



Preliminary Critical Area Study - 7671 & 7677 West Mercer Way March 2026 Update

Mercer Island Engel

Facet Number: 2312.0280.00

March 10, 2026

Executive Summary

The subject parcels (#5451300075 and #5451300065) and neighboring parcels to the north (parcels #7786000070 and #7786000080) do not include any identified wetlands or watercourses. Mapped watercourses shown on the Mercer Island GIS Portal do not have characteristics that meet definition of a watercourse under MIMC 19.16.0101 – Definitions. The mapped watercourses convey solely stormwater, with no indication that the features were formed natural surface waters. The conceptual four-lot subdivision with single-family residences and a shared beach appears feasible considering all applicable critical area and shoreline provisions. Extensive on-site mitigation opportunities are present and could be utilized to compensate for any unavoidable critical area or buffer impacts associated with the development.

Introduction

This report has been prepared to present preliminary project compliance with the requirements of the Mercer Island City Code (MICC) 19.07 - Environmentally Critical Areas and MICC 19.13 Shoreline Master Plan. The proposed development project is to subdivide the two subject parcels (5451300075 and 5451300065) into four parcels with a common area along the shoreline. Single-family homes would be constructed on each of the four new lots. The conceptual site plan depicts the proposed lots and the general location of the single-family building pads. Associated compensatory mitigation could ensure no net loss of shoreline and critical area functions, if an appropriate mitigation plan and approach are implemented. In addition to the information and findings presented in this report, the following documents are enclosed:

- Site Photos
- Delineation Sketch; Revised February 2026
- Preliminary Site Plan
- Wetland data sheets

STUDY AREA

The project is located on two subject parcels at 7671 and 7677 West Mercer Way in Mercer Island (parcels #5451300075 and #5451300065) (Figure 1, outlined in purple). Permission was granted to assess the off-site mapped watercourse on the two parcels to the north (parcels #7786000070 and #7786000080) (Figure 1, outlined in yellow). It is situated within the Southwest Quarter of Section 25 of Township 24 North, Range 04 East of the Public Land Survey System.

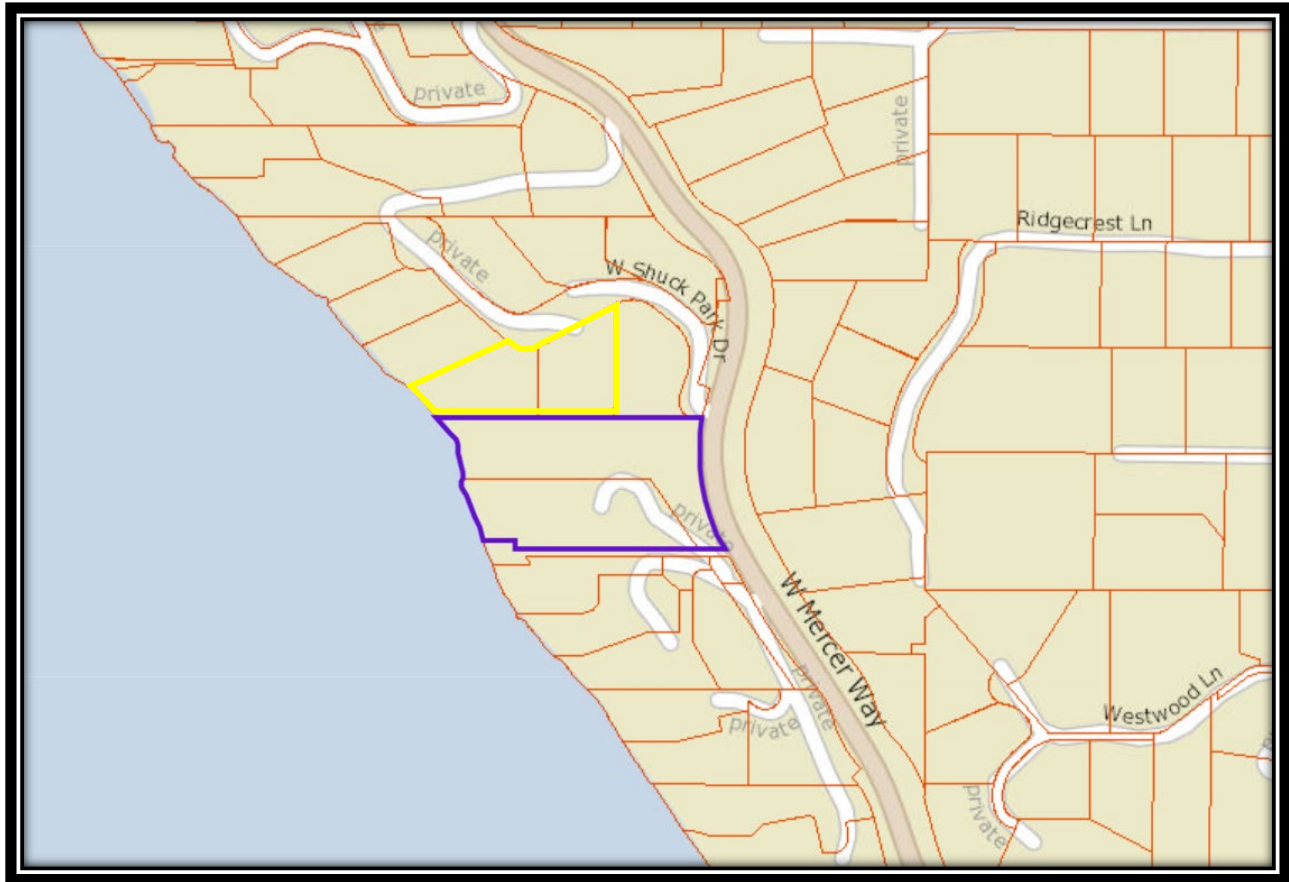


Figure 1. Project area vicinity map (King County iMap, 2023). The subject parcels are outlined in purple and the neighboring parcels that were screened are outlined in yellow.

