

CULTURAL RESOURCES REPORT COVER SHEET

Author: Chris Lockwood, Ph.D., and Katherine Wilson, M.A.

Title of Report: Cultural Resources Assessment, 5637 East Mercer Way Project, King County, WA (NWS-2015-0650)

Date of Report: November 2016

County(ies): King Section: 19 Township: 24N Range: 5E

Quad: Mercer Island, WA Acres: <1

PDF of report submitted (REQUIRED) Yes

Historic Property Inventory Forms to be Approved Online? Yes No

Archaeological Site(s)/Isolate(s) Found or Amended? Yes No

TCP(s) found? Yes No

Replace a draft? Yes No

Satisfy a DAHP Archaeological Excavation Permit requirement? Yes # No

Were Human Remains Found? Yes DAHP Case # No

DAHP Archaeological Site #:

- Submission of PDFs is required.
- Please be sure that any PDF submitted to DAHP has its cover sheet, figures, graphics, appendices, attachments, correspondence, etc., compiled into one single PDF file.
- Please check that the PDF displays correctly when opened.



Cultural Resources Short Report

Title: Cultural Resources Assessment, 5637 East Mercer Way Project, King County, WA (NWS-2015-0650)

Author(s): Katherine F. Wilson, M.A., and Chris Lockwood, Ph.D.

Date: November 2016 **USACE No.** NWS-2015-0650

Acreage: 0.86 acre **ESA Project No.** D160853.00

Agency: US Army Corps of Engineers **Project Proponent:** MI Treehouse

Regulatory: Section 106 NHPA -- Federal Permit Required

USGS Quad: Mercer Is, WA (7.5') **Township/Range/Section:** T24N, R5E, Sec 19

Address: 5637 East Mercer Way, Mercer Island, WA, 98040 **County:** King, WA

Parcel(s): 1924059312

Field Methods Used

- No field work conducted (literature review only)
- Shovel Probes Auger Probes Pedestrian Survey Historic Property Survey

Project Understanding

MI Treehouse, LLC is proposing to construct a single-family residence on King County parcel 1924059312, Mercer Island, Washington.

Area of Potential Effects

The Area of Potential Effects (APE) is parcel 1924059312, which is currently a vacant lot with two assigned house addresses: 5631 and 5637 East Mercer Way, Mercer Island, WA, 98040 (Figure 1). The APE is approximately 0.86 acre. The project is subject to Section 106 of the National Historic Preservation Act (NHPA) due to the requirement of a Federal permit from the US Army Corps of Engineers (USACE). As part of its Section 106 review (NWS-2015-0650), USACE has required completion of a cultural resources assessment (USACE 2016).

ENVIRONMENTAL AND CULTURAL SETTING

Environment

The APE is situated within the forested uplands of Mercer Island, Washington (Figure 2). The APE slopes downward towards the north and northeast towards a ravine with an east-flowing stream on the north side of the parcel (GEO Group Northwest 2015a). Elevations range from 158 feet amsl at the northeast corner of the parcel to 226 feet amsl at the south corner (GEO Group Northwest 2015a; Figure 3). The parcel has variable slopes; the residence is planned to be built near the center of the parcel, where slopes have inclinations of up to 28 percent. The APE is situated within a zone classified by King County as an Erosion Hazard.

Geologically, the APE is mapped upslope as glacial till and downslope as advance outwash. Both of these geological units were deposited during the Vashon stade of the Fraser glaciation (circa 19,000 to 16,000 years ago), and therefore predate the earliest evidence for people in western Washington. At the end of this last glacial period, the Lake Washington basin filled with meltwater, covering the APE and leading to the deposition of lacustrine sediments. Within the Holocene (last 12,000 years), however, the APE has not been subject to substantial mineral deposition and, instead, would be expected to have been primarily erosional. The Natural Resources Conservation Service (NRCS) classifies soils within the APE as Kitsap silt loam with 6-15% slopes, which typically is found on terraces with parent material of lacustrine deposits with a minor amount of volcanic ash (NRCS 2016).

GEO Group Northwest (2015, 2015b) has conducted geotechnical engineering studies on the parcel, including completion of three soil borings. The borings reveal: 1-2 feet of organic topsoil (humus) loose; above loose, fine to medium sand; above medium-dense sand and silty sand; above medium-dense to dense silt. The silt unit likely correlates to the Lawton "Clay" observed widely throughout the Puget Lowlands (Savage et al. 2000); this geological unit was laid down in a series of proglacial lakes and floodplains as the Vashon Lobe of the Cordilleran Ice Sheet advance southward into the region. The overlying sand units, therefore, appear to correlate to the Esperance Sand, an advance outwash deposit. Significantly, deposition of both the Lawton Clay and the Esperance Sand preceded the most recent intrusion of glacial ice into the region. The presence of organic topsoil results from natural soil formation processes.

