



CAPITOL LAKE — DESCHUTES ESTUARY

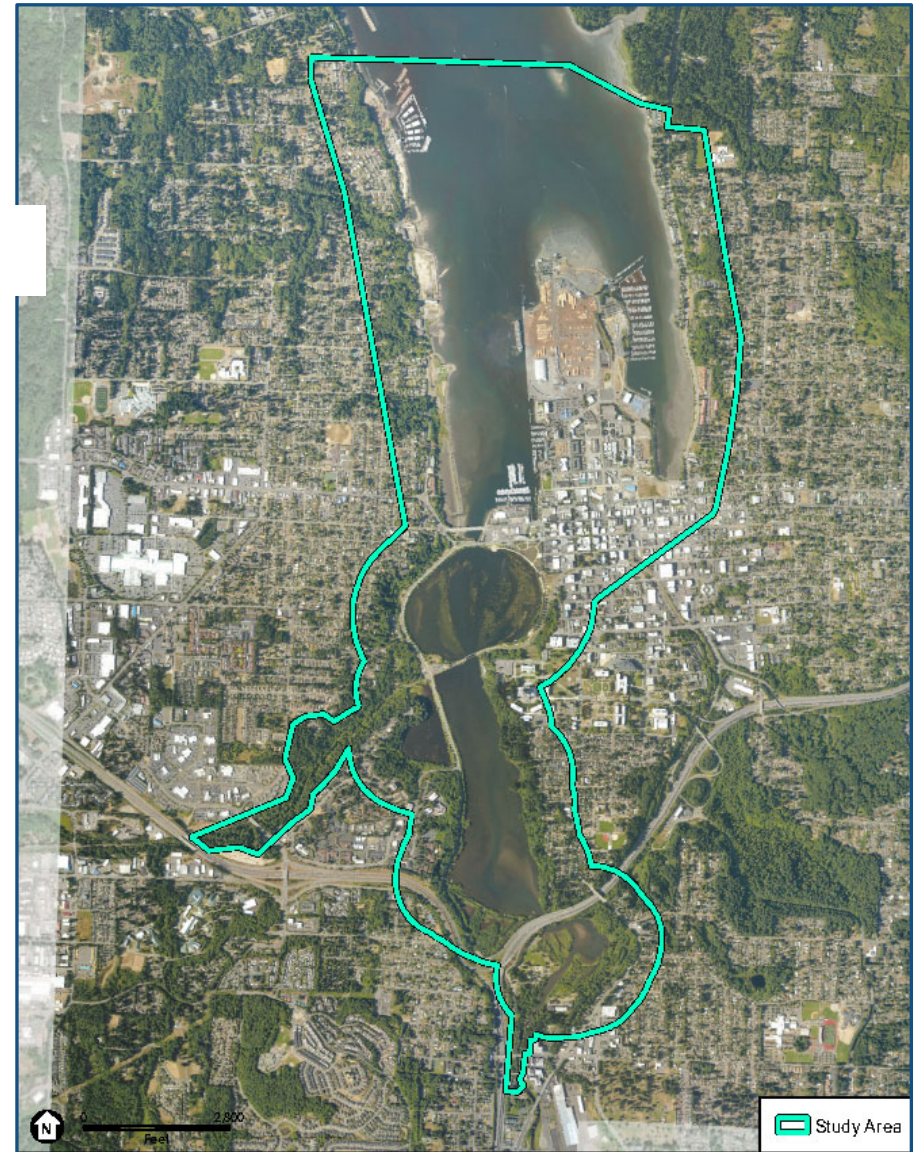
Long-Term Management Project Environmental Impact Statement

EXECUTIVE WORK GROUP

November 2019

Aquatic Invasive Species

- ✦ Proposed study area
 - Extends approximately 100 feet from the water's edge
 - Extends from Boston Harbor to Tumwater Falls
 - Includes Percival Creek up to Highway 101



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Aquatic Invasive Species – Methodology

- ✦ Analysis of existing conditions relies on existing data:
 - Site-specific data:
 - Aquatic plant survey/control reports/maps
 - NZMS surveys/control reports/maps
 - Noxious weed, WDFW, marine, and other AIS databases
 - Species-specific literature:
 - Distribution, transport, habitat, growth and impact characteristics
 - Control method effectiveness
- ✦ Existing conditions map



Aquatic Invasive Species – Analysis of Impacts

- ✦ Aquatic ecosystem and recreation impacts and benefits
- ✦ Potential impacts and benefits will be described based on:
 - Estimated change in abundance and aerial coverage for each species
 - Relative potential for transport and establishment within and outside study area
 - Control priority, eradication potential, and potential management options for each species
 - Relative effectiveness and non-target species impacts of control measures
 - Potential for short- and long-term recreational use restrictions
- ✦ Analysis will be informed by:
 - Hydrologic and sediment transport modeling
 - Specific design components associated with each alternative
 - Habitat and control zone maps



Historic and Cultural Resources – Resource Definition

- ✦ **Archaeological resources** (encompass features and deposits located on or below the ground surface that are evidence of prior human occupation or use in a particular areas – can be precontact or historic).
- ✦ **Historic resources** (elements of the built environment, such as buildings, structures, or human-made objects or landscapes)
- ✦ **Traditional Cultural Properties** (sites or locations considered culturally important to the history of a group of people, or are locations where culturally important events or practices are known to have occurred).