Methods

Field investigations for the Critical Area Study on the subject parcels were conducted on February 13, 2024, by ecologists Anna Murphy and Brent Rutley. A subsequent site visit occurred on February 18, 2026, by ecologist Sage Yuasa to screen the mapped off-site watercourse on the neighboring properties to the north.

The subject parcels were evaluated for wetlands using methodology from the *Corps of Engineers Wetland Delineation Manual* (Environmental Laboratory 1987) and the *Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Western Mountains, Valleys, and Coast Region Version 2.0* (U.S. Army Corps of Engineers 2010). The presence or absence of wetlands was determined based on an examination of vegetation, soils, and hydrology. These parameters were sampled at several locations.

Characterization of weather conditions for precipitation used in the Wetland Determination Data Forms was determined using the WETS table methodology (USDA, NRCS 2015). The "Seattle Tacoma Intl AP" station from 1991-2020 was used as a source for precipitation data (<http://agacis.rcc-acis.org/>).

The WETS table methodology uses climate data from the three months prior to the site visit month to determine if normal conditions are present in the study area region.

The subject parcels and neighboring parcels to the north were evaluated for watercourses based on the presence or absence of an ordinary high water mark (OHWM) as defined by Section 404 of the Clean Water Act, the Washington Administrative Code (WAC) 220-660-030, and the Revised Code of Washington (RCW) 90.58.030 and guidance documents including *Determining the Ordinary High Water Mark for Shoreline Management Act Compliance in Washington State* (Anderson, et al. 2016) and *National Ordinary High Water Mark Field Delineation Manual for Rivers and Streams* (David, et al. 2025).

Wetland determination data points are marked with yellow- and black-striped flagging. No wetlands or watercourses were identified and/or flagged in the field.

Public-domain information on the subject properties was reviewed for the delineation study. Resources and review findings are presented in Table 1.

Site Description

The study area, containing the subject parcels and off-site parcels, is approximately 2.6 acres in size and is within the Lake Washington sub-basin of the Cedar-Sammamish Water Resource Inventory Area (WRIA 8).

Site topography of the subject parcels is dominated by forested slopes leading to the shoreline of Lake Washington to the west (Photo 1). A flat lawn area extends approximately 50 feet west from the toe of the slope (Photo 2). The project area has been developed with two single family homes (circa 1949 and 1974), driveways, parking areas, a beach house adjacent to the shoreline, one dock (see attached preliminary site plan), and an existing, registered well and pump house located adjacent to the southern property line. The shoreline is reinforced with a rip-rap bulkhead that extends the entire length of the shoreline (Photo 3). There is also a network of paved and gravel trails that lead from the existing homes through the forested slopes down to the grassy shoreline.

Vegetation on the forested slopes consists of mature Douglas-fir (*Pseudotsuga menziesii*), bigleaf maple (*Acer macrophyllum*) and western red cedar trees (*Thuja plicata*) in the canopy. Shrub species observed included osoberry (*Oemleria cerasiformis*), salmonberry (*Rubus spectabilis*), and oceanspray (*Holodiscus discolor*). Native herbaceous understory vegetation is sparse and consists mostly of western sword fern (*Polystichum munitum*) and dull Oregon grape (*Mahonia nervosa*). Invasive vegetation was also observed throughout the forested area, and includes Himalayan blackberry (*Rubus armeniacus*), English holly (*Ilex aquifolium*), and dense English ivy (*Hedera helix*) throughout most of the understory (Photo 4).

Table 1. Summary of online mapping and inventory resources.

Resource	Summary
USDA NRCS: Web Soil Survey	<i>Kitsap silt loam, 15 to 30 percent slopes is mapped within both subject parcels.</i>
USFWS: NWI Wetland Mapper	<i>Lake habitat (Lake Washington) is classified as L1UBHh and is mapped along the western boundary of parcels 5451300065, -0070, & -0075.</i>
WDFW: PHS on the Web	<i>No priority habitats or species are shown within the study area. Lake Washington contains priority fish species.</i>
WDFW & NWIFC: Statewide Washington Integrated Fish Distribution	<i>No streams are mapped within the study area.</i>
WNHP Data Explorer	<i>No rare plants or ecosystems are mapped within the study area.</i>
WA-DNR: Forest Practices Application Mapping Tool	<i>No streams or wetlands are mapped within the study area.</i>
King County iMap	<i>No streams or wetlands are shown within the study area.</i>
Mercer Island GIS Portal	<i>Shows a stream that flows through the central portion of parcel 5451300075 and the southern portion of 5451300065 and discharges into Lake Washington. In addition, a piped stream is shown along the northern boundary of parcel 5451300075.</i>
WETS Climatic Condition	<i>Wetter than normal conditions in February 2024. Normal conditions in February 2026.</i>

