



June 28, 2021

G-5244

Ms. Danielle Rawson  
Suyama Peterson Deguchi  
8601 Eighth Avenue S.  
Seattle, Washington 98108

Subject: Geotechnical Review of Project Construction Plans, New Residence,  
5401 West Mercer Way, Mercer Island, Washington

Dear Ms. Rawson:

Per your request, GEO Group Northwest, Inc. has reviewed the construction plans dated March 16, 2021 and March 17, 2021 for the proposed new residence at the above-subject location on Mercer Island, Washington. We understand the City of Mercer Island has requested a geotechnical review of the drainage of the proposed exterior retaining walls west of the new house and a geologic risk statement regarding the project.

### **Wall Drainage at West Exterior Retaining Walls**

In our opinion, the use of weep holes to provide drainage for the exterior retaining walls located west of the new house is acceptable from a geotechnical perspective. We recommend that the weep holes have a minimum diameter of 2 inches and a lateral spacing of not more than 6 feet on-center. A zone of free-draining material that has a minimum thickness (i.e., width) of 12 inches should be placed against the back of these walls to provide for distribution of drainage water to the set of weep holes.

### **Geologic Risk Statement**

Per Mercer Island City Code (MICC) Section 19.07.160(B)(3)), we have reviewed the project plans with regard to the risk to the project associated with geologically hazardous areas. In our

opinion, the landslide hazard area or seismic hazard area will be modified or the development has been designed so that the risk to the site and adjacent property is eliminated or mitigated such that the site is determined to be safe.

**Closing**

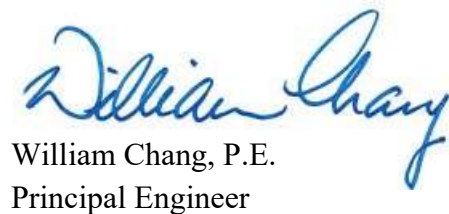
Please feel welcome to contact us if you have any questions regarding this letter.

Sincerely,

GEO GROUP NORTHWEST, INC.



Keith Johnson  
Project Geologist



William Chang, P.E.  
Principal Engineer



Cc: Ms. Tomoko Lumpkin