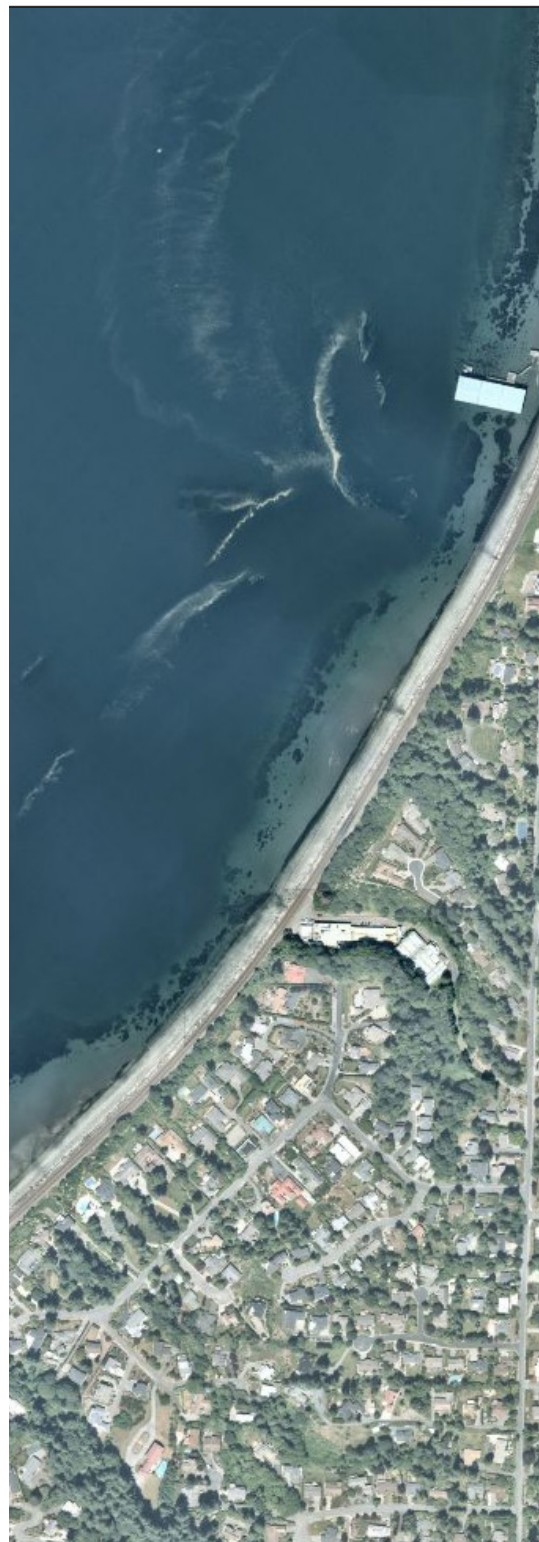




SHORELINE MASTER PROGRAM



2018 Periodic Update



LYNNWOOD SHORELINE MASTER PROGRAM

Adopted in 2011 by Ordinance No. 2890
Updated in 2018 and adopted by Ordinance No. TBD



Photo courtesy of Department of Ecology





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SECTION I. INTRODUCTION

A. SHORELINE MANAGEMENT ACT

Washington’s Shoreline Management Act (SMA) was adopted by the State Legislature in 1971 and by the public in a 1972 referendum. The goal of the SMA is “to prevent the inherent harm in an uncoordinated and piecemeal development of the state’s shorelines.” The Act establishes broad policy giving preferences to uses that: protect the quality of water and the natural environment, depend on proximity to the shoreline, and preserve and enhance public access or increase public shoreline recreational opportunities. In Lynnwood, the SMA applies to the marine waters of the Puget Sound and the land beneath them, and the shorelands extending 200 feet inland from the ordinary high water mark (OHWM) of the Sound. The exact extent of shoreline jurisdiction will be determined at the time of permitting for a particular project. Areas undesignated in the Shoreline Master Program will have a conservancy designation.

The SMA contains the following major policy provisions:

- 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.
- Planning for and fostering all reasonable and appropriate uses of the shoreline.
- Protecting public rights of navigation, and public access to the shoreline and enhancing the public interest.

The SMA balances authority between local and state governments. Cities and counties are the primary regulators, but the state, through the Department of Ecology (*Ecology*), has authority to review local programs and decisions. Under the SMA, each city and county adopts a shoreline master program (SMP) based on state guidelines but tailored to the specific needs of the community. Local SMP’s combine both plans and regulations. The plans are a comprehensive vision of how shoreline areas will be used and developed over time. Regulations are the standards shoreline projects and uses must meet.

Lynnwood has been required to have a SMP since 1972. For reasons unknown, a SMP was not adopted until 2011. This document fulfills the City’s obligation under the SMA. An update was undertaken in 2018.

B. PUBLIC AND AGENCY PARTICIPATION

ORIGINAL PUBLIC AND AGENCY PARTICIPATION PROCESS

The Shoreline Management Act and Growth Management Act mandate that preparation of the Lynnwood Shoreline Master Program include a public participation process that ensures all interested parties a meaningful opportunity to participate. Actions were taken early in the planning process for the Lynnwood SMP to ensure such opportunities were provided for any and all interested parties. The Lynnwood Planning Commission served as the Citizen Involvement Committee and directed that wide notice about

47 the planning process be given residents around the shoreline jurisdiction (the area within Lynnwood's
48 shoreline jurisdiction has no residents).

49
50 All meetings where the SMP was on the agenda were given proper public notice. Residents within an area
51 extending six hundred feet beyond the project area were given notice of the planning process and
52 individual meetings. Notice was also given to local, state, and federal agencies likely to be interested; and
53 to Indian tribes and other organizations.

54
55 In summary, citizen comment on the project has been limited. Only a few citizens from the area around
56 the project called, wrote, or attended meetings. Most interest centered on ensuring operation of the
57 Lynnwood wastewater treatment facility giving vigilant attention to odor and noise control. With the
58 exception of *Ecology* and the City of Edmonds, interest from local and state agencies has also been
59 minimal.

60
61 **PERIODIC REVIEW PUBLIC AND AGENCY PARTICIPATION PROCESS**

62
63 Cities are required by state law (RCW 90.58.080) to update their SMPs every eight years. In 2018 the
64 City of Lynnwood began the process of reviewing and updating necessary changes to the adopted SMP.
65 Again, notice was provided to residents within a six-hundred-foot buffer of the project area. Notice was
66 also given to local, state, and federal agencies likely to be interested; and to Indian tribes and other
67 organizations. Within the review period one agency, the Muckleshoot Indian Tribe, expressed interest in
68 the overall update process.

69
70 Project records and meeting notices are available for inspection at the offices of the Lynnwood
71 Community Development Department.

72

73 **C. LEGAL FRAMEWORK AND APPLICABILITY OF SMP**

74
75 The Shoreline Master Program policies are more than guidelines. They are regulations that must be
76 followed, and are as enforceable as regulations.

77
78 In most circumstances, the SMP applies only to the area of shoreline jurisdiction defined by the Shoreline
79 Management Act (SMA). However, SMP policies and regulations may in some circumstances apply to
80 areas outside SMA jurisdiction when the use of outside areas impacts areas within the shoreline
81 jurisdiction in violation of SMP policies and regulations.

82

83 **D. SMP RELATIONSHIP TO OTHER REGULATIONS**

84
85 The Shoreline Master Program policies and regulations are in addition to any other Lynnwood Municipal
86 Code (LMC) regulations applying to the subject area. If there is a conflict between the SMP and other
87 regulations, the SMP shall be the controlling document. Appendix C (pg. C-8) gives a more complete
88 description of the relationship between the various regulations.

89

90 **E. PHYSICAL AND ENVIRONMENTAL CONTEXT**

91
92 The City of Lynnwood’s Puget Sound shoreline and adjacent shorelands are within a seven-acre enclave
93 which is noncontiguous to and west of the main part of the City. This small part of Lynnwood is
94 surrounded on the north, east, and south by the City of Edmonds. The principal uses within this part of
95 Lynnwood are the City’s wastewater treatment facility, the Burlington North & Santa Fe (BNSF) Railway
96 mainline, and Puget Sound shoreline and tidelands. All uses in the area pre-date passage of the SMA.
97

98 The Puget Sound shoreline in this location runs north-northeast to south-southwest, with the Sound on the
99 west and land to the east. The BNSF railway tracks parallel the shoreline in a narrow corridor between the
100 toe of a 100-foot high bluff on the east, and Sound tidelands on the west. At high tide, there is little, if
101 any, exposed land west of the railroad track bed. The City’s wastewater treatment facilities are in a
102 narrow, steep sided ravine extending east from the bluff. The wastewater treatment facility outfall runs
103 under the track bed and 1,000 feet offshore into the Sound, and discharges at a depth of approximately
104 120 feet. A small stream runs through the City property. In its upper reaches, the stream is in an open
105 streambed. Near the treatment facility, it enters underground piping which carries the stream water under
106 and around the treatment facility then passes under the track bed in a large concrete pipe exiting the pipe
107 west of the tracks onto the tidelands.
108



109 The BNSF railway
110 completely bars access to the
111 shoreline from the Lynnwood
112 landside. No vehicular or
113 pedestrian access is allowed
114 across the railway tracks. The
115 City has an access easement
116 east of the tracks that permits
117 limited vehicular access
118 between the north and south
119 sides of the treatment plant.
120 This limited access easement
121 does not allow access on or
122 across the tracks. The City’s
123 wastewater treatment
124 facilities establish a further
125 barrier to access. The
126 treatment facilities are fenced
127 and gated; only authorized
128 personnel may enter the
129 property. Public access into
130 the treatment plant site is
131 necessarily limited due to the
132 potentially hazardous nature
133 of plant operations. These
134 barriers make it unlikely that
135 future pedestrian or vehicular
136 access to the Lynnwood

137 shoreline will or even could be provided via the landside in Lynnwood. The closest approved railroad
138 crossing is approximately one mile north of the Lynnwood shoreline at Meadowdale Beach County Park.
139

140 The area of Lynnwood subject to the SMA may be one of the smallest in the state required to have a
141 Shoreline Master Program. The 4.2-acre area under current shoreline jurisdiction has a limited number of
142 existing uses and property owners. Few, if any, land use changes are anticipated and pressure to bring
143 about change is minimal. The character of the shoreline is uniform and opportunities for either
144 degradation or enhancement limited. Under these circumstances, it would seem that a Shoreline Master
145 Program fully complying with the SMA should be brief, simple and straightforward. However, the
146 complexity of the SMA and its implementing regulations dictate the content, length, and complexity of
147 this plan. An abbreviated process or program is not provided for under the SMA.
148

149 **F. HOW TO USE THIS DOCUMENT**

150
151 Users of this Shoreline Master Program are encouraged to start with the Goals listed in Section 2. The
152 Goals describe the end state, or continuing condition, the SMP is intended to achieve. The next stop, in
153 logical progression, should be Section 3 where the Environment Designations are described. Then,
154 breaking with linear progression, it may help most to turn to Section 5 where permissible shoreline uses
155 are listed. With the foregoing as background, the reader is then prepared to tackle the detail of the policies
156 and regulations.
157

158 **G. REGULATIONS NOT APPLICABLE**

159
160 The area of shoreline jurisdiction in Lynnwood is geographically small and the range of natural features
161 and human uses limited. Therefore, some parts of the WAC 173-26-221 thru 241 are not applicable to the
162 Lynnwood SMP. In general, regulations for agriculture, forestry, mining, breakwaters, commercial and
163 residential development and regulations in WAC 173-26-221 for critical freshwater habitat, aquifer
164 recharge areas, do not apply as these conditions do not exist in the Lynnwood shoreline jurisdiction.
165

166 **H. ANNEXATIONS**

167
168 This plan was partly written recognizing that the City of Lynnwood could at some point annex areas lying
169 within the shoreline jurisdiction. Some uses listed and regulated herein are only likely to become
170 applicable in the event of annexation, as the entirety of Lynnwood's existing shoreline area, except the
171 tidelands, is occupied by the wastewater treatment plant and railroad, and the probability of these uses
172 being redeveloped is remote.
173

174 There has been some discussion of a "cross-annexation" between Lynnwood and the surrounding City of
175 Edmonds with Edmonds annexing the tidelands and railroad property south of the wastewater treatment
176 plant, and Lynnwood annexing some upland (out of the shoreline jurisdiction) properties it owns adjacent
177 to the wastewater plant. As of the adoption of this Master Program these plans have not gone beyond the
178 speculation stage.

179

SECTION 2. GOALS

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181

182 A. MASTER GOAL

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189

The Puget Sound shoreline is among the most valuable, scarce, and fragile of our natural resources. It is the intent of this Shoreline Master Program to manage the shoreline giving preference to water-dependent and water-related uses and encourage development and other activities to co-exist in harmony with natural conditions. Uses that result in long-term over short-term benefits are preferred, as are uses which promote sustainable development.

190 B. SHORELINE USE GOALS

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1. Reserve shoreline and water areas particularly suited for specific and appropriate uses - especially water-oriented and water-dependent uses, for such uses existing and potential.
2. Establish and implement policies and regulations for shoreline use consistent with the Shoreline Management Act of 1971. These policies and regulations should ensure the overall land use pattern in the shoreline area is compatible with existing shoreline environment designations and will be sensitive to and not degrade habitat and ecological systems and other shoreline resources.
3. Ensure proposed shoreline uses do not minimize the rights of others or infringe on rights of private ownership.
4. Encourage restoration of shoreline areas that have been degraded or diminished in ecological value and functions by past activities or catastrophic events.
5. Ensure that planning, zoning, and other regulatory and non-regulatory programs governing lands adjacent to shoreline jurisdictions are consistent with SMA policies and regulations and the provisions of this SMP.

210 C. ECONOMIC DEVELOPMENT GOAL

211
212
213
214

Allow continuation and enhancement of existing uses consistent with achieving other goals for preservation and conservation of resources.

215 D. PUBLIC ACCESS GOALS

216
217
218
219
220
221
222

Note: While the City of Lynnwood supports the goals of the Shoreline Management Act to “increase public access to publicly owned areas of the shoreline” (RCW 90.58.020(5)), a reading of Section 1E (above) reveals that it is neither legal, safe, nor practical to encourage general physical access to the shoreline area from the upland area within the City of Lynnwood as it now exists due to topography and the uses along the shoreline.

- 223 1. Provide opportunities for the public to view and enjoy the amenities of the shoreline area
224 consistent with:
225
226 a. Private property rights including but not limited to the legal right of the BNSF to prohibit
227 public access across their right-of-way;
228
229 b. Public health and safety concerns including but not limited to the necessity for the City to
230 prevent unescorted access within the wastewater treatment plant, grounds, and of the BNSF
231 to prevent crossing of or access along the railroad tracks;
232
233 c. Over-burdening fragile natural resources; and
234
235 d. Prevention of other public nuisances.
236
237 2. Maintain public shoreline and tidelands in public ownership for continued public use.
238
239 3. Enhance and preserve public views from shoreline upland areas. Enhancement of views should
240 not be construed to mean excessive removal of vegetation which partially impairs views.
241
242 4. Provide opportunities for escorted (guided tour) access to the wastewater treatment plant and
243 adjacent shoreline area as may be practical within staffing limitations.
244

245 **E. CIRCULATION GOALS**

- 246
247 1. Provide for safe and efficient movement of people and goods within the shoreline area while
248 recognizing and enhancing the unique, fragile, and scenic character of the shoreline area with
249 minimum disruption to the shoreline environment and minimum conflict between different uses.
250
251 2. Provide for emergency services access to the shoreline area.
252

253 **F. RECREATION GOAL**

254
255 Provide public recreational opportunities in the shoreline area consistent with protection of shoreline
256 resources, and the limitations of safe access. However, it is not at this time a goal of this plan to
257 encourage or plan for recreational use within or adjacent to the wastewater treatment plant or BNSF
258 railroad right-of-way.
259

260 **G. CONSERVATION GOAL**

261
262 Protect and enhance unique and fragile areas of flora and fauna and scenic vistas to help assure continued
263 availability of these resources for future generations.
264

265

266 **H. HISTORIC AND CULTURAL VALUES GOAL**

267

268 Identify, protect, preserve, and restore important archaeological, historical, art and cultural sites within the
269 shoreline jurisdiction area for educational and scientific use and enjoyment by the general public.
270

271 **I. RESTORATION OF IMPAIRED ECOLOGICAL FUNCTIONS GOALS**

272

273

1. Assure no net loss of shoreline ecological functions.

274

275

2. Restore impaired ecological functions within reasonable limits of both biological science and cost effectiveness.

276

277

278

3. Prepare, adopt, and implement a restoration plan which prioritizes and targets ecological functions most in need of restoration. (See Appendix E – Restoration Plan)

279

280

281

SECTION 3. ENVIRONMENT DESIGNATIONS

A. ENVIRONMENT DESIGNATION CLASSIFICATION REQUIREMENTS

Shoreline Master Programs are required by state regulations to classify shoreline areas into specific environment designations. The classification must be based on the existing use pattern, the biological and physical character of the shoreline, the classification criteria provided by state regulations, and the goals of the Lynnwood Comprehensive Plan. Taking the foregoing into account, the City of Lynnwood has chosen to use two of the six state recommended standard environment designations for the jurisdictional shoreline within the city limits. These two designations are (1) Aquatic and (2) High-Intensity.

The extent of each designation is shown on map C4b in Appendix B, Inventory Map Portfolio. The exact location of environment designation boundaries will be determined at the time of permitting for a particular project.

B. AQUATIC ENVIRONMENT

The purpose of the Aquatic environment is to protect, restore, and manage the unique characteristics and resources of the areas waterward of the ordinary high-water mark. This is the default environment designation for areas waterward of the OHWM. This environment designation makes the most sense for Lynnwood's submerged and intertidal lands and is so used for those lands. The Aquatic designation applies to all Lynnwood's jurisdiction west of the OHWM.

MANAGEMENT POLICIES:

1. Structures, which are not water-dependent, and uses which will substantially degrade the existing character of the area should be prohibited.
2. Several industries using the same tidelands should be given preference over single-industry use.
3. In appropriate areas, fishing and water recreation should be protected from competing uses.
4. Uses and activities in navigable waters or their beds should be located and designed to minimize interference with safe navigation, and allow unhindered passage of fish and animals, particularly those with life cycles dependent on such migration.
5. Filling operations should minimize possible adverse environmental impacts.
6. Development of underwater pipelines and cables on tidelands should be discouraged except where adverse environmental impacts can be shown to be less than the impact of upland alternatives, or when no reasonable alternative exists. When permitted, such facilities should include provisions to prevent substantial or irrevocable environmental damage.

- 327 7. The size of new over-water structures should be limited to the minimum necessary to support the
328 intended use.
329
- 330 8. Uses adversely impacting the ecological functions of critical salt and fresh water habitat should
331 not be allowed except where necessary to the objectives of RCW 90.58.020, and then only when
332 their impacts are mitigated under the sequence described in WAC 173-26-201(2)(e) to assure no
333 net loss of ecological functions.
334
- 335 9. Shoreline uses and modifications should be designed and managed to prevent degradation of
336 water quality and alteration of natural hydrographic conditions.
337

338 **C. HIGH INTENSITY ENVIRONMENT**
339

340 The purpose of the High-Intensity environment is to provide for high-intensity water-oriented
341 commercial, transportation, and industrial uses while protecting existing ecological functions and
342 restoring ecological functions in previously degraded areas. This environment designation is to be applied
343 to shoreline areas currently supporting high-intensity uses, or suitable and planned for high-intensity
344 water-oriented uses. This environment designation applies to that part of Lynnwood located east and
345 within 200 feet of the Puget Sound OHWM.
346

347 **MANAGEMENT POLICIES:**
348

- 349 1. High-intensity use tends to preclude other shoreline uses. Emphasis should be given to directing
350 new development into already developed areas consistent with the SMP.
351
- 352 2. Full utilization of existing high-intensity areas should be achieved before additional areas are
353 designated High-Intensity.
354
- 355 3. Reasonable, long-range projections of regional economic need should guide the amount of
356 shoreline designated High-Intensity.
357
- 358 4. Priority should be given to water-dependent, water-related, and water-enjoyment uses over other
359 uses. Uses, not befitting from a water location, should be discouraged or prohibited.
360
- 361 5. Aesthetic considerations should be actively promoted by means such as appropriate development
362 siting, sign regulations, screening and architectural standards, flexible lot design, planned unit
363 development, and maintaining natural vegetation buffers.
364
- 365 6. To maximize use of available shoreline resources and accommodate future water-dependent uses,
366 the redevelopment and renewal of substandard or degraded high-intensity shoreline areas should
367 be encouraged.
368
- 369 7. Development within the High-Intensity environment should be compatible with uses and
370 activities in adjacent, including aquatic, environments.
371

SECTION 4. GENERAL POLICIES AND REGULATIONS

The following general policies and regulations apply to shoreline uses and modifications irrespective of environment designation. Policies are the bridge between goals and regulations, translating the general into the specific. Shoreline policies are legally enforceable. Regulations are more specific, enforceable controls and standards for shoreline development.

1. All new shoreline uses and shoreline modifications, including those not needing a Shoreline Substantial Development Permit (SDP), must conform to applicable Section 2 Goal provisions, Section 3 Environment Designation provisions (including the shoreline environment maps), Section 5 Specific Shoreline Use provisions and Section 6 Shoreline Modification provisions as well as the provisions of this section.
2. Shoreline modifications must support an allowable shoreline use conforming to the SMP. Except as otherwise noted, all shoreline modifications not associated with a legally existing or approved shoreline use are prohibited.
3. Shoreline uses, modifications, and conditions listed as “prohibited” shall not be eligible for consideration of Shoreline Variances or Shoreline Conditional Use Permits.
4. The policies listed in the SMP shall provide broad guidance and direction and shall be used by the Director in interpreting the “regulations.”
5. Where provisions of the SMP conflict, the more restrictive provisions shall apply unless specifically stated otherwise.

A. ARCHAEOLOGICAL AND HISTORIC RESOURCES

Where archaeological or historic resources are recorded with the State Historic Preservation Office and/or the City of Lynnwood, or where they have been uncovered, the following policies and regulations apply. (Note: there are no known archeological or historical sites within Lynnwood's shoreline jurisdiction.)

POLICIES:

1. Archaeological and historic resources are limited and irreplaceable by nature, and valuable links to our past, and should be considered whenever a development is proposed along State shorelines.
2. Public or private uses and activities should be prevented from destroying or altering any site having historic, prehistoric, cultural, scientific, or educational purpose or value as identified by appropriate authorities.

REGULATIONS:

1. All shoreline permits shall contain provisions requiring developers to immediately stop work and notify the City if any phenomena of possible archaeological interest is uncovered during

47 excavation. In such cases, the developer shall provide for site inspection and evaluation by a
48 professional archaeologist to ensure all valuable archaeological data is properly salvaged. The
49 developer shall receive permission from the State Office of Archaeology and Historic
50 Preservation prior to further site disturbance, and affected tribes must be notified (RCW 27.53
51 (Archaeological Sites and Resources) or its successor).
52

- 53 2. Permits issued in areas with known archaeological artifacts and data shall include a requirement
54 that the developer provide for site inspection and evaluation by an archaeologist. The permit shall
55 require approval by the City before work begins, following inspection. Significant archaeological
56 data or artifacts shall be recovered before work begins. This must be coordinated with affected
57 tribes.
58
- 59 3. Significant archaeological and historic resources shall be permanently preserved for scientific
60 study, education, and public observation. If the City determines a site has significant
61 archaeological, natural scientific or historical value, it shall not issue permits for substantial
62 development posing a threat to the resources of the site. The City may require development be
63 postponed in such areas to allow investigation, public acquisition and/or retrieval and
64 preservation of significant artifacts, and/or development of a mitigation plan.
65
- 66 4. In the event unforeseen factors constituting an emergency, as defined in RCW 90.58.030 or its
67 successor, necessitate rapid action to retrieve or preserve artifacts or data identified above, the
68 project may be exempted from shoreline permit requirements. The City shall notify *Ecology*, the
69 State Attorney General's Office and the State Historic Preservation Office of such a waiver in a
70 timely manner.
71
- 72 5. Archaeological sites, including middens, located both in and outside the shoreline jurisdiction are
73 subject to RCW 27.44 (Indian Graves and Records) or its successor and RCW 27.53
74 (Archaeological Sites and Resources) or its successor and shall comply with WAC 25-48 or its
75 successor as well as the provisions of the SMP.
76
- 77 6. Archaeological excavation may be permitted subject to the provisions of the SMP.
78
- 79 7. Identified historical or archaeological resources shall be considered in site planning for parks,
80 open space and public access with access to such areas designed and managed to protect the
81 resources and surrounding environment.
82
- 83 8. Appropriate signs interpreting historical and archaeological features shall be provided
84
- 85 9. Areas of known or suspected archaeological middens shall not be disturbed and shall be identified
86 and fenced and during construction projects on the site.
87

88 **B. CLEARING AND GRADING**

89
90 The purpose of this section is to ensure shoreline uses and activities are designed and conducted in a
91 manner minimizing damage to the ecology and environment of the shoreline area. All shoreline uses and
92 activities shall conform to the clearing and grading provisions herein, including developments not needing
93 a shoreline permit. (See subsection I - Water Quality for related provisions.)
94
95
96

97 **POLICIES:**

- 98
- 99 1. Clearing and grading activities should be designed and conducted with the proper protections and
- 100 in conformance with all local, state and Federal regulations.
- 101
- 102 2. Clearing and grading should be limited to the minimum necessary to accommodate permitted
- 103 shoreline development.
- 104
- 105 3. Negative environmental impacts associated with clearing and grading should be avoided
- 106 wherever possible through proper site planning, construction practices and timing, bank
- 107 stabilization, bioengineering and/or use of erosion and drainage control methods, as well as long-
- 108 term maintenance.
- 109
- 110 4. Following project completion, disturbed areas should be promptly replanted.
- 111
- 112 5. Clearing and grading activities should be designed so as to maintain native vegetation areas.
- 113 Appropriate critical area buffers, as described in LMC 17.10 Environmentally Critical Areas or as
- 114 described below, shall be maintained in native vegetation.
- 115
- 116 6. For extensive clearing and grading proposals, a clearing and grading plan addressing native
- 117 species removal, erosion and sedimentation control, and protection of sensitive area native
- 118 vegetation zones shall be required.
- 119

120 **REGULATIONS:**

- 121
- 122 1. Clearing and grading shall be permitted landward of the native vegetation zone (see subsection E-
- 123 Native Vegetation Zone) for a permitted shoreline use, provided that upon completion of
- 124 construction, remaining cleared areas shall be replanted within the first planting season.
- 125 Replanted areas shall be fully re-established within three (3) years of completing construction and
- 126 shall be properly maintained.
- 127
- 128 2. Except as otherwise provided in this SMP, existing native vegetation between the OHWM and
- 129 the top of any bank ten (10) feet or higher waterward of the development shall be retained.
- 130
- 131 3. All vegetation within the native vegetation zone or other buffer likely to be disturbed by clearing
- 132 and grading shall be protected by temporary fencing or other marking the City determines will
- 133 adequately protect the vegetation. This includes root zones of trees to remain. The
- 134 fencing/markings shall be installed, and approved by the City before clearing and grading begins,
- 135 and maintained until construction is complete.
- 136
- 137 4. Land alteration (clearing, grading, filling) shall be limited to the minimum necessary for
- 138 development. Surface drainage systems or earth modifications involving more than five hundred
- 139 (500) cubic yards of material shall be designed by a licensed engineer to prevent maintenance
- 140 problems or adverse impacts to shoreline features.
- 141

142 **C. ENVIRONMENTAL IMPACTS**

143

144 Minimizing the impacts of shoreline uses and activities on the environment is a key purpose of the SMA.

145 All shoreline uses and activities, including developments not needing a permit, must conform to these

146 provisions.

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POLICY:

Adverse environmental impacts from shoreline uses and activities should be minimized during all phases of development (e.g., design, construction, and management).

REGULATIONS:

1. The location, design, construction, and management of all shoreline uses and activities shall protect the quality and quantity of surface and ground water adjacent to the site and shall adhere to the guidelines, policies, standards, and regulations of applicable water quality management programs and regulatory agencies.
2. Solid waste, liquid waste, and untreated effluent (i.e., discharge from a source containing pollutants) shall not be allowed to enter any surface waters or be discharged onto land. If there is evidence of discharge, the activity shall be suspended until the deficiency has been satisfactorily corrected.
3. The release of oil, chemicals, or other hazardous material onto or into the water is prohibited. Equipment for transporting, storing, handling, or applying such materials shall be maintained in a safe and leak-proof condition. If there is evidence of leakage, the use of such equipment shall be suspended until the deficiency has been satisfactorily corrected.
4. Shoreline uses and activities shall use effective measures to minimize increases in surface water runoff and to control, treat, and release surface water runoff so that receiving water quality and shore properties and features are not adversely affected. Such measures may include, but are not limited to, dikes, catch basins, settling ponds, grassy swales, interceptor drains, landscaped buffers, and installation and maintenance of oil/water separators.
5. Shoreline uses and activities shall utilize effective erosion control methods during project construction and operation.
6. Shoreline uses and activities shall be located, designed, constructed, and managed to minimize adverse impacts to fish and wildlife resources including spawning, nesting, rearing and habitat areas, and migratory routes.
7. Shoreline uses and activities shall be located, designed, constructed, and managed to minimize interference with beneficial natural shoreline processes such as water circulation, sand and gravel movement, erosion, and accretion.
8. The location, design, construction, and management of shoreline uses and activities shall minimize adverse impacts to surrounding land and water uses.
9. The location, design, construction and management of shoreline uses and activities shall avoid hazards to public health and safety.
10. All shoreline uses and activities shall be located and designed to minimize the need for shoreline stabilization measures and flood protection. (See Section 6, Shoreline Modification Policies and Regulations.)
11. Herbicides and pesticides shall not be allowed to directly enter water bodies or wetlands unless

198 approved for such use by the appropriate agencies (Washington Dept. of Agriculture or Dept. of
199 Ecology, U.S. Dept. of Agriculture or U.S. Environmental Protection Agency).

200
201 12. See Environmentally Critical Areas in the next subsection for additional provisions which may
202 apply.
203

204 **D. NATIVE VEGETATION ZONE**

205
206 Native vegetation zones are required vegetation buffers encompassing areas landward from the OHWM.
207 Their purpose is to protect and enhance the shoreline’s natural character, water quality, native plant
208 communities, and wildlife habitat. Native vegetation zone provisions apply to all new shoreline
209 development, uses, and activities, including those not needing a shoreline development permit and, where
210 practical, to existing development.

211
212 Existing development, vegetation patterns, site conditions, parcel configurations, adjacent land uses and
213 other factors shall be considered when applying native vegetation zone requirements. Existing developed
214 properties such as the Wastewater Treatment Plant with no direct shoreline access (separated from the
215 water by the railroad right-of-way), existing buildings in close proximity to the waterward property line,
216 and limited land area for development, may have limited opportunity to implement native vegetation zone
217 mitigation in the event of expansion. In such instances, a native vegetation zone is not required, but
218 mitigation for removal of significant trees is still appropriate.

219 220 **POLICIES:**

- 221
222 1. Preservation of native plant species is key to maintaining the ecology of the shoreline as well as
223 preserving its natural character.
224
- 225 2. Native plant communities within the shoreline jurisdiction should be protected, maintained, and
226 enhanced.
227
- 228 3. Degraded shorelines should be restored to provide native habitats and enhance water quality.
229
- 230 4. Development should preserve existing environmental features to minimize disturbance of natural
231 systems.
232
- 233 5. A native vegetation zone, landward of the OHWM, should be established for each shoreline use
234 and shoreline environment, consistent with the development pattern and ecology of the shoreline.
235
- 236 6. The City should implement a public education program emphasizing the importance of
237 maintaining native vegetation in the shoreline area.
238
- 239 7. Requirements for native vegetation zones, including their width, shall take into consideration
240 factors such as, but not limited to, existing development and vegetation patterns, existing site
241 conditions, characteristics of the land use and adjacent land uses. In cases where a native
242 vegetation zone is not required and existing significant trees are removed, mitigation for the
243 removed trees is appropriate.
244

245 **REGULATIONS:**

246
247 A vegetation buffer, called a native vegetation zone, shall be maintained landward of the OHWM. For

248 environmentally critical areas other than wetlands, the width of the native vegetation zone shall be a
249 minimum of 50 feet except as altered by the depth averaging provisions of paragraph 9 below. However,
250 in no instance shall the native vegetation zone be less than that required by the Lynnwood Critical Areas
251 Ordinance (LMC 17.10 Environmentally Critical Areas or its successors). No wetlands are present in
252 Lynnwood's shoreline area.

- 253
254 1. Existing native vegetation within this zone shall be maintained unless specifically allowed to be
255 altered or removed under the provisions of this section.
- 256
257 2. New plantings in this zone shall be native plant species, similar in diversity, type, density,
258 wildlife habitat value, water quality and slope stabilizing qualities to the original vegetation.
- 259
260 3. Removal of nonnative plants and plants on the State noxious weed list shall be allowed within the
261 native vegetation zone.
- 262
263 4. Within the native vegetation zone, normal nondestructive pruning and limbing of native
264 vegetation for maintenance and view shall be allowed if it does not threaten the health of the
265 vegetation. Individual tree cutting to remove hazards may be allowed by the Director, subject to a
266 report by an arborist or other approved expert.
- 267
268 5. No clearing, grading, or construction may be undertaken in the native vegetation zone unless
269 specifically allowed by this section.
- 270
271 6. A path to the shoreline not more than four (4) feet wide, constructed by hand and designed to
272 minimize environmental impacts, shall be allowed. Paths may be wider when required for
273 handicapped access.
- 274
275 7. Accessory utility lines determined by the Director to be necessary or to reduce an impact may be
276 allowed.
- 277
278 8. To allow flexibility when required by site limitations, the depth of the native vegetation zone
279 (measured from the eastern boundary of the BNSF right-of-way) may be altered by averaging the
280 depth, provided that:
 - 281
282 a. The total area of the native vegetation zone shall not be less than otherwise required.
 - 283
284 b. All portions of the native vegetation zone shall be contiguous.
 - 285
286 c. The zone depth shall not be reduced more than twenty-five (25) percent, and shall be
287 minimum thirty-eight (38) feet (from the OHWM) at any point.
 - 288
289 d. At least seventy-five percent (75%) of the resulting zone shall be located within the area
290 otherwise required.
 - 291
292 e. Any area altered shall be compensated for by a substitute area. Areas used as substitutes must
293 contain vegetation of comparable or better quality than the area deleted.
- 294
295 9. Native vegetation zones and related restrictions required for a preliminary plat shall be shown on
296 the face of the final plat, and for all other land shall be included in a covenant, easement or
297 similar document. The document(s) shall be recorded with the County Auditor within one month
298 of imposing the requirement.

- 299
300 10. In cases where a native vegetation zone is not required or its width is allowed to be reduced (due
301 to considerations in Policy 7 above), and existing significant trees are to be removed, mitigation
302 in accordance with LMC 17.15 Tree Regulations or its successor will be required for the tree
303 removal. Preference for mitigation shall be:
304
305 a. Replacement trees on the subject property and within the area subject to shoreline
306 management jurisdiction (i.e. 200 feet landward of the OHWM).
307
308 b. If “a” is not practical, replacement trees shall be located on the subject property at a location
309 clearly visible from the shoreline.
310

311 **E. ENVIRONMENTALLY CRITICAL AND HAZARD AREAS**

312
313 Environmentally critical areas and geologic and flood hazard areas in Lynnwood's shoreline jurisdiction
314 are primarily regulated through LMC 17.10 Environmentally Critical Areas and/or LMC 16.46 Flood
315 Hazard Area Regulations. Sections 17.10.090, 091, 092 & 093 of the Critical Areas Ordinance (Ord. No.
316 2598, Dec. 2005) are hereby incorporated into the SMP (see section E items 9-12). The Flood Hazard
317 Area Regulations (Ord. No. 2274, Nov. 1999) are hereby incorporated into this SMP (see Appendix F).
318 The provisions in the SMP supplement those regulations and apply to all uses and activities, including
319 those not needing a shoreline substantial development permit. Any conflicts between the ordinances and
320 the SMP shall be resolved in favor of the regulation that is most protective of the environment.
321

322 **POLICIES:**

- 323
324 1. Unique, rare, and fragile shoreline resources including, but not limited to, aquifer recharge areas;
325 fish and wildlife habitat; fish breeding, rearing or feeding areas; frequently flooded areas;
326 geologically hazardous areas; wetlands and streams; tidal lagoons; mud flats; and salt marshes
327 and aquatic vegetation should be preserved.
328
329 2. Shoreline uses and activities should be located, designed, constructed, and managed to protect
330 and/or not adversely affect valuable, fragile or unique natural features.
331
332 3. Development should be located minimum distances specified in LMC 17.10 Environmentally
333 Critical Areas, from shorelines identified as unstable and/or erosion prone to prevent hazardous
334 conditions and property damage as well as to protect environmental features.
335
336 4. Development in flood hazard areas should be restricted in accordance with LMC 16.46 Flood
337 Hazard Area Regulations to prevent hazardous conditions and property damage as well as to
338 protect the environment.
339
340 5. Some areas, because of unique and/or fragile geological or biological characteristics, should be
341 protected from public access (e.g., wetlands, shoregrass, kelp beds, etc.).
342
343 6. In areas adjacent to critical environmental features and their native vegetation zones, use
344 intensities should be regulated to protect the critical features.
345

346 **REGULATIONS:**

- 347
348 1. Over-water and near-shore development in marine and estuarine waters shall inventory the

- 349 development site and adjacent areas to assess the presence of critical saltwater habitats and
350 functions. The method and extent of the inventory shall be consistent with accepted research
351 methodology.
352
- 353 2. Native vegetation zones shall be equal to the buffers established in LMC 17.10 Environmentally
354 Critical Areas, as amended, except that native vegetation zones for Puget Sound shall be
355 established in the SMP. There are no wetlands in Lynnwood's shoreline jurisdiction.
356
- 357 3. Regulation 2 above, notwithstanding, native vegetation zones for areas of Puget Sound
358 exhibiting unique, rare and/or fragile resources (including, but not limited to tidal lagoons, mud
359 flats, and salt marshes) may be increased under LMC 17.10 Environmentally Critical Areas.
360
- 361 4. When critical areas and/or critical area native vegetation zones are disturbed, revegetation with
362 native vegetation shall be required. (See subsection B, Clearing and Grading (above) for
363 regulations protecting critical areas during construction.)
364
- 365 5. Fish and wildlife habitat enhancement or restoration shall be allowed as approved by appropriate
366 resource agencies.
367
- 368 6. If development results in a shoreline impact, the following mitigation measures shall be applied
369 in the sequence of steps listed in order of priority, with (a) of this subsection being top priority.
370
- 371 a. Avoiding the impact altogether by not taking a certain action or parts of an action;
- 372 b. Minimizing impacts by limiting the degree or magnitude of the action and its implementation
373 by using appropriate technology or by taking affirmative steps to avoid or reduce impacts;
- 374 c. Rectifying the impact by repairing, rehabilitating, or restoring the affected environment;
- 375 d. Reducing or eliminating the impact over time by preservation and maintenance operations;
- 376 e. Compensating for the impact by replacing, enhancing, or providing substitute resources or
377 environments; and
- 378 f. Monitoring the impact and the compensation projects and taking appropriate corrective
379 measures.
- 380 7. In determining appropriate mitigation measures applicable to shoreline development, lower
381 priority measures shall be applied only where higher priority measures are determined to be
382 infeasible or inapplicable.
- 383 8. Where critical area replacement is proposed, an applicant shall permanently protect the
384 replacement area through legal instruments such as critical area tracts, conservation easements, or
385 comparable use restrictions.
386
- 387 9. The following are classified as geologically hazardous areas:
388
- 389 a. Naturally occurring slopes of 40 percent or more;
- 390 b. Other areas which the City has reason to believe are geologically unstable due to factors such
391 as landslide, seismic or erosion hazards.

392 10. Development proposals in areas which are designated as or which the City has reason to believe
393 are geologically unstable or hazardous shall be set back a minimum of 25 feet from top, toe and
394 sides of such areas (as applicable). The setback requirement may be increased by the City when
395 necessary to protect public health, safety and welfare, based on information contained in
396 geotechnical reports.

397
398 10. Unless associated with a stream or wetland, the City, with a shoreline variance (see subsection 7.
399 J Shoreline Variances and Conditional Use Permits), may allow alteration of an area identified as
400 a geologically hazardous area, or its setback. In order to perform such alteration, the applicant
401 shall submit to the City a geotechnical report containing all elements described in LMC 17.10.104
402 and in addition to meeting the requirements of Section 7 – Administrative Regulations, must
403 demonstrate:

404
405 a. The proposed development will not create a hazard to the subject property, surrounding
406 properties, or rights-of-way, nor cause severe erosion or deposit excessive sedimentation on
407 or in off-site properties or bodies of water; and,

408
409 b. The proposed method of construction will reduce erosion, landslide and seismic hazard
410 potential, and will improve, or not adversely affect the stability of slopes; and,

411
412 c. The proposal uses construction techniques which minimize the disruption of existing
413 topography and natural vegetation; and,

414
415 d. The proposal is consistent with the purposes and provisions of LMC 17.10 Environmentally
416 Critical Areas.

417
418 11. Alteration allowed by this subsection shall be subject to the following requirements:

419
420 a. All proposed developments be designed and located so as to require the minimum amount of
421 modification to areas of potential geologic instability; and,

422
423 b. All impacts identified in the geotechnical report be adequately mitigated; and,

424
425 c. As a condition of any approval of development containing a geologically hazardous area or
426 its required setbacks, the City may require that:

427
428 i. The applicant's geotechnical consultant be present on the site during clearing,
429 grading, filling and construction activities which may affect geological hazard or
430 unstable areas, and provide the City with certification that the construction is in
431 compliance with his/her recommendations and has met with his/her approval; and.

432
433 ii. Trees and groundcover be retained and additional vegetation or other appropriate soil
434 stabilizing structures and materials be provided.

435
436 12. All development in areas of special flood hazard (see definition in Appendix F) shall be subject to
437 the requirements of LMC 16.46 Flood Hazard Area Regulations. In the event of conflicts between
438 the requirements of LMC 16.46 Flood Hazard Area Regulations and this SMP the regulation that
439 is most protective of ecological functions shall be applied.
440

441 **F. PUBLIC ACCESS –VISUAL AND PHYSICAL**

442
443 This section recognizes that there are two types of public “access” to the shoreline. One type is *visual*
444 access – that is, the public’s ability to see the shoreline and water. The second type is *physical* access –
445 that is, the public’s ability to reach and touch the water’s edge.

446
447 The following provisions are not intended to require private property owners including the BNSF to
448 increase visual or physical public access to the shoreline. Nor are they intended to encourage or require
449 public access to or through areas or uses which is contrary to public health or safety including the BNSF
450 right-of-way and the wastewater treatment plant grounds.