The APE falls within the *Tsuga heterophylla* environmental zone, which encompasses most of western Washington (Franklin and Dyrness 1988). The associated native vegetation and animals suggest this area had potential for resource procurement, including access to salmonids and other fish in nearby Lake Washington.

Precontact Setting

There are no recorded precontact-era archaeological sites within or adjacent to the APE, nor have any been recorded on Mercer Island.

Ethnographic and Historic Setting

The APE is within the traditional territory of the Duwamish, who descendants are now members of the Snoqualmie, Suquamish, and Muckleshoot Tribes. During the winter months the Duwamish lived in permanent villages. Throughout the rest of the year they moved between seasonal camps for resource

procurement. Duwamish villages and camps were typically located along shorelines near outlets of freshwater streams. There were Duwamish villages along the shores of Lake Washington; however, none are recorded in the vicinity of the APE (Hilbert et al. 2001; Waterman 1922). There are several places on Mercer Island that have Native American names; these are on the shorelines and over 0.50 mile from the APE.

When surveyed in 1864, no trails, wagon roads, homesteads, or ferry landings were noted near the APE (US Surveyor General 1864). The earliest non-Native residents of Mercer Island arrived shortly afterward in the 1870s (Gellatly 1977:11). In 1895 the APE was owned by the Northern Pacific Railroad Company who logged the property by 1897 (Bureau of Land Management 1977; USGS 1897). No logging railroads, camps, or mills are known to have been within or next to the APE (USGS 1895, 1897). The APE reforested, and was under the ownership of the Northern Pacific and its subsidiary, the Northwest Improvement Company, until at least the 1930s (Anderson Map Company 1907; King County Aerial Survey 1954, 1965; Kroll Map Company 1912, 1926; Metsker Map Company 1936; Pacific Aerial Survey, Inc. 1937; USACE 1944). Residential development of the surrounding area began in the 1960s (USGS 1950, 1968, 1973). East Mercer Way is a historic-aged road; it was constructed in 1914 as Mercer Island Boulevard Road/County Road No. 987 (King County Engineers Office 1937; King County Roads n.d., 1914). There is no evidence of former buildings, structures, or objects within the APE.

PREVIOUS CULTURAL INVESTIGATIONS

Sources Reviewed

Washington Information System for Architectural and Archaeological Records Data (DAHP 2016, 2010), ethnographic studies, historic maps, landownership records, aerial photographs, and local histories.

Review Date

November 14, 2016

Cultural Resources Assessments

No assessments have been conducted within or adjacent to the APE. The only survey within 0.50 mile was in preparation for a new cellular tower; subsurface testing for this was limited to a single shovel probe (Stipe 2012). No cultural resources were identified.

Recorded Cultural Resources

No archaeological sites are located on Mercer Island. Two properties on Mercer Island are listed in the National Register of Historic Places; these are beyond 0.50 mile from the APE. No other properties have been determined eligible for listing in the National Register of Historic Places. No unevaluated historic-aged properties are located within the APE.

Immediately adjacent to the APE is the historic-aged East Mercer Way. This resource has not been recorded within the Washington State Historic Property Inventory; however, no impacts to the road are anticipated.

EXPECTATIONS

DAHP Statewide Predicative Model Classification

Moderately Low to Low Risk

ESA Expectations for Precontact Resources

Low Risk

ESA Expectations for Historic Resources

Low Risk

Summary

The DAHP Statewide Predictive Model classifies the APE as Moderately Low to Low Risk. ESA likewise considers the property to have a low risk for precontact-era cultural resources due to its upland forested location, as well as the steep, erosive slopes comprising the APE. The APE was subject to logging in 1897, which is likely to have accelerated erosion until the area became reforested. Due to the lack of historic activities beyond logging, ESA considers the APE also to have low risk for historic-era cultural resources.

RECOMMENDATIONS

Based upon the results of the survey, ESA recommends no further cultural resources work within the APE. ESA recommends the undertaking will result in No Historic Properties Affected.

Limitations of this Review

In the event that cultural resources are observed during implementation of the project then work should be temporarily suspended at that location and a professional archaeologist should be consulted. Pursuant to RCWs 68.50.645, 27.44.055, and 68.60.055, if ground disturbing activities encounter human skeletal remains during the course of construction, then all activity will cease that may cause further disturbance to those remains and the state regulatory process must be followed.

BIBLIOGRAPHY

Anderson Map Company

- 1907 Anderson's Atlas of King County. Electronic document, <http://www.historicmapworks.com/Map/US/1250018/Page+18+++Township+24+North++Range+5+East/King+County+1907/Washington/>, accessed November 9, 2016.

