whose introduction causes or is likely to cause economic or environmental harm or harm to human health. Invasive species can be plants, animals, and other organisms (e.g., microbes).

J

Jetties. Structures generally built singly or in pairs perpendicular to the shoreline at harbor entrances or river mouths to prevent shoaling and accretion of littoral sand drift. They also protect channels and inlets from crosscurrents and storm waves.

Joint-use DOCKS, piers, ramps, and floats. Those constructed and utilized by more than one waterfront property owner, whether on adjacent lots as single-family residences or as multi-family units, or by a homeowner's association. This does not include marinas or community piers that serve more than four single-family residences or multi-family units.

Jurisdiction. The shoreline jurisdiction as established in Chapter 1 of this SMP.

L

Lake. A body of standing water in a depression of land or expanded part of a river, including reservoirs, of twenty acres or greater in total area. A lake is bounded by the OHWM or, where a stream enters a lake, the extension of the elevation of the lake's

OHWM within the stream. Where the OHWM cannot be found, it shall be the line of mean high water.

Landslide. A general term covering a wide variety of mass movement landforms and processes involving the down slope transport, under gravitational influence of soil and rock material en masse; included are debris flows, debris avalanches, earthflows, mudflows, slumps, mudslides, rock slides, and rock falls.

LARGE WOODY DEBRIS. Logs, limbs, or root wads 4 inches or larger in diameter, delivered to waterbodies from adjacent riparian or upslope areas or from upstream areas. (based on a definition in a WDFW document)

LAUNCH RAMP. An inclined slab, set of pads, planks, or graded slope which extends waterward of the OHWM, and is used for transferring watercraft between uplands and the water with trailers or occasionally by hand. See also BOAT LAUNCH.

Legally established.. A use or structure in compliance with the laws and rules in effect at the time of creation of the use or structure.

Levee. A natural or artificial embankment on the bank of a stream for the purpose of keeping floodwaters from inundating adjacent land. Some levees have revetments on their sides.

Littoral. Living on, or occurring on, the shore.

Littoral drift. The mud, sand, or gravel material moved parallel to the shoreline in the nearshore zone by waves and currents.

LIVEABOARD. A floating vessel that serves as a residence, and is self-powered by sail or motor.

Local government. Any county, incorporated city or town which contains within its boundaries shorelines of the state subject to chapter 90.58 RCW. (WAC 173-26-020(19))

M

MAINTENANCE, NORMAL. Those usual acts to prevent a decline, lapse, or cessation from a legally established condition.

Marina. A public or private water-dependent wet moorage facility for pleasure craft and/or commercial craft where goods, moorage or services related to boating may be sold commercially or provided for a fee e.g. yacht club, etc. Dry storage and launching facilities, either boat launch, crane or hoist, may also be provided. Marinas may be open to the general public or restricted on the basis of property ownership or membership. Community piers/docks that do not provide commercial services are not considered marinas.

May. Refers to actions that are acceptable, provided they conform to the provisions of this master program and the Act. (WAC 173-26-020(21))

Mineral extraction. The removal of topsoil, gravel, rock, clay, sand or other earth material, including accessory activities such as washing, sorting, screening, crushing and stockpiling. Not included is the leveling, grading, filling, or removal of materials during the course of normal site preparation for an approved use (e.g., residential subdivision, commercial development, etc.) subject to the provisions of this SMP.

Mitigation (or mitigation sequencing). The process of avoiding, reducing, or compensating for the environmental impact(s) of a proposal.

Mixed Use Commercial. Developments that include water-dependent commercial uses combined with water-related, water-enjoyment uses and/or nonwater-oriented commercial uses. Mixed-use developments can be a tool for water-dependent activities, civic revitalization, and public access to the shoreline.

Mixed use residential. Mixed use developments that include water-dependent and water-oriented commercial uses together with single-family or multi-family uses while promoting public access for significant numbers of the public and/or providing an ecological restoration resulting in a public benefit. This mix of uses is intended to reduce transportation trips, use land efficiently, and provide for waterfront commerce and housing options.

modification. A change or alteration in existing materials, including structures and plans.

Modification, shoreline. Those actions that modify the physical configuration or qualities of the shoreline area, usually through the construction of a physical element such as a dike, breakwater, dock, weir, dredged basin, fill, bulkhead, or other shoreline structures. They can include other actions, such as clearing, grading, or application of chemicals. (WAC 173-26-020(31))

Moorage facility. Any device or structure used to secure a boat or a vessel, including piers, docks, piles, lift stations or buoys.

Moorage pile. A permanent vertical column generally located in open waters, often in close proximity to a dock or pier, to which the vessel is tied to prevent it from excessive movement generated by wind, or wind- or boat-driven waves.

Multi-family dwelling (or residence). A building containing two or more dwelling units, including, but not limited to, duplexes, apartments and condominiums.

Must. A mandate; the action is required. (WAC 173-26-020(22)) See SHALL.

N

Navigable Waters. Navigable waters of the United States are those waters that are presently used, or have been used in the past, or may be susceptible for use to transport interstate or foreign commerce. A determination of navigability, once made, applies laterally over the entire surface of the waterbody, and is not extinguished by later actions or events which impede or destroy navigable capacity.

NECESSARY: A word describing an element that is essential, indispensable or needed to achieve a certain result or effect. (www. Dictionary.com)

No Net Loss. A public policy goal and requirement to maintain the aggregate total of the County's shoreline ecological functions at its current level of environmental resource productivity. For purposes of reviewing and approving this SMP, "current" is equivalent to the date of the Final Shoreline Inventory and Analysis Report (August 9, 2010). As a development and/or mitigation standard, no net loss requires that the impacts of a particular shoreline development and/or use, whether permitted or exempt, be identified and prevented or mitigated, such that it has no resulting adverse impacts on shoreline ecological functions or processes relative to the legal condition just prior to the proposed development and/or use.

Nonconforming use or development. A shoreline use or development which was lawfully constructed or established prior to the effective date of the Act (June 1, 1971; RCW 90.58.920) or this SMP (March 19, 2013), or amendments thereto, but which does not conform to present regulations or standards of the SMP.

Nonpoint pollution. Pollution that enters any waters of the state from any dispersed land-based or water-based activities, including, but not limited to, atmospheric deposition, surface water runoff from agricultural lands, urban areas, or forest lands, subsurface or underground sources, or discharges from boats or marine vessels not otherwise regulated under the National Pollutant Discharge Elimination System program.

Nonwater-oriented uses. Those uses that are not water-dependent, water-related, or water-enjoyment. (WAC 173-26-020(23))

Normal maintenance. See MAINTENANCE, NORMAL and REPAIR, NORMAL"

Normal protective bulkhead. Those structural and nonstructural developments installed at or near, and parallel to, the OHWM for the sole purpose of protecting an existing single-family residence and appurtenant structures from loss or damage by erosion. (WAC 173-27-040(2)(c))

Normal repair. See REPAIR, NORMAL and MAINTENANCE, NORMAL

NOXIOUS WEEDS. A special sub-class of invasive plant species listed as Class A or B by the Chelan County Noxious Weed Control Board.

O

Off-site replacement. To replace wetlands or other shoreline environmental resources away from the site on which a resource has been impacted by a regulated activity.

Ordinary high water mark (OHWM). That mark that will be found by examining the bed and banks and ascertaining where the presence and action of waters are so common and usual, and so long continued in all ordinary years, as to mark upon the soil a character distinct from that of the abutting upland, in respect to vegetation as that condition exists on June 1, 1971, as it may naturally change thereafter, or as it may change thereafter in accordance with permits issued by a local government or the Department of Ecology. See RCW 90.58.030(2)(b).

Overwater Structures. Any structure located waterward of the OHWM. Common examples include, but are not limited to, residential docks, marinas, and bridges over waterways.

P

Parking. A place where vehicles are temporarily stored while an activity is being conducted. Local parking is located onsite intended to serve and support a primary use(s) of a property. Regional parking is a parking area intended to support a district with multiple uses.

Party of record. All persons, agencies, or organizations who have submitted written or verbal comments in response to a notice of application, made oral comments in a formal public hearing conducted on the application, or notified local government of their desire to receive a copy of the final decision on a permit and who have provided an address for delivery of such notice by mail.

Periodic. Occurring at regular intervals.

Person. An individual, partnership, corporation, association, organization, cooperative, public or municipal corporation, or agency of the state or local governmental unit however designated. (RCW 90.58.030(1d))

Pier. Fixed platform above the water and supported by piles, usually perpendicular to the shoreline. See also DOCK.

Primary Use. The main or dominant activity occurring on a lot. Primary uses include permitted, conditional uses, or nonconforming uses.

Primary structure. A building that is occupied or is intended to be occupied by a primary use.

Priority habitat. A habitat type with unique or significant value to one or more species. An area classified and mapped as priority habitat must have one or more of the following attributes: Comparatively high fish or wildlife density; comparatively high fish or wildlife species diversity; fish spawning habitat; important wildlife habitat; important fish or wildlife seasonal range; important fish or wildlife movement corridor; rearing and foraging habitat; refuge; limited availability; high vulnerability to habitat alteration; unique or dependent species; or shellfish bed. A priority habitat may be described by a unique vegetation type or by a dominant plant species that is of primary importance to fish and wildlife. A priority habitat may also be described by a successional stage. Alternatively, a priority habitat may consist of a specific habitat element (such as talus slopes, caves, snags) of key value to fish and wildlife. A priority habitat may contain priority and/or non-priority fish and wildlife (WAC 173-26-020(24)).

Priority species. Species requiring protective measures and/or management guidelines to ensure their persistence at genetically viable population levels. Priority species are those that meet any of the criteria listed below: (WAC 173-26-020(25))

- A. State-listed or state proposed species. State-listed species are those native fish and wildlife species legally designated as endangered (WAC 232-12-014), threatened (WAC 232-12-011), or sensitive (WAC 232-12-011). State proposed species are those fish and wildlife species that will be reviewed by the Department of Fish and Wildlife (POL-M- 6001) for possible listing as endangered, threatened, or sensitive according to the process and criteria defined in WAC 232-12-297.
- B. Vulnerable aggregations. Vulnerable aggregations include those species or groups of animals susceptible to significant population declines, within a specific area or statewide, by virtue of their inclination to congregate. Examples include heron colonies, seabird concentrations, and marine mammal congregations.
- C. Species of recreational, commercial, and/or tribal importance. Native and nonnative fish, shellfish, and wildlife species of recreational or commercial importance and recognized species used for tribal ceremonial and subsistence purposes that are vulnerable to habitat loss or degradation.
- D. Species listed under the federal Endangered Species Act as either proposed, threatened, or endangered (WAC).

Provisions. Policies, regulations, standards, guideline criteria or designations. (WAC 173-26-020(26))

Public Access. The public's ability to reach and use the State's public waters, the water/land interface, and associated shoreline area. It includes physical access that is

either lateral (areas paralleling the shore) or perpendicular (an easement or public corridor to the shore), and visual access facilitated by means such as scenic roads and overlooks, viewing platform, and other public sites or facilities. (WAC 173-26-221(4) and example SMPs, Whatcom County) See also Community Access.

Public interest. The interest shared by the citizens of the state or community at large in the affairs of government, or some interest by which their rights or liabilities are affected such as an effect on public property or on health, safety, or general welfare resulting from a use or development. (WAC 173-27-030)

Q

QUALIFIED PROFESSIONAL. A person with expertise and training appropriate for the relevant subject. A qualified professional must have obtained a B.S. or B.A. or equivalent degree in biology, soil science, engineering, environmental studies, fisheries, geology, hydrology, geomorphology or related field, and at least five years of related work experience. Specific qualified professionals must also meet the following criteria, or any other criteria included in Appendix A, Critical Areas Regulations:

- A. A qualified professional providing a geotechnical analysis as required under Section 5.18 of this Master Program must be a licensed engineer in the State of Washington, with specific training in geology, hydrology and/or geomorphology.
- B. A qualified professional providing a demonstration of need as required under Section 5.18 of this Master Program must have a M.S. or equivalent degree in geology, hydrology, or geomorphology.
- C. A qualified professional for wetlands means a biologist who has a degree in biology, ecology, botany, or a closely related field and a minimum of five (5) years of professional experience in wetland identification and assessment in Eastern Washington.
- D. A qualified professional for habitat conservation areas means a biologist who has a degree in wildlife biology, ecology, fisheries, or closely related field and a minimum of five (5) years professional experience related to the subject species/habitat type.
- E. A qualified professional for geologically hazardous areas must be an engineer or geologist licensed in the state of Washington. An engineer must be licensed as a civil engineer pursuant to Chapter 18.43 RCW, to qualify. A geologist must be a practicing geologist licensed as a professional geologist pursuant to Chapter 18.22, RCW.
- F. A qualified professional for critical aquifer recharge areas means a Washington State licensed hydro-geologist, geologist, or engineer.

R

RCW. Revised Code of Washington.

REASONABLE. Reasonable means acceptable and according to common sense or normal practice.

Recreation. An experience or activity in which an individual engages for personal enjoyment and satisfaction. Most shore-based outdoor recreation such as: fishing, hunting, beach combing, and rock climbing; various forms of boating, swimming, hiking, bicycling, horseback riding, camping, picnicking, watching or recording activities such as photography, painting, bird watching or viewing of water or shorelines, nature study and related activities.

Recreational Uses. Uses which offer activities, pastimes, and experiences that allow for the refreshment of mind and body. Examples include, but are not limited to, parks, camps, camping clubs, launch ramps, golf courses, viewpoints, trails, public access facilities, public parks and athletic fields, hunting blinds, and other low-intensity use outdoor recreation areas. Recreational Uses that do not require a shoreline location, nor are related to the water, nor provide significant public access, are considered nonwater-oriented. For example, a recreation use solely offering indoor activities would be considered nonwater-oriented. Common accessory uses are those uses and amenities that support water-enjoyment uses, including, but not limited to: restrooms, picnic shelters, parking areas, access roads, grilling facilities or barbecue pits, and grassy and riparian open areas (based on example SMPs, Whatcom County, Douglas County).

REPAIR, NORMAL. To restore a development or structure to a state comparable to its original, legally established condition, including but not limited to its size, shape, configuration, location and external appearance, within a reasonable period after decay or partial destruction, except where repair causes substantial adverse effects to shoreline resource or environment. See also MAINTENANCE, NORMAL.

Residential Uses. Buildings, structures or portions thereof that are designed and used as a place for human habitation. Included are single, duplex or multi-family dwellings, apartment/condominium buildings, manufactured homes, modular homes, and other structures that serve to house people. This definition includes accessory uses common to normal residential use, including but not limited to, residential appurtenances, accessory dwelling units, home occupations, and family day care homes.

Responsible Local Government: Means Chelan County or the Cities of Cashmere, Chelan, Entiat, Leavenworth, or Wenatchee and those that may incorporate in accordance with applicable State and County laws. Chelan County is the responsible local government within unincorporated territory, including urban

growth areas, and the Cities are the responsible local government within their City limits.

Restore (restoration or Ecological restoration). Reestablishment or upgrading of impaired ecological shoreline processes or functions. This may be accomplished through measures including but not limited to re-vegetation, removal of intrusive shoreline structures, and removal or treatment of toxic materials. Restoration does not imply a requirement for returning the shoreline area to aboriginal or pre-European settlement conditions. (WAC 173-26-020(27))

Revetment. Facing of stone, concrete, etc., built to protect a steep slope, cliff, embankment, or shore structure against erosion by waves or currents.

Riprap. A layer, facing, or protective mound of stones placed to prevent erosion, scour, or sloughing of a structure or embankment; also, the stone so used.

Riparian vegetation. Vegetation that tolerates and/or requires moist conditions and periodic free flowing water thus creating a transitional zone between aquatic and terrestrial habitats which provides cover, shade and food sources for aquatic and terrestrial insects for fish species. Riparian vegetation and their root systems stabilizes stream banks, attenuates high water flows, provides wildlife habitat and travel corridors, and provides a source of limbs and other woody debris to terrestrial and aquatic ecosystems, which, in turn, stabilize stream beds.

Runoff. Water that is not absorbed into the soil but rather flows along the ground surface following the topography.

S

Sanitary Sewer. A system designed to accept sewage to be deposited into and carried off by a system of lateral sewers, drains, and pipes to a common point, or points, for transfer to treatment or disposal. (based on WAC 458-20-251)

Sediment. The fine grained material deposited by water or wind.

SEPA (State Environmental Policy Act). SEPA requires state agencies, local governments and other lead agencies to consider environmental factors when making most types of permit decisions, especially for development proposals of a significant scale. As part of the SEPA process, environmental impact statements (EISs) may be required to be prepared and public comments solicited. (RCW 43.21c and WAC 197-11 guide this process)

Setback. The distance between property line and the foundation wall of the primary structure.

Setback, SIDE. The distance between side lot line and the foundation wall of the primary structure.

SEWAGE: Any urine, feces, and the water carrying human wastes, including kitchen, bath, and laundry wastes from residences, buildings, industrial establishments or other places. (WAC 246-272A-0010)

Shall. A mandate; the action must be done. (WAC 173-26-020(28)) See also must.

Shared moorage. Dock facilities that would include joint use and/or community dock facilities.

Shorelands or Shoreland Areas. Those lands extending landward for two hundred feet in all directions as measured on a horizontal plane from the ordinary high water mark; floodways and contiguous floodplain areas landward two hundred feet from such floodways; and all wetlands and river deltas associated with the streams, lakes, and tidal waters which are subject to the provisions of this chapter; the same to be designated as to location by the Department of Ecology. (RCW 90.58.030(2)(f))

Shoreline areas. All "shorelines of the state" and "shorelands" as defined in RCW 90.58.030. (WAC 173-26-020(29))

Shoreline environment designations. The categories of shorelines established by local shoreline master programs in order to provide a uniform basis for applying policies and use regulations within distinctively different shoreline areas.

Shoreline functions. See ecological functions.

Shoreline jurisdiction. The term describing all of the geographic areas covered by the SMA, related rules and this SMP. Also, such areas within a specified local government's authority under the SMA. See SHORELINES, SHORELINES OF THE STATE, shorelines of state-wide significance and wetlands. See also Section 3.1 of this SMP.

Shoreline master program, master program, or SMP. A comprehensive use plan for a described area, and the use regulations together with maps, diagrams, charts, or other descriptive material and text, a statement of desired goals, and standards developed in accordance with the policies enunciated in RCW 90.58.020. As provided in RCW 36.70A.480, the goals and policies of a shoreline master program for a county or city approved under chapter 90.58 RCW shall be considered an element of the county or city's comprehensive plan. All other portions of the shoreline master program for a county or city adopted under chapter 90.58 RCW, including use regulations, shall be considered a part of the county or city's development regulations. (WAC 173-26-020(30))

Shoreline permit. A Shoreline Substantial Development Permit, Shoreline Conditional Use Permit, revision, or Shoreline Variance Permit or any combination thereof.

Shoreline property. An individual property wholly or partially within shoreline jurisdiction.

Shoreline stabilization. Structural or non-structural modifications to the existing shoreline intended to reduce or prevent erosion of uplands or beaches. They are generally located parallel to the shoreline at or near the OHWM. Other construction classified as shore defense works include groins, jetties and breakwaters, which are intended to influence wave action, currents and/or the natural transport of sediments along the shoreline.

Shorelines Hearings Board (SHB). A six member quasi-judicial body, created by the SMA, which hears appeals by any aggrieved party on the issuance of a shoreline permit, enforcement penalty and appeals by local government on Department of Ecology approval of master programs, rules, regulations, guidelines or designations under the SMA.

Shorelines of statewide significance. A select category of shorelines of the state, defined in RCW 90.58.030(2)(e), where special policies apply.

Shorelines of the state. The total of all “shorelines” and “shorelines of state-wide significance” within the state.

Shorelines. All of the water areas of the state, including reservoirs, and their associated shorelands, together with the lands underlying them; except (i) shorelines of state-wide significance; (ii) shorelines on areas of streams upstream of a point where the mean annual flow is twenty cubic feet per second or less and the wetlands associated with such upstream areas; and (iii) shorelines on lakes less than twenty acres in size and wetlands associated with such small lakes.

Should. The particular action is required unless there is a demonstrated, compelling reason, based on policy of the Act and this SMP, against taking the action. (WAC 173-26-020(32))

Sign. A board or other display containing words and/or symbols used to identify or advertise a place of business or to convey information. Excluded from this definition are signs required by law and the flags of national and state governments.

Significant ecological impact. An effect or consequence of an action if any of the following apply:

- A. The action measurably or noticeably reduces or harms an ecological function or ecosystem-wide process.

B. Scientific evidence or objective analysis indicates the action could cause reduction or harm to those ecological functions or ecosystem-wide processes under foreseeable conditions.

C. Scientific evidence indicates the action could contribute to a measurable or noticeable reduction or harm to ecological functions or ecosystem-wide processes as part of cumulative impacts, due to similar actions that are occurring or are likely to occur.

Significant vegetation removal. The removal or alteration of trees, shrubs, and/or groundcover by clearing, grading, cutting, burning, chemical means, or other activity that causes a net loss of ecological impacts to functions provided by such vegetation. The removal of invasive or noxious weeds does not constitute significant vegetation removal. Tree pruning, not including tree topping, where it does not affect ecological functions, does not constitute significant vegetation removal. (WAC 173-26-020(33))

Single-family residence (SFR). A detached single dwelling designed for and occupied by one family including those structures and developments within a contiguous ownership which are a normal appurtenance.

SMA. The Shoreline Management Act of 1971, Chapter 90.58 RCW, as amended.

SMP. See SHORELINE MASTER PROGRAM.

Soft structural Shoreline Stabilization: Shoreline erosion control and restoration practices that contribute to restoration, protection or enhancement of shoreline ecological functions. Soft structural shoreline stabilization typically includes a mix of gravels, cobbles, boulders, logs and native vegetation placed to provide shore stability in a non-linear, generally sloping arrangement.

State master program. The cumulative total of all shoreline master programs and amendments thereto approved or adopted by rule by Ecology. (WAC 173-26-020(34))

Storm water. That portion of precipitation that does not normally percolate into the ground or evaporate but flows via overland flow, interflow, channels, or pipes into a defined surface water channel or constructed infiltration facility.

Stormwater facility. A constructed component of a stormwater drainage system designed or constructed to perform a particular function or multiple functions. Stormwater facilities include, but are not limited to: pipes, swales, ditches, culverts, street gutters, detention ponds, retention ponds, constructed wetlands, infiltration devices, catch basins, oil/water separators, and biofiltration swales. (Eastern Washington Stormwater Management Manual)

Stream. Any portion of a channel, bed, bank, or bottom waterward of the ordinary high water line of waters of the state, including areas in which fish may spawn, reside, or

pass, and tributary waters with defined bed or banks, which influence the quality of fish habitat downstream. This includes watercourses which flow on an intermittent basis or which fluctuate in level during the year and applies to the entire bed of such watercourse whether or not the water is at peak level. This definition does not include irrigation ditches, canals, storm water run-off devices, or other entirely artificial watercourses, except where they exist in a natural watercourse that has been altered by humans. (WAC 220-110-020(105)) A shoreline stream is a naturally occurring body of periodic or continuously flowing water where: a) the mean annual flow is greater than twenty cubic feet per second and b) the water is contained within a channel. A channel is an open conduit either naturally or artificially created. This definition does not include artificially created irrigation, return flow, or stockwatering channels (WAC 173-22-030(15))

Structure. A permanent or temporary edifice or building, or any piece of work artificially built or composed of parts joined together in some definite manner, whether installed on, above or below the surface of the ground or water, except for vessels.

Subdivision. The division or redivision of land, including short subdivision, for the purpose of sale, lease or conveyance. (based on definition of subdivision and short subdivision in RCW 58.17.020)

Substantial development, Shoreline. Any development which meets the criteria of RCW 90.58.030(3)(e). See also development and exemption.

Substantially degrade. See SIGNIFICANT ECOLOGICAL IMPACT

Surface water. All water that exists on the land surface, including streams, lakes or reservoirs, or other bodies of surface water within the boundaries of the state. (based on Chapter 90.44 RCW)

Swamp. A depressed area flooded most of the year to a depth greater than that of a marsh and characterized by areas of open water amid soft, wetland masses vegetated with trees and shrubs. Extensive grass vegetation is not characteristic.

SWIM FLOAT. A floating platform designed and intended expressly for facilitating safe swimming. Swim floats are anchored in deeper waters, are not connected to uplands, and are not motorized.

T

Terrestrial. Of or relating to land as distinct from air or water.

Transportation Facilities. Roads and railways, related bridges and culverts, trails, fills, embankments, causeways, truck terminals and rail switchyards, sidings, spurs, and air fields. Not included are, highway rest areas, ship terminals, nor logging roads.

Local transportation refers to facilities provide direct access to abutting land and to

higher order roads. Regional transportation refers to facilities serving more than one city or community or major destinations.

U

Unavoidable. Adverse impacts that remain after all appropriate avoidance and minimization measures have been implemented.

Upland. Generally described as the dry land area above and landward of the OHWM.

Utilities. Lines and facilities related to the provision, distribution, collection, transmission or disposal of water, stormwater, sanitary sewage, oil, gas, power, and telephone cable, and includes facilities for the generation of electricity.

A. "Large facilities" serve more than one community or major attractions. Examples include, but are not limited to, 230 kv power transmission lines, natural gas transmission lines, and regional water storage tanks and reservoirs, regional water transmission lines or regional sewer collectors and interceptors. Large facilities may also include facilities serving an entire community, such as subregional switching stations (one hundred fifteen (115) kv and smaller), and municipal sewer, water, and storm water facilities.

B. "Small facilities" serve adjacent properties and include, but are not limited to, power lines not specified under "large facilities," water, sanitary sewer, and storm water facilities, fiber optic cable, pump stations and hydrants, switching boxes, and other structures normally found in a street right-of-way. On-site utility features serving primary use such as a water, sewer, or gas line to a residence are accessory utilities and shall be considered part of the primary use.

V

Variance, shoreline. A means to grant relief from the specific bulk, dimensional, or performance standards set forth in this master program; not a means to vary a use of a shoreline. Variance permits must be specifically approved, approved with conditions, or denied by the Administrator and the Department of Ecology.

Vessel. A floating structure that is designed primarily for navigation, is normally capable of self propulsion and use as a means of transportation, and meets all applicable laws and regulations pertaining to navigation and safety equipment on vessels, including, but not limited to, registration as a vessel by an appropriate government agency. (WAC 332-30-106)

W

WAC. Washington Administrative Code.

WASTE STORAGE AND TREATMENT. Facilities for collecting and treating, as an accessory use only, garbage, solid waste or sewage generated by the development and its users.

WaterBody. A body of still or flowing water, fresh or marine, bounded by the OHWM.

WATERCRAFT Lift. An in-water structure used for the dry berthing of vessels above the water level and lowering of vessels into the water. A watercraft lift is generally a manufactured unit without a canopy cover and may be placed in the water adjacent to a pier or float, and may be floating or ground-based. Watercraft lifts include, but are not limited to, lifts for motorized boats, kayaks, canoes, jet skis, and float planes. A watercraft lift is different from a hoist or crane used for the launching of vessels.

Water-dependent use. A use or portion of a use which cannot exist in a location that is not adjacent to the water and which is dependent on the water by reason of the intrinsic nature of its operations. (WAC 173-26-020(36)) Examples of water-dependent uses may include ship cargo terminal loading areas, ferry and passenger terminals, barge loading facilities, ship building and dry docking, marinas, aquaculture, float plane facilities, sewer outfalls, and water diversion facilities, such as agricultural pumphouses. (examples based on Shoreline Inventory and Analysis Report)

Water-enjoyment use. A recreational use or other use that facilitates public access to the shoreline as a primary characteristic of the use; or a use that provides for recreational use or aesthetic enjoyment of the shoreline for a substantial number of people as a general characteristic of the use and which through location, design, and operation ensures the public's ability to enjoy the physical and aesthetic qualities of the shoreline. In order to qualify as a water-enjoyment use, the use must be open to the general public and the shoreline-oriented space within the project must be devoted to the specific aspects of the use that fosters shoreline enjoyment. WAC 173-26-020(37) Primary water-enjoyment uses may include, but are not limited to, parks, piers and other improvements facilitating public access to the shorelines of the State, including public view or fishing platforms; and general water-enjoyment uses may include, but are not limited to restaurants, museums, aquariums, scientific/ecological reserves, resorts/hotels (as part of mixed use development or with significant public access or restoration components), and mixed-use commercial/office. (examples based on Shoreline Inventory and Analysis Report)

WATERFRONT. A parcel of property with upland characteristics which includes within its boundary a physical interface with the existing shoreline of a body of water. (WAC 332-30-106)

Water-oriented use. A use that is water-dependent, water-related, or water-enjoyment, or a combination of such uses. (WAC 173-26-020(38))

Water quality. The physical characteristics of water within shoreline jurisdiction, including water quantity, hydrological, physical, chemical, aesthetic, recreation-related, and biological characteristics. Where used in this chapter, the term "water quantity" refers only to development and uses regulated under this chapter and affecting water quantity, such as impervious surfaces and storm water handling practices. Water quantity, for purposes of this master program, does not mean the withdrawal of ground water or diversion of surface water pursuant to RCW 90.03.250 through 90.03.340. (WAC 173-26-020(39))

Water-related use. A use or portion of a use which is not intrinsically dependent on a waterfront location but whose economic viability is dependent upon a waterfront location because:

- A. The use has a functional requirement for a waterfront location such as the arrival or shipment of materials by water or the need for large quantities of water; or
- B. The use provides a necessary service supportive of the water-dependent uses and the proximity of the use to its customers makes its services less expensive and/or more convenient. WAC 173-26-020(40))

Examples of water-related uses may include warehousing of goods transported by water, seafood processing plants, hydroelectric generating plants, gravel storage when transported by barge, oil refineries where transport is by tanker, log storage, and agriculturally related water transportation systems. (examples based on Shoreline Inventory and Analysis Report)

Watershed. A geographic region within which water drains into a particular river, stream or body of water.

WATERSHED RESTORATION PLAN. A plan, developed or sponsored by the Department of Fish and Wildlife, the Department of Ecology, the Department of Natural Resources, the Department of Transportation, a federally recognized Indian tribe acting within and pursuant to its authority, a city, a county, or a conservation district that provides a general program and implementation measures or actions for the preservation, restoration, re-creation, or enhancement of the natural resources, character, and ecology of a stream, stream segment, drainage area, or watershed for which agency and public review has been conducted pursuant to chapter 43.21C RCW, the State Environmental Policy Act. (WAC 173-27-040)

WATERSHED RESTORATION PROJECT. A public or private project authorized by the sponsor of a watershed restoration plan that implements the plan or a part of the plan and consists of one or more of the following activities:

A. A project that involves less than 10 miles of stream or lake reach, in which less than 25 cubic yards of sand, gravel, or soil is removed, imported, disturbed or discharged, and in which no existing vegetation is removed except as minimally necessary to facilitate additional plantings;

B. A project for the restoration of an eroded or unstable stream bank or lake shore that employs the principles of bioengineering, including limited use of rock as a stabilization only at the toe of the bank, and with primary emphasis on using native vegetation to control the erosive forces of wave energy; or

C. A project primarily designed to improve fish and wildlife habitat, remove or reduce impediments to migration of fish, or enhance the fishery resource available for use by all of the citizens of the state, provided that any structure, other than a bridge or culvert or in-water habitat enhancement structure associated with the project, is less than 200 square feet in floor area and is located above the ordinary high water mark of the stream or lake.

Weir. A structure generally built perpendicular to the shoreline for the purpose of diverting water or trapping sediment or other moving objects transported by water.

Wetland or wetlands. Areas that are inundated or saturated by surface water or ground water at a frequency and duration sufficient to support—and that under normal circumstances do support—a prevalence of vegetation typically adapted for life in marshes, bogs, and similar areas. Wetlands do not include those artificial wetlands intentionally created from non-wetland sites, including, but not limited to, irrigation and drainage ditches, grass-lined swales, canals, detention facilities, wastewater treatment facilities, farm ponds, and landscape amenities, or those wetlands created after July 1, 1990, that were unintentionally created as a result of the construction of a road, street, or highway. Wetlands may include those artificial wetlands intentionally created from nonwetland areas to mitigate the conversion of wetlands. (RCW 90.58.030(2)(h))

Z

Zoning. The system of land use and development regulations and related provisions of Chelan County, the City of Cashmere, the City of Chelan, the City of Entiat, the City of Leavenworth, the City of Wenatchee, and any other future Cities that may incorporate.

In addition, the definitions and concepts set forth in RCW 90.58.030, as amended, and implementing rules shall also apply as used herein. See also definitions found in Appendix A.

APPENDIX A. ENTIAT CRITICAL AREAS 2012

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Critical Areas Regulations

Article I. Generally

17.10.110 Purpose.

The purpose of this chapter is to identify and protect critical areas as required by the Growth Management Act of 1990 and Shoreline Management Act of 1971, and to protect people from hazards posed by critical areas, by supplementing the development requirements contained in the various chapters of the city code and providing for protection measures for critical areas.

In some areas, it may be important to use the Critical Areas regulations along with other regulations, such as stormwater management and flood damage prevention regulations, in order to adequately address risks to life, property, and the environment.

17.10.120 Definitions.

See also Section 8, Definitions in SMP main document.

“Agency consultation” means consultation with the Washington Department of Fish and Wildlife and/or the U. S. Fish and Wildlife Service for the purpose of making a preliminary determination regarding impacts of a development proposal on Fish and Wildlife Habitat Conservation Area functions and values. “Agency consultation” does not mean “Endangered Species Section 7 Consultation.”

“Alteration” means any human-induced action that changes the existing condition of a Critical Area. Alterations include, but are not limited to: grading; filling; dredging; draining; channelizing; discharging pollutants except storm water; paving, construction, application of gravel; modifying for surface water management purposes; vegetation removal, or any other

human activity that changes the existing landforms, vegetation, hydrology, wildlife or wildlife habitat of a Critical Area. For actions within wetlands, also see “Wetland alteration.”

“Appeal” means a request for a review of the City’s interpretation of any provision of this chapter or a request for a variance.

“Applicant” means the person, party, firm, corporation or other entity that proposes any use that could affect a critical area, as defined in this chapter.

“Aquifer” means a water-bearing stratum of permeable rock, sand or gravel.

“Aquifer recharge” means the movement or percolation (usually downward) of surface water through an unsaturated zone of soil or rock into a groundwater body.

“Aquifer recharge area” means an area with a recharging effect on aquifers used for potable water.

“Best management practices” or “BMPs” mean schedules of activities, prohibitions of practices, maintenance of procedures, and other management practices, to prevent or reduce the pollution of other critical areas. BMPs also include treatment requirements, operating procedures and practices to control plant site runoff, spillage or leaks, sludge or water disposal, or drainage from raw material storage.

“Buffer” means an area adjacent to a critical area, retained to reduce impacts from adjacent land uses and protect and maintain critical area functions and values, and structural stability.

“Critical areas” includes the following areas and ecosystems: wetlands; areas with a critical recharging effect on aquifers used for potable water; fish and wildlife habitat conservation areas; frequently flooded areas; and geologically hazardous areas.

“*De minimus* impact” means a small or minuscule impact that is demonstrated to be non-harmful to the environment.

“Erosion hazard areas” are those areas containing soils which, according to the United States Department of Agriculture Natural Resources Conservation Service Soil Survey Program, may experience significant erosion. Erosion hazard areas also include coastal erosion-prone areas and channel migration zones.

“EMC” means Entiat Municipal Code

“Existing and ongoing forestry activities” means those activities conducted on lands defined in RCW 84.34.020(3) and occurring under regulation of the Forest Practices Act, on lands capable of supporting a merchantable stand of timber and not being actively used for a use which is incompatible with timber growing.

“Filling” means the act of placing (by any manner or mechanism) fill material from, to, or on any soil surface, sediment surface or other fill material.

“Fish and wildlife habitat conservation area” or “FWHCA” means land that must be properly managed in order to maintain suitable habitat for fish and wildlife.

“Frequently flooded area” are lands in the flood plain subject to at least a one percent or greater chance of flooding in any given year, or within areas subject to flooding due to high groundwater. These areas include, but are not limited to, streams, rivers, lakes, coastal areas, wetlands, and areas where high groundwater forms ponds on the ground surface.

“Geologically hazardous areas” are areas that because of their susceptibility to erosion, sliding, earthquake, or other geological events, are not suited to siting commercial, residential, or industrial development consistent with public health or safety concerns.

“Geotechnical assessment” means an assessment prepared by a qualified professional for Geologically Hazardous Areas, detailing the surface and subsurface conditions of a site and delineating the areas of a property subject to geologic hazards, and meeting the standards specified in this Title.

“Geotechnical engineer” is a person with a Washington state license in civil engineering who has at least four years of professional employment as a geotechnical engineer with experience in landslide, erosion and seismic hazards identification and mitigation.

