

March 3, 2022

Jeromy Hicks, Fire Marshal  
Mercer Island Fire Marshal's Office  
3030 78th Ave SE  
Mercer Island, WA 98040

**RE: Fire Code Alternate Request**

For proposed development at 4045 W Mercer Way  
Parcel #: 362350-0395

Jeromy Hicks:

This letter proposes a Fire Code Alternate Request for the above listed property from the prescriptive requirements determined at the time of the building permit application.

The project site is accessed via a shared private road that connects this single family property and several others to W Mercer Way. This shared tract facilitates an ingress/egress easement for the lots closest to Lake Washington. The private road does not meet minimum fire code access requirements. Its deficiencies include:

- 1) Width or roadway is less than 26' (12.43)
- 2) No turn-around
- 3) Hydrant is more than 600' away from all points of residence
- 4) Hydrant to access exceeds 250' (536')
- 5) Grade exceeds 10% (20% max, code alt required, and must be raked concrete entire drive)

Since the existing access road cannot be modified, we propose providing the following fire system upgrades, design features, and site characteristics to compensate for the property's deficiencies.

**Proposed System Upgrades:**

- 1) Home will be equipped with and meet all requirements of a "NFPA 13R - Plus" sprinkler system.
- 2) Upgrade to a minimum 1 1/2" minimum water meter and 2" minimum service line.
- 3) Provide a monitored "Household Fire Alarm System" per NFPA 72 Chapter 29.
- 4) Provide solid core interior doors throughout the home.
- 5) Provide 5/8" Type 'X' one-hour fire-rated gypsum wall board in all areas for walls & ceilings.
- 6) Provide fire retardant coating treatment in the 200sf of crawlspace.

**Home Design Features:**

- 1) New construction single family residence to meet or surpass all applicable jurisdictional codes.
- 2) All interior hallway widths are 4'-0" or greater for ease of egress.
- 3) The home has 3'-6" wide interior stairs.
- 4) The home has no attic space and very little crawlspace.
- 5) 82% of the roof is non-combustible metal standing seam roof. The remaining 18% of the roof is fire resistant TPO membrane roofing.

Site Characteristics:

- 1) The lot is bounded along the eastern property line with proposed permanent, concrete catchment walls that are a minimum of 6ft above finished grade. The steep terrain also prevents further development in this area.
- 2) The lot is bounded along the western property line by Lake Washington.
- 3) The lot is bounded along the northern property line by an uninhabited shared waterfront tract. The portion of this tract in closest proximity to the proposed development is a concrete pad.
- 4) The lot is bounded along the southern property line by a 10ft wide unbuildable, utility easement.

I appreciate your consideration of the above compensating factors. We believe that this proposal is an equal or better alternative to the prescriptive requirements.

Please contact me with any questions by phone at (206) 728-0480 or by email at [joey@mccarch.com](mailto:joey@mccarch.com).

Sincerely,

Joey Pasquinelli  
McClellan Architects