Bureau of Land Management

- 1977 Township 24 North, Range 5 East Master Title Plat. Electronic document, http://www.blm.gov/or/landrecords/survey/yPlatView1_2.php?path=PWA&name=240n050em01.jpg, accessed November 9, 2016.

Department of Archaeology and Historic Preservation (DAHP)

- 2010 Statewide Predictive Model. Last updated 2010. Electronic document, <http://www.dahp.wa.gov/>, accessed November 9, 2016.

-
- 2016 Washington Information System for Architectural and Archaeological Records Data (WISAARD). Secure database, <http://www.dahp.wa.gov/>, accessed November 9, 2016.
- Franklin, Jerry F. and C.T. Dyrness
1988 *Natural Vegetation of Oregon and Washington*. Oregon State University Press, Corvallis, OR.
- Gellatly, Judy
1977 *Mercer Island: The First 100 Years*. Mercer Island Bicentennial Committee, Mercer Island.
- GEO Group Northwest, Inc.
2015a *Geotechnical Engineering Study, Proposed Residence, 5637 East Mercer Way, Mercer Island, Washington*. Prepared for William C. Summers, MI Treehouse, LLC, Medina, WA. On file, ESA, Seattle, WA.
2015b *Response to September 3, 2015, Geotechnical Third Party Review Letter, Proposed Residence, 5637 East Mercer Way, Mercer Island, Washington*. Prepared for William C. Summers, MI Treehouse, LLC, Medina, WA. On file, ESA, Seattle, WA.
- Hilbert, Vi, Jay Miller, and Zalmay Zahir
2001 *Puget Sound Geography: Original Manuscript from T. T. Waterman*. Lushootseed Press, Federal Way, WA.
- King County Aerial Survey
1954 Aerial Photograph, Township 24 North, Range 5 East, Section 19. Electronic document, <http://info.kingcounty.gov/transportation/kcdot/roads/mapandrecordscenter/mapvault/Default.aspx?DocId=DzDQf7k0ZRUI>, accessed November 9, 2016.
1965 Aerial Photograph, Township 24 North, Range 5 East, Sec 19. Electronic document, <http://info.kingcounty.gov/transportation/kcdot/roads/mapandrecordscenter/mapvault/Default.aspx?DocId=a1LajZPrXM1>, accessed November 9, 2016.
- King County Engineers Office
1937 Mercer Island. Electronic document, <http://info.kingcounty.gov/transportation/kcdot/roads/mapandrecordscenter/mapvault/Default.aspx?DocId=YpYKOjkOBg1>, accessed November 9, 2016.
- King County Roads
n.d. Road Establishment Map T24N R5. Electronic document, <http://info.kingcounty.gov/transportation/kcdot/roads/mapandrecordscenter/mapvault/Default.aspx?DocId=WJH8j9HOFz81>, accessed November 9, 2016.
1914 Road History Packet: Mercer Island Blvd. / County Road No. 987. Electronic document, <http://info.kingcounty.gov/transportation/kcdot/roads/mapandrecordscenter/mapvault/Default.aspx?DocId=wdnEIwnsJdU1>, accessed November 9, 2016.
- Kroll Map Company
1912 Kroll's Atlas of King County. Electronic document, <http://www.historicmapworks.com/Map/US/503569/Township+24+N+Range+5+E/King+County+1912/Washington/>, accessed November 9, 2016.

1926 Kroll's Atlas of King County. Electronic document, <http://www.historicmapworks.com/Map/US/1610887/Plate+018+++T++24+N+++R++5+E+++Lake+Washington++Lake+Sammamish++Mercer++Newport++New+Castle/King+County+1926/Washington/>, accessed November 9, 2016.

Metsker Map Company

1936 Metsker's Atlas of King County. Electronic document, <http://www.historicmapworks.com/Map/US/1260041/Township+24+N+++Range+5+E+++Mercer++Coal+Creek++New+Castle++Sammamish+Lake/King+County+1936/Washington/>, accessed November 9, 2016.

Natural Resources Conservation Service (NRCS)

2016 Web Soil Survey. Electronic document, <http://websoilsurvey.nrcs.usda.gov/app/HomePage.htm>, accessed November 9, 2016.

Pacific Aerial Surveys, Inc.

1937 Aerial Photograph, Township 24 North, Range 5 East, Sec 19. Electronic document, http://info.kingcounty.gov/transportation/kcdot/roads/mapandrecordscenter/mapvault/Default.aspx?DocId=wGMJat4d_gA1, accessed November 9, 2016.

Savage, W.Z., M.M. Morrissey, and R.L. Baum

2000 *Geotechnical Properties for Landslide-Prone Seattle-Area Glacial Deposits*. USGS Open File Report 00-228. US Geological Survey, Denver, CO.