“Geotechnical report” means a report prepared by a qualified professional for Geologically Hazardous Areas that evaluates the site conditions and mitigating measures necessary to insure that the risks associated with geologic hazards are eliminated on the site proposed to be altered, and meeting the standards specified in this Title.

“Grading” means excavating, filling, clearing, leveling or contouring of the ground surface by human or mechanical means.

“High Impact Development” means development that impacts the pre-development hydrologic regime of urban and developing watersheds.

“Highly erodible land” means those areas defined by the Sodbuster, Conservation Reserve, and Conservation Compliance parts of the Food Security Act of 1985 and the Food, Agriculture, Conservation, and Trade Act of 1990 as “highly erodible land.” Lists of highly erodible and potential highly erodible map units are maintained in the NRCS field office technical guide.

“Hydric soil” means soil that is saturated, flooded or ponded long enough during the growing season to develop anaerobic conditions in the upper part.

“Hydrophytic vegetation” means plants that grow in water or in saturated soils that are periodically deficient in oxygen as a result of high water content.

“Hydrogeologic Evaluation” means a systematic study of geologic and ground-water resources, focusing on near-surface geologic, ground-water, and pollution sensitivity, for the purpose of determining any potential risk to human health, groundwater quality, and the environment.

“Landslide hazard areas” are areas at risk of mass movement due to a combination of geologic, topographic, and hydrologic factors. They include any areas susceptible to landslide because of any combination of bedrock, soil, slope (gradient), slope aspect, structure, hydrology, or other factors.

“Low impact development” refers to a land planning and engineering design approach with a goal of maintaining and enhancing the pre-development hydrologic regime of urban and developing watersheds. Low impact development includes the management of stormwater runoff to emphasize conservation and the use of on-site natural features to protect water quality, typically by using engineered small-scale hydrologic controls to replicate the pre-development hydrologic regime of watersheds. Also known as “Onsite Stormwater Management.”

“Maintenance” means those usual acts to prevent a decline, lapse, or cessation of a legally established condition. Also see “Repair.”

“Major Development” includes multi-family (densities of greater than 1 unit per acre), commercial, or industrial developments; planned developments or mixed-use developments; and public facilities or recreational developments that meet the SEPA threshold (high intensity development).

“Minor Development” includes single-family homes (densities less than 1 unit/acre) and their accessory uses; low-impact recreational facilities; and any other uses not listed as major development, but requiring a permit from the City (low intensity development).

“Mitigation” means taking action to address an impact caused by development or proposed development, in order to reduce or eliminate that impact.

“Native vegetation” means plant species which are indigenous to the area or location in question.

“Natural Area Preserve” means an area designated as a Natural Area Preserve and managed by the Washington State Department of Natural Resources to protect important ecological resources.

“Natural Resource Conservation Area” means means an area designated as a Natural Resource Conservation Area and managed by the Washington State Department of Natural Resources to protect one or more outstanding natural resources.

“Passive recreation” means recreational development generally associated with a low level of human activity and limited construction related impacts, which may include nature trails and similar uses.

“Permanent erosion control” means the continuous on-site and off-site control measures that are needed to reasonably control conveyance or deposition of earth, turbidity or pollutants after development, construction or restoration.

“Qualified professional” means a person with expertise appropriate to the relevant critical area or areas. WAC 365-195-905(4) states that “Whether a person is a qualified scientific expert with expertise appropriate to the relevant critical areas is determined by the person's professional credentials and/or certification, any advanced degrees earned in the pertinent scientific discipline from a recognized university, the number of years of experience in the pertinent scientific discipline, recognized leadership in the discipline of interest, formal training in the specific area of expertise, and field and/or laboratory experience with evidence of the ability to produce peer-reviewed publications or other professional literature. No one factor is determinative in deciding whether a person is a qualified scientific expert. Where pertinent scientific information implicates multiple scientific disciplines, counties and cities are encouraged to consult a team of qualified scientific experts representing the various disciplines to ensure the identification and inclusion of the best available science.” The City of Entiat will use the following minimum criteria in determining whether an individual is a qualified professional. The Administrator may waive the criteria if he or she finds that, based on the factors listed above, an individual is qualified to ensure that the City upholds its statutory responsibility for including the best available science in the implementation of its critical areas regulations.

- A qualified professional for Critical Aquifer Recharge Areas means a hydrogeologist, geologist, engineer, or other scientist who is licensed in the State of Washington and has a minimum of two years of experience in preparing hydrogeologic evaluations.
- A qualified professional for Fish and Wildlife Habitat Conservation Areas must have a degree in biology or a related academic field and a minimum of two years of professional experience related to the subject species and/or the relevant type of habitat.
- A qualified professional for Frequently Flooded Areas must be a hydrologist or engineer licensed in the State of Washington, with a minimum of two years of experience in preparing flood hazard assessments.
- A qualified professional for Geologically Hazardous Areas must be a geologist or engineer licensed in the State of Washington, with a minimum of two years of experience analyzing geologic, hydrologic, and ground water flow systems and preparing reports for the relevant type of hazard.
- A qualified professional for Wetlands means either a certified professional wetland scientist or an individual who has earned a degree in biology or has completed the basic educational requirements for certification as a professional wetland scientist. A qualified professional for Wetlands must have a minimum of two years of professional experience preparing wetland reports in the inland northwest, including developing and implementing mitigation plans.

“RCW” means the Revised Code of Washington.

“Repair” means an activity that restores the character, scope, size, and design of a serviceable area, structure or land use to its previously authorized and undamaged condition. Also see “maintenance”.

“Restoration” means the return of a critical area to a state in which its functions, values and size approach or meet its original, predevelopment state.

“Riparian habitat area” means the area adjacent to an aquatic system with flowing water (e.g., rivers, perennial or intermittent streams, seeps, springs) that contains elements of both aquatic and terrestrial ecosystems which mutually influence each other. Riparian habitat areas are designated as priority habitat by the Washington Department of Fish and Wildlife.

“Rock fall” means a rock or mass of rocks dislodged from a cliff or other steep slope, which moves down a slope under the force of gravity, generally by falling, rolling, sliding, toppling, or bouncing.

“Rock-fall acceleration zone” means a location at the base of a rock-fall source area where the incline is steep enough to accelerate falling debris.

“Rock-fall hazard area” means a location at the base of a slope that is susceptible to rock fall, including the acceleration zone and the runout zone.

“Rock-fall runout zone” means an area of gentler slopes beyond the base of a rock-fall acceleration zone, where boulders roll or bounce.

“Rock-fall source area” means a rock source (such as a cliff, bedrock outcrop or boulder) above a slope steep enough to allow rapid downslope movement of dislodged rocks.

“Seismic hazard area” means an area subject to severe risk of damage as a result of earthquake-induced ground shaking, slope failure, settlement or subsidence, soil liquefaction, surface faulting, or tsunamis.

“Shallow flooding” means flooding with an average depth of less than three feet in areas where a clearly defined channel does not exist.

“Slope” means an inclined ground surface, the inclination of which is expressed as a ratio (percentage) of vertical distance to horizontal distance by the following formula:

$$\frac{\text{vertical distance}}{\text{horizontal distance}} \times 100 = \% \text{ slope}$$

“Temporary erosion control” means the on-site or off-site control measures that are needed to reasonably control conveyance or deposition of earth, turbidity or pollutants during development, construction or restoration or until permanent erosion control has been established.

“WAC” means the Washington Administrative Code.

"Wetland alteration" means activity which includes clearing, grading, draining, filling or other designated wetland system disturbance which results in a decrease or loss of function or value.

17.10.130 Chapter applicability.

A. This chapter classifies and designates critical areas in the city and establishes protection measures for those critical areas. All development or other alterations within, adjacent to, or likely to affect, one or more critical areas, whether public or private, shall be subject to review by the city’s administrator or designee for compliance with this chapter as of October 26, 1993. Adjacent shall mean any activity located:

1. On a site immediately adjoining a critical area;
2. Within a distance equal to or less than the required critical area buffer width and building setback;
3. Within a distance equal to or less than one-half mile (2,640 feet) from a bald eagle nest;
4. Within a distance equal to or less than two hundred (200) feet upland from a stream, wetland, or water body;
5. Within a floodway, floodplain, or channel migration zone; or
6. Within two hundred (200) feet from a critical aquifer recharge area

B. The provisions of this chapter shall apply to uses permitted outright or as a conditional use pursuant to the underlying zoning in EMC Title 18 and any development or other alteration that potentially affects a critical area, unless otherwise exempt. Such uses include but are not limited to:

1. Removing, excavating, dredging, dumping, discharging, distributing or filling materials of any kind in a critical area;

2. Draining, flooding or altering the water level or water table in a critical area except as necessary to exercise an existing water right permit;
 3. New surface water management, drainage or erosion control development;
 4. Driving pilings or placing obstructions in water systems that are in an identified critical area;
 5. New construction including but not limited to roads and utilities;
 6. Removal or alteration of existing vegetation through chemicals, clearing, grading, harvesting, shading or planting vegetation that would alter the character of a critical area or designated buffer;
 7. Uses that result in significant changes in water temperature, physical or chemical characteristics of water sources, including quantity and pollutants, that are in a critical area; and
- C. Where two or more types of critical areas overlap, the regulation most protective of critical area functions and values shall apply.
- D. Where it is determined that a designated critical area is located within shoreline jurisdiction, the provisions of the Shoreline Master Program and this Appendix will be used to regulate that particular critical area.

17.10.140 Exemptions.

The following uses shall be exempt from the provisions of this chapter, but shall meet all other applicable regulations:

- A. Normal operation and maintenance of irrigation facilities, limited to removal of sediment and vegetation in existing ditches;
- B. Existing and ongoing agricultural activities, not to include removal of trees, diverting or impounding water, excavation, ditching, draining, culverting, filling, grading, and similar activities that introduce new adverse impacts to wetlands or other aquatic resources;
- C. Removal and replacement of trees within an existing orchard when replacement occurs within the same season of the same year of removal;
- D. Low-impact educational activities, scientific research, outdoor recreational activities, including but not limited to interpretive field trips, bird watching and hiking, provided these activities do not temporarily or permanently impact a critical area;
- E. Site investigative work and studies necessary for preparing land use applications, including but not limited to land surveying, soils tests, water quality studies, wildlife studies and similar tests and investigations; provided, that any disturbance of critical areas shall be the minimum necessary to carry out the work or studies;
- F. Emergency uses and development necessary to prevent an immediate threat to public health safety or property, provided the administrator is given written notice within thirty (30) days that such use was performed, and appropriate permitting and mitigation actions follow;

17.10.150 Administrator appointed.

The Mayor, or his/her designee, is appointed to administer and implement this chapter.

17.10.160 Abrogation and greater restrictions.

Unless otherwise stated, this chapter is not intended to repeal, abrogate or impair any existing easements, covenants or deed restrictions. However, where this chapter and another resolution, easement, covenant or deed restriction conflict or overlap, whichever imposes the more stringent restrictions shall prevail.

17.10.170 Reasonable use provision.

- A. This chapter is not intended, and shall not be construed or applied in a manner, to deny reasonable use of private property and/or deny any state or United States Constitutional rights. If an applicant, after review by the Administrator, or his or her designee, believes that the decision of the Administrator would deny reasonable use of the applicant's property (as so designated in this chapter), where project proponents would seek a "Reasonable Use" exception to their proposal, they shall seek exception process and relief through the SMP Conditional Use or Variance Permit process.
- B. Relief for Reasonable Use. An applicant appealing to the City Council under this reasonable use provision shall demonstrate the following:
 - 1. No reasonable use with less impact is feasible and reasonable;
 - 2. There is no feasible and reasonable on-site alternative to the activities proposed, considering possible changes in site layout, reductions in density and similar factors;
 - 3. The proposed activities, as conditioned, will result in the minimum possible impact;
 - 4. All reasonable mitigation measures have been implemented or assured; and
 - 5. The inability to derive reasonable use is not the result of the applicant's actions.

17.10.185 Vegetation removal.

- A. Critical areas review is required prior to removal of any vegetation, including non-native vegetation, from a critical area or its buffer, whether or not development is proposed or a development permit is being sought. This provision applies to noxious weeds and invasive plant species, with the exception of hand removal or spot-spraying. If the Administrator determines, based on a preliminary evaluation, that a Critical Area Study is required, such removal of vegetation shall be incorporated in a mitigation plan designed to prevent erosion and facilitate establishment of a stable community of native plants. In all cases, including spot-spraying of noxious weeds and invasive plant species, any herbicide use must conform to all applicable laws, including labeling laws.
- B. Unauthorized vegetation removal. Vegetation removal conducted without the appropriate review and approvals shall be mitigated in conformance with an approved mitigation plan meeting the standards of this chapter.

17.10.190 Conflict resolution. In case of disagreement regarding the findings or recommendations of any Critical Area Study, Geotechnical Assessment, Geotechnical Report, or other analysis prepared to ensure the use of the best available science in the implementation of the City's critical areas regulations, the City may require an evaluation by an independent

qualified professional regarding the analysis and the effectiveness of any proposed mitigating measures or programs, to include any recommendations as appropriate. The City may also consult with other Federal, State or other regulatory authorities. The cost of such evaluation will be shared equally by the City and the applicant.

Article II. Technical Study and Reporting

17.10.210 Reference maps and materials. The City shall maintain reference maps and materials (or, in the case of web-based resources, shall maintain access to the materials) that provide information on the general locations of Critical Areas and their functions and values, to the extent those are known, and shall make the materials available for reference in the city offices. Since boundaries are generalized, the application of this chapter and the actual type, extent, and boundaries of Critical Areas shall be determined and governed by the designation and classification sections for each type of Critical Area. In the event of any conflict between the maps (on the one hand) and the provisions of this chapter or the site-specific conditions (on the other hand), the provisions and/or site-specific conditions shall prevail. Site-specific reports prepared by qualified professionals shall supersede generalized mapping resources. Reference materials shall include, but shall not be limited to, the following (or, where applicable, any subsequent or amended version):

- A. City of Entiat Critical Area Reference Maps;
- B. Washington State Department of Fish and Wildlife Priority Habitats and Species Maps;
- C. Washington State Department of Natural Resources Maps;
- D. NRCS Soil Survey Maps for Chelan County Area;
- E. Flood Insurance Rate Maps for Chelan County (1989) as amended;
- F. U.S. Fish and Wildlife Service National Wetlands Inventory;
- G. U.S.G.S. 7.5 Minute Series Topographic Quadrangle Maps;
- H. Aerial photos.
- I. Any geotechnical assessments, geotechnical reports, hydrogeologic evaluations, channel migration zone studies, or other special or detailed studies (including approved Critical Areas Studies), including those that identify critical areas and those that identify areas not subject to the City's Critical Areas regulations.
- J. *Washington State Wetlands Identification and Delineation Manual* (Washington Department of Ecology Publication #96-94, or as amended).
- K. *Washington State Wetlands Rating System for Eastern Washington* (Department of Ecology Publication #4-06-15, or as amended).
- L. *Wetlands in Washington State, Volumes 1 and 2* (Department of Ecology Publications #05-06-006 and #05-06-008, or as amended).
- M. *Wetlands & CAO Updates: Guidance for Small Cities: Eastern Washington Version.* (available online at <http://www.ecy.wa.gov/pubs/1006001.pdf>).

- N. Current applicable building codes.
- O. City of Entiat Comprehensive Plan;
- P. City of Entiat Shoreline Master Program;
- Q. Monitoring data.

17.10.220 Critical Areas review process.

- A. Preapplication Conference. All applicants are encouraged to meet with City staff prior to submitting an application subject to this chapter. The purpose of the meeting shall be to discuss the City's critical areas requirements, processes and procedures; to review any conceptual site plans prepared by the applicant; to discuss appropriate investigative techniques and methodology; to identify potential impacts and mitigation measures and to schedule a site visit. Such conference shall be for the convenience of the applicant and any recommendations shall not be binding on the applicant or the City.
- B. Preliminary evaluation.
 - 1. Submittal of a Critical Areas Review Checklist shall be required prior to any development or other alteration in or within 200' (two hundred feet) of a known or potential wetland or fish and wildlife conservation area; 500' (five hundred feet) of a known or potential active golden eagle, great blue heron or communal eagle roost site; or 200' (two hundred feet) of any other known or suspected Critical Area, whether or not a permit is required for the alteration. The application for any development proposal for which a permit is required shall include submittal of a Critical Areas Review Checklist by the applicant and completion of the checklist by City staff. Each Critical Areas Review Checklist shall indicate whether any known or suspected Critical Area(s) is located on the site. The Critical Areas Review Checklist form shall be provided by the City. The first page shall be completed by the applicant and shall provide the Administrator with the information necessary for the preliminary evaluation of the proposed alteration.
 - 2. On receipt of a Critical Areas Review Checklist, the Administrator shall conduct a preliminary evaluation, which shall include visiting the site and reviewing the following information.
 - a. Any pertinent information provided by the applicant;
 - b. Relevant reference materials; and;
 - c. Any other pertinent information including but not limited to the information on the Critical Areas Review Checklist and (when required) a SEPA checklist.Based on the preliminary evaluation, the Administrator shall determine whether or not sufficient information is available to evaluate the proposal.
 - 3. If the Administrator determines that the information presented is not sufficient to adequately evaluate the impact on Critical Areas of a proposed alteration, he or she shall notify the applicant that a Critical Area Study is required. In the event that multiple Critical Areas occur on a given site, each Critical Area shall be addressed

independently and all Critical Areas shall be addressed collectively for the purpose of determining development standards and appropriate mitigating measures.

4. In the case of landslide or erosion hazard areas, should the applicant question the presence of such areas on the site, the applicant may submit a geotechnical assessment prepared by a qualified professional for geological hazards. If the geotechnical assessment demonstrates, to the satisfaction of the Administrator, that the proposed site is not located in any landslide and erosion hazard area, then the requirements of this chapter shall not apply. The geotechnical assessment shall include at a minimum the following:
 - a. A discussion of the surface and subsurface geologic conditions of the site;
 - b. A site plan of the area delineating all areas of the site subject to landslide and erosion hazards based on mapping and criteria referenced in 17.10.740, below. A map meeting the criteria set forth for a geotechnical report shall be included.
 - c. A scientific study or evaluation conducted by a qualified expert that includes a description of the ground and surface hydrology and geology, the affected land form and its susceptibility to mass wasting, erosion, and other geologic hazards or processes, conclusions and recommendations regarding the effect of the proposed development on geologic conditions, the adequacy of the site to be developed, the impacts of the proposed development, alternative approaches to the proposed development, and measures to mitigate potential site-specific and cumulative geological and hydrological impacts of the proposed development, including the potential adverse impacts to adjacent and down-current properties. Geotechnical reports shall conform to accepted technical standards and must be prepared by qualified professional engineers or geologists who have professional expertise about the regional and local shoreline geology and processes.

C. Critical Area Study. If the Administrator determines that the site of a proposed development includes, is likely to include, or is adjacent to one or more critical areas, a critical area study may be required. When required, the expense of preparing the critical area study shall be borne by the applicant. The content, format and extent of the critical area study shall be approved by the Administrator.

1. The requirement for a critical area study may be waived by the Administrator if there is substantial evidence that:
 - a. There will be no alteration of the critical area(s) and/or the required buffer(s); and
 - b. The proposal will not impact the critical area(s) in a manner contrary to the purpose, intent and requirements of this ordinance and the City's comprehensive plan; and,
 - c. The minimum standards of this chapter will be met.
2. No Critical Area Study is required for proposals that are exempt from the provisions of this chapter as set forth under Section 17.10.140, "Exemptions."

3. Every Critical Area Study shall be completed by a qualified professional who is knowledgeable about the specific critical area(s) in question, and approved by the Administrator.
4. At a minimum, a required Critical Area Study shall contain the following information:
 - a. Applicant's name and contact information; permits being sought; and description of the proposal;
 - b. A copy of the site plan for the alteration proposal, drawn to scale and showing:
 - c. Identified critical areas, buffers, and the proposed alteration with dimensions;
 - d. Limits of any areas to be cleared; and location of all proposed building(s), accessory buildings, use areas, and parking areas;
 - e. A description of the proposed stormwater management plan for the development and consideration of impacts to drainage alterations;
 - f. The names and qualifications of the persons preparing the report and documentation of any fieldwork performed on the site;
 - g. Identification and characterization of all critical areas within, or within 250' (two hundred and fifty feet) of, the project area or within any proposed buffer;
 - h. An assessment of the probable cumulative impacts to critical areas resulting from the proposed development of the site;
 - i. An analysis of site development alternatives;
 - j. A description of reasonable efforts made to apply mitigation sequencing, as defined in these regulations, to avoid, minimize, and otherwise mitigate impacts to critical areas;
 - k. A mitigation plan as set forth in these regulations;
 - l. A discussion of the performance standards proposed to ensure that ecological functions of critical areas are protected and health and safety hazards associated with critical areas are precluded;
 - m. Financial guarantees proposed to ensure compliance with mitigation plan and performance standards; and
 - n. Any additional information required for specific critical areas as listed in subsequent sections of these regulations.
5. The Administrator may request any other information reasonably deemed necessary to understand impacts to critical areas.

D. Mitigation Requirements.

1. The applicant shall avoid all impacts that degrade the functions and values of critical areas. If alteration is unavoidable, all adverse impacts to critical areas and buffers resulting from the proposal shall be mitigated in accordance with an approved critical areas study and SEPA documents, with the exception that *de minimus* impacts may be

allowed. The location of any mitigation site shall be consistent with Best Available Science and may be on-site or off-site.

2. *Mitigation sequencing.* Applicants shall use the least intrusive type of mitigation feasible, and shall demonstrate that less intrusive types of mitigation have been evaluated. The types of mitigation, from least to most intrusive, are:
 - a. Avoiding the impact altogether by not taking a certain action or parts of an action;
 - b. Minimizing impacts by limiting the degree or magnitude of the action and its implementation, by using appropriate technology, or by taking affirmative steps (such as project redesign, relocation, or timing) to avoid or reduce impacts;
 - c. In the case of frequently flooded areas and geologically hazardous areas, minimizing or eliminating the hazard by restoring or stabilizing the hazard area through engineered methods or other methods designed by a qualified design professional;
 - d. Rectifying the impact by repairing, rehabilitating, or restoring the affected environment to historic conditions or the conditions existing at the time the project was initiated;
 - e. Reducing or eliminating the impact or hazard over time by preservation and maintenance operations during the life of the action;
 - f. In the case of critical aquifer recharge areas, frequently flooded areas, fish and wildlife habitat conservation areas, and wetlands, compensating for the impact by replacing, enhancing, or providing substitute resources or environments; and
 - g. Monitoring the impact using a planned evaluation process and taking appropriate corrective measures.
3. *Mitigation plan.* When mitigation is required, the applicant shall submit for approval a mitigation plan as part of the critical area Study. Approval of a mitigation plan shall be processed according to the provisions of EMC 14.04.020, governing a Full Administrative Review. The mitigation plan shall include a written report identifying:
 - a. Mitigation Objectives, including:
 - i. A description of the anticipated impacts to critical areas and their buffers, the type or types of mitigation proposed, and the purposes of the measures proposed, including site selection criteria; identification of compensation objectives; identification of critical area functions and values; and dates for beginning and completion of any on-site mitigation activities;
 - ii. The impacts of any proposed alteration of a critical area or buffer, including proposed mitigation activities, on the development site, other properties and the environment;
 - iii. A review of the best available science supporting the proposed mitigation and a description of the report author's experience to date in critical areas mitigation; and

- iv. An analysis of the likelihood of success of the proposed mitigation.
 - b. Measurable Criteria for evaluating whether or not the objectives of the mitigation plan have been successfully attained and whether or not the requirements of these regulations have been met.
 - c. Descriptions and Specifications for any on-the-ground mitigation activities, including, but not limited to:
 - i. Proposed construction sequence, timing, and duration;
 - ii. Grading and excavation details;
 - iii. Erosion and sediment control measures;
 - iv. A planting plan specifying plant species, quantities, locations, size, and spacing; and
 - v. Measures to protect and maintain plants until established.
 - d. Where on-the-ground mitigation activities are proposed, Construction and Post-Construction Monitoring Programs.
 - i. The purpose of the construction monitoring program is to monitor adherence to the mitigation specifications and any other requirements of these regulations.
 - ii. The purpose of the post-construction monitoring program is to determine whether mitigation objectives are being achieved and, if not, prescribe corrective measures. The program shall include a schedule for monitoring the project over a period adequate to establish that mitigation objectives have been met, generally at least five (5) years from completion of the mitigation project, and shall describe the methods to be used in monitoring.
 - e. A list of potential corrective measures to be taken if monitoring or evaluation indicates project objectives are not being achieved.
4. *Monitoring and Reporting*: The mitigation project shall be monitored as specified in the mitigation plan. A monitoring report shall be submitted by the project proponent to the Administrator according to the schedule specified in the mitigation plan, to document monitoring outcomes and any contingency actions.

17.10.230 Surety/bonding. If a development proposal is subject to mitigation, maintenance, or monitoring plans, the City may require an assurance device or surety, in a form acceptable to the City Attorney.

17.10.240 Reporting. Any new residential subdivision or short plat that is determined to be in a critical area shall have a note placed on the face of the plat and on the title report stating that the site is located in a critical area, what hazard or critical area element is present, and any conditions relating to use or development of the land. Said note may include the provisions listed below:

- A. Documentation from the applicant stating their understanding and acceptance of any risk of injury or damage associated with the development of the site and agreeing to notify future

purchasers of the site, portions of the site, or structures located on the site of the presence of the hazard or critical area and the potential risk of injury or damage;

- B. A legally enforceable agreement, which shall be recorded as a covenant and noted on the face of the deed or plat, acknowledging the site is located in a geologic or flood hazard area and the risks associated with development of the site, and including a waiver and release of any and all claims of the owners, their directors, employees, successors or assigns against the city for any loss, damage or injury, whether direct or indirect, arising out of the issuance of development permits for the proposal.

Article III. Fish and Wildlife Habitat Conservation Areas

17.10.310 Purpose. It is the purpose of this article to reasonably insure the protection of fish and wildlife and their habitats, with special consideration for anadromous fish species. The desired goal is to preserve, enhance, protect and promote fish and wildlife habitat within the city and its UGA, including habitat required by those species listed on the Federal and State Endangered Species Lists, Priority Habitats identified by the Washington Department of Fish and Wildlife (WDFW), and habitat required by Priority Species identified by WDFW. It is also the intent of this section to insure that development and fish and wildlife are provided the opportunity to coexist.

17.10.320 Policy statements.

- A. The City of Entiat recognizes that the Federal Endangered Species Act (ESA) applies to all lands within the city.
- B. The City of Entiat recognizes the current WDFW Priority Habitat Species (PHS) data, which identify locations and extent of priority species and habitats.
- C. The City of Entiat recognizes the habitat importance of naturally occurring wetlands.
- D. The City of Entiat recognizes all bodies of water in city as waters of the state.
- E. It is the policy of the City of Entiat to support the natural and human assisted propagation of fish in lakes and streams in Chelan County by encouraging development that would enhance or mitigate impacts to fish habitat.
- F. The City of Entiat recognizes the publication *Management Recommendations for Washington's Priority Habitats and Species* (or as amended) as a useful guide to conservation and management of wildlife resources. It is the policy of the City of Entiat to consider these management recommendations and other sources of Best Available Science as available.

17.10.330 Classification and designation. Fish and Wildlife Habitat Conservation Areas include:

- A. Areas with which State or Federally Designated Endangered, Threatened, and Sensitive Species have a Primary Association: classified as Fish and Wildlife Habitat Conservation Areas of State or Federal Importance.

- B. State Priority Habitats and areas associated with State Priority Species, including Riparian Habitat Areas (RHAs): classified as Fish and Wildlife Habitat Conservation Areas of State or Federal Importance.
- C. Areas associated with anadromous fish species: classified as Fish and Wildlife Habitat Conservation Areas of State or Federal Importance.
- D. Waters of the state, including naturally-occurring ponds under twenty acres: classified as Fish and Wildlife Habitat Conservation Areas of Local Importance.
- E. Known critical fish and wildlife habitat conservation areas in the City of Entiat include the Columbia River (Lake Entiat) and the Entiat River.

17.10.340 Critical Area Review Process for Fish and Wildlife Habitat Conservation Areas.

A. Identification and preliminary evaluation.

1. At a minimum, the PHS data, *Management Recommendations for Washington's Priority Habitats and Species* (or as amended), and any Critical Areas Study that identifies Fish and Wildlife Habitat Conservation Areas in the vicinity of a development site shall be used to determine whether critical area review will be required for a proposed alteration, in completing a Critical Areas Checklist, and in the City's review for the purpose of determining whether a Critical Area Study will be required.
2. The City of Entiat Shoreline Inventory and Biologic Critical Areas Reconnaissance Study (2010) may be used for further identification of Fish and Wildlife Conservation Areas and existing riparian habitat along the Columbia and Entiat Rivers in the City of Entiat.
3. Riparian habitat areas vary in width depending on the ecological function they perform. This section defines the area that must be evaluated for the purpose of determining the need for a Critical Area Study, and in which alterations may be limited to protect priority habitat. Riparian Habitat Area (RHA) widths shall be consistent with the management recommendations issued by the state Department of Fish and Wildlife or other Best Available Science. For the purpose of determining the need for a Critical Area Study:
 - a. RHAs are considered to extend landward from the Ordinary High Water Mark (OHWM), measured on the horizontal plane, as shown in Table 17.10.440.1 below or as indicated in *Management recommendations for Washington's priority habitats: Riparian*, or as amended by WDFW.
 - b. If the 100-year floodplain exceeds the widths shown, the RHA should extend to the outer edge of the 100-year floodplain.
 - c. If there is a Channel Migration Zone (CMZ), the OHWM must be determined near the waterward edge of the CMZ.
 - d. Larger RHA widths may be required where priority species occur or wherever supported by an approved Critical Area Study.

- e. Add 100 ft to the RHA’s outer edge on the windward side of riparian areas with high blowdown potential.
- f. Extend RHA widths at least to the outer edge of unstable slopes along Type 4 and 5 waters in soils of high mass wasting potential.

Table 17.10.340.1 Riparian Habitat Evaluation Area widths

Water type ²		Riparian Habitat Area Extent
Permanent	Interim	
S	1	250’
F	2	250’
F	3	200’
Np, low mass-wasting potential	4	150’
Np, high mass-wasting potential	4	225’
Ns, low mass-wasting potential	5	150’
Ns, high mass-wasting potential	5	225’

- 4. In reviewing proposed alterations, the City shall consider the Fish and Wildlife Habitat Conservation Area classification in establishing buffer widths, mitigation requirements, and permit conditions. Any decision regarding establishment of larger buffer widths than what is required in the SMP, access restrictions, vegetation conservation and restoration requirements, mitigation requirements, or permit conditions shall be processed according to the provisions of EMC 14.04.020 governing a Full Administrative Review. The Entiat and Columbia Rivers are Shorelines subject to the Shoreline Management Act, and buffers have been assigned in the City’s Shoreline Master Program.

B. Critical Area Study. In addition to the general requirements for Critical Area Studies, the required Critical Area Study for any FWHCA shall include the following:

- a. An evaluation of the presence or absence of regulated species. The following shall be required in developing the evaluation:
 - i. Consultation with the Washington State Department of Fish and Wildlife;
 - ii. Review of PHS data for the development site and the area within 200’ (two hundred) of the site; and

² Water types are based on WAC 222-16-030, Water typing system and 222-16-031, Interim water typing system.

- iii. Review of PHS data on active golden eagle, great blue heron and communal eagle roost sites for the development site and the area within 500' (five hundred feet) of the site.
 - b. A description of the nature and extent of the association of regulated species with the habitat conservation area and any critical ecological processes (such as feeding, breeding, incubation, resting, nesting and dispersal) occurring within the study area.
 - c. A description of regulated species habitat requirements, seasonal range dynamics and movement corridor requirements, and relative tolerance of human activities and the cumulative effects of the previous development or future development in the region.
 - d. An analysis of habitat quality, based on relative species diversity and species richness, in the study area.
 - e. An evaluation of the proposed alteration for its influence on the above wildlife factors and on the measures that are recommended to mitigate the potential degradation of animal and plant populations, reproduction rates, and overall habitat quality over the long term.
 - f. Designation, mitigation, and management recommendations, including the width of any Riparian Habitat Area, the width of any buffer required to protect habitat and species outside of Critical Areas, and any requirements for restoration of a FWHCA or its buffer, and also including any requirements for the provision of open space for wildlife habitat within a development. Any relevant WDFW priority habitat and species management recommendations shall be consulted in developing the mitigation and management recommendations and identifying habitat and species protection measures.
- C. The information provided by a critical area study will augment the data base for the Entiat area maintained by the City.

17.10.350 Performance standards. In addition to the general provisions of this chapter and the requirements of the underlying zone, the following minimum standards shall apply to development activities within and adjacent to the specified FWHCAs.

- A. The following standards shall apply in all FWHCAs and their buffers. Such areas shall also be subject to all relevant provisions of the SMP. The Columbia and Entiat Rivers are Shorelines subject to the Shoreline Management Act and this Appendix.
 - 1. All projects shall comply with the applicable federal, state and local regulations regarding protection of species and habitats identified upon a site.
 - 2. Any approved alteration or development in a FWHCA shall minimize impacts to existing topography, drainage patterns, and native vegetation, including the composition and structure of the native plant community. Where disturbance is unavoidable, the applicant shall mitigate the disturbance in accordance with the mitigation plan in an approved critical area study. New plantings shall be maintained in good growing condition and kept free of invasive weeds until well established.

Temporary erosion and sedimentation controls may be used during and following construction until permanent control is achieved.

3. The Administrator shall require the establishment of a buffer when, based on a critical area study, such a buffer is needed to protect the functions and values of a FWHCA. Minimum buffer widths shall be based on those buffers established in Section 4.4 of the SMP and may be required to be increased based on the classification and sensitivity of the habitat and the intensity of activity proposed, and shall be consistent with the management recommendations issued by the WDFW or other Best Available Science (such as the findings of a Critical Area Study or a Mitigation Plan). The City may require that buffers remain undisturbed or, where native vegetation has already been disturbed, that the vegetation be restored. Other limitations to disturbance, including access restrictions such as fencing and signage, may also be required where needed to ensure protection of habitat functions and values. Restrictions may be seasonal.
 4. Any limitations to site disturbance, such as clearing restrictions, imposed as a condition of development approval shall be marked in the field and approved by the city prior to undertaking the project.
 5. Areas subject to use and management restrictions shall be shown on the face of the plat, planned development or binding site plan, and/or as a portion of the building permit recorded with the Administrator.
 6. Projects shall be encouraged to participate in habitat preservation programs, such as the WDFW's Backyard Wildlife Sanctuary Program.
- B. The following additional standards shall apply in Fish and Wildlife Habitat Conservation Areas of State or Federal Importance and their buffers:
1. Any uses and activities allowed within Priority Habitat and Species Areas shall be limited to those that will not adversely affect or degrade the habitat or threaten critical ecological processes identified in the Critical Area Study.
 2. No development approval shall be granted unless mitigation of adverse effects will be provided that will insure continuation of baseline conditions in all Priority Habitats and baseline populations of all Priority Species.
- C. Site-specific modifications to recommended RHAs may be allowed if supported by an approved Critical Area Study. Important characteristics should be retained or restored in all riparian areas in order to provide suitable habitat for fish and wildlife.
- D. Provided that adequate regional populations are maintained, development may be allowed in Fish and Wildlife Habitat Conservation Areas of Local Importance when only species and habitats of local importance will suffer population declines or interruption of migration routes or reproduction habits, provided that endemic species are preserved.

Article IV. Wetlands

17.10.410 Purpose and intent.

- A. Wetlands and their buffer areas are valuable natural systems with significant natural constraints. In their natural state wetlands provide many ecological functions and values that insure the general health, safety and welfare of the citizens of Entiat. Physical functions of wetlands include: water quality values (pollution filtration, sediment removal, oxygen production, nutrient recycling and chemical and nutrient absorption), aquatic productivity, microclimate regulation, and fish and wildlife habitat. Values of wetlands include: flood control, wave damage protection, erosion control, groundwater recharge, domestic/irrigation water supply, timber/natural resources, energy resources (peat), livestock grazing, fishing/hunting, recreation, aesthetics, education/scientific research and migratory waterfowl. This chapter is intended to prevent adverse environmental impacts to proposed development and to designated wetlands and associated buffers. These protection measures are designed to protect designated wetlands based on overall uniqueness and value of the wetland and intensity of proposed land use.
- B. This chapter is designed to reflect the following priority issues as a part of the overall goal:
1. Protect those wetlands;
 2. Protect property rights;
 3. Encourage voluntary creation of wetland areas;
 4. Compensation for loss of value of lands designated as wetlands and to include their required buffers.

These specific goal components should be sought without infringement on the health and welfare of the citizens of Entiat.

17.10.420 Designation. All lands (including areas of open water) in the City and its UGA that meet the definition of wetlands in RCW 36.70A.030(21) are designated wetlands and are subject to the provisions of this chapter.