Critical Areas

WETLANDS

No wetlands were identified within or adjacent to the subject or off-site parcels. Data Point 1 summarizes the conditions in a marginal area adjacent to the shoreline where a patch of scouring rush (*Equisetum hyemale*) is growing (Photo 5). Scouring rush is a facultative species, and thus, hydrophytic vegetation was observed at this location; however, hydric soils and wetland hydrology are not present. Data Point 3 summarizes conditions in the vicinity of the on-site mapped watercourse (which is not present - see below) and no wetland indicators were observed.

WATERCOURSES

Subject Parcels

The Mercer Island GIS Portal shows a watercourse extending from the northeast corner of parcel 5451300075 down through the northwest corner of parcel 5451300065, where it discharges into Lake Washington (Figure 2). No watercourse channel was observed in the ravine during the site visit. A

shallow ravine was observed in the mapped watercourse location but no indication of any stream/watercourse indicators such as flowing water, scour, bed, bank, or sorted sediments are present (Photos 6-8).

A narrow channel was observed in the southwest corner of the project area. The channel originates from a small well house where water is discharged from a 2-inch diameter metal pipe, flowing west a short distance before entering Lake Washington. The drainage channel is approximately 50 feet in length and roughly one foot wide (Photo 9). No water source other than the well house, including ponds, channels or other stream/watercourse indicators are present upslope.

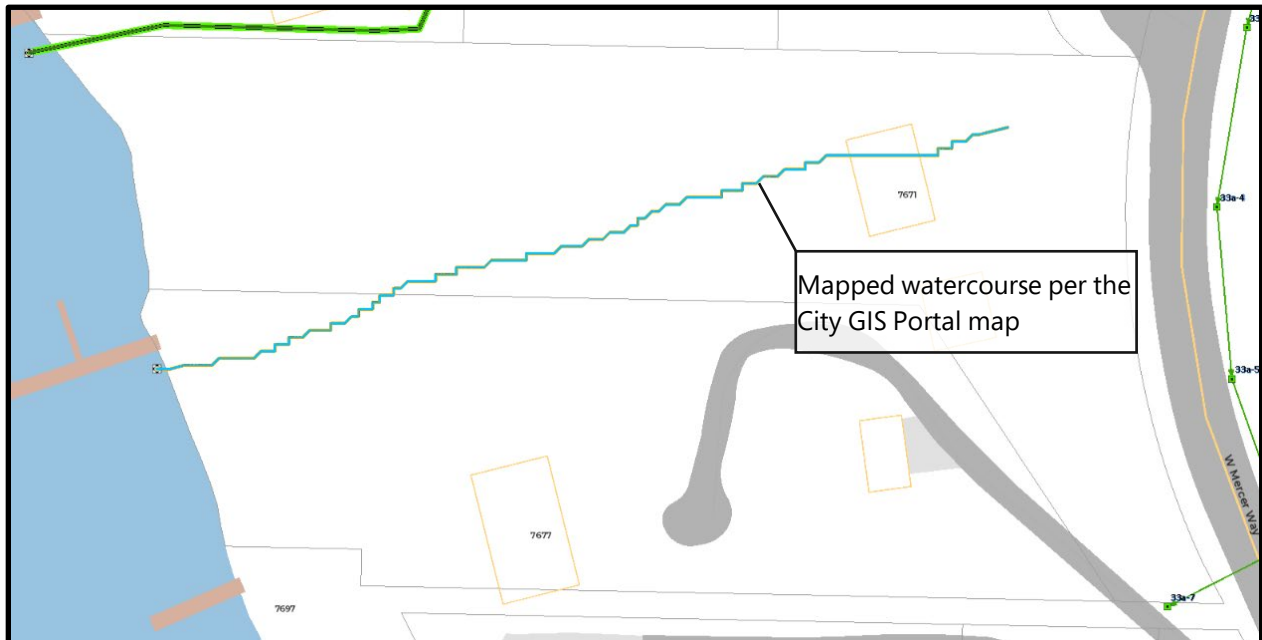


Figure 2. City of Mercer Island GIS Portal map exhibiting watercourse (blue line) within the subject parcels #5451300075 and #5451300065. No watercourse channel was observed during the site visit.

Off-Site Parcels

A piped watercourse and open watercourse are mapped north of the subject properties (parcels #7786000070 and 7786000080) on the Mercer Island GIS Portal (Figure 3). Based on our assessment and evidence observed in the field, hydrology for the open channel is entirely supported by the existing stormwater infrastructure on West Shuck Park Drive and West Mercer Way. At the time of the site visit, it was raining and occurred during normal climatic conditions in the wet season (Table 1).