Stipe, Frank

2012 *SEA SMI Alt. 2 Cellular Facility*. Prepared by TetraTech, Bothell, WA. Prepared for Verizon Wireless. On file, DAHP, Olympia, WA.

Troost, Kathy G., Derek B. Booth, and William T. Laprade

2003 Quaternary Geology of Seattle. In *Western Cordillera and Adjacent Areas*, edited by Terry Swanson, pp. 267-284. Field Guide No. 4. Geological Society of America, Boulder, CO.

US Army Corps of Engineers (USACE)

2016 Letter from Kaitlyn White, USACE, to Ed Sewall, Sewall Wetland Consulting, Inc., dated August 1, 2016.
1944 Line 21, Number 25. Aerial photograph. On file, University of Washington Libraries, Seattle, WA.

US Geological Survey (USGS)

1895 *Snohomish, WA, 30' Series Quadrangle*. US Geological Survey, Reston, VA.
1897 *Snohomish, WA Land Classification Sheet, 30' Series Quadrangle*. US Geological Survey, Reston, VA.
1950 *Mercer Island, WA, 7.5' Series Quadrangle*. US Geological Survey, Reston, VA.
1968 *Mercer Island, WA, 7.5' Series Quadrangle*. US Geological Survey, Reston, VA.
1973 *Mercer Island, WA, 7.5' Series Quadrangle*. US Geological Survey, Reston, VA.

US Surveyor General

1864 Township 24 North, Range 5 East Survey Map. Electronic document,
http://www.blm.gov/or/landrecords/survey/yPlatView1_2.php?path=PWA&name=t240n050e_001.jpg, accessed November 9, 2016.

Waterman, T. T.

1922 The Geographical Names Used by the Indians of the Pacific Coast. *Geographical Review* 12 (2):175-194.

ATTACHMENTS

- Figure 1. 5637 East Mercer Way – Area of Potential Effects
- Figure 2. 5637 East Mercer Way – Aerial Photo
- Figure 3. 5637 East Mercer Way – Topography
- Figure 4. 5637 East Mercer Way – Geology
- Figure 5. 5637 East Mercer Way – Soils
- Letter from Kaitlyn White, USACE, to Ed Sewall, Sewall Wetland Consulting, Inc., dated August 1, 2016.