451
452 The fundamental principle underlying this section’s provisions is that future development should not
453 result in net loss of currently existing visual and physical public access to the shoreline. The following
454 provisions are intended to increase public visual and physical access to the shoreline, through
455 improvement of existing public property and acquisition of additional public property. It should be
456 recognized that some of the following policies and regulations may only be applicable in the rather
457 unlikely event that the existing Lynnwood shoreline jurisdiction is no longer used by the wastewater
458 treatment plant and/or railroad and is redeveloped or in the event the city annexes other shoreline areas,
459 although this too seems unlikely within the lifetime of this SMP (see Section 1. H above).

460
461 “Scenic vista” protection is another aspect of public access and an important shoreline management
462 objective. Consideration must be given to protecting the shoreline’s visual quality and maintaining view
463 corridors to and from waterways and adjacent features.

464
465 **Policies:**

- 466
467 1. The City should establish a comprehensive public access plan to provide increased public visual
468 and physical access. The plan should consider the following methods:
469
470 a. Acquisition of land and/or easements.
471
472 b. Incentives for providing visual and/or physical access.
473
474 c. Requirements for public access when new development: is located in the High-Intensity
475 Environment, is a nonresidential use, or includes multiple-family uses of five or more
476 building lots.
477
478 2. In single-family residential areas emphasis should be placed on providing public access to the
479 water via unopened road rights-of-way (“road ends”), with a goal of providing comparable access
480 in all neighborhoods.
481
482 3. Acquisition of small, unbuildable lots should be considered as a way to increase opportunities for
483 the public to enjoy the shoreline.
484
485 4. Intense public use, as opposed to neighborhood use, of the shoreline should be limited to parks
486 and the High-Intensity Environment.
487
488 5. Visual and physical public access should be considered during the review of any new private or
489 public developments which diminish existing public access or increase demand for public access.
490 In such cases, public access should be required unless health, safety, or environmental protection

- 491 needs cannot be met.
492
493 6. New shoreline development, uses, and activities should not unreasonably impair or detract from
494 the public's physical and visual access to the water.
495
496 7. Public access should not adversely affect the shoreline environment.
497
498 8. City-owned shoreline should be reserved for water-dependent or public recreational use, or
499 maintained as open space.
500
501 9. Public visual and physical access should be maintained or enhanced on shoreline street-ends,
502 public utility corridors and easements (where possible), and public rights-of-way.
503
504 10. Public access should be designed to provide for public safety and minimize potential impacts to
505 private property and individual privacy.
506
507 11. Public and private access spaces should be clearly marked and/or separated to avoid unnecessary
508 user conflicts. Such marking/separation should be done in a way that does not unreasonably
509 obscure views.
510
511 12. Development should minimize visual impacts to the natural shoreline landscape.
512
513 13. The Lynnwood Public Works Department has a program of occasional public tours of the
514 wastewater treatment plant and grounds. The tour program should continue within the availability
515 of staff to escort the tours. The tour program should develop handouts and speaking points
516 addressing the shoreline environment and ecology and how it has been affected by and in turn
517 affects human activity.

518
519 **REGULATIONS:**

- 520
521 1. Development projects on public land or by public entities shall include provisions for public
522 visual and physical access to the shoreline unless the applicant demonstrates one or more of the
523 following:
524
525 a. Unavoidable health or safety hazards exist which cannot be prevented by any practical
526 means.
527
528 b. Inherent security requirements of the use cannot be satisfied through alternative design
529 features or other solutions.
530
531 c. The cost of providing the access, easement, or alternative public access on or off the
532 development site is unreasonably disproportionate to the total long-term cost of the
533 development. In such instances project proponent shall contribute funds to the City public
534 access, Park or shoreline restoration fund.
535
536 d. Public access will result in unacceptable environmental harm which cannot be adequately
537 mitigated.
538
539 e. Security and/or health and safety issues make public access impossible or impractical.
540
541 2. In order to meet any of the conditions (a) through (c) above, the applicant must first demonstrate,

- 542 and the City determine in its findings, that reasonable alternatives have been exhausted,
543 including, but not limited to:
- 544
- 545 a. Regulating access by means such as maintaining a gate and/or limiting hours of use.
- 546
- 547 b. Designing separation of uses and activities (e.g., fences, terraces, hedges, or other
548 landscaping).
- 549
- 550 c. Provision(s) for access on sites geographically separate from the proposal such as a street
551 end.
- 552
- 553 3. Development, uses, and activities shall be designed and operated to avoid blocking, reducing, or
554 adversely interfering with existing public physical and visual access to the water and shorelines.
555
- 556 4. Public visual and physical access via shoreline street ends, public utilities, and rights-of-way shall
557 not be diminished. (RCW 35.79.035 or its successor and RCW 36.87.130 or its successor).
558
- 559 5. Submerged public rights-of-way shall be preserved for public access.
- 560
- 561 6. Permitting processes shall consider the balance between visual access and retention of native
562 vegetation.
- 563
- 564 7. Development on the water shall be constructed of non-reflective materials compatible in color
565 and texture with the surrounding area.
- 566
- 567 8. Public access sites shall be connected directly to the nearest public street.
- 568
- 569 9. Required public access shall be fully developed and available for public use at the time of
570 occupancy of the use or activity in accordance with permit conditions.
571
- 572 10. Public access easements and permit conditions shall be recorded on the title and/or on the face of
573 the plat as a condition running with the authorized land use. Recording with the County Auditor's
574 office shall occur at the time of permit approval. (RCW 58.17.110 or its successor.)
575
- 576 11. The standard State-approved logo or other approved sign(s) indicating public right of access and
577 hours of access shall be installed, and maintained by the City in conspicuous locations at public
578 access sites. In accordance with regulation 2a above, signs may control or restrict public access as
579 a condition of permit approval.
- 580
- 581 12. Future actions by the applicant, successors in interest, or other parties shall not diminish the
582 usefulness or value of the public access provided.
- 583
- 584 13. When properties are subdivided, owners of newly created lots not having water frontage shall be
585 provided common water access, provided this will not cause unacceptable environmental harm
586 which cannot be adequately mitigated.
587

588 **G. SHORELINES OF STATEWIDE SIGNIFICANCE**

589
590 The 1971 Shoreline Management Act designated certain shoreline areas as shorelines of statewide
591 significance. Because these shorelines are resources which benefit all people in the state, preference is

592 given to uses which favor public and long-range goals. Within Lynnwood’s jurisdiction all areas lying
593 seaward of the extreme low tide line are shorelines of statewide significance. [RCW 90.58.030(2)(f)(iii)
594 or its successor].
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Policies (In order of preference):

1. Recognize and protect the statewide interest over local interest.
 - a. Solicit comments and opinions from groups and individuals representing statewide interests by circulating the SMP, and any amendments thereto affecting shorelines of statewide significance, to State agencies, local officials, adjacent jurisdictions, citizen’s advisory committees, and statewide interest groups.
 - b. Recognize and take into account State policies, programs, and recommendations in developing and administering use regulations, and approving shoreline permits.
 - c. Solicit comments, opinions, and advice from individuals with expertise in ecology, geology, limnology, aquaculture, and other scientific fields pertinent to shoreline management.
2. Preserve the natural character of the shoreline:

Designate and administer shoreline environments and use regulations to minimize damage to the ecology and environment of shorelines as a result of man-made intrusions.

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3. Result in long-term over short-term benefit.
 - a. Evaluate the short-term economic gain or convenience for development relative to long-term and potentially costly impairments to the natural shoreline.
 - b. In general, preserve resources and values of shorelines of statewide significance for future generations and restrict or prohibit development that would irretrievably damage shoreline resources.
 - c. Actively promote aesthetic considerations when contemplating development, or redevelopment of existing facilities, or enhancement of shoreline areas.
 4. Protect the resources and ecology of the shoreline.
 - a. Minimize development activity interfering with natural functions of the shoreline ecosystem including, but not limited to, stability, drainage, aesthetic values, and water quality.
 - b. Shoreline development should be located, designed, constructed, and managed to avoid disturbance of, and minimize adverse impacts on, fish and wildlife resources including spawning, nesting, rearing, and habitat areas and migration routes.
 - c. Restrict or prohibit public access to areas which cannot be maintained in a natural condition with human use.
 - d. Shoreline materials including, but not limited to, bank substrate, soils, beach sands, and gravel bars should be left undisturbed by shoreline development.
 5. Increase public access to publicly owned shoreline areas.
 - a. Give priority to developing paths and trails to shoreline areas, linear access along the shorelines, and upland parking.
 - b. Locate development landward of the ordinary high water mark.
 - c. Limit public access when environmental or habitat values warrant such.
 6. Increase shoreline public recreational opportunities.
 7. Plan for and encourage development of shoreline recreational facilities.

659 **H. WATER QUALITY**

660
661 Maintaining high water quality standards and restoring degraded systems is mandated in the Shoreline
662 Management Act (RCW 90.58.020 or its successor). Water quality is affected in numerous ways by
663 human activity. The increase in non-porous surfaces that accompanies development increases surface
664 water runoff causing scouring and stream bank erosion. Erosion increases suspended solid levels and
665 carries heavy metals, wastes, and excess nutrients into the water, causing nutrient enrichment and
666 depressed dissolved oxygen levels. This degradation of water quality adversely impacts wildlife habitat

667 and public health. The purpose of these provisions is to minimize water quality impacts of shoreline uses
668 and activities. These provisions apply to all shoreline development, including development not needing
669 shoreline development permits.

670

671 **Policies:**

672

673 1. All shoreline uses and activities, including sewers and/or septic systems, should be located,
674 designed, constructed, and maintained to minimize adverse impacts to water quality and fish and
675 wildlife resources including spawning, nesting, rearing, feeding areas, and migratory routes.

676

677 2. Setbacks, native vegetation zones, and stormwater management should be required to minimize
678 negative water quality impacts.

679

680 3. Surface water runoff should be treated on-site, unless precluded by slope or other sensitive area
681 conditions.

682

683 **Regulations:**

684

685 1. Shoreline development shall minimize increases in surface runoff through control, treatment, and
686 release of runoff so the receiving water quality and shore properties and features are not adversely
687 affected. Control measures include, but are not limited to, dikes, catch basins settling ponds, oil
688 interceptor drains, grassy swales, planted buffers, and fugitive dust control.

689

690 2. New shoreline residences or businesses within two hundred (200) feet of an existing sewer line
691 and/or within an established sewer service area shall be connected to the sewer system.

692

693 3. Shoreline development shall comply with applicable requirements of the Stormwater
694 Management Manual for the Puget Sound Basin (*Ecology* publication #91-75) as amended by
695 Lynnwood's Engineering Design and Development Standards Manual.

696

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700 **I. RESTORATION OF IMPAIRED ECOLOGICAL FUNCTIONS**

701

702 The Shoreline Master Program's governing principles mandate that such Programs contain goals, policies,
703 and actions for restoration of impaired ecological functions, [see WAC 173-26-186(8)(c)]. The ecological
704 functions of Lynnwood's shoreline have been impaired by two major land use actions: construction of the
705 Burlington Northern Santa Fe railroad line, and construction of Lynnwood's wastewater treatment plant
706 draining to Puget Sound. Neither of these actions can be easily or inexpensively reversed. Both are likely
707 to remain for the foreseeable future. Lynnwood's goals, policies, and actions to restore impaired
708 ecological functions need to be viewed within these constraints. Actions the City takes to restore impaired
709 ecological functions will focus on actions other than changing these primary land uses. Given the small
710 geographic size of Lynnwood's shoreline, such actions may extend beyond Lynnwood's shoreline
711 jurisdiction. Lynnwood's shoreline restoration plan provides more details.

712

713 **Policies:**

714

715 1. Lynnwood will protect ecological functions, and restore impaired ecological functions, in its
716 shoreline jurisdiction within reasonable limits of both biological science and cost effectiveness.

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2. Lynnwood will protect and enhance ecological functions in the Lund's Creek watershed through land acquisition and management as a means of compensating for the loss of ecological functions within Lynnwood's shoreline jurisdiction.

724

SECTION 5. POLICIES AND REGULATIONS FOR SPECIFIC SHORELINE USES

A. INTRODUCTION – TABLE OF USES

This section contains a table of shoreline uses allowed in each Environment Designation, and policies and regulations relating to specific shoreline uses. Proposed development must comply with the policies and regulations of this section as well as Section 4 – General Policies and Regulations, and Section 6 – Policies and Regulations for Shoreline Modification.

While not all shoreline uses require a shoreline permit, no development shall be undertaken within the shoreline jurisdiction of Lynnwood except those consistent with the Shoreline Management Act, applicable State guidelines, and the Lynnwood SMP. Shoreline uses not specifically identified shall be evaluated on a case-by-case basis for consistency with the SMA and the SMP and shall require a conditional use permit.

The High-Intensity and Aquatic environment designations apply to the area of current City of Lynnwood jurisdiction.

Shoreline Use	High-Intensity	Aquatic
Bulkheads and similar structures	NP	NA
<i>Single-family residential</i>	P	NP
<i>Existing bulkhead w/in 100 ft.</i>	SSDP	NP
<i>Elsewhere</i>	CUP	NP
Dredging	NA	CUP
Filling (1)	CUP	CUP
Land surface modification	SDP	NA
Moorage structures and facilities	SSDP/CUP	SSDP/CUP
Parking (accessory)	P	NP
Piers and docks	CUP	SSDP/CUP
Public parks and recreational facilities	NP	NA
Railroad	SSDP	NP
Recreational floats and mooring buoys	NA	P
Wastewater treatment facilities	SSDP	NP (2)
Signs, facility/use identification, public safety/direction and signals	P	CUP
Street	P	NA
Utilities	P	NP

P = Permitted
 NP = Not Permitted
 CUP = Conditional Use Permit
 SSDP = Shoreline Substantial Development Permit
 NA = Not Applicable

(1) Fill waterward of the OHWM requires a CUP (WAC 173-26-231(3)(c)). This applies to all fill in the aquatic

753 environment.
754 (2) Permission for outfall line to be included in SSDP/CUP for treatment plant

755 **B. PRIMARY UTILITY FACILITIES:**

756
757 This section contains regulations pertinent to the development of primary utility facilities such as
758 wastewater treatment plants or similar. Regulations for auxiliary utilities are in subsection G of
759 Section 5.

760
761 **POLICIES**

- 762
- 763 1. Primary utility facilities – including expansion of existing facilities - should be located in
764 shoreline areas only if no practical upland alternative or location exists.
 - 765
 - 766 2. Primary utility facilities and expansions should be designed and located to minimize impacts to
767 shoreline ecological functions including riparian and near-shore areas and to the natural landscape
768 and aesthetics.
 - 769
 - 770 3. Public health and safety shall be the highest priority for the planning, development and operation
771 of primary utility facilities.

772
773 **REGULATIONS**

- 774
- 775 1. The principal use permitted by this section is the Lynnwood wastewater treatment plant including
776 sewage collection, holding, transfer and treatment pipelines, tanks, structures, containment
777 facilities, buildings, etc. The following accessory facilities are also permitted:
778
 - 779 a. Plant monitoring and control facilities and on-site administrative offices.
 - 780
 - 781 b. Plant access and logistical facilities such as storage areas, material handling ramps and
782 facilities, etc, and including utility delivery (electrical, communication, etc.) facilities.
 - 783
 - 784 c. Plant security and safety features such as fences, signage, etc.
 - 785
 - 786 d. Other accessory or auxiliary uses or features, necessary to of the effective and efficient
787 operation of the plant and which cannot feasibly be located outside the shoreline jurisdiction.
 - 788
 - 789 2. Expansion of existing primary utility facilities within the shoreline jurisdiction must demonstrate:
790
 - 791 a. The expansion is designed to protect adjacent shorelands from erosion, pollution, or other
792 environmentally detrimental factors during and after construction.
 - 793
 - 794 b. The project is planned to fit existing natural topography as much as practical and avoid
795 alteration of the existing natural environment.
 - 796
 - 797 c. That debris, overburden and other construction waste materials will be disposed of so as to
798 prevent erosion or pollution of a water body.
 - 799
 - 800 3. Primary utility facilities and expansions shall include provisions to control the quantity and
801 quality of surface water runoff to natural water bodies, using best management practices to retain
802 natural flow rates. A maintenance program to ensure continued proper functioning of such

803 facilities shall be required.
804

805 **C. TRANSPORTATION FACILITIES: POLICIES AND REGULATIONS**

806
807 This section contains regulations pertinent to the development of streets, roads and railroads. These uses
808 are permitted in the High Intensity Environment.

809 **POLICIES**

- 810
811
- 812 1. Streets and railroads should only be located in shoreline areas if no feasible upland alternative or
813 location exists.
 - 814
815 2. Transportation facilities and expansions thereof should be designed and located to minimize
816 impacts to shoreline ecological functions including riparian and near-shore areas and to the
817 natural landscape and aesthetics.
 - 818
819 3. Transportation facilities and expansions thereof shall include facilities to control the quantity and
820 quality of surface water runoff to natural water bodies, using best management practices to retain
821 natural flow rates. A maintenance program to ensure continued proper functioning of such
822 facilities shall be required.
 - 823
824 4. Public safety shall be the highest priority for the planning and development and operation of
825 transportation facilities.

826
827 **REGULATIONS**

- 828
- 829 1. The principal use permitted by this section is railroad tracks including roadbed and subgrade, but
830 not including rail yards or maintenance facilities, terminals, stations, passenger or freight
831 handling or transfer facilities. The following accessory facilities are permitted:
832
 - 833 a. Safety signals not exceeding 25 feet in height and signs not exceeding 10 feet in height or
834 four square feet in area.
 - 835
836 b. Slide fences not exceeding six feet in height.
 - 837
838 c. Pedestrian fences not exceeding six feet in height and not made of solid or vision obstructing
839 materials.
 - 840
841 2. New railroads requiring right-of-way expansion are prohibited.
 - 842
843 3. Expansion of existing transportation facilities within existing right-of-way must demonstrate:
844
 - 845 a. That a shoreline location is needed and that no reasonable upland alternative exists.
 - 846
847 b. The facility is designed to protect adjacent shorelands from erosion, pollution, or other
848 environmentally detrimental factors during and after construction.
 - 849
850 c. The project is planned to fit existing topography as much as possible and avoid unnecessary
851 alteration of the existing natural environment.
- 852

- 853 d. That debris, overburden and other construction waste materials will be disposed of so as to
854 prevent erosion or pollution of a water body.
855

856 **D. PARKING POLICIES AND REGULATIONS**

857
858 The following provisions apply to parking areas accessory to a permitted shoreline use. Parking as a
859 primary use is prohibited within the shoreline jurisdiction.
860

861 **POLICIES:**

- 862
863 1. Parking should directly serve an approved shoreline use and be sensitive to adjacent shorelines
864 and properties.
865
866 2. Parking facilities should be located, designed, constructed, and operated to minimize adverse
867 impacts to water quality, aesthetics, public access, vegetation and habitat, stormwater runoff,
868 noise, and glare.
869
870 3. Parking should be planned to achieve optimum use. Where possible, parking should serve more
871 than one use (e.g. recreational use on weekends and commercial use weekdays).
872

873 **REGULATIONS:**

- 874
875 1. Parking in the shoreline jurisdiction is subject to all requirements of the Lynnwood parking code
876 (LMC 21.18 Off-Street Parking) incorporated herein by reference.
877
878 2. Parking shall be prohibited over water.
879
880 3. Parking in the shoreline jurisdiction shall directly serve a shoreline use.
881
882 4. Parking facilities shall be located, designed and landscaped to minimize adverse impacts
883 (including aesthetic impacts) to adjacent shorelines and properties. Landscaping shall consist of
884 native vegetation or species identified in an approved plant list or landscape plan and shall be
885 designed and installed to provide effective and appropriate screening within three (3) years of
886 planting. Plantings shall be maintained for the life of the parking facility.
887
888 5. Parking facilities serving individual shoreline buildings shall be located landward of the principal
889 building served, except when the parking facility is within or beneath the structure and screened,
890 or where an alternate location would have less adverse impacts on the shoreline.
891
892 6. Parking facilities shall provide safe, convenient pedestrian circulation within the parking area and
893 to the shoreline.
894
895 7. Parking areas shall include facilities to control the quantity and quality of surface water runoff to
896 natural water bodies, using best management practices to retain natural flow rates. A maintenance
897 program to assure continuing proper functioning of such facilities shall be required.
898
899

900 **E. SIGNS POLICIES AND REGULATIONS**

901
902 Signs are regulated through LMC, Chapter 21.16 Signs. The following policies apply to signs within
903 the Shoreline Master Program jurisdiction.

904
905 **POLICIES:**

- 906
907 1. Signs should be designed and placed, and be made of materials compatible with the aesthetic
908 quality of the existing shoreline and adjacent land and water uses.
909
910 2. Signs should not block or interfere with visual access to the water or shorelands.
911
912 3. Signs should be permanent in nature, and should serve and be attached to an approved use.
913

914 **REGULATIONS:**

- 915
916 1. Signs in the shoreline jurisdiction are subject to requirements of the Lynnwood Sign Code (LMC
917 21.16 Signs) incorporated herein by reference.
918
919 2. The following freestanding signs shall be permitted in the High-Intensity Environment:
920
921 a. Freestanding signs within the High-Intensity Environment shall be limited to a maximum
922 height of four (4) feet and a maximum area of four (4) feet.
923
924 b. Signs necessary for public safety or the safe operation of a use permitted in the High Intensity
925 Environment including railroad signals up to 25 feet high.
926
927 3. Signs are prohibited in the aquatic environment unless it can be demonstrated that:
928
929 a. The sign is necessary for the public health or safety; and
930
931 b. It is not feasible to place the sign in an upland area, or that its purpose could not be achieved
932 if placed in an upland area.
933
934 4. A shoreline conditional use permit is required for any sign in the aquatic environment.
935

936 **F. PIERS, DOCKS, FLOATS, AND MOORING BUOYS: POLICIES AND**
937 **REGULATIONS**

938
939 Uses which employ a pier or dock (for example industry) are subject to the provisions herein as well
940 as the provisions contained in Section 4, General Policies and Regulations. Community or joint-use
941 docks serving five (5) or more single family residences also must comply with the provisions of this
942 section.

943
944 Pursuant to RCW 90.58.030(3)(e) or its successor, certain activities are exempt from obtaining a
945 Shoreline Substantial Development Permit. For the benefit of the owner, surrounding properties, and
946 water body users, the City will review all proposals for piers and docks to determine whether:

- 947
948 1. The proposal is exempt from the requirements for a shoreline permit;

- 949
950 2. The proposal is suitably located and designed and potential impacts have been recognized and
951 mitigated; and
952
953 3. The proposal is consistent with the intent, policies, and regulations of the Act (RCW 90.58.140 or
954 its successor) and this Program.
955

956 Exempt activities are subject to the provisions of the SMP.
957

958 **POLICIES:**
959

- 960 1. Multiple use and expansion of existing conforming piers, docks, and floats should be encouraged
961 over construction and/or proliferation of new facilities. Joint use facilities are preferred over new,
962 single-use piers, docks, and floats.
963
964 2. The use of mooring buoys should be encouraged in preference to piers or docks.
965
966 3. Piers, docks, and floats should be designed to minimize interference with navigable waters, public
967 use of the shoreline, and views from adjoining properties.
968
969 4. Piers, floats, and docks should be sited and designed to minimize possible adverse environmental
970 impacts, including potential impacts on littoral drift, sand movement, water circulation and
971 quality, and fish and wildlife habitat.
972
973 5. Proponents of commercial pier, float, and dock projects are encouraged to provide public
974 docking, launching, and recreational access.
975
976 6. Local programs and coordinated efforts among private and/or public agencies should be initiated
977 to remove or repair failing, hazardous, or nonfunctioning piers and docks and restore such
978 facilities and/or shore resources to a natural and/or safe condition.
979
980 7. Use of natural, non-reflective materials in pier and dock construction should be encouraged.
981 Precautions should be taken to ensure containment of plastics and other non-biodegradable
982 materials.
983
984 8. The proposed structure size and use intensity of any dock, pier, and/or float should be compatible
985 with the surrounding environment and land and water uses.
986
987 9. Pier and dock construction shall be restricted to minimum size necessary to meet the needs of the
988 proposed water dependent use.
989
990 10. New pier and dock construction, excluding docks accessory to single family residences, should be
991 permitted only when the applicant has demonstrated that a specific need exists to support the
992 intended water dependent use.
993

994 **REGULATIONS – GENERAL:**
995

- 996 1. Piers and docks shall be conditionally permitted in the High-Intensity and Aquatic Environments.
997
998 2. Proposals for piers and docks shall include, at a minimum, the following information:
999

- 1000 a. Description of the proposed structure, including its location, dimensions, materials, design,
 1001 and any shoreline stabilization or other modification required by the project;
 1002
 1003 b. Ownership of uplands, tidelands, and shorelands within three hundred (300) feet of the
 1004 property boundaries;
 1005
 1006 c. Proposed location of piers, floats, or docks relative to property lines, OHWM, the line of
 1007 navigation, the construction limit line, and the contour of the extreme low tide, as applicable;
 1008
 1009 d. Location, width, height, and length of piers and docks on adjacent property; and
 1010
 1011 e. Agreements, if any, for cooperative use.
 1012
 1013 3. Piers and docks shall be prohibited in areas identified by the City, the Washington Dept. of Fish
 1014 and Wildlife (DFW), or Dept. of Natural Resources (DNR) as having high environmental value
 1015 for shellfish, fish life, or wildlife, except:
 1016
 1017 a. Where functionally necessary to the propagation, harvesting, testing, or experimentation of
 1018 said marine fisheries or wildlife, or
 1019
 1020 b. Where approved as a conditional use if it can be demonstrated that the dock or pier will not
 1021 be detrimental to the natural habitat or species of concern.
 1022
 1023 4. Piers, floats, buoys, and docks shall not interfere with use of navigable waters.
 1024
 1025 5. Piers and docks may be limited in length or prohibited, where necessary, to protect navigation,
 1026 public use, or habitat values.
 1027

1028 **REGULATIONS – GENERAL DESIGN AND CONSTRUCTION STANDARDS:**
 1029

- 1030 1. Pilings must be structurally sound prior to placement. Large spans on a few pilings shall be
 1031 favored over small spans on more pilings.
 1032
 1033 2. Piles, floats, or other elements in direct contact with water shall not be treated or coated with
 1034 biocides such as paint or pentachlorophenol. The use of arsenate compounds or creosote-treated
 1035 members is prohibited.
 1036

1037 **REGULATIONS – MOORING BUOYS AND FLOATS:**
 1038

- 1039 1. Mooring buoys and floats for recreational use shall be permitted in the Aquatic Environment
 1040 offshore from the High-Intensity Environment. Mooring buoys for commercial use shall be
 1041 permitted as a conditional use offshore from the High-Intensity Environment.
 1042
 1043 2. Buoys shall not interfere with navigation, shall be visible in daylight one hundred (100) yards
 1044 away, and shall have reflectors for night visibility.
 1045
 1046 3. Owners of buoys located seaward of the extreme low tide line shall obtain a navigable waterbed
 1047 lease from the DNR. (WAC 332-30-122(1)(ii) or its successor).
 1048
 1049 4. Buoys shall lie between the side lot lines of waterfront property extended seaward, except those
 1050 on DNR tidelands. Vessels moored to the buoys shall not be allowed to swing across the extended

- 1051 side lot lines. Where the configuration of the lot precludes these requirements, the buoy owner
 1052 shall file with the City a written statement from the affected, adjacent, waterfront property
 1053 owner(s) agreeing to the buoy placement.
 1054
- 1055 5. Mooring buoys shall be installed at least twenty (20) yards from other permitted piers, docks,
 1056 floats, or buoys so as not to interfere with or obstruct existing piers, docks, floats, or buoys.
 1057
 - 1058 6. Owners of waterfront property are permitted to install one (1) mooring buoy per waterfront lot,
 1059 except that where the waterfront lot is owned in community, the City may permit upon the
 1060 owner's application, additional buoys to total not to exceed one (1) per owner in the community.
 1061 (WAC 332-30-122(1)(ii) or its successor).
 1062
 - 1063 7. Buoys shall be located no more than two-hundred (200) feet beyond the extreme low tide line, the
 1064 three (3) fathom depth contour (18 feet at mean low tide), or the line of navigation, whichever is
 1065 closest to shore. (WAC 332-30-148 or successor).
 1066

1067 **G. UTILITIES: POLICIES AND REGULATIONS**
 1068

1069 Accessory utilities are associated with all types of shoreline development. These provisions apply to
 1070 all development, including those not needing a shoreline development permit. (Refer to Section 5.A
 1071 Table of Uses for primary use utility provisions.)
 1072

1073 **POLICIES:**
 1074

- 1075 1. Utilities are necessary to shoreline uses and should be properly installed and operated to protect
 1076 the shoreline and water from degradation.
 1077
- 1078 2. Utility facilities and rights-of-way should be placed outside shoreline areas to the maximum
 1079 extent feasible. When a shoreline location is necessary, utility lines should be underground.
 1080
- 1081 3. Utility facilities should be designed, located and maintained to assure no net loss of shoreline
 1082 ecological functions, preserve the natural landscape and minimize conflict with existing and
 1083 planned land uses.
 1084

1085 **REGULATIONS:**
 1086

- 1087 1. In shoreline areas, utility lines, including pipelines and cable, shall be placed underground unless
 1088 this is demonstrably not feasible. Such lines shall use existing rights-of-way, corridors and/or
 1089 bridge crossings whenever possible. Proposals for new corridors in the shoreline area either
 1090 parallel to the shoreline or involving a water crossing must fully substantiate the infeasibility of
 1091 existing or other routes.
 1092
- 1093 2. Utility development shall, coordinate with government agencies, to provide for compatible
 1094 multiple use of sites and rights-of-way. Such uses include shoreline access points, trails, and other
 1095 recreation and transportation uses, provided such will not unduly interfere with utility operations
 1096 or endanger public health and safety.
 1097
- 1098 3. Septic fields shall be located on the landward side of development, where possible.
 1099
- 1100 4. Sites disturbed for utility installation shall be stabilized during and following construction to

1101 avoid adverse impacts from erosion. Sites shall be replanted with native vegetation immediately
1102 following construction.
1103

1104 **SECTION 6. POLICIES AND**
1105 **REGULATIONS FOR SHORELINE**
1106 **MODIFICATION**
1107

1108 **A. GENERAL PRINCIPLES, POLICIES, AND REGULATIONS**
1109

1110 These provisions pertain to all shoreline modifications associated with or supporting a specific shoreline
1111 use. They also apply to projects whose chief intent is to protect the shoreline of a particular property to
1112 which the permit applies.
1113

1114 **GENERAL PRINCIPLES:**
1115

- 1116 1. Allow structural shoreline modifications only where they are demonstrably necessary to support
1117 or protect an allowed primary structure or legally existing shoreline use in danger of loss or
1118 substantial damage, or are necessary for reconfiguration of the shoreline for mitigation or
1119 enhancement.
1120
- 1121 2. Reduce the adverse effects of shoreline modifications and, as much as possible, limit shoreline
1122 modifications in number and extent.
1123
- 1124 3. Allow only shoreline modifications appropriate to the specific type of shoreline and environment
1125 conditions for which they are proposed.
1126
- 1127 4. Assure shoreline modifications individually and cumulatively do not result in a net loss of
1128 ecological functions by giving preference to shoreline modification types with less impact on
1129 ecological functions and requiring mitigation of identified impacts from shoreline modifications.
1130
- 1131 5. Base provisions on scientific and technical information and comprehensive analysis of drift cells
1132 for marine waters or reach conditions for rivers and streams. Contact the *Ecology* for available
1133 drift cell characterizations.
1134
- 1135 6. Plan for enhancing impaired ecological functions where feasible and appropriate while
1136 accommodating permitted uses. As shoreline modifications occur, incorporate measures to protect
1137 ecological shoreline functions and ecosystem-wide processes.
1138
- 1139 7. Avoid and reduce significant ecological impacts according to the mitigation sequence in WAC
1140 173-26-201(2)(e).
1141

1142 **POLICIES:**
1143

- 1144 1. Rip-rapping and other bank stabilization measures should be located, designed, and constructed
1145 primarily to prevent damage to existing development and property.
1146
- 1147 2. New development should be located and designed to prevent or minimize shoreline stabilization
1148 and flood protection measures.

- 1149
 1150 3. Stabilization and protection works which are more natural in appearance, more compatible with
 1151 on-going shore processes, and more flexible for long-term streamway management, such as
 1152 protective berms or vegetative stabilization, should be utilized over structural means such as
 1153 concrete revetments or extensive rip-rap.
 1154
 1155 4. Structural solutions to reduce shoreline damage should be permitted only after demonstrating
 1156 through a geotechnical analysis that nonstructural solutions would not achieve the same purpose.
 1157
 1158 5. Sloping revetments or other energy-dissipating designs are preferred to reduce the destructive
 1159 scouring effect of bulkheads on beaches.
 1160
 1161 6. Shoreline stabilization projects should provide for long-term multiple use and shoreline public
 1162 access, where appropriate.
 1163
 1164 7. Natural features such as snags and stumps support fish and other aquatic systems and when not
 1165 intruding on navigational channels or threatening other permitted uses, should be left undisturbed
 1166 except for approved beach stabilization projects.
 1167

1168 **REGULATIONS – GENERAL:**
 1169

- 1170 1. All shoreline modifications must be in support of an allowable shoreline use in conformance with
 1171 the SMP. Shoreline modifications not supporting a conforming shoreline use are prohibited.
 1172
 1173 a. Exception: Shoreline stabilization may be allowed as a shoreline use if such is demonstrably
 1174 necessary to maintain shoreline stability and habitat as set forth in WAC 173-26-
 1175 231(3)(a)(iii), and complies with all provisions of the SMP. Shoreline stabilization shall be
 1176 limited to the minimum size necessary to accomplish the purpose.
 1177
 1178 2. All applicable Federal and State permits shall be obtained and complied with in the construction
 1179 and operation of shoreline stabilization and flood protection works.
 1180
 1181 3. All new development activities shall be located and designed to prevent or minimize the need for
 1182 shoreline stabilization. New development on steep slopes and bluffs shall be set back sufficiently
 1183 to prevent the need for future shoreline stabilization.
 1184
 1185 4. The City shall require and/or use the following information during its review of shoreline
 1186 stabilization, modification, and flood protection proposals:
 1187
 1188 a. Project purpose;
 1189
 1190 b. Environment of the project including:
 1191
 1192 i. Existing shoreline and stabilization and flood protection devices within three-hundred
 1193 (300) feet on each side of the proposed project;
 1194
 1195 ii. Physical, geological, and/or soil characteristics of the area;
 1196
 1197 iii. Net direction of littoral drift and tidal currents, if any;
 1198
 1199 iv. Profile rendition of beach and uplands; and,

- 1200
1201 v. Physical or geological stability of uplands (beach type, slope and materials; uplands
1202 type, slope and materials; soils types [Soil Conservation Service]).
1203
1204 c. Design, construction materials, and methods (to include annotated drawings):
1205
1206 i. Materials used, dimensions, designs;
1207
1208 ii. Slope angle; and,
1209
1210 iii. Location of project relative to toe and crest of uplands and upland structures;
1211
1212 d. Potential impact upon area shore and hydraulic processes, upland stability, adjacent
1213 properties, and shoreline and water uses;
1214
1215 e. Alternative measures, including nonstructural, which will achieve the same purposes.
1216
1217 5. The City shall require and use the following information to review all shoreline modification
1218 proposals:
1219
1220 a. Shoreline stabilization measures shall not be designed or constructed so as to result in
1221 channelization of normal stream flows;
1222
1223 b. Stream channel direction modification, realignment and straightening are prohibited unless
1224 essential to uses consistent with this program;
1225
1226 c. Shoreline stabilization shall not be designed so as to cause scouring of the beach at the toe of
1227 protective devices or erosion on the level of the seaward beach or impact adjacent properties;
1228 and,
1229
1230 d. Upon project completion, all disturbed shoreline areas shall be restored to as near pre-project
1231 configuration as possible and replanted with native vegetation or other species approved by
1232 the City.
1233

1234 **REGULATIONS – PROHIBITED:**
1235

- 1236 1. New development that would require shoreline stabilization that will significantly affect adjacent
1237 or down current shorelines and properties.
1238
1239 2. Shoreline stabilization and flood protection works in wetlands and on point and channel bars, and
1240 in salmon and trout spawning areas, except for fish or wildlife habitat enhancement.
1241
1242 3. Beach enhancement if it interferes with the normal public use of the navigable waters of the State.
1243

1244 **B. BEACH ENHANCEMENT**
1245

1246 Beach enhancement is the upgrading of terrestrial and tidal shorelines and/or submerged shorelines for
1247 purposes of stabilization, recreational enhancement, and aquatic habitat creation or restoration using
1248 native or similar materials. Materials used depend on the intended use and shoreline dynamics such as
1249 grade, drift, etc. For recreation uses various grades of clean sand or pea gravel are often used to create,

1250 restore, or enhance a beach. To restore or recreate a shore feature or underwater aquatic environment,
1251 such as a reef, may require a rock matrix and/or combination of other materials appropriate for the
1252 intended environment.

1253
1254 **POLICIES:**
1255

- 1256 1. All beach enhancement projects should ensure aquatic habitats, existing water quality levels, and
1257 flood-holding capacities are maintained.
1258
- 1259 2. Beach restoration/enhancement utilizing naturally regenerating systems should be required
1260 where:
1261
- 1262 a. The length and configuration of the beach will accommodate such systems;
 - 1263
 - 1264 b. Such protection is a reasonable solution to the needs of the specific site; and,
 - 1265
 - 1266 c. Beach restoration/enhancement will accomplish one or more of the following:
1267
- 1268 i. Recreate or enhance natural conditions.
 - 1269
 - 1270 ii. Create or enhance natural habitat.
 - 1271
 - 1272 iii. Erosion mitigation.
 - 1273
 - 1274 iv. Enhance public shoreline access.
- 1275
- 1276 3. Supplementary beach nourishment should be encouraged where existing shoreline stabilization is
1277 likely to increase impoverishment of existing beach materials at or downdrift from the project
1278 site.
1279

1280 **REGULATIONS:**
1281

- 1282 1. Beach enhancement shall be a conditional use in all environments, but shall be undertaken only
1283 for restoration, enhancement, maintenance of natural resources, or to enhance public shoreline
1284 access.
1285
- 1286 2. Beach enhancement may be permitted as a conditional use when the applicant has demonstrated
1287 that no significant change in littoral drift adversely affecting adjacent properties or habitat will
1288 result.
1289
- 1290 3. Natural beach restoration/enhancement shall meet the following standards:
1291
- 1292 a. Design Alternatives. Design alternatives shall include the best available technology such as,
1293 but not limited to:
1294
- 1295 i. Gravel berms, drift sills, beach nourishment, and beach enhancement when appropriate.
 - 1296
 - 1297 ii. Planting with short-term mechanical assistance, when appropriate. All plantings
1298 provided shall be maintained.
 - 1299
- 1300 b. Design Criteria. Natural beach restoration/enhancement shall not:

- 1301
1302 i. Detrimentially interrupt littoral drift, or redirect waves, current or sediments to other
1303 shorelines;
1304
1305 ii. Result in any exposed groin-like structures, except that small “drift-sill” groins may be
1306 used as a means of stabilizing restored sediment as part of a well-planned beach
1307 restoration program;
1308
1309 iii. Extend waterward more than the minimum amount necessary to achieve the desired
1310 stabilization;
1311
1312 iv. Result in contours sufficiently steep to impede easy pedestrian passage, or trap drifting
1313 sediments;
1314
1315 v. Create additional dry land mass; or,
1316
1317 vi. Disturb significant areas of valuable shallow water fish/wildlife habitat as determined
1318 by the DFW, unless such habitat is immediately replaced by comparable or better
1319 habitat.
1320
1321 c. Natural Beach Restoration Construction Standards:
1322
1323 i. The size and/or mix of materials to be added to a beach shall be as similar as possible
1324 to the undisturbed beach sediment, but large enough to resist current, wake, or wave
1325 action at the site.
1326
1327 ii. The restored beach shall approximate, and may slightly exceed, the natural beach
1328 width, height, or profile (but not so as to obviously create additional dry land mass).
1329

1330 **REGULATIONS - PROHIBITED:**
1331

- 1332 1. Beach enhancement is prohibited in spawning, nesting, or breeding habitat and also where littoral
1333 drift of the enhancement materials adversely affects adjacent spawning grounds or other areas of
1334 biological significance.
1335
1336 2. Dikes, levees, jetties, groins (except drift sills for beach enhancement), gabions and breakwaters
1337 are prohibited.
1338

1339 **C. SHORELINE ARMORING (REVETMENTS AND BULKHEADS)**
1340

1341 In high-energy wave environments, bulkheads reflect some energy downward which may scour and erode
1342 the base, or “toe” of the bulkhead, lowering the beach level. This scouring may also undercut the
1343 bulkhead to the point of collapse. Bulkheading may also adversely impact long-shore fishery habitat. The
1344 slope and irregular surface of revetments tends to absorb the wave energy similar to the run-up on a
1345 natural beach.
1346

1347 The SMA exempts construction or repair of a normal protective revetment or bulkhead from the
1348 substantial development permit process when it is necessary to protect an existing single-family
1349 residence. Even when exempt, however, these structures must comply with all applicable SMP
1350 regulations. New revetments or bulkheads must comply with the requirements of WAC 173-26-

1351 231(3)(a)(iii)(B). Replacement revetments or bulkheads must comply with WAC 173-26-
1352 231(3)(a)(iii)(C). A statement of exemption for a single-family residence must be obtained from the City
1353 before commencing construction of any bulkhead or revetment.
1354

1355 **POLICIES:**
1356

- 1357 1. The use of armored structural revetments should be limited to situations where it is demonstrated
1358 that nonstructural solutions, such as bioengineering, setbacks, and buffers or any combination
1359 thereof, will not provide sufficient shoreline stabilization.
1360
- 1361 2. Because of the potential impact on complex, littoral long-shore drift systems and potential
1362 damage to other shoreline properties, bulkhead construction should be discouraged, unless it can
1363 be demonstrated that a revetment or nonstructural solution (bioengineering, setbacks, native
1364 vegetation zones) is not feasible.
1365
- 1366 3. Shoreline armoring should be designed, improved, and maintained to provide public access
1367 whenever possible.
1368
- 1369 4. Shoreline armoring should not be constructed waterward of feeder bluffs.
1370
- 1371 5. Neighboring property owners should be encouraged to coordinate planning and development of
1372 revetments or other solutions for an entire sector to avoid erosion of down-drift properties.
1373

1374
1375 **REGULATIONS – GENERAL:**
1376

- 1377 1. Revetments and bulkheads are permitted uses in the High-Intensity Environment where there are
1378 bulkheads or revetments within approximately 100 feet on either side of the property. If there are
1379 no bulkheads or revetments within 100 feet, new bulkheads and revetments shall be conditional
1380 uses. Bulkheads and revetments may be permitted in the Aquatic Environment if they are
1381 permitted in the adjacent upland environment and are located at or near the OHWM, otherwise
1382 bulkheads and revetments shall be prohibited in the Aquatic Environment. A statement of
1383 exemption shall be obtained from the City prior to construction of any bulkhead or revetment in
1384 front of an existing single-family residence. The statement of exemption shall meet all
1385 requirements of this SMP. Replacement walls or bulkheads shall not encroach waterward of the
1386 OHWM or existing structure unless the residence was occupied prior to January 1, 1992 and there
1387 are overriding safety and environmental concerns.
1388
- 1389 2. All forms of protective structures shall be designed, constructed, and maintained so as to not
1390 degrade water quality and/or fisheries habitat, and conform to state agency policies and
1391 regulations, including DFW criteria and permit requirements.
1392
- 1393 3. Proposed protective structures shall be professionally designed if it is determined there are
1394 uncertainties, such as:
 - 1395 a. Inadequate data on local geophysical conditions;
 - 1396 b. Potential effect on adjacent property; or,
 - 1397 c. Potential adverse effects on beaches seaward of structure.
1398
1399
1400
1401

- 1402 4. Natural materials and processes such as protective berms, drift logs, brush, beach feeding, or
1403 vegetation stabilization shall be used to the maximum extent possible.
1404
- 1405 5. Revetments and bulkheads shall be allowed for the operation and location of water dependent and
1406 water-related activities consistent with the SMP only when geotechnical analysis demonstrates
1407 that the following conditions exist:
1408
- 1409 a. Tidal action, current or wave erosion threatens an existing primary structure or use.
1410
- 1411 b. The erosion is not being caused by upland conditions such as de-vegetation or drainage.
1412
- 1413 c. All alternatives are infeasible (i.e., use relocation, redesign, nonstructural shore stabilization).
1414
- 1415 d. The use of natural materials and processes and nonstructural solutions for shoreline
1416 stabilization are unworkable to protect existing development.
1417
- 1418 e. The bulkhead or revetment will not result in a net loss of ecological functions.
1419
- 1420 6. Revetments shall be constructed no steeper than a 45 degree slope (1 horizontal to 1 vertical).
1421
- 1422 7. Shoreline stabilization structures shall be limited to the minimum size necessary.
1423
- 1424 8. Impacts to sediment transport shall be avoided or minimized.
1425
- 1426 9. Ensure that publicly financed or subsidized shoreline erosion control measures do not restrict
1427 public access except when such access not feasible due to incompatible uses, safety, or ecological
1428 impacts.
1429

1430 **REGULATIONS - PROHIBITED:**

- 1431
- 1432 1. Gabions (wire mesh filled with concrete or rocks) are prohibited.
1433
- 1434 2. Revetments and bulkheads shall be prohibited for any purpose if they will cause significant
1435 erosion or beach starvation.
1436
- 1437 3. Construction of a bulkhead, revetment, or other armoring structure for the purpose of retaining a
1438 landfill or creating dry land is prohibited.
1439
- 1440 4. Shoreline hardening (i.e., revetments, bulkheads, seawalls) shall not be located on shores where
1441 valuable geo-hydraulic or biological processes are sensitive to interference and critical to
1442 shoreline conservation such as feeder bluffs, marshes, wetlands, or accretion shoreforms such as
1443 spits, hooks, bars, or barrier beaches.
1444

1445 **REGULATIONS – LOCATION:**

- 1446
- 1447
- 1448 1. Shoreline armoring shall not be approved in any known or suspected midden site without the
1449 written permission of the State Historic Preservation Officer. (RCW 27.53.060 or its successor).
1450
- 1451 2. Shoreline hardening (revetments and bulkheads) shall be permitted only where local physical
1452 conditions such as foundation-bearing material and surface and subsurface drainage are suitable

- 1453 for such alterations.
 1454
 1455 3. On all shorelines, armoring structures shall be located landward of the OHWM, landward of
 1456 protective berms (artificial or natural), and generally parallel to the natural shoreline except as
 1457 allowed below:
 1458
 1459 a. On marine accretion beaches, bulkheads shall be set back a minimum of twenty-five (25) feet
 1460 landward of the OHWM and shall parallel the natural shoreline. On sloping or bluff/cliff
 1461 shores, armoring structures shall be placed as far landward of the OHWM as feasible.
 1462
 1463 b. On bluff or bank shorelines where no other armoring structures are adjacent, such structures
 1464 shall be as close to the bank as possible. However, a revetment footing shall extend
 1465 waterward sufficiently to permit adequate run-up to dissipate wave energy.
 1466
 1467 c. Revetments and bulkheads shall be flush with existing bulkheads on adjoining properties,
 1468 except where the adjoining bulkheads extend waterward of the OHWM or the toe of the bank
 1469 or permitted landfill, in which case the location requirements above shall apply.
 1470
 1471 4. New development should be located and designed to avoid the need for future shoreline
 1472 stabilization to the extent feasible. Subdivision of land must be regulated to assure that the lots
 1473 created will not require shoreline stabilization in order for reasonable development to occur using
 1474 geotechnical analysis of the site and shoreline characteristics. New development on steep slopes
 1475 or bluffs shall be set back sufficiently to ensure that shoreline stabilization is unlikely to be
 1476 necessary during the life of the structure, as demonstrated by a geotechnical analysis. New
 1477 development that would require shoreline stabilization which causes significant impacts to
 1478 adjacent or down-current properties and shoreline areas should not be allowed (WAC 173-26-
 1479 231(3)(a)(iii)).
 1480

1481 **REGULATIONS – DESIGN:**
 1482

- 1483 1. If an armored revetment is employed, the following design criteria shall be met:
 1484
 1485 a. The size and quantity of the material shall be limited to only that necessary to withstand the
 1486 estimated energy intensity of the hydraulic system;
 1487
 1488 b. Filter cloth or adequate smaller filter rock shall be used to aid drainage and help prevent
 1489 settling; and
 1490
 1491 c. The toe reinforcement or protection must be adequate to prevent a collapse of the system
 1492 from wave action.
 1493
 1494 2. Revetments shall be sited and designed consistent with appropriate engineering principles.
 1495 Professional, geologic, site studies or design may be required for any proposed revetment or
 1496 bulkhead if the City determines sufficient uncertainties or potential for damage to other shoreline
 1497 properties and features exist.
 1498
 1499 3. When a revetment is required at a public access site, provision for safe access to the water shall
 1500 be incorporated into its design.
 1501
 1502 4. Stairs or other permitted structures may be built into a revetment, but shall not extend waterward
 1503 of it.