17.10.430 Critical Areas Review.

- A. Preliminary evaluation.
1. A preliminary evaluation shall evaluate known or potential wetlands on or within 300' of the site of a proposed alteration.
 2. At a minimum, the National Wetlands Inventory (NWI) maps and any Critical Areas Study that identifies wetlands in the vicinity of a development site shall be used in completing a Critical Areas checklist and in the City's review for the purpose of determining whether a Critical Areas Study will be required.
- B. Wetlands shall be identified and delineated by a qualified wetland professional in accordance with the U.S. Army Corps of Engineers, *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (Version 2.0)*, (or as amended) to the *1987 Wetland Delineation Manual*. All areas within the City meeting the wetland designation

criteria in that procedure are hereby designated critical areas and are subject to the provisions of this Chapter.

- C. In addition to the general requirements for Critical Area Studies, the required Critical Area Study for any Wetland shall include the following:
1. An overview of the methodology used to conduct the study
 2. As part of the Identification and Characterization, a written assessment and accompanying maps of the wetlands and buffers within three hundred (300) feet of the project area, including the following information at a minimum:
 3. Wetland delineation and required buffers;
 4. Existing wetland acreage;
 5. Wetland category;
 6. Vegetative, faunal, and hydrologic characteristics;
 7. Soil and substrate conditions;
 8. Topographic elevations, at two-foot contours; and
 9. A discussion of the water sources supplying the wetland and documentation of hydrologic regime (locations of inlet and outlet features, water depths throughout the wetland, evidence of recharge or discharge, evidence of water depths throughout the year such as algal layers and sediment deposits).
 10. When mitigation is required, a Compensatory Mitigation Plan as described in Section 17.10.490.
- D. An applicant should be aware that Section 404 of the Federal Clean Water Act and other federal and state statutes may apply.
- E. The information provided by the study will augment the data base for the Entiat area maintained by the City.

17.10.435 Documentation. The specific location of a designated wetland and its buffer, including any compensatory mitigation areas, shall be shown on the face of the plat, planned development or binding site plan, and/or as a portion of the building permit recorded with the Administrator.

17.10.440 Classification—Wetland rating system. Wetlands shall be classified using the Washington Department of Ecology wetland rating system, as set forth in the *Washington State Wetland Rating System for Eastern Washington* (Ecology Publication #04-06-015, or as revised and approved by Ecology), which contains the definitions and methods for determining whether the criteria below are met.

- A. Category I wetlands are those that 1) represent a unique or rare wetland type; or 2) are more sensitive to disturbance than most wetlands; or 3) are relatively undisturbed and contain ecological attributes that are impossible to replace within a human lifetime; or 4) provide a high level of function. In eastern Washington, they include: 1) alkali wetlands; 2) Natural Heritage Program wetlands; 3) bogs; 4) mature and old-growth forested wetlands (over ¼ acre) with slow-growing trees; 5) forests with stands of aspen; and 6) wetlands that perform

many functions very well, with rating-system scores of 70 points or more. We cannot afford to risk any degradation of Category I wetlands because their functions and values are too difficult to replace.

- B. Category II wetlands are: 1) forested wetlands in the floodplains of rivers; 2) mature and old-growth forested wetlands (over ¼ acre) with fast-growing trees; 3) vernal pools; and 4) wetlands that perform functions well, with rating-system scores of 51-69 points. Category II wetlands are difficult, although not impossible, to replace, and provide high levels of some functions.
- C. Category III wetlands are 1) vernal pools that are isolated and 2) wetlands with a moderate level of functions, with rating-system scores of 30-50 points. Wetlands scoring between 30 and 50 points generally have been disturbed in some ways and are often less diverse or more isolated from other natural resources in the landscape than Category II wetlands.
- D. Category IV wetlands have the lowest level of functions, with rating-system scores of fewer than 30 points, and are often heavily disturbed. They are wetlands that we should be able to replace, and in some cases to improve. However, experience has shown that replacement cannot be guaranteed in any specific case. Category IV wetlands may provide some important functions and also need to be protected.

17.10.450 Wetland Buffers. Buffers shall be required, in order to protect the integrity, function, and value of a designated wetland area. The following standards shall apply to development activities within 200' (two hundred feet) of wetland areas.

- A. Buffer Requirements. The standard buffer widths in Table 17.10.410.1 have been established in accordance with the best available science. They are based on the category of the wetland and the habitat score as determined by a qualified wetland professional using the *Washington State Wetland Rating System for Eastern Washington*.
 - 1. The use of the standard buffer widths requires the implementation of the measures in Table 17.10.410.2, where applicable, to minimize the impacts of the adjacent land uses.
 - 2. If an applicant chooses not to apply the mitigation measures in Table 17.10.410.2, then a 33% increase in the width of all buffers is required. For example, if a 75-foot buffer were required with the mitigation measures, the required buffer without the mitigation measures would be 100 feet wide (75 feet x 1.33 = 100).
 - 3. The standard buffer widths assume that the buffer is vegetated with a native plant community appropriate for the ecoregion. If the existing buffer is unvegetated, sparsely vegetated, or vegetated with invasive species that do not perform needed functions, the Administrator may require that the buffer be modified in accordance with an approved Critical Area Study—e.g., planted to create the appropriate plant community or widened to ensure that adequate functions of the buffer are provided.
 - 4. Additional buffer widths are to be added to the standard buffer widths when the rating-system score is greater than 20. For example, a Category I wetland scoring 32 points for habitat function would require a buffer of 150 feet (75 + 75).

Table 17.10.410.1 Wetland Buffer Requirements Eastern Washington³

Wetland Category	Standard Buffer Width	Additional buffer width if wetland scores 21-25 habitat points	Additional buffer width if wetland scores 26-29 habitat points	Additional buffer width if wetland scores 30-36 habitat points
Category I: Based on total score	75ft	Add 15 ft	Add 45 ft	Add 75 ft
Category I: Forested	75ft	Add 15 ft	Add 45 ft	Add 75 ft
Category I: Bogs	190 ft	NA	NA	NA
Category I: Alkali	150 ft	N/A	NA	NA
Category I: Natural Heritage Wetlands	190 ft	N/A	NA	NA
Category II: Based on total score	75 ft	Add 15 ft	Add 45 ft	Add 75 ft
Category II: Vernal pool	150	NA	NA	NA
Category II: Forested	75 ft	Add 15 ft	Add 45 ft	Add 75 ft
Category III (all)	60 ft	Add 30 ft	Add 60 ft	NA
Category IV (all)	40 ft	NA	NA	NA

Table 17.10.410.2 Required measures to minimize impacts to wetlands

(Measures are required where applicable to a specific proposal)

Disturbance	Required Measures to Minimize Impacts
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³ Wetland scores referred to in the table are derived from wetland rating as described in section 17.10.440, "Classification—Wetland rating system."

Disturbance	Required Measures to Minimize Impacts
Lights	<ul style="list-style-type: none"> • Direct lights away from wetland
Noise	<ul style="list-style-type: none"> • Locate activity that generates noise away from wetland • If warranted, enhance existing buffer with native vegetation plantings adjacent to noise source • For activities that generate relatively continuous, potentially disruptive noise, such as certain heavy industry or mining, establish an additional 10' heavily vegetated buffer strip immediately adjacent to the outer wetland buffer
Toxic runoff	<ul style="list-style-type: none"> • Route all new, untreated runoff away from wetland while ensuring wetland is not dewatered • Establish covenants limiting use of pesticides within 150 ft of wetland • Apply integrated pest management
Stormwater runoff	<ul style="list-style-type: none"> • Retrofit stormwater detention and treatment for roads and existing adjacent development • Prevent channelized flow from lawns that directly enters the buffer • Use Low Intensity Development techniques (per PSAT publication on LID techniques)
Change in water regime	<ul style="list-style-type: none"> • Infiltrate or treat, detain, and disperse into buffer new runoff from impervious surfaces and new lawns
Pets and human disturbance	<ul style="list-style-type: none"> • Use privacy fencing OR plant dense vegetation to delineate buffer edge and to discourage disturbance using vegetation appropriate for the ecoregion • Place wetland and its buffer in a separate tract or protect with a conservation easement
Dust	<ul style="list-style-type: none"> • Use best management practices to control dust
Disruption of corridors or connections	<ul style="list-style-type: none"> • Maintain connections to offsite areas that are undisturbed • Restore corridors or connections to offsite habitats by replanting

B. Increased Wetland Buffer Area Width. Buffer widths shall be increased beyond those indicated above when a Critical Area Study shows that a larger buffer is necessary to protect wetland functions and values. The size of the increase shall be supported by appropriate documentation showing that it is reasonably related to protection of specific functions and values of the wetland, such as:

1. The wetland is used by a plant or animal species listed by the federal government or the state as endangered, threatened, candidate, sensitive, monitored or documented priority species or habitats, or essential or outstanding habitat for those species or has unusual nesting or resting sites such as heron rookeries or raptor nesting trees; or

2. The adjacent land is susceptible to severe erosion, and erosion-control measures will not effectively prevent adverse wetland impacts; or
 3. The adjacent land has minimal vegetative cover or slopes greater than 30 percent.
- C. Buffer averaging to *improve wetland protection* may be permitted when **all** of the following conditions are met:
1. Different parts of the wetland have significant differences in characteristics that affect its habitat functions, such as a wetland with a forested component adjacent to a degraded emergent component or a “dual-rated” wetland with a Category I area adjacent to a lower-rated area.
 2. The buffer is increased adjacent to the higher-functioning area of habitat or the more-sensitive portion of the wetland and decreased adjacent to the lower-functioning or less-sensitive portion as demonstrated by a critical areas study from a qualified wetland professional.
 3. The total area of the buffer after averaging is equal to the area required without averaging.
 4. The buffer at its narrowest point is never less than either $\frac{3}{4}$ of the required width or 75 feet for Categories I and II, 50 feet for Category III, and 25 feet for Category IV, whichever is greater.
- D. Measurement of Wetland Buffers. All buffers shall be measured perpendicular from the wetland boundary as surveyed in the field. The buffer for a wetland created, restored, or enhanced as compensation for approved wetland alterations shall be the same as the buffer required for the category of the created, restored, or enhanced wetland. Lawns, walkways, driveways, and other mowed or paved areas will not be considered buffers or included in buffer area calculations.
- E. Buffers on Mitigation Sites. All mitigation sites shall have buffers consistent with the buffer requirements of this chapter. Buffers shall be based on the expected or target category of the proposed wetland mitigation site.
- F. Maintenance and repair.
1. Except as otherwise specified or allowed in accordance with this chapter, wetland buffers shall be retained in an undisturbed or enhanced condition. In the case of compensatory mitigation sites, removal of invasive non-native weeds is required for the duration of the monitoring period.
 2. Normal and routine maintenance and repair of any existing public or private facilities within an existing right-of-way, provided that the maintenance or repair does not increase the use of the facility or right-of-way, or increase its footprint by more than 10%.
 3. Removal of hazardous trees according to vegetation management plan prepared by a qualified wetlands professional. Re-vegetation with appropriate native species at natural densities is allowed in conjunction with removal of hazard trees.

- G. Impacts to Buffers. Compensation for impacts to buffers shall be consistent with the provisions of Section 17.10.490.
- H. Overlapping Critical Area Buffers. If buffers for two contiguous critical areas overlap (such as buffers for a stream and a wetland), the wider buffer shall apply.
- I. Allowed Buffer Uses. The following uses may be allowed within a wetland buffer in accordance with the review procedures of this chapter, provided said uses are not prohibited by any other applicable law and are conducted so as to minimize impacts to the buffer and adjacent wetland:
- a. Conservation and Restoration Activities. Conservation or restoration activities aimed at protecting the soil, water, vegetation, or wildlife.
 - b. Passive recreation. Passive recreation facilities designed and in accordance with an approved critical area study, including:
 - i. Walkways, trails, and minor trail-related facilities such as benches having no adverse impact on water quality.
 - a. Those walkways and trails that are generally parallel to the perimeter of the wetland shall be located in the outer twenty-five percent (25%) of the wetland buffer area. Exceptions may be made for access points and to accommodate variations in topography and similar site factors, provided the impacts are mitigated in accordance with an approved Critical Area Study.
 - b. All walkways and trails shall be located to avoid removal of significant trees and to minimize disruption and disturbance of natural vegetation and wildlife habitat. Where feasible, walkways and trails should be located in areas that have previously been disturbed, such as road grades and utility corridors. They should be limited to pervious surfaces no more than five (5) feet in width for pedestrian, bicycle, and cross-country ski use only. Raised boardwalks using non-treated pilings may be acceptable.
 - ii. Wildlife-viewing structures.
 - c. Educational and scientific research activities.
 - d. The harvesting of wild crops in a manner that is not injurious to natural reproduction of such crops and provided the harvesting does not require tilling of soil, planting of crops, chemical applications, or wetland alteration by changing existing topography, water conditions, or water sources.
 - e. Drilling for utilities/utility corridors under a buffer, with entrance/exit portals located completely outside of the wetland buffer boundary, provided that a qualified wetlands professional has shown that the drilling will not interrupt the ground water connection to the wetland or percolation of surface water down through the soil column.
 - f. Enhancement of a wetland buffer through the removal of non-native invasive plant species. Removal of invasive plant species shall be restricted to hand removal. All removed plant material shall be taken away from the site and appropriately disposed of. Plants that appear on the Washington State Noxious

Weed Control Board list of noxious weeds must be handled and disposed of according to a noxious weed control plan appropriate to that species. Revegetation with appropriate native species at natural densities is allowed in conjunction with removal of invasive plant species.

- g. Stormwater management facilities. Stormwater management facilities shall be limited to dispersion outfalls and bioswales or alternate facilities that do not create erosion or degrade function and values of critical areas. They may be allowed within the outer twenty-five percent (25%) of the buffer of Category III or IV wetlands only, subject to compliance with the *Stormwater Management Manual for Eastern Washington*, Washington Department of Ecology Publication Number 04-10-076 (or as amended) and with Washington State's Surface Water Quality Standards (WAC 173-201-A, as amended).
- h. Non-Conforming Uses. Repair and maintenance of non-conforming uses or structures, where legally established within the buffer, provided they do not increase the degree of nonconformity, and provided any impacts to wetlands or their buffers are mitigated.
- i. Signs and Fencing of Wetlands and Buffers.
 - i. Temporary markers. The outer perimeter of the wetland buffer and the clearing limits identified by an approved permit or authorization shall be marked in the field with temporary "clearing limits" fencing in such a way as to ensure that no unauthorized intrusion will occur. The marking is subject to inspection by the Administrator prior to the commencement of permitted activities. This temporary marking shall be maintained throughout construction and shall not be removed until permanent signs, if required, are in place.
 - ii. Permanent signs. As a condition of any permit or authorization issued pursuant to this chapter, the Administrator may require the applicant to install permanent signs along the boundary of a wetland or buffer.
 - a. Permanent signs shall be made of an enamel-coated metal face and attached to a metal post or another non-treated material of equal durability. Signs must be posted at an interval of one (1) per lot or every fifty (50) feet, whichever is less, and must be maintained by the property owner in perpetuity. The signs shall be worded as follows or with alternative language approved by the Administrator: "Protected Wetland Area; Do Not Disturb; Contact the City of Entiat Community Development Department Regarding Uses, Restrictions, and Opportunities for Stewardship."
 - b. The provisions of Subsection (i) may be modified as necessary to assure protection of sensitive features or wildlife.
 - iii. Fencing.
 - a. The applicant may be required to install a permanent fence around the wetland or buffer to mitigate impacts identified in an approved Critical Area Study, such as disturbance by humans, pets, or grazing animals.

- b. Where no fence is required, fencing may be allowed provided it does not interfere with wetland hydrology, structure, or function and provided it complies with this subsection.
- c. Wetland and buffer fencing shall be designed to facilitate species migration, including fish runs, and shall be constructed in a manner that minimizes impacts to the wetland and associated habitat.

17.10.460 Road/street construction. Any private or public road or street construction (including expansion of an existing road) which is allowed within a designated wetland or buffer shall comply with the following minimum development standards:

- A. No other practicable alternative exists.
- B. Mitigation sequencing must be followed.
- C. Where appropriate, the roadway section shall provide for other purposes, such as utilities or pedestrian facilities.
- D. Stormwater runoff facilities associated with road and street construction shall be located outside of wetlands. Such facilities shall be limited to dispersion outfalls and bioswales or alternate facilities that do not create erosion or degrade function and values of critical areas. They may be permitted within the outer twenty-five percent (25%) of wetland buffers; such facilities must be consistent with Section 17.10.410.I.g of this title.

17.10.470 Land division. All proposed divisions of land which include designated wetlands shall comply with the following procedures and development standards:

- A. Up to fifty percent of the total wetlands on a development site, other than lands that are usually inundated and submerged during the spring wet season, may be used in calculating minimum lot area for proposed lots, provided the development proposal includes adequate provisions to protect wetland functions and values.
- B. Wetland buffers may be included in the calculation of minimum area for proposed lots, provided the development proposal includes adequate provisions to protect wetland functions and values.
- C. New lots shall contain at least one site, adequate in size to accommodate the proposed use, (including access) that is suitable for development and is not within the designated wetland or its buffer area.
- D. In order to implement the goals and policies of this section, to accommodate innovation, creativity, design flexibility and the potential for density bonuses to achieve a level of environmental protection that would not be possible by typical lot-by-lot development, the use of planned development and/or cluster subdivision as described in the city Code is strongly encouraged for any project on a site that includes a designated wetland.

17.10.480 Erosion control. Work performed in designated wetlands and their associated buffers that involves filling, grading or disturbance, shall comply with an approved mitigation plan prepared by a qualified wetlands professional. That plan shall identify the work to be performed, including any proposed filling or cutting, and shall be consistent with all provisions of this section. Protection measures required and identified in the mitigation plan may include

temporary measures applied during construction, such as the use of filter fabrics in the construction area or temporary vegetative cover intended to stabilize the site immediately following construction.

17.10.490 Compensatory Mitigation.

- A. Mitigation Sequencing. Before impacting any wetland or its buffer, an applicant shall demonstrate that the following actions have been taken. Actions are listed in the order of preference.
1. Avoid the impact altogether by not taking a certain action or parts of an action.
 2. Minimize impacts by limiting the degree or magnitude of the action and its implementation, by using appropriate technology, or by taking affirmative steps to avoid or reduce impacts.
 3. Rectify the impact by repairing, rehabilitating, or restoring the affected environment.
 4. Reduce or eliminate the impact over time by preservation and maintenance operations.
 5. Compensate for the impact by replacing, enhancing, or providing substitute resources or environments.
 6. Monitor the required compensation and take remedial or corrective measures when necessary.
- B. Requirements for Compensatory Mitigation
1. Compensatory mitigation for wetland alterations shall be used only for impacts that cannot be avoided or minimized and shall achieve equivalent or greater biologic functions. Compensatory mitigation plans shall be consistent with *Wetland Mitigation in Washington State – Part 2: Developing Mitigation Plans (Version 1)*, Ecology Publication #06-06-011b, Olympia, WA, March 2006 or as revised.
 2. The mitigation ratios in Table 17.10.490.1 of this article shall be used as a general guide in establishing mitigation ratios. Ratios for rehabilitation and enhancement may be reduced when combined with 1:1 replacement through creation or reestablishment. See Table 1a or 1b, *Wetland Mitigation in Washington State - Part 1: Agency Policies and Guidance--Version 1*, Ecology Publication #06-06011 a, Olympia, WA, March 2006 or as revised.
 3. Buffer Mitigation Ratios. Impacts to buffers shall be mitigated at a 1:1 ratio. Compensatory buffer mitigation shall replace those buffer functions lost from development.
- C. Compensating for Lost or Affected Functions. Compensatory mitigation shall address the functions affected by the proposed project, with an intention to achieve functional equivalency or improvement of functions. The goal shall be for the compensatory mitigation to provide similar wetland functions as those lost, except when either:
1. The lost wetland provides minimal functions and the proposed compensatory mitigation action(s) will provide equal or greater functions or will provide functions shown to be limiting within a watershed through a formal Washington state watershed assessment plan or protocol; or

2. Out-of-kind replacement of wetland type or functions will best meet watershed goals formally identified by the City, such as replacement of historically diminished wetland types.

D. Preference of Mitigation Actions. Methods to achieve compensation for wetland functions shall be approached in the following order of preference:

1. Restoration (re-establishment and rehabilitation) of wetlands.
2. Creation (establishment) of wetlands on disturbed upland sites such as those with vegetative cover consisting primarily of non-native species. This should be attempted only when there is an adequate source of water and it can be shown that the surface and subsurface hydrologic regime is conducive to the wetland community that is anticipated in the design.
3. Enhancement of significantly degraded wetlands in combination with restoration or creation. Enhancement alone will result in an overall loss of wetland acreage and is less effective at replacing the functions lost. Where enhancement is used as compensation, it must be part of a mitigation package that includes replacing the impacted area and meeting ratio requirements specified in this section.
4. Preservation. Preservation of high-quality, at risk-wetlands as compensation is generally acceptable when done in combination with restoration, creation, or enhancement, provided that a minimum of 1:1 acreage replacement is provided by re-establishment or creation. Preservation of high-quality, at-risk wetlands and habitat may be considered as the sole means of compensation for wetland impacts when the following criteria are met:
 - a. Wetland impacts will not have a significant adverse impact on habitat for listed fish, or other ESA listed species.
 - b. There is no net loss of habitat functions within the watershed or basin.
 - c. Mitigation ratios for preservation as the sole means of mitigation shall be consistent with an approved Critical Area Study prepared by a qualified wetlands professional, based on the significance of the preservation project and the type and quality of the wetland resources lost.
 - d. The impact area is small (generally $\frac{1}{2}$acre) and/or impacts are occurring to a low-functioning system (Category III or IV wetland).

All preservation sites shall include buffer areas adequate to protect the habitat and its functions from encroachment and degradation.

E. Type and Location of Compensatory Mitigation. *Selecting Wetland Mitigation Sites Using a Watershed Approach* (Department of Ecology Publication # 10-06-007, November 2010) shall be the preferred guidance for establishing the location of compensatory mitigation. Unless it is demonstrated that a higher level of ecological functioning would result from an alternative approach, compensatory mitigation for ecological functions shall be either in kind and on site, or in kind and within the Entiat River Basin (WRIA 46).

1. Compensatory mitigation actions shall be conducted within the same sub-basin of the Wenatchee River Basin and on the site of the alteration except when all of the following apply:
 - a. An approved Critical Area Study shows that there are no reasonable opportunities on-site (e.g., on-site options would require elimination of high-functioning upland habitat), or opportunities on site do not have a high likelihood of success based on a determination of the capacity of the site to compensate for the impacts; and
 - b. Off-site mitigation has a greater likelihood of providing equal or improved wetland functions than the impacted wetland.
2. Off-site locations shall be in the Entiat River Basin unless:
 - a. Watershed goals for water quality, flood storage or conveyance, habitat, or other wetland functions have been established by the City and strongly justify location of mitigation outside the basin; or
 - b. Credits from a wetland mitigation bank may be approved for use as compensation for unavoidable impacts to wetlands when:
 - i. The bank is certified under Chapter 173-700 WAC;
 - ii. The administrator determines that the wetland mitigation bank provides appropriate compensation for the authorized impacts; and
 - iii. The proposed use of credits is consistent with the terms and conditions of the bank's certification.
 - c. Replacement ratios for projects using bank credits shall be consistent with replacement ratios specified in the bank's certification.
 - d. Credits from a certified wetland mitigation bank may be used to compensate for impacts located within the service area specified in the bank's certification. In some cases, the service area of the bank may include portions of more than one adjacent drainage basin for specific wetland functions.
3. In-Lieu Fee. To aid in the implementation of off-site mitigation, the City may develop a program which prioritizes wetland areas for use as mitigation and allows payment of fees in lieu of providing mitigation on a development site. This program shall be developed and approved through a public process and be consistent with federal rules, state policy on in-lieu fee mitigation, and state water quality regulations. The program should address:
 - a. The identification of sites within the City/County that are suitable for use as off-site mitigation. Site suitability shall take into account wetland functions, potential for wetland degradation, and potential for urban growth and service expansion, and
 - b. The use of fees for mitigation on available sites that have been identified as suitable and prioritized.

4. The design for the compensatory mitigation project must be appropriate for its location (i.e., position in the landscape). Therefore, compensatory mitigation shall not result in the creation, restoration, or enhancement of an atypical wetland (i.e., the water source(s) and hydroperiod proposed for the mitigation site are not typical for the geomorphic setting). Likewise, it should not provide exaggerated morphology or require a berm or other engineered structures to hold back water. For example, excavating a permanently inundated pond in an existing seasonally saturated or inundated wetland could result in an atypical wetland. Another example would be excavating depressions in an existing wetland on a slope, which would require the construction of berms to hold the water.

F. Timing of Compensatory Mitigation. If feasible, compensatory mitigation projects shall be completed prior to activities that will disturb wetlands. If that is not feasible, compensatory mitigation shall be completed immediately following disturbance and prior to use or occupancy of the development or other alteration. Construction of mitigation projects shall be timed to minimize impacts to existing fisheries, wildlife, and flora.

1. The Administrator may authorize one or more temporary delays in completing construction or installation of the compensatory mitigation when the applicant provides an appropriate written explanation from a qualified wetland professional as to the rationale for such delay; however, temporary delays exceeding a cumulative period of two years shall not be authorized. An appropriate rationale would include identification of the environmental conditions that could produce a high probability of failure or significant construction difficulties (e.g., project delay lapses past a fisheries window, or installing plants should be delayed until the dormant season to ensure greater survival of installed materials). The delay shall not create or perpetuate hazardous conditions or environmental damage or degradation, and the delay shall not be injurious to the health, safety, or general welfare of the public. The request for the temporary delay must include a written justification that documents the environmental constraints that preclude implementation of the compensatory mitigation plan. The justification must be verified and approved by the City.
2. Advance Mitigation. Mitigation for projects with pre-identified impacts to wetlands may be constructed in advance of the impacts if the mitigation is implemented according to federal rules, state policy on advance mitigation, and state water quality regulations.

Table 17.10.490.1. Wetland Mitigation Ratios

Category and Type of Wetland	Creation or Reestablishment	Rehabilitation	Enhancement	Preservation
Category I: Bog, Natural Heritage site	Not considered possible	6:1	Case-by-case	10:1
Category I: Mature Forested	6:1	12:1	24:1	24:1
Category I: Based on functions	4:1	8:1	16:1	20:1
Category II:	3:1	6:1	12:1	20:1
Category III	2:1	4:1	8:1	15:1
Category IV	1.5:1	3:1	6:1	10:1

G. Compensatory Mitigation Plan.

When a project involves wetland and/or buffer impacts, a compensatory mitigation plan prepared by a qualified professional shall be required, meeting the following minimum standards:

1. Compensatory Mitigation Report. Full guidance can be found in *Wetland Mitigation in Washington State – Part 2: Developing Mitigation Plans (Version 1)* (Ecology Publication #06-06-011b, Olympia, WA, March 2006 or as revised).
2. The report must include a written report and plan sheets that must contain, at a minimum, the following elements:
 - a. The name and contact information of the applicant; the name, qualifications, and contact information for the primary author(s) of the compensatory mitigation report; a description of the proposal; a summary of the impacts and proposed compensation concept; identification of all the local, state, and/or federal wetland-related permit(s) required for the project; and a vicinity map for the project.
 - b. A description of reasonable efforts made to apply mitigation sequencing, as defined in these regulations, to avoid, minimize, and otherwise mitigate impacts to critical areas.
 - c. Description of the existing wetland and buffer areas proposed to be impacted. Include acreage (or square footage), water regime, vegetation, soils, landscape position, surrounding lands uses, and functions. Also describe impacts in terms of acreage by Cowardin classification, hydrogeomorphic classification, and wetland

rating, based on Section 17.10.440 of this Chapter, Classification – Wetland rating system.

- d. Description of the compensatory mitigation site, including location and rationale for selection. Include an assessment of existing conditions: acreage (or square footage) of wetlands and uplands, water regime, sources of water, vegetation, soils, landscape position, surrounding land uses, and functions. Estimate future conditions in this location if the compensation actions are NOT undertaken (i.e., how would this site progress through natural succession?).
- e. A description of the proposed actions for compensation of wetland and upland areas affected by the project. Include overall goals of the proposed mitigation, including a description of the targeted functions, hydrogeomorphic classification, and categories of wetlands.
- f. A description of the proposed mitigation construction activities and timing of activities.
- g. A discussion of ongoing management practices that will protect wetlands after the project site has been developed, including proposed monitoring and maintenance programs (for remaining wetlands and compensatory mitigation wetlands).
- h. Documentation of compliance with Section 17.10.435 of this Chapter.
- i. The scaled plan sheets for the compensatory mitigation must contain, at a minimum:
 - i. Surveyed edges of the existing wetland and buffers, proposed areas of wetland and/or buffer impacts, location of proposed wetland and/or buffer compensation actions.
 - ii. Existing topography, ground-proofed, at two-foot contour intervals in the zone of the proposed compensation actions if any grading activity is proposed to create the compensation area(s). Also existing cross-sections of on-site wetland areas that are proposed to be impacted, and cross-section(s) (estimated one-foot intervals) for the proposed areas of wetland or buffer compensation.
 - iii. Surface and subsurface hydrologic conditions including an analysis of existing and proposed hydrologic regimes for enhanced, created, or restored compensatory mitigation areas. Also, illustrations of how data for existing hydrologic conditions were used to determine the estimates of future hydrologic conditions.
 - iv. Conditions expected from the proposed actions on site including future hydrogeomorphic types, vegetation community types by dominant species (wetland and upland), and future water regimes.
 - v. Required wetland buffers for existing wetlands and proposed compensation areas. Explain how buffers comply with Section 17.10.450 (Wetland Buffers), sub-sections A-D, of this chapter and the rationale for any deviations from the provisions of those sub-sections.

- vi. A plant schedule for the compensation area including all species by proposed community type and water regime, size and type of plant material to be installed, spacing of plants, typical clustering patterns, total number of each species by community type, timing of installation.
 - vii. Performance standards (measurable standards reflective of years post-installation) for upland and wetland communities, monitoring schedule, and maintenance schedule and actions by each biennium.
 - j. Monitoring. Mitigation monitoring shall be required for a period necessary to establish that performance standards have been met, but not for a period less than five years. If a scrub-shrub or forested vegetation community is proposed, monitoring may be required for ten years or more. The project mitigation plan shall include monitoring elements that ensure certainty of success for the project's natural resource values and functions. If the mitigation goals are not obtained within the initial five-year period, the applicant remains responsible for restoration of the natural resource values and functions until the mitigation goals agreed to in the mitigation plan are achieved.
3. Alternative Mitigation Plans. The Administrator may approve alternative critical areas mitigation plans that are based on best available science, such as priority restoration plans that achieve restoration goals identified in the SMP. Alternative mitigation proposals must provide an equivalent or better level of protection of critical area functions and values than would be provided by the strict application of this chapter.

The Administrator shall consider the following for approval of an alternative mitigation proposal:

- a. The proposal uses a watershed approach consistent with *Selecting Wetland Mitigation Sites Using a Watershed Approach* (Ecology Publication #09-06-32, Olympia, WA, December 2009.)
- b. Creation or enhancement of a larger system of natural areas and open space is preferable to the preservation of many individual habitat areas;
- c. Mitigation according to Section E is not feasible due to site constraints such as parcel size, stream type, wetland category, or geologic hazards;
- d. There is clear potential for success of the proposed mitigation at the proposed mitigation site;

- e. The plan shall contain clear and measurable standards for achieving compliance with the specific provisions of the plan. A monitoring plan shall, at a minimum, meet the provisions in Section 17.10.490.B.3;
- f. The plan shall be reviewed and approved as part of overall approval of the proposed use;
- g. A wetland of a different type is justified based on regional needs or functions and values; the replacement ratios may not be reduced or eliminated unless the reduction results in a preferred environmental alternative;
- h. Mitigation guarantees shall meet the minimum requirements as outlined in Section.17.10.490.G.3.i.viii;
- i. Qualified professionals in each of the critical areas addressed shall prepare the plan;
- j. The City may consult with agencies with expertise and jurisdiction over the resources during the review to assist with analysis and identification of appropriate performance measures that adequately safeguard critical areas.

Article V. Critical Aquifer Recharge Areas

17.10.510 Purpose and intent. This section is meant to prevent pollution and maintain water supply, in order to protect Entiat's drinking water and preserve anadromous fisheries.

17.10.520 Designation. Critical aquifer recharge areas (CARAs) are those areas with a critical recharging effect on aquifers used for potable water as defined by WAC 365-190-030(3). The City designates all areas with a critical recharging effect on aquifers used for potable water, regardless of any formal identification, as CARAs.

17.10.530 Classification.

A. Aquifer recharge areas will be rated according to the vulnerability of the aquifer, with vulnerability being the combined effect of susceptibility to contamination and the contamination loading potential. The categories of vulnerability shall be high, medium, and low, with high vulnerability being characterized by a combination of land uses that contribute to contamination that may degrade groundwater, and hydrogeologic conditions that facilitate that degradation.

1. Hydrogeologic susceptibility will be characterized by looking at the following attributes:
 - a. Depth to groundwater;
 - b. Aquifer properties such as hydraulic conductivity and gradients;
 - c. Soil (texture, permeability, and contaminant attenuation properties);
 - d. Characteristics of the vadose zone including permeability and attenuation properties; and
 - e. Other relevant factors.
 2. Contamination loading potential can be evaluated by considering the following:
 - a. General land use;
 - b. Waste disposal sites;
 - c. Agriculture activities;
 - d. Well logs and water quality test results;
 - e. Density of septic systems in use in the area; and
 - f. Other information about the potential for contamination.
- B. Aquifer recharge areas shall be classified according to the following system:
1. Level 1: Critical Aquifer Recharge Areas shall be those areas found to have a high vulnerability rating.
 2. Level 2: Awareness Aquifer Recharge Areas shall be those areas found to have a medium vulnerability rating.

17.10.540 Critical Areas process for Critical Aquifer Recharge Areas.

- A. In determining whether critical area review will be required for a proposed alteration, in completing a Critical Areas Checklist, and in the City’s review for the purpose of determining whether a Critical Area Study will be required, the Administrator shall consider both the susceptibility of the site, based on the classification in Section 17.10.530, and the potential for the proposed alteration to contribute to degradation or depletion of groundwater or harm to anadromous fisheries.
- B. At a minimum, the ten-year time of travel and assigned time-of-travel wellhead protection areas shown on maps prepared by the Washington State Department of Health, Division of Environmental Health, Office of Drinking Water, Source Water Assessment Program (SWAP) shall be considered in determining whether critical area review will be required for a proposed alteration, in completing a Critical Areas Checklist, and in the City’s review for the purpose of determining whether a Critical Area Study will be required in the vicinity of a given well.
- C. In addition to the general Critical Area Study requirements of Article II, the required Critical Area Study for CARAs susceptible to degradation or depletion must contain a level one hydrogeologic evaluation meeting the criteria of section 17.10.540.D, below. In addition, a level two hydrogeologic evaluation meeting the criteria of section 17.10.540.E, below, shall be required for any of the following proposed activities:
1. Activities that result in five percent (5%) or more impervious site area.
 2. Activities that divert, alter, or reduce the flow of surface or ground waters, or otherwise reduce the recharging of the aquifer (*please note that, per Section 17.10.570, significant reduction in recharge to aquifers currently or potentially used as a*

potable water source and to aquifers that are a source of significant baseflow to regulated streams is prohibited).

3. The use, processing, handling, storage, treatment, or disposal of hazardous substances, other than household chemicals used according to the directions specified on the packaging for domestic applications.
 4. The use of injection wells, including on-site septic systems, except those domestic septic systems that release less than 14,500 gallons of effluent per day and that are limited to a maximum density of one system per acre.
 5. Aboveground application of sewage or sludge.
 6. New agricultural activities.
 7. Commercial and industrial uses.
 8. Land division, including subdivisions, short subdivisions, planned developments, binding site plans and related developments.
 9. Storage Tanks.
 10. Any other activity that the Administrator determines is likely to have an adverse impact on ground water quality or quantity, the recharge of the aquifer, or anadromous fish species.
- D. A level one hydrogeologic evaluation shall include the following site- and proposal-related information at a minimum:
1. Available information regarding geologic and hydrogeologic characteristics of the site including the surface location of all critical aquifer recharge areas located on site or immediately adjacent to the site, and permeability of the unsaturated zone.
 2. Ground water depth, flow direction, and gradient based on available information.
 3. Currently available data on wells and springs within 1,300 feet of the project area.
 4. Location of other critical areas, including surface waters, within 1,300 feet of the project area.
 5. Available historic water quality data for the area to be affected by the proposed activity.
 6. Proposed best management practices. The *Stormwater Management Manual for Eastern Washington* shall be the preferred guidance for BMPs.
- E. A level two hydrogeologic evaluation shall include the following site- and proposal-related information at a minimum, in addition to the requirements for a level one hydrogeologic evaluation:
1. Historic water quality data for the area to be affected by the proposed activity compiled for at least the previous five (5) year period, or available data if data for the previous five (5) year period are not available.
 2. Ground water monitoring plan provisions.