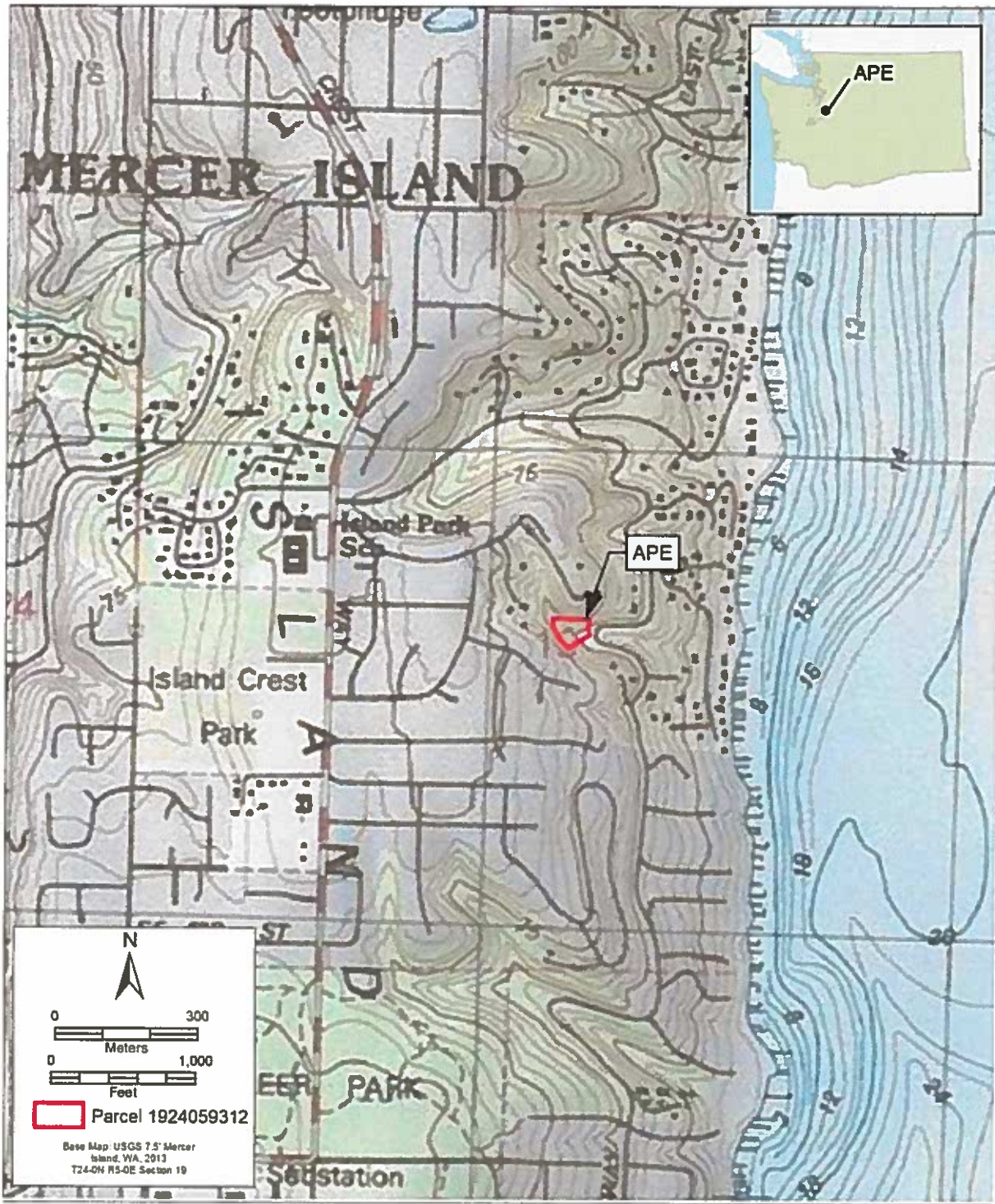


Figure 1
5637 East Mercer Way – Area of Potential Effects