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5. Revetments shall be designed to permit the passage of surface or ground water without causing ponding or saturation of retained soil/materials.
 6. Adequate toe protection shall be provided to ensure revetment stability without relying on additional rip-rap.
 7. Revetment construction shall use stable, non erosion-prone, homogeneous materials such as concrete, wood, rock rip-rap, or other suitable materials which accomplish the desired end with the maximum preservation of natural shoreline characteristics.

1515 **D. DREDGING AND DREDGE MATERIAL DISPOSAL**

1516
1517 Dredged material disposal on land is also subject to the landfill policies and regulations of the SMP.

1518
1519 Pursuant to WAC 173-27-040 or its successor, certain activities, such as those associated with normal
1520 maintenance and repair, are exempt from the requirements for a Shoreline Substantial Development
1521 Permit (SSDP), but may still require a shoreline conditional use permit or variance.

1522
1523 Actions exempt from SSDPs are required to comply with the SMA and all provisions of the SMP.
1524 *Ecology*/Army Corps of Engineers notifications of dredging proposals will be reviewed by the City to
1525 determine whether they are exempt from the SSDP requirement and to ensure compliance with
1526 regulations of the SMA and SMP.

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1528 **POLICIES:**

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1. Dredging and dredge material disposal should be located and conducted in a manner which minimizes damage to the existing ecology and natural resources of the area to be dredged, and to the disposal site.
 2. Dredging waterward of the OHWM for the primary purpose of obtaining fill material shall not be allowed except when the material is necessary for restoring ecological functions.
 3. Dredging operations should be planned and conducted to minimize interference with navigation and adverse impacts to other shoreline uses, properties, and values.
 4. Dredged material disposal in marine waters, other than for approved environmental enhancement or remediation projects or other uses permitted by this SMP, should only be allowed at sites designated through, and in a manner consistent with the policies and procedures of the Puget Sound Dredged Disposal Analysis (PSDDA) program (managed jointly by the Army Corps of Engineers, US Environmental Protection Agency, and Washington State DNR & *Ecology*).
 5. When dredged material has suitable organic and physical properties, dredging operations should be encouraged to recycle dredged material for beneficial use in beach enhancement, habitat creation, sediment remediation (capping), or aggregate or clean cover material at a landfill (where appropriate).

1551 **REGULATIONS – GENERAL:**

- 1552
1553
1. Dredging shall be permitted as a conditional use in the Aquatic Environment and shall be for the

1554 restoration, enhancement, or maintenance of natural resources and navigational channels.

1555

1556 2. Applications for shoreline dredging and dredged material disposal shall include copies of all
1557 information, data, and analyses submitted in accordance with the PSDDA evaluation procedures
1558 for managing the in-water disposal of dredged material and the Corps of Engineers process for
1559 Section 10 (Rivers and Harbors Act), and Section 404 (Clean Water Act) permits. This shall
1560 include the PSDDA-approved Sampling Analysis Plan, the PSDDA data report and quality and
1561 control (QA/QC) report, and the suitability decision issued by the PSDDA agencies.

1562

1563 3. In evaluating permit applications for dredging projects, the adverse effects of the initial dredging,
1564 subsequent maintenance dredging, and necessary dredged material disposal shall be considered.
1565 Dredging and dredged material disposal shall be permitted only where it is demonstrated that the
1566 proposed actions will not:

1567

1568 a. Result in significant and/or ongoing damage to water quality, fish, shellfish, and other
1569 essential marine biological elements; and

1570

1571 b. Adversely alter natural drainage and circulation patterns, currents, and tidal flows, or
1572 significantly reduce flood water capacities.

1573

1574 4. Dredging and dredged material disposal shall be scheduled to protect biological productivity and
1575 minimize interference with fisheries. Dredging shall not occur in commercial fishing (e.g., gill
1576 net, crabbing, etc.) areas during a fishing season, unless specifically addressed and mitigated for
1577 in the permit.

1578

1579 5. Dredging and dredged material disposal shall be prohibited in or on archaeological sites on, or
1580 eligible for listing on, the Washington State Register of Historic Places until such time as they
1581 have been released by the State Archaeologist.

1582

1583 **REGULATIONS – DREDGING:**

1584

1585 1. Dredging below the OHWM shall be permitted as a conditional use only:

1586

1587 a. For navigation or navigational access: Dredging of established navigation channels and
1588 basins is restricted to maintaining existing authorized location, depth, and width. Additional
1589 dredging is allowed only where needed to accommodate existing navigational uses and when
1590 ecological impacts are minimized;

1591

1592 b. In conjunction with a water-dependent use of water bodies or adjacent shorelines;

1593

1594 c. As part of an approved habitat or environmental remediation project; or

1595

1596 d. In conjunction with a navigational structure, wastewater treatment facility, or other public
1597 facility for which there is a documented public need and where other feasible sites or routes
1598 do not exist.

1599

1600 2. When dredging is permitted, the dredging shall be the minimum necessary to accommodate the
1601 proposed use.

1602

1603 3. Dredging shall utilize techniques that cause minimum dispersal and broadcast of bottom material.

1604

1605 **REGULATIONS - PROHIBITED DREDGING:**

- 1606
- 1607 1. New dredging activity is prohibited in the following locations:
- 1608
- 1609 a. In environmentally sensitive habitats (e.g., stream mouth estuaries, wetlands) except by
- 1610 shoreline conditional use permit.
- 1611
- 1612 b. Along net-positive drift sectors and where geo-hydraulic processes are active and accretion
- 1613 shoreforms would be damaged, altered, or irretrievably lost.
- 1614
- 1615 c. In shoreline areas with bottom materials prone to significant sloughing and refilling due to
- 1616 currents or tidal activity, resulting in the need for continual maintenance dredging.
- 1617
- 1618 d. In critical life-cycle habitats of officially designated or protected fish, shellfish, or wildlife.
- 1619
- 1620 e. Where concentrations of environmental pollutants or toxic chemicals are present in sediments
- 1621 and would be released in dredging operations, except as part of a permitted environmental
- 1622 enhancement or remediation program.
- 1623
- 1624 2. Dredging for the primary purpose of obtaining landfill material is prohibited.
- 1625

1626 **REGULATIONS – DREDGE MATERIAL DISPOSAL:**

- 1627
- 1628 1. Unconfined disposal of dredged material in marine waters, other than for approved environmental
- 1629 enhancement or remediation projects under a shoreline conditional use permit, shall only be
- 1630 allowed at sites identified through the process defined in the PSDDA report and incorporated in
- 1631 DNR WAC 332-30-166 or its successor (Open Water Disposal Sites).
- 1632
- 1633 2. Yearly status reports shall be prepared and submitted by the dredge disposal permittee to the
- 1634 Director as requested. The reports shall state the quantity of material dumped, characterize the
- 1635 quality of the material, and review any factors necessary to verify continued compliance with the
- 1636 shoreline permit.
- 1637
- 1638 3. In-water disposal shall utilize techniques that cause the least dispersal and broadcast of materials,
- 1639 unless specifically designed and approved as a dispersal site.
- 1640
- 1641 4. Use of dredged materials for beach enhancement shall be conducted to comply with Section 6,
- 1642 Subsection A. Beach Enhancement, so that:
- 1643
- 1644 a. Dredged materials deposited on land shall constitute fill and, when deposited within the
- 1645 jurisdiction of the SMP, shall comply with the fill regulations.
- 1646
- 1647 b. Near-shore or upland disposal of dredged materials not used for beach enhancement shall not
- 1648 be located upon, adversely affect, or diminish environmentally critical areas, recognized
- 1649 wildlife habitat, public access, water quality, or drainage.
- 1650
- 1651 c. Revegetation of land disposal sites with native species and other approved plants shall be
- 1652 required.
- 1653
- 1654

1655 **E. FILL**

1656
1657 Fill is the placement of soil, sand, rock, gravel, existing sediment or other material (excluding solid waste)
1658 to create new land, tideland, or bottom land area along the shoreline below the OHWM, or on wetland or
1659 upland areas in order to raise the elevation. Any landfill conducted within shoreline jurisdiction must
1660 comply with the following policies and regulations, and with the other provisions of the SMP. Beach
1661 enhancement as defined in the SMP shall not be considered fill.

1662
1663 **POLICIES:**

- 1664
1665 1. Fill waterward of the OHWM should be allowed only if necessary for water-dependent and/or
1666 public access uses consistent with the SMP, and with a shoreline conditional use permit as
1667 outlined under WAC 173-26-231(3)(c). Fill for a restoration project does not require a conditional
1668 use permit.
1669
1670 2. Shoreline fills should be designed and located so there will be no significant damage to existing
1671 natural resources, including surface water drainage systems.
1672
1673 3. In evaluating fill projects, factors that should be considered include:
1674
1675 a. Conflict with potential and current public use of the shoreline and water surface area as
1676 identified in adopted City plans, policies, and programs;
1677
1678 b. Total water surface reduction;
1679
1680 c. Navigation restrictions;
1681
1682 d. Impediments to water flow and drainage;
1683
1684 e. Reduction of water quality; and
1685
1686 f. Destruction of habitat.
1687
1688 4. The perimeter of fills should be designed to avoid or eliminate erosion and sedimentation
1689 impacts, both during initial fill activities and over time.
1690
1691 5. Where permitted, fills should be the minimum necessary to provide for the proposed use and
1692 permitted only for a specific development proposal permitted by the SMP. Speculative fill
1693 activity is prohibited.

1694
1695 **REGULATIONS – GENERAL:**

- 1696
1697 1. Fill shall be permitted as a conditional use in the High-Intensity Environment.
1698
1699 2. Fill in the Aquatic Environment shall be permitted as a conditional use only for water-dependent
1700 or public uses, or as part of a permitted environmental enhancement or remediation project.
1701
1702 3. Applications for fill permits shall include the following:
1703
1704 a. Proposed use of the fill area;

- 1705
- 1706 b. Source of the fill material and physical, chemical, and biological characteristics of the fill
- 1707 material as required by the Director;
- 1708
- 1709 c. Method of placement and compaction;
- 1710
- 1711 d. Location of fill relative to the OHWM and natural and/or existing drainage patterns.
- 1712
- 1713 e. Perimeter erosion control or stabilization means; and
- 1714
- 1715 f. Type of surfacing and runoff control devices.
- 1716
- 1717 4. Pile or pier supports shall be utilized when feasible in preference to fills. Fills for approved road
- 1718 development in floodways or wetlands shall be permitted only if pile or pier supports are proven
- 1719 infeasible.
- 1720
- 1721 5. Fill shall be permitted only if it is demonstrated that the proposed action will not:
- 1722
- 1723 a. Result in significant damage to water quality, fish, shellfish, and/or wildlife habitat; or
- 1724
- 1725 b. Adversely alter natural drainage and circulation patterns, currents, river and tidal flows, or
- 1726 significantly reduce flood water capacities.
- 1727
- 1728 6. Fills shall be the minimum necessary for the proposed use and permitted only for a proposal
- 1729 permitted by the SMP. Speculative fill activity is prohibited.
- 1730

REGULATIONS – DESIGN AND CONSTRUCTION:

- 1731
- 1732
- 1733 1. Where permitted, the fill shall be the minimum necessary to accommodate the proposed use.
- 1734
- 1735 2. Where fills reduce public access, compensatory public access shall be provided as part of the
- 1736 development project.
- 1737
- 1738 3. Fills shall be designed, constructed, and maintained to prevent, minimize, and control all material
- 1739 movement, erosion, and sedimentation from the affected area. Perimeters of permitted fill
- 1740 projects shall be designed and constructed with silt curtains, vegetation, retaining walls, or other
- 1741 mechanisms, and appropriately sloped to prevent erosion and sedimentation both during initial fill
- 1742 activities and afterwards. Such containment practices shall occur during the first growing season
- 1743 following completion of the fill.
- 1744
- 1745 4. Fill materials shall be sand, gravel, soil, rock, or similar material. Use of contaminated dredge
- 1746 material is prohibited.
- 1747
- 1748 5. The timing of fill construction shall be regulated to minimize damage to water quality and aquatic
- 1749 life within the time restraints recommended by the Washington DFW.
- 1750

SECTION 7. ADMINISTRATIVE REGULATIONS

A. GENERAL

The administrative system assigns responsibilities for implementation of the SMP and shoreline permit review, prescribes an orderly process for review or proposals and permit applications, and ensures persons affected by the SMP are treated fairly and equitably.

B. DIRECTOR

1. The Lynnwood Community Development Director or his/her designee (hereinafter “Director”), is vested with the following:
 - a. Overall administrative responsibility for the SMP.
 - b. Authority to grant statements of exemption from shoreline permits.
 - c. Authority to approve, conditionally approve, or deny shoreline substantial development permits and permit revisions in accordance with the policies and regulations of the SMP, provided that the decision may be appealed in accordance with Section L below.
 - d. Authority to determine if a shoreline variance permit application is minor, qualifying it for administrative decision; if the shoreline variance is not minor, it will be processed under the applicable procedures in Subsection M below.
 - e. Authority to approve, conditionally approve, or deny minor shoreline variance permit applications, provided that the decision may be appealed in accordance with Section J below.
 - f. Authority to determine compliance with the State Environmental Policy Act (RCW 43.21C or its successor).
2. The duties and responsibilities of the Director shall include:
 - a. Specifying required application forms and submittal requirements including type, details, and number of copies for shoreline substantial development, conditional use, and variance permits. At a minimum, the application shall include the information required in WAC 173-27-180 or its successor.
 - b. Determining if development proposals or other activities are consistent with the Shoreline Management Act (RCW 90.58) and the SMP.
 - c. Tracking and periodically evaluating cumulative effects of all project review actions in the shoreline jurisdiction.
 - d. Notifying the public of all permit applications.

- 1796
- 1797
- 1798 e. Advising interested citizens and applicants of the goals, policies, regulations, and procedures
- 1799 of the SMP.
- 1800
- 1801 f. Making administrative decisions and interpretations of the policies and regulations of the
- 1802 SMP and the Shoreline Management Act.
- 1803
- 1804 g. Determining whether a Shoreline Substantial Development Permit, shoreline conditional use
- 1805 permit, or shoreline variance permit is required.
- 1806
- 1807 h. Collecting applicable fees.
- 1808
- 1809 i. Determining if all applications and necessary related information are provided.
- 1810
- 1811 j. Making field inspections.
- 1812
- 1813 k. Conducting a thorough review and analysis of permit applications and related materials, and
- 1814 making written findings and conclusions.
- 1815
- 1816 l. Making decisions pursuant to paragraph 1 above.
- 1817
- 1818 m. Submitting applications and all relevant information and materials along with written findings
- 1819 and recommendations to the Hearing Examiner.
- 1820
- 1821 n. Providing technical and administrative assistance to the Council, as needed, for effective and
- 1822 equitable implementation of the SMP and the SMA.
- 1823
- 1824 o. Proposing amendments to the SMP as deemed necessary to more effectively and equitably
- 1825 achieve its goals and policies.
- 1826
- 1827 p. Seeking remedies for alleged violations of the SMP, the SMA, or conditions of any approved
- 1828 shoreline permit.
- 1829
- 1830 q. Coordinating information with affected agencies.
- 1831
- 1832 r. Forwarding shoreline permits to *Ecology* for filing or appropriate action.
- 1833
- 1834 s. Deciding whether to require any applicant granted a shoreline permit to post a bond or other
- 1835 acceptable security to assure the applicant and/or applicant's successors in interest shall
- 1836 adhere to the approved plans and all conditions attached to a shoreline permit. Such bonds or

1837 **C. HEARING EXAMINER**

- 1838
- 1839 1. The City of Lynnwood Hearing Examiner is vested with authority to:
- 1840
- 1841 a. Approve, conditionally approve, or deny Shoreline variance and shoreline conditional use
- 1842 permit applications after holding an open record public hearing and after considering the

- 1843 findings and recommendations of the Director, which shall be given substantial weight.
1844
1845 b. Affirm, affirm with modifications, or reverse decisions on shoreline substantial development
1846 permit applications, minor Shoreline variance applications, and shoreline exemptions on
1847 appeal.
1848
1849 2. Further duties and responsibilities of the Hearing Examiner shall include:
1850
1851 a. Ensuring that proper notice is given to appropriate persons and the public for all hearings
1852 before the Hearing Examiner.
1853
1854 b. Basing all decisions on shoreline permits and administrative appeals on the criteria
1855 established in the SMA and the SMP.
1856
1857 c. Deciding whether to require any applicant granted a shoreline permit to post a bond or other
1858 acceptable security to assure the applicant and/or the applicant's successors in interest shall
1859 adhere to the approved plans and all conditions attached to the shoreline permit. Such bonds
1860 or securities shall have a face value of at least one hundred (100) percent of the estimated
1861 development cost, including attached conditions. The City Attorney shall approve such bonds
1862 or securities as to form.
1863

1864 **D. PLANNING COMMISSION**

1865
1866 The Lynnwood Planning Commission shall be responsible for hearing and making recommendations
1867 for action to the City Council on amendments to the Shoreline Master Plan
1868

1869 **E. CITY COUNCIL**

1870
1871 The City Council is vested with authority to review and act upon any recommendations for
1872 amendments or revisions of the SMP. To become effective, amendments to the SMP must be
1873 reviewed and approved by *Ecology*, pursuant to RCW 90.58.190 or its successor and WAC 173-26 or
1874 its successor.
1875

1876 **F. PERMIT OR EXEMPTION REQUIRED BEFORE UNDERTAKING 1877 DEVELOPMENT OR ACTIVITY**

1878 1879 **PERMITS REQUIRED**

- 1880
1881 1. A development, use, or activity shall not be undertaken within the jurisdiction of the Shoreline
1882 Management Act (RCW 90.58 or its successor) and the Shoreline Master Program, unless it is
1883 consistent with the policy and procedures of the Shoreline Management Act, applicable State
1884 regulations and the Shoreline Master Program.
1885
1886 2. A substantial development shall not be undertaken within the jurisdiction of the Shoreline
1887 Management Act and the Shoreline Master Program, unless an appropriate shoreline permit has
1888 been obtained, the appeal period has been completed, any appeals have been resolved, and/or the
1889 applicant has been given permission by the proper authority to proceed.

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3. Any person wishing to undertake substantial development or exempt development on shorelines shall apply to the Director for an appropriate shoreline permit or a Statement of Exemption.
 4. If a development, use or activity is listed as a conditional use by the SMP, such development, use, or activity shall not be undertaken within the jurisdiction of the SMA and the SMP, unless a shoreline conditional use permit has been obtained, the appeal period has been completed, any appeals have been resolved, and/or the applicant given permission to proceed by the proper authority.
 5. If a development, use, or activity cannot comply with the regulations of the SMP, a shoreline variance must be obtained before commencement of development or construction, or beginning the use or activity.
 6. If a project includes uses or activities that include both permitted and conditional uses, or a regular (major rather than minor) shoreline variance is required, the permit shall be heard and decided by the Hearing Examiner using the procedures, requirements, and criteria for a shoreline conditional use and/or variance.
 7. See WAC 173-27-070 or its successor for a description of how the permit requirements apply to developments undertaken prior to passage of the SMA.
 8. See WAC 173-27-060 or its successor for a description of how the permit requirements apply to federal agency projects.

1915 **G. STATEMENT OF EXEMPTION**
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1. No use or activity described in WAC 173-27-050 or other exempt development shall be undertaken within the jurisdiction of the SMA and the SMP, unless a statement of exemption has been obtained from the Director.
 2. The request for the statement of exemption shall be in writing, on forms required by the Director, and shall include the information required by the Director. In the case of an emergency, the Director may waive this requirement and authorize the use or activity orally or in writing. If authorized orally, it shall be put in writing as soon as possible. A statement of exemption may be for a single development event, but the Director can issue a programmatic statement of exemption for a finite series of development events or regularly repeated activity, as long as the series of events or repeated activity can be described and predicted in sufficient detail so a determination can be made that they are and will as a whole, be exempt under WAC 173-27-050.
 3. The Director shall decide requests for a Statement of Exemption based on WAC 173-27-040 or its successor and the provisions of the SMA and SMP.
 4. Before determining that a proposal is exempt, the Director may conduct a site inspection to ensure that the proposal meets the exemption criteria.
 5. Exempt developments and activities shall comply with the SMA and SMP. The Director shall condition statements of exemption to ensure the exempt development or activity complies with the SMA and SMP.

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6. In the case of development subject to the policies and regulations of the SMP, but exempt from the substantial development permit process, shoreline management requirements may be made conditions of the building permits and/or other permits and approvals. For example, the approval of a building permit for a single-family residence can be conditioned with provisions from the SMP.
 7. Whenever a development falls within the exemptions stated in WAC 173-27-040 or its successor, a letter exempting the development from the substantial development permit requirements of RCW 90.58 or its successor shall be given to the applicant and to *Ecology*.

1950 **H. DEVELOPMENTS EXEMPT FROM THE SHORELINE**
1951 **MANAGEMENT ACT**

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1. Developments as outlined in WAC 173-27-045, or its successor, are not required to meet the requirements of the Shoreline Management Act.
 2. Areas and uses that are under exclusive federal jurisdiction as established through federal or state statutes are not subject to the jurisdiction of the Shoreline Management Act (RCW 90.58).

1959 **I. FEES**

1960
1961 A filing fee in an amount established by the City Council shall be paid at the time of application.
1962 After the fact permit fees will be triple the otherwise required amount.
1963

1964 **J. PERMIT APPLICATION**

1965
1966 The Director shall provide the necessary application forms for shoreline substantial development,
1967 conditional use, and variance permits. The application shall provide, at a minimum, the information
1968 required by WAC 173-27-180.
1969

1970 **K. SHORELINE SUBSTANTIAL DEVELOPMENT PERMIT PROCESS**

1971 **SHORELINE SUBSTANTIAL DEVELOPMENT PERMIT REVIEW PROCEDURE**

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1. The applicant shall submit a complete application including a site plan, the required fees, and a SEPA Checklist to the Director.
 - a. The Director shall review the application and determine within 28 days whether it is complete. The application shall not be deemed filed until the Director determines the application is complete and all required fees are paid. If the application is not complete, the Director shall contact the applicant and request the needed information or fee.
 2. Notice
 - a. The Director shall give notice of the shoreline application by at least one of the following methods:

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- i. Mailing of the notice by first class mail, postage prepaid, to the applicant, the property owner and each person identified by the real property records of the Snohomish County auditor as the owner of property within three hundred (300) feet of any boundary of the subject property, and of any contiguous property owned by the owner of the land on which the proposal is sited. The notices shall include the information required by WAC 173-27-110 or its successor.
 - ii. Posting notice in a conspicuous manner on the property where the project is to be constructed.
 - iii. Any other means deemed appropriate to accomplish the objectives of reasonable notice to adjacent landowners and the public.
 - b. Failure to receive a properly mailed notice shall not affect the validity of any testimony received at the hearing or of any action taken.
 - c. An affidavit(s) attesting that the notice has been properly published and/or properly mailed shall be completed and included in the application file.
 - d. Costs of notification shall be the responsibility of the applicant.
3. Public Comment - The City shall not make a decision on the permit until after the end of the comment period.
 - a. A thirty (30) day public comment period shall be given for shoreline permits.
 - b. The public comment period shall be twenty (20) days for substantial development permits for a limited utility extension or for erosion control measures to protect a single-family residence and its appurtenant structures. (See Page A-9, Appendix A for definition of "limited utility extension.")
 - c. SEPA review shall be conducted as provided by LMC 17.02 or its successor. The required SEPA notices should be included with the shoreline notices when possible. SEPA documents should be circulated with permit documents where possible.
4. Decision - After the thirty (30) day comment period has ended, the Director shall issue a decision on the application.
 - a. The Director may approve, approve with modifications, or deny any substantial development permit.
 - b. In making the decision, the Director shall consider the applicable provisions of the SMA, as amended; WAC 173-27 or its successor; the SMP; all other applicable law; and any related documents and approvals. The Director shall also consider whether the cumulative impact of additional past and future requests that reasonably may be made in accordance with the Comprehensive Plan, or similar planning document, for like actions in the area will result in substantial adverse effects on the shoreline environment and shoreline resources.
 - c. The applicant(s) shall have the burden of proving that a proposed development is consistent with the approval criteria and SMP policies and regulations. [RCW 90.58.140(7) or its

- 2037 successor].
- 2038
- 2039 d. The Director may require additional information if necessary.
- 2040
- 2041 e. The Director shall issue a written decision which contains the following:
- 2042
- 2043 i. A statement indicating the application is approved, approved with modifications, or
- 2044 denied;
- 2045
- 2046 ii. A statement of any conditions included as part of an approval or approval with
- 2047 modifications;
- 2048
- 2049 iii. A statement of facts upon which the decision, including any conditions, is based, and
- 2050 conclusions derived from those facts; and
- 2051
- 2052 iv. A statement of the right of any person to appeal the decision of the Director pursuant
- 2053 to section I below.
- 2054
- 2055 5. Distribution/notification of Administrative Decision.
- 2056
- 2057 a. The Director shall mail the applicant the original of the completed permit form and the
- 2058 findings and conclusions, and shall forward a copy of the same documents to *Ecology* and the
- 2059 Attorney General’s Office as required by WAC 173-27-130 or its successor.
- 2060
- 2061 b. All persons who submitted comments on the application during the comment period (see
- 2062 paragraph 3 above) and anyone else requesting notification in writing, shall be notified in a
- 2063 timely manner of the decision and mailed a copy of the decision.
- 2064

2065 **L. APPEALS**

2066

- 2067 1. Local appeals of SSDPs (for appeal of CUPs & variances, see Section J).
- 2068
- 2069 a. The Director's decision may be appealed to the Hearing Examiner within twenty-one (21)
- 2070 calendar days following issuance of the decision.
- 2071
- 2072 b. Appeals shall be initiated by filing a notice of appeal with the Community Development
- 2073 Dept. setting forth the action being appealed and the principal points of the appeal together
- 2074 with a filing fee as prescribed by the Council.
- 2075
- 2076 c. If an appeal is filed, the case shall be reviewed by the Hearing Examiner at an open record
- 2077 hearing following the procedures of LMC 1.35.200 or its successor.
- 2078
- 2079 d. Within eight (8) days of final action by the City, including completion of appeals or
- 2080 expiration of appeal periods, the Director shall file copies of the action with the *Ecology* and
- 2081 the Attorney General.
- 2082
- 2083 2. Washington State Department of Ecology Appeal Period
- 2084
- 2085 a. The twenty-one (21) day appeal period begins from the “date of receipt” – the date the
- 2086 applicant receives the Ecology appeal period letter. Date of receipt is defined in RCW

- 2087 43.21B.001 (*Ecology* sends a letter to the Director and the applicant informing them of the 21
2088 day appeal period.)
2089
- 2090 b. During the appeal period, the City decision on the permit may be appealed to the Washington
2091 State Shorelines Hearings Board under RCW 90.58.180 or its successor and WAC 461-08 or
2092 its successor. Development pursuant to a shoreline permit shall not begin and is not
2093 authorized until:
- 2094
- 2095 i. Thirty (30) days from the filing date of the Hearings Board decision defined in RCW
2096 90.58.140(5)(b &c) or its successor and WAC 173-27-090 or its successor, or;
- 2097
- 2098 ii. All review proceedings initiated within twenty-one (21) days from the filing date
2099 have been terminated, except as provided in RCW 90.58(b) or its successor.
2100
- 2101 3. Revisions to Permits
2102
- 2103 a. An applicant wishing to revise a permit must submit detailed plans and text describing the
2104 proposed changes. If the Director determines the proposed revisions are within the scope and
2105 intent of the original permit, consistent with WAC 173-27-100 or its successor, the Director
2106 may approve the revision.
2107
- 2108 b. "Within the scope and intent of the original permit" means all of the following:
2109
- 2110 i. No additional over-water construction is involved, except that pier, dock, or float
2111 construction may be increased by five hundred (500) square feet or ten (10) percent,
2112 whichever is less;
2113
- 2114 ii. Ground area coverage and/or height of each building is not increased more than ten
2115 (10) percent;
2116
- 2117 iii. The revision does not authorize development to exceed height, setback, lot coverage,
2118 or any other requirement of the SMP;
2119
- 2120 iv. Additional landscaping is consistent with conditions, if any, attached to the original
2121 permit and with the SMP;
2122
- 2123 v. The use authorized by the original permit is not changed; and
2124
- 2125 vi. No adverse, environmental impact will be caused by the revision. WAC 173-27-100
2126 (2)(a-f) as amended.
2127
- 2128 c. If the sum of the proposed revision and any previously approved revisions do not meet the
2129 criteria above, a new shoreline permit application must be filed. If the revision involves a
2130 shoreline conditional use or variance conditioned by *Ecology*, the revision also must be
2131 reviewed and approved by *Ecology*.
2132
- 2133 d. A City or *Ecology* decision on a permit revision may be appealed within twenty-one (21)
2134 days of such decision, in accordance with RCW 90.58.180 or its successor.
2135
- 2136 e. Construction allowed by a revised permit, but not under the original permit is undertaken at
2137 the applicant's risk until expiration of the appeals deadline.

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4. Duration of Permits

a. Substantial Progress

- i. Substantial progress towards completion of a permitted activity shall be undertaken within two (2) years after approval of the permit. See Section 8, Appendix A for definition of "substantial progress."
- ii. The Director may, with prior notice to parties of record and *Ecology*, grant a single one (1) year extension of the two (2) year substantial progress period based on reasonable justifying factors, including the inability to expeditiously obtain other required governmental permits. The extension request must be filed before the end of the time limit.

b. Five Year Permit Authorization

- i. The authorization granted by an approved permit to construct any structure or conduct any use or activity shall terminate five (5) years from the date the permit is approved by the City, except that the permit may be authorized for a lesser period of fixed duration.
- ii. Where an approved permit authorizes construction, the use and maintenance of the structure or facility may continue after the five (5) year period, provided the structure was completed during the five (5) year time limit or any approved extension.
- iii. Where an approved permit authorizes a use or activity which does not require a structure, such as mining or maintenance dredging, the use or activity shall cease at the end of the five (5) year limit or any extension as granted in paragraph (4) below.
- iv. The Director may, with prior notice to parties of record and *Ecology*, grant one (1) extension of up to one (1) year based on reasonable justifying factors. The extension request must be filed before the end of the time limit.

c. The time periods shall not include time during which an activity was not actually pursued due to the pendency of reasonably related administrative appeals or litigation or other government approvals or permits as provided in WAC 173-27-090(4).

d. When a permit is conditioned, the conditions shall be satisfied prior to occupancy or use of a structure, or prior to commencement of a nonstructural activity, provided an alternative compliance limit may be specified in the permit. Permit revisions may be authorized after expiration of the original permit under paragraph b of this section, provided this procedure shall not be used to extend the original permit time requirements. [WAC 173-27-090 or its successor].

M. SHORELINE VARIANCE AND SHORELINE CONDITIONAL USE PERMITS

This subsection applies to all applications for shoreline variances and shoreline conditional use permits.

2187 Where a development includes several uses or activities one or more of which requires a shoreline
2188 conditional use permit, all uses and activities shall be processed and decided following the shoreline
2189 conditional use procedures.
2190

2191 1. Shoreline variance: The purposes of a shoreline variance permit are strictly limited to granting
2192 relief to specific bulk, dimensional, or performance standards of the SMP, where there are
2193 extraordinary or unique circumstances relating to the property such that strict implementation of
2194 the SMP would impose unnecessary hardships on the applicant or thwart SMA policies as stated
2195 in RCW 90.58.020 or its successor. Variances from the SMP use and modification regulations are
2196 prohibited.
2197

2198 a. Application - An application for a shoreline variance shall be submitted on a form provided
2199 by the City. The application should be accompanied by maps, a completed environmental
2200 checklist, applicable fees, and any other information specified in the SMP or requested by the
2201 Director.
2202

2203 b. Criteria for Granting Shoreline variances - Shoreline variance permits for development to be
2204 located landward of the OHWM, except within wetlands may be authorized provided the
2205 applicant can demonstrate the following:
2206

2207 i. That the strict application of the bulk, dimensional, or performance standards in the
2208 applicable Master Program precludes or significantly interferes with a reasonable use of
2209 the property not otherwise prohibited by the SMP.
2210

2211 ii. The hardship described above is specifically related to the property and the result of
2212 unique conditions, such as irregular lot shape, size, natural features, and the application
2213 of the SMP, and is not, for example, from deed restrictions or the applicant's own
2214 actions.
2215

2216 iii. The design of the project will be compatible with other permitted activities in the area
2217 and will not cause adverse effects to adjacent properties or the shoreline environment.
2218

2219 iv. The shoreline variance authorized does not constitute a grant of special privilege not
2220 enjoyed by the other properties in the area and will be the minimum necessary to afford
2221 relief.
2222

2223 v. The public interest will suffer no substantial detrimental effect.
2224

2225 c. Applications for shoreline variance permits when the authorized development will be located
2226 waterward of the OHWM or in wetlands may be approved or approved with conditions or
2227 modifications subject to approval by *Ecology*, if the decision maker finds the applicant has
2228 demonstrated compliance with the following criteria as well as those stated in paragraphs b
2229 and d:
2230

2231 i. Strict application of the bulk, dimensional, or performance standards in the SMP
2232 precludes all reasonable economic use of the property not otherwise prohibited by the
2233 SMP.
2234

2235 ii. Public navigation and shoreline use rights are not adversely affected.
2236

2237 d. In granting shoreline variance permits, consideration shall be given to the cumulative impact

2238 of additional requests for like actions in the area. For example, if shoreline variances were
2239 granted to other developments in the area where similar circumstances exist, the totality of
2240 such variances should remain consistent with the policies of RCW 90.58 or its successor and
2241 should not produce substantial adverse shoreline environment effects.
2242

2243 2. Conditional Uses - The purpose of a shoreline conditional use permit is to allow greater flexibility
2244 in applying the SMP use regulations in a manner consistent with RCW 90.58.020, or its
2245 successor. Shoreline conditional use permits should also be granted in circumstances where
2246 denial of the permit would result in thwarting policy enumerated in RCW 90.58.020 or its
2247 successor. The City or *Ecology* may attach special conditions to the permit to prevent undesirable
2248 effects from the proposed use. Uses specifically prohibited by the SMP may not be authorized by
2249 a shoreline conditional use permit. In granting conditional use permits consideration shall be
2250 given to the cumulative impacts of additional requests for like actions in the area.
2251

2252 a. Uses classified as conditional uses may be authorized provided the applicant can demonstrate
2253 all the following:
2254

2255 i. The proposed use will be consistent with the policies of RCW 90.58.020 or its
2256 successor and the policies of the SMP.
2257

2258 ii. The proposed use will not interfere with the normal public use of the shorelines.
2259

2260 iii. The proposed use of the site and design of the project will be compatible with other
2261 permitted uses in the area.
2262

2263 iv. The proposed use will not cause unreasonable adverse effects to the shoreline
2264 environment designation in which it is located.
2265

2266 v. There will be no substantial detrimental effect to the public interest.
2267

2268 vi. The proposed use is consistent with the Lynnwood Zoning Ordinance (LMC Title 21)
2269 and Comprehensive Plan.
2270

2271 b. Uses not listed as permitted or conditionally permitted in the SMP, but not prohibited may be
2272 authorized as conditional uses provided the applicant in addition to the criteria set forth in 2a
2273 above demonstrates that
2274

2275 i. Extraordinary circumstances preclude reasonable economic use of the property in a
2276 manner consistent with RCW 90.58.020, or its successor, and
2277

2278 ii. The proposed use would not produce significant adverse effects on the shoreline
2279 environment.
2280

2281 3. If the Director determines that a shoreline variance permit application is minor in its potential
2282 impacts, the Director shall decide the application following the procedures in Section H above
2283 Shoreline Substantial Development Permit Process, under 1. The Director's decision is subject to
2284 *Ecology* approval as stated in paragraph 7 below. A shoreline variance shall be considered minor
2285 if it meets the following criteria:
2286

2287 a. Projects of relatively small scale;
2288

- 2289 b. Projects involving only one property; or
2290
2291 c. Projects which have not generated significant public input.
2292
2293 4. Applications for shoreline variances not determined to be minor and all shoreline conditional use
2294 permits shall be decided by the Hearing Examiner upon holding an open record public hearing.
2295
2296 a. The Director shall prepare a staff report identifying the approval criteria, providing available
2297 information on the application, analyzing the proposal, making a recommendation on the
2298 proposal, making recommended findings of fact and conclusions of law, and including any
2299 other information or recommendations the Director finds appropriate. The Director shall
2300 provide a copy of the staff report to the applicant and the Hearing Examiner.
2301
2302 b. In making a decision, the Hearing Examiner shall consider the applicable criteria in 1 and 2
2303 above. The applicant has the burden of proof to show that the proposal complies with the
2304 decision criteria and all applicable requirements. [RCW 90.58.140(7) or its successor].
2305
2306 c. The Hearing Examiner may attach conditions of approval to permits as necessary to assure
2307 consistency of the proposal with the approval criteria.
2308
2309 d. There is no local appeal of the Hearing Examiner’s decision on shoreline variances and
2310 conditional use permits.
2311
2312 5. The Director shall mail the final City decision to the applicant, *Ecology*, and the Attorney
2313 General. The permit must be received by *Ecology* within eight (8) days of the date of the
2314 decision. Within eight (8) days, the Director shall also mail the decision to any person requesting
2315 notice of the decision.
2316
2317 a. *Ecology* shall approve, approve with conditions, or deny all shoreline variance and shoreline
2318 conditional use permits approved by the City. *Ecology*'s decision must be made within thirty
2319 (30) days of the date the permit and other information required by WAC 173-27-130 or its
2320 successor are received by *Ecology* and the Attorney General. *Ecology* will send a letter to the
2321 applicant and the City informing them of the decision. Up receipt of the *Ecology* decision, the
2322 Director shall notify persons requesting such.
2323
2324 6. Twenty-one Day Appeal Period
2325
2326 a. If the permit or shoreline variance was denied by the City, the twenty-one (21) day appeal
2327 period begins the day the applicant receives the denied permit or shoreline variance and other
2328 information required by WAC 173-27-130 or its successor. *Ecology* usually sends an appeal
2329 period letter to the Director and the applicant.
2330
2331 b. If the permit or shoreline variance was approved by the local government, the twenty-one
2332 (21) day appeal period begins from the “date of receipt” – the date the applicant receives the
2333 *Ecology* appeal period letter. Date of receipt is defined in RCW.
2334
2335 c. During the appeal period, the City and/or *Ecology* decision may be appealed to the
2336 Washington State Shorelines Hearings Board as provided by RCW 90.58.180 or its successor.
2337 Construction, development, or any authorized use or activity shall not begin until after the
2338 twenty-one (21) day appeal period, or until such review is terminated except as described in
2339 RCW 90.58.140(5).