3. Discussion of the effects of the proposed project on the ground water quality and quantity, including:
 - a. Predictive evaluation of ground water withdrawal effects on nearby wells and surface water features; and
 - b. Predictive evaluation of contaminant transport based on potential releases to ground water.
 4. Discussion of the effects of the proposed project on anadromous fish species, including where ground water affects streams and other surface water habitats, and what the effects are.
 5. A spill plan that identifies equipment and/or structures that could fail, resulting in an impact. Spill plans shall include provisions for regular inspection, repair, and replacement of structures and equipment that could fail.
- F. Existing and ongoing agricultural activities in or within two hundred (200) feet of a CARA susceptible to degradation or depletion shall be encouraged to incorporate best management practices and seek technical assistance from the Chelan County Conservation District, WSU Cooperative Extension Agent, and local NRCS field agents.

17.10.550 Performance Standards – General Requirements

- A. The City prohibits the discharge of contaminants to CARAs, with the exception of incidental, *de minimus* discharges.
- B. All alterations in CARAs susceptible to degradation or depletion shall be evaluated for potential to contaminate ground water resources.
 1. If the Administrator determines that a high potential for contamination exists, he or she may require a critical area study. If a critical area study or hydrogeologic evaluation identifies significant potential impacts to CARAs, the project applicant will be required to fully document those impacts and provide a discussion of alternatives by which the impacts could be avoided or prevented. The applicant shall provide a detailed mitigation plan for any unavoidable potential impacts. The City may require that the mitigation plan include process control and remediation as appropriate. Best management practices shall be employed to avoid introducing pollutants into the aquifer, depleting the aquifer, or harming anadromous fish species.
 2. Whether or not a Critical Area Study is required, best management practices and other mitigation may be required.
 3. The *Stormwater Management Manual for Eastern Washington* shall be the preferred guidance for BMPs.
- B. Alteration may be permitted in a CARA only if the applicant can show that the proposed alteration will not adversely affect the recharging of the aquifer.
- C. Any proposed alteration must comply with the water source protection requirements and recommendations of the U.S. Environmental Protection Agency, the Washington State Department of Health, and the Chelan-Douglas Health District.

- D. Any proposed use or activity must be designed and constructed in accordance with the City's storm water management regulations, when adopted.
- E. Based on Critical Area Study findings, any operation may be required to adopt any or all of the following best management practices to ensure their operations minimize potential risks to water resources.
1. The owner/operator shall take precautions to prevent accidental releases of hazardous materials. Hazardous materials shall be separated and prevented from entering stormwater drainage systems, septic systems, and drywells.
 2. Hazardous materials shall be managed so that they do not threaten human health or the environment, or enter CARAs.
 3. All hazardous materials that have been released shall be contained and abated immediately, and the hazardous materials recycled or disposed of properly. The City shall be notified of any release of hazardous materials that clearly impact water resources, as soon as possible but no later than 24 hours after the release. The *Stormwater Management Manual for Eastern Washington* shall be the preferred guidance for operational BMPs for spills of oils and hazardous substances.
 4. Oil/water separators shall be inspected, cleaned and maintained as stipulated in the *Stormwater Management Manual for Eastern Washington*. The City may allow an operation to modify the regularity of cleanouts if the operation can demonstrate to the City's satisfaction that the separator operates effectively at less frequent cleaning intervals.
 5. All pesticides, herbicides, fungicides and fertilizers shall be applied and managed according to the applicable BMPs for landscaping and lawn/vegetation management in the *Stormwater Management Manual for Eastern Washington*.
 6. Stormwater drainage systems and treatment facilities, including, but not limited to, catch basins, wetponds and vaults, biofilters, settling basins, and infiltration systems, shall be cleaned and maintained according to the applicable operational BMPs for the maintenance of stormwater, drainage and treatment systems in the *Stormwater Management Manual for Eastern Washington*.
 7. Any water well that is unusable, abandoned, or whose use has been permanently discontinued, or that is in such disrepair that its continued use is impractical or is an environmental, safety or public health hazard shall be decommissioned according to the provisions of the Washington Administrative Code WAC 173-160-381.
 8. At the closure of an operation, all hazardous materials shall be removed from the closing portion of the operation and disposed of in accordance with local, state and federal laws.

17.10.560 Performance Standards – Specific Uses

- A. New operations which engage in the following commercial activities shall implement the applicable source control BMPs from the *Stormwater Management Manual for Eastern Washington*: commercial animal handling, commercial composting, printing operations,

fueling stations, log sorting, railroad yards, recyclers, scrap yards, and wood treatment facilities. Existing operations shall be encouraged to abide by the same standards.

- B. New operations performing the following activities shall implement the applicable source control BMPs from the *Stormwater Management Manual for Eastern Washington*: construction/repair/maintenance of boats/ships, airfield/street deicing, dust control, landscaping and lawn/vegetation management (including golf courses), loading/unloading of trucks and railcars, repair/maintenance/parking of vehicles/equipment, erosion control at industrial sites, maintenance of utility corridors, maintenance of roadside ditches/culverts, outdoor manufacturing, mobile fueling of vehicles/equipment, painting/coating of vehicles/buildings/equipment, storing dangerous wastes, managing raw materials. Existing operations shall be encouraged to abide by the same standards.
- C. New operations that engage in commercial activities such as pressure washing, carpet cleaning, and equipment and vehicle washing shall use applicable BMPs for washing and steam cleaning; the *Stormwater Management Manual for Eastern Washington* shall be the preferred guidance for such BMPs. Mobile washing operations shall ensure that all of their employees are knowledgeable about proper discharge practices. Washwater from such operations shall be captured and directed to an approved discharge location. Non-approved washwater shall not be discharged into the City's stormwater drainage system. Existing operations shall be encouraged to abide by the same standards.
- D. Sewage Disposal.
 - 1. All new residential, commercial or industrial alterations located in or within 250' (two hundred and fifty feet) of a CARA susceptible to degradation or depletion and within 200 feet of a public sewer system shall be connected to the sewer system.
 - 2. In or within 250' (two hundred and fifty feet) of a CARA susceptible to degradation or depletion, new on-site sewage systems on lots smaller than one acre without a treatment system that results in effluent nitrate-nitrogen concentrations below ten (10) milligrams per liter shall be prohibited.
- E. Use of reclaimed water for surface percolation or direct recharge. Water reuse projects for reclaimed water must be in accordance with the adopted water or sewer comprehensive plans that have been approved by the state departments of Ecology and Health.
 - 1. Use of reclaimed water for surface percolation must meet the ground water recharge criteria given in Chapter 90.46.080(1) and Chapter 90.46.010(10) RCW. The state Department of Ecology may establish additional discharge limits in accordance with Chapter 90.46.080(2) RCW.
 - 2. Direct injection must be in accordance with Federal 40 CFR Parts 144 and 146, the standards developed by authority of Chapter 90.46.042 RCW, and Chapter 173-218 WAC.
- F. Sand and gravel mining are prohibited in or within 250' (two hundred and fifty feet) of a CARA susceptible to degradation or depletion.
- G. State and Federal Regulations. The uses listed below shall be conditioned as necessary to protect CARAs in accordance with the applicable state and federal regulations.

Table 17.10.560.1 State and Federal Regulations to Protect CARAs

Activity	Statute - Regulation - Guidance
Above Ground Storage Tanks	Chapter 173-303 -640 WAC
Animal Feedlots	Chapter 173-216 WAC, Chapter 173-220 WAC
Automobile Washers	Chapter 173-216 WAC, Best Management Practices for Vehicle and Equipment Discharges (WDOE WQ-R-95-56)
Chemical Treatment Storage and Disposal Facilities	Chapter 173-303-182 WAC
Hazardous Waste Generator (<i>Boat Repair Shops, Biological Research Facility, Dry Cleaners, Furniture Stripping, Motor Vehicle Service Garages, Photographic Processing, Printing and Publishing Shops, etc.</i>)	Chapter 173-303 WAC
Junk Yards and Salvage Yards	Chapter 173-304 WAC, Best Management Practices to Prevent Stormwater Pollution at Vehicles Recycler Facilities (WDOE 94-146)
Oil and Gas Drilling	Chapter 332-12-450 WAC, WAC, Chapter 173-218 WAC
On-Site Sewage Systems (Large Scale)	Chapter 173-240 WAC
On-Site Sewage Systems (< 14,500 gal/day)	Chapter 246-272 WAC, Local Health Ordinances
Pesticide Storage and Use	Chapter 15.54 RCW, Chapter 17.21 RCW
Sawmills	Chapter 173-303 WAC, 173-304 WAC, Best Management Practices to Prevent Stormwater Pollution at Log Yards (WDOE 95-53)
Solid Waste Handling and Recycling Facilities	Chapter 173-304 WAC
Surface Mining	Chapter 332-18-015 WAC
Underground Storage Tanks	Chapter 173-360 WAC
Waste Water Application to Land Surface	Chapter 173-216 WAC, Chapter 173-200 WAC, WDOE Land Application Guidelines, Best Management Practices for Irrigated Agriculture

17.10.570 Uses Prohibited From Critical Aquifer Recharge Areas. The following activities and uses are prohibited in CARAs:

- A. Disposal of hazardous or dangerous waste or special waste.
- B. Metals and hard rock mining.
- C. Storage, Processing, or Disposal of Radioactive Substances.
- D. Other Prohibited Uses or Activities
 - 1. Activities that would significantly reduce the recharge to aquifers currently or potentially used as a potable water source;
 - 2. Activities that would significantly reduce the recharge to aquifers that are a source of significant baseflow to a regulated stream (including shorelines of the state); and
 - 3. Activities that are not connected to an available sanitary sewer system are prohibited from critical aquifer recharge areas associated with sole source aquifers.

Article VI. Frequently Flooded Areas

17.10.610 Purpose and intent. The City’s intention is to minimize hazard to new development and also to prevent development and other alterations from increasing risk to other properties.

17.10.620 Frequently flooded areas – Designation and classification. Frequently flooded areas are those lands within the City of Entiat and its Urban Growth Area (UGA) that are identified by FEMA mapping.

17.10.630 Protection measures.

- A. In addition to the general Critical Area Review provisions in Article II, development in potential frequently flooded areas within the City and its UGA shall be subject to the following:
 - 1. Identification and preliminary evaluation. At a minimum, the Web Soil Survey shall be used to determine whether critical area review will be required for a proposed alteration, in completing a Critical areas checklist, and in the City’s review for the purpose of determining whether a Critical Areas Study will be required.
 - 2. Critical Area Study.
 - a. In addition to the general requirements for critical area studies, the required critical area study for any known or potential Frequently Flooded Area shall include the following:
 - 1. An assessment of the probable cumulative impacts of Frequently Flooded Areas both to the proposed development and to existing or future development off the site; and
 - 2. A description of reasonable efforts made to apply mitigation sequencing, as defined in these regulations, to avoid, minimize, and otherwise mitigate impacts to development.

- b. The Administrator may request any other information reasonably deemed necessary to understand impacts to development.
 - c. The information provided by a Critical Area Study will augment the data base for the Entiat area maintained by the City.
3. Mitigation. At a minimum, the Administrator shall require that development mitigate any risks to the proposed development or to existing or future development off the site that would be posed by Frequently Flooded Areas.

Article VII. Geologically Hazardous Areas

17.10.710 Purpose and intent.

The city finds that certain portions of the city are characterized by geologic hazards that may pose a risk to public and private property, human life and safety and the natural systems that make up the environment of the city if incompatible development is sited in areas of significant hazard. Such lands are affected by natural processes that make them susceptible to landslides, erosion, seismic activity, or rock fall. Incompatible development in areas characterized by geologic hazards may not only place itself at risk, but also may increase the hazard to surrounding development and use.

The intent of this article is to reduce the threat posed by geologic hazards. Some geologic hazards can be reduced or mitigated by engineering, design or modified construction so that risks to health and safety are acceptable. When technology cannot reduce risks to acceptable levels, building in geologically hazardous areas is best avoided.

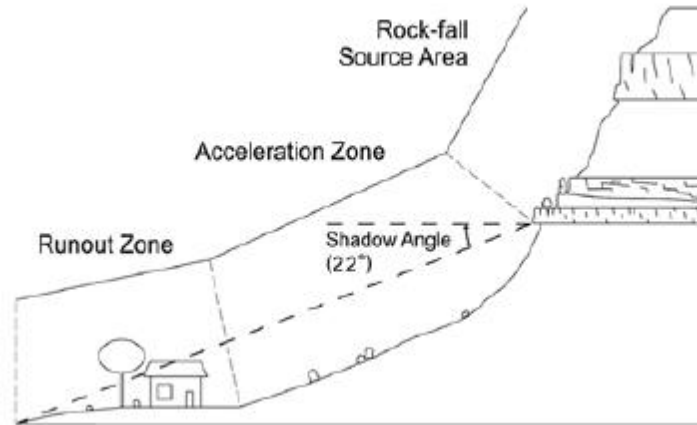
17.10.720 Designation. The City of Entiat designates geologically hazardous areas in the city and its UGA as follows:

- A. Erosion. The City designates all erosion hazard areas, regardless of any formal identification, as Geologically Hazardous Areas. At a minimum, the following shall be considered suspected erosion hazard areas for the purpose of determining the need for a preliminary evaluation:
 - 1. Areas identified by the U.S. Department of Agriculture’s Natural Resources Conservation Service as highly erodible or potential highly erodible land and areas identified by the Web Soil Survey as having soils with erosion hazard ratings of “moderate”, “severe”, or “very severe” due to slope/erodibility.
 - 2. Areas impacted by shore land and/or stream bank erosion and those areas within a channel migration zone.
 - 3. Areas in which maps, soil type, hydrology, or presence of historic failures, past modifications, or records indicate a high potential for erosion.
- B. Landslide. The City designates all landslide hazard areas, regardless of any formal identification, as Geologically Hazardous Areas. At a minimum, the following shall be considered suspected landslide hazard areas for the purpose of determining the need for a preliminary evaluation:
 - 1. Those areas delineated by the U.S. Department of Agriculture’s Natural Resources Conservation Service (NRCS) as having a significant limitation for building site

development, including but not limited to areas identified by the Web Soil Survey as having soils “very limited” or “somewhat limited” for building site development due to slope (including those described as “too steep”) or having a “severe” limitation for building site development.

2. Areas of historic failures, such as areas designated as quaternary slumps, earthflows, mudflows, lahars, or landslides on maps published as the United States Geological Survey or the Washington State Department of Natural Resources.
 3. Any area exhibiting all three of the following characteristics:
 - a. Slopes steeper than fifteen percent (15%),
 - b. Hillsides intersecting geologic contacts with a relatively permeable sediment overlying relatively impermeable sediment or bedrock, and
 - c. Springs or groundwater seepage.
 4. Areas that have shown movement during the Holocene epoch (from 10,000 years ago until today) or that are underlain or covered by mass wastage debris of that epoch.
 5. Slopes that are parallel or subparallel to lines of weakness (such as bedding planes, joint systems, and fault planes) in subsurface materials.
 6. Slopes having gradients steeper than eighty percent subject to rockfall during seismic shaking.
 7. Areas potentially unstable as a result of rapid stream incision, stream bank erosion, and undercutting by wave action, including stream channel migration zones.
 8. Areas that show evidence of, or are at risk from snow avalanches.
 9. Areas located in a canyon or on an active alluvial fan, presently or potentially subject to inundation by debris flows or catastrophic flooding.
 10. Any area with a slope of 40 percent or steeper and with a vertical relief of 10 or more feet except areas composed of consolidated rock. A slope is delineated by establishing its toe and top and measured by averaging the inclination over at least 10 feet of vertical relief.
- C. Seismic. The City designates all seismic hazard areas, regardless of any formal identification, as Geologically Hazardous Areas. At a minimum, the following shall be considered suspected seismic hazard areas for the purpose of determining the need for a preliminary evaluation:
1. Those areas in Seismic Design Category D₀ on the Seismic Design Category Map for Residential Construction in Washington, Sheet 2.
 2. Areas underlain by cohesionless soils of low density.
 3. Areas in which there is a record of earthquake damage in the past.
- D. Rock fall. A rock-fall hazard area consists of three components, illustrated below: (1) a rock-fall source area, in general defined by bedrock geologic units that exhibit relatively consistent patterns of rock-fall susceptibility throughout the study area; (2) an acceleration zone, where rock-fall debris detached from the source gains momentum as it travels down-slope; and (3) a

rock-fall runout zone, which includes gentler slopes where boulders have rolled or bounced beyond the base of the acceleration zone.



The City designates all rock-fall hazard areas, regardless of any formal identification, as Geologically Hazardous Areas. At a minimum, the following shall be considered suspected rock-fall hazard areas for the purpose of determining the need for a preliminary evaluation:

1. Areas within a 22-degree shadow angle extending from the base of a rock source; and
2. Areas in which the City has a record of rock falls or in which there is visual evidence of past rock falls.

17.10.730 Classification. The City of Entiat classifies Geologically Hazardous Areas within the City and its Urban Growth Area as follows:

- A. Known or suspected risk: Documentation or projection of the hazard by a qualified professional exists, or the area is designated as a suspected critical area.
- B. No known risk: Documentation or projection of the lack of hazard by a qualified professional exists
- C. Risk unknown: Data are not available to determine the presence or absence of a geologic hazard.
- D. Channel Migration Zone mapping has been completed for the Entiat River.

17.10.740 Critical Area review process for Geologically Hazardous Areas.

- A. Preliminary evaluation. In determining whether a preliminary evaluation is required for development in a given area, the Administrator shall consider the geologic hazard classification. Any approved geotechnical assessment, geotechnical report, hydrogeologic evaluation, channel migration zone study, or other special or detailed study may be used to identify areas of known or suspected risk, unknown risk, or no known risk. The City may choose to use available data to map the approximate location and extent of geologically hazardous areas.

B. Site assessment and report requirements. Geological assessments and geotechnical reports shall be prepared in compliance with the following provisions. A geotechnical report contains all of the provisions of a geological assessment and shall be considered to meet the requirements of a geological assessment.

1. A geological assessment shall include the following:

- a. Evaluate the actual presence of geologically hazardous areas within or in the vicinity of the site and the need for a geotechnical report. Specifically mention the circumstances or conditions which require the report to be prepared (steep slopes, erodible soils, suspected landslide or avalanche hazard, adverse hydrologic or flood risk, etc.).
- b. Evaluate safety issues related to proposed activities. Address issues that could involve personal injury, worksite safety, or property damage.
- c. Address existing geologic, topographic, and hydrologic conditions on the site, including an evaluation of the ability of the site to accommodate the proposed activity. Describe the proposed development, including property size and location, nature and extent of the planned development (i.e., house, garage, shop, swimming pool, etc.), and its specific location on the property. Include evidence of prior grading, excavation, cut banks, fill areas, or mining activity, and their potential impact on the project. Note and evaluate any features that could adversely affect development such as drainage gullies, erosion channeling, alluvial fans, evidence for debris flow or avalanche, surface creep and slope failure, observed or suspected spring activity and flood risk potential.
- d. A discussion of the surface and subsurface geological and engineering properties of the soils, sediments, and/or rocks on the subject property and adjacent properties and their effect on the stability of the slope. Where known from field inspection or reference maps and literature, include bedrock identification and age, structural attitude with respect to slope inclination, fracturing, faults and shear zones, hydrothermal alteration, weathering characteristics, presence of landslide diamictite and its age and consolidation, etc. Use cross-sections if necessary for better representation of subsurface character.
- e. A description of the soils in accordance with the Unified Soil Classification System. Give general soil characteristics that could affect site development (i.e., frost action and shrink/swell potential, permeability, plasticity and wet/dry behavior, erodibility, etc.). Especially note the presence or suspected presence of clay-rich horizons and their position/location in the soil profile, and any indication that a building site could be subjected to differential soil compression or setting.
- f. Evidence and history of avalanches, faults, significant geologic contacts, landslides, or downslope soil movement on the subject property and adjacent properties not detailed in subsection (1)(C) of this section.
- g. A summary of the site assessment and its conclusions, mentioning the presence or absence of geohazards and site suitability. Include any recommendations for mitigation of potential hazards that can be dealt with without requiring a complete geotechnical report (control measures such as footing or intercept drainage

systems, retaining walls, erosion control, vegetative management and restoration, and the probable need for engineering consultation and design).

- h. A topographic map showing the proposed development site location and approximate parcel shape location, boundaries, and all buildable space on the property.
 - i. Cite all references and information used in the assessment preparation, such as United States Geologic Survey (USGS) and Department of Natural Resources Geologic Maps and Bulletins, soil studies, surveys and previous reports.
2. A geotechnical report shall include all of the information required for a geologic site assessment as well as the following:
- a. A contour map of the proposed site, at a scale of one inch equals twenty feet or as deemed appropriate by the administrator. Slopes shall be clearly delineated for the ranges between fifteen and twenty-nine percent, and thirty percent or greater, including figures for a real coverage of each slope category on the site. When site-specific conditions indicate the necessity, the administrator may require the topographic data to be field surveyed.
 - b. The location of springs, seeps, or other surface expressions of groundwater. The location of surface water or evidence of seasonal surface water runoff or groundwater.
 - c. The extent and type of vegetative cover prior to development activity or site disturbance.
 - d. A description of site history, including any prior grading, soil instability, or slope failure. Identify all existing fill areas.
 - e. A determination regarding the appropriate hazard category or categories according to the classification of the geologically hazardous area consistent with Section 17.10.730.
 - i. An explanation of soil characteristics and geologic, topographic, and hydrologic conditions of the site that might be expected to create a significant risk due to any geologic hazard and show the location of such hazardous areas. Specifically, include:
 - a. Slope stability studies and opinion of slope stability;
 - b. Erosion vulnerability of site;
 - c. Suitability of on-site soil for fill;
 - d. A summary of all subsurface exploration data, including subsurface soil profile, exploration logs, laboratory or *in situ* test results, and ground water information and an interpretation and analysis of the subsurface data; and
 - e. Building limitations.
 - f. A site development plan, drawn to scale, which shows the boundary lines and dimensions of the subject property, the location, size and type of any existing or

proposed structures, impervious surfaces, wells, drainfields, drainfield reserve areas, roads, easements, and utilities proposed or located on site.

- g. A hazard analysis evaluating the proposed alteration's influence on the safety and stability of structures and any other risks of property damage, death, or injury resulting from development of the hazard area. Factors such as landscape irrigation, storm water generation and the effect of street conveyance and utility placement should be included in the review of potential landslide and erosion hazard areas.
- h. A description of appropriate mitigation measures, including specific design, development, and construction measures that will be taken to eliminate or minimize identified risks and to comply with the performance standards in Section 17.10.750 (Performance Standards) of this chapter. Specify any recommended setbacks and/or buffers. Include specific engineering recommendations for design and any geotechnical special provisions. Specifically, include:
 - ii. Proposed angles of cut and fill slopes and site grading requirements;
 - iii. Structural foundation requirements and estimated foundation settlements;
 - iv. Soil compaction criteria;
 - v. Proposed surface and subsurface drainage; and
 - vi. Lateral earth pressures.
- i. A vegetation management and restoration plan or other means for maintaining long-term stability of slopes.
- j. The proposed method of drainage and locations of all existing and proposed surface and subsurface drainage facilities and patterns, and the locations and methods for erosion control.
- k. An erosion control plan that minimizes erosion (including both water and wind erosion) from all disturbed areas during construction and until permanent erosion control is achieved. Until the City adopts stormwater management regulations, the *Stormwater Management Manual for Eastern Washington* shall be the preferred guidance for erosion control measures.
- l. A monitoring program, to be marked on the face of the building permit.
- m. Information demonstrating compliance with all applicable codes and ordinances for the proposed development permit.

C. Critical Area Study.

1. A required Critical Area Study for Geologically Hazardous Areas shall include a geotechnical report adequate to assess any risks of property damage, death, or injury resulting from development of the hazard area and establish mitigation measures.
2. If an applicant can demonstrate, through submittal of a geotechnical assessment, that no landslide or erosion hazards exist on site, the requirement for a geotechnical report may be waived by the Administrator.

3. **Erosion and landslide hazard areas.** In addition to the basic report requirements, a critical area study for an erosion or landslide hazard area shall also meet the following requirements:
 - a. A site plan showing:
 - i. The height of slope, slope gradient, and cross-section of the project area;
 - ii. The location of springs, seeps, or other surface expressions of ground water on or within two hundred (200) feet of the project area or that have potential to be affected by the proposal; and
 - iii. The location and description of surface water runoff features;
 - b. A hazards analysis that includes:
 - i. A description of the extent and type of vegetative cover;
 - ii. A description of subsurface conditions based on data from site-specific explorations;
 - iii. Descriptions of surface and ground water conditions, public and private sewage disposal systems, fills and excavations, and all structural improvements;
 - iv. An estimate of slope stability and the effect construction and placement of structures will have on the slope over the estimated life of the structure;
 - v. An estimate of the bluff retreat rate that recognizes and reflects potential catastrophic events such as seismic activity or a one hundred-year storm event;
 - vi. Consideration of the run-out hazard of landslide debris and/or the impacts of landslide run-out on down slope properties.
 - vii. A study of slope stability including an analysis of proposed cuts, fills, and other site grading;
 - viii. Recommendations for building siting limitations; and
 - ix. An analysis of proposed surface and subsurface drainage, and the vulnerability of the site to erosion
 - c. A geotechnical report prepared by a licensed engineer that presents engineering recommendations for the following:
 - i. Parameters for design of site improvements including appropriate foundations and retaining structures. These should include allowable load and resistance capacities for bearing and lateral loads, installation considerations, and estimates of settlement performance;
 - ii. Recommendations for drainage and subdrainage improvements;
 - iii. Earthwork recommendations including clearing and site preparation criteria, fill placement and compaction criteria, temporary and permanent slope

inclinations and protection, and temporary excavation support, if necessary;
and

- iv. Mitigation of adverse site conditions including slope stabilization measures and seismically unstable soils, if appropriate
 - d. For any development proposal on a site containing an erosion hazard area, an erosion and sediment control plan prepared in accordance with the City's stormwater management regulations, when adopted.
 - e. A drainage plan providing for the collection, transport, treatment, discharge, and/or recycle of water, prepared in accordance with the City's stormwater management regulations, when adopted. The drainage plan should consider on-site septic system disposal volumes where the additional volume will affect the erosion or landslide hazard area.
 - f. Hazard and environmental mitigation plans that include the location and methods of drainage, surface water management, locations and methods of erosion control, a vegetation management and/or replanting plan, and/or other means for maintaining long-term soil stability; and
 - g. If the Administrator determines that there is a significant risk of damage to downstream receiving waters due to potential erosion from the site, based on the size of the project, the proximity to the receiving waters, or the sensitivity of the receiving waters, the technical information shall include a plan to monitor the surface water discharge from the site. The monitoring plan shall include a recommended schedule for submitting monitoring reports to the City.
4. **Seismic hazard areas.** In addition to the general critical area study requirements specified in Article VII, a critical area study for a seismic hazard area shall also meet the following requirements:
- a. The site map shall show all known and mapped faults that are within two hundred (200) feet of the project area or that have potential to significantly affect or to be affected by the proposal.
 - b. The hazards analysis shall include a complete discussion of the potential impacts of seismic activity on the site (for example, forces generated and fault displacement).
 - c. A geotechnical engineering report shall evaluate the physical properties of the subsurface soils, especially the thickness of unconsolidated deposits and their liquefaction potential. If it is determined that the site is subject to liquefaction, mitigation measures appropriate to the scale of the development shall be recommended and implemented.
5. **Rock-fall hazard areas.** In addition to the basic report requirements, a critical area study for a rock fall hazard area shall also meet the following requirements:
- a. Any required critical area study for a rock-fall hazard area shall be prepared by a geotechnical consultant familiar with rock fall hazards.

- b. The study shall include a geologic vicinity map, at an appropriate scale (typically 1:24,000) and with references, showing the general surface geology (landslides, alluvial fans, etc), bedrock geology where exposed, bedding attitudes, faults, other geologic structural features, and location of any rock-fall hazards;
 - c. The hazards analysis shall include an evaluation of available remote sensing data, which may include aerial photographs, oblique aerial photographs, and DEMs derived from detailed topography and/or LIDAR, for the potential presence of geologic hazards;
 - d. The study shall include final design plans and specifications for engineered mitigation signed and stamped by a qualified geotechnical engineer. If the geologic report is submitted with a land use application that is reviewed prior to the construction or building plans (e.g. preliminary plat or conditional use permit), the engineering level design and calculations of the improvement do not need to be submitted until after a land use approval is obtained and construction approval is requested. However, the proposed methods must still be identified;
 - e. The study shall include a statement regarding the suitability of the site for the proposed development from a rock fall-hazard perspective.
6. Where a geotechnical report has been prepared and approved by the City within the last five years for a specific site, and where the proposed activity and surrounding site conditions are unchanged (or, in the case an individual lot within a subdivision, where the only changes in surrounding site conditions are development and mitigation as specified in the report), said report may be used and a new report may not be required. The applicant shall submit a geotechnical assessment detailing any changed environmental conditions associated with the site.

17.10.750 Performance standards.

- A. Any development or other alteration that would pose a foreseeable risk to the public, public or private resources and facilities, or the natural environment is prohibited.
- B. The following standards apply to all development within geologically hazardous areas:
 - 1. Development shall not increase instability or create a hazard to the site or adjacent properties, or result in a significant increase in sedimentation or erosion. Construction methods shall minimize risks to structures and shall not increase the risk to the site, or to adjacent properties and their structures, from the geologic hazard.
 - 2. Site planning shall minimize disruption of existing topography and natural vegetation, and where feasible shall incorporate opportunities for phased clearing.
 - 3. Disturbed areas shall be replanted within one year of project completion, in accordance with an approved revegetation plan.
 - 4. Impervious surface coverage shall be minimized.
 - 5. Excavation and grading shall be limited to the minimum necessary to accomplish engineering design. The clearing and grading schedule shall consider limitations based upon seasonal weather conditions.

6. Any limitations to site disturbance, such as clearing restrictions, imposed as a condition of development approval should be marked in the field and approved by the City prior to undertaking the project.
7. All authorized clearing for roads, utilities, etc., should be limited to the minimum necessary to accomplish engineering design. Alterations should meet the following requirements:
 - a. Clearing, grading or filling of sloped sites containing erosion or landslide hazard areas should be limited by weather conditions and an approved erosion control plan;
 - b. All clearing shall be marked in the field for inspection and approval prior to alteration of the site;
 - c. The face of cut and fill on slopes shall be prepared and maintained to control against erosion.

C. The following additional standards apply to Erosion Hazard Areas:

1. In order to prevent or mitigate potential hazards to life, property or the natural environment, development in or adjacent to Erosion Hazard Areas shall be discouraged. No public or private development will be permitted in Erosion Hazard Areas where mitigation approved by the City and adequate to protect members of the public and public and private resources and facilities from injury, loss of life, property damage or financial losses due to erosion, landslide, seismic events or steep slope failure is not feasible.
2. Alterations
 - a. Alterations of an erosion hazard area may occur only for activities for which a hazards analysis is submitted and certifies that:
 - i. The development will not increase surface water discharge or sedimentation to adjacent properties beyond pre-development conditions;
 - ii. The development will not decrease slope stability on adjacent properties; and
 - iii. The alterations will not adversely impact other critical areas.
 - b. Excavation and grading shall be minimized in all erosion and steep slope areas and shall comply in full with the relevant provisions of building codes adopted by the City.
3. Development within an erosion or landslide hazard area or buffer shall be designed to meet the following basic requirements unless it can be demonstrated that an alternative design provides greater long-term slope stability while meeting all other provisions of this Chapter. The requirement for long-term slope stability shall exclude designs that require regular maintenance to maintain their level of function. The basic requirements are:
 - a. The proposed development shall not decrease the factor of safety for landslide occurrences below the limits of 1.5 for static conditions and 1.2 for dynamic conditions. Analysis of dynamic conditions shall be based on a minimum

horizontal acceleration as established by the current version of the Uniform Building Code;

- b. Structures and improvements shall be clustered to avoid geologically hazardous areas and other critical areas;
 - c. Structures and improvements shall minimize alterations to the natural contour of the slope, and foundations shall be tiered where possible to conform to existing topography;
 - d. Structures and improvements shall be located to preserve the most critical portion of the site and its natural landforms and vegetation;
 - e. The proposed development shall not result in greater risk or a need for increased buffers on neighboring properties;
 - f. Retaining walls that allow the maintenance of existing natural slope area are preferred to graded artificial slopes; and
 - g. Development shall be designed to minimize impervious lot coverage
4. Unless otherwise provided or as part of an approved alteration, removal of vegetation from an erosion or landslide hazard area or related buffer shall be prohibited
 5. Clearing shall be allowed only during the dry season, which shall depend on actual weather conditions but is generally considered to run from May through September.
 6. Utility lines and pipes shall be permitted in erosion and landslide hazard areas only when the applicant demonstrates that no practical alternative is available. The line or pipe shall be located above ground and properly anchored and/or designed so that it will continue to function in the event of an underlying slide. Stormwater conveyance shall be allowed only through a high-density polyethylene pipe with fuse-welded joints, or similar product that is technically equal or superior.
 7. Point discharges from surface water facilities and roof drains onto or upstream from an erosion or landslide hazard area shall be prohibited except as follows:
 - a. Discharge is conveyed via continuous storm pipe down slope to a point where there are no erosion hazards areas downstream from the discharge;
 - b. Water is discharged at flow durations matching pre-development conditions, with adequate energy dissipation, into existing channels that previously conveyed stormwater runoff in the pre-developed state; or
 - c. Discharge is dispersed up-slope of the steep slope onto a low-gradient undisturbed buffer demonstrated to be adequate to infiltrate all surface and stormwater runoff, and where it can be demonstrated that such discharge will not increase the saturation of the slope.
 8. On-site sewage disposal systems, including drain fields, shall be prohibited within erosion hazard areas and related buffers.
 9. Development may occur in steep slope areas only after the following standards have been met:

- a. Development must be located to minimize disturbance and removal of vegetation and also to protect the most sensitive areas (including areas of erosive soils, areas at risk of erosion by wind or water, and areas of dense vegetation) and retain open space. The use of continuous greenbelt areas shall be encouraged; and
 - b. Structures must be clustered where possible to reduce disturbance and maintain natural topographic character. Common access driveways shall be considered as a means of reducing construction disturbances; and
 - c. Where possible, structures must conform to the natural contour of the slope and foundations must be tiered to conform to existing topography of the site.
10. Unless a grading plan prepared by a licensed civil engineer is provided and approved by the Administrator, disturbance of a development site shall generally not exceed the following for the slope categories indicated:

Table 17.10.750.1 Maximum Amount of Slope That May Be Disturbed

Slope Category	Factor
Slopes 30-40% (60% of the site or more)	.60
Slopes 40% + (also see landslide hazard area)	.30

The overall amount of disturbance allowed on development sites which have any combination of the above slope categories shall be determined by the following formula:

[Square footage of the area within the slope category x slope factor] = Total amount of allowable disturbance for that slope classification.

The total amount of allowable disturbance for the site is the sum of all the allowable disturbance totals for each slope category.

D. The following additional standards apply to Landslide Hazard Areas.

- 1. Areas identified as landslide hazard areas or within two hundred and fifty feet (250') of landslide hazard areas shall be altered only when the Administrator concludes, based on environmental information provided by a qualified professional, that:
 - a. There will be no increase in surface water discharge or sedimentation to adjacent properties; and
 - b. There will be no decrease in slope stability on adjacent properties; and
 - c. Either:
 - i. There is no evidence of recent landslides in the vicinity of the proposed development, and a quantitative analysis of slope stability indicates no significant risk to the proposed development, adjacent properties, or the health or safety of humans or the environment; or

- ii. The hazard can be mitigated modified or the project can be designed so that the risk (including risks to the project and risks beyond the project site) is no greater than the risk posed by development on a site without a landslide hazard; or
 - iii. The proposal is so minor as not to pose a threat.
 - 2. The following standards apply to all development in landslide hazard areas:
 - a. Disturbance of trees and vegetation shall be minimized in and within two hundred and fifty feet (250') of landslide hazard areas in order to prevent erosion, stabilize slopes, and preserve the natural character of the area;
 - b. Structures and improvements shall be located to preserve the most sensitive portion of the site and its natural landforms and vegetation.
 - 3. A buffer shall be established from all edges of landslide hazard areas. The size of the buffer shall be determined by the Administrator to eliminate or minimize the risk of property damage, death, or injury resulting from landslides caused in whole or part by the development, based upon review of and concurrence with a critical area study prepared by a qualified professional.
 - 4. Alterations
 - a. Alterations of a landslide hazard area or its buffer may occur only for activities for which a hazards analysis is submitted and certifies that:
 - i. The development will not increase surface water discharge or sedimentation to adjacent properties beyond pre-development conditions;
 - ii. The development will not decrease slope stability on adjacent properties; and
 - iii. The alterations will not adversely impact other critical areas.
 - 5. Subdivision
 - a. Land that is located wholly within a landslide hazard area or its buffer may not be subdivided.
 - b. Land that is located partially within a landslide hazard area or its buffer may be divided provided that each resulting lot has sufficient buildable area outside of, and will not affect, the landslide hazard or its buffer.
 - c. Access roads and utilities may be permitted within a landslide hazard area and associated buffers if the City determines that no other feasible alternative exists
 - 6. On-site sewage disposal systems, including drain fields, shall be prohibited within landslide hazard areas and related buffers.
- E. Seismic Hazard Areas. All development activities in Seismic Hazard Areas shall conform to the applicable building code.
- F. Rock fall hazard areas. Development of structures intended for human occupancy or critical facilities in a rock-fall hazard area shall be discouraged unless the hazard is mitigated to an acceptable and reasonable risk level, based on information provided by a qualified professional who is a geotechnical consultant familiar with rock fall hazards. Development

of any such structure in a rock-fall hazard area in which the hazard is not mitigated to an acceptable and reasonable risk level shall require a recorded waiver of liability.