The open channel is mapped on 7653 and 7657 W Mercer Way, below and directly connected to stormwater inputs from catch basin 33a-26 on W Shuck Park Drive. However, the open channel originates immediately west of the driveway on 7653 W Mercer Way and is then entirely piped east of the driveway to the connection with catch basin 33a-26. The stormwater outfall on 7653 is a 12-inch concrete pipe that discharges into a modified channel lined with black fabric and cobble, evidence of

an artificial feature (Photos 10 and 11). A secondary stormwater outfall, an 8-inch concrete pipe, outlets into the channel conveying stormwater from catch basins 33a-22 to 25 along West Shuck Park Drive (Photo 12). The entire channel is located above a retaining wall along the eastern edge of the driveway at 7649 W Mercer Way. The channel outlets into a 6-inch black PVC pipe located on top of the retaining wall (Photo 13) and is piped until it reaches Lake Washington, approximately 10-feet north of the northern property boundary of 7671 W Mercer Way (Photo 14). Minimal flow was noted in February 2024 during wetter than normal climatic conditions and February 2026 during normal climatic conditions.

The observed open channel appears to be hydrologically supported solely by stormwater infrastructure; it is not located in a natural ravine; no wetlands or streams are present above the mapped stormwater system; and the channel is artificially lined with black fabric and cobble. The mapped open channel and piped channel on 7649 and 7653 W Mercer Way should not be regulated as a watercourse.

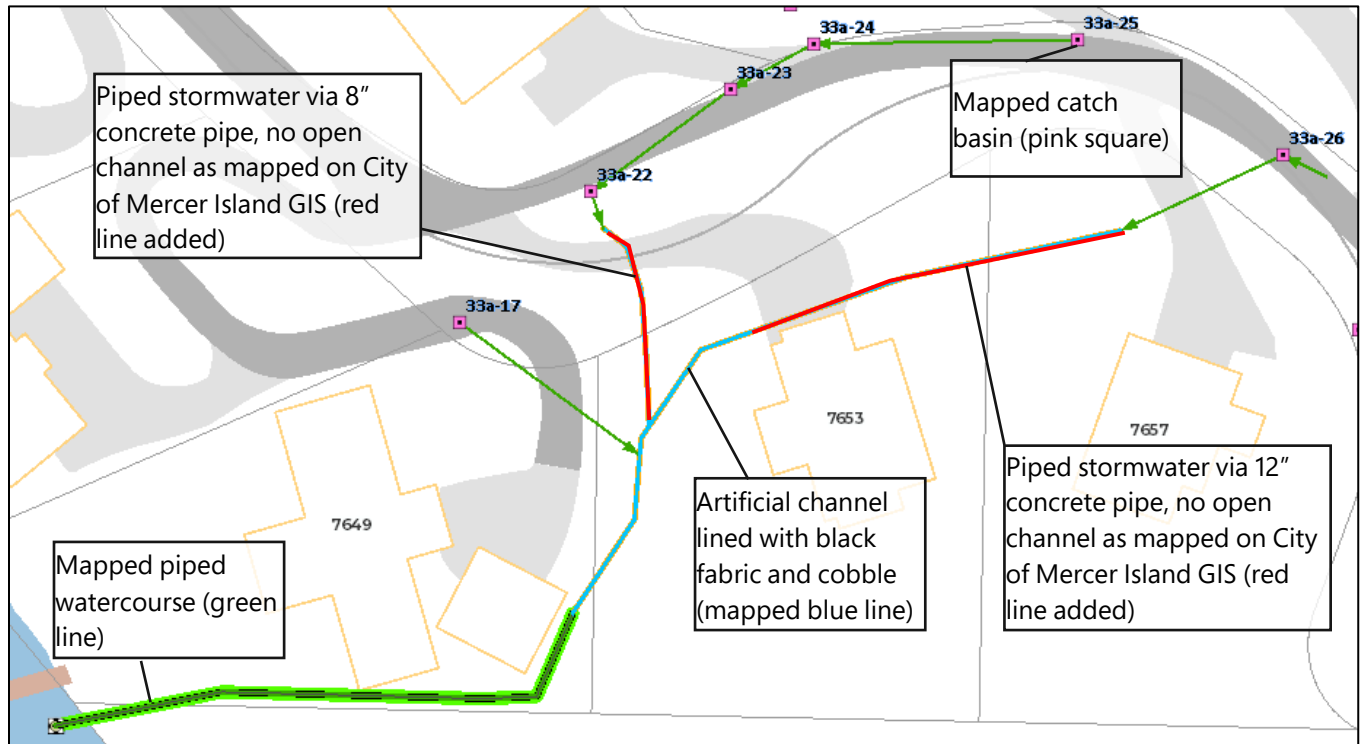


Figure 3. Screenshot mark-up of City of Mercer Island GIS Portal map exhibiting the piped watercourses (red lines added to figure and mapped green line) and open channel watercourse (blue line) on the off-site parcels north of the subject properties. Pink squares are mapped private catch basins.

FISH AND WILDLIFE HABITAT CONSERVATION AREAS

No fish or wildlife habitat conservation areas are present within the project area. No priority habitat areas, eagle nests, or critical wildlife habitat features were observed. The mature Douglas-firs in the area can potentially be utilized as perch trees for eagles, but this was not observed during the site visit. Evidence of browsing, and wildlife trails were observed along the forested slopes but are likely from common black tailed deer (*Odocoileus hemionus*), which is not a priority species. Mature trees and snags are present; however, these habitat features do not constitute a mature or old-growth forest and are not considered critical areas under MICC 19.13.

