



## Criteria Compliance Narrative for Critical Area Review

Attn: Grace Manahan

9611 SE 36<sup>th</sup> Street

Mercer Island, WA 98040

Permit #: CA024-021

Chen Residence

5024 W Mercer Way

Mercer Island, WA 98040

### Project Description:

The proposed project involves constructing a new single-family residence at 5024 West Mercer Way, Mercer Island, Washington. The site, currently undeveloped, features a steep slope and is within designated critical areas, including Erosion and Potential Slide Critical Areas and a Steep Slope Critical Area. This narrative outlines how the application meets the review criteria outlined in MICC 19.07.090, MICC 19.07.160, MICC 19.07.170, MICC 19.07.180, and MICC 19.07.190.

### MICC 19.07.090 - Critical Area Reviews:

- **Studies Included:** Detailed wetland and stream reconnaissance study, subsurface exploration, geologic hazards assessment, and geotechnical engineering study by Associated Earth Sciences Inc. All these studies have been submitted to the City of Mercer Island under permit # CAO24-021.



- **Findings:** The reconnaissance study identified no jurisdictional wetlands or streams within the subject property. However, Stream A, located off-site to the north, was identified and is subject to buffer and setback requirements.
- **Site Plan:** Accurately delineates the boundaries of steep slopes and other critical areas, ensuring compliance with required setbacks and buffers.

#### MICC 19.07.160 - Geologically Hazardous Areas:

- **Hazard Identification:** The site includes a steep slope hazard area as indicated in the City of Mercer Island geologic hazard maps.
- **Geotechnical Report Findings:**
  - Slope Stability Assessment: The risk of landslide is low due to medium dense to dense unsaturated soils and no observed evidence of slope instability.
  - Seismic Hazards: The risk of seismically induced landslides is low. Site Class “D” should be used for seismic design according to ASCE 7 standards.
- **Mitigation Measures:**
  - Preserve native vegetation to control erosion.
  - Direct surface drainage away from slopes.
  - Design foundations to accommodate the site’s geologic conditions.
  - Implement temporary construction slopes and erosion control measures (silt fencing, interceptor swales) to prevent slope disturbance during construction.

#### MICC 19.07.170 – Fish and Wildlife Habitat Conservation Areas:

- **Applicability:** No fish and wildlife habitat conservation areas located on or adjacent to the project site. Therefore, not applicable to this project.



### MICC 19.07.180 – Watercourses:

- **Watercourse Identification:** Stream A, an off-site Type Np watercourse, requires a 60-foot buffer and a 10-foot building setback for the open channel section, and a 45-foot setback for the piped channel section.
- **Buffer and Setback Compliance:** The open channel of Stream A is located approximately 75 feet from the subject parcel, ensuring the standard watercourse buffers and setbacks do not impact the property. The buffer may extend approximately 10 feet onto the northwest portion of the property, with an additional 10-foot building setback, as per the city's GIS mapping.

### MICC 19.07.190 - Wetlands:

- **Wetland Presence:** The site does not contain any wetlands, hence no wetland buffers are required. The focus remains on other critical areas such as steep slopes.

### Additional Compliance Measures:

- **Regulation Adherence:** The project adheres to all relevant federal, state, and local regulations concerning critical areas.
- **Public Notices:** Provided in accordance with MICC requirements, allowing opportunities for public comment.

### Conclusion:

The proposed development complies with the critical area regulations outlined in MICC 19.07.090, 19.07.160, 19.07.170, 19.07.180, and 19.07.190. Through careful planning and appropriate



mitigation measures, the project ensures the protection of critical areas while allowing responsible development. The geotechnical report's recommendations will be strictly followed to maintain site stability and minimize environmental impact.