APPENDIX B. ENTIAT SIGN CODE

Sections:

- 18.50.010 Short title.
- 18.50.020 Statement of purpose.
- 18.50.030 Interpretation.
- 18.50.040 Definitions.
- 18.50.050 Sign classification.
- 18.50.060 Construction and design standards.
- 18.50.070 Murals – Standards.
- 18,50.080 Nonconforming signs – Provisions for amortization.
- 18,50.090 Administration.
- 18.50.100 Variances.
- 18.50.110 Appeals.
- 18.50.120 Enforcement and sign removal.

18,50.010 Short title.

This chapter shall be known as the “sign code” of the city of Entiat.

18.50.020 Statement of purpose.

The purpose of this chapter is to promote the use of signs which are both functional and attractive in appearance, through a sign regulation and permit system governing all exterior signs. This system is also intended to permit such signs that will, by their size, location, design, construction, or manner of display, not endanger the public safety of individuals, obstruct vision necessary for traffic safety, or otherwise endanger the public health, safety, or general welfare.

18.50.030 Interpretation.

If any sections of the sign code conflict, the most restrictive shall govern. If there is a conflict between a general requirement and a specific requirement, the specific requirement shall govern.

18.50.040 Definitions.

For purposes of this chapter, the following terms, phrases, words and their derivatives shall be construed as specified in this section:

“Sign”, in the singular or plural, means a structure or fixture using letters, symbols, trademarks, logos or written copy that is intended to aid the establishment; promote the sale of products, goods, services, or events; or provide direction or information.

The term “sign” includes, without limitation, the following types of signs:

(1) “Accessory commercial sign” includes, but is not limited to, open/closed signs, bank card signs, credit card signs, travel club signs, welcome signs and vacancy/no vacancy signs; provided, that such signs are erected in accordance with the location requirements of this chapter.

(2) “Animated sign” means any sign which includes the optical illusion of action or motion or color changes of all or any part of the sign facing to show or give the appearance of video or television-type pictures that require electrical energy.

(3) “Awning sign” is a sign applied to or incorporated into the covering of an awning. An awning sign shall be considered a wall sign for the purposes of this chapter.

(4) “Banner sign” is a sign constructed of cloth, fabric or other nonrigid material hanging from a staff, pole or frame or wall mounted. A banner sign shall be considered a temporary sign.

(5) “Bench sign” is a sign located on any part of the surface of a bench or seat placed on or adjacent to a public right-of-way.

(6) “Canopy sign” is a sign installed on the wall or side of a canopy that conceals the structural portion of the canopy roof.

(7) “Commemorative plaque” is a memorial plaque or plate, with engraved or cast lettering, which is permanently affixed to or near the structure or object it is intended to commemorate.

(8) “Construction sign” is a sign on the site of a construction project that identifies the project, its character or purpose and/or the architects, engineers, planners, contractors, or other individuals or firms involved.

(9) “Directory sign” is a sign on which the names and locations of occupants or the use or uses of a building are given.

(10) “Electronically changeable message sign” is a sign upon which graphics, symbols or words can be varied upon the face or faces of the sign.

(11) “Flashing sign” is a sign or other advertising structure having lights or illuminations that flash, move, rotate, scintillate, blink, flicker, vary in intensity or color, or use intermittent electrical pulsations, except for time and temperature or open/closed signs.

(12) “Freestanding sign” is a sign permanently supported from the ground in a fixed location by a structure of poles, uprights, braces or monumental base and not supported by nor attached to a building. The base of such sign shall be located on the business property.

(13) “Historically significant sign” is a sign which was installed or constructed prior to January 1, 1959, and which has been approved by the city council. Approved historical signs shall be restored and maintained in good condition.

(14) “Illuminated sign” is a sign internally illuminated in any manner by an artificial light source within which the light source is not exposed.

(15) “Indirectly illuminated sign” is a sign which by design is illuminated by reflection of a light source from the sign face. Such signs shall not project light from the light source across property lines, or directly towards traffic.

(16) “Integral sign” is a memorial sign or tablet or name of or date of erection of a building when cut into any masonry surface or when constructed of bronze or other incombustible material mounted on the face of a building.

(17) “Logo sign” is a sign bearing characters, letters, symbols, or characteristic design which, through trademark status or consistent usage, has become the customary identification for a business.

(18) “Marquee sign” is a sign attached to fascia or on the roof of a marquee. For the purposes of this code, a sign located on the roof of a marquee shall be considered a projecting or freestanding sign and a sign located on the fascia or a marquee shall be considered a wall sign.

(19) “Monument sign” means a ground-mounted sign with a message on a maximum of two sides and which is attached to the ground by means of a wide base of solid appearance.

(20) “Moving sign” is a sign or other advertising structure having visible moving, revolving or rotating parts or visible mechanical movement of any kind or other apparent visible movement achieved by electrical, electronics or mechanical means, except for street clocks and time and temperature signs.

(21) “Mural” is a painting applied directly to a wall or building.

(22) “Nonconforming sign” is a sign located within the city limits of Entiat that was in existence prior to the effective date of the ordinance codifying this chapter which does not conform with the provisions of this chapter. Abandoned signs shall not be considered a nonconforming sign.

(23) “Off-premises sign” is a sign which directs attention to a business, profession, product, activity or service which is not conducted, sold or offered on the premises where the sign is located as listed on the business license.

(24) “On-premises directional sign” is a sign directing pedestrian or vehicular traffic to parking, entrances, exits, service areas, or other on-site locations.

(25) “Pennants” or “streamers” are long tapering flags or strips of material used to attract attention to a business, place, or area.

(26) “Political sign” is a sign identifying or expressing a political candidate or viewpoint on public issues decided by ballot.

(27) “Portable sign” is a sign, excluding sandwich-board signs, that is capable of being moved easily and not permanently affixed to the ground, a structure, or a building.

(28) “Projecting sign” is a sign other than a wall sign that extends horizontally from and is supported by a wall of a building or structure.

(29) “Readerboard” is a sign face consisting of tracks to hold readily changeable letters allowing frequent changes of copy. A readerboard shall be considered a wall sign.

(30) “Real estate sign” is a sign that advertises the real estate on which it is located for rent, lease, or sale. For sale or lease shall be larger (more conspicuous) than agent or owner name. [Ref: WAC 468-66-050(2)]

(31) “Roof sign” is a sign painted, erected or constructed wholly upon or over the roof of any building and supported on the roof structure; however a sign located on a roof or a marquee shall be regarded as a projecting or freestanding sign.

(32) “Sandwich-board sign” is a sign no more than forty-two inches in height and thirty inches in width and weighted to prevent it from tipping over.

(33) “Suspended sign” is a sign which hangs below the permanent overhang, marquee or canopy extending over public or private sidewalks or rights-of-way.

(34) “Temporary sign” is a sign, banner, pennant, valance, or advertising display constructed of cloth, paper, canvas, cardboard, or other light nondurable materials intended to be displayed for no more than thirty days per calendar year. Types of signs included in this category include but are not limited to: grand opening, special sales, special events, and garage sale signs.

(35) “Time and temperature” is that portion of a sign intended to display only the time of day and current temperature.

(36) “Wall graphic” is a wall design in which color and form are part of an overall design on the building.

(37) “Wall sign” is a sign painted, attached to or erected against and parallel to the wall plane of a building or structure. A wall sign shall be confined within the limits of said wall and shall not extend more than twelve inches from the face of the wall. Awning signs shall be considered wall signs for the purposes of this code.

(38) “Window sign” is a sign located on the interior of a window within one foot of the glass or located on the exterior of a window.

“Abandoned sign” is a sign which represents or displays any reference to a business or use which has been discontinued for more than six months or for which no valid business license is in effect in the city.

“Alteration of sign” is any construction material, size, name or location change except for normal maintenance to an existing sign.

“Area” or “sign area” is the total area of a sign excluding the sign support structure. The area is calculated by measuring from the outside edge of the frame. (For calculating the area of a double-faced sign, only one side of the sign is to be used.) Architectural embellishments and decorative features which contain no written or advertising copy, which are not illuminated and which contain no logos or trademarks shall not be included in the sign area. Signs painted on or attached to a wall or awning are calculated by imaginary straight lines around the entire copy or grouping of letters, words, or symbols, using a maximum of eight lines.

“Awning” is an overhead shelter, supported entirely from the exterior walls of a building composed of a rigid supporting framework and a flexible or nonrigid covering.

“Building face” is the exposed building front or exposed exterior wall of a building from the grade of the building to the eave line or parapet and the entire width of the building elevation.

“Building side” is a surface of a building that extends more or less perpendicularly from an observer standing in front or side of a building.

“Canopy” is a freestanding permanent rooflike structure with support columns composed of rigid materials providing protection from the elements, such as a service station gas pump island. A portion of a canopy may be supported by an adjacent structure.

“Commercial” is any activity carried on for financial gain.

“Drive-in restaurant” or “refreshment stand” is any place or premises used for sale, dispensing, or serving of food, refreshments, or beverages to customers in automobiles, including those establishments where customers may serve themselves and may eat or drink the food, refreshments, or beverages on the premises.

“Eave line” is the juncture of the roof and the perimeter wall of the structure.

“Erect” is to build, construct, alter, display, relocate, attach, hang, place, suspend, affix any sign, and shall also include the painting of murals and wall signs.

“Highway frontage” is property which abuts Highway 97A as designated by Washington State Department of Transportation.

“Historical site or structure” is any structure, collection of structures and their associated sites, deemed of importance to the history, architecture or culture of an area by an appropriate local, state or federal governmental jurisdiction. Included shall be structures on official national, state or local historic registers or official listings such as the National Register of Historic Places, the State Register of Historic Places, state points of historical interest, and registers or listings of historical or architecturally significant sites, places, historic districts, or landmarks as adopted by a certified local government.

“Marquee” is a permanent rooflike structure composed of rigid materials providing protection from the elements, attached to and supported by the building and projecting over public or private property. This does not include a projecting roof.

“Material” is any wood, metal, plastic, glass, cloth, fabric, or any other substance used to construct a sign.

“Multiple building complex” is a group of structures housing two or more retail offices, or commercial uses sharing the same lot, access and/or parking facilities or coordinated site plan.

“Multiple tenant building” is a single structure housing two or more retail, office or commercial uses.

“Normal maintenance” is an act of repair or other acts to prevent decline, lapse or cessation from original state or condition.

“Public entity” is a state, county, district, public authority, or public agency.

“Repair” is to renew, refresh or to restore to sound condition.

“Sign height” is the vertical distance measured from the grade below the sign to the highest point of the sign.

“Wall plane” is that portion of a building face which is contained on one general plane. If there is a shift in the facade forward or back, a new plane is created. A single wall plane may contain windows and doors.

18.50.050 Sign classification.

(1) Exempt Signs. The following types of signs and devices shall be exempt from the permit requirements of this chapter; provided, that all applicable standards or conditions specified are met:

(a) Accessory commercial signs;

(b) Banner signs, decorative flags, pennants, or streamers; provided they are only displayed for one thirty-day period within a calendar year and must have the date of initial posting clearly written on the face of the banner, streamer or pennant;

(c) Barber poles;

(d) Billboard signs facing inward toward home plate, located on the outfield fences of Entiat parks and sports fields;

(e) Community activity signs or banner signs; provided they are installed no sooner than thirty days prior to the event or activity and removed within seven days of the completion of the activity or event if visible to US 97A, remove within 3 days [Ref: WAC 468-95-148];

(f) Construction signs; provided, that there shall be only one such sign per street frontage of a building; and provided, that the area of each sign shall not exceed sixteen square feet in a residential district and thirty-two square feet in other zoning districts and that all such signs shall be removed within thirty days of completion of the building. If construction is not completed within 1 year, the sign must be removed. Sign may display only the name of activity or business and completion date [Ref: WAC 468-66-050(3)(c)];

(g) Flags and/or insignia of any U.S. government agency;

(h) Historically significant signs;

(i) Historical site or structure signs; provided they are approved by the city council. Such signs shall be a maximum of twelve square feet and nonilluminated unless allowed elsewhere in this code. Only the name of the site or structure, hours of visitation and admission charges if any shall be indicated on the sign;

(j) Integral decorative or architectural features of buildings including but not limited to building names, except when such features include commercial wording, moving parts, or moving lights;

(k) Menu signs for drive-in restaurants;

(l) Menu signs for other than drive-in restaurants; provided, that the menu displayed is the same as that given to customers and such sign shall have a maximum size of four square feet;

(m) Movie theater display cases; provided there are not more than two cases not to exceed twenty four square feet each;

(n) Murals, except any portion of a mural that meets the definition of a "sign" in Section 18.50.040; and provided it is approved by the city council or its designee subject to those standards set forth in Section 18.50.070;

(o) Noncommercial signs bearing only property numbers, postal box numbers or names of occupants of premises;

(p) Political signs; provided all such signs shall be removed no later than one week after the election to which the signs pertain;

(q) Real estate signs for individual properties; provided there shall be only one such sign per lot. On residential lots situated on corners, 2 signs shall be allowed, with one on each street frontage. Such signs shall not be placed where a vehicle driver's visibility including but not limited to intersections, alleys, or driveways might be obstructed. The maximum area of the sign in residential zones shall not exceed four square feet and the height shall not exceed forty-two inches. In nonresidential zoning districts, the area of the sign shall not exceed thirty-two square feet and the height shall not exceed eight feet. The sign must be removed within fourteen days from the date of closing; Real estate signs for condominium projects and subdivisions are not exempt;

(r) Temporary open house signs for real estate during manned office hours only, provided they are removed each day;

(s) Signs of a public entity, including, without limitation, community service informational signs, kiosk signs, public utility information signs, traffic control signs and all signs erected by a public officer in the performance of a public duty; provided, however, that such signs shall meet the location, size and structural requirements of this chapter;

(t) Signs directing and guiding traffic and parking on private property, but bearing no advertising matter; provided, that such signs shall not exceed six square feet in area per sign;

(u) Temporary signs; provided, that such signs must be securely affixed to the surface of a building wall or window, or between existing structures, poles and/or other supports, must have the date of initial posting clearly written on the face of the sign and must be removed not later than thirty days after initial posting;

(v) Time and temperature signs; provided, that the sign conforms to the height restrictions for a freestanding sign for the zoning district in which it is located;

(w) Wall graphic, except that portion which contains letters, symbols, trademarks, logos, written copy, moving parts or moving lights;

(x) Window signs.

(2) Prohibited Signs. It is unlawful to erect or maintain:

(a) Portable signs;

(b) Signs in a dilapidated or hazardous condition;

(c) Signs on doors, windows or fire escapes that restrict free ingress or egress;

(d) Flashing signs;

(e) Moving signs;

(f) Signs which purport to be, or are an imitation of, or resemble an official traffic sign or signal or which could cause confusion with any official sign, or which obstruct the visibility of any traffic/street sign, signal, or obstruct a vehicle driver's visibility at, including, but not limited to, intersections, alleys, and driveways;

(g) Signs attached to utility, street light and traffic control standard poles;

(h) Signs on any vehicle or trailer parked as a stationary display for advertising purposes on public or private property which are visible from public rights-of-way. This provision shall not prohibit signs which are painted on or magnetically attached to any vehicle operating in the normal course of business.

(3) Permitted Signs. Except as otherwise provided in this title, all signs shall be permitted; provided they meet all conditions and requirements established in this chapter.

18.50.060 Permit requirements.

(1) Except for exempt signs as identified above, no sign shall be erected, structurally altered or relocated by any person, firm, or corporation without a permit from the city of Entiat.

(2) A sign permit shall be considered as a Type I permit as set forth in EMC Title 14. (Ord. 673 § 1 (Exh. B), 2007; Ord. 607 § 1, 2003)

(3) Any signage proposed along the state highway and visible from the state highway must be coordinated with the WSDOT North Central Region Traffic Office.

18.50.070 Performance standards.

The following standards are general provisions and are applicable to all districts established under this title:

(1) Single or multiple occupancy buildings which have street frontage on two streets with customer entrances on each street are permitted one freestanding sign per street frontage; provided, that each freestanding sign is located on different street frontages and are separated by more than 100 feet. Signs on streets abutting residential districts shall be approved by administrator.

(2) Signs attached to a building shall not exceed three feet above the roof line of any building or structure to which it is attached.

(3) A clear view triangle shall be maintained at all intersecting public or private streets, driveways, and/or curb cuts for vision safety purposes. Refer to EMC 18.44.060.

(4) All freestanding signs shall include as part of their design landscaped areas at least four feet in diameter or other approved devices around their base so as to prevent vehicles from hitting the sign, and to improve the overall appearance of the installation.

(5) Projecting and awning signs shall maintain a minimum clearance of eight feet above the finished grade. (Ord. 673 § 1 (Exh. B), 2007; Ord. 607 § 1, 2003)

(6) Bench signs shall be limited to dimensions not greater than the dimensions of the bench back. They shall be permanently painted on the bench or securely affixed and encased in weather-resistant material.

(7) Real estate sale signs for condominium projects and subdivisions; provided the maximum area of the sign shall not exceed thirty-two square feet, the height shall not exceed eight feet, and has the initial date of posting on the sign. Such signs shall be removed within five years of initial posting or sale of seventy-five percent of the total number of lots or condominium units, whichever occurs first. If there is no initial date of posting on such sign, said sign shall be a prohibited sign.

(8) Any sign visible to US 97A shall comply with the Highway Advertising Control Manual. A permit from WSDOT will be required for all off premise signing that is visible to US 97A.

18.50.080 General standards.

(1) No signs other than state highway or city signs shall be allowed on city right-of-way or on highway right-of-way within the city limits.

(2) Setback. Freestanding signs may be permitted anywhere on the premises, except in a required side yard, or within 10 feet of a street right-of-way. Commercial signs are permitted adjacent to the right-of-way in commercial, light industrial, or waterfront business zones.

(3) Illumination. All lighted signs shall be internally lit or provided with direct illumination in such a manner that glare from the light source is not visible to pedestrian or vehicle traffic and shall not cause glare into any residential zoning district.

(4) Computations. The following principles shall control the computation of sign area and sign height:

(a) Area of Individual Signs. The area of a sign face (which is also the sign area of a wall sign or other sign with only one face) shall be computed by means of the smallest square, circle, rectangle, triangle, or combination thereof that will encompass the extreme limits of the writing, representation, emblem, or other display, together with any material or color forming an integral part of the background of the display or used to differentiate the sign from the backdrop or structure against which it is placed; but not including any supporting framework, bracing, or decorative fence or wall that is clearly incidental to the display itself.

(b) Area of Multi-Faced Signs. The sign area shall be computed by adding together the area of all sign faces. When two identical sign faces are placed back to back, the sign area shall be computed by the measurement of one of the faces. No greater than two faces are permitted per freestanding sign. Signs with opposing faces 135 degrees or less with identical sign faces shall be considered a two-sided sign and only one side of the sign shall be used in calculating sign size. If the opposing faces of a

sign are more than 135 degrees, both opposing faces shall be used in calculating sign size.

(c) Height. The height of a sign shall be computed as the distance from the base of the sign at the existing, natural grade to the top of the highest attached component of the sign. In cases in which the normal grade cannot reasonably be determined, or the property is improved with curbs and gutters, sign height shall be computed on the assumption that the elevation of the normal grade at the sign is equal to the elevation of the sidewalk. (Ord. 673 § 1 (Exh. B), 2007; Ord. 607 § 1, 2003)

(5) Off-premise signs within the Entiat UGA will be allowed for Entiat businesses only. No outside commercial entities will be allowed to post off-premise signs within the Entiat UGA. Any off-premise sign visible from US 97A shall require a permit from WSDOT.

18.50.090 District regulations.

This section shall apply to all districts and conditional uses designated in this title:

(1) R-L Low Density Residential, R-M Medium Density Residential, and R-H High Density Residential Districts.

(b) Home Occupations. Signs relating to home occupations as defined in Chapter 18.10 EMC shall be unlighted, flush mounted wall signs or monument signs and shall not exceed six square feet in area.

(c) Residential Subdivisions, Multifamily Developments and Planned Developments. Decorative subdivision or area name signs of a permanent character at the street entrance or entrances to the housing development which identify said development only shall be permitted, subject to the following conditions:

(i) One monument sign may be permitted per entrance from an access street to the property, provided said sign does not exceed 50 square feet and is six feet or less in height, or as approved by the reviewing authority at the time of preliminary subdivision approval. If lighting is installed, said lighting shall be shielded and directional.

(ii) The sign shall consist of decorative masonry walls or wood with name plates or letters, and shall be located in a maintained landscaped area.

(2) MTR Mixed Tourist Residential, C-H Highway Commercial, and C-I Commercial/Light Industrial Districts.

(a) Single-Occupancy Buildings.

(i) One freestanding or monument sign not exceeding a maximum area of 70 square feet or a height of 35 feet.

(ii) One flush-mounted wall sign, unlighted or with low intensity lighting, placed flat against the wall of the main building, having a surface area not greater than 32 square feet, is permitted.

(iii) In lieu of a freestanding or monument sign, the flush-mounted wall sign may be increased in area to the total square footage of the freestanding or monument sign plus the square footage of the attached sign for a total of 100 square feet.

(iv) One additional sign may be allowed when business has two or more street frontages.

(b) Multiple (Two or More) Offices or Businesses within a Structure of a Planned Commercial/Industrial Park.

(i) One freestanding sign not exceeding 120 square feet, nor exceeding a height of 35 feet.

(ii) Identification signs may list the names of the occupants of the multiple structure/park. (Individual occupancy or buildings are not allowed a separate freestanding sign.)

(iii) One additional freestanding sign is permitted per center if the premises extend through a block to face on two or more arterial streets.

(iv) One flush-mounted wall sign shall be permitted for each principal building or occupancy which does not exceed an area of 32 square feet. Identification signs shall be attached flat against the building and shall not project above the eaves of the roof or the top of the parapet or beyond the eave lines or beyond the outer limits of the wall.

(v) Individual occupancy signs within a multiple occupancy or building complex shall be consistent with the building architecture and similar in color, design, size, and graphics.

(vi) Business or office parks with ten or more tenants may have a single monument sign up to 350 square feet, with formal approval of the Planning Commission.

(c) Community Bulletin Board Signs. One community bulletin board sign is permitted when associated with a public school, park, recreation facility, grange, fire station, church or other similar type uses provided they meet the following:

(i) Only one sign is permitted and shall not exceed 50 square feet in area. Freestanding signs shall not exceed a height of 15 feet and shall meet the minimum setback requirements of the district regulations within which the sign is located. Shall not display commercial advertising. [Ref: WAC 468-66-050(3)]

(Ord. 673 § 1 (Exh. B), 2007; Ord. 607 § 1, 2003)

18.50.095 Nonconforming signs.

Any sign lawfully existing under all codes and regulations prior to the adoption of the ordinance codified in this title may be continued and maintained as a legal nonconforming sign, provided:

(1) No sign shall be changed in any manner that increases its noncompliance with the provisions of this chapter.

(2) If the sign is structurally altered or moved, its legal nonconforming status shall be void and the sign will be required to conform to the provisions of this chapter.

(3) The sign is not hazardous or abandoned.

(4) The burden of establishing the legal nonconformity of a sign under this section is the responsibility of the person or persons, firm, or corporation claiming legal status of a sign. The approval of an asserted nonconformity is a limited administrative function of the mayor.

(5) The provisions of Chapter 18.60 EMC may govern certain nonconforming signs. (Ord. 673 § 1 (Exh. B), 2007; Ord. 607 § 1, 2003)

18.50.096 Termination of signs.

By destruction, damage, obsolescence or danger, the right to maintain any sign shall terminate and shall cease to exist whenever the sign is:

- (1) Damaged or destroyed beyond 50 percent of the cost of replacement, as determined by the mayor as a limited administrative review responsibility; and/or
- (2) Structurally substandard to the extent that the sign becomes a hazard or a danger to the public health, safety, and welfare as determined by the mayor as a limited administrative review responsibility. (Ord. 673 § 1 (Exh. B), 2007; Ord. 607 § 1, 2003; Ord. 701 § 1, 2009.)

APPENDIX C. SHORELINE INVENTORY

**City of Entiat – Shoreline Inventory and Biologic Critical Areas Reconnaissance
(Hereby incorporated by reference)**

APPENDIX D. SHORELINE PUBLIC ACCESS

Entiat Shoreline Public Access Plan

This Entiat Shoreline Public Access Plan documents how the City has planned for parks and recreation in the community, particularly public access opportunities on the Columbia and Entiat Rivers. The plan has been prepared pursuant to WAC 173-26-221 (4)(c), including identifying specific public needs and opportunities to provide public access through an open public process. This plan is based on the City's Comprehensive Plan land use, economic development, capital facilities, and transportation elements, as well as a detailed Parks, Recreation, and Open Space Plan. The City's plans provide a variety of shoreline access opportunities and circulation for pedestrians, bicycles, and vehicles, and include recommended projects and actions.

Shoreline Public Access Laws and Rules

Public access refers to the ability of the general public "to reach, touch, and enjoy the water's edge, to travel on the waters of the state, and to view the water and the shoreline from adjacent locations" (WAC 173 26 221(4)(a)). Public access can be physical access such as via a trail or park and/or visual such as a view corridor from a road.

Public access is a preferred use per the Shoreline Management Act (RCW 90.58.020). The Shoreline Master Program (SMP) Guidelines require that public access be provided with most new development, except that more flexibility is allowed where there is a coordinated public access planning process ((WAC 173 26 221(4)(c)). When public access is addressed in a SMP, it implements the "public trust doctrine" which is a common law principle holding that "the waters of the state are a public resource owned by and available to all citizens equally for the purposes of navigation, conducting commerce, fishing, recreation and similar uses." While the doctrine "protect(s) public use of navigable water bodies below the ordinary high water mark," the doctrine "does not allow the public to trespass over privately owned uplands to access the tidelands."⁴ Generally, public or private landowners are limited in terms of liability when there are unintentional injuries to any public access users based on state law at RCW 4.24.210.

Shoreline Recreation Goals and Plans

⁴ See the State of Washington's Department of Ecology's website at: http://www.ecy.wa.gov/programs/sea/sma/laws_rules/public_trust.html. Accessed March 24, 2010.

The City of Entiat's 2009 Comprehensive Plan includes Open Space and Recreation goals that seek to improve the existing parks and recreation facilities, as well as add new ones:

- Renovation of City/PUD Park to include trail; swimming beach; fire pits; additional boat launches; and upgrades to existing camping, parking, and restroom facilities (Comprehensive Plan Land Use Goal 8)
- Develop planned Entiaqua trail and outdoor learning center on Entiat River (Comprehensive Plan Land Use Goal 9)
- Develop waterfront trail to connect with trail at PUD/City Park and cross highway to Columbia Breaks Fire Interpretive Center (Comprehensive Plan Goal 10)
- Develop green spaces and shelters in waterfront business district (Comprehensive Plan Goal 11)
- Encourage local developers and entrepreneurs to build private recreational facilities. (Comprehensive Plan Land Use Policy LU 17.2)
- Identify and encourage the preservation of sites and structures with historical or archaeological significance, particularly those that might generate tourist appeal (Comprehensive Plan Land Use Policy LU 3.3)
- Support partnerships with other public agencies and private entities which provide recreational facilities within the UGA and in the broader, surrounding area. (Comprehensive Plan Land Use Policy CF 1.15)

Additionally, the City prepared the *Parks, Recreation, and Open Space Plan* in 2009. The plan identifies improvements to the Entiat City Park, along the Columbia River, new opportunities for public access and recreation on the Columbia River through the City Waterfront Master Plan, and new opportunities along the Entiat River through the Entiaqua Park Plan.

Entiat adopted a *Waterfront Subarea Plan*, to be implemented by the more detailed *Waterfront Master Plan*, as an element to its Comprehensive Plan. These plans that will transform Entiat's Columbia River shoreline were approved in 2009. The *Waterfront Master Plan* is focused on the following 10 design principles related to shoreline access:

- Build projects that will transform Entiat
- Provide new public amenities and attractions
- Support boating on Lake Entiat
- Ensure continuous public access along the waterfront
- Increase opportunities for recreation
- Connect established parts of town to the waterfront
- Create a walkable waterfront
- Preserve and enhance natural resources

- Preserve and enhance Entiat’s character
- Link waterfront initiatives to Entiat’s overall economic renewal

Parks and Recreation Plans and Public Review Process

The City’s parks and recreation goals and plans have been created with extensive public review.

Parks Documentation and Process	Description
Comprehensive Plan	City of Entiat Comprehensive Plan, Adopted 2009, including open space and recreation goals and policies.
Parks, Recreation, and Open Space Plan	Parks, Recreation, and Open Space Plan. Adopted 2009. Plan includes planning process, existing system, goals and standards, and implementation including a capital improvement program.
Waterfront Subarea Plan Waterfront Master Plan	Waterfront Subarea Plan and Waterfront Master Plan. Both adopted in 2009. Contain detailed plans for shoreline uses and recreation along the Columbia River (Lake Entiat) waterfront.
Public Involvement Process	Open houses, news ads, public meetings and workshops, community survey, Parks Board and Planning Commission meetings, and open record public hearings.

Current Facilities in Shoreline Jurisdiction

The following public access features are found along the Columbia and Entiat Rivers.

Waterbody	Shoreline Acres	Parks & Open Space Acres	Trails– Existing & Proposed Feet	Visual Access	Other Shoreline Facilities
Columbia River	85.04	46	8000	US 97A, that parallels the Columbia River, is a designated Scenic Byway that offers views of the river and adjacent hillsides.	Entiat City Park facilities include 3 restrooms, 2 showers, 25 tent camping sites, 31 RV camping sites, and a boat launch. Entiat Waterfront Trail site will include restrooms and trail parking area.
Entiat River	32.02	15	300	Visual access is from Entiat River Road and properties above the roadway.	None

Community Parks and Recreation Standards

The City's *Parks, Recreation, and Open Space Plan* includes level of service standards for different facilities community wide. These standards were considered in the development of specific parks and recreation improvements for the current and future population in Entiat.

Facility Type	Level of Service Standard
Ballfields	Four combination fields per 500 population
Trail miles	Loop trail along shoreline & connecting via irrigation right-of-way approximately 6-10 miles
Swimming Beach	One public swimming area on each river
Boat Launches	Two boat launches for local use & two Additional launches for tourism
Marina Slips	Ten marina slips per 200 population + 50-100 slips for tourism
RV Camping and Tent Camping	No standard. Current sites are not typically overbooked, but this could change with the addition of a public marina. Address through PUD relicensing.
Sport Courts	4 sport courts per 500 population
Open green space/viewing	Views from highway to river at intervals, waterside and upland broad viewing areas and open spaces needed.

Public Access Analysis & Objectives by Shoreline Reach

The City has prepared a Waterfront Master Plan for the Columbia River and has partnered with agencies on the Entiaqua Park proposed along the Entiat River. Goals and policies call for a trail connecting key shoreline features, though an alignment has not yet been determined. The City's plans are designed to meet the needs of current and future residential population and to attract tourists.

Waterbody and Reach	Current Shoreline Facilities	Planned Shoreline Facilities	Discussion
Columbia River			
City-owned	Gravel mine and City waterfront recreational development	Waterfront Master Plan – additional waterfront recreational and commercial/tourist opportunities – Marina, trail, open spaces	Waterfront Master Plan features include a hotel and restaurant, a new street layout, a marina, parks, a waterfront trail, and street trees.

Waterbody and Reach	Current Shoreline Facilities	Planned Shoreline Facilities	Discussion
PUD-owned	Entiat City Park: 40 acres and over 4,000 feet of shoreline, including 3 restrooms, 2 showers, 25 tent camping sites, 31 RV camping sites, and a boat launch. Additionally, a local museum is also located near the site.	Improvements to Entiat City Park	Entiat City Park: Additional docks, upgraded RV spaces and restrooms, and other improvements are planned at the park.
Entiat River			
PUD-owned	Open Space	Entiaqua Park will include trail and outdoor learning center.	The Entiaqua trail and outdoor learning center is to be located along the Entiat River extending approximately 1/3 of a mile from its confluence with the Columbia River. Day-use and interpretive facilities are planned.

Implementation

The City will implement its shoreline public access plan through a capital improvement program contained in the *Parks, Recreation, and Open Space Plan*. The capital improvement plan will be included in the City’s budget in the appropriate year that the facility is to be implemented. The City anticipates this plan to be updated on or before the close of 2014. The City may also revisit its shoreline public access plan during periodic reviews of the SMP, anticipated every seven years. (RCW 90.58.080)

Entiat Parks, Recreation and Open Space Plan 2009

Introduction

The City of Entiat is a waterfront community nestled in the confluence of the Entiat and Columbia Rivers (Figure 1). The Chelan County Public Utility District's (CCPUD) Rocky Reach Dam has created a lake-like section on the Columbia River adjacent to the City of Entiat. This section of the river is known as Lake Entiat, and is a popular recreational destination for boating, water skiing, hydroplane racing, swimming, fishing, and hunting.

Community History and Profile

The Entiat Valley was first settled by the Columbia River Chinook Indian tribe in the 1800s. Entiat was originally named by the tribe as "Enteatqua" which means "Rapid Water."

For many years, Chief Silico Saska's campsite, which was located at the confluence of the Columbia and Entiat Rivers, was composed of cattle pens, horse corrals, and crude homes. It became the gathering place for traders by land or water. In 1896, Chief Silico Saska sold the town site of Entiat to white settlers.

This first town site was constructed on the north side of the Entiat River about one-half mile west of the Columbia River. Wooden structures on the town site created stores for provisions, confections, a tavern, a barber shop, postal service, a school, and a hotel. Three sawmills offered jobs to the residents.

In the early years, ferries traveling from Orondo across the Columbia River to Entiat and riverboats from Wenatchee to Entiat were a vital part of settling the area and transporting goods. Some of the settlers planted orchards which later became a flourishing apple and pear industry, and offered employment for many of the settlers. Orchard goods from Orondo were ferried across the Columbia to packing facilities in Entiat.

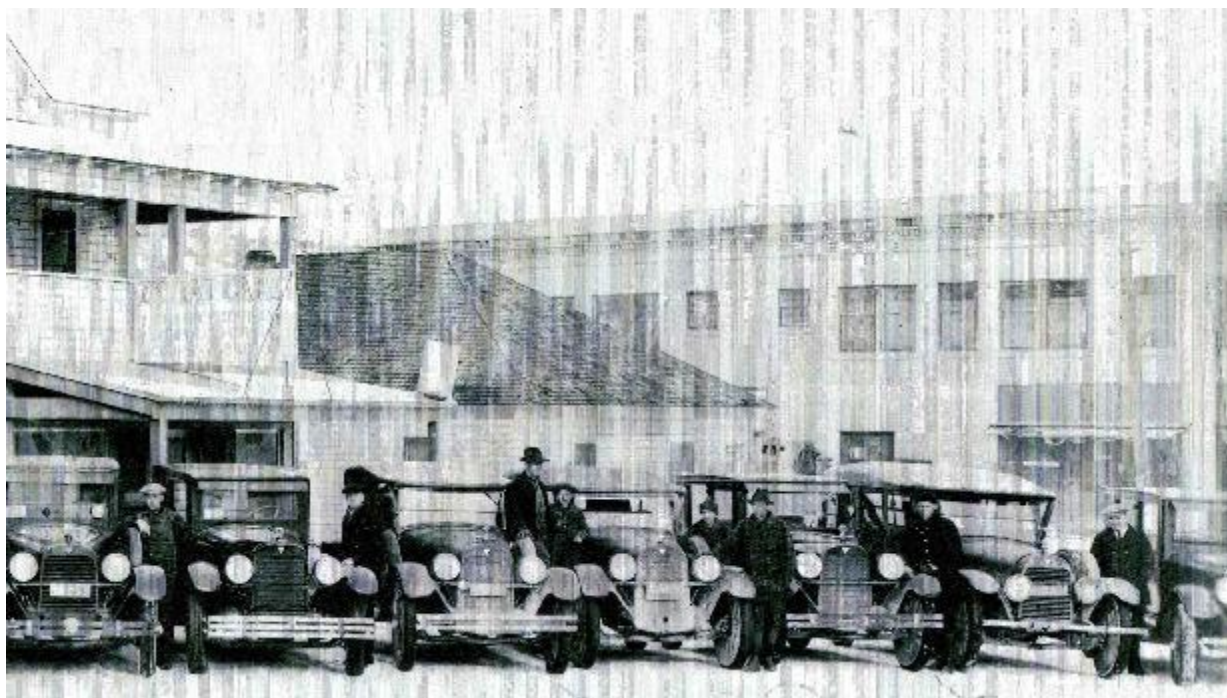
Second Town

In 1913, fire destroyed all but six structures in the existing town of Entiat, on the banks of the Entiat River. The town was relocated near the railroad tracks that were built in 1914. The new townsite had a main street about three blocks long and even had sidewalks. Many new stores were erected including a hotel, bank, hardware store, welding shop, barber shop, drug store, lumber yard, meat market, service stations, shoe shop, two taverns, doctor's office, two churches, newspaper/real estate office, two cafes, variety store, lodge hall, jewelry store, boarding house, butcher shop and a general merchandise store. Three fruit warehouses were built to

accommodate the fruit from the growing orchard industry, and continued to offer employment for the residents.