2340

2341 **N. NONCONFORMING DEVELOPMENT**

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2343 Applicability:

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2345 This section applies to shoreline uses or structures lawfully constructed or established prior to the
2346 effective date of the SMP, but which do not conform to present regulations or standards of the SMP or
2347 policies of the SMA.

2348

2349 Nonconforming uses and developments may be continued provided they meet the following provisions:

2350

2351 1. Nonconforming Uses

2352 a. Nonconforming uses shall not be altered or expanded in any way that increases the
2353 nonconformity.

2354

2355 b. If a nonconforming use is discontinued for twelve (12) consecutive months or for 12 months
2356 in any two (2) year period, any subsequent use shall conform.

2357

2358 c. A nonconforming use can change to another nonconforming use with a CUP if:

2359

i. It meets the criteria of WAC 173-27-080(2)(e);

2360

ii. No reasonable alternative conforming use is practical; and

2361

2362 iii. The proposed use is consistent with the SMA and SMP and compatible with other
2363 uses in the area.

2364

2365

2366 2. Nonconforming Structures

2367

2368 a. Enlargement or expansion of a structure cannot increase the extent of nonconformity by
2369 further encroaching upon or extending into areas where construction or use would not be
2370 allowed for new development or use. Repair, reconstruction, and expansion of nonconforming
2371 structures which does not increase the nonconformity shall be permitted.

2372

2373 b. Permitted expansion of a nonconforming structure shall not obstruct existing views of the
2374 water from primary waterfront residences or public rights-of-way to any greater degree than a
2375 fully conforming structure.

2376

2377 c. If a nonconforming development is damaged to an extent not exceeding seventy-five percent
2378 of the replacement cost of the original development, it may be reconstructed to those
2379 configurations existing immediately prior to the time the development was damaged, provided
2380 that application is made for the permits necessary to restore the development within six
2381 months of the date the damage occurred, all permits are obtained and the restoration is
2382 completed within two years of permit issuance (WAC 173-27-080 (2)(g)).

2383

2384 **O. MASTER PROGRAM REVIEW**

2385

2386 The Shoreline Master Program and Restoration Plan shall be periodically reviewed by the Director and
2387 City Council and adjustments made as necessary to reflect changing local circumstances, new information

2388 or improved data, and/or changes in State statutes and regulations. This review process shall be consistent
2389 with RCW 90.58.080(4) and shall include a local citizen involvement effort and public hearings to obtain
2390 the views and comments of the public. Consistent with the aforementioned statute, a Shoreline Master
2391 Program Review shall be undertaken at least once every eight years.
2392

2393 **P. AMENDMENTS TO MASTER PROGRAM**

2394 The provisions of the SMP may be amended as provided in RCW 90.58.120, 90.58.200 or its successor
2395 and WAC 173-26 or its successor. Any person, including the City, may submit an application for an
2396 amendment to the Director together with any required fee. Any SMP amendment must satisfy the
2397 requirements of the State Environmental Policy Act (RCW 43.21C or its successor).
2398
2399

2400 The City Council shall approve, modify, or deny an application for an amendment after conducting at
2401 least one public hearing considering the proposal. The City shall publish notice of the hearing at least
2402 once in each of the three (3) weeks immediately preceding the hearing in one or more newspapers of
2403 general circulation in the area within the jurisdiction of the SMP. The notice shall include:

- 2404 1. Reference to the authority under which the action is proposed;
- 2405 2. A statement or summary of the proposed changes to the SMP;
- 2406 3. The date, time, and location of the hearing, and the manner in which interested persons may
2407 present their views; and
- 2408 4. Reference to the availability of the proposal for public inspection at the local government office,
2409 or upon request.
2410
2411

2412 Amendments and revisions to the SMP are not effective unless approved by *Ecology*.
2413
2414

2415 Proponents of shoreline environment redesignations (i.e., amendments to the shoreline maps and
2416 descriptions) have the burden of demonstrating consistency with the shoreline environment designation
2417 criteria of the SMP.
2418
2419

2420 The Director shall send a copy of any locally approved amendment and the information required by WAC
2421 173-26-060 or its successor to *Ecology* within fourteen (14) days of the date of the City's decision. If
2422 *Ecology* denies or modifies the proposed amendment, the City may appeal the decision to the *Growth*
2423 *Management Hearings Board* as provided in RCW 90.58.190.
2424
2425

2426 **Q. SEVERABILITY**

2427 If any provision of the Shoreline Master Program, or its application to any person, legal entity, parcel of
2428 land or circumstances is held invalid, the remainder of the SMP and application of its provisions to other
2429 persons, legal entities, parcels of land or circumstances, shall not be affected.
2430
2431

2432 **R. INSPECTIONS**

2433 Whenever it is necessary to make an inspection to enforce any provision of this ordinance or whenever
2434

2435 the Director has reasonable cause to believe that there exists in any building, or upon any premises, any
2436 condition which makes such a building or premises nonconforming, the Director or his designee may
2437 enter such building or premises. If the building or premises is occupied, the Director or designee shall
2438 present proper credentials and request entry. If the building or premises is unoccupied, the Director shall
2439 make reasonable efforts to locate the owner or other persons having charge or control of the building or
2440 premises and request entry. If entry is refused, the Director shall have recourse to every remedy provided
2441 by law to secure entry, including administrative search warrant.
2442

2443 **S. ENFORCEMENT**

2444

2445 Enforcement of this Shoreline Master Program shall be in accordance with the provisions of LMC 1.40,
2446 Code Violations, except that penalties cannot exceed \$1,000 per violation.

APPENDIX A. DEFINITIONS AND ACRONYMS

- 1
- 2
- 3 **Accessory Use** - A use that is customarily incidental and related to the principal use.
- 4 **Accretion** - The growth of a beach by the addition of material transported by wind and/or water. Included
5 are such shoreforms as barrier beaches, points, spits, hooks, and tombolos.
- 6 **Act** - The Shoreline Management Act, Chapter 90.58 RCW or its successor.
- 7 **Adjacent Lands** - Lands adjacent to the shorelines of the state (outside of shoreline jurisdiction). The
8 Shoreline Management Act directs local governments to develop land use controls (i.e., zoning, etc.) for
9 such lands consistent with the policies of the Shoreline Management Act, related rules, and the local
10 master program. See RCW 90.58.340 or its successor.
- 11 **Administrator** - Director of the Department of Planning and Community Development, or designee,
12 charged with responsibility for administering the Shoreline Master Program.
- 13 **Anadromous Fish** - Species such as salmon, which are born in fresh water, spend a large part of their
14 lives in the sea, and return to fresh water rivers and streams to procreate.
- 15 **Applicant** - An individual, partnership, corporation, association, organization, cooperative, public or
16 municipal corporation, or agency of the state or local governmental unit, however designated [RCW
17 90.58.030(1d) or its successor].
- 18 **Appurtenance** - A structure or development necessarily connected to the use and enjoyment of a single-
19 family residence. "Normal appurtenance" means a garage, boat house, deck, driveway, utilities, fences,
20 and grading not exceeding two hundred fifty (250) cubic yards, except to construct a conventional
21 drainfield [WAC 173-27-040(2)(g) or its successor]. Appurtenances must be landward of the ordinary
22 high water mark (OHWM) and the perimeter of marshes, bogs, and swamps.
- 23 **Aquaculture**- The cultivation of fish, shellfish, and/or other aquatic animals or plants, including the
24 harvesting and incidental preparation of these products for human use. Activities include hatching,
25 cultivating, planting, feeding, raising and harvesting aquatic plants and animals, and constructing and
26 maintaining necessary equipment, buildings, and growing areas. Cultivation methods include, but are not
27 limited to, fish pens, shellfish rafts, racks and long lines, seaweed floats and nets, and the culture of clams
28 and oysters on tidelands and subtidal areas.
- 29 **Archaeological** - Having to do with the scientific study of material remains of past human life and
30 activities.
- 31 **Average Grade Level** - The average of the natural or existing topography of the portion of the lot, parcel,
32 or tract of real property directly under the proposed building or structure. In the case of structures built
33 over water, average grade level shall be the ordinary high water level. Calculation of the average grade
34 level shall be made by averaging the elevations at the center of all exterior walls of the proposed building

35 or structure. Note: This definition of "average grade level" differs from the definition in the City of
36 Lynnwood Zoning Code (LMC Title 21). Structures within shoreline jurisdiction shall comply with the
37 definition contained herein.

38 **Backshore** - The accretion or erosion zone, located landward of the line of ordinary high tide, which is
39 normally wetted only by storm tides. A backshore may take the form of a more or less narrow storm berm
40 (ridge of wave-heaped sand and/or gravel) under a bluff, or it may constitute a broader complex of berms,
41 marshes, meadows, or dunes landward of the line of ordinary high water. It is part of the littoral drift
42 process along its seaward boundary.

43 **Backshore marina** - See Marina.

44 **Beach** - The zone of unconsolidated material that is moved by waves, wind, and tidal currents, extending
45 landward to the coastline.

46 **Beach Enhancement/Restoration** - The process of restoring a beach to a state more closely resembling a
47 natural beach using beach feeding, vegetation, drift sills, and other non-intrusive means, as applicable.

48 **Beach Feeding** - The process of replenishing a beach by delivery of materials dredged or excavated
49 elsewhere.

50 **Beach Scarp** - A steep slope produced by wave erosion.

51 **Benthic Organisms** - Organisms that live in or on the bottom of a body of water.

52 **Berm** - A linear mound, or series of mounds, of sand and/or gravel generally paralleling the water at, or
53 landward of the line of ordinary high tide. Also, a linear mound used to screen an adjacent activity, such
54 as a parking lot, from transmitting excess noise and glare.

55 **Best Available Technology** - The most effective method, technique, or product available, generally
56 accepted in the field, and demonstrated to be reliable, effective, and (preferably) low maintenance.

57 **Best Management Practice (BMP)** - See LMC Title 17.

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

61 **Biota** - The animals and plants that live in a particular location or region.

62 **BMP** - see Best Management Practices.

63 **BNSF** - Burlington Northern Santa Fe Railroad (right-of-way within Lynnwood shoreline jurisdiction)

64 **Boat House** - An upland building used primarily for boat storage.

65 **Boat Launch or Ramp** - Graded slopes, slabs, pads, planks, or rails used for launching boats by means
66 of a trailer, hand, or mechanical device.

- 67 **Boating Facilities** - Includes marinas, boat launch facilities, dry storage facilities, marine travel lifts, and
68 marine railways.
- 69 **Breakwater** - Offshore structure, usually aligned parallel to shore, sometimes shore-connected, that
70 provides protection from waves.
- 71 **Buffer** - A parcel or area of land that is designed and designated to permanently remain vegetated in an
72 undisturbed and natural condition to protect an adjacent aquatic or wetland area from upland impacts and
73 to provide habitat for wildlife. The "native vegetation zone" is a buffer protecting the ecology and
74 resources of Puget Sound. A buffer may be used to protect any sensitive area.
- 75 **Building** - Any structure having a roof, designated for shelter of persons, animals or property.
- 76 **Bulkhead** - A solid or open pile wall erected generally parallel to and near the ordinary high water mark
77 to protect adjacent uplands from waves or current action. Bulkheads may be built of posts and timbers,
78 concrete, large rocks (riprap), or other materials. The normal purpose of a bulkhead is to protect land from
79 erosion, not to create land. It is essentially a vertical structure (differentiated from a revetment, which
80 slopes) that absorbs some of the wave energy.
- 81 **Channel** - An open conduit for water, either naturally or artificially created, but not including artificially
82 created irrigation, return flow, or stock watering channels. See also Stream.
- 83 **City** - The City of Lynnwood.
- 84 **Clean Water Act** - The primary federal law providing water pollution prevention and control. This was
85 previously known as the Federal Water Pollution Control Act. (See 33 USC 1251 et seq.)
- 86 **Clearing** - An activity associated with property modification or maintenance. Clearing means the
87 destruction or removal of vegetative ground cover and/or trees including, but not limited to, root material
88 removal and/or topsoil material.
- 89 **Coastline** - The line where terrestrial processes give way to marine processes - tidal currents, wind
90 waves, etc.
- 91 **Community Structure** - A building, dock, or other structure intended for the common use of the
92 residents of a particular subdivision or community. It is not intended to serve as a public facility.
- 93 **Community or Joint-use Dock** - A structure or structures intended for the common use of the residents
94 of adjoining parcels or subdivision, short subdivision or community located on adjacent uplands. A
95 community dock is not for the purpose of serving the public. If a community dock accommodates six (6)
96 or more vessels, it is considered a marina.
- 97 **Conditional Use** - A use or expansion of a use permitted on shorelines which, because of certain
98 characteristics, requires a special degree of control to make it consistent with the intent and provisions of
99 the Act and these regulations, and compatible with other uses permitted on shorelines.
- 100 **Conditional Use Permit** - Local governments are authorized under the Shoreline Management Act to
101 include provisions for authorizing land uses and developments that may be permitted by Conditional Use

102 permits (CUP). The purpose of the Conditional Use permit is to allow greater flexibility in varying the
103 application of the use regulations of the Master Program.

104 **Council** - Legislative body of the City of Lynnwood.

105 **Covered Moorage** - Boat moorage, with or without walls, that has a roof to protect a vessel or vessels.

106 **CUP** - see Conditional Use Permit.

107 **Day** - Means a calendar day beginning at midnight and ending on the following midnight. When counting
108 the number of days for notices required by the Master Program, the day a notice is mailed, posted, or
109 published is not counted, but the day of any hearing is counted. The day of the hearing shall be counted as
110 an entire day, even though the hearing takes place before midnight and an entire twenty-four hour period
111 has not passed. When counting the number of days or years for other time limits established by this title,
112 the day a decision is made is not counted in computing the time limit.

113 **Degrade** - To scale down in desirability or salability, to impair in respect to some physical property, or to
114 reduce in structure or function.

115 **Department** - The City of Lynnwood Community Development Department.

116 **Development** - Any development of which the total cost or fair market value exceeds \$7,047 [or another
117 amount established in 90.58.030(3)(e) RCW or its successor], or any development which materially
118 interferes with the normal public use of the water or shorelines of the State, except as specifically
119 exempted pursuant to RCW 90.58.030(3)(e) or its successor. Development does not include the
120 dismantling or removal of structures. See definitions for Development and Exemption.

121 **DFW** - Washington State Department of Fish and Wildlife.

122 **Director** - The director of the Lynnwood Community Development Department.

123 **Dock** - A floating platform which abuts the shoreline, extending waterward from ordinary high water, or
124 from the bottom of a ramp extending from a pier, generally used as a landing or moorage place for
125 commercial and/or pleasure craft.

126 **DoE** - Washington State Department of Ecology - see "Ecology".

127 **DNR** - Washington State Department of Natural Resources.

128 **Dredge Spoil** - The material removed by dredging. Same as dredge material.

129 **Dredged Material Disposal** - Depositing dredged materials on land or into water bodies. The purpose
130 may be to create additional lands, to dispose of dredging by-products, or to enhance or remedy an
131 environmental condition.

132 **Dredging** - Removal or displacement of earth or sediments such as gravel, sand, mud or silt, and/or other
133 materials or debris from any stream, river, lake or marine water body, and associated shorelines and
134 wetlands. Dredging is normally done for specific purposes or uses such as constructing and maintaining
135 navigation channels, turning basins, harbors and marinas; installing submarine pipelines or cable

136 crossing; or repairing and maintaining dikes or drainage systems. Dredging can be accomplished with
137 mechanical or hydraulic machines. Most dredging is done to maintain channel depths or berths for
138 navigational purposes; other dredging is for shellfish harvesting or cleanup of polluted sediments.

139 **Drift Sector** - A particular reach of marine shore in which littoral drift may occur without significant
140 interruption, and which contains any and all natural sources of such drift as well as any shoreform(s)
141 accreted by such drift. Each normal drift sector contains these shore process elements: feeder bluff or
142 estuary, driftway, littoral drift, and accretion shoreform.

143 **Drift Sills** - Small groins that hold sediments in place without blocking longshore drift.

144 **Driftway** - That portion of the shore process corridor, primarily the lower backshore and the upper
145 intertidal area, through which sand and gravel are transported by the littoral drift process. It is the critical
146 link between the feeder bluff and the accretion shoreform.

147 **Dune** - A hill or ridge of sand piled up by the wind and/or wave action.

148 **Ecology** – A broad biological science that can be divided into many sub-disciplines using various criteria.
149 For example, one such categorization, based on overall complexity (from the least complex to the most),
150 is: *Behavioral ecology*, which studies the ecological and evolutionary basis for animal behavior, focusing
151 largely at the level of the individual; *Population ecology* (or autecology), which deals with the dynamics
152 of populations within species, and the interactions of these populations with environmental factors;
153 *Community ecology* (or synecology) which studies the interactions between species within an ecological
154 community; *Ecosystems ecology*, which studies how flows of energy and matter interact with biotic
155 elements of ecosystems.

156 **Ecology (Washington State Department of Ecology)** - Use of "Ecology" or "Washington State
157 Department of Ecology" is preferred over "DOE" to avoid confusing the Washington State Department of
158 Ecology with the federal Department of Energy.

159 **Ecological Functions (or Shoreline Functions)** – Means the work performed or role played by the
160 physical, chemical, and biological processes that contribute to the maintenance of the aquatic and
161 terrestrial environments that constitute the shoreline's natural ecosystem. See WAC 173-26-201(2)(c).

162 **Ecosystem** – A combination of all living and non-living elements of an area. Ecosystems are the smallest
163 level of organization in nature that incorporates both living and non-living factors. They can range in
164 scale from a wide geographical area such as the Sahara Desert to something as small as a puddle. The
165 term microecosystem may be used to describe a very small (often closed) ecosystem.

166 **Ecosystem ecology** – The study of the movement of energy and matter through ecosystems. It is one of
167 the fundamental disciplines of ecology. Ecosystem ecology operates at a scale above that of communities
168 but it is defined more by subject matter than scale. The discipline deals with locally defined ecosystems
169 which exchange matter and energy with their surroundings. The discipline concerns itself with such areas
170 as nutrient cycling (especially carbon, nitrogen, and phosphorus cycles), Gross Primary Productivity
171 (GPP) and Net Primary Productivity (NPP), trophic dynamics and food chains.

172 **Ecosystem-wide Processes** – Means the suite of naturally occurring physical and geological processes of
173 erosion, transport, and deposition; and specific chemical processes that shape landforms within a specific
174 shoreline ecosystem and determine both the types of habitat and associated ecological functions.

175 **Ecotope** – The smallest ecologically distinct landscape features in a landscape mapping and classification
176 system. As such, they represent relatively homogeneous, spatially-explicit landscape units useful for
177 stratifying landscapes into ecologically distinct features for the measurement and mapping of landscape
178 structure, function, and change.

179 **Emergency** - An unanticipated and imminent threat to public health, safety, or the environment which
180 requires immediate action within a time too short to allow full compliance with the Master Program.
181 Emergency construction is construed narrowly as that necessary to protect property from the elements
182 [RCW 90.58.030(3)(e)(iii) or its successor].

183 **Enhancement** - Alteration of an existing wetland or habitat to improve or increase its characteristics and
184 processes without degrading other existing functions. Enhancements are distinguished from
185 wetland/habitat creation or restoration projects.

186 **Envelope** - The enclosing shell of a building's volume.

187 **Environmentally Critical Areas** - Areas with especially fragile biophysical characteristics and/or with
188 significant environmental resources as identified by the City or by a scientifically documented inventory
189 accomplished as part of the SEPA/NEPA process or other recognized assessment. Environmentally
190 sensitive areas include, but are not limited to, aquifer recharge areas; wildlife habitat areas; fish breeding;
191 rearing or feeding areas; frequently flooded areas; geologically hazardous areas (e.g., steep, unstable
192 slopes); wetlands; streams; tidal lagoons; mud flats; salt marshes; and marine vegetation areas.

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

194 **Estuary** - The zone in which fresh and salt water mingle and affect the total land and water habitat.

195 **Estuarine Zone, Estuary** - The zero-gradient sector of a stream where it flows into a standing body of
196 water, together with associated wetlands. Tidal flows reverse flow in this zone twice daily, determining its
197 upstream limit. It is characterized by low bank channels branching off the main streamway to form a
198 broad, near-level delta. The bank, bed, and delta materials are typically silt and clay. Banks are stable,
199 with vegetation ranging from marsh to forest, and the water is usually brackish due to daily mixing and
200 layering of fresh and salt water. Estuarine shores are rich in aquatic and other bird and animal life, and in
201 their natural condition are the most productive of all shoreline habitats of the marine food chain.

202 **Exemption** - Certain developments are exempt from the definition of substantial developments and,
203 therefore, from the substantial development permit process of the Shoreline Management Act. An activity
204 exempt from the substantial development provisions of the Shoreline Management Act must still be
205 carried out in compliance with the policies and standards of the Act and the local master program.
206 Conditional use and/or Variance permits may be required even if the activity does not need a substantial
207 development permit. [RCW 90.58.030(3)(e) or its successor].

208 **Extreme Low Tide** - The lowest line on the land reached by a receding tide [RCW 90.58.030(2a) or its
209 successor]. For the purposes of the Shoreline Master Program, it is the contour 4.5 feet below Mean
210 Lower Low Water (datum plane 0.0). [WAC 332-30-106(18) or its successor].

211 **Fair Market Value** – Of a development is the open market bid price for conducting the work, using the
212 equipment and facilities, and purchase of the goods, services and materials necessary to accomplish the
213 development. This would normally equate to the cost of hiring a contractor to undertake the development
214 from start to finish, including the cost of labor, materials, equipment and facility usage, transportation and

215 contractor overhead and profit. The fair market value of the development shall include the fair market
216 value of any donated, contributed or found labor, equipment or materials.

217 **Feeder Bluff, Erosional Bluff** - Any bluff (or cliff) experiencing periodic erosion from waves, sliding, or
218 slumping, whose eroded earth, sand, or gravel material is naturally transported (littoral drift) via a
219 driftway to an accretion shoreform. These natural sources of beach material are limited and vital for the
220 long-term stability of driftways and accretion shoreforms.

221 **Fill** – Means the addition of soil, sand, rock, gravel, sediment, earth retaining structure, or other material
222 to an area waterward of the OHWM, in wetlands, or on shorelands in a manner that raises the elevation or
223 creates dry land.

224 **Floating Home** - A non-vessel structure designed and operated substantially as a permanent over-water
225 residence. Floating homes lack adequate self-propulsion and steering equipment to operate as a vessel.
226 They are typically served by permanent utilities and semi-permanent anchorage/moorage facilities.

227 **Flood Hazard Management** - A program or major project carried out on a single parcel or coordinated
228 on a series of parcels for the primary purpose of preventing or mitigating damage due to flooding. Flood
229 hazard management projects or programs may employ physical and/or regulatory controls.

230 **Floodplain** - Synonymous with one hundred-year floodplain, this is that land area susceptible to being
231 inundated by stream-derived waters with a one percent chance of being equaled or exceeded in any given
232 year. The limits of this area are based on flood regulation ordinance maps or a reasonable method that
233 meets the objectives of the Shoreline Management Act.

234 **Floodway** - Those portions of the area of a river valley lying streamward from the outer limits of a
235 watercourse, and upon which flood waters are carried during periods of flooding that occur with
236 reasonable regularity, though not necessarily annually. The floodway is identified, under normal
237 conditions, by changes in surface soil conditions, or changes in types or quality of vegetative ground
238 cover conditions. The floodway does not include lands that can reasonably be expected to be protected
239 from flood waters by flood control devices maintained by or under license from the Federal Government,
240 the State, or a political subdivision of the State. The limits of the floodway are based on flood regulation
241 ordinance maps or by a reasonable method that meets the objectives of the Shoreline Management Act.

242
243 **Foreshore** - In general terms, the beach between mean higher high water and mean lower low water.

244 **Foreshore Marina** - See Marina.

245 **Forest Practice** - Any activity conducted on, or directly related to, forest land and relating to growing,
246 harvesting, or processing timber. This includes: 1) site preparation and regeneration, 2) protection from
247 insects, fire, and disease, 3) silvicultural practices such as thinning, fertilization, and release from
248 competing vegetation, and 4) harvesting. Forest practices do not include log storage. (See industrial use.)
249 These activities include, but are not limited to, road and trail construction, final and intermediate
250 harvesting, pre-commercial thinning, reforestation, fertilization, prevention and suppression of disease
251 and insects, salvage of trees, and brush control. See WAC 222-16-010 or its successor.

252 **Forest Land** - Land capable of supporting merchantable stands of timber, and not being actively used in a
253 way incompatible with timber growing. [WAC 222-16-010 or its successor].

254 **Gabions** - Structures of masses of rocks, rubble, or masonry held tightly together, usually by wire mesh,
255 to form blocks or walls. Sometimes used on heavy erosion areas to retard wave action, or as foundations
256 for breakwaters or jetties.

257 **Geotechnical Report or Geotechnical Analysis** – Means a scientific study or evaluation conducted by a
258 qualified expert that includes a description of the ground and surface hydrology and geology, the affected
259 land form and its susceptibility to mass wasting, erosion, and other geologic hazards or processes,
260 conclusions and recommendations regarding the effect of a proposed development on geologic
261 conditions, the adequacy of the site for development, the impacts of the proposed development,
262 alternative approaches to the proposed development, and measures to mitigate potential site-specific and
263 cumulative geological and hydrological impacts of a proposed development, including potential adverse
264 impacts to adjacent and down-current properties. Geotechnical reports shall conform to accepted technical
265 standards and must be prepared by qualified professional engineers or geologists who have professional
266 expertise about the regional and local shoreline geology and processes.

267 **GMA** - Washington Growth Management Act (RCW 36.70A).

268 **Grading** – The movement or redistribution of soil, sand, rock, gravel, sediment, or other material on a
269 site in a manner altering the natural contour of the land.

270 **Grassy Swale** - A vegetated drainage channel designed to remove various pollutants from storm water
271 runoff through biofiltration.

272 **Groin** - A barrier-type structure extending from the backshore or streambank into a water body, generally
273 perpendicular to the shore, to protect a shoreline and adjacent upland by influencing the movement of
274 water and/or deposition of materials - also referred to as a spur dyke or rock weir.

275 **Habitat** - The place or type of site where a plant or animal naturally or normally lives and grows.

276 **Height** - The distance from the average grade level to the highest point of a structure. Television
277 antennas, chimneys, and similar structures or appurtenances are not used in calculating height except
278 where they obstruct the view of residences adjoining such shorelines. Temporary construction equipment
279 is excluded in this calculation. For over-water structures, height is measured from the ordinary high water
280 mark.

281 **Hook** - A spit or narrow cape of sand or gravel that turns landward at its outer end.

282 **Houseboat** - A particular type of vessel licensed and designed for use as a mobile structure with adequate
283 self-propulsion and steering equipment to be operated as a vessel, but also characterized by detachable
284 utilities or facilities for residential use. When principally used as an over-water residence, it is a "live-
285 aboard vessel."

286 **HPA** - Hydraulic Project Approval. The permit issued by the Washington State Department of Fish and
287 Wildlife pursuant to the State Hydraulic Code WAC 220-660 its successor.

288 **Hydric Soils** - Hydric soil means soil that is saturated, flooded, or ponded long enough to develop
289 anaerobic conditions in the upper part. The presence of hydric soil shall be determined by following the
290 methods described in the Washington State Wetland Identification and Delineation Manual, or as revised.

291 **Hydrophytes** - Hydrophytic vegetation means macrophytic plant life growing in water or on a substrate
292 at least periodically deficient in oxygen as a result of excessive water content. The presence of
293 hydrophytic vegetation shall be determined following the methods described in the Washington State
294 Wetland Identification and Delineation Manual, or as revised.

295 **Industrial Use** - Uses intended primarily to provide for ship and boat building, haul out and repair and
296 related uses serving boating needs.

297 **In-kind** - Replacing wetlands, biota or other organisms with substitute flora or fauna whose
298 characteristics closely match those destroyed, displaced, or degraded by an activity.

299 **Intertidal** - The substratum from the extreme low water of spring tides to the upper limit of spray or
300 influence of ocean-driven salts. It includes all land sometimes submerged, but sometimes exposed to air.
301 (Source: M.N.Dethier, A Marine and Estuarine Habitat Classification System for Washington State 10
302 [Washington State Department of Natural Resources, Washington Natural Heritage Program, 1990).

303 **Jetty** - A structure projecting out into the sea at the mouth of a river for the purpose of protecting a
304 navigation channel or harbor, or to influence water currents.

305 **Lagoon** - See Tidal Lagoon.

306 **Landscape ecology** – A subdiscipline of ecology and geography that is the study of spatial variation and
307 one interested in landscape elements (such as fields, hedgerows, woodlots, rivers, or towns) and how their
308 distribution affects the distribution and flow of energy and individuals in the environment (which, in turn,
309 may influence the distribution of the elements themselves). Landscape ecology typically deals with
310 problems in an applied and holistic context.

311 **Levee** - A large dike or embankment, often having an access road along the top, designed as part of a
312 system to protect land from floods.

313 **Limited Utility Extension** - The extension of natural gas, electricity, telephone, water, or sewer service
314 where all of the following are met: 1) the extension is categorically exempt under the Washington State
315 Environmental Policy Act (SEPA)(See WAC 197-11-800(24) or its successor) for utility improvements
316 categorically exempt under SEPA), 2) the extension will serve existing uses in compliance with the Act,
317 and 3) the project does not involve construction of more than 2,500 linear feet of utility lines or pipes
318 within shoreline jurisdiction.

319 **Littoral** - Living on, or occurring on, the shore.

320 **Littoral Drift** - The movement of mud, sand, or gravel material parallel to the shoreline in the nearshore
321 zone by waves and currents.

322 **Live-aboard Vessel** - A vessel licensed and designed for use as a mobile structure with adequate self-
323 propulsion and steering equipment to be operated as a vessel, but principally used as an over-water
324 residence. Principal use as an over-water residence means essentially full-time occupancy within the
325 City's jurisdiction for a total of more than sixty (60) days, consecutive or not, in any calendar year.

326 **LMC** – Lynnwood Municipal Code.

327 **Marina** - A commercial or public facility primarily to provide moorage for six (6) or more vessels, which
328 consists of a system of piers, buoys, or floats. Foreshore marinas are located in the intertidal or offshore
329 zone (the Aquatic environment). Backshore marinas are landward of the OHWM. There are two common
330 types of backshore marinas, one with wet moorage dredged out of the land to artificially create a basin,
331 and the other, dry moorage, with upland storage and a hoist, marine travel lift, or ramp for water access.

332 **Marine Travel Lift** - A mechanical device to hoist vessels off trailers and transport them into the water.
333 Often associated with dry land moorage.

334 **Marine Railway** - A set of rails running from an upland area into the water upon which a cart or dolly
335 can carry a boat to be launched.

336 **Mean Higher High Tide (MHHT)** - The plane of the arithmetic mean of the higher of two (2) daily high
337 tides calculated from the most recent 19-year tidal cycle.

338 **Mean Low Water (MLW)** - The plane of the arithmetic mean of all low tides calculated from the most
339 recent 19-year tidal cycle.

340 **Mean Lower Low Water (MLLW)** - The plane of the arithmetic mean of the lower of two (2) daily low
341 tides calculated from the most recent 19-year tidal cycle (datum plane 0.0).

342 **Midden** - An ancient refuse heap. Often a source of archaeological material.

343 **Mining** - Removal and primary processing of naturally occurring materials from the earth for economic
344 use. "Processing" includes screening, crushing, stockpiling - all of which utilize materials removed from
345 the site where the processing activity is located. Processing does not include the manufacture of molded
346 or cast concrete, or asphalt products, asphalt mixing operations, or concrete batching operations.

347 **Mooring Buoy** - A floating object anchored to the bottom of a water body providing vessel tie-up
348 capability.

349 **Muds** - Sediments with particle size smaller than 1/16 mm. For sediments in a tidal inlet to be classified
350 as critical habitat, they must contain at least 30 percent (by weight) mud (i.e., 30 percent of the sediments
351 have to pass through a 1/16 mm mesh sieve).

352 **Natural Riparian Habitat Corridor** - The streamside environment maintained in its natural state,
353 primarily for fisheries and wildlife habitat, and water quality improvement, and, secondarily, for flood
354 control works, while allowing controlled access to avoid damage to the resource.

355 **Native Vegetation Zone** - A required vegetation buffer measured horizontally upland from and
356 perpendicular to the ordinary high water mark (OHWM).

357 **Nonconforming Use or Development** – A shoreline use or development lawfully constructed or
358 established prior to the effective date of the Act or the SMP, or amendments thereto, but which does not
359 conform to present program regulations or standards. [WAC 173-27-080(1) or its successor].

360 **Nonwater-oriented** - Uses with little or no relationship to the shoreline and not considered priority uses
361 under the Act. Nonwater-oriented uses are not water-dependent, water-related, or water-enjoyment uses.

- 362 **Normal appurtenance** - See Appurtenance.
- 363 **Normal Maintenance** - Those usual acts to prevent the decline, lapse, or cessation of a lawfully
364 established condition. [WAC 173-27-040(2b) or its successor]. (See Normal Repair.)
- 365 **Normal Protective Bulkhead** - See Bulkhead.
- 366 **Normal Repair** - To restore a development to a state comparable to its original condition within a
367 reasonable period after decay or partial destruction, except where repair involves total replacement when
368 that is not a common repair method for the type of structure or development, or causes substantial adverse
369 effects to the shoreline resource or environment. [WAC 173-27-040(2)(b) or its successor]. (See Normal
370 Maintenance.)
- 371 **OHW, Ordinary High Water Mark** - A mark found by examining the bed and banks and ascertaining
372 where the presence and action of waters are so common and usual, and so long continued in ordinary
373 years, that the soil has a character distinct from the abutting upland in respect to vegetation as that
374 condition existed on June 1, 1971, as it may naturally change thereafter, or may change thereafter in
375 accordance with permits issued by the City or Washington State Department of Ecology. In any area the
376 ordinary high water mark cannot be found, the ordinary high water mark adjoining salt water shall be the
377 line of mean higher high tide and the ordinary high water mark adjoining fresh water shall be the line of
378 mean high water. [See RCW 90.58.030(2)(b) or its successor].
- 379 **Oil/Water Separator** - Specialized catch basins designed to trap oil and other lighter than water
380 materials in the basin while allowing water to escape through the drainage system.
- 381 **Parking** - The temporary storage of automobiles or other motorized vehicles.
- 382 **Periodic** - Occurring at regular intervals.
- 383 **Person(s)** - Includes organizations and corporations.
- 384 **Point** - A low profile, more or less triangular shoreline promontory, the top of which extends seaward.
- 385 **Pier** - A fixed platform above the water which abuts the shoreline, and extends waterward from ordinary
386 high water, generally used as a landing or moorage place for watercraft.
- 387 **Principal Building, Adjacent** - A principal building located on a lot abutting an applicant's lot.
- 388 **PSDDA** - Puget Sound Dredged Disposal Analysis (see Section 6.D).
- 389 **RCW** - Revised Code of Washington.
- 390 **Recreation** - Refreshment of body and mind through play, sports, relaxation, amusement or
391 contemplation.
- 392 **Recreational Development, Active** - activities generally requiring use of constructed facilities such as
393 playgrounds, athletic fields, boat ramps, and marinas.

- 394 **Recreational Development, Passive** - activities requiring minimal constructed facilities such as
395 swimming, picnicking, hiking, canoeing and fishing.
- 396 **Recreational Floats** - Anchored off-shore platforms for water-dependent recreational activities such as
397 swimming and diving.
- 398 **Replacement Area** - An area of replacement native vegetation compensating for disturbance of part of
399 the required Native Vegetation Zone. (See Section III.E. regulations 10 and 11 for requirements to allow
400 for such disturbance.)
- 401 **Residential Development** - Construction or alteration of one or more buildings, structures, or portions
402 thereof designed for and used to provide a dwelling place for human beings. This includes single and
403 multi-family dwellings, accessory uses, and structures normally associated with residential uses and
404 structures. Residential development includes land divisions, including short plats, of residentially zoned
405 land. It also includes modifications to land and vegetation associated with construction, preparation, or
406 maintenance of residential structures or accessory structures.
- 407 **Restoration** - To revitalize or reestablish the characteristics and natural processes of a degraded shoreline
408 resource.
- 409 **Revetment** - A sloping structure built to protect a scarp, embankment, or shore against erosion by waves
410 or currents. Usually built of riprap, with a heavy armor layer, one or more filter layers of smaller rock or
411 filter cloth, and "toe" protection. A revetment slopes shoreward and has a rough or jagged facing. Its
412 sloping face absorbs wave energy and differentiates it from a bulkhead, which is a vertical structure.
- 413 **Riparian** - Of, on, or pertaining to the banks of a river.
- 414 **Riparian Management Zone** - A specified area alongside a shoreline where the Forest Practice
415 Regulations sets out specific measures to protect water quality and fish and wildlife habitat. [WAC 222-
416 30 or its successor].
- 417 **Riprap** - A layer, facing, or protective mound of stones placed to prevent erosion, scouring, or sloughing
418 of a structure or embankment.
- 419 **Rock Weir** - See Groin.
- 420 **Runoff** - Water not absorbed into the soil, but rather flowing along the ground surface following the
421 topography.
- 422 **Salmon and Steelhead Habitats** - Gravel bottom streams, creeks, and rivers used for spawning; streams,
423 creeks, rivers, side channels, ponds, lakes, and wetlands used for rearing, feeding, cover and refuge from
424 predators and high water; streams creeks, rivers, estuaries, and shallow areas of saltwater bodies used as
425 migration corridors; and salt water bodies used for rearing, feeding, and refuge from predators and
426 currents.
- 427 **Salt Tolerant Vegetation** - Vegetation tolerant of interstitial soil salinities greater than or equal to 0.5
428 parts per thousand.
- 429 **Scarification** - Loosening topsoil and/or disrupting forest floor in preparation for regeneration.

430 **SDP/SSDP** - see Shoreline Substantial Development Permit.

431 **Seawall** - Structure separating land and water areas primarily to prevent erosion and wave damage;
432 Generally more massive and capable of resisting greater wave forces than a bulkhead or revetment.

433 **Seaward** - To or toward the Puget Sound.

434 **Sediment** - Material deposited by water or wind.

435 **SEPA** - Washington State Environmental Policy Act (RCW 43.21C).

436 **Setback** - The required horizontal distance from the ordinary high water mark to an allowed
437 development.

438 **Shoreland areas** - Those lands extending landward for two hundred feet horizontally in all directions
439 from the ordinary high water mark; floodways and contiguous floodplains landward two hundred feet
440 from such floodways; and all wetlands, including river deltas associated with streams, rivers and tidal
441 waters subject to the provisions of this chapter; location of same to be designated by the Dept. of Ecology.

442 **Shorelands** - See "Shoreland areas."

443 **Shoreline Armoring** - Structural protection from wave erosion including revetments, bulkheads, sea
444 walls, gabions, and so forth.

445 **Shoreline Environment Designations** - The categories of shorelines established by local Shoreline
446 Master Programs to provide a uniform basis for applying policies and use regulations within distinctively
447 different shoreline areas.

448 **Shoreline Jurisdiction (Associated Wetlands [Jurisdictional])** - The proper term for all geographic
449 areas covered by the Shoreline Management Act, related rules, and applicable master programs. Lands
450 extending landward for 200 feet horizontally in all directions, from the ordinary high water mark;
451 floodways and contiguous floodplain areas landward 200 feet from such floodways; and all marshes,
452 bogs, swamps, and deltas associated with streams, lakes, and tidal waters subject to the Act. See RCW
453 90.58.030 (2f) or its successor, WAC 173-16-030(17) or its successor; WAC 173-22-030(10) or its
454 successor. Also, such areas within a specified local government's authority. See definitions of shorelines,
455 shorelands, shorelines of the state, and Shorelines of Statewide Significance, and wetlands, jurisdictional.

456 **Shoreline Management Act (SMA)** - The Shoreline Management Act of 1971, RCW 90.58, as amended,
457 also "the Act."

458 **Shoreline Stabilization and Flood Protection** - Actions to reduce adverse impacts caused by current,
459 flood, wake, or wave action. These include structural and nonstructural means to reduce impacts from
460 flooding, erosion, and accretion. Examples of specific structural and nonstructural shoreline modifications
461 include revetments, riprap, bulkheads, and bank stabilization.

462 **Shoreline Permit** - A Substantial Development, Conditional Use or Revision permit, or Variance, or
463 combination thereof.

464 **Shoreline Substantial Development Permit** - A mechanism the City uses to determine whether a
465 proposed development or activity complies with the Shoreline Management Act (Chapter 90.58 RCW or
466 its successor) and the Master Program.

467 **Shorelines** - All water areas of the State, including reservoirs and associated wetlands, together with the
468 lands underlying them, except those areas excluded under RCW 90.58.030(2)(d) or its successor and
469 shorelines of statewide significance.

470 **Shorelines Hearings Board (SHB)** - A six-member, quasi-judicial body, created by the Shoreline Master
471 Program, which hears appeals by aggrieved parties on the issuance of shoreline permits and appeals by
472 local governments of State Dept. of Ecology approval of master programs, rules, regulations, guidelines,
473 or designations under the Shoreline Management Act. [RCW 90.58.170 or its successor; 90.58.180 or its
474 successor].

475 **SMA** - see Shoreline Management Act.

476 **SMP** - Shoreline Master Program.