GEOLOGICALLY HAZARDOUS AREAS

Geologically hazardous areas are regulated as critical areas by Mercer Island but are not included in the scope of this assessment. Slopes are found throughout the project area and are vegetated with species identified in the Site Description section above. A third-party geotechnical report will be provided addressing the potential for geologically hazardous areas.

SHORELINES OF THE STATE

The Ordinary High Water Mark of Lake Washington, a Shoreline of the State, was flagged with blue and white flagging (Flags WMA-1 to WMA-8) along the bulkhead. Salmonids with a documented presence in Lake Washington include Chinook salmon (*Oncorhynchus tshawytscha*), chum salmon (*Oncorhynchus keta*), coho salmon (*Oncorhynchus kisutch*), steelhead (*Oncorhynchus mykiss*), bull trout (*Salvelinus confluentus*), and Kokanee Salmon (*Oncorhynchus nerka*). The lakebed substrate near the project area is composed of sand with some gravels (primarily medium and coarse) and cobble. Overhanging shrubby vegetation is present along the southern half of the bulkhead. There is a strip approximately five feet wide of dense willow species in this area.

Local Regulations

WATERCOURSES

The small channel containing overflow from the pumphouse, the off-site piped watercourse, and off-site open watercourse appear to be features intentionally constructed where no natural watercourse was present and are entirely supported by stormwater. Therefore, the identified features do not meet the definition of a watercourse, as found in MICC 19.16.010, and therefore, are not regulated features.

SHORELINES

The subject property is located along the eastern shoreline of Mercer Island along Lake Washington, a shoreline of the state. Lake Washington's shoreline jurisdiction extends 200 feet landward of the OHWM, thereby encompassing a portion of the project area. The shoreline environment designation of the parcels is Urban Residential (UR). Shoreline regulations are found in MICC 19.13 (Shoreline Master Program). MICC 19.13.050.A requires a 25-foot setback from the lake's OHWM for all structures. In addition, the code stipulates maximum hardscape and lot coverage thresholds for areas within 50 feet of the OHWM.

Construction of single-family dwellings and accessory structures is a permitted use landward of the OHWM via a shoreline categorical exemption (MICC 19.13.040, Table A). Soft structural shoreline stabilization and restoration of ecological functions, including shoreline habitat and natural systems enhancement, are also permitted uses. All aspects of the proposed project must comply with development standards outlined in MICC 19.13.050 and general regulations, (MICC 19.13.020), including no net loss of ecological functions. Per MICC 19.13.010.D, many of the critical area regulations under MICC 19.07 are incorporated as specific regulations of the SMP. Several exceptions to the incorporated critical area regulations are noted under MICC 19.13.010.D, including but not limited to, exemptions, modifications, reasonable use exception, buffer reductions, and wetland buffer designations.

Based on existing topography provided in the survey provided and City GIS mapping, steep slope critical areas may be present on the subject parcels. Additionally, the parcels are mapped as having protected landslide, seismic, and erosion hazard critical areas. MICC 19.07.160 defers to the definition found in the Washington Administrative Code (WAC) 365-190-130 and defines a steep slope as any area with a slope of 40 percent or steeper and with a vertical relief of 10 or more feet. Alterations within geologically hazardous areas or associated buffers must meet the requirements of MICC 19.07.160 and must be accompanied by a geotechnical critical area study that concludes the proposal will effectively mitigate risks of the geologic hazards. The critical area study shall also demonstrate that the proposed project has implemented mitigation sequencing measures, as outlined in MICC 19.07.100. Any unavoidable impacts to a geologically hazardous areas and/or associated buffer will require some form of compensatory mitigation.

The subject parcels are densely forested. Should the project require the removal of regulated trees, defined by the City as any tree 10 inches in diameter or greater, the standards of MICC 19.10 will apply. A tree inventory, Arborist Report, and tree retention plan will be required. Tree removal associated with a development proposal will be reviewed in conjunction with a development permit application. Replacement trees will be required pursuant to the ratios set forth in MICC 19.07.070.

Impact Assessment and Potential Mitigation

It appears that adherence to the required 25-foot shoreline setback can be achieved in creating residences associated with four new lots. The proposed 'common area' along the shoreline could provide access to the existing dock and shoreline while still complying with the applicable hardscape and lot coverage thresholds for areas within 50 feet of the OHWM. However, under MICC 19.13.050.K.4, new development totaling 500 square feet or more of any combination of additional gross floor area, lot coverage or hardscape, including the primary structures and appurtenances, shall be required to provide native vegetation coverage over 50 percent of the area within 20 feet of the OHWM. New development totaling 1,000 square feet or more of any combination of additional gross floor area, lot coverage or hardscape, including the primary structures and appurtenances, shall be required to provide native vegetation coverage over 75 percent of the area within 20 feet of the OHWM.

The construction of the four single-family homes will require clearing and tree removal that may occur partially within geologically hazardous areas and/or shoreline jurisdiction. Any unavoidable impacts to the critical area and/or associated buffer will require some form of compensatory mitigation.

Mitigation opportunities involving invasive species removal and native vegetation exist throughout the sloped areas of the project area. High densities of English ivy, English holly, and Himalayan blackberry are found throughout the forested slopes. In addition, softening of the shoreline (i.e., bulkhead removal) could also serve as a form of mitigation for any impacts associated with the proposed project.