The railroad now transported much of the fruit products out of Entiat. The water system was developed by pumping water from the springs near the first town site into a reservoir above the town. In 1921, another fire destroyed the six original buildings, as well as the sawmill that had escaped the fire of 1913.

The town was incorporated and officially adopted its corporate seal in 1944. Entiat continued to rebuild and thrive until the construction of Rocky Reach Dam in 1958. When the Columbia River waters were held back behind the dam, the second town site was inundated and Lake Entiat was formed.



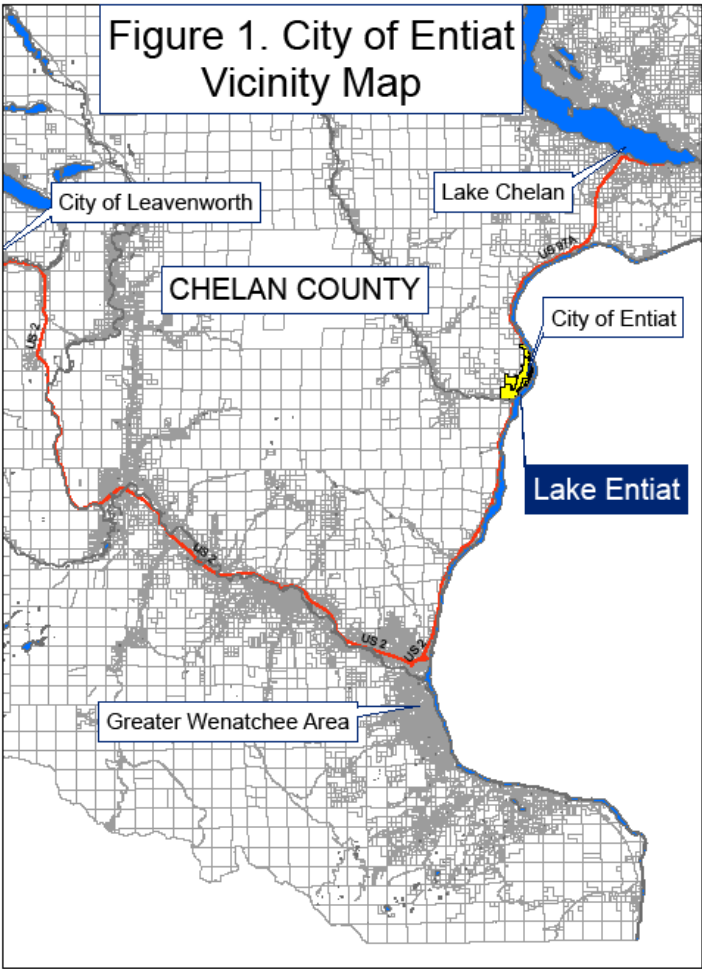
Third Town

A new townsite was developed by PUD planners and a group of local developers. Existing homes were either demolished and razed or moved to a new site upon the high flat behind the existing town. The PUD paid land owners for their property, and some residents bought land around the new townsite. Some simply did not rebuild or moved to another community. The only commercial building moved was the Entiat IOOF Hall. The building was picked up, moved up the hill, and set on a new foundation. It now houses Coaster's Restaurant.

All the homes, warehouses, and stores in the second town that had not been moved were then burned to the ground. Population of the community dipped due to the upheaval with most of the elder generation moving while the younger generation stayed.

Climate and Geography

The City of Entiat is located at the confluence of the Columbia and Entiat Rivers. The section of the Columbia River between Rocky Reach and Azwell Dams is known as Lake Entiat, a calm, smooth stretch of river, ideal for boating, water skiing, and fishing. The region is arid and rocky, with sunshine most of the year, drawing large numbers of sun-seekers from the Puget Sound area. Summer weather is dry and hot, with temperatures reaching as high as 110 degrees. Winter weather includes snow and frost, with temperatures dipping below zero. Rainfall is minimal and infrequent.



Inventory of Parks and Recreational Facilities

The City of Entiat provides park and recreational facilities to residents and visitors at the 40-acre Entiat City Park⁵, which has over 4,000 feet of shoreline. The facilities at this park include 3 restrooms, 2 showers, 25 tent camping sites and 31 RV camping sites. Users of the park enjoy boating, water skiing, jet skiing, swimming, picnicking, fishing, boat racing, and community functions. A local museum is also located on the site. In addition to Entiat City Park the City also maintains the Kiwanis Baseball field, containing 2 ball fields; and owns and maintains Rainbow Gardens. Kiwanis and Rainbow Gardens are a total of 5 acres in size.

Figures 2-4 (Public Lands Maps) show the locations of existing facilities, as well as identifying sites of planned facilities and other publicly owned lands. Most of the publicly owned lands are currently in open space or recreational use. Some should be considered as potential sites for future recreational facilities or open space.

Proposed Improvements to Existing Facilities

Entiat City Park upgrades are estimated at \$6.4 million. Because the park is owned by the Chelan County PUD, the majority of the capital improvements necessary at the park will be funded through the PUD as part of its relicensing agreement with the Federal Energy Regulatory Commission (FERC). The Entiat Park Board and the City of Entiat are coordinating with the PUD on the planning and design for the upgrades to this facility.



⁵ Master Plan Entiat Park, December 1992, page 1

For Kiwanis Park, bathrooms are needed to accommodate the extensive use by sports teams. Additionally, Kiwanis Park offers no parking areas other than a small strip adjacent to US 97A. Parking along a highway presents a number of potential safety issues, particularly when dozens of children are getting in and out of cars before and after games. A study of the US 97A highway corridor through the City of Entiat is in progress and expected to be completed by March of 2010. It is anticipated that this study will identify this area as a potential hazard and recommend alternate parking opportunities.

The Entiaqua trail and outdoor learning center is a planned project within the City of Entiat. In conjunction with numerous local, state, and federal agencies (US Forest Service, Washington State Department of Ecology, Washington Conservation Corps, Entiat School District, NCW Americorps, Washington State Department of Natural Resources, Entiat Community Historical Society, Greater Wenatchee Community Foundation and Chelan County PUD), the City of Entiat has been developing a plan for an outdoor learning center to be located along the Entiat River from its confluence with the Columbia River to a point upstream approximately 1/3 of a mile. This facility will include day-use and interpretive facilities on land that the City leases from the Chelan County PUD. The land involved has a long history of development and disturbances including early settlement, logging, original city development, roads, farming and recreational use. The project is divided into 4 phases, with the first phase already complete.

Existing Documentation

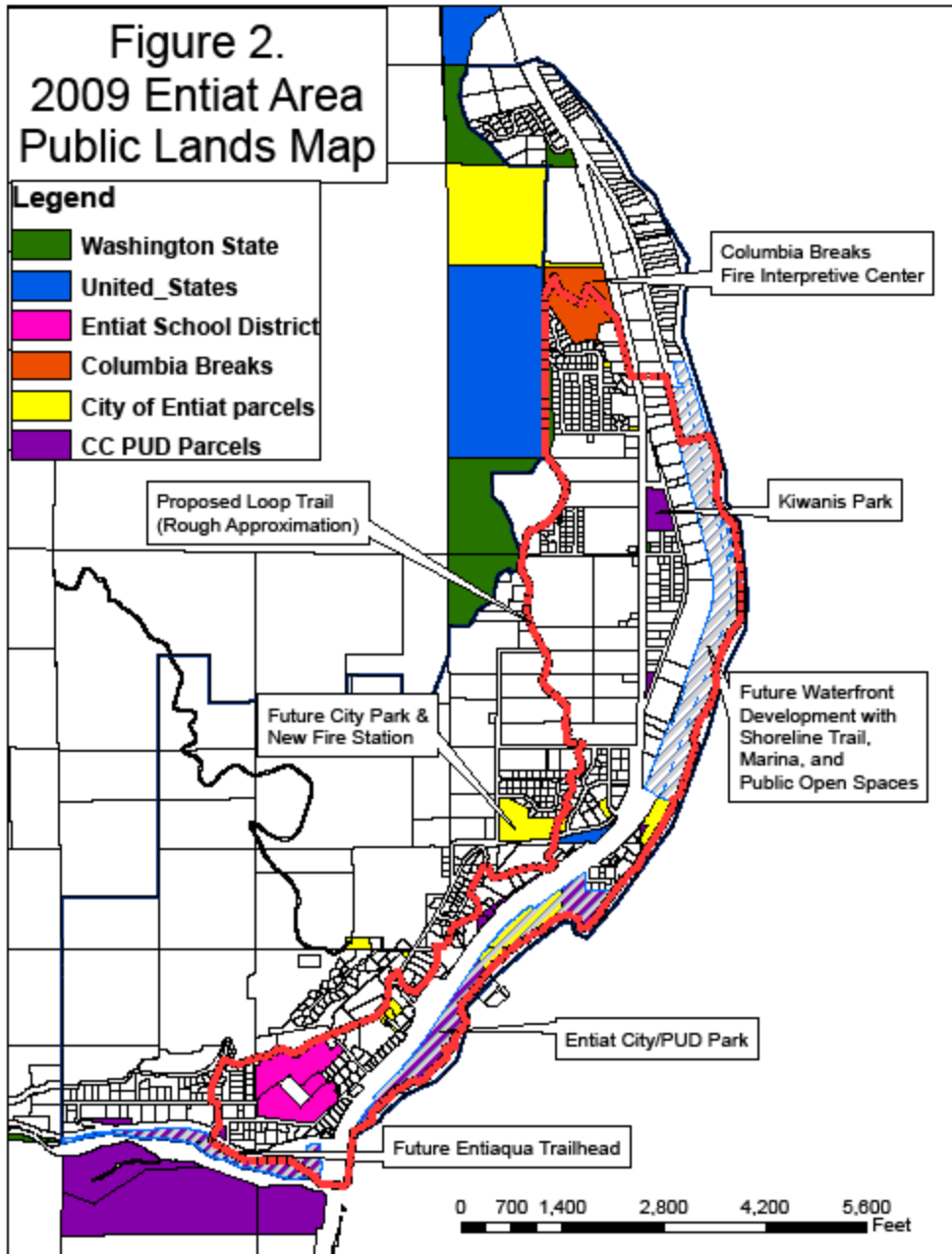
Entiat Comprehensive Plan Goals

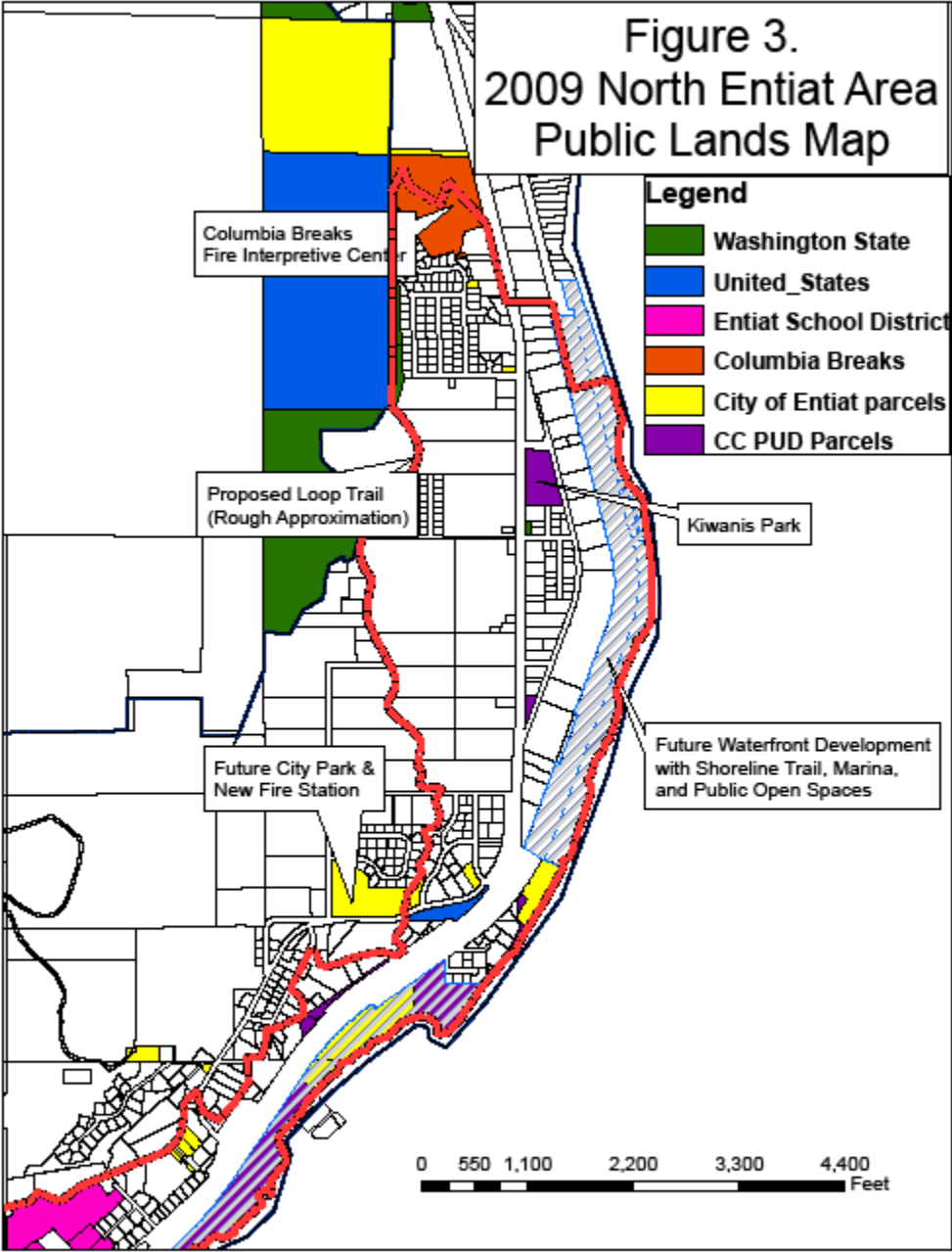
The following goals pertaining to parks and recreation are found in the 2007 City of Entiat Comprehensive Plan:

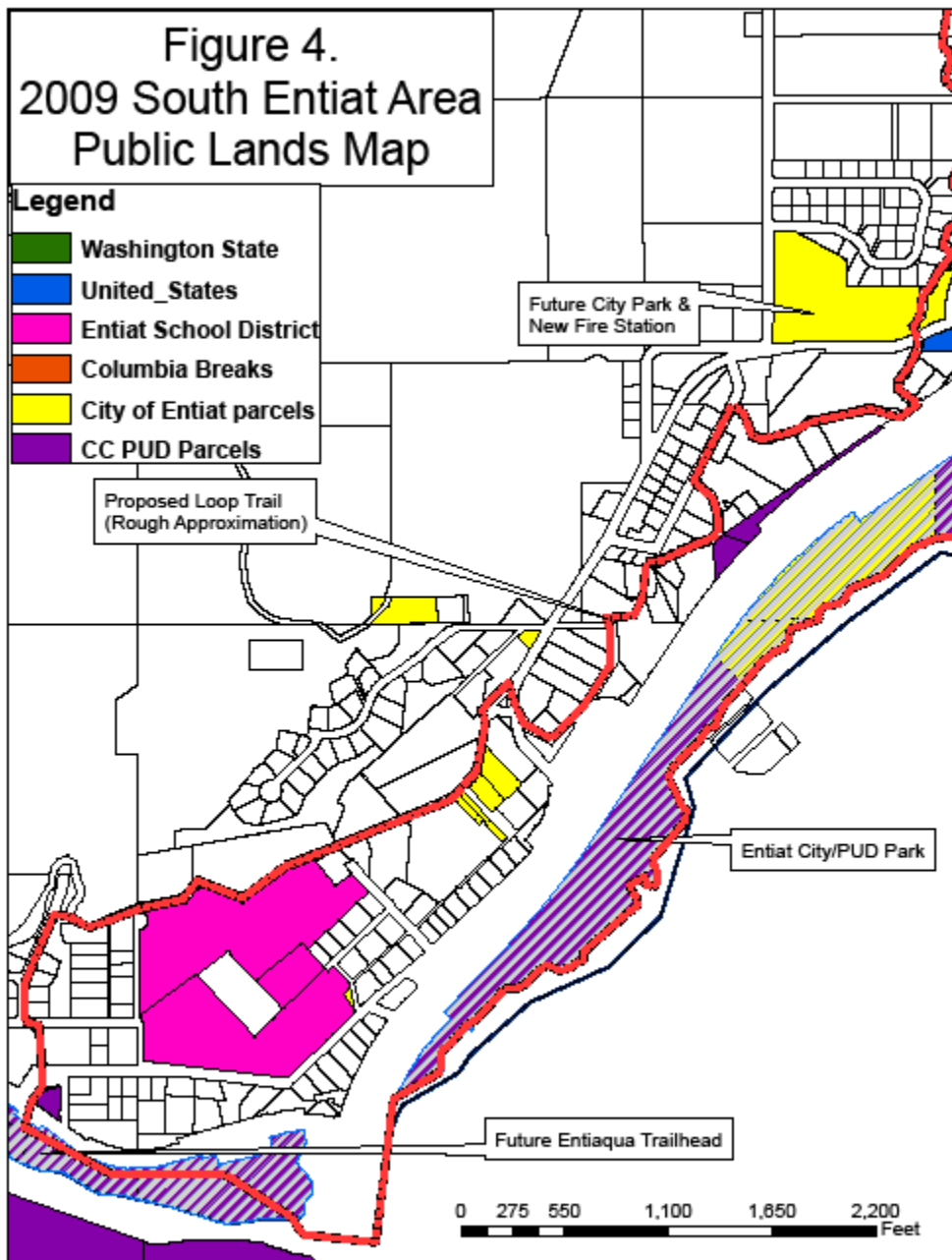
Goal 8: Meet the parks and recreation needs of residents and tourists.

Goal 9: Ensure that parks and recreation development respects significant natural and cultural features and maintains the land and water environments which support fish and wildlife.

The Entiat Comprehensive Plan will be updated in 2009 to reflect the goals of this Parks, Recreation, and Open Space Plan.







Community Comments

Community comments were solicited and received throughout this 10-month planning process. Many community members submitted written comments (see Appendix A).

Community SWOT Assessment

At the public meeting on March 25, 2008, approximately 80 community members met to discuss the possibilities for the Entiat waterfront and beyond. As part of the process, the Planning Commission engaged the community in an interactive SWOT assessment. For more than 30 minutes, residents called out elements of Entiat that they considered Strengths & Opportunities or Weaknesses & Threats. At the conclusion of the process, many citizens were energized and enthused by the lists. One man stated, "I didn't realize Entiat had so much going for it!" Many in the room nodded agreement. The lists representing the strengths, opportunities, weaknesses, and threats identified by citizens at the community meeting are located in App. B.

Following this meeting, the Waterfront Visioning process and the Park Plan process took different tracks. The Park Plan was addressed at Park Board and Planning Commission meetings over the next several months, while the draft plan was developed.

A second public meeting on joint projects was held on October 21, 2008, at which time the Park Board presented proposed goals and projects to the community for comment. Also discussed at this meeting was the Waterfront Development and an ongoing analysis of how to address issues with the highway that runs through the middle of town.

In all of the meetings, particular themes were recurring. The community is bordered by water on two sides, but public access to the water is minimal. One boat launch is available at the City Park, which does not provide sufficient access for locals and tourists, and no official swimming areas exist. Physically accessing much of the Lake Entiat waterfront is difficult, as the land is undeveloped, and currently in use as a gravel mine. The rest is privately owned residential property or part of the City Park, which is typically in use by campers for much of the spring/summer season. Access to the Entiat River is easier, although there are few parking opportunities. Informal swimming areas are difficult to use due to milfoil problems. Lastly, all designated recreational areas are currently on the east side of US 97A, while most of Entiat's residential development is on the west side of the highway. This creates an additional access problem for children and special populations. These themes also came up in the written public comments (Appendix A), the community SWOT analysis (Appendix B), and the park survey (Appendix C).

Community Survey

The survey was mailed to all Entiat and Ardenvoir addresses in December of 2008. Some of the survey questions and responses follow (updated 01/21/09). Responses to the survey indicate heavy use of baseball/soccer fields, swimming areas, boat launches, camping areas, and fishing areas. Over 60% of respondents identified additional swimming areas as a desired element. The most highly requested new element is an exercise facility, as identified by more than 50% of respondents, while over 40% marked walking trails, swimming pool, bowling alley, restrooms, and drinking fountains as requested facilities.

Goals for future projects and amenities are based on the survey, comments offered at public meetings, and written comments received. The entire survey with tallied responses can be found in Appendix C.

What types of amenities do you currently enjoy?	Responses this Category	Percent of Total Responses (77 responses)
Walking/hiking trails	23	30%
baseball/football/soccer fields	36	47%
tennis/basketball courts	29	38%
children's play areas	12	16%
swimming areas	43	56%
boat launches	44	57%
camping areas	32	42%
fishing areas	32	42%
viewing areas	26	34%
amphitheater	13	17%
Other (horseshoes)	10	8%
What would you like to see more of in the future?	Responses this Category	Percent of Total Responses
Walking/hiking trails	33	43%
baseball/football/soccer fields	28	36%
children's play areas	24	31%
swimming areas	49	64%
tennis/basketball courts	26	34%
boat launches	29	38%

camping areas	27	35%
fishing areas	29	38%
viewing areas	20	26%
amphitheater	20	26%
What other facilities make sense for Entiat?	Responses this Category	Percent of Total Responses
Swimming Pool	33	43%
ice skating rink	28	36%
indoor sports courts	26	34%
indoor football/soccer arena	20	26%
water park	16	21%
bowling alley	33	43%
off-road vehicle trails	24	31%
golf course	18	23%
horseshoes	14	18%
exercise facility	40	52%
community garden	18	23%
wildlife viewing areas	27	35%
cross-country ski trails	16	21%
restrooms	31	40%
drinking fountains	32	42%
waste receptacles	23	30%

Goals, Plans, and Level of Service Standards

Desired New Facilities

Outdoor Facilities: Play parks, Fields, Sport Courts, Swimming Pool, Walking/Biking/Skating Trails, Water Trails/docking sites, Boating Facilities, Camping Facilities, Picnic/shelter areas, Fire Pits in City/PUD Park, Historic/Cultural Sites, etc.

Year-round, Indoor Facilities: Pool, sport courts, skating, etc.

Private facilities to be encouraged could include: mini-golf, 18-hole golf course, water park, bowling alley, ice-rink, go-carts, etc.

Goals and Objectives

G-1: Renovation of City/PUD Park to include trail; swimming beach; fire pits; additional boat launches; and upgrades to existing camping, parking, and restroom facilities.

Objectives:

1. Work cooperatively with PUD planning and design staff
2. Assist PUD in consultant selection process
3. Provide public meeting times and locations for joint PUD/City/Park Board meetings

G-2: Develop planned Entiaqua trail and outdoor learning center on Entiat River

Objectives:

1. Coordinate with U.S. Forest Service, PUD, and WDFW
2. Solicit grant funding as needed
3. Encourage volunteer labor from the community
4. Connect trail under the Entiat River Bridge to trail at PUD park using \$1.2 million identified in FERC agreement
5. Reinstate outdoor natural ice-skating area

G-3: Develop waterfront trail to connect with trail at PUD/City Park and cross highway to Columbia Breaks Fire Interpretive Center

Objectives:

1. Coordinate trail design with PUD
2. Coordinate highway crossing as part of US 97A Corridor Study
3. Coordinate with WSDOT
4. Coordinate with Columbia Breaks to connect to trail system

Apply for Highway for LIFE, Scenic Byways, or other grant funding to complete crossing facilities

G-4: Develop green spaces and shelters in waterfront business district

Objectives:

1. Encourage public green spaces and gathering areas with facilities as part of the Waterfront Master Planning effort.
2. Connect green spaces with the public waterfront trail

G-5: Develop planned ball fields at former gravel pit

Objectives:

1. Property is city-owned and dedicated for this use
2. Solicit grant funds for design and construction
3. Solicit volunteer labor from the community

G-6: Create a community garden

Objectives:

1. Work with School District and Chamber of Commerce on continuing and expanding existing project
2. Locate available publicly-owned land for expansion
3. Create user guidelines before expanding opportunity to community at large

G-7: New Park/Playground

Objectives:

1. Locate appropriate publicly-owned parcel for playground area on the west side of US 97A
2. Solicit grants for design and construction
3. Solicit volunteer labor from community

G-8: Create loop trail for walking, biking, and cross-country skiing

1. Connect Entiaqua trail, PUD park trail, waterfront trail, and Columbia Breaks trails
2. Coordinate with WSDOT, for highway crossing
3. Coordinate with Entiat Irrigation district to use water grade ROW as trail
4. Connect Columbia Breaks trails to Entiaqua trail via Irrigation District trail
5. Apply for National Recreational Trails Program grants

G-9: Acquisition of land for future parks

1. Develop a plan for future revenues

2. Create a policy of the city to pay fair development market values for any land acquired for parks, recreation, and open spaces

The following are desired facilities that would be encouraged and permitted within the City limits, but are not likely to be City owned or managed facilities:

G-10: Exercise Facility, Swimming Pool, Bowling Alley, Indoor Ice Skating Rink

Objectives:

1. Confirm that these facilities are allowed as permitted uses in appropriate zones or amend zoning code as necessary
2. Encourage local developers and entrepreneurs to build private recreational facilities
3. Utilize Port of Chelan County and the Entiat Economic Development Advisory Board to bring in developers of recreational facilities
4. Consider City ownership/management of these facilities after the creation of a Parks Department

Future Potential Projects & Plans

Recreation Building/Community Center

Horticultural Center/Arboretum

Establish a Parks Department (separate from Public Works)

Extend Streetscape to the City limits

Aquatic Center

Sports Complex

Golf Course

City Complex with History Kiosk and Statues

Level of Service (LOS)

The 2007 Entiat Comprehensive Plan identified the Park LOS standard as 5 acres per thousand residents. That measuring tool will be changed in the 2009 update, as it has been determined by public input to be an ineffective measure. In order to improve recreational tourism opportunities and meet needs of local users, the community would like to see LOS indicators that reflect a variety of recreational activities not based entirely on resident population. The LOS for parks and open spaces in the City should also be reflected in terms of types of use rather than total acreage. The proposed LOS is listed in the following table.

Item	Proposed LOS	Existing Facilities	Needed Facilities
Ballfields	Four combination fields per 500 population	Two sub-standard ballfields at Kiwanis Park – no off-street parking or restrooms available A multi-use field is available at the school	City owned property has already been set aside for new fields- development funding needed
Children’s play areas/facilities	One play area with toys per 500 population	One play area at Entiat City Park primarily for tourist use, one play area at school	One to two additional play areas desired – separate from tourist areas
Trail miles	Loop trail along shoreline & connecting via irrigation right-of-way approximately 6-10 miles	Columbia Breaks trails – approximately 1 mile.	Approximately 3 miles of shoreline trail + approximately five miles of upland trail
Swimming Beach	One public swimming area on each river	No existing designated swimming areas – heavy milfoil problems	Two designated swimming areas
Boat Launches	Two boat launches for local use & two additional launches for tourism	One boat launch at Entiat City Park	Three boat launches – double-lane boat launches OK in two separate locations
Marina Slips	Ten marina slips per 200 population + 50-100 slips for tourism	No existing marina slips	60 marina slips needed for local use + 50-100 slips for tourism – URGENT NEED for economic development
RV Camping sites	RV sites are not typically overbooked, but this could change with the addition of a public marina	31 existing RV sites at Entiat City Park	Existing facilities to be updated as part of PUD relicensing agreement

Tent Camping sites	Tent sites are not typically overbooked, but this could change with the addition of a public marina	25 existing tent camp sites at Entiat City Park	Existing facilities to be updated as part of PUD relicensing agreement
Sport Courts	4 sport courts per 500 population	1 basketball court and 3 tennis courts at school	½ court basketball court proposed in city park renovation by PUD
Open green space/viewing	Views from highway to river at intervals, waterside and upland broad viewing areas and open spaces needed	Rainbow Gardens, open space area at foot of Town Hill, and existing Entiat City Park provide open space and view areas	Additional viewing areas to water from highway needed. Benches needed at Rainbow Gardens and open space area at foot of Town Hill

Implementation Strategy

Public Involvement

The public involvement process for this plan ran concurrently with the City’s Waterfront Visioning Process. Advertisements for public meetings were included in the local newspaper, Chamber of Commerce newsletter, Entiat School newsletter, and inserted in the City’s utility billings. The first public meeting was held on March 25, 2008 at the Entiat Grange Hall. Written comments were received.



The second public meeting was held on October 21, 2008, at which time the Park

Board presented proposed goals and projects to the community for comment.

Adoption Process

On February 12, 2009, City Council hosted an Open Public Hearing to hear the Park Board’s recommendations for a Final Parks, Recreation, and Open Space Plan, initiating 60-day review and comment period. Copies of the plan were sent to state and local agencies for review and comment. Council voted to approve the final plan on April 16, 2009, at a second Open Public Hearing. The City’s Comprehensive Plan was updated to reflect this plan, and both were formally adopted September of 2009.

Capital Improvements

The following table addresses specific projects, timelines, and dedicated or potential funding sources for the first six goals identified above. Timelines and funding for future projects will be added as those projects become feasible.

Project	Dedicated Funding	Potential Funding	Timeline
G1: Entiat City Park Renovation -	Chelan County PUD \$6.4 million	No additional funding needs identified at this	2009-2012

swimming, camping, boat launches, trail, etc.		time	
G2: Entiaqua Outdoor Learning Center and Trail	Chelan County PUD \$1.7 million	No additional funding needs identified at this time – potential NRTP	2011-2013
G3 & 4: Waterfront Trail & public open spaces/wildlife viewing areas	Planning & Design funded by City, Port of Chelan County, CERB \$275,000	Trail construction funds to be sought from NRTP, WDFW, and Port of Chelan County	2011-2013
G5: Ball Fields	Land acquisition complete – funded by City	Design and construction funds to be sought from LWCF, local donors and volunteer labor	2012-2014
G6: Community Garden	Joint project of Entiat School and Chamber of Commerce	Expansion to be funded by local donations and volunteer labor	In progress

Long-term Maintenance

Long-term maintenance of the renovated City Park will be the responsibility of the Chelan County PUD as a condition of the FERC license. Maintenance of other PUD park areas (Entiaqua and trail) is also expected to be PUD responsibility. Maintenance of the open spaces and trail in the Waterfront Business District (WBD) will be managed by the Entiat Public Works staff, with volunteer support as available. Tax revenue from the WBD is expected to provide sufficient funding for additional staff hours required to maintain the site. Mowing and lawn care for the new ball fields is expected to be minimal, and will be absorbed into regular Public Works staff time.

Staff and funding availability will be part of the feasibility discussion prior to designing or building any additional facilities beyond those identified here.

APPENDIX E. RESTORATION PLAN

1. Introduction

A jurisdiction's Shoreline Master Program applies to activities in the jurisdiction's shoreline area. Activities that have adverse effects on the ecological functions and values of the shoreline must provide mitigation for those impacts. By law, the proponent of that activity is not required to return the subject shoreline to a condition that is better than the baseline level at the time the activity takes place. How then can the shoreline be improved over time in areas where the baseline condition is severely, or even marginally, degraded?

Section 173-26-201(2) (f) WAC of the Shoreline Master Program Guidelines⁶ says:

“master programs shall include goals and policies that provide for restoration of such impaired ecological functions. These master program provisions shall identify existing policies and programs that contribute to planned restoration goals and identify any additional policies and programs that local government will implement to achieve its goals. These master program elements regarding restoration should make real and meaningful use of established or funded nonregulatory policies and programs that contribute to restoration of ecological functions, and should appropriately consider the direct or indirect effects of other regulatory or nonregulatory programs under other local, state, and federal laws, as well as any restoration effects that may flow indirectly from shoreline development regulations and mitigation standards.”

However, degraded shorelines are not just a result of pre-Shoreline Master Program activities, but also of unregulated activities and exempt development. The new Guidelines also require that “[l]ocal master programs shall include regulations ensuring that exempt development in the aggregate will not cause a net loss of ecological functions of the shoreline.” While some actions within shoreline jurisdiction are exempt from a permit, the Shoreline Master Program should clearly state that those actions are not exempt from compliance with the Shoreline Management Act or the local Shoreline Master Program. Because the shoreline environment is also affected by activities taking place outside of a specific local master program's jurisdiction (e.g., outside of city limits, outside of the shoreline area within the city), assembly of out-of-jurisdiction actions, programs and policies can be essential for understanding how the City fits into the larger watershed context. The latter is critical when establishing realistic goals and objectives for dynamic and highly inter-connected environments.

⁶ The Shoreline Master Program Guidelines were prepared by the Washington Department of Ecology and codified as WAC 173-26. The Guidelines translate the broad policies of the Shoreline Management Act (RCW 90.58.020) into standards for regulation of shoreline uses. See <http://www.ecy.wa.gov/programs/sea/sma/guidelines/index.html> for more background.

As directed by the Guidelines, the following discussions provide a summary of baseline shoreline conditions, list restoration goals and objectives, and discuss existing or potential programs and projects that positively impact the shoreline environment. Finally, anticipated scheduling, funding, and monitoring of these various comprehensive restoration elements are provided. In total, implementation of the Shoreline Master Program (with mitigation of project-related impacts) in combination with this Restoration Plan (for restoration of lost ecological functions) should result in a net improvement within Entiat's shoreline environment in the long term.

In addition to meeting the requirements of the Guidelines, this Restoration Plan is also intended to support the City's applications for grant funding, and to provide the interested public with contact information for the various entities working within the County and Cities to enhance the environment.

2. Shoreline Inventory Summary

2.1 Introduction

The City of Entiat is located in North Central Washington at the confluence of the Columbia and Entiat Rivers in Chelan County. US Highway 97A follows the west bank of the Columbia River, while Entiat River Road follows the north bank of the Entiat River.

2.2 Shoreline Boundaries

As defined by the Shoreline Management Act of 1971, shorelines include certain waters of the state plus their associated "shorelands." At a minimum, the waterbodies designated as shorelines of the state are streams whose mean annual flow is 20 cubic feet per second (cfs) or greater or lakes whose area is greater than 20 acres. In addition, shorelines of statewide significance are those streams and rivers that meet one or more of the following criteria

- "i. that have either: a mean annual flow of 200 cubic feet per second or more, or;*
- ii. the portion downstream from the first 300 square miles of drainage areas.*

Shorelands are defined as:

"those lands extending landward for 200 feet in all directions as measured on a horizontal plane from the ordinary high water mark; floodways and contiguous floodplain areas landward 200 feet from such floodways; and all wetlands and river deltas associated with the streams, lakes, and tidal waters which are subject to the provisions of this chapter...Any county or city may determine that portion of a one-hundred-year-floodplain to be included in its master program as long as such portion includes, as a

minimum, the floodway and the adjacent land extending landward two hundred feet therefrom... Any city or county may also include in its master program land necessary for buffers for critical areas... (RCW 90.58.030)"

The City shoreline boundaries have been updated (subject to City Council and Ecology approval) through use of improved stream flow modeling by the United States Geological Survey and improved lake area mapping that resulted in increased accuracy of jurisdiction identification and mapping. Past mapping errors by USGS and Ecology have been corrected so that federal lands are no longer excluded from shoreline jurisdiction.