Figure 2
5637 East Mercer Way – Aerial Photo

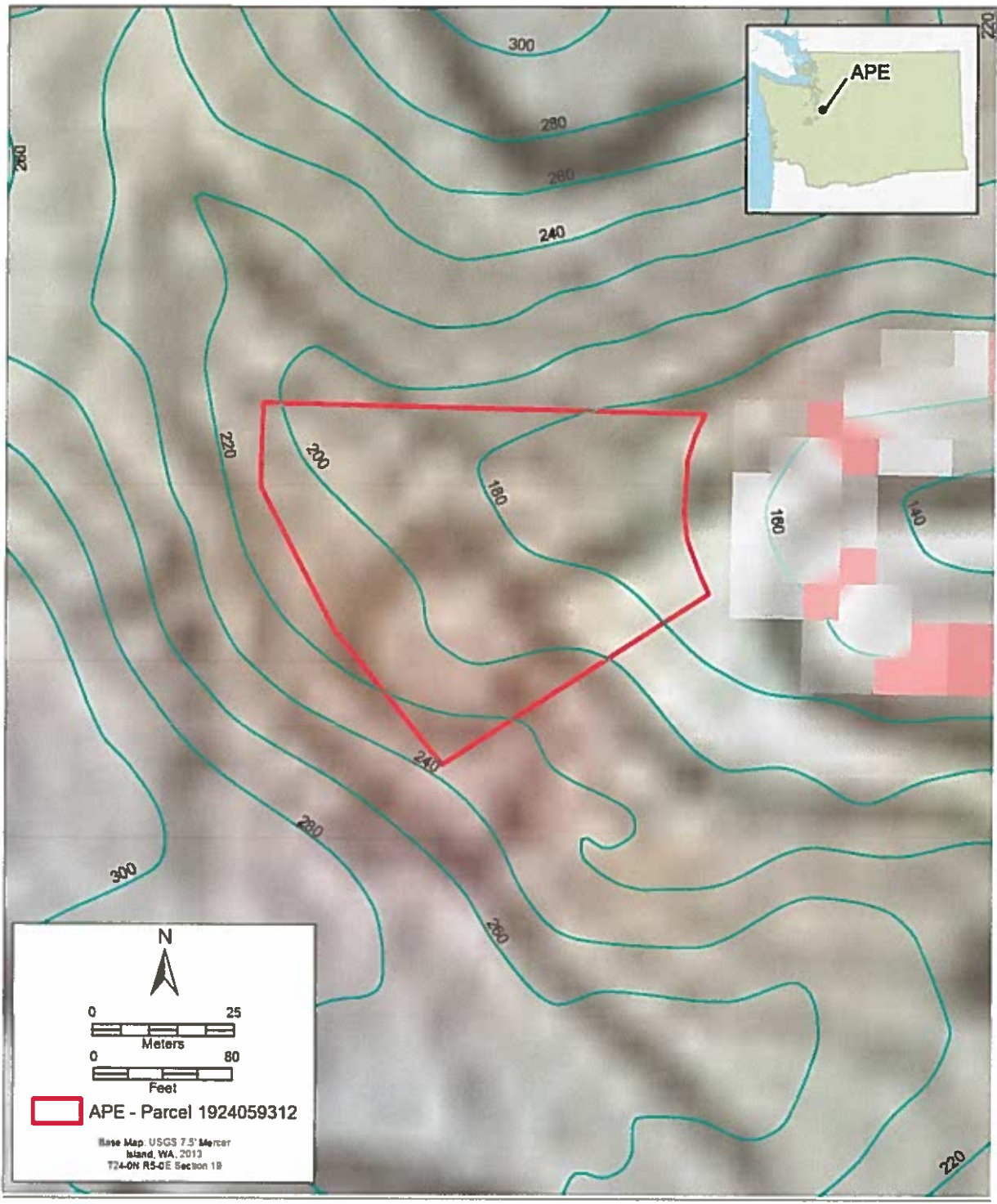