Disclaimer

The information contained in this report is based on the application of technical guidelines currently accepted as the best available science and in conjunction with the referenced manuals and criteria. All discussions, conclusions and recommendations reflect the best professional judgment of the author(s) and are based upon information available at the time the study was conducted. All work was completed within the constraints of budget, scope, and timing. The findings of this report are subject to verification and agreement by the appropriate local, state, and federal regulatory authorities. No other warranty, expressed or implied, is made.

References

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- . 2018. "Field Indicators of Hydric Soils in the United States (Version 8.2)." Edited by L. M. Vasilas, G. W. Hurt and J. F. Berkowitz. United States Department of Agriculture, Natural Resources Conservation Service in cooperation with the National Technical Committee for Hydric Soils.

Site Photos



Photo 1. View looking north at the forested slope.



Photo 2. View looking south at the level grass area adjacent to the shoreline.



Photo 3. View looking south at the bulkhead from the northern corner of the project area.



Photo 4. View of an Invasive species thicket on the forested slope.



Photo 5. Location of DP-1.



Photo 6. View of ravine where no watercourse was identified.



Photo 7. View of ravine where no watercourse was identified.



Photo 8. View of ravine where no watercourse was identified.



Photo 9. View of the pumphouse overflow channel.



Photo 10. Piped stormwater outfall onto open channel lined with black fabric and cobble with no distinct scour or bank.



Photo 11. Open channel lined with black fabric and cobble with no distinct scour or bank.



Photo 12. Piped stormwater outfall onto open channel lined with black fabric and cobble with no distinct scour or bank.



Photo 13. Flow from open channel outlets via 6" PVC pipe.



Photo 14. Piped Channel outlets into vegetated slope above bulkhead wall along Lake Washington shoreline.





Delineation Sketch

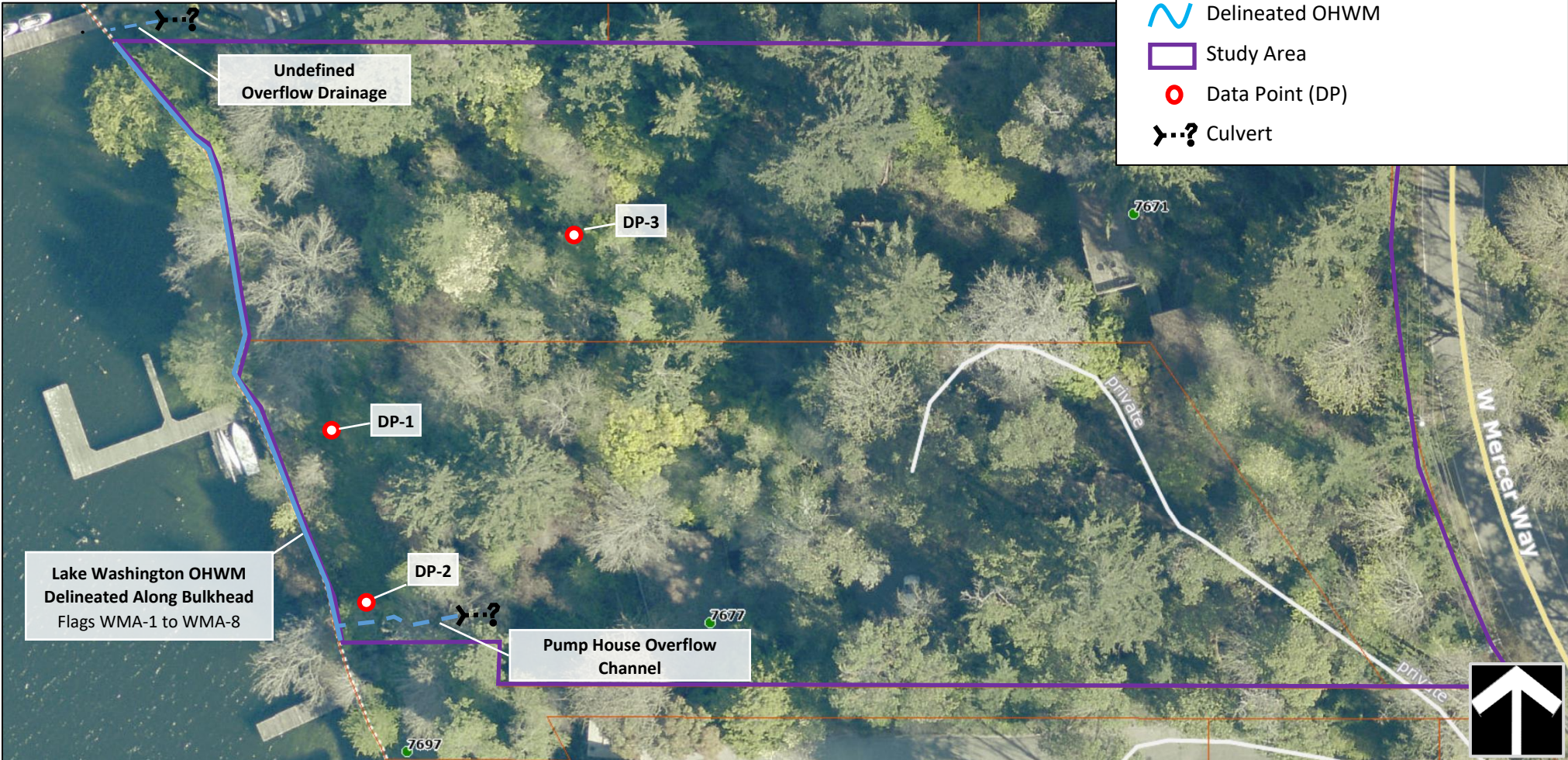
Delineation Sketch – 7671 and 7677 West Mercer Way

