

SR 522 Drainage Improvements

SR 522 West A Corridor Improvement project was a large project that encompassed the central and eastern portion of the City's segment of SR 522. The planning and design of SR 522's western portion (West B) will begin in 2019.

Before the drainage improvements, majority of the water leaving SR 522 would outfall into Sammamish River or Lake Washington with no prior water quality treatment. The conveyance system was outdated and current policies now require water quality treatment. In Phase I of the project, 65th Ave through 73rd Ave was outfitted with five filter vaults and two filter manholes. These structures house between 5 and 35 StormFilter®



cartridges that remove pollutants such as total suspended solids, nutrients, dissolved metals and oil from stormwater runoff. The clean water is then discharged downstream and can safely enter Lake Washington and Sammamish River.

An additional Surface Water component of the project was constructed between 61st Ave and 65th Ave NE. The project installed several Filterra® systems designed to remove street runoff utilizing natural filtration techniques. Each Filterra has a living tree and several layers of a proprietary filtration media blend. The Filterras® utilize plant root uptake and mycorrhizal bacteria from the tree in conjunction with the mixed media filter to clean the stormwater runoff. Much of the aged conveyance infrastructure has been replaced and outfitted with water quality structures.



The StormFilter® cartridges in a filter vault

The Surface Water component of this project cost approximately \$633,500.