Shorelands in the City of Entiat include only areas within 200 feet of the ordinary high water mark, floodways, portions of their adjacent floodplains and any associated wetlands within those floodplains. Waters identified within jurisdiction include the Entiat and Columbia Rivers. The City of Entiat and its UGA contain 117 acres and 22,500 linear feet in shoreline jurisdiction.

2.3 Inventory and Analysis Summary

Land Use and Physical Conditions

Existing uses along the Columbia River include single-family residential, municipal utility, gravel mining, and RV park. The RV park along the Columbia includes a boat launch dock and public water access and recreational opportunities. The gravel mine has been rezoned as Waterfront Business, and the City has adopted (2009) a Waterfront Master Plan to guide commercial/recreational development in that area. The City will break ground on the first phase, water front trail and shoreline restoration, in September of 2012.

The Entiat Waterfront Master Plan (Entiat 2009) is intended to facilitate public water access, tourism, commercial uses, and economic development for the community along approximately 18 acres of Columbia River shoreland. The Waterfront Master Plan identifies potential uses for the shorelands including: a marina, business and commercial, mixed use condominiums and retail, open space, riparian restoration, multi-use trail, a new waterfront road, and parking, among other features.

There are 5-6 residential lots along the Columbia that do not currently have homes. Most of the existing residential lots have homes, docks, and other substantial structures within shoreline jurisdiction, or on the shoreline.

The Entiat shoreline along the Entiat River below Entiat River Road is owned by the Chelan County PUD. This land is primarily natural, but has a trail across it that school science classes use when releasing classroom salmon. This program is part of the

science curriculum, and is facilitated by PUD staff. The City, PUD, and School District have plans for an outdoor learning center on this site.

Shoreline viewing access is available for the Columbia and Entiat Rivers along roadways, and from hilltops or immediately along the shoreline. Physical access is primarily found at the Entiat City Park, providing over 4,000 feet of shoreline. The facilities at this park include 3 restrooms, 2 showers, 25 tent camping sites, 31 RV camping sites, and a boat launch. At this location, park users can boat, water ski, jet ski, swim, camp, and picnic. A local museum is also located adjacent to the site. The Chelan County PUD is planning improvements to the park that will include additional boat launching facilities, as well as upgraded restrooms and RV spaces. Construction on the park renovation is scheduled to begin in October of 2012.

3. Restoration Goals and Objectives

In the *City of Entiat Comprehensive Land Use Plan* (2009), the Entiat Planning Area Statement of Intent is:

“to provide recommendations for the citizens of the Entiat Planning Area. The plan will strive to maintain the existing quality of life that includes: culture, customs, economy, agricultural opportunities, sense of community, water quality, and recreational opportunities. This plan should provide for expansion of these opportunities, while maintaining an adequate infrastructure to accommodate this growth. Continuous public participation is warranted, with decision-making and implementation at the local level.”

The City of Entiat believes that goals provide the motivating force behind all planning efforts. Therefore, the following goals related to environmental protection or restoration were established utilizing provisions of the Shoreline Management Act and Guidelines as a basic theme, in combination with the ideas and evaluation of the Citizens Advisory Committee:

1. Assure an appropriate pattern of sound development in suitable locations without diminishing the quality of the environment along shorelines.
(Goal LU-1)
2. Protect shoreline by
 - a. preserving unique, fragile, and scenic elements;
 - b. conserving non-renewable natural resources; and
 - c. managing renewable resources such as timber, water, and wildlife.
(Goal CONS-1)

3. Encourage the restoration of shoreline areas which have been modified, blighted, or otherwise disrupted by natural or human activities. (Goal CONS-2)
4. Recognize the hydrologic functions of floodplains and protect frequently flooded areas. (Goal FLOOD-1)

More specific goals that include an environmental protection element are as follows:

Economic Development Goal: Permit those commercial and industrial developments requiring shorelines locations which may contribute to the economic well-being of the City, yet result in no net loss to the ecological functions and values of the watershed. (Goal ED-1)

Public Access Goal: Ensure public access to shorelines:

- Is safe, convenient, and diversified
- Makes provisions for public access to publicly owned shoreline jurisdiction areas
- Avoids endangering life or adverse effects on property or fragile natural features
- Minimizes conflicts between the public and private property owners
- Enables the public to enjoy the physical and aesthetic qualities of natural shorelines of the state which shall be preserved to the greatest extent feasible consistent with the overall best interest of the state and the people generally. (Goal PA-1)

Recreation Goal: Promote diverse, convenient, and adequate recreational opportunities along public shorelines for local residences and visitors. (Goal REC-1)

Circulation Goal: Since the major transportation and utility systems pre-exist near many shorelines, minimize conflicts between these systems and shorelines uses when considering circulation additions or modifications. (Goal CIRC-1)

4. List of Existing and Ongoing Programs

4.3 WRIA 46 Watershed Plans

The *Entiat WRIA - Detailed Implementation Plan's* (DIP) (CCCD 2006) purpose is “to outline a framework for maintaining or improving the health of the Entiat and Mad River watersheds through implementation of Entiat WRIA 46 Management Plan recommendations.” Actions and strategies identified in the *Entiat WRIA 46 Management Plan* (CCCD 2004) will help correct altered conditions and improve or maintain overall watershed health, attain compliance with the Clean Water and Endangered Species Acts, and contribute to the recovery of listed species and opportunities for recreational and tribal fisheries, in accordance with the vision and goals of the EWPU.

The DIP is meant to be a reasonable approach to achieving watershed protection and enhancement in a realistic timeframe under the known physical, political, social and economic limitations. The EWPU has already implemented a number of watershed restoration actions, and has a list of ongoing and long-term projects identified in Table 8 of the *Entiat WRIA - Detailed Implementation Plan* (CCCD 2006). Table 17 of the DIP summarizes ongoing monitoring activities. These tables also outline lead/support agencies that are involved, and includes information about activities that have some degree of funding support associated with them (CCCD 2006).

4.6 Comprehensive Plan Policies

The *City of Entiat Comprehensive Land Use Plan* (2009) provides for urban land use designations in the City and UGA, and addresses other important elements such as capital facilities (e.g. parks and recreation). The Comprehensive Plan was prepared by the citizens of Entiat to address growth issues in the Entiat Planning Area. It represents their land use policy plan for growth into the future.

The Entiat Citizens Advisory Committee developed a statement of intent that took care to list characteristics of the community and what they would like to see happen in the future. Their following statement of intent for the Planning Area states, “the intent of this comprehensive plan is to provide recommendations for the citizens of the Entiat Planning Area. The plan will strive to maintain the existing quality of life that includes: culture, customs, economy, agricultural opportunities, sense of community, water quality, and recreational opportunities. This plan should provide for expansion of these opportunities, while maintaining an adequate infrastructure to accommodate this growth. Continuous public participation is warranted, with decision-making and implementation at the local level.”

4.7 Critical Areas Regulations

The City of Entiat has adopted critical area regulations that dictate protection of environmentally sensitive areas, including wetlands, streams (fish and wildlife habitat conservation areas), geologically hazardous areas, frequently flooded areas, and aquifer recharge areas. All regulations use a version of Ecology's Eastern Washington Wetland Rating System.

The City of Entiat has adopted critical area regulations in 2012, consistent with best available science and all other requirements of the GMA. The goals and policies were outlined in the *City of Entiat Comprehensive Land Use Plan* (2009) and "are intended to provide some measure of protection to the environmental elements that contribute to the quality of life in the community."

4.8 Stormwater Management and Planning

New subdivisions have stormwater facilities, generally consisting of grassy swales, catch basins and large detention areas, whereas earlier subdivisions used an open ditch system. The *City of Entiat Comprehensive Land Use Plan* (2009) explains that the City now requires new development to manage stormwater on site. There are no current plans to implement a city-wide stormwater drainage system.

4.9 Public Environmental Education

The City of Entiat will continue its public education program following its Comprehensive Plan adoption in order to inform the entire community about the goals of the plan, as well as the changes that will take place in the planning area because of the plan's implementation (City of Entiat 2009). The City believes that broad support for the plan is crucial for effective implementation. The following objectives from the Comprehensive Land Use Plan (2009) address public education related to important resource areas.

Objective LU 3.3: Identify and encourage the preservation of sites and structures with historical or archaeological significance, particularly those that might generate tourist appeal.

Objective LU 18.4: Encourage the development of an education program that promotes the value of critical areas and that promotes public and private stewardship of these lands.

Objective LU 18.13: Allow for open space and recreational use of critical areas where such use does not negatively impact the critical areas.

Objective ED 2.9: Develop informational kiosks in the waterfront district and appropriate viewing areas or historical sites.

The City of Entiat and numerous local, state and federal agencies (USFS, Ecology, Washington Conservation Corps, Entiat School District, NCW AmeriCorps, Washington State Department of Natural Resources, Entiat Community Historical Society, Greater Wenatchee Community Foundation and Chelan County PUD) are developing a plan for an outdoor learning center to be located along the Entiat River. The Learning Center will consist of a day-use facility and interpretive center located on Chelan County PUD land at the Entiat River confluence with the Columbia River to a point upstream approximately one-third of a mile (City of Entiat 2007). More detail about the Learning Center is found in Section 4.10.

4.10 Additional City Efforts

The City of Entiat has identified future shoreline parks and public access opportunities including a shoreline trail associated with the *Lake Entiat Waterfront Business District Subarea Plan* (2009). According to the Subarea Plan, the trail in the redevelopment area is intended to connect with a trail along the shoreline at Entiat City Park, to the south of, and progress under the Entiat River Bridge to connect with the proposed Entiaqua trail. A conceptual plan for a loop trail could connect the east end of the Entiaqua trail to the north end of the waterfront trail at the Columbia Breaks Fire Interpretive Center via irrigation district right-of-way. The trail would be flanked by restored riparian areas along much of its length.

Additionally, the City is working to develop the Entiat River Outdoor Learning Center located on the Entiat River near its confluence with the Columbia River. This proposal involves the development of day-use and interpretive facilities on the River (City of Entiat 2008). Facilities are anticipated to include parking, education facilities, a swim platform, trails and paddle boat haul-out.

The Entiat Watershed, and specifically an orchard enterprise on the Entiat River, is the geographic area of a pilot study for the Habitat Farming Enterprise Program (HFEP) (GeoEngineers 2007). HFEP is a program being developed by the Initiative for Rural Innovation and Stewardship (IRIS), in cooperation with North Central Washington Resource Conservation and Development, the Entiat Watershed Planning Unit, Cascadia Conservation District, Chelan-Douglas Land Trust, Chelan County, and several other environmental interests. The HFEP pilot is evaluating the benefits and costs of compensating area farmers to grow riparian habitat and accommodate other restoration measures on their property, in lieu of growing marketable crops. The potential of the HFEP to realize significant improvement in shoreline functions is high.

4.11 Audubon Society Efforts

The North Central Washington (NCW) chapter of the Audubon Society is dedicated to furthering the knowledge and conservation of the environment of North Central

Washington, our Nation, and the World (NCW Audubon website). Chapter president, Mark Oswood, expresses the goals, hopes, aspirations, and plans of the NCW Audubon Society to: promote resource decisions based on the best available data; be honest brokers in environmental conflicts; believe that sustainable economies are the only road into the future; believe in citizen science and life-long learning; act as “outside consultants” – leading field trips, holding outdoor classes, and doing “dirt work”; and watch, count and protect birds, “one of the grandest expressions of life” (NCW Audubon website).

NCW Audubon is a frequent contributor and partner in several area events and programs that educate and foster stewardship within the community, including the annual *Leavenworth Spring Bird Fest* and the *Wenatchee River Salmon Festival*. Both of these are venues for a NCW Audubon Society birding simulation activity for kids and families, called “What’s That Bird?” (M. Oswood, e-mail communication, March 7, 2009). NCW Audubon volunteers assist with outdoor education programs at these events and at events for local students, primarily held at the Barn Beach Reserve (in Leavenworth). The NCW chapter of the Audubon Society also participates in the Wenatchee River Watershed (WRIA 45) Planning effort and the Stemilt-Squilchuck Partnership. The *Wild Phlox*, a NCW Audubon Society newsletter (edited by Teri Pieper), reaches approximately 450 members across the four-county (Chelan, Douglas, Okanogan, Ferry) chapter territory, providing monthly environmental updates and opportunities for Audubon birders and environmental enthusiasts alike. More information about the NCW Audubon Society can be found online at <http://www.ncwaudubon.org>.

4.12 Cascadia Conservation District Efforts

Watershed Planning

The Cascadia Conservation District (CCD) (formerly the Chelan County Conservation District) is the lead entity for the Entiat (WRIA 46) watershed planning effort. Since 1993, Entiat area landowners have been working with the CCD to develop local solutions to natural resource issues specific to the basin. The CCD coordinates quarterly Entiat Watershed Planning Unit meetings, monthly Entiat Habitat Sub-Committee meetings, and numerous water quality and quantity meetings. The CCD and its partners generate and update Entiat watershed reports, the Entiat Watershed Plan, and the Entiat Watershed Detailed Implementation Plan.

Land Owner Assistance Program

Numerous projects occur each year, with recent projects along Chumstick Creek, Colockum Creek, Mission Creek, Stemilt Creek, Yaksum Creek, and the Entiat and Wenatchee Rivers (R. Malinowski, personal communication, February 17, 2009). The

CCD has assisted in diverse ways by providing: side channel reconnection, off-channel juvenile salmonid rearing habitat, installation of LWD structures and boulder structures for instream habitat complexity, native riparian plantings to stabilize streambanks and provide canopy cover, installation of livestock fencing, elimination of fish entrainment in irrigation diversions through designing and updating new fish screens, and construction of groundwater wells to replace surface water diversions. Primarily the CCD works with private landowners to enhance riparian areas while providing fish-friendly conveyance to irrigation ditches, thereby reducing annual instream disturbance from diversion maintenance. By installing instream log cross vanes, LWD (with intact rootwads) and boulder clusters, irrigation pools are allowed to form (with fish screens), minimizing diversion impacts to fish and stream habitat. The CCD continues to assist local landowners and watersheds.

Water Metering

In an effort to encourage voluntary compliance with state metering requirements, the CCD has partnered with the Washington State Department of Ecology to provide cost-share funding to assist Chelan County diversion owners with the installation of adequate metering equipment.

Education and Outreach

- *Kids in the Creek*

Cascadia Conservation District participates in the *Kids in the Creek* program that was developed by local volunteers. This program won First Place for 2006 Environmental Education Curriculum from the National Association of Interpretation Media. The objectives of the program show how streams and watersheds work. Students walk away with an understanding of how their actions can affect stream health, in both negative and positive ways. They learn about watersheds, stream habitat, water quality, riparian areas, and macroinvertebrates. More information about the *Kids in the Creek* program can be found online: <http://www.bpa.gov/corporate/KR/ed/kidsinthecreek/homepage.htm>

- *Streamside Property Owner's Guide*

The CCD developed the *Streamside Property Owner's Guide* for the Entiat Watershed to provide county residents with an understanding of the critical riparian habitat along the stream. The guide includes "7 Steps to Stewardship" - a list of contacts and sources of information to assist with riparian planning and activities (R. Malinowski, personal communication, February 17, 2009).

For more details, contact the Cascadia Conservation District by phone (509) 664-9370 or look them up on the internet at <http://www.cascadiacd.org>.

4.13 Chelan-Douglas Land Trust Efforts

Land Protection

The Chelan-Douglas Land Trust (Land Trust) protects lands throughout the County, either through conservation easements or acquisition (B. Bugert, e-mail correspondence, February 13, 2009). Land is eligible for Land Trust protection based on the following qualifying criteria:

- Is it habitat for endangered, threatened or rare species?
- Does it contain exemplary natural ecosystems such as old-growth forests or migratory waterfowl staging/wintering areas?
- Does it include shoreline and riparian areas?
- Does it include wetlands, floodplains, or other lands important for the protection of water quality?
- Is it undeveloped land in close proximity to urban development?
- Does it have important recreational opportunities?
- Does it include parcels that could be connected to greenbelt corridors between privately protected or publicly held properties?
- Does it include unique local scenic viewpoints or outstanding physiographic features that help define the character of our locale and enhance our community's sense of place?
- Is it valuable for timber or agricultural production?
- Is it a heritage site of historic and or prehistoric value?
- Does it include ecosystems of educational or scientific value?
- Is the landowner amenable to the conservation goals of the land trust?

Additional Land Trust protection efforts are described below:

- *Riparian Plantings*

The Land Trust has done work to revegetate riparian habitat along the Entiat River (WRIA 46) at their Cottonwood and Stormy Creek reserves (B. Bugert, e-mail correspondence, February 13, 2009). They are currently collaborating with Chelan County Natural Resources to do riparian plantings along Icicle Creek and potentially future projects throughout the County (B. Bugert, e-mail correspondence, February 13, 2009).

- *Entiat River Valley*

The Land Trust is actively involved in efforts to protect fish habitat, wildlife habitat, and floodplain function along the "*Stillwater*" reach of the Entiat River. The *Stillwater* is a calm stretch of river that contains the majority of the Entiat's spawning and rearing habitat for endangered steelhead, endangered spring chinook salmon, threatened bull trout, and fall chinook salmon. At the urging of

local residents, the Land Trust applied for and received a grant for \$1.4 million from the state Salmon Recovery Funding Board to purchase nearly 300 acres (including nearly three miles of riverfront) of prime fish and wildlife habitat along the Entiat. The Land Trust is working with Entiat Valley residents to develop management plans that will protect the conservation values of these properties in perpetuity (Chelan-Douglas Land Trust website).

Education and Outreach

- *Chelan County Good Neighbor Handbook*

To promote community stewardship, the Land Trust publishes the *Chelan County Good Neighbor Handbook* as a tool to ensure people do their part in keeping the County a special place to live. The handbook is available online at: <http://www.cdlandtrust.org/Good%20Neighbor%20HB%20for%20web.pdf>

- *Workshops*

The Land Trust is working to make the case that land conservation is a good investment for local communities. They believe that, “we do not need to choose between a healthy economy and healthy landscapes” (Chelan-Douglas Land Trust website). As part of this effort, the Land Trust partners with several local organizations to present workshops on various topics ranging from the economy to the environment. Recent workshops cover noxious weeds, sustainable landscaping and insects.

- *Conservation Roundtable, Ag and Environment Dialog, Environmental Film Series*

The Land Trust works closely with a wide variety of landowners, conservation groups, farmers, and resource agencies to develop innovative approaches to natural resource management. The Conservation Roundtable seeks to facilitate communication and collaboration among conservation groups. This dialog fosters understanding and collaboration among farmers, agriculture groups, and environmental groups to promote sustainable, productive, and profitable farms in the region. The Land Trust sponsors a monthly environmental film series (Chelan-Douglas Land Trust website).

The Land Trust is able to work quickly and creatively with local citizens, helping to preserve the unique character of the region and enhance the quality of life for residents, visitors, and future generations. For more details, contact the Chelan-Douglas Land Trust by e-mail: info@cdlandtrust.org or phone: (509) 667-9708.

4.14 Chelan County Public Utility District Efforts

Habitat Conservation Plan

The Chelan County Public Utility District (PUD) is collaborating with local, state, and federal governments; tribes; and private landowners to restore and protect salmon and steelhead habitat in the mid-Columbia and its tributaries. As part of the Habitat Conservation Plan (HCP) Tributary Program, the PUD funds projects to help protect and enhance salmon and steelhead spawning, rearing and migration. These projects will help the PUD meet its HCP commitment of “no-net-impact” to migrating fish.

Potential PUD projects may include bank and shoreline restoration, removal of migration barriers, enhancing stream flows, native riparian plantings, wetland restoration, constructing in-stream habitat structures, acquiring conservation easements or other means to preserve critical floodplain properties, and reconnecting relic side channels to provide rearing habitat (CCPUD website). Any individual or group can propose an HCP project through either of following two funding options. The General Salmon Habitat Program will fund projects costing \$25,000 or more. The Small Projects Program is for projects costing less than \$25,000 and is designed to encourage community groups working in cooperation with landowners (CCPUD website).

The PUD has a new 43-year license for continued operation of the Rocky Reach Hydroelectric Project (issued on February 19, 2009). The new license is based on a settlement agreement submitted to the Federal Energy Regulatory Commission (FERC) on March 17, 2006, between PUD and stakeholders that includes the local communities, state and federal agencies, tribes, and environmental groups. The new license contains requirements for operating the 1,300-megawatt project that are estimated to cost the PUD approximately \$425 million over the 43 years, including continuation of the HCP for salmon and steelhead, maintaining existing parks on the Rocky Reach reservoir, providing renovation of Entiat Park, and enhancements to Lincoln Rock and Daroga State Parks. In addition, the new license has provisions to ensure safe passage of bull trout and lamprey past the dam, research on possible hatchery facilities to supplement the white sturgeon population, an evaluation of resident fish for future recreational fishing, funding for habitat restoration projects on federal and state wildlife lands, and a variety of other actions. (The above information is directly from the CCPUD website).

FERC Licensing

Aside from HCP projects, the PUD is working on three additional efforts as part of the requirements for their FERC relicensing (T. Larson, e-mail communication, March 11, 2009), including the:

1. Dryden off-channel enhancement project (side channel in the Wenatchee River),
1. Chelan River projects: Reach 4 and tailrace habitat enhancement, Low level outlet, and Pump Station, and the
2. Lake Chelan tributary barriers removal and restoration.

For more information about the above projects, contact Jeff Osborn at jeff.osborn@chelanpud.org

Expanding on the above, the PUD has restored a historic Wenatchee River side-channel as off-channel refuge and rearing habitat for salmonids. Located near Dryden, the groundwater-fed channel was enhanced (into pool/riffle habitat with large woody debris) and now provides spawning and rearing habitat. Monitoring reports have identified juvenile chinook and coho salmon and steelhead rearing, and adult coho salmon spawning in the enhanced channel (J. Osborn, personal communication, March 17, 2009). Continued monitoring of the site will include electrofishing and snorkel surveys and the collection of temperature data (J. Osborn, personal communication, March 17, 2009).

The PUD has begun an extensive recovery effort that includes year-round discharge at the Chelan Dam and stream restoration along the Chelan River's lowest reach (Reach 4), near the dam's powerhouse (in the town of Chelan Falls). Year-round flow (minimum 80cfs) will be restored to the Chelan River via a new low-level outlet structure, allowing continuous flow, even when the lake level is below the 1087-foot Chelan Dam elevation (J. Osborn, personal communication, March 17, 2009). With this low-level outlet structure, flow will be provided to the river down to the lakes lowest elevation of 1079 feet (J. Osborn, personal communication, March 17, 2009).

The Reach 4 enhancement includes construction of a new side channel, along the river's right bank. LWD and gravels will be added instream to provide fish refugia and spawning areas, and develop pool/riffle habitats ideal for refuge during the spring high flows (4,000-6,000 cfs) and overwintering habitat for juvenile salmonids. A pump station will also be constructed to pump water from the tailrace upstream into this new side channel, in addition to the guaranteed minimum 80 cfs year-round flow, to provide additional spawning and rearing habitat (J. Osborn, personal communication, March 17, 2009). Native vegetative cover along the new side channel will be improved, adding habitat complexity and contributing to LWD and residual fish recruitment.

Additionally, approximately 1.75 acres of new spawning habitat for chinook salmon and steelhead has been created in the tailrace. Appropriate sized gravel was placed instream during the summer of 2008, and were used heavily by salmon during the fall

spawning period. Monitoring and evaluation of this restoration project and future opportunities will continue. Restoration attention could be focused on the section of the Chelan River downstream of City limits in the 3.9 miles (6.3 km) of steep, rocky gorge downstream of the Chelan Dam.

The PUD has identified various migration barriers (depth, velocity, gradient) for Westslope cutthroat to Lake Chelan tributary streams in the Lucerne basin. Site reconnaissance and site-specific restoration plans are currently being developed for removing these remote alluvial barriers and restoring upstream passage for adult spring spawning cutthroat trout. The PUD plans to start on-the-ground restoration in 2011, addressing two tributaries per year over a five-year period.

Other Projects

The Chelan Wildlife Area currently consists of approximately 32,540 acres of WDFW-owned and -managed lands (WDFW website). Primarily in eastern Chelan County, subunits of the Wildlife Area include the Chelan Butte, Entiat, Swakane and White River subunits. The PUD provided WDFW with funding to purchase 20,397 acres within the Chelan Butte, Entiat, and Swakane subunits (J. Osborn, personal communication, March 17, 2009). These lands have been impacted by past land uses; therefore, the PUD will be restoring 1,400 acres of the Wildlife Area as shrub steppe habitat for the bighorn sheep, mule deer, upland game birds, and numerous other wildlife species that inhabit the area (J. Osborn, personal communication, March 17, 2009). These restored lands may also be utilized for recreation by the community.

The PUD also develops and maintains a number of parks within the County. Several of these parks include boat launches, short-term boat moorage, parking, extensive day use facilities, overnight camping, picnic shelters, restrooms, showers, shoreline trails, tennis courts, playground equipment, and swimming areas. More information about Chelan County PUD habitat and restoration projects can be found online at <http://www.chelanpud.org/habitat-restoration-protection.html>.

Education and Outreach

The PUD offers public tours of the Rocky Reach Hydroelectric Project that begin at the Rocky Reach Visitor Center. These tours include detail about the PUD's fish recovery efforts throughout the Columbia River basin in addition to the dams fish bypass system, assorted hatchery projects and restoration/mitigation projects.

4.16 United States Fish and Wildlife Service Efforts

Restoration

The USFWS has been involved in numerous restoration projects and activities in Chelan County. Currently the USFWS is involved in the implementation of habitat restoration projects associated with the Entiat and Wenatchee Watershed Planning Units, Integrated Status and Effectiveness Monitoring Project (ISEMP), CCNRD, CCD, and the Yakama Nation. The USFWS actively participates on several interdisciplinary teams that work towards Entiat and Wenatchee watershed restoration efforts including: the Upper Columbia Regional Technical Team (RTT), Upper Columbia Salmon Recovery Board, the Mid-Columbia HCP Tributary Sub-Committee and the Priest Rapids Coordinating Committee's Habitat Sub-Committee. The USFWS also provides funding for restoration activities through the Western Native Trout Initiative, the National Fish Passage Program (NFPP), Partners for Fish and Wildlife and the Fisheries Restoration and Irrigation Mitigation Program. More information about the USFWS involvement in these programs can be found online at http://www.fws.gov/pacific/Fisheries/sp_habcon/index.html.

The USFWS acts as an active partner in several stream and riparian restoration efforts along the lower 26 river miles of the Entiat River. In Chelan County, the USFWS is the lead agency on three extensive projects in the Entiat and Wenatchee basins. These projects are summarized below.

- *Entiat River Restoration*

Currently in design phase, the USFWS's Entiat National Fish Hatchery (NFH) is updating hatchery facilities and undertaking a stream enhancement project on the adjacent Entiat River (located at approximately RM 7). The project hopes to improve juvenile rearing habitat (especially during high flow events), increase instream LWD retention, increase stream habitat complexity and off-channel refugia, and improve floodplain connectivity. The hatchery water intake system will be redesigned and will encompass a fish-friendly screen to prevent fish entrapment. There will also be a new public fishing pond (for Kids Fishing Day events) built to facilitate recreation and learning opportunities within the Entiat basin (R. Parrish, personal communication, February 25, 2009).

Education and Outreach

The USFWS's Mid-Columbia FRO is also a lead and partner in several education and outreach programs throughout the County. They inform the public about local restoration efforts, while providing environmental education to the community. The FRO, in cooperation with other agencies, sends out an annual newsletter informing the Entiat community about local watershed projects. The USFWS is involved in several

educational events at both the Entiat and Leavenworth NFHs. For more information about the USFWS's programs and/or reports, contact the Mid-Columbia Fisheries Resource Office (FRO) in Leavenworth at (509) 548-7573 or look online at <http://www.fws.gov/midcolumbiariverfro>.

4.17 United States Forest Service Efforts

Restoration

The USFS is responsible for vegetation/fuel and road management and is an active participant in watershed-level restoration efforts throughout Chelan County. Within the Entiat basin, the USFS provides technical assistance to lead entities involved in in-stream and riparian restoration projects (P. Archibald, personal communication, February 26, 2009).

Education and Outreach

The USFS is implementing its *Respect the River* program that educates recreational users about riparian protection, managing and restoring riparian vegetation, reducing stream bank erosion, and improving floodplain water storage (Chelan County Conservation District 2006).

4.19 Yakama Nation Efforts

Yakama Nation projects throughout the mid- and upper-Columbia's ceded lands follow the tribes mission, "to preserve, protect, enhance, and restore culturally important fish populations and their habitats throughout the Zone of Influence of the Yakama Nation and to protect the rights of Yakama Nation members to utilize these resources as reserved for them in the Treaty of 1855." The Entiat and Wenatchee basins are areas in Chelan County that the Yakama Nation hopes to "demonstrate the fishery benefits of integrated land and water management practices" (Yakama Nation website). Currently the Yakama Nation is involved in an instream habitat enhancement project along the lower Entiat River's keystone reach (B. Rogers, e-mail correspondence, February 19, 2009).

The Yakama Nation's Mid-Columbia Field Station (located in Peshastin) has lead restoration efforts that have successfully returned extirpated coho salmon to the Wenatchee basin. Restoration efforts are focused on upper Wenatchee River tributaries, with rearing at the Leavenworth NFH and naturalized acclimation ponds along Nason Creek. The Yakama Nation also participates in numerous salmon recovery and watershed planning efforts, in addition to the research and monitoring programs for fish species of the watershed, including participation in the ISEMP.

Please see the following website for more information about the Yakama Nation Fisheries program: <http://host119.yakama.com>

5. List of Additional Projects and Programs to Achieve Local Restoration Goals

5.3 City of Entiat

Additional restoration opportunities, not previously mentioned in WRIA and other watershed planning efforts follow:

Waterfront Plan: Implementation of the City's Waterfront Master Plan is expected to result in substantial improvements to shoreline function. The City has worked to balance environmental restoration of the Columbia River waterfront with development of uses that are water-oriented and provide economic return to the community.

Entiat River Outdoor Learning Center: Implementation of the City's Entiat River Outdoor Learning Center plan also has potential for providing environmental restoration paired with public recreation access and environmental education. The current plan includes areas of native vegetation restoration.

Entiat City Park/Silico Saska Park: The redevelopment of this park includes removal of impervious surfaces in or near the water and re-vegetation of disturbed areas with native riparian plantings.

General: Residential shoreline properties on the Columbia River have the potential for improvement of ecological functions through: 1) reduction or modification of shoreline armoring, 2) reduction of overwater cover and in-water structures (grated pier decking, pier size reduction, pile size and quantity reduction, moorage cover removal), 3) improvements to nearshore native vegetative cover, and/or 4) reductions in impervious surface coverage. A combination of native revegetation and bioengineering techniques could be provided to secure the shoreline from excessive erosion.

6. Proposed Implementation Targets and Monitoring Methods

The shoreline areas in Entiat contain commercial, municipal, single-family residential, and public recreation/open space uses. Therefore, efforts should be made to improve and retain shoreline ecological function through the promotion of restoration and healthy practices at all levels, from large-scale users to single-family property owners. The City of Entiat has a very environment-focused plan with a strong restoration and education focus. Continued improvement of shoreline ecological functions along the many shorelines requires a comprehensive watershed approach, which combines all planning and implementation efforts.

The following table outlines possible schedules and funding sources for implementation of a variety of efforts that could improve shoreline ecological function.

Table 1. Implementation Schedule and Funding for Restoration Projects, Programs and Plans.

Restoration Project/Program	Schedule	Funding Source or Commitment
4.10 City Efforts	Restoration and Education/Outreach projects: Ongoing - as funds and opportunities allow	Staff time, materials and assorted funds support these efforts, in addition to the project specific partners and grant/funding arrangements. Examples follow: City of Entiat The Entiat River Outdoor Learning Center is a multi-jurisdictional effort that is funded through in-kind resources from the participants, including the City, and it is also expected that funding will be secured through state grant programs and CCPUD re-licensing funds.
4.11 Audubon Society Efforts	Ongoing	NCW Audubon will continue to contribute and partner in planning efforts and education/outreach opportunities as funding and volunteer time allows.
4.12 Cascadia Conservation District Efforts	Ongoing	The CCD will continue to lead, contribute and partner in planning efforts, project implementation, and education/outreach opportunities as state and grant funding allows.
4.13 Chelan-Douglas Land Trust Efforts	Ongoing	The Land Trust will continue to lead land protection efforts and contribute and partner in planning efforts, project implementation, and education/outreach opportunities as state and grant funding allows.
4.14 Chelan County Public Utilities District Efforts	Ongoing	CCPUD is committed to achieving goals and opportunities identified in the HCP tributary program in addition to projects required as part of their FERC relicensing. CCPUD will continue to support community education and park/recreation opportunities.
4.19 Yakama Nation Efforts	Ongoing	Staff time, materials and assorted funds may be available to support watershed planning, restoration, research, and

Restoration Project/Program	Schedule	Funding Source or Commitment
		monitoring opportunities and partnerships. The Yakama Nation may act as a project specific lead or partner and may provide varying grant/funding sources over time.

City planning staff will track all land use and development activity, including exemptions, within shoreline jurisdiction, and will incorporate actions and programs of other departments as well. Reports will be assembled that provide basic project information, including location, permit type issued, project description, impacts, mitigation (if any), and monitoring outcomes as appropriate. Examples of data categories might include square feet of non-native vegetation removed, square feet of native vegetation planted or maintained, reductions in chemical usage to maintain turf, linear feet of eroding stream bank stabilized through plantings, linear feet of shoreline armoring removed or modified levees, changes to square footage of over-water cover, or number of fish passage barriers corrected.

The report would also recommend or describe relevant updates to City goals and implementation plans, and outline current and ongoing implementation of various programs and restoration actions (by local government or other groups) that relate to watershed health.

The staff reports will be assembled to coincide with Comprehensive Plan updates and will be used, in light of the goals and objectives of the Shoreline Master Program, to determine whether implementation of the SMPs is meeting the basic goal of no net loss of ecological functions relative to the baseline condition established in *Shoreline Inventory and Biologic Critical Areas Reconnaissance* (GeoEngineers 2009). In the long term, the City should be able to demonstrate a net improvement shoreline environments.

Based on the results of these assessments, the City may make recommendations for changes to its SMP.

7. Restoration Priorities

This restoration plan, a phase of the Shoreline Master Program update process (consistent with WAC 173-26-201(2)(f)), includes “goals, policies and actions for restoration of impaired shoreline ecological functions.” Restoration opportunities have been “designed to achieve overall improvements in shoreline ecological functions over time, when compared to the status upon adoption of the master program.” This Restoration Plan demonstrates how specific potential projects match and meet regional or City-wide goals and objectives that contribute or could potentially contribute to improved ecological functions of the shoreline. Prioritization of specific projects and

project types, implementation strategies, and schedules will be based on information found in watershed or basin plans.

The process of prioritizing actions that are geared toward restoration of the City shoreline areas involves balancing ecological goals with a variety of site-specific constraints. Briefly restated, the City environmental protection and restoration goals include 1) protecting watershed processes, water quality and quantity; 2) protecting open/recreational space and the habitats for fish and wildlife; and 3) contributing to ESA listed spring chinook and steelhead conservation and recovery efforts. Constraints that are specific to the City of Entiat include 1) the community's diverse past and present land uses and desires (that includes livestock grazing, orchards, and logging), 2) rivers and streams that have been confined by roads or that have altered flow regimes from the construction of dams and/or irrigation diversions, and 3) the highly developed and armored shorelines along the Columbia River.

Although restoration project/program scheduling has been suggested and summarized, the actual order of implementation may not always correspond with the priority level assigned to that project/program. This discrepancy is caused by a variety of obstacles that interfere with efforts to implement projects in the exact order of their perceived priority. Some projects, such as those associated with riparian planting, are *relatively* inexpensive and easy to permit and should be implemented over the short and intermediate term despite the perception of lower priority than projects involving extensive shoreline restoration or large-scale capital improvement projects. Projects with available funding will be initiated immediately for the worthwhile benefits they provide and to preserve a sense of momentum while permitting, design, site access authorization, and funding for the larger, more complicated, and more expensive projects are under way.