477 **Shorelines of State-wide Significance** - A select category of shorelines of the State, defined in RCW
478 90.58.030(2)(e) or its successor, where special preservation policies apply and where greater planning
479 authority is granted by the Shoreline Management Act [RCW 90.58.020 or its successor]. Within the
480 City's jurisdiction, all areas lying seaward of the extreme low tide line are shorelines of statewide
481 significance [RCW 90.58.030(2)(e)(i) or its successor].

482 **Shorelines of the State** - Shorelines including shorelines of state-wide significance.

483 **Single-family Residence (SFR)** - A detached dwelling designed for and occupied by one family,
484 including those structures and developments within a contiguous ownership that are a normal
485 appurtenance. [WAC 173-27-040(2)(g) or its successor].

486 **Soil Bioengineering** - An applied science combining structural, biological, and ecological concepts to
487 construct living structures that stabilize the soil to control erosion, sedimentation, and flooding using live
488 plant materials as a main structural component.

489 **Solid Waste Disposal** - Discharge, deposit, injection, dumping, spilling, leaking or placing of any solid
490 waste, including hazardous waste, on land or in the water.

491 **Solid Waste** - Solid and semi-solid wastes, including garbage, rubbish, ashes, industrial wastes, wood
492 wastes, and sort yard wastes associated with commercial logging activities, swill, demolition and
493 construction wastes, abandoned vehicles and parts of vehicles, household appliances, and other discarded
494 commodities. Solid waste does not include wastewater, dredge material, agricultural, or other commercial
495 logging wastes not specifically listed above. See landfill and dredging material.

496 **Spit** - An accretion shoreform that extends seaward from and parallel to the shoreline. They are usually
497 characterized by a wave-built berm on the windward side and a more gently sloping, muddy, or marshy
498 shore on the leeward side. A curved spit is normally called a hook.

499 **Spur Dock** - See Groin.

500 **SSDP** - Shoreline Substantial Development Permit.

501 **Structure** - A permanent or temporary edifice or building, or any piece of work artificially built or
502 composed of parts joined together in some definite manner, whether installed on, above, or below the
503 surface of the ground or water, except for vessels. [WAC 173-27-030(15) or its successor].

504 **Subdivision** - The division or redivision of land, including short subdivisions, for the purpose of sale,
505 lease, or conveyance.

506 **Substantial Development** - Any development of which the total cost or fair market value exceeds \$7,047
507 [or another amount established in 90.58.030(3)(e) RCW or its successor], or any development which
508 materially interferes with the normal public use of the water or shorelines of the State, except as
509 specifically exempted pursuant to RCW 90.58.030(3)(e) or its successor. See definitions for Development
510 and Exemption.

511 **Substantial Progress** - Substantial progress toward completion of a permitted activity includes all of the
512 following, where applicable: the making of contracts, signing of notice to proceed, completion of grading
513 and excavation and the laying of major utilities; or, where no construction is involved, commencement of
514 the activity.

515 **Subtidal** - The area of the marine environment below extreme low tide.

516 **Sustainable Development** - Development that maintains a balance between the health of the natural
517 environment and the needs of the human community living within it.

518 **Systems Ecology** – A transdiscipline which studies ecological systems, or ecosystems. As an
519 environmental science, systems ecology has also been associated with the notion of *field physiology*
520 which applies the concept of metabolism as understood in physiology and bioenergetics to ‘the field’, like
521 a ‘field’ of wheat for example. Like systems biology, systems ecology seeks a holistic view of the
522 interactions and transactions within and between biological and ecological systems. Moreover, systems
523 ecologists realize that the function of any ecosystem can be influenced by human economics in
524 fundamental ways. They have therefore taken an additional transdisciplinary step by including economics
525 in the consideration of ecological-economic systems.

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

527 **Tidal Inlet** - A salt-water bay, subject to the daily influence of tides, whose mouth is narrower than its
528 length. The inlet is all lands and waters seaward of the ordinary high water mark, and extending to its
529 mouth. Within tidal inlets, specific areas constituting critical habitat are designated for special protection
530 under the Master Program.

531 **Tidal Flats** - Marshy or muddy areas of seabed covered and uncovered by the rise and fall of tidal water.

532 **Tidal Lagoon** - A body of saline water (salinity greater than 0.5 parts per thousand) with a constricted or
533 subsurface outlet subject to periodic, but not necessarily daily, exchange of water with Puget Sound or a
534 tidal inlet. The exchange may occur seasonally, during storms, or during the highest spring tides. The
535 connection between the sea and the lagoon is not necessarily on the surface, and can be subsurface
536 through permeable gravel or sand berms.

- 537 **Tidal Water** - Includes marine and estuarine waters bounded by the ordinary high water mark. Where a
538 stream enters the tidal water, the tidal water is bounded by the extension of the elevation of the marine
539 ordinary high water mark within the stream.
- 540 **Tidelands** - Land on the shore of marine water bodies between the line of ordinary high tide and the line
541 of extreme low tide.
- 542 **Toxic Material** - Any material damaging marine life including, but not limited to, paints, varnishes, anti-
543 fouling agents, bleaches, petroleum, and contaminated bilge waste water.
- 544 **Transient Moorage** - Moorage for a stay of less than two (2) weeks.
- 545 **Transportation Facilities** - Structures and developments that aid in land and water surface movement of
546 people, goods, and services. They include roads and highways, bridges and causeways, bikeways, trails,
547 railroad facilities, ferry terminals, float plane terminals, heliports, and other related facilities.
- 548 **Upland** - Generally described as the area above and landward of the OHWM.
- 549 **Utilities, Accessory** - Small scale distribution systems directly serving a permitted shoreline use. They
550 include power, telephone, cable, water, sewer, septic, and stormwater lines.
- 551 **Utilities, Primary** - Facilities to produce, transmit, carry, store, distribute, or process electric power, gas,
552 water, sewage, or information. Primary utilities include solid waste handling and disposal facilities,
553 wastewater treatment facilities, utility lines, electrical power generating or transfer facilities, radio,
554 cellular telephone and microwave tower, and gas distribution and storage facilities.
- 555 **Variance** - A means to grant relief from specific dimensional, or performance standards specified in the
556 applicable Master Program, and not a means to vary the use of a shoreline. Variance permits must be
557 specifically approved, approved with conditions, or denied by the Washington State Department of
558 Ecology. (See WAC 173-27-030(17) or its successor).
- 559 **Vessel** - A ship, boat, barge, or other floating craft designed and used for navigation and which does not
560 interfere with normal public use of the water.
- 561 **View Corridor** - An area free of buildings and other view-blocking structures that provides visual access
562 to water and/or the shoreline.
- 563 **WAC** - Washington Administrative Code.
- 564 **Water-bar** - A diversion ditch and/or hump in a trail or road for the purpose of carrying surface water
565 runoff into the vegetation duff, ditch, or other dispersion area so it does not gain the volume and velocity
566 to cause soil movement and erosion.
- 567 **Water-dependent Use** - A use or a portion of a use which requires direct water contact and cannot exist
568 at a nonwater location due to its intrinsic nature. Examples of water-dependent uses may include ship
569 cargo terminal loading areas, ferry and passenger terminals, barge loading facilities, ship building and dry
570 docking, marinas, aquaculture, float plane facilities, and sewer outfalls.

571 **Water-enjoyment Use** - A recreational use, or other use facilitating public shoreline access as a primary
572 characteristic of the use, or that provides for recreational use or aesthetic enjoyment of the shoreline for a
573 substantial number of people as a general characteristic of the use and which through location, design, and
574 operation ensures public ability to enjoy the physical and aesthetic qualities of the shoreline. To qualify as
575 a water-enjoyment use, the use must be open to the general public, and the shoreline-oriented space
576 within the project must be devoted to the specific aspects of the use that foster shoreline enjoyment.
577 Primary water-enjoyment uses may include, but are not limited to, parks, piers, and other improvements
578 facilitating public access to shorelines of the State. General water-enjoyment uses may include, but are
579 not limited to, restaurants, museums, aquariums, educational/scientific reserves, resorts, and mixed use
580 commercial, provided such uses conform to the above water-enjoyment specifications and provisions of
581 the Master Program.

582 **Water-oriented Use** - Any combination of water-dependent, water-related and/or water-enjoyment uses.

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

- 585 1. Of a functional requirement for a waterfront location such as the arrival or shipment of materials
586 by water or the need for large quantities of water; or
- 587 2. The use provides a necessary service supportive of the water-dependent commercial activities
588 and the proximity of the use to its customers makes its services less expensive and/or more
589 convenient. Examples include: 1) manufacturers of ship parts large enough that transportation
590 becomes a significant factor in the product(s) cost, 2) professional services serving primarily
591 water-dependent activities, and 3) storage of water-transported foods.

592 Examples of water-related uses may include warehousing of goods transported by water, seafood-
593 processing plants, hydroelectric generating plants, gravel storage when transported by barge, oil refineries
594 where transport is by tanker, and log storage.

595 **Wave Direction** - The direction from which waves approach an observer..

596 **Washington State Department of Ecology** - See Ecology.

597 **Wetlands** - Areas that are inundated or saturated by surface water or ground water at a frequency and
598 duration sufficient to support, a prevalence of vegetation typically adapted for life in saturated soil
599 conditions. Wetlands generally include swamps, marshes, bogs and similar areas. Wetlands do not include
600 those artificial wetlands intentionally created from nonwetland sites, including, but not limited to,
601 irrigation and drainage ditches, grass-lined swales, canals, detention facilities, wastewater treatment
602 facilities, farm ponds, and landscape amenities, or those wetlands that were created after July 1, 1990, that
603 were unintentionally created as a result of the construction of a road, street, or highway. Wetlands may
604 include those artificial wetlands intentionally created from nonwetland areas to mitigate the conversion of
605 wetlands.

606 **Wetlands, Jurisdictional** - See "shoreland areas."

607 **Zoning** - To designate by ordinance, including maps, areas of land reserved and regulated for specific
608 land uses.

APPENDIX B. MAP PORTFOLIO

The purpose of the City of Lynnwood Presentation Map Portfolio is to establish an inventory of all pertinent and available data, reports, information, aerial photographs, plans, studies, and other information for analysis. This baseline inventory of natural and built conditions in the City of Lynnwood’s shoreline jurisdiction will provide a basis for the preparation of the City’s Shoreline Master Program. The Washington State Department of Ecology (Ecology) requires that at a minimum, and to the extent such information is relevant and reasonably available, local governments collect the following information.

DESCRIPTION OF MAPS

Ecology’s draft shoreline guidelines require that at a minimum, and to the extent such information is relevant and reasonably available, local governments collect the following information in items B through J below. For most original maps, two formats have been used. Maps of the immediate City of Lynnwood shoreline area, referred to as the Study Area on Map A3, are at a scale of approximately 1:4500. Maps of the regional shoreline, referred to as the Brown’s Bay region on Map A3, are at a scale of approximately 1:18000. This is generally the largest appropriate scale for the selected regional data. When digital map data was not available, the largest scale published maps have been used.

A. VICINITY MAPS

Orients the reader with the City of Lynnwood wastewater treatment plant and study area.

A1: City of Lynnwood Vicinity Map. This map illustrates the Lynnwood study area, and neighboring jurisdictions, while the overview map shows the extent of the County.

A2: Study Area. This map includes an aerial photograph and shows the extent of the City of Lynnwood wastewater treatment plant. The overview map shows the non-contiguous city site in relation to the remainder of the City of Lynnwood.

A3: Southwest Snohomish County Jurisdictions and Coverages. This map shows the relationship of the Lynnwood Study Area (white circle) and Brown’s Bay shoreline area (blue rectangle) to Lynnwood, the municipal urban growth area (MUGA) and neighboring cities. The map also shows the relationship of the Lynnwood Study Area to the Puget Sound Drainage Sub-basin (green line).

B. SHORELINE, ADJACENT LAND USE PATTERNS, TRANSPORTATION, AND UTILITY FACILITIES.

Includes the extent of existing structures, impervious surfaces, vegetation and shoreline modifications in shoreline jurisdiction.

B1: Shoreline & Adjacent Land Use Patterns. City of Edmonds Comprehensive Plan Map (2017). Adjacent Plan Designations are Single Family-Resource and Park/Open Space.

- 45
- 46 **B2: City of Edmonds Zoning Map (2017).** Adjacent Zoning Designations are RSW-12 (12,000
- 47 square foot residential waterfront lots), OS (open space), and RS-12 (12,000 square foot
- 48 residential lots).
- 49
- 50 **B3: Existing structures.** Depicts the City of Lynnwood wastewater treatment plant building
- 51 footprint.
- 52
- 53 **B4: Pervious Surface.** Depicts the pervious surfaces in the City of Lynnwood wastewater treatment
- 54 plant site.
- 55
- 56 **B5: City of Lynnwood Sewer Lines.** Depicts the existing sewer lines in and surrounding the
- 57 wastewater treatment plant site.
- 58
- 59 **B6: Eelgrass and Spartina.** This map, derived from the Washington DNR Shorezone Inventory,
- 60 shows the only patchy eelgrass in the Brown’s Bay region to be far to the north of the City. The
- 61 inventory did not record any presence of spartina in or near the City of Lynnwood. (Note that
- 62 the side-looking SONAR inventory conducted by Battelle for King County, and shown in Maps
- 63 B11a and B11b, did find apparent patchy eelgrass much closer to the City’s shoreline zone).
- 64
- 65 **B7: Shoreline Modifications.** Lynnwood’s shoreline has been modified through the addition of rock
- 66 armoring (“riprap”) associated with the Burlington Northern & Santa Fe rail line. The rock
- 67 armoring has been characterized by Snohomish County as either vertical, sloped, or sloped and
- 68 failing. The armoring within and adjacent to the city falls into the “sloped and failing”
- 69 classification. The only other significant modification is a wharf several hundred yards north of
- 70 the City.
- 71
- 72 **B8: Shoreline Type.** This map, derived from the Washington DNR Shorezone Inventory, shows
- 73 shorelines in the Brown’s Bay region to include sand beach, narrow sand and gravel beach, and
- 74 sand and gravel flats or fans. The only shoreline type present in or near the City of Lynnwood is
- 75 “narrow sand and gravel beach”.
- 76
- 77 **B9: Drift Cells.** This map, derived from Ecology net shore drift data, shows Lynnwood’s shoreline to
- 78 be in a net south-to-north drift area that extends beyond the Brown’s Bay region.
- 79
- 80 **B10: Eelgrass/Kelp (Shoreline Lengths).** This map, derived from the Washington DNR Shorezone
- 81 Inventory, indicates no inventoried eelgrass, kelp, or laminaria near the vicinity of our shoreline.
- 82 The nearest kelp is patchy bull kelp several hundred yards south of the city limits, while the
- 83 nearest eelgrass is shown a somewhat greater distance to the north of the City.
- 84
- 85 **B11a: Sonar Survey Vegetation Type.** More recent side-scan sonar surveys in the Brown’s Bay region
- 86 also found no presence of kelp or eelgrass on our shoreline jurisdiction. Unlike the earlier DNR
- 87 visual surveys, the sonar surveys do indicate patches of both moderate and dense eelgrass within
- 88 a few hundred feet of the site, and small patches of kelp within 2000 feet both north and south of
- 89 the city limits.
- 90
- 91 **B11b: Sonar Survey Substrate and Vegetation.** The sonar survey data also provide additional detail
- 92 about substrate conditions, confirming the presence of sandy bottom conditions along the
- 93 shorezone. The sonar map also depicts the general orientation of the wastewater treatment plant
- 94 outfall, extending through the survey area.
- 95

96 **B12: Fucus & Ulva (Shoreline Lengths).** This map, derived from the Washington DNR Shorezone
97 Inventory, shows evidence of both patchy focus (barnacle) and patch ulva (algae) off the shore of
98 the City of Lynnwood.
99

100 C. CRITICAL AREAS

101
102 Includes wetlands, aquifer recharge areas, fish and wildlife conservation areas, geologically hazardous
103 areas, frequently flooded areas, and shorelines of statewide significance.
104

105 **C1: City of Lynnwood Sensitive Areas Map.** Depicts critical areas (no wetlands known on waste
106 water treatment plant site).

- 107 • Aquifer Recharge Areas – Unknown.
- 108 • Fish and Wildlife Conservation areas – mapped near Lynnwood city limits.

109
110 **C2: Geologically Hazardous areas.** See Composite Geological Map of the Sno-King Area created by
111 the University of Washington and USGS (2004). The Geologic Units present in the vicinity of
112 the City of Lynnwood wastewater treatment plant site include “Qvt – Vashon till” and “Qpf –
113 pre-Fraser deposits”.

114
115 **C3: Flood Insurance Rate Map from FEMA.** According to FEMA’s Flood Zone Definitions: Zone
116 A is an area of special flood hazard without water surface elevations determined; Zone AE is an
117 area of special flood hazard with water surface elevations determined; and Zone X, B, or C are
118 areas of minimal to moderate flood hazard (where flood insurance is available but not required by
119 federally regulated lenders). Zone AE covers the Lynnwood shoreline up to the railroad tracks
120 but does not appear to extend to the wastewater treatment plant site.
121

122 **C4: Shorelines of Statewide Significance & Shorelands Map.** This map depicts Lynnwood’s
123 estimation of the Ordinary High Water Mark (OHWM), Line of Extreme Low Tide, Shorelines of
124 Statewide Significance, Shorelines, and Shorelands (200-feet from the OHWM).
125

126 **C5: Sensitive Areas Wetlands & Riparian Corridors** (Edmonds Drainage Basin Study by RW
127 Beck & Associates, 1991). This map exhibits the Meadowdale drainage basin and riparian
128 corridor.
129

130 **C6: Existing Drainage System – Meadowdale Basin** (Edmonds Drainage Basin Study by RW Beck
131 & Associates, 1991). This map exhibits existing streams, drainage basin boundaries, sub basin
132 boundaries, and pipe in the City of Edmonds (which includes the Lynnwood site).
133

134 **C7: Seasonal High Water Table** (Edmonds Drainage Basin Study by RW Beck & Associates, 1991).
135 This map exhibits the seasonal high water table in the study area.
136

137 **C8: Soils.** This map shows regional soils as depicted by the USDA Natural Resources Conservation
138 Service (NRCS). The dominant map units in the Lynnwood Study Areas are Alderwood-Everett
139 gravelly sandy loams (25-70 percent slopes) and Alderwood-Urban Land complex (8-15 percent
140 slopes). These soils are typically moderate well to somewhat excessively drained above a much
141 less permeable hardpan layer. Hydric soils are either missing or occur in small areas below the
142 mapping unit criteria for the survey.
143

- 144 **C9a: Bathymetry and Topography.** Recent LIDAR imagery has been used to generate a hillshade
145 terrain map and both 10 and 100-foot contours for the upland areas within the City of Lynnwood
146 study area. This map shows clearly the beach, valley floor, and access road portions of the site.
147 Bathymetry, here superimposed with 50 and 100 foot contours, has been derived from PRISM 10
148 meter digital elevation model data.
149
- 150 **C9b: Percent Slope.** The LIDAR-based digital elevation model has been processed to indicate percent
151 slope within the study area. The overall terrain of the area, relatively level low coastal bluff with
152 deeply incised stream valleys, is clearly portrayed. The linear area of steep slopes running along
153 the coastline is the rip-rap armored rail bed.
154
- 155 **C10: Selected Fish Species.** This map, derived from the Washington DNR Marine Resources
156 Database, shows selected species habitat use in Brown’s Bay. DNR surveys have shown no
157 evidence of forage fish spawning in this area of the Sound. Deeper offshore areas support both
158 pelagic species (walleye, pollock, Pacific whiting Pacific cod) and demersal species (Pacific
159 halibut, skate, dogfish, flatfish, surfperch) common to Puget Sound.
160
- 161 **C11: Shoreline Slope Stability.** This map, derived from the Coastal Zone Atlas of Washington (1979)
162 categorizes slopes as stable, intermediate, unstable, unstable recent slide, unstable old slide, and
163 modified. Slope categories in and around the Lynnwood study area include “modified”, “stable”,
164 and “unstable”, with most city property being either modified or unstable.
165
- 166 **C12: Crab Distribution.** Marine Shoreline of Snohomish County map of the existing Dungeness Crab
167 Distribution and Recreation Harvest areas. The map shows both Dungeness crab and Dungeness
168 crab recreational buoys in and around the Lynnwood study area. More detailed maps of crab
169 distribution are not available.
170
- 171 **C13: Bathymetry & Topography.** This map was developed using the same data sources and
172 techniques described in C9a (above), showing bathymetry and topography for the coastal region
173 containing the study area.
174
- 175 **C14: Forage Fish.** WRIA 8 and 9 State of the Nearshore Report, King County DNR, map of known
176 forage fish spawning areas. This map shows no evidence of spawning sand lance, surf smelt,
177 herring, or any other fish. The Washington DNR Marine Resources Survey, not shown here, also
178 reports no forage fish spawning in the study area.
179
- 180 **C15a Invertebrates.** WRIA 8 and 9 State of the Nearshore Report, King County DNR, map of the
181 distribution of selected invertebrates. This map shows evidence of Trawl Survey-Dungeness
182 Crab, Dungeness Crab, and Geoduck off or near the City of Lynnwood shoreline.
183
- 184 **C15b: Geoduck Distribution.** This map, derived from the Washington DNR Marine Resources Survey,
185 shows areas of geoduck habitat in the Brown’s Bay region.
186
- 187 **C16: Salmonid Use of the Nearshore Environment.** Areas supporting either commercial (intense
188 season) or sportfishing for salmonids, as indicated in the Washington DFW Marine Resources
189 Survey, are depicted as shaded area. Juvenile Chinook, chum, coho, cutthroat, pink, sockeye, and
190 steelhead are known or expected to be found in the Nearshore zone to a depth of 30 meters.

191 **D. DEGRADED AREAS AND SITES WITH POTENTIAL FOR**
192 **ECOLOGICAL RESTORATION.**

193
194 **D1: Photo of Pilings.** This photo is evidence that there was a previous structure on or near the City of
195 Lynnwood shoreline (they appear to be pilings). The only area with potential for ecological
196 restoration is the treatment plant site, and these nearby pilings appear to be the only item that
197 could be considered degraded.
198

199 **E. AREAS OF SPECIAL INTEREST**

200
201 *Includes priority habitats, rapidly developing waterfronts, previously identified toxic or hazardous*
202 *material clean-up sites, or eroding shorelines.*

- 203
- 204 • Priority Habitats – None known.
- 205
- 206 • Rapidly Developing Waterfronts – Does not apply, because there is no development potential of
207 the waterfront. This is a static environment (see aerial photograph).
208
- 209 • Toxic or Hazardous Material Clean-up Sites – None. The wastewater treatment operations are
210 being handled properly under existing state regulations.
211
- 212 • Eroding Shoreline – None. We are not aware of any significant bluff erosion (see steep slope
213 maps – C9 and C11). However, some lengths of the rip-rap seawall protecting the BNSF tracks
214 are described as “failing.” (See Map B7)
215

216 **F. PUBLIC ACCESS**

217
218 *Existing and potential shoreline public access sites, including public rights-of-way and utility corridors.*
219 *The inventory will include descriptions of recorded public access easements, their prescribed use,*
220 *maintenance and terms.*

- 221
- 222 • Existing & Potential Shoreline Public Access Sites – Not Applicable (strictly prohibited).
223
- 224 • Public Rights-of-Way – Not Applicable (strictly prohibited).
225
- 226 • Utility Corridors – Not Applicable.
227
- 228 • Explanation of Public Access Sites: Our agreement with the Railroad specifically forbids us from
229 allowing the public to access the beach through our property. Treatment plant personnel do
230 however have the right to cross the tracks to maintain the outfall. Any work that requires heavy
231 equipment to cross the tracks requires coordination with the railroad and may require that the City
232 pay to have a railroad flagger on site. We do have a lease with the railroad that allows us to drive
233 on railroad right-of-way (not on or over the tracks) to drive around the lab building to reach the
234 centrifuge building. The lease and the drive lane keep us clear of the tracks by a minimum of 14
235 feet. We fence and gate our property, entirely locked/fenced – it is open for operation only.
236

237 **G. GENERAL LOCATION OF CHANNEL MIGRATION ZONES AND**
238 **FLOODPLAINS.**

- 239
- 240 • Channel Migration Zones (CMZs) – No evidence of Channel Migration Zones.
- 241
- 242 **G1: Floodplains.** Consult FEMA Firmette map (C3), which shows estimated floodplains (Zone AE is
243 an area of special flood hazard with water surface elevations determined).
244

245 **H. PHOTOGRAPHS**

246

247 *Historical aerial photographs documenting past conditions to assist in preparing an analysis of*
248 *cumulative impacts of development.*

- 249
- 250 **H-1:** Aerial photograph (south of site) looking east, 2016.
 - 251 **H-2:** Aerial photograph (at site) looking southwest, 2018.
 - 252 **H-3:** Aerial photograph (at site) looking west, 2018.
 - 253 **H-4:** Aerial photograph (at site) looking west, 2018.
 - 254 **H-5:** Aerial photograph (at site) looking north, 2018.
 - 255 **H-6:** View of railroad tracks looking south, 2018.
 - 256 **H-7:** View of railroad tracks looking north, 2018.
 - 257 **H-8:** View of shoreline looking south, 2018.
 - 258 **H-9:** View of shoreline looking north, 2018.
 - 259 **H-10:** View of pilings on shoreline, 2018.
 - 260 **H-11:** Looking west at shoreline, 2018.
 - 261 **H-12:** Historic photo of treatment plant site, circa 1960.
 - 262 **H-13:** Historic photo of treatment plant site, circa 1960.
 - 263 **H-14:** Historic aerial photo, 1977.
- 264

265 **I. ARCHAEOLOGICAL OR HISTORIC RESOURCES IN SHORELINE**
266 **JURISDICTION.**

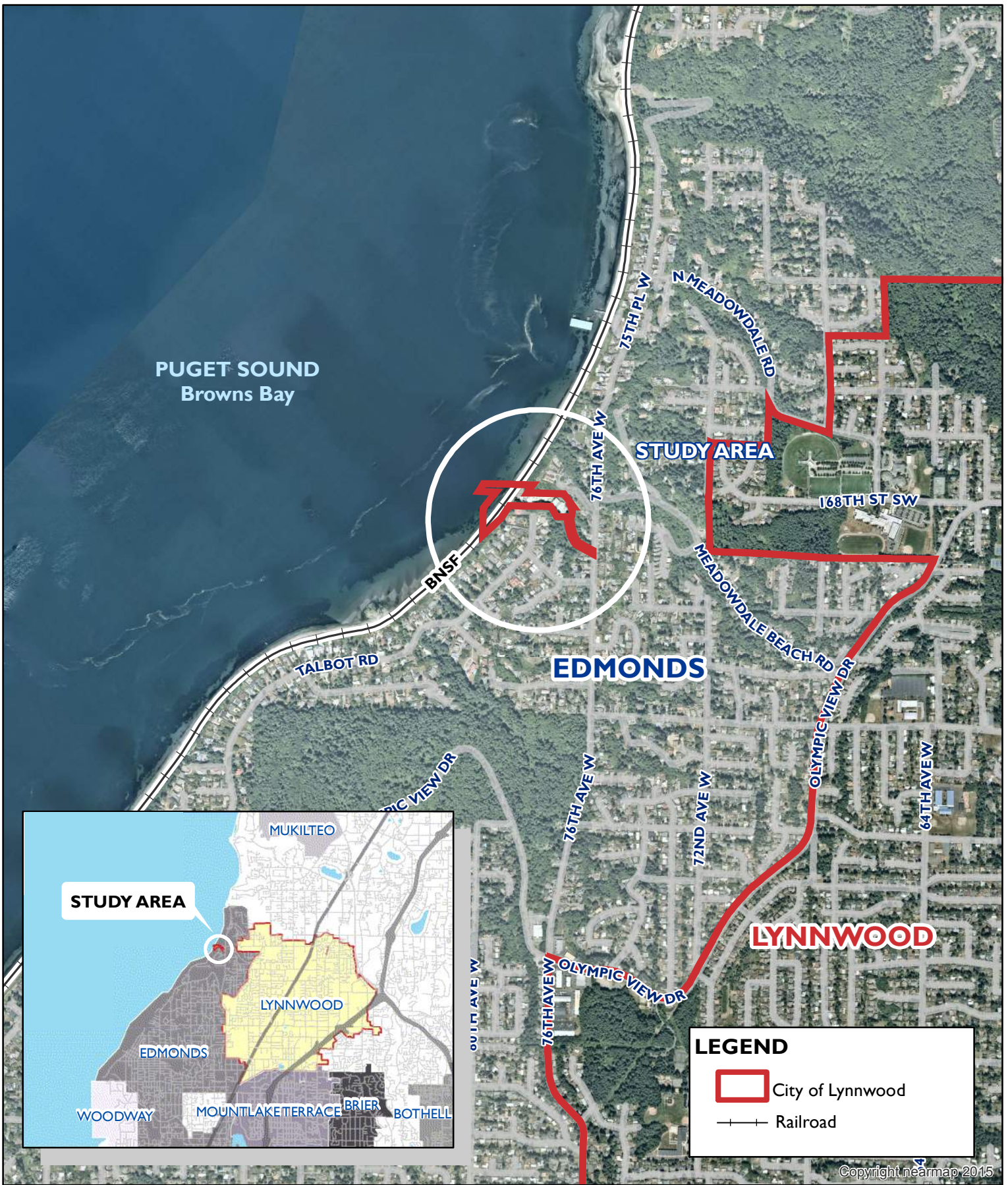
- 267
- 268 • Archaeological/Historic Resources – Not Applicable. Because the reach of the City of Lynnwood
269 shoreline is so small, and because of its situation in the County, there is no available data on
270 Archaeological or historic resources in shoreline jurisdiction. None are known to exist at this
271 site.
 - 272
 - 273 • Tribal Lands – There are no Tribal Lands in the vicinity.
- 274

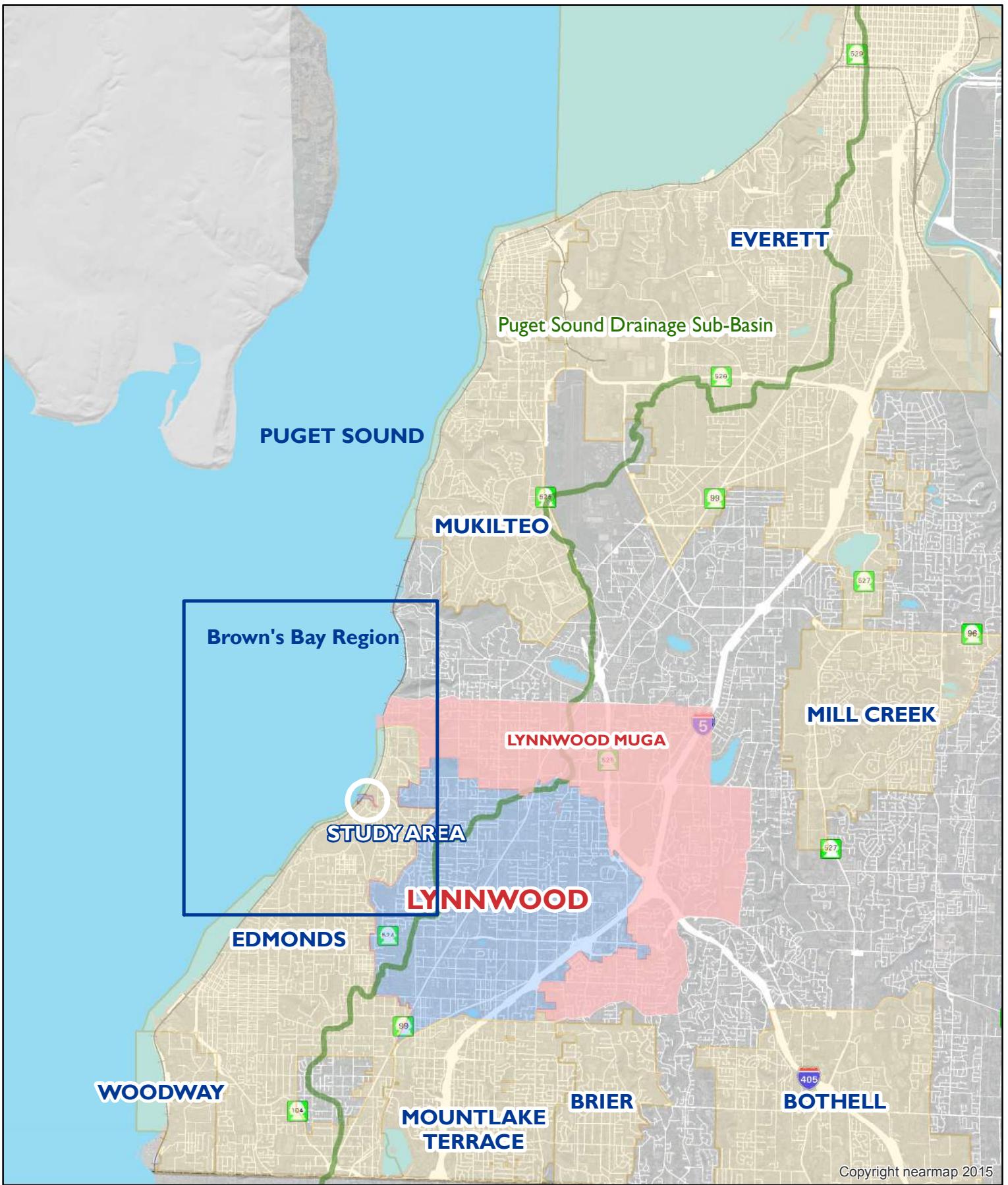
275 **J. CONDITIONS AND REGULATIONS**

276 *Conditions and regulations in shore land and adjacent areas that affect shorelines, such as surface water*
277 *management and land use regulations.*

- 278
- 279 • Land Use Regulations – Also applicable to the City of Edmonds (200-foot landward from the
280 ordinary high water mark). The City of Lynnwood site is entirely surrounded by City of
281 Edmonds. See also the City of Edmonds Zoning and Comprehensive Plan maps.



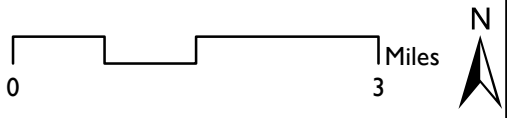




Copyright nearmap 2015



A3: SOUTHWEST SNOHOMISH COUNTY JURISDICTIONS AND COVERAGES



B1: Shoreline & Adjacent Land Use Patterns



City of Edmonds Comprehensive Plan Map

Plan Designations

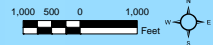
- Retail Core
- Arts Center Corridor
- Downtown Mixed Commercial
- Downtown Convenience
- Downtown Mixed Residential
- Downtown Master Plan
- Shoreline Commercial
- Downtown Residence-Office
- Single Family - Urban 1
- Single Family - Urban 2
- Single Family - Urban 3
- Single Family - Resort
- Single Family Master Plan
- Multi Family - Medium Density
- Multi Family - High Density
- Neighborhood Commercial
- Community Commercial
- Planned Business / Neighborhood Business
- Mixed Use Commercial
- Highway 99 Corridor
- Edmonds Way Corridor
- Hospital / Medical
- Master Plan Development
- Public
- Park / Open Space

Plan Overlays

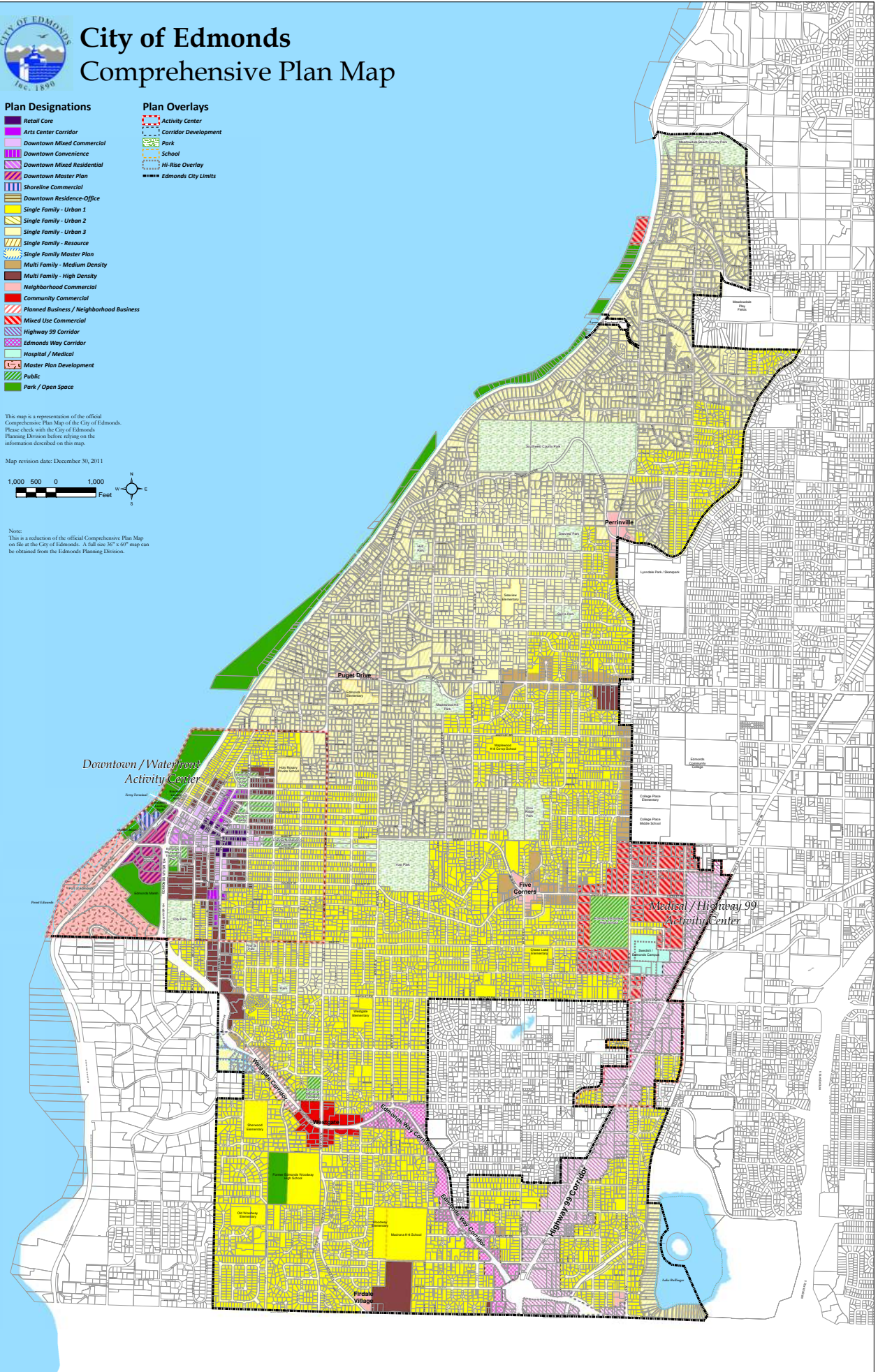
- Activity Center
- Corridor Development
- Park
- School
- Hi-Rise Overlay
- Edmonds City Limits

This map is a representation of the official Comprehensive Plan Map of the City of Edmonds. Please check with the City of Edmonds Planning Division before relying on the information described on this map.

Map revision date: December 30, 2011



Note:
This is a reduction of the official Comprehensive Plan Map on file at the City of Edmonds. A full size 36" x 60" map can be obtained from the Edmonds Planning Division.





B2:City of Edmonds Zoning Map

City of Edmonds

Zoning

Zoning Designations and Descriptions

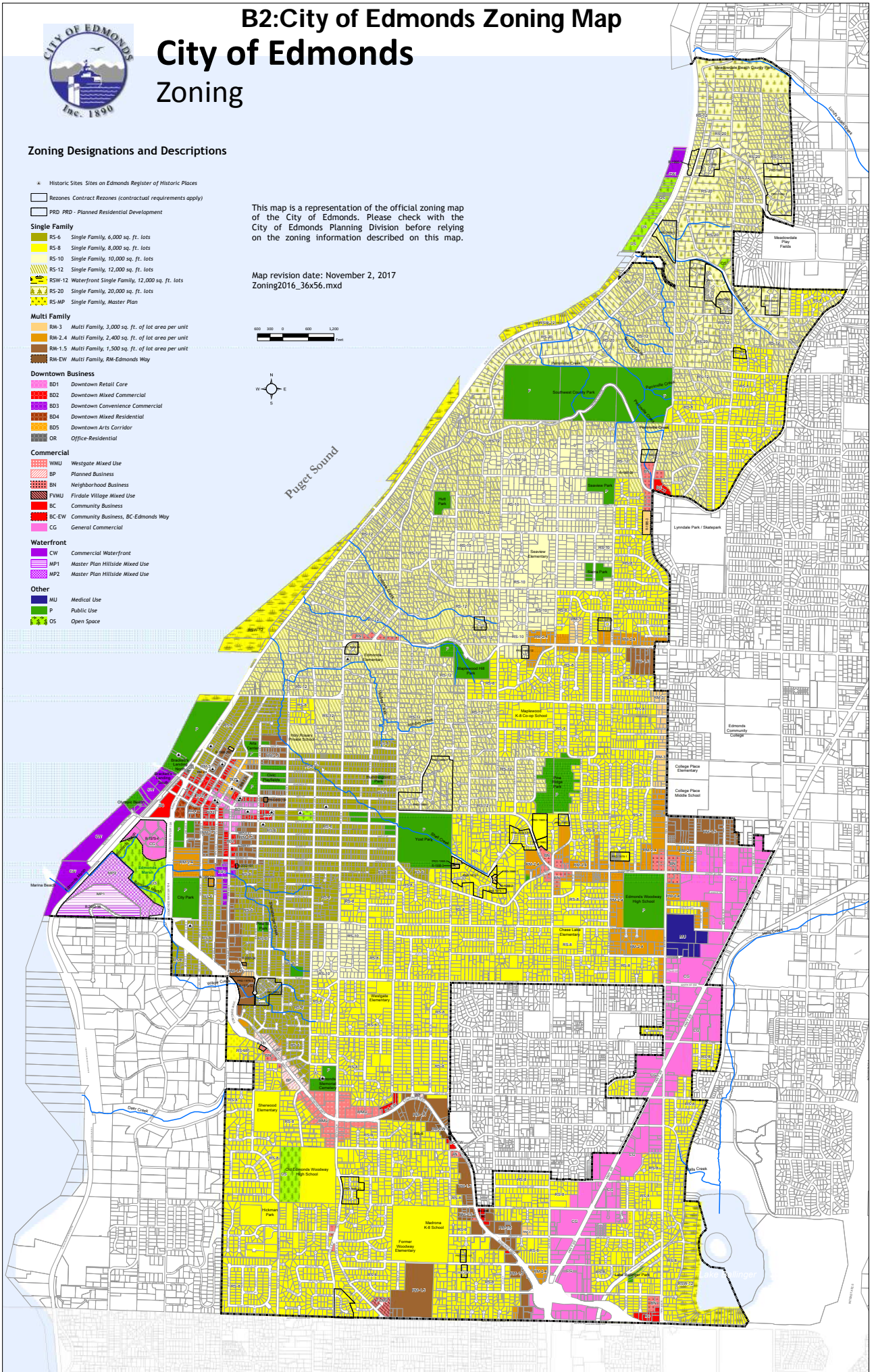
- * Historic Sites Sites on Edmonds Register of Historic Places
- Rezones Contract Rezones (contractual requirements apply)
- PRD PRD - Planned Residential Development
- Single Family**
 - RS-4 Single Family, 6,000 sq. ft. lots
 - RS-8 Single Family, 8,000 sq. ft. lots
 - RS-10 Single Family, 10,000 sq. ft. lots
 - RS-12 Single Family, 12,000 sq. ft. lots
 - RW-12 Waterfront Single Family, 12,000 sq. ft. lots
 - RS-20 Single Family, 20,000 sq. ft. lots
 - RS-MP Single Family, Master Plan
- Multi Family**
 - RM-3 Multi Family, 3,000 sq. ft. of lot area per unit
 - RM-2.4 Multi Family, 2,400 sq. ft. of lot area per unit
 - RM-1.5 Multi Family, 1,500 sq. ft. of lot area per unit
 - RM-EW Multi Family, RM-Edmonds Way
- Downtown Business**
 - BD1 Downtown Retail Core
 - BD2 Downtown Mixed Commercial
 - BD3 Downtown Convenience Commercial
 - BD4 Downtown Mixed Residential
 - BD5 Downtown Arts Corridor
 - OR Office-Residential
- Commercial**
 - WMU Westgate Mixed Use
 - BP Planned Business
 - BN Neighborhood Business
 - FVMU Frisole Village Mixed Use
 - BC Community Business
 - BC-EW Community Business, BC-Edmonds Way
 - CG General Commercial
- Waterfront**
 - CW Commercial Waterfront
 - MP1 Master Plan Hillside Mixed Use
 - MP2 Master Plan Hillside Mixed Use
- Other**
 - MU Medical Use
 - P Public Use
 - OS Open Space

This map is a representation of the official zoning map of the City of Edmonds. Please check with the City of Edmonds Planning Division before relying on the zoning information described on this map.