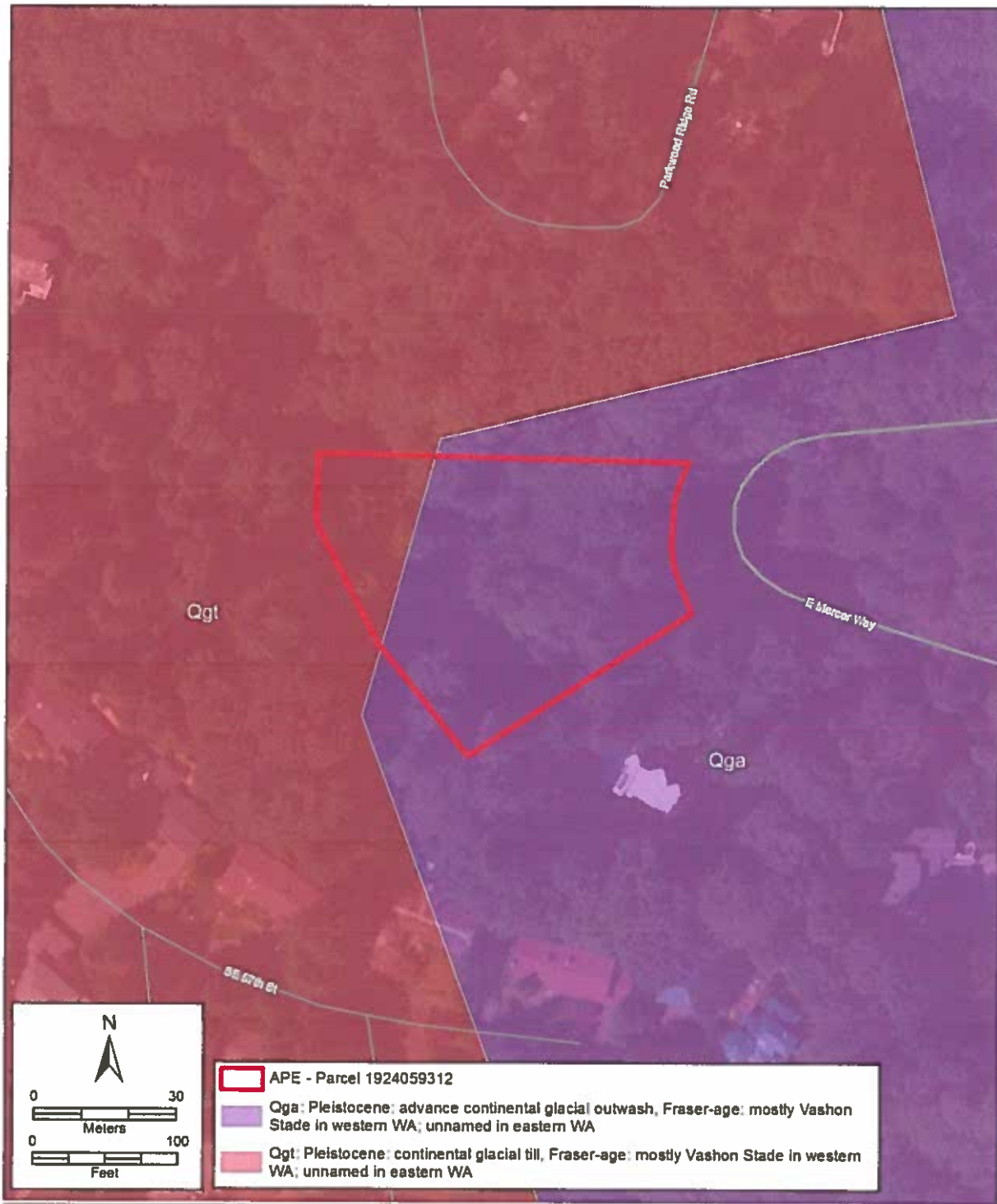
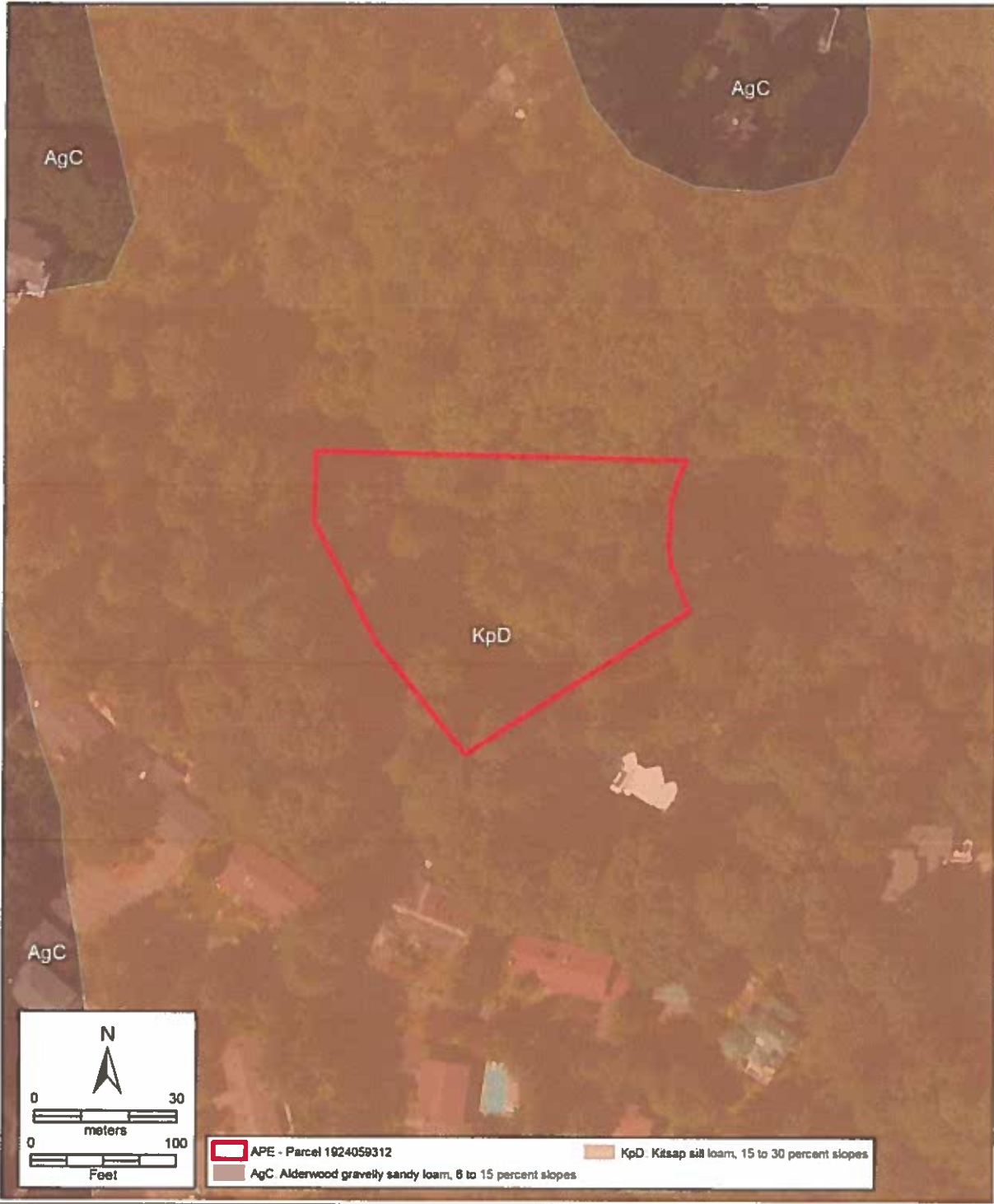


