September 23, 2021



Ripple Design Studio Attention: Jim Dearth 4303 Stone Way North Seattle, Washington 98103 PO Box 1721 Issaquah, Washington 98027 (425) 677-7166 www.evergreenarc.com

Regarding: Review of Type Ns Watercourse 8557 85th Avenue SE – Mercer Island, Washington

Jim,

On September 22, 2021, I reviewed the developed residential property located at 8557 85th Avenue SE, the three developed residential properties located to the north, and the adjoining public right-of-ways. The purpose of this work was to screen the local area for the presence of a watercourse mapped by the City of Mercer Island. Prior to completing this work, I reviewed a recent topographic survey completed for 8557 85th Avenue SE as well as GIS information available on the City of Mercer Island's website. This letter summarizes my findings and conclusions. Attached to this letter is a map showing the location of discussed drainage features and stormwater infrastructure.

Background:

The City of Mercer Island recently requested a determination regarding watercourse type and buffer for a mapped channel segment located adjacent to 8557 85th Avenue SE. The channel segment is identified as SD-GM-04600 on the City of Mercer Island's *GIS Portal* and is described as a private earthen "open watercourse" that was installed in 1959. The mapped channel segment is shown between a 12 inch diameter concrete pipe outfall (#SD-GM-04599) located near E Mercer Way and a 12 inch diameter CMP culvert (#SD-GM-04601) located near 85th Avenue SE. The channel segment is mapped as a Type Ns watercourse.

Findings:

- The mapped channel segment #SD-GM-04600 does not exist. Stormwater outfall #SD-GM-04599 exists near the northwest corner of 8557 85th Avenue SE at the base of gabion retaining wall. Topography slopes to the southeast away from the outfall and comprises a mix of retained native vegetation, landscaping, and residential development. There is no defined channel, swale, or evidence of hydraulically sorted gravel downslope of the outfall within 8775 85th Avenue SE or on the adjoining three parcels to the north.
- The 12 inch diameter CMP pipe #SD-GM-04601 does not exist in the northeast corner of 8557 85th Avenue SE. A 6 inch diameter PVC pipe is the only pipe draining to catch basin #SD-CB-36-8. The PVC pipe is associated with on-site driveway stormwater control.
- 3. Ditches located along E Mercer Way and 85th Avenue SE are shallow man-made roadside ditches

that do not exist within the location of a historic stream. The ditches appear to convey solely stormwater generated by the adjacent roadways. Natural streams, wetlands, or similar aquatic features are not known to drain to either ditch.

4. The project site is not physically connected to Type S, F or Np waters by an above ground channel system. Drainage along 85th Avenue SE is conveyed to Lake Washington by a short roadside ditch as well as a longer series of stormwater control pipes and catch basins.

Conclusions:

- 1. The mapping of SD-GM-04600 and SD-GM-04601 appears to either be a mapping error or may simply represent historic conditions that no longer exist.
- 2. Because a watercourse does not exist within or adjacent to 8557 85th Avenue SE, buffers or setbacks per MICC 19.07.180 are not applicable to the site.

Within the limitations of scope, schedule, and budget, the critical area consulting services summarized in this report conform to the generally accepted standard of care in effect at the time the work was conducted. No other warranty, expressed or implied, is made. The purpose of the work summarized in this report is to define site conditions per City of Mercer Island critical area regulations in effect at the time of report preparation. All opinions presented in this report should be considered preliminary until reviewed and confirmed by the City of Mercer Island.

I trust that this report meets your present needs. If you have any questions regarding the information presented in this report or require additional assistance with this project, please do not hesitate to call me at (425) 677-7166 or email me at psuper@evergreenarc.com.

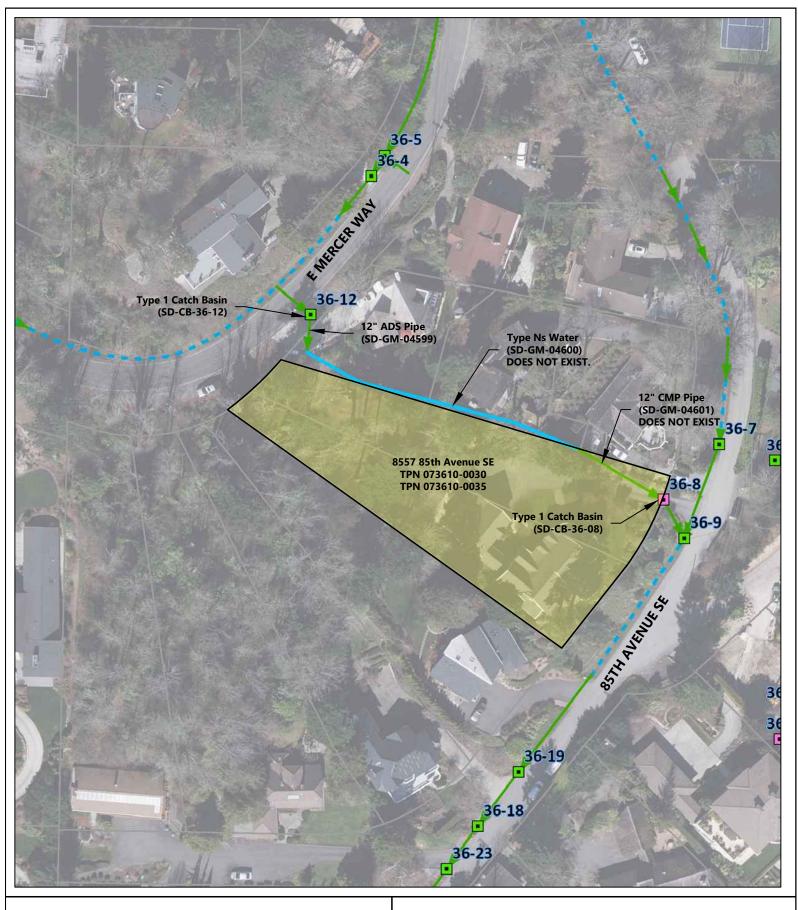
EVERGREEN AQUATIC RESOURCE CONSULTANTS, LLC

Issaquah, Washington

Peter P. Super Professional Wetland Scientist



Attachment 1 – Drainage Features



Drainage Features

8557 85th Avenue SE Mercer Island, Washington

Evergreen Aquatic

09/23/2021 Atta

Attachment 1