Map revision date: November 2, 2017
Zoning2016_36x56.mxd



Puget Sound






LEGEND

-  City of Lynnwood
-  Railroad
-  Existing Buildings






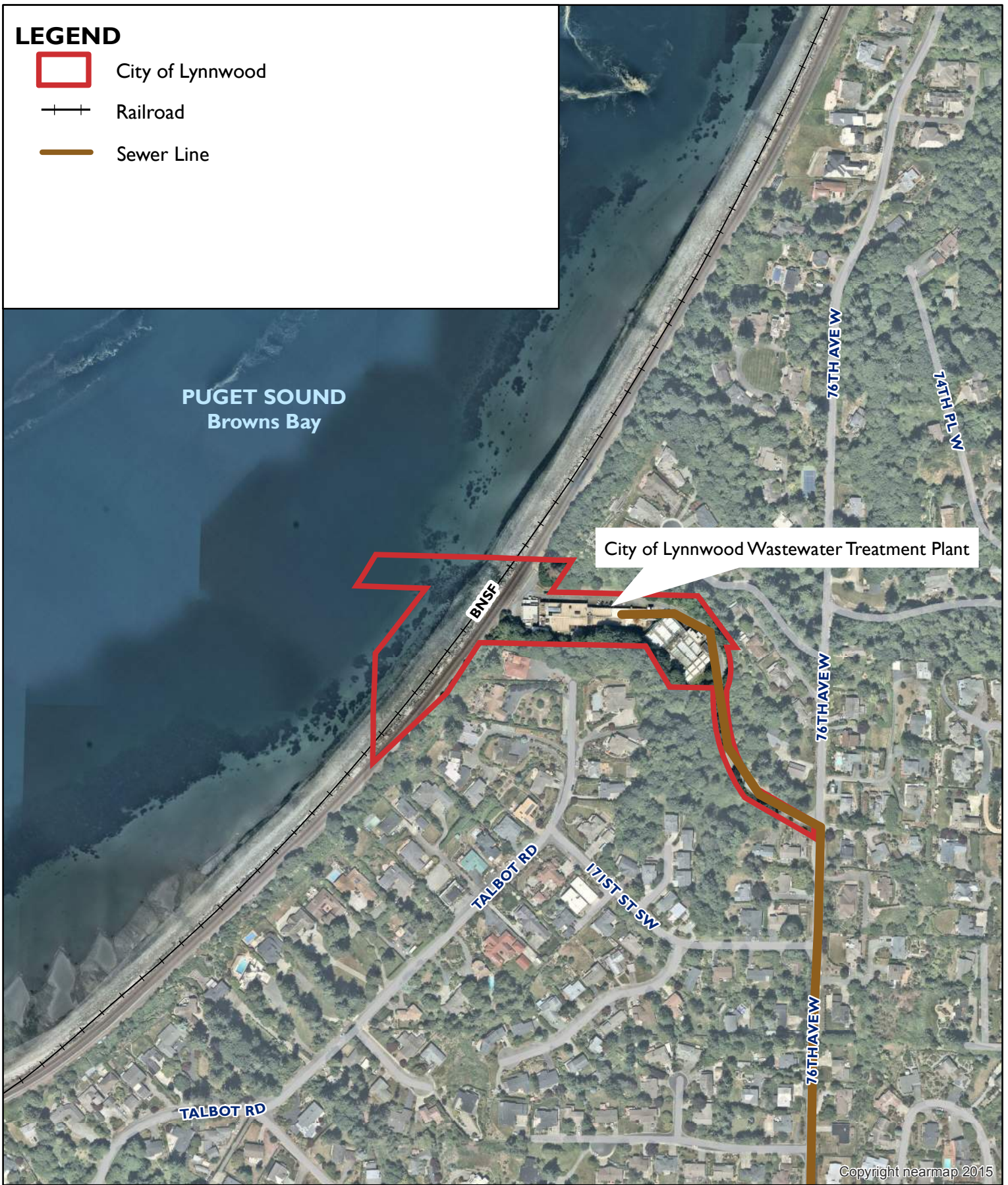
LEGEND

-  City of Lynnwood
-  Railroad
-  Pervious Surface




LEGEND

-  City of Lynnwood
-  Railroad
-  Sewer Line



LEGEND

 City of Lynnwood

Seagrass

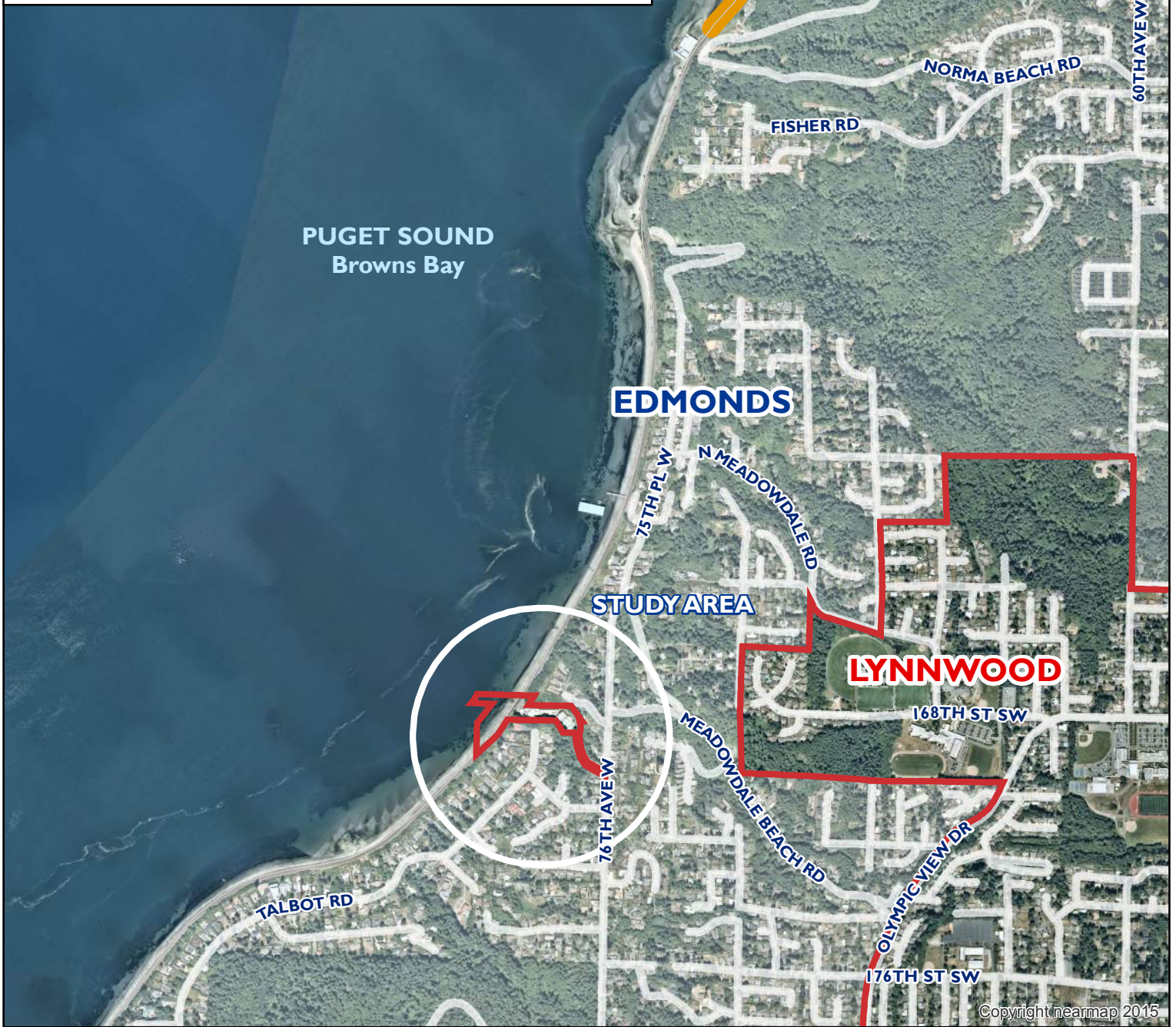
 Eelgrass - Patchy

**No Spartina in area


Data Sources:

Spartina - Washington DNR Shorezone Inventory

Eelgrass - Washington DNR Shorezone Inventory



LEGEND

 City of Lynnwood

Rock Armoring

 Vertical - Good

 Sloped - Good

 Wharf

Data Sources:

Snohomish County Surface Water Management Armoring

DNR Shorezone Inventory, Wharf



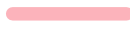
LEGEND



City of Lynnwood



Sand Beach



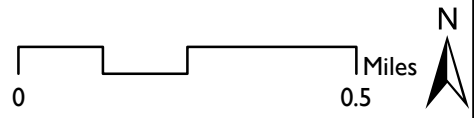
Sand and Gravel Beach, Narrow

Data Sources:

DNR Shorezone Inventory



B8: SHORELINE TYPE



B9:Drift Cells



- nansd No Appreciable Net Shore-drift
- - - Zone of Net Shore-drift Divergence (Erosional zone from which sediment is supplied to diverging drift cells).
- Zone of Net Shore-drift (Direction and length)
- - - County Boundary
- ~ Streams
- Drainage Basin Boundary
- WRIA Boundary
- Lakes/Major Waterways
- Incorporated Area

Drift Cell Source-King County:
 Chrzastowski, M.J. (1982). *Net Shore-drift of King County, Washington*. Master's thesis, Western Washington University.

Drift Cell Source-Snohomish County:
 Johannessen, Jim (1992). *Net Shore-drift in Washington State: Volume 6*. Washington State Department of Ecology, Shorelands and Coastal Zone Management Program.

Other Data Sources:
 1997 King County/Department of Ecology Hydrography Project, King County political, roads and WRIA boundaries.

Poster produced by:
 King County DNR
 Visual Communication/GIS Unit
 0010 Near Drifts.ai 1p


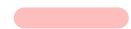


Figure 11

WRIA 8 Nearshore Drift Cells

State of the Nearshore Report


LEGEND

-  City of Lynnwood
-  Kelp - Patchy
- ** No eelgrass present**





Data Sources:
DNR Shorezone Inventory



LEGEND

 City of Lynnwood

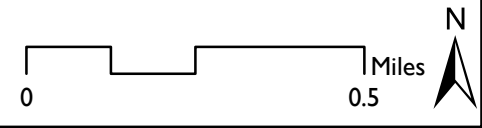
Vegetation Type

-  Dense Eelgrass
-  Kelp
-  Moderate Eelgrass; Moderate Eelgrass
-  Sparse Eelgrass; Sparse Eelgrass


Data Sources:
Battele Pacific Northwest
National Laboratory
King County DNR



**BI I a: SONAR SURVEY
VEGETATION TYPE**



LEGEND

 City of Lynnwood

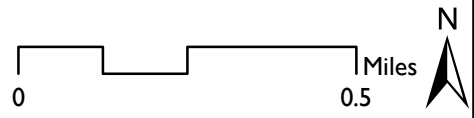
Vegetation Type

-  Mixed Coarse
-  Mixed Coarse w/ Kelp
-  Sand w/ Eelgrass
-  Sand


Data Sources:
Battele Pacific Northwest
National Laboratory
King County DNR




BI 1b: SONAR SURVEY SUBSTRATE & VEGETATION




LEGEND

 City of Lynnwood

Fucus Barnacle

 Fucus Continuous

 Fucus Patchy


Ulva Algae

 Ulva Patchy

Data Sources: DNR Shorezone Inventory



LEGEND

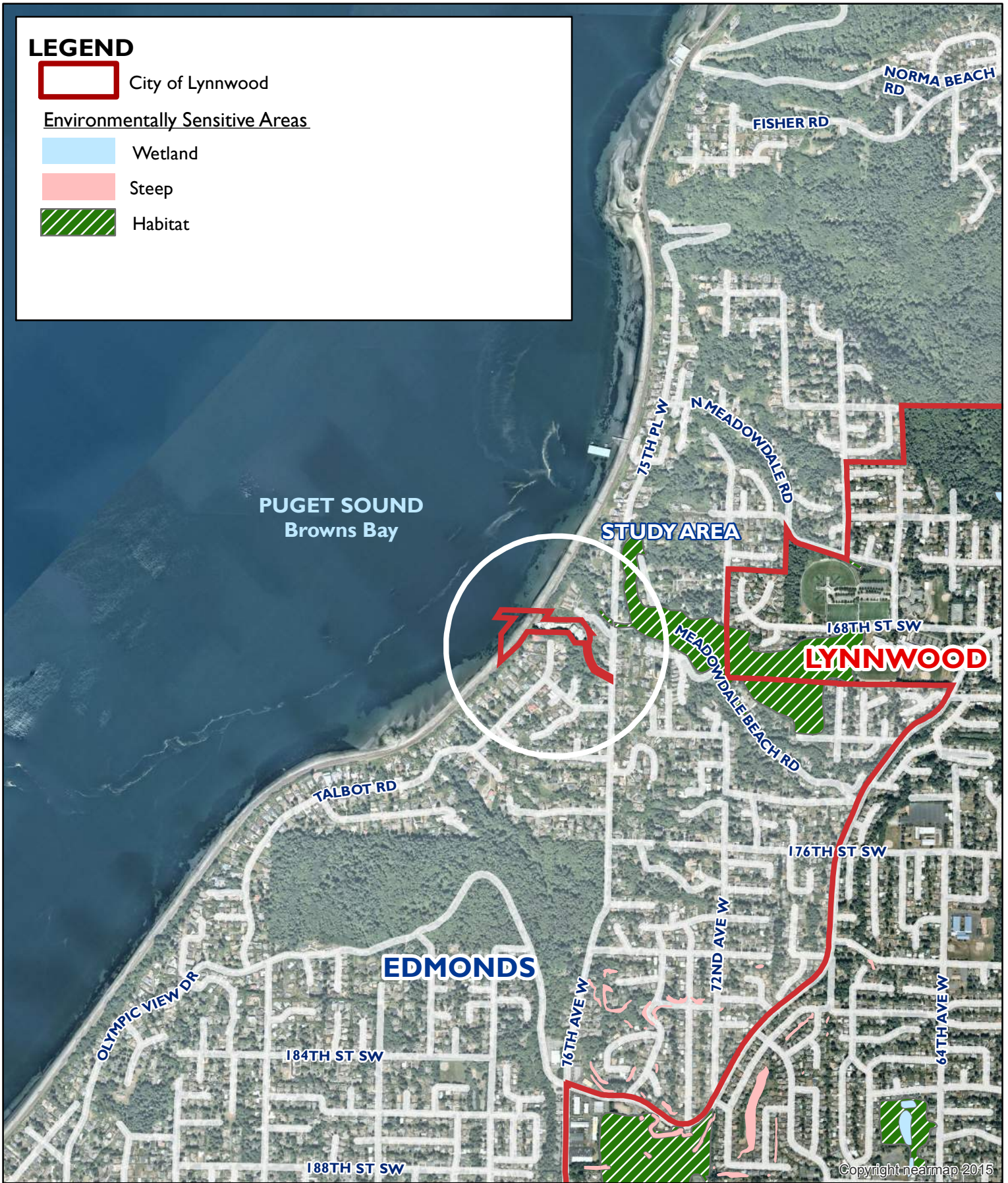
 City of Lynnwood

Environmentally Sensitive Areas

 Wetland

 Steep

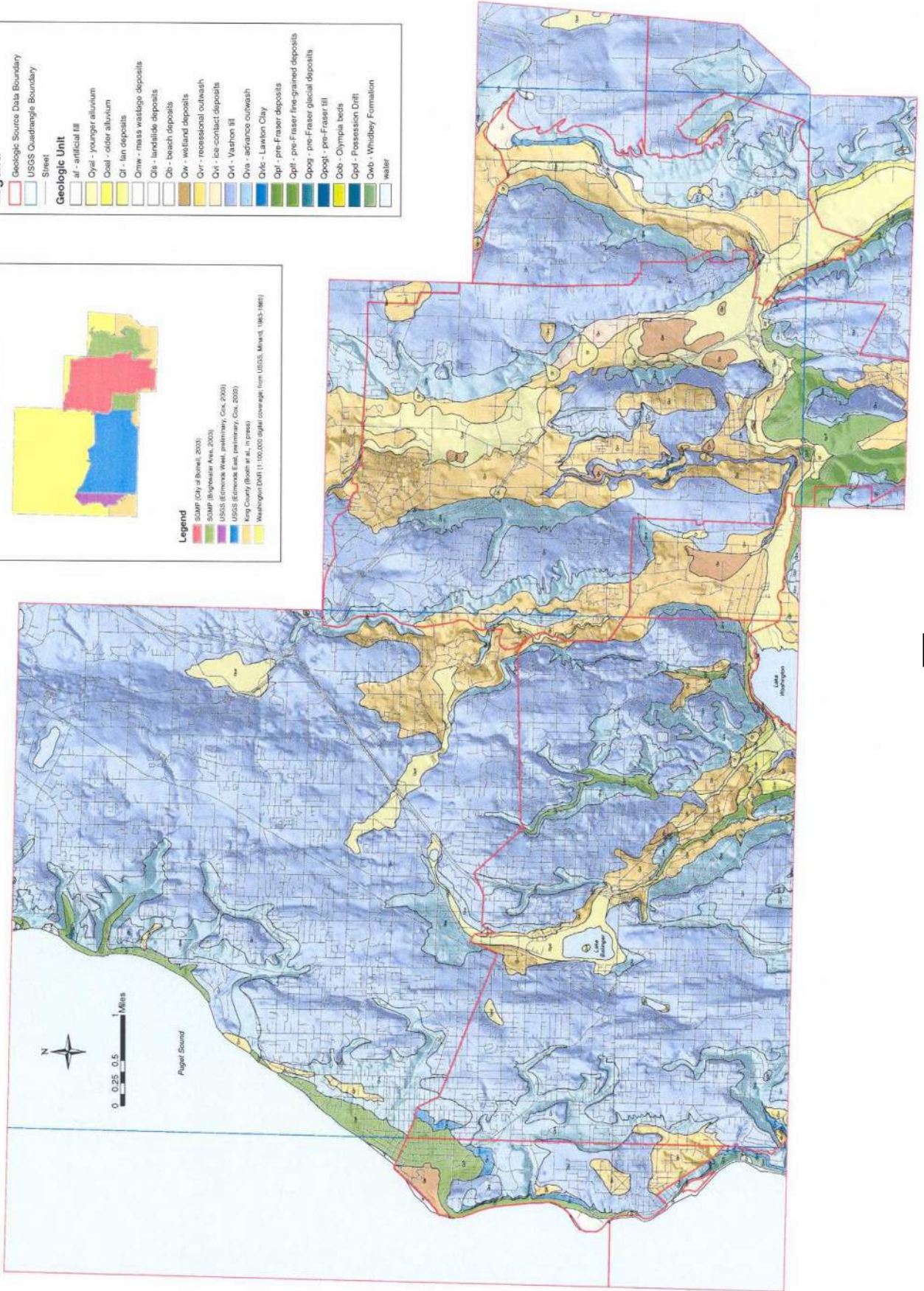
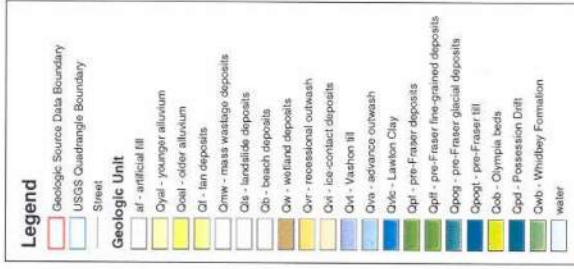
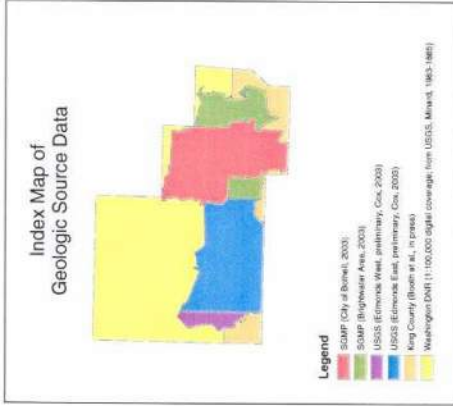
 Habitat

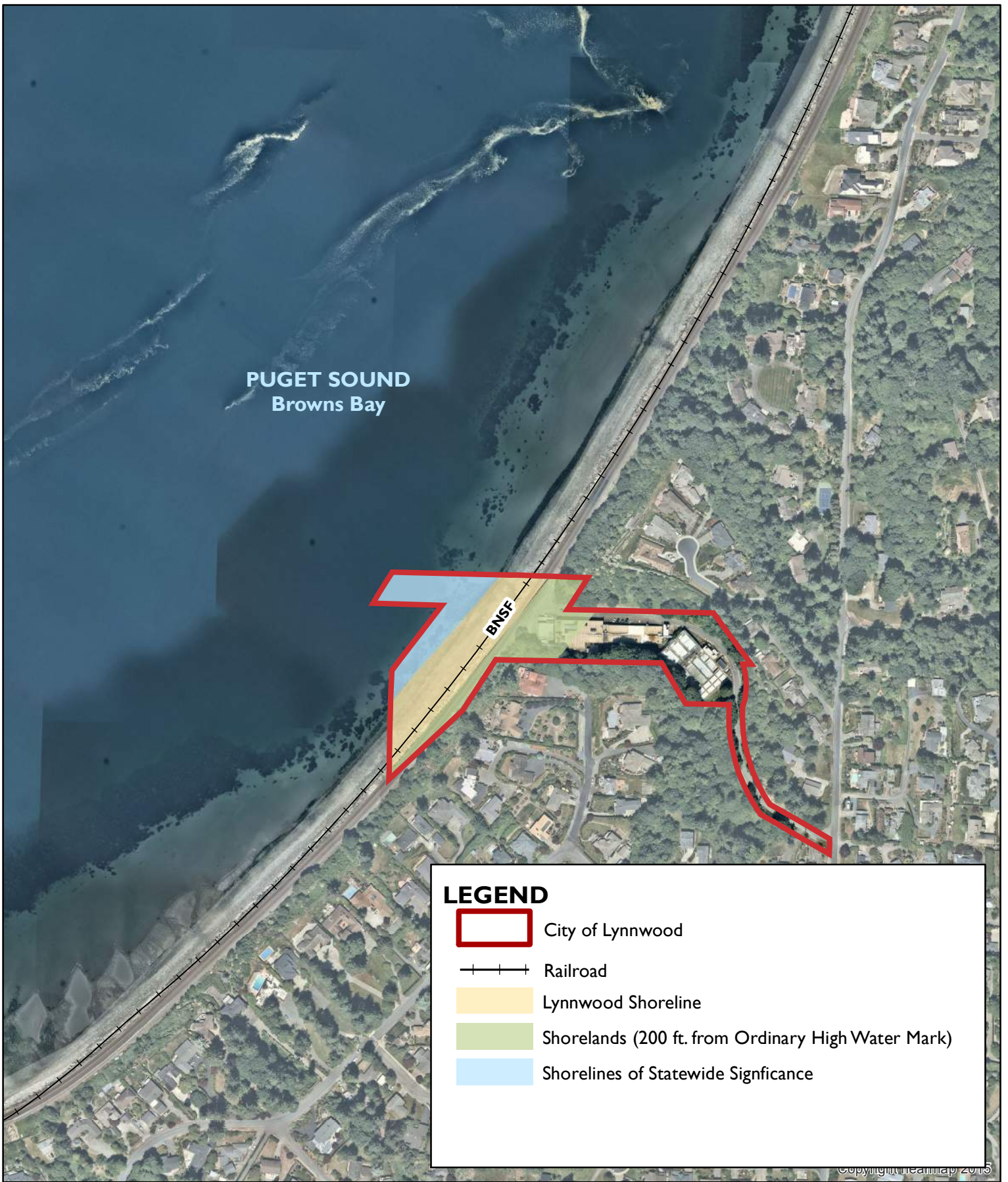


C2: GEOLOGICALLY HAZARDOUS AREAS

DRAFT Composite Geologic Map of the Sno-King Area Central Puget Lowland, Washington

By Derek B. Booth, Brett F. Cox, Kathy G. Trook, and Scott A. Shimal
Seattle-Area Geologic Mapping Project (SAGMP), University of Washington,
and the United States Geological Survey (USGS)
Final Report, August 2004
Scale: 1:24,000





C6: EXISTING DRAINAGE BASIN - MEADOWDALE BASIN

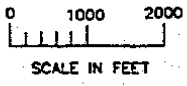
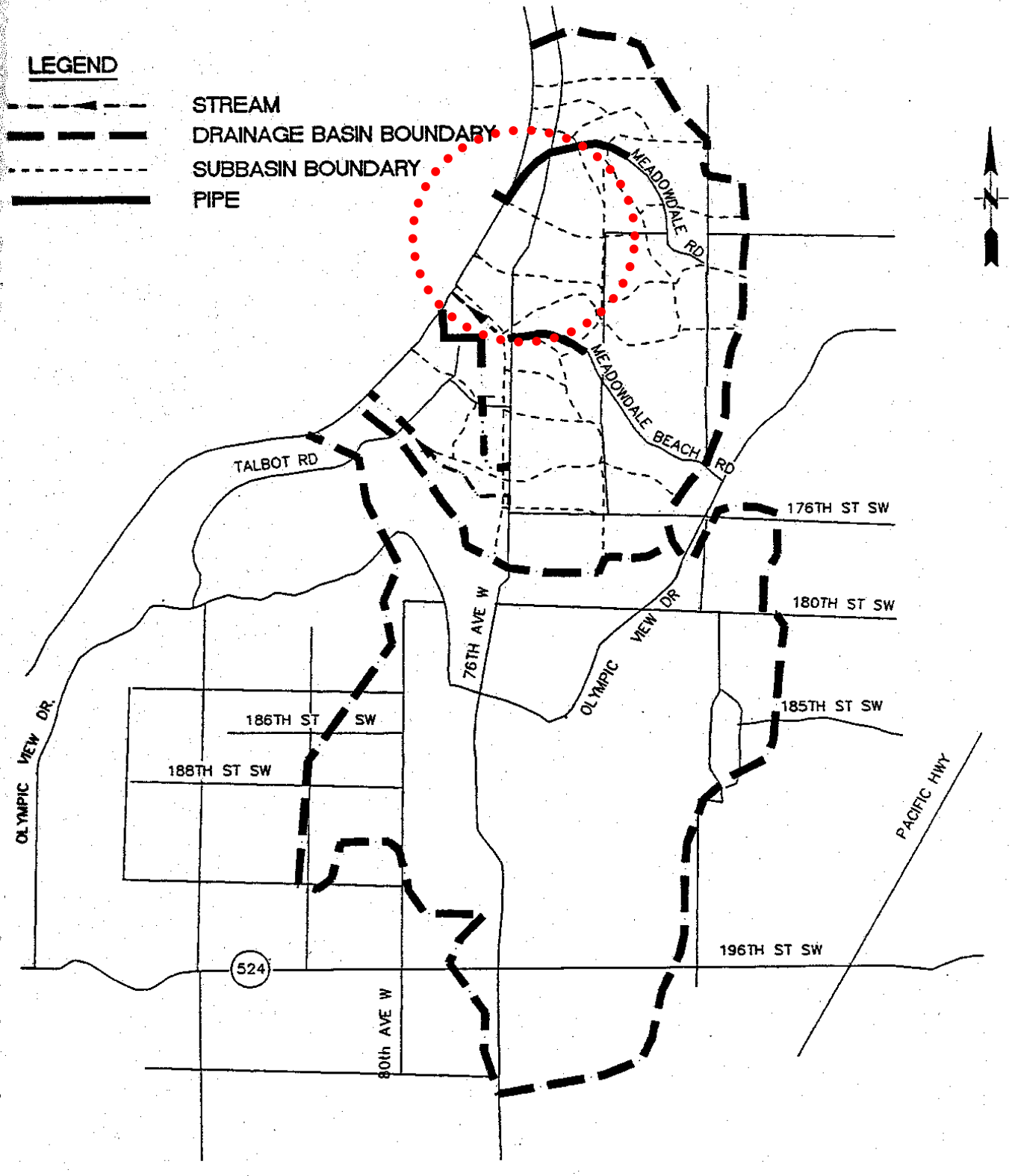







FIGURE IV-3
EXISTING DRAINAGE SYSTEM
MEADOWDALE BASIN

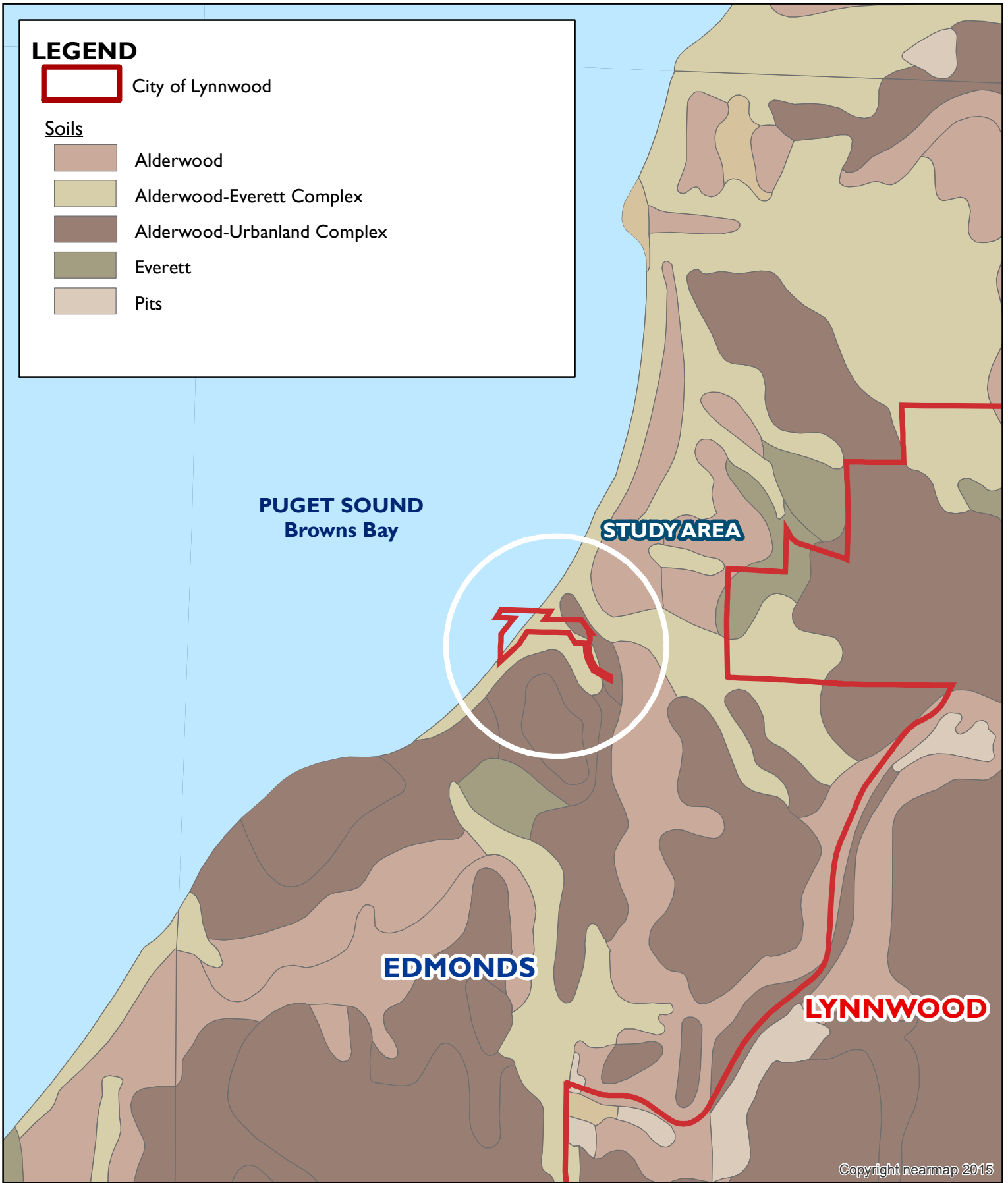
R.W. BECK
AND ASSOCIATES

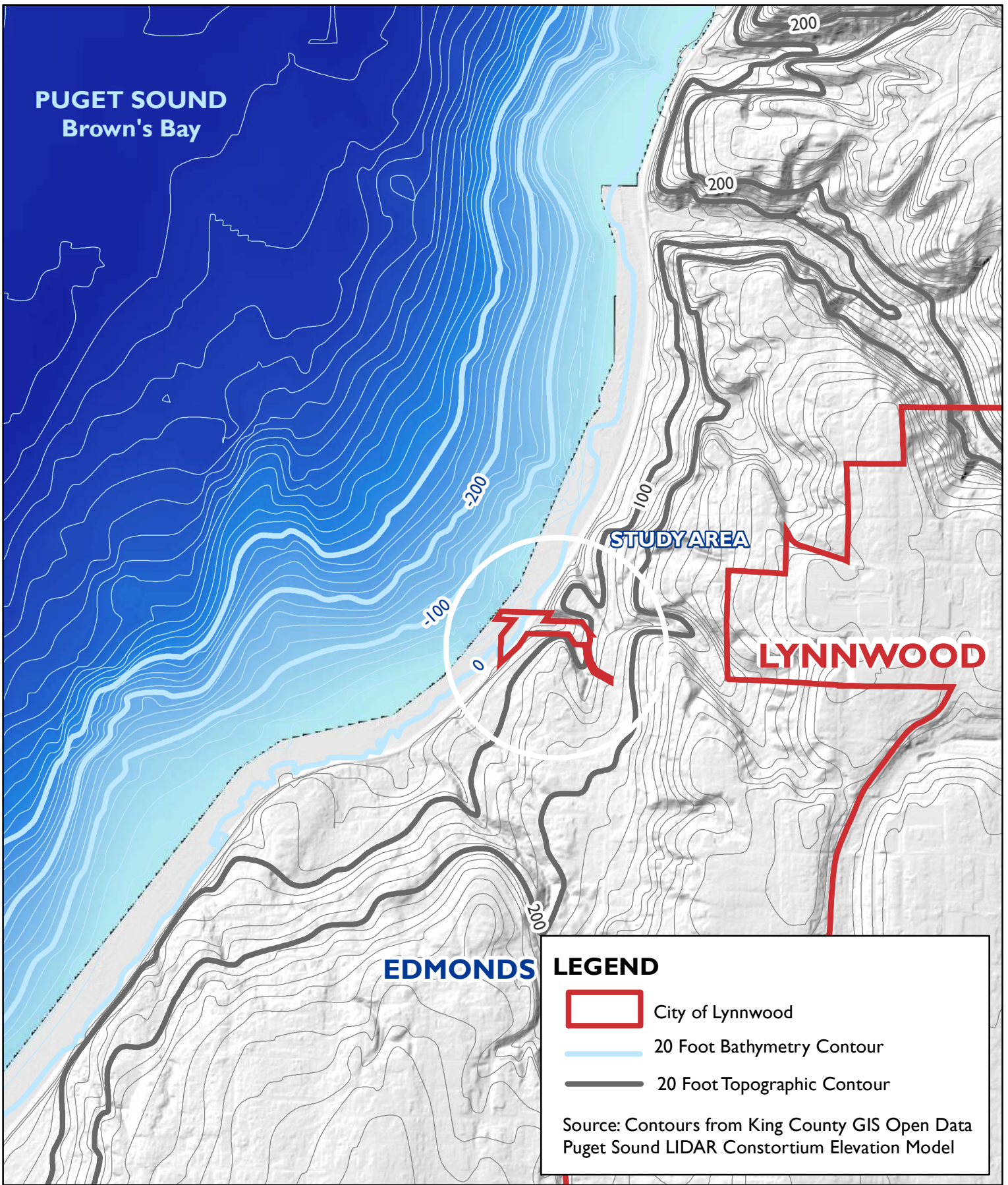
LEGEND

 City of Lynnwood


Soils

-  Alderwood
-  Alderwood-Everett Complex
-  Alderwood-Urbanland Complex
-  Everett
-  Pits















