

# Seattle Public Utilities

## Urban Forest Management Update

April 3, 2019



# Customer Service

- Monitoring of potential hazards
- Preventative maintenance and pruning
- Hazard mitigation and removal





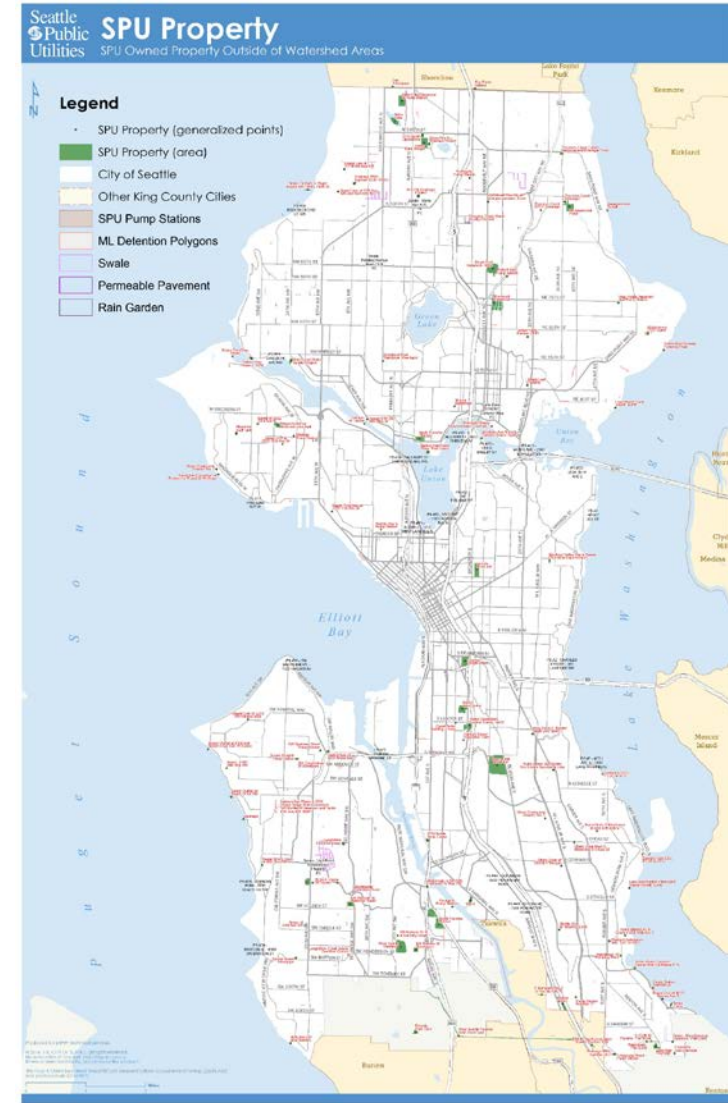
# Partnerships

- Scopes and prepares sites for volunteer and community events
- Provides on-site staff and material technical assistance and guidance for volunteer events
- Supports Citywide urban forestry work through participation in Trees for Seattle, UFMP, and GSP efforts
- Participates with community watershed groups for promotion of native riparian forest restoration



# Urban Forest and Landscape Vegetation Asset Management Inventory: Overview

- Need for inventory of SPU- managed urban forest and landscape vegetation (59 sites across the City, some sites are co-managed with SPR and/or SDOT)
- Proactive vegetation management and promotion of urban ecosystem values
- Piloted field survey in 2018 based off of custom built ArcGIS Collector application, modified approach of SDOT's street tree inventory





# Urban Forest and Landscape Vegetation Asset Management: Definition and Tools

- Vegetation assets: individual trees, tree stands, shrubs, turf
- Parameters: species (native, ornamental, or invasive), cover, height, diameter, condition, management recommendations
- Tools: forestry measurement tools, ArcGIS Collector, MS Excel, iTree Eco, vegetation identification resources, tablet, and smartphone



# Urban Forest and Landscape Vegetation Asset Management: Pilot Year Results (2018)

- 11 sites
- 463 trees
- Structure: Cover = 3.6 ac; most common = Douglas fir, incense cedar, swamp white oak; 25% native; 60% < 6" dbh
- Function: pollution removal = 188.5 lbs/yr; C sequestration = 4.3 tons; O2 production = 11.4 tons/yr; avoided runoff = 11,100 cubic ft/yr

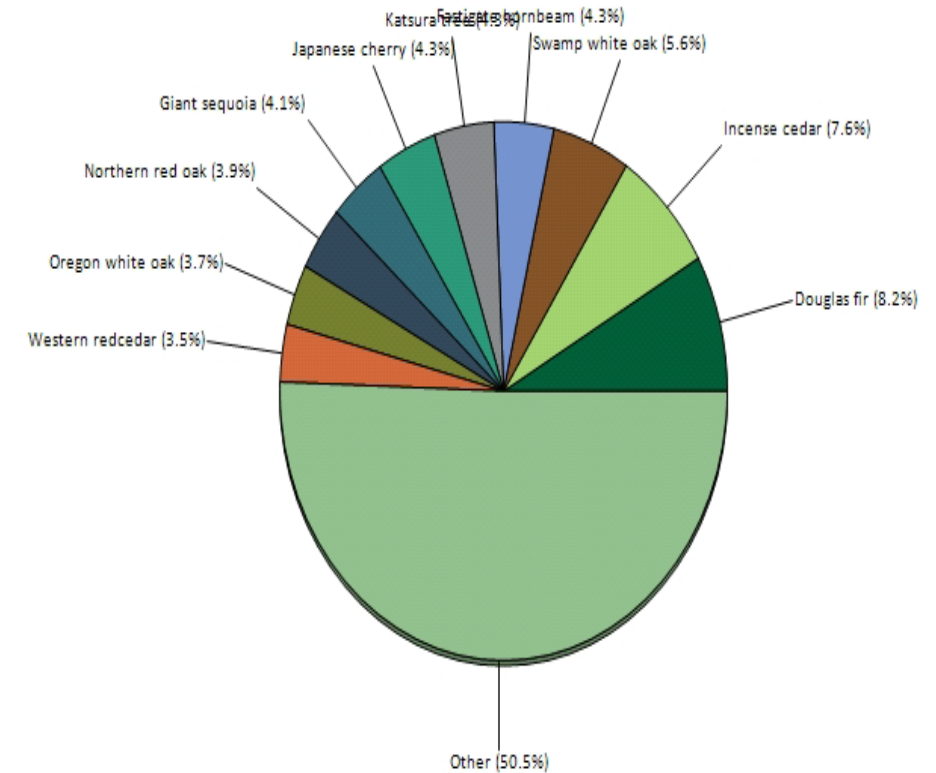


Figure 1. Tree species composition in Urban Eco

# SPU Urban Forest Goals for 2019

- Continue commitment to responsive and equitable customer service and line of business urban forestry and landscape vegetation work
- Continue support for inter-departmental and Citywide strategic efforts and native forest restoration
- Refine urban forest survey and ArcGIS Collector Urban Forest and Landscape Vegetation application
- Complete urban forest field survey for the majority of south end sites
- Re-run iTree Eco analyses for cumulative survey ecosystem structure and function