8. References

- Archibald, Phil. U.S. Forest Service. Personal communication. February 26, 2009.
- Bugert, Bob. Executive Director, Chelan- Douglas Land Trust. E-mail correspondence. February 13, 2009.
- CCPUD [Chelan County Public Utilities District] website.
<http://www.chelanpud.org/environmental.html>
- Chelan-Douglas Land Trust website. <http://www.cdlandtrust.org>
- Chelan County Conservation District (CCCD). 2006. Entiat WRIA 46 Detailed Implementation Plan. Prepared for the Entiat WRIA Planning Unit. February 2006.
- Chelan County Conservation District (CCCD). 2004. Entiat WRIA 46 Management Plan. Prepared for the Entiat WRIA Planning Unit. October 2004.
- Chelan-Douglas Land Trust website. <http://www.cdlandtrust.org/>
- City of Entiat. 2008. City of Entiat Waterfront Visioning Process 2008/2009. October.
- City of Entiat. 2007. City of Entiat Comprehensive Land Use Plan. Amended 2007.
- City of Entiat. 2009. Entiat Waterfront Master Plan.
- City of Entiat. 2009. Lake Entiat Waterfront Business District Subarea Plan.
- Davies, Dan. Trout Unlimited – Icicle Chapter. E-mail correspondence. March 9, 2009.
- GeoEngineers, Inc. 2007. Habitat Farming Enterprise Program: Conceptual Riparian and Aquatic Habitat Restoration Plan – Sanray Orchards, Entiat River Valley, Chelan County, WA. Prepared for Initiative for Rural Innovation and Stewardship (IRIS). June 2007.
- Malinowski, Rich. Project Coordinator, Cascadia Conservation District. Personal communication. February 17, 2009.
- NCW Audubon website. <http://www.ncwaudubon.org/>
- Osborn, Jeff. License Program Coordinator, Chelan County Public Utility District (CCPUD). Personal communication. March 17, 2009.
- Oswood, Mark. President, Audubon Society - North Central Washington (NCW) Chapter. E-mail correspondence. March 7, 2009.
- Parrish, Robes. U.S. Fish and Wildlife Service. Personal communication. February 25, 2009.
- Rogers, Brandon. Habitat/Fisheries Biologist, Yakama Nation Fisheries. E-mail correspondence. February 19, 2009.

Silverline Projects, Inc. 2000. Lakeside Trail Feasibility Study. Prepared for City of Chelan. September 28, 2000.

UCSRB [Upper Columbia Salmon Recovery Board]. 2009. Memo from the board members (L. Carlson, B. Towey, J. Morgan, D. Van Marter and C. Baldwin) regarding Funding and Project Coordination of Salmon Recovery Projects in the Upper Columbia and the Development of the Mid-Range Implementation Plan/3-Year Work Plan. January 16, 2009.

UCSRB [Upper Columbia Salmon Recovery Board]. 2007. Upper Columbia Spring Chinook Salmon and Steelhead Recovery Plan. August 2007.

Upper Columbia Salmon Recovery Board (UCSRB). 2005. Draft Upper Columbia Spring Chinook Salmon, Steelhead, and Bull Trout Recovery Plan. December 2005

Upper Columbia Regional Technical Team (UCRTT). 2002. A Biological Strategy to Protect and Restore Salmon Habitat in the Upper Columbia Region, A Report to the Upper Columbia River Salmon Recovery Board. June 2002. Available from the Upper Columbia Salmon Recovery Board, Chelan, Washington.

WDFW [Washington Department of Fish and Wildlife]. 2006. Diversion Screening and Fish Passage Inventory Report for Colockum Creek, Stemilt Creek and Squilchuck Creek. <http://wdfw.wa.gov/hab/tapps/reports/wria40paper.pdf>

WDFW [Washington Department of Fish and Wildlife] website. Wildlife Areas: Chelan Wildlife Area. http://wdfw.wa.gov/lands/wildlife_areas/chelan/index.php

Yakama Nation Fisheries website. <http://host119.yakama.com>

9. List of Acronyms and Abbreviations

BLM.....	U.S. Bureau of Land Management
BOCC	Board of County Commissioners
BOR.....	Bureau of Reclamation
CCD.....	Cascadia Conservation District
CCNRD.....	Chelan County Natural Resource Department
CCPUD	Chelan County Public Utilities District
CDLT.....	Chelan Douglas Land Trust
cfs.....	cubic feet per second
CMZ	channel migration zone
DIP.....	Detailed Implementation Plan
DPS.....	Distinct Population Segment
ESA.....	Endangered Species Act
ESU.....	Evolutionarily Significant Unit
EWPU.....	Entiat Watershed Planning Unit
FEMA.....	Federal Emergency Management Agency
FERC	Federal Energy Regulatory Commission
FRO	Fisheries Resource Office
FWHCA.....	Fish and Wildlife Habitat Conservation Area
GIS.....	Geographic information systems
HFEP	Habitat Farming Enterprise Program
IRIS.....	Initiative for Rural Innovation and Stewardship
ISEMP	Integrated Status and Effectiveness Monitoring Project

LWD.....Large Woody Debris

NEPANational Environmental Policy Act

NFH.....National Fish Hatchery

NOAA FisheriesNational Marine Fisheries Service

NPDESNational Pollutant Discharge Elimination System

NPS.....National Park Service

NRCS.....Natural Resources Conservation Service

OHW/M.....ordinary high water/mark

PUD.....Public Utility District

RCWRevised Code of Washington

SMAShoreline Management Act

SMPShoreline Master Program

UCRTTUpper Columbia Regional Technical Team

UCSRBUpper Columbia Salmon Recovery Board

UGAUrban Growth Area

USFS.....United States Forest Service

USFWS.....U.S. Fish and Wildlife Service

WAC.....Washington Administrative Code

WDFWWashington Department of Fish and Wildlife

WDNRWashington Department of Natural Resources

WRIAWatershed Resource Inventory Area

WWMPWenatchee Watershed Management Plan

APPENDIX F. CUMULATIVE IMPACTS ANALYSIS

Existing Conditions

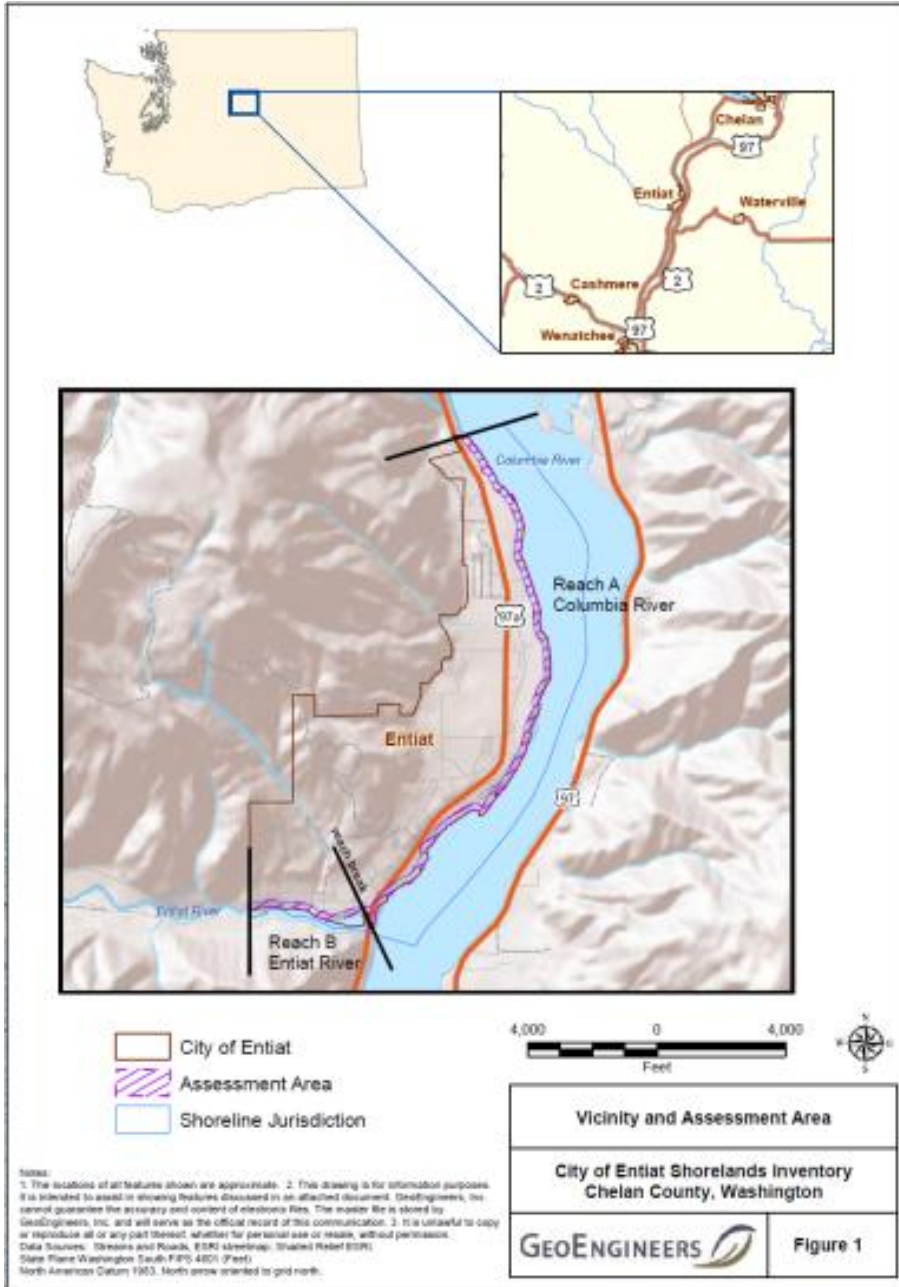


Figure 2. Segment Map



Table 1. Existing Conditions by Segment

Location	Primary Land Use	Habitat Function	Water Quality Function
Reach A Segment 1 – North City of Entiat along the Columbia River	Residential	Shoreline provides access for residents but has been modified for human use with bulkheads, docks, etc. Vegetation is predominantly landscaped lawn and garden with sparsely interspersed ponderosa pine. Little or no habitat function.	Shoreline modification and lawn along a controlled reservoir shoreline. Little or no water quality function.
Reach A Segment 2 – North-Central City of Entiat along the Columbia River	Light Industrial	Vegetation is largely shrub-scrub.	Little or no water quality function.
Reach A Segment 3 – Central City of Entiat along the Columbia River	Mixed – Open space, Residential, and Light Industrial	Vegetation is largely shrub-scrub with some intact riparian vegetation. Minimal habitat function.	Minimal water quality function.
Reach A	Park	Park landscape.	One wetland

Segment 4 – South City of Entiat along the Columbia River		Shoreline has been modified through decades of human use. Little or no habitat function.	within this segment provides water quality function. Remainder of site has no water quality function.
Reach B – Lower Entiat River	Open Space	The shoreline and riparian area along the lower Entiat River provide aquatic, wetland, riparian, and terrestrial habitat. Good habitat function.	Intact wetlands and aquatic habitat. Good water quality function.

Protective Provisions

Development along the shoreline and in the nearshore adjacent to the City of Entiat is regulated by the Entiat Shoreline Master Program; the Entiat Municipal Code, including the Critical Areas Code; and the Chelan County PUD through a flowage easement and FERC licensing restrictions.

Entiat Shoreline Master Program Proposed Regulations

The proposed amendment to the Entiat Shoreline Master Program is a citywide, non-project action that affects activities and development in the city’s shoreline jurisdiction. The City of Entiat contains two jurisdictional shorelines, Lake Entiat (the Columbia River) and the Entiat River. Both waterbodies are shorelines of statewide significance. Shoreline jurisdiction within the City includes all lands extending landward 200 feet in all directions from the OHWM or associated wetlands, as measured on a horizontal plane. The Entiat shoreline jurisdiction also applies to the area waterward of the OHWM to the middle of the Columbia and Entiat Rivers.

The proposed SMP amendment contains six different shoreline environment designations. The shoreline designations are applied to different portions of the

shoreline based on their natural and built characteristics, and existing planned projects. Shoreline environment designations function as an overlay to provide policies and regulations in addition to the development standards and protections afforded in underlying zoning classifications.

The proposed SMP amendment contains development standards and use regulations to be applied in each shoreline environment. Generally, “standards” refer to buffers, height limitations, and design guidelines or preferences. “Use regulations” refer to the allowance or prohibition of specific uses (such as recreational, commercial, or residential development) in each shoreline environment. The standards and regulations address shoreline modifications (such as bulkheads and shoreline stabilization structures, piers and docks, land clearing and grading, etc.) and specific shoreline uses (such as commercial, residential, and recreational development). The SMP development standards also address management and protection of critical areas (wetlands, steep slopes, fish & wildlife habitat, etc.) located in the shoreline. The proposed development standards and use regulations have been carried forward, altered, or newly created from the existing SMP. In some cases, development standards and regulations that occur in other sections of the municipal code have been directly integrated into the SMP.

Entiat Critical Areas Code

The City of Entiat has an adopted Critical Areas code within Title 17 of the Entiat Municipal Code. The process of updating the SMP led to some concerns about the ability of the critical areas code to effectively address critical areas issues within shoreline areas. An amendment to the critical areas code was drafted to improve the coordination between the critical areas regulations and the SMP regulations. Proposed updates to the critical areas code are expected to provide mechanisms to maintain ecological function and values, and to support the SMP.

Chelan County PUD Project Boundary Restrictions

The Chelan County Public Utility District maintains a flowage easement (also known as the Rocky Reach Hydroelectric Project Boundary) along the Columbia River, within the City of Entiat. The PUD requires property owners to apply for permits or leases to place any structures within this flowage easement. The easement line follows the elevation contour, rather than a line on a parcel map. The project boundary elevation along the Entiat shoreline is 712.5 feet.

Planned and Shoreline Potential Development

Planned Public Projects

The majority of the shoreline within City of Entiat jurisdiction is publicly owned. The City of Entiat and the Chelan County PUD are the two public entities that control these holdings. Both entities have undergone substantial planning and public review to create plans for these properties. Additionally, the Cascadia Conservation District (WRIA 46) has identified a salmon habitat enhancement project along the Entiat River shoreline and within the River in its planning documents. A description of each planned project follows, along with an analysis of the impacts and benefits of all of these projects together. All of these projects have been designed with the intention of maintaining or improving ecological function.

PUD/Entiat City Park Renovation

As an obligation of Chelan PUD's 43-year license to operate Rocky Reach Dam, Entiat Park will undergo a major renovation. This park was the first park built by the PUD on the Rocky Reach Reservoir in 1978. Improvements will enhance day use of the park and encourage year-round overnight camping.

Proposed improvements to the park include, but are not limited to the following:

- Demolishing two structurally defective and outdated comfort stations and replacing with two new modern comfort stations
- Replacing existing utility infrastructure: domestic water, waste water, storm water, irrigation and electrical
- Adding a fiber connection for wireless internet
- Expanding and paving the boat launch parking lot
- Removing non-native plant species
- Planting new grass, trees and shrubs
- Reconfiguring traffic circulation in the park
- Reconfiguring, expanding and constructing 31 new RV sites, 29 of which will be full service hook ups (sewer, water and 50 Amp electrical).
- Constructing 26 new tent and 12 picnic sites
- Constructing two new entrance sign features
- Adding a new self-serve pay station at the main entry
- Erection of a statue depicting Chief Silico Saska
- Expanding the existing playground

Upon completion of the project, runoff is expected to be limited to that from the existing and new asphalt/concrete (impervious surfaces). A bio-swale will be included in the construction of the boat launch parking area.

Chelan PUD plans the planting of numerous native trees, shrubs, ground covers, vines, bulbs, and grasses as part of the project.

To minimize impacts from construction on ESA listed species and their critical habitat, the Chelan PUD will implement the following Best Management Practices:

- The use of clean fill materials will minimize the impacts to the water quality of the Columbia River during construction.
- All fueling of equipment will occur off-site in a paved parking lot away from the water.
- To ensure that no petroleum products, hydraulic fluids, machinery coolants, chemicals, or other toxic or deleterious materials are allowed to enter the water, all equipment used will be inspected daily for signs of leaks and will be repaired if necessary before returning to work.
- An erosion and sediment control plan will developed and adhered to during construction activities.

The shoreline restoration will include:

1. Removal of the asphalt and concrete surfacing amounting to 352 cubic yards below OHW (18,330 square feet).
2. Placement of 185 cubic yards of substrate enhancement below OHW (6" thick layer of pea gravel spread over approximately 10,000 square feet).
3. Shoreline riparian enhancement (landward of OHW) equal to 1,433 lineal feet of shoreline (44,850 square feet).
4. Placement of large woody debris in select locations.
5. Shoreline segments subject to erosion will be treated with bio-engineered methods involving the use of coir logs and fabric, plant cuttings (live stakes), and straw wattles (landward of OHW).

The work proposed under this application also includes improving a public boat launch and restoring shoreline. The improvements to the boat launch consist of adding a second launch lane and removing and replacing existing floats and piles. The shoreline restoration work includes removal of asphalt and concrete, bio-engineered shoreline stabilization and restoration of riparian vegetation.

All excavation and fill material will be removed/placed through the use of a track hoe excavator. There are multiple means and methods in which a Contractor can use the excavator depending on what the permit allows.

The existing boat launch consists of a single lane boat ramp and floats. The ramp is comprised of a 18'-2''' by 20' concrete slab (ramp anchor) and 28 pre-cast push-in-place concrete planks with dimensions of 4'x12' each situated on a structural steel rail assembly. There are five existing floats, three of which have dimensions of 5.5' by 16' and two floats of dimensions 7.25' by 25' (total footprint equal to 630 SF of which approximately 600 SF is waterward of OHW). The existing float materials consist primarily of wood and plexi-glass with rubber tire floats held in place by six independent wood piles sheathed with white pvc and caps. The existing floats, installed in 1999, do not meet the current Corps of Engineers light passage standards.

The general method and sequence of construction will be as follows:

1. Placement of turbidity curtain to contain entire work area.
2. Removal of existing floats.
3. Removal and/or cutting of 6 existing wood piles. If removed, then a portion of the excavated material will be used to fill void. If piles require cutting then a saw approved for underwater use will cut piles as close to excavated (finished) grade as reasonable.
4. Excavation of approximately 200 cubic yards of rock and sediment below OHW to achieve desirable launching grade of approximately 10%.
5. Installation of five new 12" diameter steel piles using a barge mounted pile driver. Steel piles to receive white pvc wrap and anti-perch cap.
6. Placement of 45 cubic yards of 1¼" to 2" crushed rock foundation gravel 12" deep.
7. Installation of steel rail assembly (2 W6x15 longitudinal rails and 8 W6x15 steel tie beams). These could be placed by crane or an excavator, depending on reach capabilities. Typically there is a diver in the water to assist in placement.
8. Placement of 22 cubic yards of ¾" crushed rock in and around rail assembly.
9. Placement of nineteen 4'x15' push-in-place pre-cast concrete launch panels (2.38 cubic yards per panel, 19 panels total equal to 4.76 cubic yards landward of finished OHW contour and 40.46 cubic yards waterward of OHW finished contour). These launch panels will be slid down the steel rails.
10. Placement of 5 cubic yards of 24" to 30" rock fill at end of ramp.

11. Placement of 60 cubic yards of 3" to 5" ballast rock fill at end and along sides of ramp.

12. Installation of one 10'x 20' float and two 10'x40' floats (total area equal to 1,000 SF waterward of OHW). Materials include aluminum bull rail, composite board Whaler rubboard and global grid ADA 1060 grating to meet the light penetration standard. EPS filled float HDPE pontoon tubs colored white. Total footprint equal to 1,000 square feet. Floats will be placed in the water by crane and floated into place.

13. Install 4'x25' open grating aluminum gangway by the use of a crane.

All excavation and fill material will be removed/placed through the use of a track hoe excavator. There are multiple means and methods in which a Contractor can use the excavator depending on what the permit allows.

PUD trail connection under US 97A at Entiat River Bridge

The proposed Entiatqua Trail is a bike and pedestrian path located at the confluence of the Entiat and Columbia Rivers. The trail site parallels the Rocky Reach Reservoir and the Entiat River along an existing earth embankment which supports the Cascade and Columbia Railroad and State Highway 97A.

Features include:

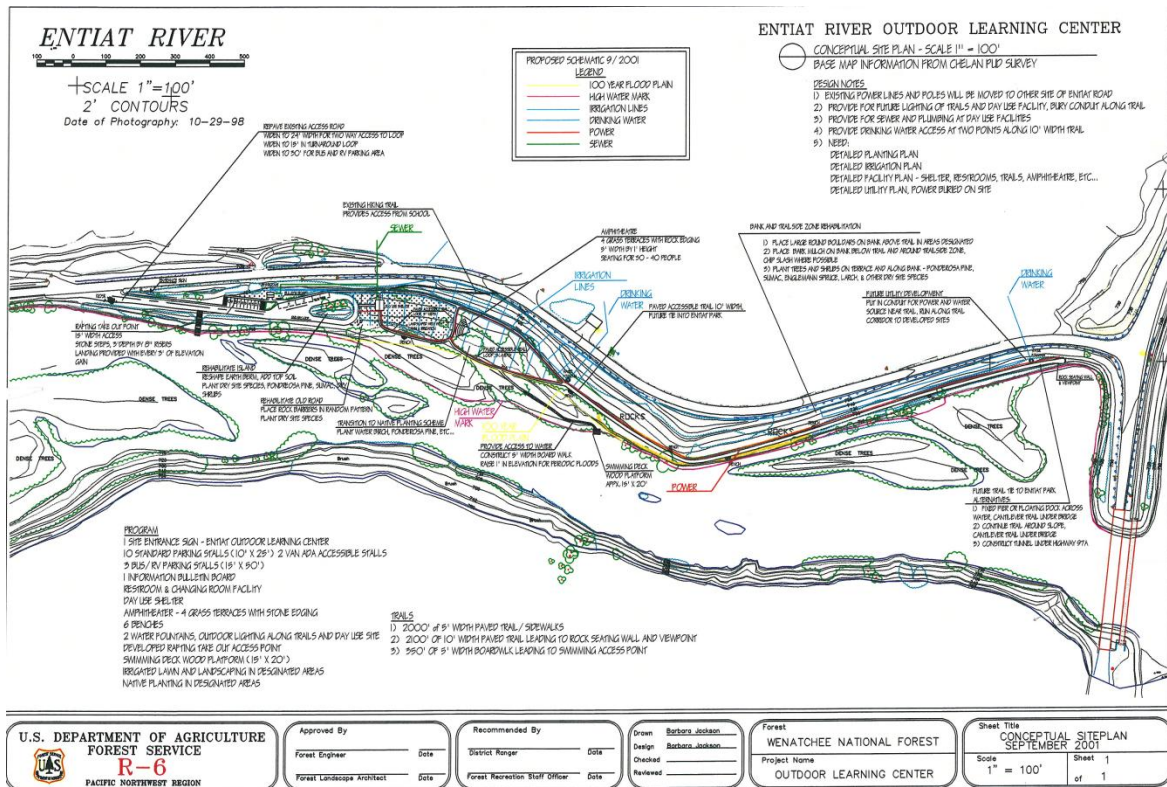
- Trail Dimensions – The trail will be six (6) feet wide with one (1) foot shoulders on each side. The total length of the trail is approximately 1,650 feet long. The length was modified as described in the Recreation Management Plan.
- Trail Surface – The trail will have a compacted aggregate surface.
- Trail Structure - Development of the trail along the existing steep embankment will necessitate terracing by means of rockery walls, pre-cast concrete retaining wall systems, soil bags and gabion baskets.
- Mitigation – Mitigation for project shoreline impacts will entail development of a riparian planting corridor and placement of large woody debris including logs and rootwads. Riparian plants will include native grasses, shrubs and trees.
- Viewpoint – A viewpoint with an interpretive sign and bench will be located along the trail as illustrated in Figure 1. The interpretative sign will highlight the local Native American History.
- Fencing – A 6 foot high chain link fence will be located on the uphill side of the trail. A three rail wood fence will be located on the downhill side of the trail.

Entiat River Outdoor Learning Center and Trail

This trail area is currently used by Entiat Schools for science education programs at the Entiat River. It is also a community trail used to access the Entiat River for fishing, swimming, and kayaking. The project would widen, level, and pave the trail to provide

better, safer access for all users. As it connects to the Chelan County PUD's highway undercrossing, the Entiat River trail will provide the link for school children, local residents, and cyclists to access the waterfront trail and park without crossing US 97A at grade.

The project is designed to include an outdoor education station, restroom, drinking fountain, and enhancements to natural areas and salmon rearing areas. (See drawing.)



City of Entiat Waterfront Development

The project improvements will provide an access road, a parking lot, a restroom, and over 6,000 linear feet of trail, and two touch points along Lake Entiat's shoreline. Together, these amenities will create public shoreline access and opportunities for recreation in an area in which neither currently exists. Additionally, approximately 1.4 acres of the site will be planted with native species, creating new riparian and upland plant communities and enhancing a small, existing riparian plant community.

The project will include the following types of plantings:

1. Riparian habitat enhancement (planting within existing habitat): 0.34 acres
2. Riparian habitat creation (planting where no native habitat currently exists): 0.4 acres
3. Upland habitat creation (planting where no native habitat currently exists): 0.62 acres

Cascadia Conservation District Salmon Project

The goal of this project is to design geomorphically appropriate instream habitat treatments to enrich habitat complexity within 1.5 river miles of the Lower Entiat River. The objectives of the project are to increase summer and winter rearing habitat for juvenile steelhead and spring Chinook salmon, and increase resting and holding areas for various life stages of spring Chinook salmon, steelhead, and bull trout.

The location of this design only project proposal is within Reach 1B, between river mile (RM) 0.8 and 2.3, of the lower Entiat River near the City of Entiat in Chelan County, Washington. The treatments being considered for design occur within the main stem and include off channel reconnection/enhancement opportunities within the approximate 1.5 mile stretch of river.

The current site condition within the 1.5 mile project area generally consists of fruit orchard and low density single family residential development. Below the downstream end of the site (RM 0.8) is the boundary between Reach 1A and 1B. Reach 1A is the backwater area from Lake Entiat of the Columbia River, influenced by the effects of Rocky Reach Dam. The project area is within Reach 1B, which has been described as moderately confined, with moderate channel complexity representing the best opportunity within Valley Segment 1 (RM 0.0 to 16.1) for habitat improvement (Entiat Tributary Assessment 2009). Within the proposed project area there is one bridge crossing at approximately RM 1.6 that provides access to the Keystone Ranch property.

The primary nature of the habitat problem with the lower Entiat River is habitat simplification through a combination of natural and anthropogenic influences. Those influences have created an artificially high width-to-depth ratio that provides suitable flood-conveyance function, but generates a predominantly riffle-glide habitat type with large bed elements and little large woody material (LWM). A major source of the problem within the Lower Entiat lies in its condition as an underfit river, defined as “a relatively small stream flowing through a valley formed by and over sediment deposited from a much larger river” (USBR Lower Entiat Reach Assessment, 2012). The lower reach has been identified as a confined incised system, generally disconnected from flood terraces or active floodplain, with heavily armored bed and banks, plane bed form, steep gradient, and low sinuosity (USBR 2012).

At low flow, average water depth consistently ranges around 2 feet or less, with little variance across the entire channel (USBR 2012). The existing condition is such that the lower Entiat acts most like a transport system, transporting sediment, wood, and fish through the reach without providing

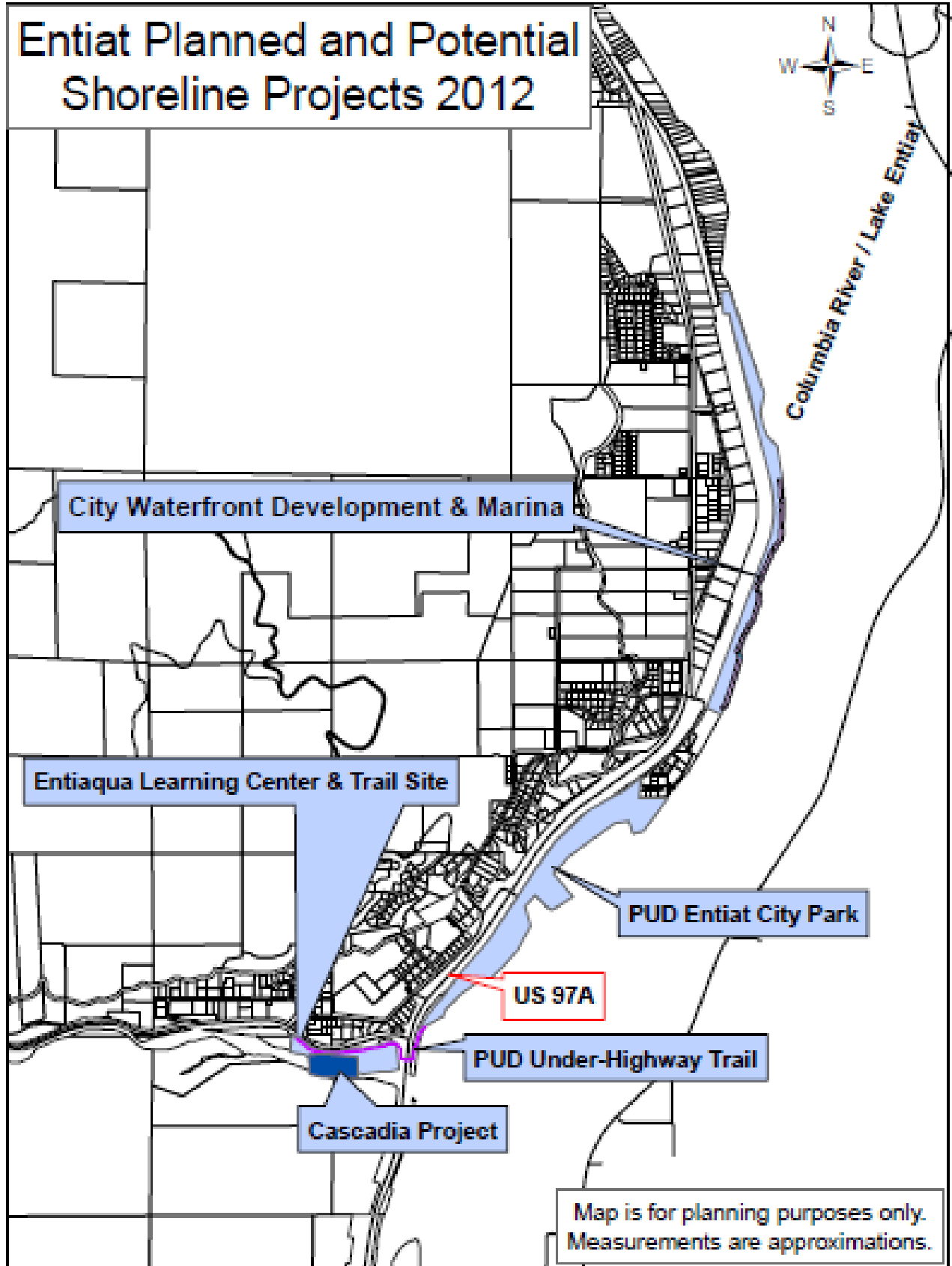
opportunity for the capture and deposition of bedload, channel migration, high- and low-flow rearing habitat formation, or high-flow refugia. The gradient of the lower reach assessment area also contributes to the incised condition, with an average gradient measured at 1.1 percent between RM 7.0 and 3.7, which then reduces downstream to 0.9 percent at the flat backwater area of the Columbia River near RM 0.6 (USBR 2012).

The project objectives will address bed form diversity and increasing side channel habitat. This is achieved by the placement of boulder clusters in geomorphically appropriate locations and the installation of habitat logs to increase cover and roughness along channel margins. The reconnection of side-channel habitat is an important solution to improving habitat conditions, by enabling salmonids to utilize off-channel habitat, the availability of which is already limited due to the incised condition of the lower reach. The objective is to provide short-term benefits to salmonid habitat by creating instream complexity with associated habitat benefits. Ultimately the project design objectives are to foster long-term habitat forming processes to facilitate the natural formation and retention of a variety of habitat types necessary for rearing, resting, and holding areas. Habitat types include pocket pools behind large boulder clusters, habitat logs along channel margins, log jams, healthy riparian corridors, and connected off-channel habitat.

Cumulative Assessment of Planned and Proposed Public Projects

The map below identifies the projects currently in planning and development within City of Entiat shoreline jurisdiction. The efforts to preserve and enhance shoreline ecological function that are built in to each of the public projects are expected to result in a net gain of shoreline ecological function as projects are completed. A net effect analysis follows.

Entiat Planned and Potential Shoreline Projects 2012



Potential for Unplanned Projects – Full Build Out

A portion of shoreline within the City of Entiat is privately owned and designated as low-density residential. There are two areas of low-density residential development. An area at the north end of the city limits, just north of the City's waterfront development project, includes 46 private parcels located directly on the Columbia River (Lake Entiat) shoreline. An area south of the City development and north of the PUD's park renovation project contains 10 private parcels within shoreline jurisdiction, most of which are separated from the water by Chelan County PUD lands. Of the 56 private parcels, all but 6 have single-family homes. Most of the residential properties on the water have single- or joint-use docks and boat lifts, several have hard shoreline armoring, and some have private boat launches. The 2010 inventory includes a photo study that depicts the existing shoreline characteristics of the residential area. Some new homes and docks have been built since the completion of the 2010 study. The potential for future degradation of the shoreline in the residential area is limited, due to the level of current build out and lack of available land. None of the lots in shoreline jurisdiction are large enough to subdivide into multiple lots. This analysis continues with the assumption that 6 shoreline residential lots may be developable in the future.

The following graphic identifies substantial structures along the shoreline, which include docks, launches, and armoring.



Net Effect on Shoreline Functions and Values

Overall, the planned public projects will create a positive net effect on the shoreline functions and values, as well as the general wildlife habitat value and water quality along the City shorelines. Between the City of Entiat and the Chelan County Public Utility District, approximately 17,500 feet of the approximately 23,500 feet of shoreline in the Entiat city limits will be enhanced or improved. That equates to nearly 75% of the total shoreline within the Entiat city limits. All of these publicly owned shorelines will be protected and maintained by the owners over the long term. The Chelan County PUD, as a condition of licensing for the Rocky Reach Hydroelectric project, is required by FERC to maintain project elements on PUD land. The City of Entiat will be required to project elements in perpetuity as a condition of the project funding through the Recreation Conservation Office.

Table 2. Estimate of Shoreline Functions and Values at Full Build-out of Entire Shoreline

	Reach A Segment 1	Reach A Segment 2	Reach A Segment 3	Reach A Segment 4	Reach B
2010 Baseline					
Shoreline Process and Function	Residential with shoreline structures and lawn. Little or no habitat or water quality function.	Vegetation is largely shrub-scrub. Little or no water quality function.	Vegetation is largely shrub-scrub with some intact vegetation. Minimal habitat function. Minimal water quality function.	Park – former city center. Shoreline modified through decades of use. Little or no habitat function. One wetland, but no other water quality function.	Good aquatic, wetland, and riparian habitat function. Good water quality function.
Resources at Risk	Minimal to no resources at risk.	Minimal to no resources at risk.	Minimal water quality and habitat resources at risk.	Wetland resource at risk.	Aquatic and upland habitat, wetland, riparian, and water quality function at risk.
Shoreline Alternations Impacting Processes and	Potential for 6-8 single family home and possibly 4 private	Sparsely vegetated shoreline will be improved and	No proposed or anticipated actions in this area.	Park renovation will remove existing impervious	Construction of impervious surfaces at outdoor

Functions	dock.	enhanced with native plantings. Marina dredging and excavation will create impact prior to shoreline enhancement .	City's waste treatment plant is complete. Residential area is built out. Shoreline belonging to PUD is static.	surfaces in and near the water, restore vegetation with native plantings, and remove invasive species. Trail, restrooms, RV spaces, buildings, and road will all be removed and replaced. Construction has potential for water quality impact.	learning center has the potential to impact habitat and water quality. Cascadia instream project will improve habitat and enrich habitat complexity.
Proposed Restoration / Protection Measures & Draft SMP Policies and Regulations	Mitigation required by federal agencies is vegetation of equivalent square footage of impact and one-to-one replacement of trees.	Mitigation required by agencies for marina development . SMP regulations related to shoreline structures. Entiat Critical Areas	SMP regulations and critical areas codes would apply to any proposed measures within this area.	SMP regulations for fill and grade, shoreline structures, road and parking, etc. Federal agency permits and mitigation	SMP regulations for use in a natural area, PUD project boundary development restrictions, Entiat Critical Areas code, and other

		code.		required for in-water work. NPDES and erosion control BMPs.	state and federal regulations will apply to the protection and development of this area.
Non-Regulatory Measures	Chelan County PUD flowage easement restricts development of permanent structures.	Shoreline restoration with native plantings is a non-regulatory element of the waterfront development plan.	Chelan County PUD flowage easement restricts development of permanent structures.		Cascadia Conservation District's in stream project is a non-regulatory action that will improve habitat.
Net Effect on Shoreline Functions and Values	No immediate impact with mitigation, no improvement of functions and values. Probable degradation over time with existing and new residential uses. Total of approximately	Shoreline restoration plantings and marina mitigation will create new areas of habitat and improvements to water quality. Development will improve public access.	No immediate impact. PUD project land provides a buffer between residential area. Potential degradation over time with existing treatment	Park renovation will result in less impervious surface, more native plantings and wetland protection, and improved public access.	Upland development is expected to be mitigated by plantings and habitat development that are part of both the Learning Center project and the Cascadia project.

	y 6,000 feet of shoreline in this residential area.		plant.		Long term effect on shoreline functions and values is expected to be improvement.