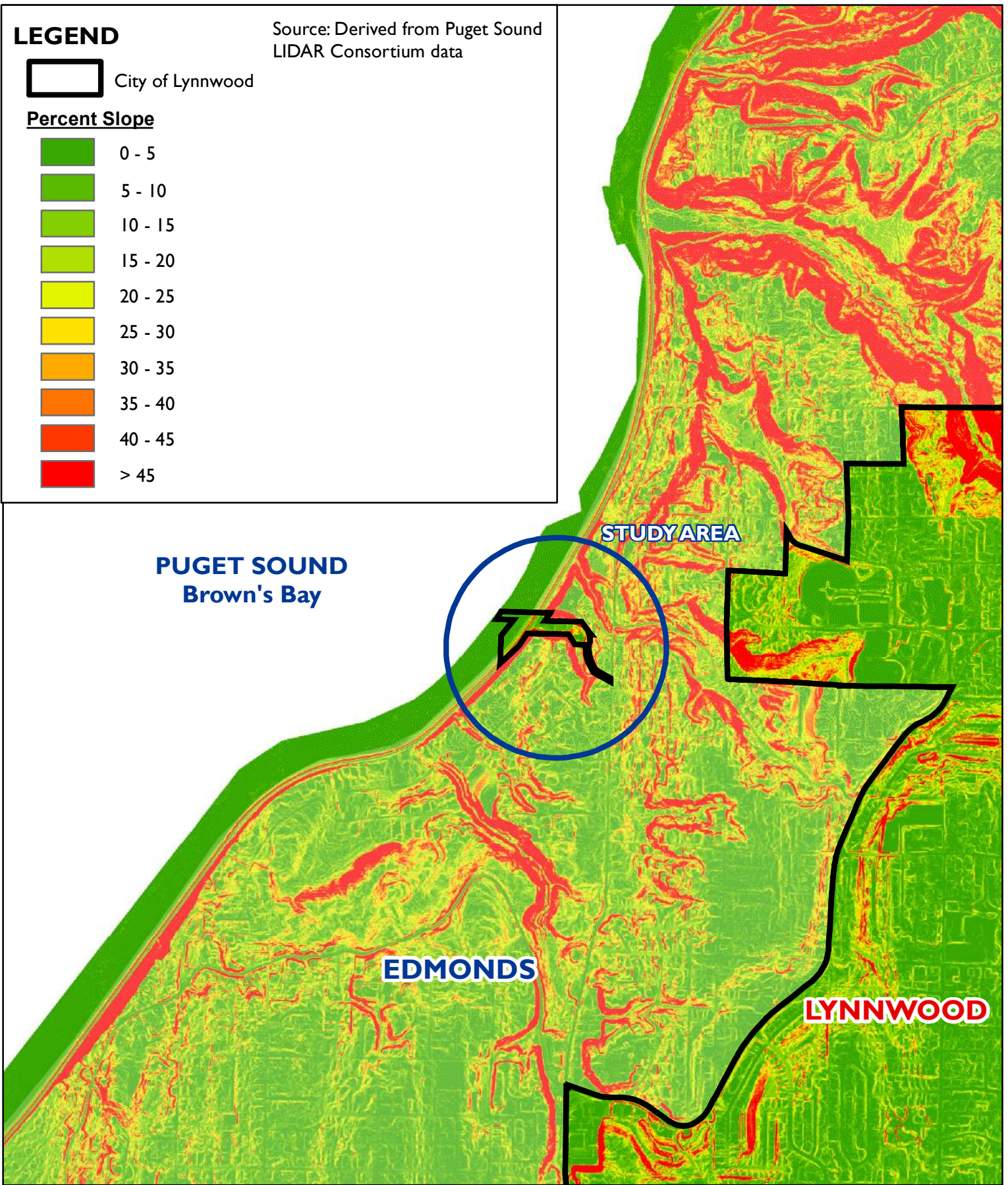
LEGEND

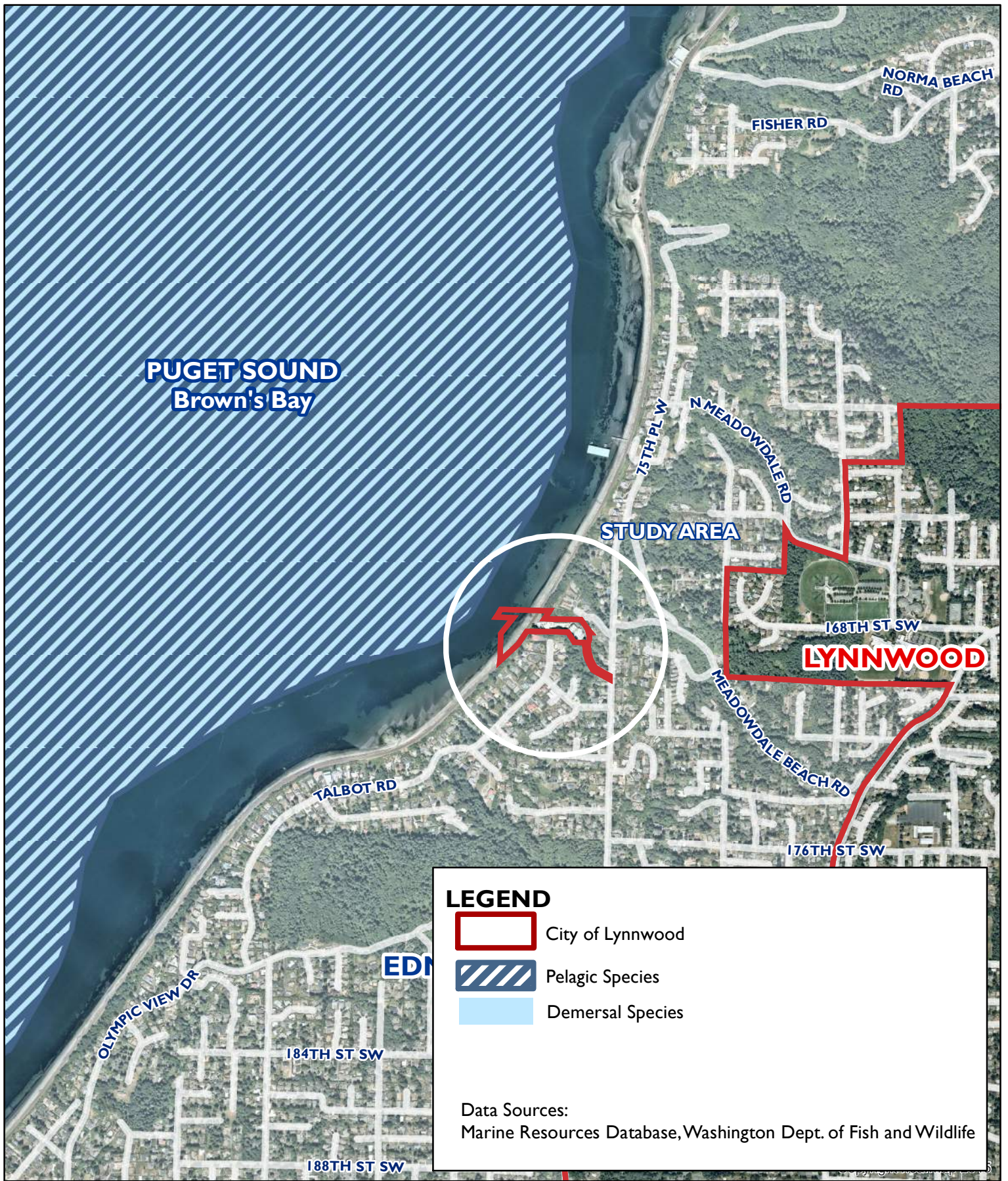
 City of Lynnwood

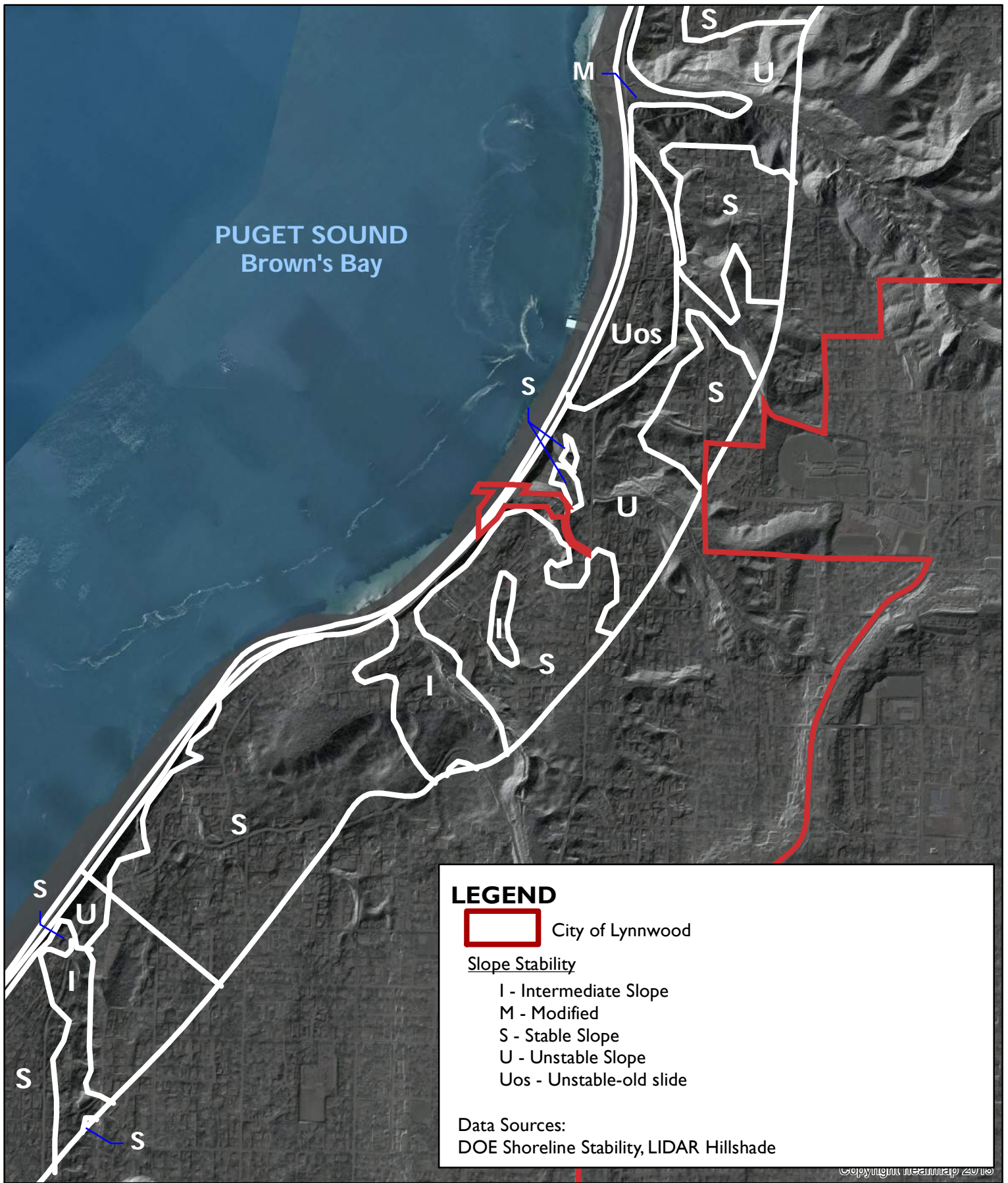
Percent Slope

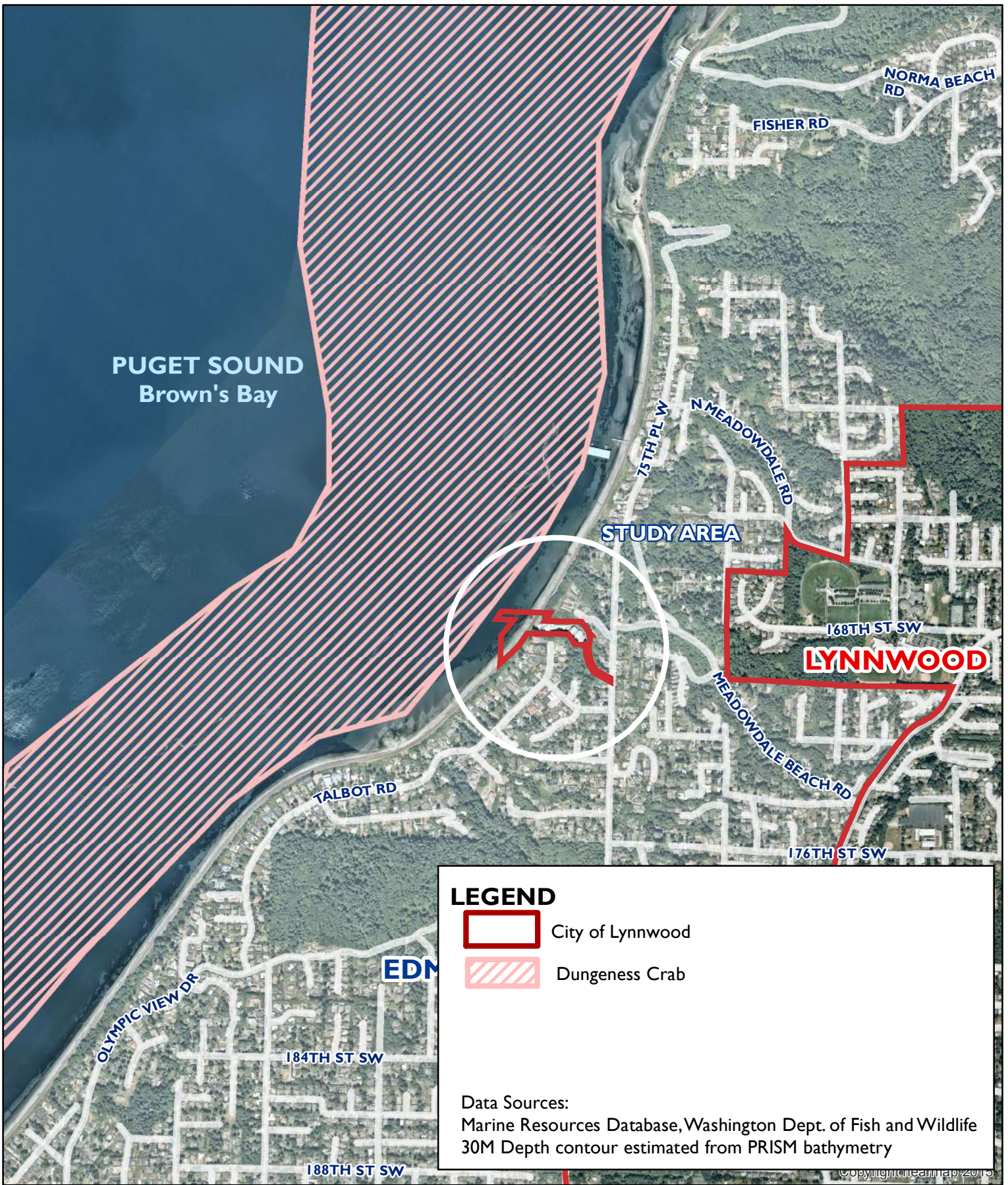
-  0 - 5
-  5 - 10
-  10 - 15
-  15 - 20
-  20 - 25
-  25 - 30
-  30 - 35
-  35 - 40
-  40 - 45
-  > 45

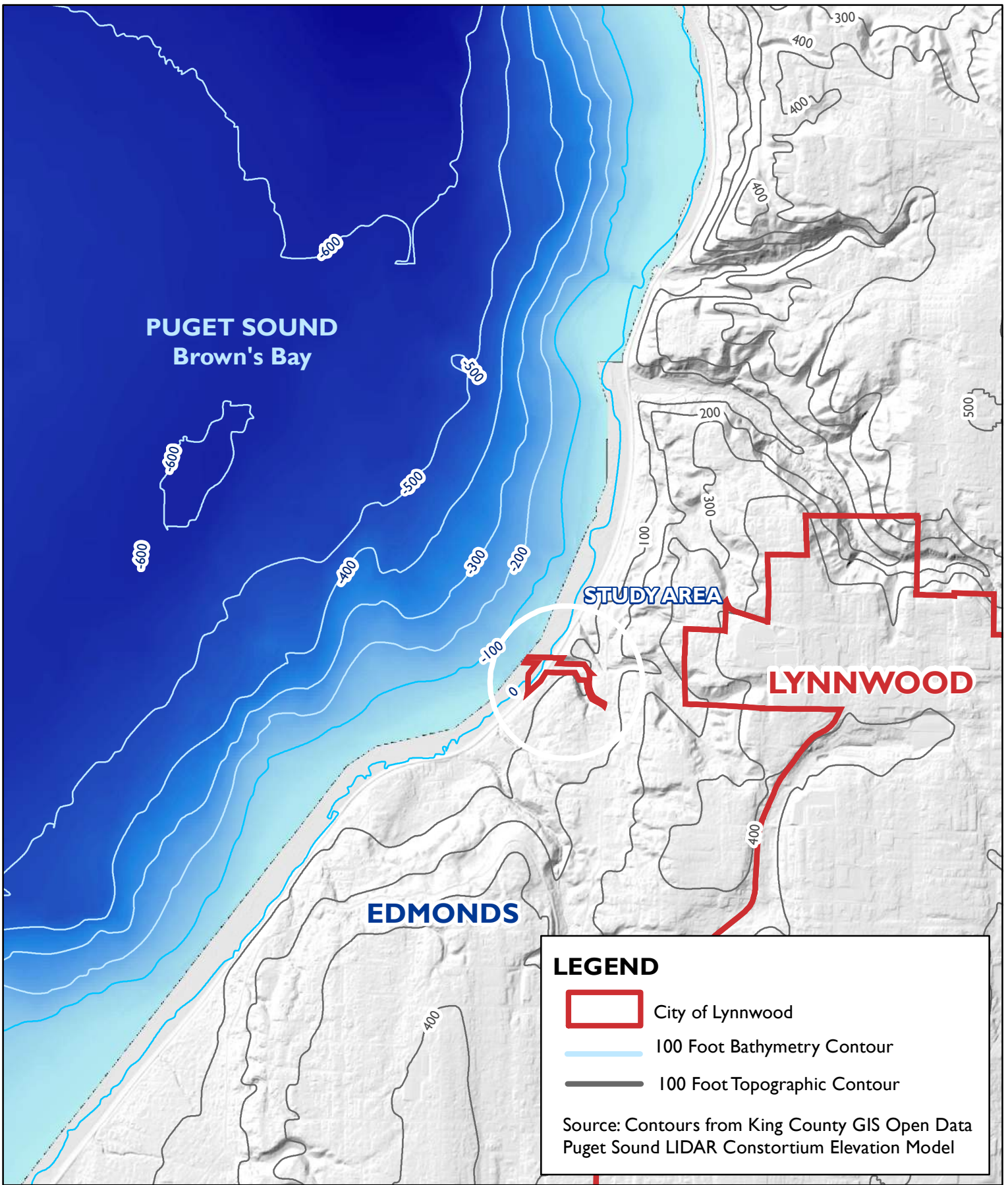
Source: Derived from Puget Sound LIDAR Consortium data








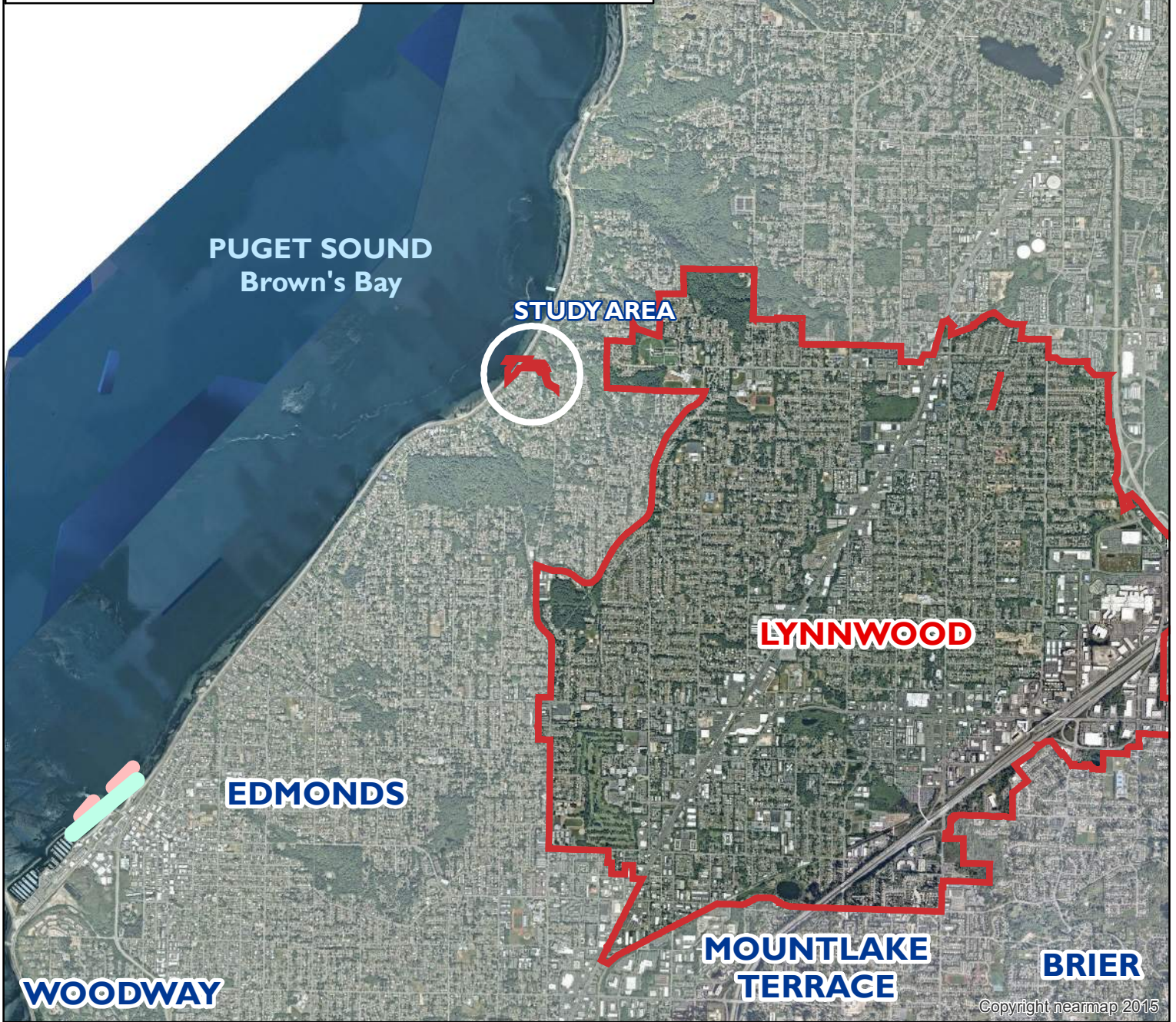




LEGEND

-  City of Lynnwood
-  Surf Smelt Spawning
-  Sand Lance Spawning

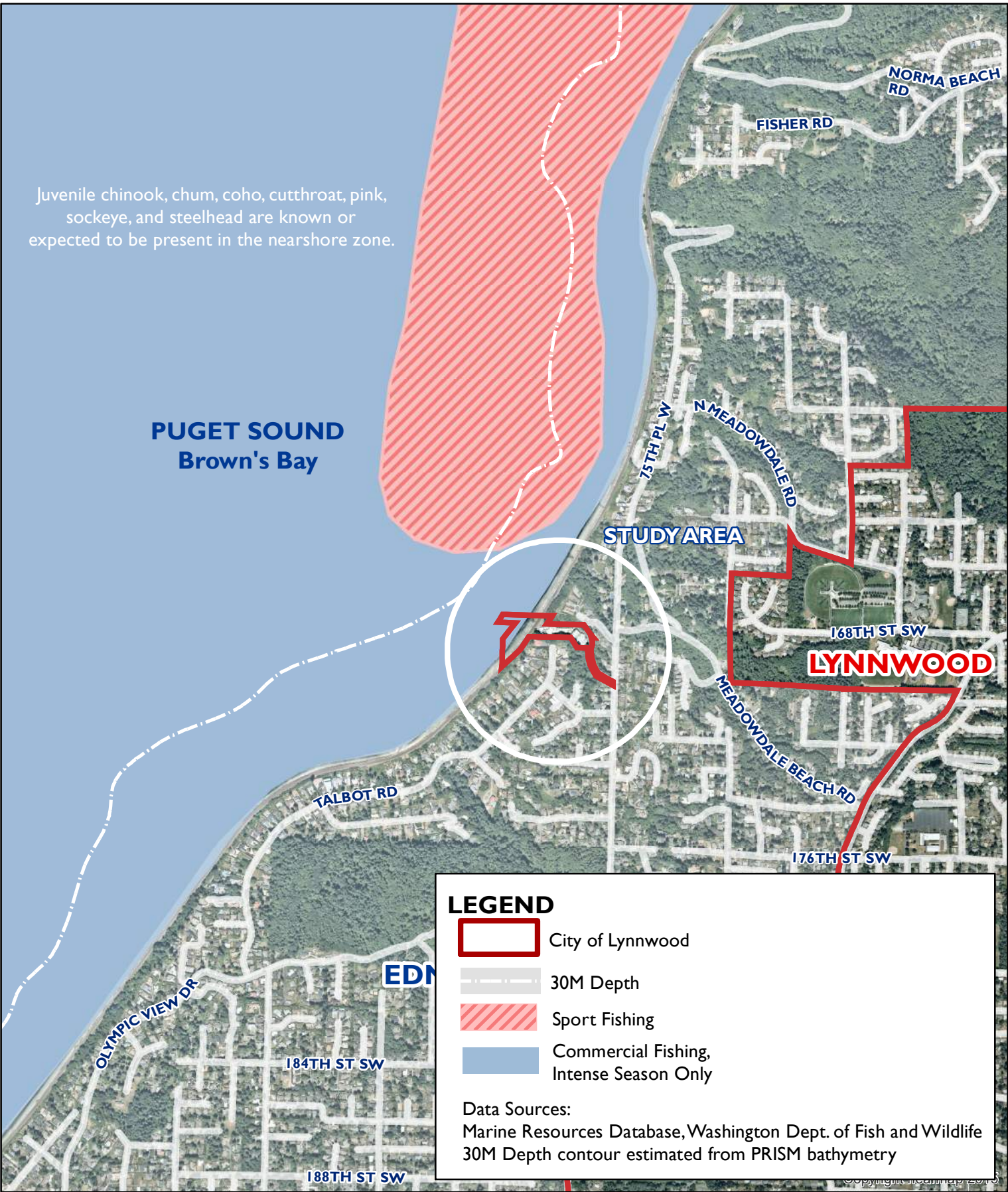
Data Sources:
Marine Resources Database, Washington Dept. of Fish and Wildlife









Juvenile chinook, chum, coho, cutthroat, pink, sockeye, and steelhead are known or expected to be present in the nearshore zone.

PUGET SOUND
Brown's Bay



LEGEND

-  City of Lynnwood
-  30M Depth
-  Sport Fishing
-  Commercial Fishing, Intense Season Only

Data Sources:
 Marine Resources Database, Washington Dept. of Fish and Wildlife
 30M Depth contour estimated from PRISM bathymetry

H-1: Aerial photograph (south of site) looking east, 2016.



H-2: Aerial photograph (at site) looking southwest, 2018.



H-3: Aerial photograph (at site) looking west, 2018.



H-4: Aerial photograph (at site) looking west, 2018.



H-5: Aerial photograph (at site) looking north, 2018.



H-6: View of railroad tracks looking south, 2018.



H-7: View of railroad tracks looking north, 2018.



H-8: View of shoreline looking south, 2018.



H-9: View of shoreline looking north, 2018.



H-10: View of pilings on shoreline, 2018.



H-11: Looking west at shoreline, 2018.



H-12: Historic photo of treatment plant site, circa 1960.



H-13: Historic photo of treatment plant site, circa 1960.



H-14: Historic aerial photo, 1977.



APPENDIX C. SHORELINE INVENTORY, ANALYSIS, AND CHARACTERIZATION

December 14, 2006

1. INTRODUCTION

1.1 PURPOSE AND BACKGROUND

The purpose of this study is to conduct a baseline inventory and assessment of natural and built conditions in the City of Lynnwood's shoreline jurisdiction to provide a basis for preparation of the City's Shoreline Master Program. The findings of the study will provide a framework for establishing the City's shoreline environment designations under the Shoreline Management Act (SMA), and developing the shoreline management policies and regulations specifically suited for land uses and conditions within those environments.

The City has been assisted in the preparation of this study through technical guidance provided by staff of the Washington State Department of Ecology (Ecology) either by direct contact or through use of printed and electronic materials prepared by them. Also, the City received financial assistance in the amount and form of a \$37,800 grant provided by the Washington State Department of Ecology (Ecology). The grant was provided by means of state funding authorized to support planning under the Shoreline Management Act (SMA).

1.2 SHORELINE JURISDICTION

Under the State SMA, the City's shoreline jurisdiction includes areas within the City limits that are 200 feet landward of the Ordinary High Water Mark (OHWM) and waters that have been designated as "shorelines of statewide significance" or "shorelines of the state". The area of the City of Lynnwood located within shoreline jurisdiction is a small part of the city which is not connected to the main body of the city (see Map C-4, Appendix B). It is an area of about four acres located on the Puget Sound shoreline and is the location of the city's wastewater treatment plant. The length of the Lynnwood shoreline at the OHWM is approximately 700 feet. This area of Lynnwood is effectively an enclave within the City of Edmonds. While the Edmonds city limits do not wrap around this Lynnwood territory entirely (with the western boundary of this part of Lynnwood being the Puget Sound), Edmonds does surround this area of Lynnwood on the north, east, and south (see Map A-1, Appendix B). Street access to this part of Lynnwood is through the City of Edmonds. In addition to providing sewage treatment services to most of Lynnwood, the wastewater treatment plant also provides sewage treatment services to the area of the City of Edmonds surrounding the plant. The entrance to the treatment plant site is west of 76th Street SW at about 168th Street SW.

Additionally, there are two areas within the City's adopted Urban Growth Area (UGA) which are shoreline jurisdictional areas. These areas are currently under Snohomish County shoreline jurisdiction, but would be under City of Lynnwood jurisdiction if annexed. One of these areas is the Meadowdale Park

45 area located along the Puget Sound shoreline approximately one mile north of the City's wastewater
46 treatment plant. The other area is the western shoreline of Martha Lake which is northeast of the current
47 city limits.

48
49 The potential for inclusion of the Meadowdale Park area in the incorporated limits of Lynnwood is not
50 deemed to be likely. The recent actions of the City Council in responding to requests for annexation
51 indicate that there is little interest in adding more territory to the city unless there is a significant positive
52 tax revenue advantage to the city. This area offers no such advantage.

53
54 The potential for inclusion of the Martha Lake area in the incorporated limits of Lynnwood is more likely
55 than the Meadowdale Park area because the potential for net revenue enhancement does exist in this area.
56 However, annexation of this area is complicated by the fact that the area is claimed by both Lynnwood
57 and Mill Creek as areas planned for future city annexation. The matter is pending resolution.

58
59 Given the uncertainties of these two UGA areas being included within the City of Lynnwood in the
60 foreseeable future, this inventory and assessment has focused only upon the area under current Lynnwood
61 jurisdiction. Even so, much of the information collected and analyzed for the Lynnwood shoreline is
62 applicable to the Meadowdale Park area. The recently updated Snohomish County SMP inventory
63 provides information for these two UGA areas. Because of the uncertainty of when, if ever, that these two
64 UGA areas will be annexed to the City of Lynnwood and because they are covered within the County
65 SMP the Lynnwood SMP will not cover these two areas. Should either of these areas be annexed to the
66 City of Lynnwood, the City will amend its SMP at that time to provide for policy and regulatory
67 coverage.

68 69 **1.3 METHODS**

70
71 The inventory and analysis was conducted by City of Lynnwood staff, with technical assistance provided
72 by Ecology staff. No consultant assistance was utilized. The inventory was conducted by means of field
73 observations, office visits, telephone and email contacts, and by researching Internet websites.

74
75 The Ecology website provided a large volume of useful material. Other websites found to be particularly
76 helpful were the Washington State Department of Natural Resources, Snohomish County Marine
77 Resources, and King County Department of Natural Resources webpages for the Nearshore
78 Reconnaissance Assessment of the Eastern shore of Central Puget Sound.

79
80 The research process followed these steps. Pertinent SMA regulatory guidance was obtained and studied.
81 Available technical materials, both text and mapped, were obtained and studied. Field observations of the
82 area under Lynnwood shoreline jurisdiction, and adjacent areas, were made and photographs taken.
83 Recent shoreline inventory and assessment examples were obtained and studied for additional guidance.
84 These examples along with the Ecology recommendations on report format and content guided the
85 preparation of the shoreline analysis and assessment report. The Ecology staff comments on the
86 November 2004 draft Lynnwood Shoreline Master Program (SMP) have been particularly helpful in
87 revising and expanding this edition of the draft SMP.

88 **2. REGIONAL OVERVIEW**

89
90 When speaking of a region the area being referred to must be geographically described. There are
91 differing ways of describing the regional context of the small geographic area of the Lynnwood shoreline
92 jurisdiction. This area is only a small part of the whole Puget Sound region. But it is influenced by many
93 of the processes that operate within this larger context. For an understanding of these larger regional
94 processes, Lynnwood staff has utilized a number of documents. Two documents have been particularly

95 helpful in understanding the shoreline and marine resources relevant to the Lynnwood shoreline. The first
96 is a document published in May 2001 for the King County Department of Natural Resources and entitled,
97 *Reconnaissance Assessment of the State of the Nearshore Ecosystem: Eastern Shore of Central Puget*
98 *Sound, including Vashon and Maury Islands*. This report will simply refer to that document as the
99 *Nearshore Reconnaissance Assessment*. The second document of particular assistance was published in
100 September 2001, prepared by John Kerwin of the Washington Conservation Commission and entitled,
101 *Salmon and Steelhead Habitat Limiting Factors Report for the Cedar-Sammamish Basin (Water*
102 *Resources Inventory Area 8)*. This report will simply refer to that document as the *Habitat Limiting*
103 *Factors Report*.

104
105 Although the *Nearshore Reconnaissance Assessment* covers only the central portion of the Puget Sound,
106 and the *Habitat Limiting Factors Report* covers only Watershed Resources Inventory Area 8 (WRIA 8),
107 the Cedar-Sammamish-Lake Washington watershed, the geographic areas covered by those documents
108 are sufficient for the purposes of this report. Within the Central Puget Sound regional context, there are
109 smaller geographic sub units within that region. The next level down in geographic scale, for our
110 purposes, is the watershed basin. So while the Lynnwood shoreline area is within the Central Puget Sound
111 region, it is also located within the Cedar-Sammamish-Lake Washington watershed basin, or WRIA 8.
112 The next level down is the shoreline reach. And, within the reach there are sub-reach areas, and then
113 finally the specific Lynnwood shoreline site area.

114
115 That portion of the Central Puget Sound shoreline belonging to WRIA 8, the Cedar-Sammamish-Lake
116 Washington watershed, runs from Elliot Point (in Mukilteo) on the north to West Point (at the south end
117 of Shilshole Bay) on the south, a distance of 23.5 miles. The Cedar and Sammamish Rivers drain to Lake
118 Washington and from there out to the Puget Sound. Within this drainage basin there is a narrow band of
119 land along the Puget Sound shoreline that contains small streams which drain directly to the Sound. The
120 Lynnwood shoreline jurisdiction is part of this narrow band of land and contains one of those shoreline
121 streams. The stream is not named. Map A3 in Appendix B shows the location of the Puget Sound
122 Drainage Sub-basin within which the Lynnwood shoreline is located.

123
124 The *Nearshore Reconnaissance Assessment* assigns Shoreline Reach Number 1 to the shoreline
125 containing the Lynnwood jurisdiction. This reach of the Puget Sound shoreline starts at Elliot Point in
126 Mukilteo and extends southward to Edwards Point in Edmonds, a distance of 11.5 miles. The two other
127 shoreline reaches within WRIA 8 are: Reach Number 2 running from Edwards Point to Meadow Point
128 (8.5 miles); and, Reach Number 3 running from Meadow Point to West Point (3.5 miles). Brown's Bay is
129 a sub-reach within Reach Number 1 which has a shoreline length of about 1.5 miles. And, as mentioned
130 before, the Lynnwood shoreline is only 700 feet of this Brown's Bay sub-reach.

131 132 **2.1 REGIONAL INFLUENCES**

133
134 The City of Lynnwood is located within the Puget Lowland Ecoregion in Washington State. This
135 ecoregion lies between the Coastal Range and the Cascade Mountains. The area is relatively flat. Soils in
136 the area are composed of alluvial and lacustrine deposits, which are of glacial origin north of Centralia.
137 Because of the rain shadow effect of the mountains bordering this ecoregion to the west, average rainfall
138 is moderate compared to the ecoregions to the east and west. River flows are sustained by streams with
139 headwaters in the adjacent mountains. Peaks flows can occur between fall and spring, depending on snow
140 pack and storm events. Forested areas support dense stands of conifers (western hemlock, Douglas-fir,
141 and western red-cedar) and hardwoods. Much of the land in this region has been converted to urban,
142 industrial, and agricultural uses.

143
144 Shorelines reflect the interactions between the physical and biological characteristics of the regional
145 setting. As a starting point in the investigation and understanding of these interactions, it is helpful to

146 describe the most important regional influences. The following sections will summarize the climate,
147 topography (and geomorphology), and native vegetation of the region to set the context for the major
148 natural influences on the shoreline.

149

150 **2.1.1 CLIMATE**

151

152 Puget Sound has a climate characterized by relatively dry summers and mild wet winters. Climatologists
153 use a climate classification system named the Koeppen-Geiger Climate Classification. Using that
154 classification system, the climate in the Puget Sound is classified as a Mediterranean climate (a Csb code
155 is used to designate the Mediterranean climate). Although not geographically close to the Mediterranean
156 Sea, the Puget Sound shares many of the same climate characteristics with some of the land area
157 surrounding the Mediterranean. Warm moisture-laden air masses from the Pacific Ocean keep air
158 temperatures fairly even throughout the year and provide moderate to heavy rainfall from November
159 through April. The annual precipitation is between 30 to 40 inches in the Central Puget Sound area.

160

161 The Lynnwood shoreline lies within an area which experiences a weather phenomenon known as the
162 Puget Sound Convergence Zone. This zone is a band of cloudiness and precipitation in northern and
163 central Puget Sound formed when winds off the Pacific Ocean are split by the Olympic Mountains, pass
164 both to the north and south of that range, and then collide in this convergence zone. The convergence
165 zone's favorite location tends to be an east-west line that extends over the central and south Snohomish
166 County area (Lynnwood, Edmonds, and Everett are the prime spots). However, the zone can move
167 depending on the strength of each wind component. If one wind component becomes stronger than the
168 other, it will push the location of the zone in the direction of flow of the dominant wind. The zone creates
169 large weather contrasts in Puget Sound, with warm temperatures and clear skies in the sections outside the
170 zone, but low clouds, rain and cooler temperatures within the zone. Although the zone can occur at any
171 time of the year, it seems to have a yearly and a daily cycle. The convergence zone effect is most frequent
172 during the late spring and early summer months, and during the afternoon and early evening.

173

174 **2.1.2 TOPOGRAPHY (AND GEOMORPHOLOGY)**

175

176 The landscape of the Puget Lowland is the product of a long history of mountain building and subsidence,
177 glaciations and volcanism, erosion and deposition. The terrain of the Lowland is made up of a series of
178 rolling plateaus cut by steep-sided valleys. The drift plains slope gently west and northwest from the
179 Cascade Range foothills (approximately 800 feet elevation) to bluffs overlooking Puget Sound. These
180 plateaus are built of unconsolidated sediment deposited during glacial and nonglacial periods in the past
181 two million years. The fill ranges from a thin veneer to a depth of 3,600 feet in the deepest basin. The
182 surface features of the drift plains are mostly inherited from the ice sheet that last flowed over them about
183 13 to 16 thousand years ago. These features are elongated hills (drumlins) which are arranged in the
184 direction of ice flow; and, marshes and lakes formed in closed depressions between the hills and within
185 late-glacial outwash channels.

186

187 Several large valleys cross the lowlands. The longest and deepest is the Puget Sound. The other valleys
188 are the Lake Washington-Duwamish-Puyallup, Sammamish, and Snoqualmie troughs. All these valleys
189 trend roughly north-south, likely through pre-existing valleys. They are mostly infilled by drift from the
190 most recent glaciation. The trough shapes reflect the direction of ice flow or sub-glacial rivers in the
191 bottom of the continental glacier. In contrast, canyons of the Cedar, Green, and White Rivers were
192 excavated by streams flowing from the retreating ice sheet and down from the Cascades. The two types of
193 large valleys have largely controlled postglacial drainage in the lowlands. The rivers flow in them to the
194 large lakes and Puget Sound, and small streams flow to them carving innumerable ravines in the edges of
195 the plateaus.

196

197 The upland topography along the shoreline within Reach Number 1 varies considerably. Along much of
198 the shoreline in this reach, there is only a narrow margin of flat land next to the Sound. For the most part,
199 bluffs of at least 100 feet in elevation, with heights of 300 feet not being unusual, characterize this area.
200 However, there are exceptions to this general rule. The area in Edmonds, locally called the Edmonds
201 Bowl, is one of the exceptions. This area is characterized by a gentle slope upland from the Sound. The
202 Lynnwood shoreline follows the general rule of a narrow margin of flat land with a backdrop of steep
203 bluff. North-south ridges and valleys characterize the uplands above the Edmonds-Lynnwood shoreline.
204 The elevations of the ridges range in maximum height from 400 feet to over 600 feet.

205 **2.1.3 NATIVE VEGETATION**

206 Primary plant succession began after the glaciers receded and developed into the climax plant community
207 that greeted early explorers and sustained indigenous native people. Only remnants of those forests
208 remain. However, in the lowlands around Puget Sound Douglas-fir trees remain the most important
209 species of this zone. Western Red cedar and Western Hemlock are found mixed in with Douglas-fir.
210 Bigleaf Maple is found on moist sites. Madrone is common along the shoreline and on drained, sunny
211 slopes. Red Alder is common after logging disturbance on moist sites. Understory plant communities
212 include: Sword fern, Salal, Oregon grape, Three-leaved Foamflower, Evergreen blueberry, and Pacific
213 Rhododendron.

214 Poorly drained sites with swamp or bog (wetlands) communities are abundant in this zone. Wooded
215 riparian communities are usually dominated by Black cottonwood, Bigleaf Maple, and Red Alder.
216 Shorelines are often lined with a thin band of Madrone. Coastal bluffs often support Madrone or Douglas-
217 fir/Madrone stands. Introduced plants include numerous species of blackberry, Scotch Broom, and non-
218 native hardwoods.

219 **2.2 CRITICAL ISSUES**

220 This section identifies already known critical issues for the watershed region. Identification of these
221 issues helps to focus the scope of the inventory and assessment. These issues will be listed in two
222 categories: regulatory mandates, and major land uses that affect the shoreline.

223 **2.2.1 REGULATORY MANDATES**

224 Regulatory mandates from both the federal government and state government are critical issues that must
225 be taken into account in any planning effort within the watershed region and specifically for the
226 Lynnwood shoreline. The most recent and significant federal mandate involves the listing by the National
227 Marine Fisheries Service (NMFS) of two species of fish as “threatened” under the Endangered Species
228 Act. The Chinook Salmon and Bull Trout are the two fish species having a threatened status within the
229 watershed region. Other significant federal mandates that must be dealt with involve pollution control
230 standards for wastewater and stormwater.

231 The most significant state mandates affecting planning for the watershed region and the shoreline
232 continue to be the Growth Management Act (GMA) and the Shoreline Management Act (SMA). The
233 requirements for protection of critical areas within GMA are particularly relevant to shoreline planning
234 and protection. And, the requirements within GMA for increasing urban density are particularly
235 challenging to do so without increasing environmental harm.

236 **2.2.2 MAJOR LAND USES**

246

247 One of the most significant land uses affecting the shoreline in the watershed region, and especially
248 within the Reach Number 1, is the location of the Burlington Northern Santa Fe railroad along the
249 shoreline. This transportation facility has permanently altered ecosystem functioning within this shoreline
250 reach. The railroad track bed is built on rock fill that effectively functions as a seawall revetment. Native
251 vegetation and wildlife habitat has been removed within this corridor, and wildlife access to remaining
252 habitat has been altered. And, the supply of sediment and woody debris to the beach and shoreline has
253 effectively been stopped.

254
255 The use of the ravine in which it is situated by the Lynnwood wastewater treatment plant is also a
256 significant regional land use. The plant sits on top of a former natural stream. The stream is channeled
257 through a pipe in the lower one-third of the stream length.

258
259 There are other major land uses within this shoreline reach that have had, or may yet have, a significant
260 impact on the functioning of the natural processes of the shoreline. The ferry terminal at Edmonds
261 appears to interrupt normal northerly littoral cell drift at that point. The wastewater outfalls from the
262 Lynnwood and Edmonds wastewater treatment plants have a potential for impacting the shoreline, as does
263 the yet to be built outfall for King County's Brightwater wastewater treatment plant. The commercial
264 development of the Edmonds waterfront has had an impact on the shoreline.

265 266 **2.3 CURRENT REGULATORY FRAMEWORK SUMMARY**

267
268 This section briefly summarizes the framework of local, state, and federal regulations applying to the area
269 of shoreline jurisdiction.

270 271 **2.3.1 CITY OF LYNNWOOD COMPREHENSIVE PLAN**

272
273 The area of shoreline jurisdiction has a Public Facilities designation on the Land Use Plan map in the City
274 of Lynnwood Comprehensive Plan. The Land Use Plan map provides the general guidance on future land
275 use pattern and is implemented by the Official Zoning Map.

276 277 **2.3.2 CITY OF LYNNWOOD ZONING CODE**

278
279 The area of shoreline jurisdiction has a P-1 Zone designation on the Official Zoning Map of the City of
280 Lynnwood. The zoning code provides for the basic regulation of land uses and is supplemented by the
281 policies and regulations contained in the Shoreline Master Program (SMP). Where there is inconsistency
282 or conflict between the two sets of regulations, the SMP is the primary regulation.

283 284 **2.3.3 CITY OF LYNNWOOD ENVIRONMENTALLY CRITICAL AREAS CODE**

285
286 Environmentally critical areas in Lynnwood are regulated under Lynnwood Municipal Code Chapter
287 17.10. The only known environmentally critical areas within shoreline jurisdiction are the steep slopes of
288 the Puget Sound bluff and the ravine. These areas are covered by the regulations contained in LMC 17.10.
289 The environmentally critical areas regulations have been recently reviewed and updated to conform to
290 state laws and rules.