Figure 3
5637 East Mercer Way – Topography



SOURCE: Washington Department of Natural Resources, 2016

Figure 4
5637 East Mercer Way – Geology



SOURCE. Washington Department of Natural Resources, 2016

Figure 5
5637 East Mercer Way – Soils



REPLY TO
ATTENTION OF

DEPARTMENT OF THE ARMY
SEATTLE DISTRICT, CORPS OF ENGINEERS
P.O. BOX 3755
SEATTLE, WASHINGTON 98124-3755

Regulatory Branch

August 1, 2016

Mr. Ed Sewall
Sewall Wetland Consulting, Inc.
P. O. Box 880
Fall City, Washington 98024

Reference: NWS-2015-0650
Summers, Bill

Dear Mr. Sewall:

We are reviewing your client's your application to place fill in 2,000 square feet of Wetland A to construct a single-family house at Mercer Island, Washington. Additional information is required to complete the application.

In accordance with Section 106 of the National Historic Preservation Act, Federal agencies, such as the U.S. Army Corps of Engineers (Corps), are required to take into account the effects of any permitted action to historic properties, which includes both archaeological resources on the surface or below ground, as well as historic buildings and structures that are listed in, or eligible for listing in the National Register of Historic Places (NRHP). Based on available information, we believe the work proposed in the permit application has the potential to cause effects to historic properties. You will need to have a qualified individual or firm conduct a cultural resource assessment to identify historic properties located in the project area. Many consulting firms have qualified staff that can prepare the cultural resources assessment.

Our regulations at 33 CFR, Part 325, Appendix C, list the criteria for the areas that must be included in an assessment. Based on the current information, the area to include in the assessment for this permit application includes the entire project area. All historic properties, including both archaeological resources and standing structures (whether deteriorated or not) in the project area that are over fifty years old, must be recorded on either a Washington State Department of Archaeology and Historic Preservation (DAHP) Archaeology Site Inventory Form or a Historic Property Inventory Database Form, as appropriate. The assessment and recording forms must be completed by a qualified archaeologist, architectural historian, or an appropriate historic preservation specialist. The consultant that completes the assessment will provide you with a cultural resources inventory report, which will need to satisfy DAHP report requirements.

Information on archaeological and historic site surveys and reporting forms are available on the DAHP website at: www.dahp.wa.gov/.

The cultural resources assessment and report must be designed to provide enough information for the Corps to determine the NRHP eligibility of historic properties and to assess the potential effects of the proposed project to those properties. Depending upon the results of this assessment, it is possible that some additional work or evaluative testing may be required. If we determine the proposed project has the potential to adversely affect historic properties, additional consultation will be required to avoid, minimize, or mitigate the adverse effects.

Please complete the assessment and report, which must include a DAHP cover sheet and site recording forms. We require one unbound paper copy and one electronic PDF copy provided via email or on a CD. Please submit all of the required information within 30 days of the date of this letter. After receiving this information, I may contact you to discuss specific aspects of your proposal. If you do not submit the required information or contact me within 30 days, the application will be canceled. However, cancellation of the application would not preclude you from submitting another application in the future.

In addition, as part of the application review process, we notify Native American tribes about proposed projects that may impact their treaty rights. In the mid-1850s, the United States entered into treaties with a number of Native American tribes in Washington. These treaties guaranteed the signatory tribes the right to take fish at usual and accustomed grounds and stations in common with all citizens of the territory. The court also found that the Treaty tribes had the right to take up to 50 percent of the harvestable anadromous fish runs passing through those grounds, as needed to provide them with a moderate standard of living and the tribes have a right to take shellfish. Over the years, the courts have held that this right includes tribe's access to their "usual and accustomed" fishing grounds. More than *de minimis* impacts to their access to usual and accustomed fishing areas may violate this treaty right.

The U.S. Army Corps of Engineers (Corps) must analyze your proposed project with respect to its effects on the treaty rights described above to ensure (1) that it will not interfere with access to usual and accustomed fishing grounds or with fishing activities or shellfish harvesting; (2) that it will not cause the degradation of fish runs and habitat; and (3) that it will not impair a tribe's ability to meet moderate living needs.

In order to evaluate your client's project and determine any potential effects on fisheries resources, the Muckleshoot Indian Tribe (Tribe) has requested copies of the following documents before for review:

1. The Wetland/Stream Delineation Report
2. Other impact assessment documents (such as an In-Lieu Fee Use Plan)

I will need to address this request before a permit decision can be made. We encourage you to work directly with the Tribe to resolve their concerns. The Tribe can be contacted by email at KWalter@muckleshoot.nsn.us or by phone at (253) 876-3116.

To resolve their concerns, the Tribe may recommend changes to your project or ask that you agree to certain conditions. You are responsible for contacting me and updating the application materials if there are changes to the project as a result of your coordination with the Tribe. If objections are resolved as part of your coordination, please request that the Tribe withdraw their objections in a letter to the Corps.

If objections are not resolved, you may request that we make a decision on your application over unresolved objections. State your reasons why the permit should be issued over objections. We will gather and analyze the information available to determine if the impacts on the Tribe are more than *de minimis* and finalize our permit decision. The Corps has the ultimate authority to determine if the proposed project exceeds the *de minimis* threshold, whether the permit should be issued or denied, and if special conditions should be added to the permit.

Please notify us within 30 days of the date of this letter whether you want to withdraw your application or whether you want us to complete a permit decision in light of the unresolved objections. If you are still coordinating with the Tribe, please provide us a status update within the 30 days.

If we do not hear from you in 30 days, the permit application will be canceled. However, cancellation of the application would not preclude you from submitting another application in the future. A copy of this letter will be furnished to Mr. Bill Summers, at P. O. Box 261, Medina, Washington 98039. If you have any questions, please contact me at: kaitlyn.r.white@usace.army.mil or at (206) 316-3156.

Sincerely,



Kaitlyn White, Project Manager
Regulatory Branch