Site Address: 7671 and 7677 West Mercer Way
Parcel Numbers: 5451300075 and 5451300065
Site Visit Date: February 13, 2024

Jurisdiction: Mercer Island
Prepared for: Andrew Engel
DCG/W Ref.: No. 2312.0280.00

LEGEND

-  Delineated OHWM
-  Study Area
-  Data Point (DP)
-  Culvert



Note: Field sketch only. Features depicted are approximate and not to scale. No wetlands were identified in the or adjacent to the study area. The Ordinary High Water Mark boundaries are marked with blue- and black-striped flags. Data points are marked with yellow- and black-striped flags. All observations were made from within the study area; adjoining private properties were not entered.

Wetland Determination Data Forms

Project/Site: Mercer Island Engel City/County: Mercer Island Sampling date: 02/13/2024
 Applicant/Owner: Andrew Engel State: WA Sampling Point: DP-1
 Investigator(s): B. Rutley, A. Murphy Section, Township, Range: 25, 24N, 5E
 Landform (hillslope, terrace, etc): Slope Local relief (concave, convex, none): None Slope (%): 5
 Subregion (LRR): A Lat: - Long: - Datum: -
 Soil Map Unit Name: Kitsap silt loam, 15 to 30 percent slopes NWI classification: N/A

Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in remarks.)
 Are Vegetation , Soil , or Hydrology significantly disturbed? Are "Normal Circumstances" present on the site? Yes No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> Hydric Soils Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Wetland Hydrology Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Is the Sampled Area within a Wetland? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Remarks: Wetter than normal conditions	

VEGETATION – Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status	
Tree Stratum (Plot size: 5-m diameter)				
1. <u>Malus sp.</u>	5	No	FACU	Dominance Test worksheet: Number of Dominant Species that are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across all Strata: <u>3</u> (B) Percent of Dominant Species that are OBL, FACW, or FAC: <u>67</u> (A/B)
2. <u>Alnus rubra</u>	20	Yes	FAC	
3. _____				
4. _____				
<u>25</u> = Total Cover				
Sapling/Shrub Stratum (Plot size: 3-m diameter)				
1. <u>Mahonia aquifolium</u>	15	Yes	FACU	Prevalence Index worksheet: Total % Cover of: <u> </u> Multiply by: OBL species <u> </u> x 1 = <u> </u> FACW species <u> </u> x 2 = <u> </u> FAC species <u> </u> x 3 = <u> </u> FACU species <u> </u> x 4 = <u> </u> UPL species <u> </u> x 5 = <u> </u> Column Totals: (A) <u> </u> (B) <u> </u> Prevalence Index = B/A = <u> </u>
2. _____				
3. _____				
4. _____				
5. _____				
<u>15</u> = Total Cover				
Herb Stratum (Plot size: 1-m diameter)				
1. <u>Equisetum hyemale</u>	45	Yes	FACW	
2. <u>Vinca major</u>	15	No	Not Listed	
3. <u>Hedera helix</u>	15	No	FACU	
4. _____				
5. _____				
6. _____				
7. _____				
8. _____				
9. _____				
10. _____				
11. _____				
<u>75</u> = Total Cover				
Woody Vine Stratum (Plot size: 3-m diameter)				
1. _____				
2. _____				
<u>0</u> = Total Cover				
% Bare Ground in Herb Stratum: _____				
Hydrophytic Vegetation Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>				

Remarks: In patch of Equisetum along the edge of the bulkhead.

Project/Site: Mercer Island Engel City/County: Mercer Island Sampling date: 02/13/2024
 Applicant/Owner: Andrew Engel State: WA Sampling Point: DP-2
 Investigator(s): B. Rutley, A. Murphy Section, Township, Range: 25, 24N, 5E
 Landform (hillslope, terrace, etc): Slope Local relief (concave, convex, none): None Slope (%): 5
 Subregion (LRR): A Lat: - Long: - Datum: -
 Soil Map Unit Name: Kitsap silt loam, 15 to 30 percent slopes NWI classification: N/A

Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in remarks.)
 Are Vegetation , Soil , or Hydrology significantly disturbed? Are "Normal Circumstances" present on the site? Yes No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> Hydric Soils Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Wetland Hydrology Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Is the Sampled Area within a Wetland? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Remarks: Wetter than normal conditions	