291 292 **2.3.4 STATE AND FEDERAL REGULATIONS**

293
294 Development in or above marine environments generally requires permits from federal and state agencies.
295 Permits are usually required when impacts to navigable waters or fish and wildlife habitat are anticipated.
296 The U.S. Army Corps of Engineers (USACE), Ecology, and the Washington State Department of Fish
297 and Wildlife (WDFW) regulate development activities waterward of MHHW for tidal waters. In addition,

298 the National Oceanic and Atmospheric Administration (NOAA Fisheries) and U.S. Fish and Wildlife
299 Service (USFWS) must concur that any project requiring federal approvals (a USACE permit, for
300 example) is consistent with the Endangered Species Act (ESA). These agencies will require that proposed
301 projects avoid or offset project impacts on certain fish and wildlife species through design and/or
302 environmental controls and/or restoration activities.
303

304 **3. REACH-LEVEL ANALYSIS**

305
306 The previous sections have focused primarily on the larger regional scale. The information presented in
307 those sections should provide sufficient context for a more intensive look at physical, biological, and land
308 use information at smaller scales. Our primary focus in the following sections will be on a reach-level
309 scale. However, in some instances the focus of the report will be at an even smaller scale: the City of
310 Lynnwood shoreline. (**Note:** In most other shoreline management planning projects, the reach scale would
311 be smaller than the shoreline jurisdiction. In Lynnwood, because of the limited length of shoreline
312 jurisdiction, the entire shoreline jurisdiction is contained within and is only a small part of a single reach.
313 That reach is Reach Number 1.)
314

315 There are two primary objectives to be achieved by this reach-level analysis. First, to summarize critical
316 physical and biological resources and land use for the shoreline reach. Second, to identify key
317 opportunities for protection, restoration, public access, and use.
318

319 The following sections of this report draw heavily from the *Nearshore Reconnaissance Assessment*, and
320 the *Habitat Limiting Factors Report*. For more detail on any of the topics covered, the reader is directed
321 to these important sources. We are indebted to those who produced these groundbreaking documents.
322

323 **3.1 CRITICAL PHYSICAL AND BIOLOGICAL RESOURCES AND LAND USE**

324
325 This section makes use of and refers to maps and other graphic materials contained in Appendix B, the
326 Presentation Map Portfolio. The general geographic frame of reference is shoreline Reach Number 1,
327 which extends from Elliot Point in Mukilteo to Edwards Point in Edmonds. However, in certain instances,
328 the geographic scale used in the summary may be larger or smaller depending upon the issue and
329 availability of information.
330

331 **3.1.1 SUMMARY OF CRITICAL PHYSICAL RESOURCES**

332
333 Section 2 of this report has given a regional overview on the subjects of climate, topography (and
334 geomorphology), and vegetation. In this section, some of the same subjects are covered for a smaller area
335 and other subjects are added. The maps in Appendix B which are pertinent to this summary are: B8,
336 Shoreline Type; B9, Drift Cells; C1, Sensitive Areas; C2, Geologically Hazardous Areas; C3, Frequently
337 Flooded Areas; C5, Sensitive Areas Wetlands and Riparian Corridors; C6, Existing Drainage System; C7,
338 Seasonal High Water Table; C8, Soils Classification; C9a, Bathymetry and Topography; C9b, Percent
339 Slope; C11, Slope Stability; and, C13, Bathymetry and Topography.
340

341 The shoreline within Lynnwood jurisdiction is classified as a narrow sand and gravel beach. On either
342 side of the ravine in which the Lynnwood wastewater treatment plant is located, there are Puget Sound
343 coastal bluffs. Were it not for the location of the BNSF railroad along this reach of shoreline the shoreline
344 type would be classified as Eroding Bluff. Wave action no longer works on the toe of the bluff so erosion
345 and deposition have virtually stopped. The shoreline drift in this area is from south to north. Within the
346 shoreline jurisdiction the area is not subject to frequent flooding, there are no existing wetlands, and the
347 seasonal high water table is in the range of one to three feet in depth. The soils are Alderwood-Everett

348 gravelly sandy loams with 25 to 70 percent slopes. Slope stability mapping indicates no severe problems
349 in the jurisdiction.

350

351 **3.1.2 SUMMARY OF CRITICAL BIOLOGICAL RESOURCES**

352

353 The maps in Appendix B which are pertinent to this summary are: B6, Eelgrass and Spartina; B10,
354 Eelgrass/Kelp; B11a, Sonar Survey Vegetation Type; B11b, Sonar Survey Substrate and Vegetation; B12,
355 Fucus and Ulva; C10, Selected Fish Species; C12, Crab Distribution; C14, Forage Fish; C15a,
356 Invertebrates; C15b, Geoduck; and, C16, Salmonid Use of the Nearshore Environment.

357

358 Eelgrass is a particularly important plant in the nearshore marine environment. Its productivity exceeds
359 that of most other aquatic plants. Organic carbon produced by eelgrass is especially important in driving
360 the nearshore marine food web of Puget Sound. The existence and health of eelgrass within the Brown's
361 Bay nearshore is not consistently reported. Map B6 indicates no eelgrass in Brown's Bay, with patchy
362 eelgrass starting north of the Bay. The sonar mapping of Map B11b indicates that there is eelgrass within
363 Brown's Bay. The *Habitat Limiting Factors Report* states that Brown's Bay is absent eelgrass, absent bull
364 kelp, has patchy rockweed, has patchy sea lettuce, and is not identified as a forage fish-spawning beach.
365 The inconsistency on eelgrass deserves a more detailed survey to determine both the current existence of
366 eelgrass and any limiting factors for propagation.

367

368 There are several anadromous fish streams within the Puget Sound drainage sub-basin. Lund's Gulch
369 Creek to the north of the Lynnwood shoreline jurisdiction, and Perrinville Creek to the south are
370 anadromous fish streams. Both of these streams support Coho Salmon and Cutthroat Trout. Lund's Gulch
371 Creek also supports Steelhead Trout. The small stream running through the Lynnwood ravine is
372 unmapped and unnamed. It is unlikely, given the long piped nature of the lower part of the stream, that
373 the stream is home to anadromous fish. Map C16 indicates that the nearshore marine environment of
374 Brown's Bay and all of Reach 1 is used by salmonids. Any steps that can be taken to improve the health
375 of the nearshore marine environment will be beneficial to the salmonid fish.

376

377 **3.1.3 SUMMARY OF CRITICAL LAND USE**

378

379 The maps in Appendix B which are pertinent to this summary are: B1, Shoreline and Adjacent Land Use
380 Patterns; B2, City of Edmonds Zoning Map; B3, Existing Structures; B4, Pervious Surface; B5, Sewer
381 Lines; B7, Shoreline Modifications; C8x, Generalized Land Use; and, D1, Photo of Pilings.

382

383 The area within Lynnwood shoreline jurisdiction is considered to be fully developed for urban uses. This
384 is true of most of the Brown's Bay area. No significant changes to land use in the Lynnwood shoreline
385 jurisdiction or the immediate Brown's Bay area are anticipated.

386

387 **3.2 ECOLOGICAL FUNCTIONS AND ECO-SYSTEM WIDE PROCESSES**

388

389 The ecosystem of the Puget Sound drainage sub-basin is the ecosystem of most significance to the
390 Lynnwood Shoreline Master Program. More particularly, it is that portion of the sub-basin containing
391 Brown's Bay, the central part of the sub-basin, that is most significant to understanding the ecological
392 functions most pertinent to SMP preparation.

393

394 The Puget Sound drainage sub-basin is part of the Cedar-Sammamish-Lake Washington watershed
395 (WRIA 8). However, there is no freshwater hydrological connection between the sub-basin and the rest of
396 the watershed. The only hydrological connection that exists is Puget Sound.

397

398 Nine streams within Reach 1 provide habitat for anadromous fish. Several of the other streams may have

399 potential for restoration of habitat that would allow anadromous fish to return to those streams. The health
400 of the anadromous fish population in this small ecosystem is an indicator of the general health of the
401 ecosystem. And, in general, the health of this ecosystem is only fair. Urbanization has taken a toll on the
402 natural environment.

403
404 The single largest disruptor of ecological functions within the Reach 1 ecosystem is the location of the
405 BNSF railroad along the shoreline, and the manner in which it is constructed. The railroad has
406 permanently removed shoreline habitat, virtually eliminated the source of large woody debris and source
407 material for beach replenishment, and continues to restrict animal access between the beach and the
408 upland. Any steps to restore lost ecological functions would need to attempt to mimic replacement of the
409 lost natural processes.

410
411 The location of the Lynnwood wastewater treatment plant is itself a disruptor of ecological functions. The
412 lower portion of the unnamed stream that drains the ravine within which the plant is located is contained
413 within a drainage pipe. This situation causes loss of ecological function. This small drainage basin is
414 completely urbanized. Development density is typical of low-density suburban residential development.
415 With the exception of the wastewater treatment plant the land use pattern is exclusively single-family
416 residential.

417 418 **3.3 DATA GAPS**

419 420 **Axioms of Knowledge**

421
422 *”As we know, there are known knowns. There are things we know we know. We also know there are*
423 *known unknowns. That is to say we know there are some things we do not know. But there are also*
424 *unknown unknowns, the ones we don’t know we don’t know.”*

425 Donald H. Rumsfeld, Secretary of Defense, February 12, 2002
426

427 Previous sections of the report have presented what we know about the Lynnwood shoreline area. This
428 section of the report will touch on and list some of the discovered “known unknowns”, or data gaps. The
429 third Rumsfeld axiom covers a category of “unknowledge” beyond the scope of the SMP guidelines...and
430 most likely beyond the capacity of humankind to know.

431
432 The *Habitat Limiting Factors Report* contains an extensive listing of data gaps. What we know we do not
433 know appears to exceed what we know about the nearshore environment of the central Puget Sound. The
434 listing of data gaps is so extensive it is beyond the scope of this report to fully reproduce that information.
435 The reader of this report is referred to the *Habitat Limiting Factors Report* for the detailed listing of data
436 gaps. It should be sufficient for this report to summarize and highlight the more significant data gaps.

437
438 Data gaps specific to the streams of WRIA 8 draining directly to Puget Sound are these:

- 439
- 440 • *Data on water quality, hydrology, floodplain connectivity, large woody debris, sediments, and*
441 *riparian conditions and their impacts to salmonids in these streams is scarce or lacking.*
 - 442 • *Fish passage barriers have not been fully inventoried.*
 - 443 • *The level and extent of chemical contamination and increases in nutrient loading have not been*
444 *ascertained.*
- 445

446 Conclusions on the whole nearshore marine habitats of WRIA 8, including data gaps, are summarized as:
447

- 448 • *The nearshore ecosystem plays a critical role in support of a wide variety of biological resources,*
449 *many of which are important to the people of the region for commercial, recreational, cultural,*
450 *aesthetic, and other social values.*
- 451 • *The viability of the nearshore system processes that support these resources has been damaged*
452 *and continues to be threatened by a wide variety of human-induced changes.*
- 453 • *The cumulative effects of multiple stressors, or individual stressors over various temporal and*
454 *spatial scales, on the nearshore system are unstudied in a systematic way.*
- 455 • *The interactive effect of human-caused changes and natural variability on processes and*
456 *resources has not been studied.*
- 457 • *Monitoring the performance of restored systems and baseline studies in reference areas are*
458 *critical to the development of appropriate restoration strategies.*
- 459 • *There are numerous data gaps in our understanding of the nearshore ecosystem that directly*
460 *inhibit or weaken our ability to make informed decisions regarding management and restoration*
461 *of the system. Monitoring programs are limited and have been inadequate for providing the level*
462 *of scientific information necessary for informed resource management decisions.*
- 463 • *There is a general lack of coordination in the collection, analysis, and dissemination of*
464 *nearshore data.*
- 465 • *The nearshore system of Puget Sound needs more focused attention with funded research.*
- 466 • *The nearshore must be addressed from an ecosystem perspective.*
- 467 • *Action is needed in the nearshore.*
- 468 • *Particular attention and protective standards need to focus on communities, populations, or other*
469 *elements of the ecosystem that require special attention.*

470
471 Data gaps specific to the Lynnwood shoreline jurisdiction are the following.

- 472 • Regarding the stream that flows through the ravine there is no information on the flow, the water
473 quality, sedimentation, aquatic life, land area drained, or riparian assessment of the upper reach.
- 474 • Regarding the beach there is no real knowledge about what impacts the loss of bluff materials has
475 had on the ecosystem, and no knowledge of the changed composition or shape of the beach over
476 time.
- 477 • Regarding the railroad hardening of the shoreline we have no real assessment of impact on the
478 ecosystem. Regarding the marine environment there is only limited information.

480
481
482
483
484
485 **3.4 KEY OPPORTUNITIES FOR PROTECTION, RESTORATION, PUBLIC ACCESS, AND**
486 **USE**

487
488 The previous sections on critical physical and biological resources, and land use establish the basis for
489 making observations about key opportunities for protection, restoration, public access, and use. Such
490 opportunities are limited. So, the following sections will be brief.

491
492 **3.4.1 KEY OPPORTUNITIES FOR PROTECTION**

493
494 The key opportunities for protection of Lynnwood shoreline resources are to adopt appropriately
495 restrictive environment designations, limit the allowable uses within the designations, and adopt policies
496 and regulations that will allow appropriate use but prevent harm to the resources. A specific opportunity
497 for protection is to maintain the current riparian habitat that exists on the site. Lynnwood can continue

498 contributing to the overall health of the ecosystem of Browns Bay by continuing its acquisition of land
499 within the Lund’s Creek watershed.

500

501 **3.4.2 KEY OPPORTUNITIES FOR RESTORATION**

502

503 Opportunities for restoration are several. Within the marine environment eelgrass could be planted to
504 enhance fish habitat. Enhancement of eelgrass growth would best be done within the entire Brown’s Bay
505 area which would require a coordination and cooperation with the City of Edmonds. Within the tidelands
506 and on the beach the old pilings (located on private property) could be removed. And, the stormwater
507 runoff from the impervious surfaces of the wastewater treatment plant site could be subjected to detention
508 and treatment. Within the Lund’s Creek watershed, there may be restoration projects on Lund’s Creek
509 that Lynnwood may be able to initiate.

510

511 **3.4.3 KEY OPPORTUNITIES FOR PUBLIC ACCESS**

512

513 The opportunities for creating physical public access to the Lynnwood shoreline within Lynnwood’s
514 current shoreline jurisdiction are limited. The wastewater treatment plant site is enclosed within security
515 fencing and no public access is allowed into the plant site. Public access is prohibited due to the need to
516 protect the public from contact with hazardous materials and to protect the plant from harm. Hazardous
517 materials are used and stored in the plant. The most likely new public access point would start on property
518 just north of the plant (within the City of Edmonds) and after crossing the railroad tracks would end on
519 Lynnwood jurisdiction beach. Such a crossing would require BNSF permission and is unlikely to be
520 received. A pedestrian bridge over the railroad tracks, or an underpass, could be proposed to alleviate the
521 pedestrian safety issue. Creating pedestrian access at this site and using a pedestrian bridge (or underpass)
522 would be expensive. It would likely serve only the local area residents, as there is no room to provide for
523 public parking.

524

525 Visual access (water view) to the waters of Puget Sound in the area of the Lynnwood shoreline has been
526 created by removal of vegetation necessary for construction of the wastewater treatment plant. No future
527 construction of facilities at the site will obstruct existing public visual access. There may be some
528 possibilities for increasing visual public access through selective pruning of trees on the north and south
529 slopes of the ravine within which the treatment plant is located. Such selective pruning would only be
530 allowed if it contributed to, or did not diminish, the health of the trees; and that it did not increase the
531 likelihood of slope failure.

532

533 **3.4.4 KEY OPPORTUNITIES FOR USE**

534

535 No changes in use of the land and water under current Lynnwood shoreline jurisdiction are anticipated.
536 The area is considered to be fully and appropriately utilized.

537

538 **4. SUMMARY OF FINDINGS, CONCLUSIONS, AND**
539 **RECOMMENDATIONS**

540

541 This section presents a summary of the key findings of the Shoreline Inventory, Analysis, and
542 Characterization report, conclusions, and the recommendations for planning decisions and other following
543 actions.

544

545

546

547 **4.1 SUMMARY OF KEY FINDINGS**
548

- 549 • The location of the Burlington Northern Santa Fe (BNSF) railroad along the Lynnwood shoreline
550 has permanently altered the local environment. The alteration has resulted in: removal of a band
551 of native vegetation and wildlife habitat which cannot be replaced, changing the natural stream
552 outlet to the beach possibly causing a restriction of transport of source materials to the beach, and
553 permanently limiting pedestrian access to the beach at this location.
554
- 555 • The location of the Lynnwood wastewater treatment plant within the small coastal ravine has
556 permanently altered the local environment. The alteration has resulted in: probable removal of
557 wetlands associated with that portion of the small stream which is now piped around and under
558 the plant, and removal of native vegetation and wildlife habitat.
559
- 560 • The littoral cell drift in the majority this reach, including the Lynnwood shoreline, is to the north.
561 The status of the Lynnwood beach regarding loss of material is not known. This is a data gap.
562
- 563 • There is evidence of an old dock on the Lynnwood beach. There are about fifty old pilings in
564 place. They are quite worn and protrude only about one foot above the rocky beach. A possible
565 beach restoration action, which could be taken, would be to remove the old pilings. The pilings
566 are located on private property. Further investigation of this action is warranted.
567
- 568 • There are six land parcels in private ownership in the Lynnwood shoreline jurisdiction (excluding
569 the BNSF land). These are in the tideland area. They are in most cases remnant parcels of the
570 upland parent parcels created by truncation when the BNSF right-of-way was acquired. The six
571 private land parcels are tidelands and have limited, or no, potential for developed uses.
572
- 573 • The land uses within the Lynnwood shoreline jurisdiction are well established and stable. There
574 appears to be no opportunity for further development.
575
- 576 • The BNSF railroad is an active mainline transportation corridor that will remain in use for the
577 foreseeable future.
578
- 579 • The Lynnwood wastewater treatment plant has a useful life that extends into the foreseeable
580 future.
581
- 582 • The SMA goal of increasing physical public access would be extremely difficult and expensive to
583 achieve at the Lynnwood site. The Lynnwood wastewater treatment plant occupies the entire
584 width of the ravine in which it is situated. The plant site is fenced and access is restricted for
585 reasons of public safety. It is deemed not to be practical to pursue the goal of increasing public
586 access to the shoreline through city property in the Lynnwood SMP. There are better alternative
587 sites to provide physical access. The Lynnwood beach is still open and available for public use to
588 those who access it by land from the north or south, or by water.
589
- 590 • There may be an opportunity to enhance eelgrass off the Lynnwood shoreline. The *Nearshore*
591 *Reconnaissance Assessment* indicates that eelgrass in this area is at best patchy. More
592 investigation on this possible opportunity is warranted. This is a data gap.
593
- 594 • A wetlands assessment has not been done for the upper reaches of the stream that runs through
595 the Lynnwood WWTP site. In fact, the critical areas assessment and mapping does not include

596 this area. This is a data gap.

597

598 • The *Nearshore Reconnaissance Assessment* and the *Habitat Limiting Factors Report* contain an
599 extensive listing of data gaps, so much so that it is impractical to repeat the material here. The
600 reader is referred to those documents for the information.

601

602 • Given that no changes in land or water use are anticipated within the Lynnwood shoreline
603 jurisdiction, there should be no net loss of biological resource value.

604

605 • The stormwater runoff from the impervious surfaces of the treatment plant site appears not to
606 have detention and treatment.

607

608 • The potential for inclusion of the Meadowdale Park area in the incorporated limits of Lynnwood
609 is not deemed to be likely. The recent actions of the City Council in responding to requests for
610 annexation show that there is little interest in adding more territory to the city unless there is a
611 significant positive revenue advantage to the city. This area offers no such advantage.

612

613 • The potential for inclusion of the Martha Lake area in the incorporated limits of Lynnwood is
614 more likely than the Meadowdale Park area because the potential for net revenue enhancement
615 does exist in this area. However, annexation of this area is complicated by the fact that the area is
616 claimed by both Lynnwood and Mill Creek as areas planned for future city annexation. The
617 matter is pending resolution.

618

619 **4.2 CONCLUSIONS**

620

621 The inventory, analysis, and characterization conducted by the City provide a sufficient knowledge base
622 to proceed with the planning and regulatory process and complete the Shoreline Master Program. The
623 subject area of the SMP is geographically small with a limited range of land uses, and with no expectation
624 of land use change throughout the planning time horizon. While data gaps have been identified, and it
625 would be particularly useful to have that additional information in preparation and refinement of a
626 restoration program, lack of that information is not essential to the selection of environment designations.
627 More information in the future can be used to refine the policies and regulations that result from the
628 current effort to prepare and adopt the best SMP that can be done with the currently available information.
629 The City staff believes it has done all that is necessary under the state law and rules to inventory and
630 analyze available pertinent information.

631

632 **4.3 SUMMARY OF RECOMMENDATIONS**

633

634 • Utilize two environment designations within the area of current Lynnwood shoreline jurisdiction.
635 The Aquatic designation should be applied to all the tidelands below the Ordinary High Water
636 Mark (OHWM). This includes properties that are in City of Lynnwood ownership and private
637 ownership. The High-Intensity designation should be applied to all the remaining shoreland. This
638 includes the Burlington Northern Santa Fe (BNSF) railroad land and the City of Lynnwood
639 owned property on which the wastewater treatment plant is located.

640

641 • If the Meadowdale Park area should ever be annexed into the City of Lynnwood, three
642 environment designations should be applied in that area. All of the tidelands, up to the OHWM,
643 should be given the Aquatic designation. All of the BNSF right-of-way should be given the High
644 Intensity designation. And the remaining parkland, up to 200 feet landward of the OHWM,
645 should be given the Urban Conservancy designation. These are the designations used in the

- 646 Snohomish County Shoreline Master Program.
647
648 • If the Martha Lake area (most likely to be limited to the western shoreline) should ever be
649 annexed into the City of Lynnwood, two environment designations should be applied in that area.
650 The waters and submerged lands within Lynnwood shoreline jurisdiction should be given the
651 Aquatic designation. The lakeshore and landward for 200 feet should be given the Shoreline
652 Residential designation. These are the designations used in the Snohomish County Shoreline
653 Master Program.
654
655 • Prepare and adopt use tables for the environment designations that allow for continuation of
656 existing uses with the only other uses being for enhanced enjoyment of the shoreline resources.
657
658 • Prepare and adopt shoreline management policies which will protect the shoreline resources.
659
660 • Fill in the data gaps as time and resources are available. The data gaps identified in the *Nearshore*
661 *Reconnaissance Assessment Report* and the *Salmon and Steelhead Habitat Limiting Factors*
662 *Report* go well beyond the geographic area of Lynnwood’s jurisdiction. Filling those data gaps is
663 beyond the capacity of the City of Lynnwood. However, the City can and should participate in
664 some way to assure that the data gaps are filled.
665
666 • Take action on the possible restoration projects. Retain the appropriate technical consultation on
667 shoreline and marine resources and assess the benefits and costs of two projects: beach restoration
668 by removal of old pilings, and marine vegetation restoration by planting of eelgrass. If there is a
669 net benefit to each project, prepare and implement a plan for each restoration project.
670
671 • Investigate the costs and benefits of providing stormwater detention and treatment at the
672 wastewater treatment plant site.
673

674 **5. REFERENCES**

675 **5.1 PUBLISHED AND UNPUBLISHED DOCUMENTS**

- 676 “Reconnaissance Assessment of the State of the Nearshore Ecosystem: Eastern Shore of Central Puget
677 Sound, Including Vashon and Maury Islands”, May 2001, King County Department of Natural Resources,
678 Seattle, Washington.
681
682 “Salmon and Steelhead Habitat Limiting Factors Report for the Cedar-Sammamish Basin (Water
683 Resource Inventory Area 8)”, prepared by John Kerwin, Washington Conservation Commission,
684 Olympia, Washington, September 2001.
685
686 “Regional Nearshore and Marine Aspects of Salmon Recovery in Puget Sound”, Compiled and edited by
687 Scott Redman, Doug Myers, and Dan Averill, Puget Sound Action Team; from contributions by the
688 editors and Kurt Fresh and Bill Graeber, NOAA Fisheries; delivered to Shared Strategy for Puget Sound
689 for inclusion in their regional salmon recovery plan, June 28, 2005.
690
691 “Edmonds Drainage Basin Studies, Edmonds Way, Perrinville, and Meadowdale Basins”, May 1991,
692 R.W. Beck and Associates.
693

694 “Draft Environmental Impact Statement on Alternatives for Sustainable Forest Management of State
695 Trust Lands in Western Washington”, November 2003, Washington Department of Natural Resources.
696
697 “Characterization of the Georgia Basin/Puget Sound Airshed”, 2004, Environment Canada and U.S.
698 Environmental Protection Agency.
699
700 “The Loss of Habitat in Puget Sound”, 1997, People for Puget Sound, J. White.
701
702 “Eelgrass in Puget Sound – A New Study of Flow, Sediment Transport, and Zostera Marina”, Sounds
703 Waves, Volume FY 2004, Issue No. 65, September 2004, U.S. Geological Survey.
704
705 “The Natural History of Puget Sound Country”, 1991, University of Washington Press, Arthur R.
706 Kruckeberg.
707
708 “Final Environmental Impact Statement for Wastewater Treatment Facilities C530688 City of Lynnwood
709 and Alderwood Water District, Snohomish County, Washington”, July 1978, U.S. Environmental
710 Protection Agency and Straam Engineers, Inc.
711
712 “Addendum to Environmental Impact Statement for Wastewater Treatment Facilities”, December 1987,
713 Gray and Osborne, Inc.
714
715 “City of Lynnwood Environmental Checklist: 02ERC0005”, February 8, 2002, John C. Ewell, III.
716
717 “Draft Sediment Baseline Study Plan: City of Lynnwood Effluent Outfall”, June 23, 1994, Sanders and
718 Associates.
719
720 “Draft Edmonds Stream Inventory and Assessment #1213014 – Prepared for the City of Edmonds,
721 Washington”, March 21, 2002, Pentec Environmental.
722
723 “Edmonds Shoreline Habitat Assessment #1213012 – Prepared for the City of Edmonds, Washington,
724 October 31, 2001, Pentec Environmental.
725
726 “Soil Survey of Snohomish County Area Washington”, July 1983, U.S. Department of Agriculture.
727
728 “Combined bathymetry and topography of the Puget Lowland, Washington State”, Finlayson D.P. (2005),
729 University of Washington, (<http://www.ocean.washington.edu/data/pugetsound/>)
730
731 “Forest Practices Fish Habitat Water Type Map (Hydrology)” Washington State Department of Natural
732 Resources, Geographic Information System. <http://www3.wadnr.gov/dnrapp6/dataweb/hydrod.html>
733
734 “GeoData Distribution Catalog, 1:24000 Scale Base Map Data”, Washington State Department of
735 Transportation, (<http://www.wsdot.wa.gov/mapsdata/GeoDataCatalog/default.htm> - trans)
736
737 “Snohomish County Drainage Basins”, Snohomish County Department of Planning and Development
738 Services, unpublished data
739
740 “Current Property Tax Parcels Shape File”, Snohomish County Assessor's Office.
741 (<ftp://ftp.co.snohomish.wa.us/Assessor/shapefiles/>)
742
743 “Municipal Boundaries Shape File”, Snohomish County Assessor's Office.
744 (<ftp://ftp.co.snohomish.wa.us/Assessor/shapefiles/>)

745
746 “Shoreline Armoring”, Snohomish County Department Public Works, Surface Water Management
747 Division, Marine Resources Committee, Marine Resources Inventory, unpublished data
748
749 “Near Shore Drift Reports, Volume 6: San Juan, and parts of Jefferson, Island, and Snohomish counties”,
750 Washington State Department of Ecology, Ecology Publication 00-06-35.
751
752 “Washington State Shore Zone Inventory”, Washington State Department of Natural Resources,
753 Nearshore Habitat Program, (<http://www2.wadnr.gov/nearshore/data/>)
754
755 “King County Nearshore Habitat Mapping & Data Report: Picnic Point to Shilshole Marina”, Woodruff,
756 D.L. et. al., Battelle Pacific Northwest National Laboratory PNNL-13396,
757 (http://www.pnl.gov/main/publications/external/technical_reports/PNNL-13396.pdf)
758
759 “Soil Survey Geographic (SSURGO) database for Snohomish County Area,” U.S. Department of
760 Agriculture, Natural Resources Conservation Service, Washington, Fort Worth, TX, 2005.
761 (http://www.ftw.nrcs.usda.gov/ssur_data.html)
762
763 “Coastal Zone Atlas: Slope Stability Maps”, Washington State Department of Ecology, Shorelands and
764 Coastal Zone Management Program, March 2004. ([http://www.ecy.wa.gov/services/gis/data/data.htm -
765 slopestab](http://www.ecy.wa.gov/services/gis/data/data.htm-slopestab))
766
767 “Marine Resources Database”, Washington State Department of Fish & Wildlife,
768 (<http://wdfw.wa.gov/hab/release.htm>)
769
770 “Inventory and Assessment of Current and Historic Beach Feeding Sources/Erosion and Accretion Areas
771 for the Marine Shorelines of Water Resources Inventory Areas 8 and 9”, King County,
772 (<http://dnr.metrokc.gov/wlr/waterres/marine/marine-shoreline.htm>)
773
774

775 **5.2 WEBSITES**

776
777 www.sharedsalmonstrategy.org
778 www.sharedsalmonstrategy.org/watersheds/watershed-snohomish.htm
779 www.washington.edu/research/pathbreakers/1980a.html
780 www.wrh.noaa.gov/wrh/talite44.htm
781 www.csc.noaa.gov/npsec/html/ecodesc/climate.htm
782 www.ocs.orst.edu/pub/maps/Precipitation/Total/States/WA/wa.gif
783 www.komotv.com/weather/faq/convergence_zone.asp
784 [www.atmos.Washington.edu/k12/grayskies/Puget_sound/
785 www.pyr.ec.gc.ca/Air/gb_ps_airshed/summary_e.htm](http://www.atmos.Washington.edu/k12/grayskies/Puget_sound/)
786 www.nwqmc.org/98proceedings/Papers/52-REDM.html
787 [www.psat.wa.gov/
788 www.psat.wa.gov/About_Sound/AboutPS.htm](http://www.psat.wa.gov/)
789 www.nwfsc.noaa.gov/pubs/tm/tm44/Environment.htm
790 www.fish.washington.edu/naturemapping/puget_sound.html
791 www.dolphinplace.com/info.htm
792 www.greenbeltconsulting.com
793 www.coastaltraining-wa.org
794 www.imagingnotes.com/janfeb99/tress.html
795 www.kingcd.org/pub_nat_res.htm

796 www.pswg.org/puget_sound_ava.htm
797 www.depts.washington.edu/qrc/research/pnw/soils_land_use.htm
798 www.ecy.wa.gov/programs/sea/SMA/index.html
799 www.ecy.wa.gov/programs/sea/SMA/atlas_home.html
800 www.ecy.wa.gov/programs/sea/shorelan.html
801 www.ecy.wa.gov/programs/sea/SMA/links.html
802 www.ecy.wa.gov/eim/
803 www.ecy.wa.gov/services/gis/index.html
804 www.ecy.wa.gov/programs/sea/SMA/data/report_table.htm
805 www.ecy.wa.gov/programs/sea/SMA/data/datamaps_table.htm
806 www.ecy.wa.gov/programs/sea/landslides/maps/maps.html
807 www.ecy.wa.gov/programs/sea/femaweb/snohomish.htm
808 www.ecy.wa.gov/programs/sea/femaweb.legend.htm
809 www.ecy.wa.gov/programs/sea/femaweb/Snohomish/SN_10ith.jpg
810 www.ecy.wa.gov/watersheds/Index.html
811 www.pugetsoundnearshore.org
812 www.swim.wa.gov/
813 www.wdfw.wa.gov/hab/ahg/
814 www.wdfw.wa.gov/hab/phspage.htm
815 www.dnr.metrokc.gov/wlr/watersheds/puget/nearshore/sonr.htm
816 www.dnr.metrokc.gov/wlr/watersheds/puget/nearshore/
817 www.dnr.metrokc.gov/topics/marine/MARtopic.htm
818 www.dnr.metrokc.gov/topics/marine/photos.htm
819 www.dnr.metrokc.gov/topics/marine/links.htm
820 www.dnr.wa.gov/nhp/refdesk/communities/index.html
821 www3.wadnr.gov/dnrapp6/dataweb/hydrod.html
822 www.prism.washington.edu/
823 www.co.snohomish.wa.us/PDS/402-Shorelines/index.asp
824 www.co.snohomish.wa.us/PDS/402-Shorelines/smmpindex.asp#maps
825 www.mrsc.org
826 www.ci.edmonds.wa.us/
827 www.wsdot.wa.gov/mapsdata/GeoDataCatalog/default.html#trans
828
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APPENDIX D. CUMULATIVE IMPACTS ANALYSIS

The preparation of a Shoreline Master Program requires an assessment of cumulative impacts of development. This is to assure that such development results in no net loss of shoreline ecological functions. So, the process of preparing the Master Program must evaluate and consider cumulative impacts of reasonably foreseeable future development on shoreline ecological functions and other shoreline functions fostered by the policy goals of the Shoreline Management Act. To ensure no net loss of ecological functions and protection of other shoreline functions and/or uses, master program shall contain policies, programs, and regulations that address adverse cumulative impacts and fairly allocate the burden of addressing cumulative impacts among development opportunities. Evaluation of such cumulative impacts should consider:

1. Current circumstances affecting the shorelines and relevant natural processes;
2. Reasonably foreseeable future development and use of the shoreline; and
3. Beneficial effects of any established regulatory programs under other local, state, and federal laws.

The regulations state that the methods of determining reasonably foreseeable future development may vary according to local circumstances, including demographic and economic characteristics and the nature and extent of local shorelines.

CURRENT CIRCUMSTANCES

The land and water uses within the Lynnwood Shoreline jurisdiction are long established and stable. There are a number of factors causing stress to the natural environment within the jurisdiction. A listing of the stressors follows.

Railroad roadbed with shoreline armoring – Construction of the railroad roadbed has removed an area of riparian vegetation and prevents natural beach material nourishment by preventing bluff erosion.

Wastewater treatment plant – Construction of the Lynnwood wastewater treatment plant resulted in the loss of riparian vegetation, the placement of a natural stream channel in a pipe for about the last four hundred feet of downstream length, and paving over of any adjacent wetland area associated with the natural stream in the downstream area. Urban stormwater runoff is combined with the natural stream runoff and is untreated before discharge to the beach.

Wastewater treatment plant outfall – The treated effluent from the wastewater treatment plant is discharged from an outfall pipeline which extends 1,125 feet into Puget Sound (as measured from the west face of the railroad embankment). Effluent discharge takes place at a depth of 85 to 120 feet (through a diffuser which is the last 240 feet of the outfall line. This diffuser helps to mix the effluent within the receiving water. The treated effluent and its discharge meet all federal and state laws and standards. Although listed here as a stressor, any real impact on the natural environment is likely to be minimal.

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Old wooden pilings – There are about a dozen old wooden pilings protruding from the Lynnwood beach. Historical photos give evidence that the pilings are the last remnants of a dock. It is unknown whether the pilings are treated wood or natural wood. It is possible that the pilings are a small and relatively localized stressor in the beach environment. These pilings are located on private property.

Over water structures – There are currently no over water structures in the Lynnwood jurisdiction. The proposed regulations do allow docks, piers, and floating platforms. If constructed, these over water structures would be stressors in the shoreline environment.

FORESEEABLE FUTURE DEVELOPMENT

The current circumstances within Lynnwood’s shoreline jurisdiction indicate there is little chance for any substantial changes to the established pattern of development and use. The foreseeable future development opportunities are limited both by local circumstances and by deliberate regulation to limit development opportunities. A listing of foreseeable development follows.

Aquaculture – This is an allowed use in the proposed development regulations. It is possible that someone may initiate this use. It is not possible to predict the likelihood of this happening.

Floats and boat moorings – These are permissible uses. Again, it is not possible to predict the likelihood of this happening.

Pedestrian access – There is no good location for allowing pedestrian access to the beach from within City property. Safety considerations prevent public access within the fenced grounds of the wastewater treatment plant. Gaining legal access across the railroad tracks is also problematic. The “most feasible” location for providing pedestrian access within the immediate vicinity of the Lynnwood shoreline is from within the property adjacent and to the north of the treatment plant. If access were to be provided from within this property, and legal access across the railroad obtained, the outlet to the beach would occur within Lynnwood’s shoreline jurisdiction. Although this is technically feasible it is not thought to be likely in the foreseeable future.

Piers and docks – These are conditionally permitted uses under the proposed regulations. Although conditionally permitted, it is not likely that either of these structures would be constructed, as there is no legal access across the railroad to the upland area.

Railroad expansion or relocation – There is no indication that the railroad intends to either expand the number of tracks or to relocate the existing tracks. Still it is possible that either action could take place within the foreseeable future.

Wastewater treatment plant expansion or alteration – This use will continue into the foreseeable future. While there is no current plan to expand the plant it is likely that at some point it may become necessary. The most likely area of expansion would be to the east and southeast of the plant, an area well outside the shoreline jurisdiction. There is a current need for a vehicle turnaround at the west end of the plant. The only feasible way of constructing such a turnaround would be to acquire an easement on the property to the north of the plant. There are no current plans to pursue this development action.

98 **BENEFICIAL EFFECTS OF REGULATIONS**

99

100 All foreseeable future development is to be regulated by either a Substantial Development Permit
101 or Conditional Use Permit, or both. Such uses to be approved they will have to be judged to not
102 cause a net ecological function loss. This is the beneficial effect of the regulations.

103

104 **CUMULATIVE IMPACTS CONCLUSION**

105

106 The cumulative impacts of foreseeable future development will not cause a net loss in ecological
107 function.

APPENDIX E. RESTORATION PLAN

Shoreline master programs are required to include goals, policies, and actions for restoration of impaired ecological functions. These master program provisions should be designed to achieve overall improvements in shoreline ecological functions over time, when compared to the status upon adoption of the master program. The approach to restoration planning may vary significantly among local jurisdictions, depending on:

- The size of the jurisdiction;
- The extent and condition of shorelines in the jurisdiction;
- The availability of grants, volunteer programs or other tools for restoration; and
- The nature of the ecological functions to be addressed by restoration planning.

Master program restoration plans shall consider and address the following subjects:

- (i) Identify degraded areas, impaired ecological functions, and sites with potential for ecological restoration;
- (ii) Establish overall goals and priorities for restoration of degraded areas and impaired ecological functions;
- (iii) Identify existing and ongoing projects and programs that are currently being implemented, or are reasonably assured of being implemented (based on an evaluation of funding likely in the foreseeable future), which are designed to contribute to local restoration goals;
- (iv) Identify additional projects and programs needed to achieve local restoration goals, and implementation strategies including identifying prospective funding sources for those projects and programs;
- (v) Identify timelines and benchmarks for implementing restoration projects and program and achieving local restoration goals; and
- (vi) Provide for mechanisms or strategies to ensure that restoration projects and programs will be implemented according to plans and to appropriately review the effectiveness of the projects and program in meeting the overall restoration goals.

The above regulations are clear that the approach to restoration planning can be tailored to be appropriate to local circumstances, but that such plans must still address the foregoing subjects. Given Lynnwood's circumstances (only 700 lineal feet of Puget Sound shoreline, an established and static development and use pattern, no wetlands, and no Salmonid bearing streams) some of the subjects may be covered at a cursory level.

DEGRADED AREAS, IMPAIRED FUNCTIONS, AND POTENTIAL FOR RESTORATION

The dictionary definition of degraded is: "Having been reduced in quality or value." This definition well applies to much of the Lynnwood shoreline environment. The location of the Burlington Northern Santa Fe railroad along the shoreline at the toe of the bluff, and the construction of the Lynnwood wastewater treatment plant within the ravine containing a Puget

47 Sound tributary stream are the two major human activities that have significantly degraded the
48 natural environment and impaired ecological functions. Each activity has without question
49 removed riparian habitat. It is possible too that one or both activities destroyed wetlands
50 associated with the tributary stream. The railroad roadbed serves as a barrier to further erosion of
51 the bluffs and thus prevents continuing nourishment of the beach with new material. This
52 interruption of the natural cycle of erosion and deposition has most likely resulted in changes to
53 the ecological functions at this site. However, any such changes have not been studied and
54 documented in this specific area.

55
56 There is no evidence to indicate that the unnamed tributary stream was ever a Salmonid bearing
57 stream. We do know that it is not now a Salmonid bearing stream. The downstream segment of
58 the stream, approximately 450 feet in length, is contained within a pipeline. A portion of the
59 pipeline crosses under the wastewater treatment plant. It would be impractical to restore the
60 stream to a natural state in this area.

61

62 **GOALS AND PRIORITIES FOR RESTORATION**

63

64 The goals for restoration of impaired ecological function are stated in Section 2 of the Shoreline
65 Master Program. The priorities for restoration are as follows:

66

67 • Study the costs and benefits of removing old wooden pilings. If there is a net ecological
68 benefit to removal, then pursue the removal by working with the property owner to
69 achieve removal, possibly with City financial assistance.

70

71 • Study the costs and benefits of stormwater detention and treatment at the wastewater
72 treatment plant. If there is a net ecological benefit to detention and treatment, then
73 proceed with design, funding, and construction of the facilities.

74

75 • Continue land acquisition in the Lund's Creek watershed and initiate stream restoration
76 and enhancement projects.

77

78 • Study, in association with the City of Edmonds, the costs and benefits of marine
79 vegetation enhancement in Browns Bay. If there is a net ecological benefit to such
80 enhancement, then participate with the City of Edmonds in the vegetation enhancement
81 project.

82

83 **EXISTING PROJECTS CONTRIBUTING TO RESTORATION**

84

85 The only current City of Lynnwood project contributing to restoration of ecological function of
86 the Lynnwood shoreline is City land acquisition in the Lund's Creek watershed. Acquisition of
87 land within the watershed assures that the land will not be developed and that ecological
88 functions within the watershed will be preserved. While the watershed is not within the
89 Lynnwood shoreline jurisdiction there is an ecological connection between the two areas.

90

91 The watershed is the largest remaining natural area in the Lynnwood/Edmonds area that includes
92 a salmonid stream, steep slopes, and important wildlife habitats. The regional park, Meadowdale
93 Beach Park, is located in the watershed. In recent years, the watershed has suffered from
94 unchecked erosion and stormwater runoff impacting steep slopes, stream water quality, and fish
95 and wildlife habitat. To protect the watershed from the impacts of development, the City of

96 Lynnwood began acquiring Lund’s Creek watershed property in 1996. The City now owns 98
97 acres within the watershed, and intends to continue property acquisition.

98
99 The property acquisition, and future restoration projects, will protect and preserve Lund’s Creek
100 (a Class 1 salmonid stream), associated steep slopes, second growth forest, and wildlife habitat.
101 Public access to the Puget Sound will also be enhanced because the City owned land can provide
102 for additional trail connections.

103

104 **ADDITIONAL RESTORATION PROJECTS NEEDED**

105

106 The additional projects needed are as stated in the previous section on priorities.

107

108 **POTENTIAL FUTURE RESTORATION PROJECTS**

109

110 The following projects are needed to advance restoration efforts at the Lynnwood shoreline.
111 Funding will be requested as appropriate:

112

- 113 • Wood pilings study – Need for the study and possible removal of the pilings.
- 114
- 115 • Stormwater detention and treatment – Need for the study and possible design and
116 construction of the stormwater detention and treatment.
- 117
- 118 • Lund’s Creek watershed land acquisition – This project is on-going and is dependent
119 upon federal and state funding. Stream restoration and enhancement is primarily through
120 volunteer efforts.
- 121
- 122 • Marine vegetation enhancement – This project will depend largely on whether the City of
123 Edmonds includes the project in the city’s Shoreline Master Program restoration plan.

124

125 **STRATEGY TO ASSURE RESTORATION IMPLEMENTATION**

126

127 The strategy to assure implementation of the stated restoration plan is to adopt the plan as part of
128 the Shoreline Master Program, to continue communication, coordination, and collaboration with
129 the City of Edmonds on Browns Bay restoration, and to make the necessary budget requests to
130 carry out the necessary projects.

APPENDIX F. LYNNWOOD MUNICIPAL CODE

Refer to Lynnwood Municipal Code for the following regulations related to the Shoreline Master Program:

LMC 13.35	Surface Water Utility
LMC 16.46	Flood Hazard Area Regulations
LMC 17.10	Environmentally Critical Areas
LMC 17.15	Tree Regulations