VEGETATION – Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status	
Tree Stratum (Plot size: 5-m diameter)				Dominance Test worksheet: Number of Dominant Species that are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across all Strata: <u>3</u> (B) Percent of Dominant Species that are OBL, FACW, or FAC: <u>67</u> (A/B)
1. _____				
2. _____				
3. _____				
4. _____				
<u>0</u> = Total Cover				
Sapling/Shrub Stratum (Plot size: 3-m diameter)				Prevalence Index worksheet: Total % Cover of: Multiply by: OBL species _____ x 1 = _____ FACW species _____ x 2 = _____ FAC species _____ x 3 = _____ FACU species _____ x 4 = _____ UPL species _____ x 5 = _____ Column Totals: (A) (B) Prevalence Index = B/A =
1. <u>Mahonia aquifolium</u>	30	Yes	FACU	
2. _____				
3. _____				
4. _____				
5. _____				
<u>30</u> = Total Cover				
Herb Stratum (Plot size: 1-m diameter)				Hydrophytic Vegetation Indicators: <input type="checkbox"/> 1 – Rapid Test for Hydrophytic Vegetation <input checked="" type="checkbox"/> 2 – Dominance Test is > 50% <input type="checkbox"/> 3 – Prevalence Index is ≤ 3.0 ¹ <input type="checkbox"/> 4 – Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <input type="checkbox"/> 5 – Wetland Non-Vascular Plants ¹ <input type="checkbox"/> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
1. <u>Ranunculus repens</u>	5	Yes	FAC	
2. <u>Poa sp.*</u>	10	Yes	FAC	
3. _____				
4. _____				
5. _____				
6. _____				
7. _____				
8. _____				
9. _____				
10. _____				
11. _____				
<u>15</u> = Total Cover				
Woody Vine Stratum (Plot size: 3-m diameter)				Hydrophytic Vegetation Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>
1. _____				
2. _____				
<u>0</u> = Total Cover				
% Bare Ground in Herb Stratum: <u>75</u>				
Remarks: *Presumed FAC				

Project/Site: Mercer Island Engel City/County: Mercer Island Sampling date: 02/13/2024
 Applicant/Owner: Andrew Engel State: WA Sampling Point: DP-3
 Investigator(s): B. Rutley, A. Murphy Section, Township, Range: 25, 24N, 5E
 Landform (hillslope, terrace, etc): Slope Local relief (concave, convex, none): None Slope (%): 30
 Subregion (LRR): A Lat: - Long: - Datum: -
 Soil Map Unit Name: Kitsap silt loam, 15 to 30 percent slopes NWI classification: N/A

Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in remarks.)
 Are Vegetation , Soil , or Hydrology significantly disturbed? Are "Normal Circumstances" present on the site? Yes No
 Are Vegetation , Soil , or Hydrology naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Hydric Soils Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Wetland Hydrology Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Is the Sampled Area within a Wetland? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Remarks: Wetter than normal conditions DP taken in area of mapped stream on Mercer Island GIS Portal. It was confirmed that no stream or wetland was present.	

VEGETATION – Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status	
Tree Stratum (Plot size: 5-m diameter)				
1. <u><i>Alnus rubra</i></u>	40	Yes	FAC	Dominance Test worksheet: Number of Dominant Species that are OBL, FACW, or FAC: <u>1</u> (A) Total Number of Dominant Species Across all Strata: <u>3</u> (B) Percent of Dominant Species that are OBL, FACW, or FAC: <u>33</u> (A/B)
2. _____				
3. _____				
4. _____				
<u>25</u> = Total Cover				
Sapling/Shrub Stratum (Plot size: 3-m diameter)				
1. <u><i>Prunus laurocerasus</i></u>	15	No	FACU	Prevalence Index worksheet: Total % Cover of: <u> </u> Multiply by: <u> </u> OBL species <u>0</u> x 1 = <u>0</u> FACW species <u>0</u> x 2 = <u>0</u> FAC species <u>1</u> x 3 = <u>3</u> FACU species <u>3</u> x 4 = <u>12</u> UPL species <u>0</u> x 5 = <u>0</u> Column Totals: <u>4</u> (A) <u>15</u> (B) Prevalence Index = B/A = <u>3.75</u>
2. <u><i>Ilex aquifolium</i></u>	20	Yes	FACU	
3. _____				
4. _____				
<u>15</u> = Total Cover				
Herb Stratum (Plot size: 1-m diameter)				
1. <u><i>Pentaglottis sempervirens</i></u>	30	Yes	Not Listed	Hydrophytic Vegetation Indicators: <input type="checkbox"/> 1 – Rapid Test for Hydrophytic Vegetation <input type="checkbox"/> 2 – Dominance Test is > 50% <input type="checkbox"/> 3 – Prevalence Index is ≤ 3.0 ¹ <input type="checkbox"/> 4 – Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet) <input type="checkbox"/> 5 – Wetland Non-Vascular Plants ¹ <input type="checkbox"/> Problematic Hydrophytic Vegetation ¹ (Explain) ¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
2. <u><i>Hyacinthoides non-scripta</i></u>	10	No	Not Listed	
3. <u><i>Hedera helix</i></u>	5	No	FACU	
4. _____				
5. _____				
6. _____				
7. _____				
8. _____				
9. _____				
10. _____				
<u>75</u> = Total Cover				
Woody Vine Stratum (Plot size: 3-m diameter)				
1. _____				Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
2. _____				
<u>0</u> = Total Cover				
% Bare Ground in Herb Stratum: _____				
Remarks: _____				