Historic and Cultural Resources – Information Sources

✦ Primary Sources

- Meeting with Tribes, DAHP, and other stakeholders

✦ Desktop Sources

- Compile base data of previous surveys, inventories, and historic records

✦ Fieldwork

- Windshield survey and walkthrough to assess existing conditions
- Historic resource surveys to prepare historic property inventory (HPI) of resources, including Capitol Lake, the 5th Avenue Bridge, the Capitol Lake Dam, and railroad bridge trestle



Archaeological Resources – Approach

✦ Process

- Gather data on recorded sites
- Identify areas where potential sites may be located
- Identify areas of previous fill - fill modeling based on existing geotech data, previous work by Squaxin Island Tribe/City of Olympia, historic shoreline maps
- Determine impacts by evaluating if construction and operations will affect resources listed or eligible for listing in the National Register or Historic Places or are protected under Washington State law



Historic Resources (Built Environment) – Approach

✧ Process

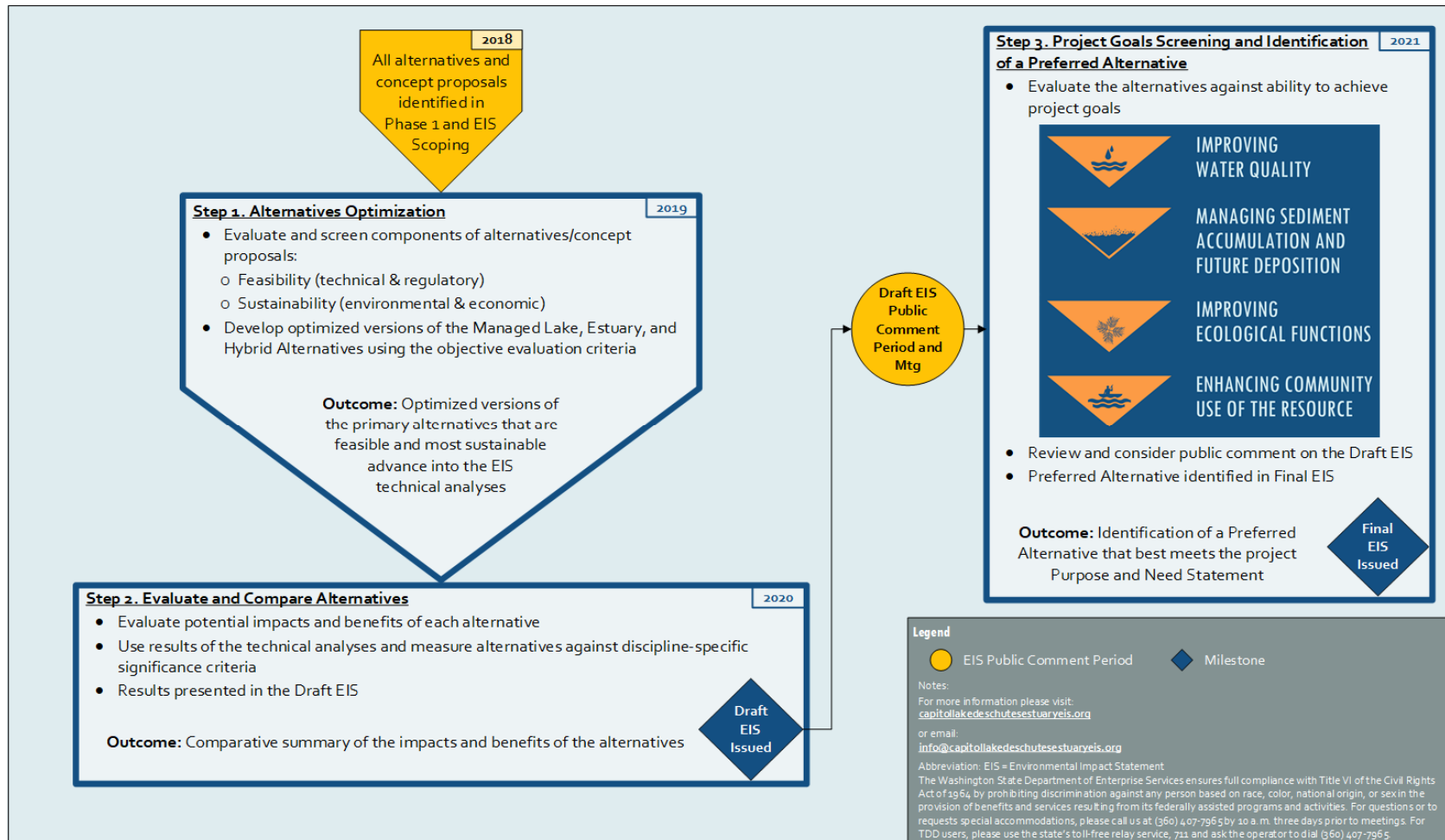
- Develop historic context, evaluate connections, relationships
- Provide recommendations for eligibility using this data
- Conduct analysis of impacts

✧ Key Elements

- Deschutes Estuary
 - Modified natural feature
 - Relationship with Olympia and Tumwater
- Capitol Lake
 - Designed landscape, 1937 Session Laws
 - Relationship with Olympia and Tumwater
 - Relationship with Wilder & White and the Olmsted Brothers
- Railroads
 - Trestles, track segments/causeway
- City of Olympia
 - Historic districts; listed and inventoried properties
- City of Tumwater
 - Historic district; listed and inventoried properties
- West Capitol Campus
 - Historic district, listed and inventoried properties



Measurable Evaluation Process



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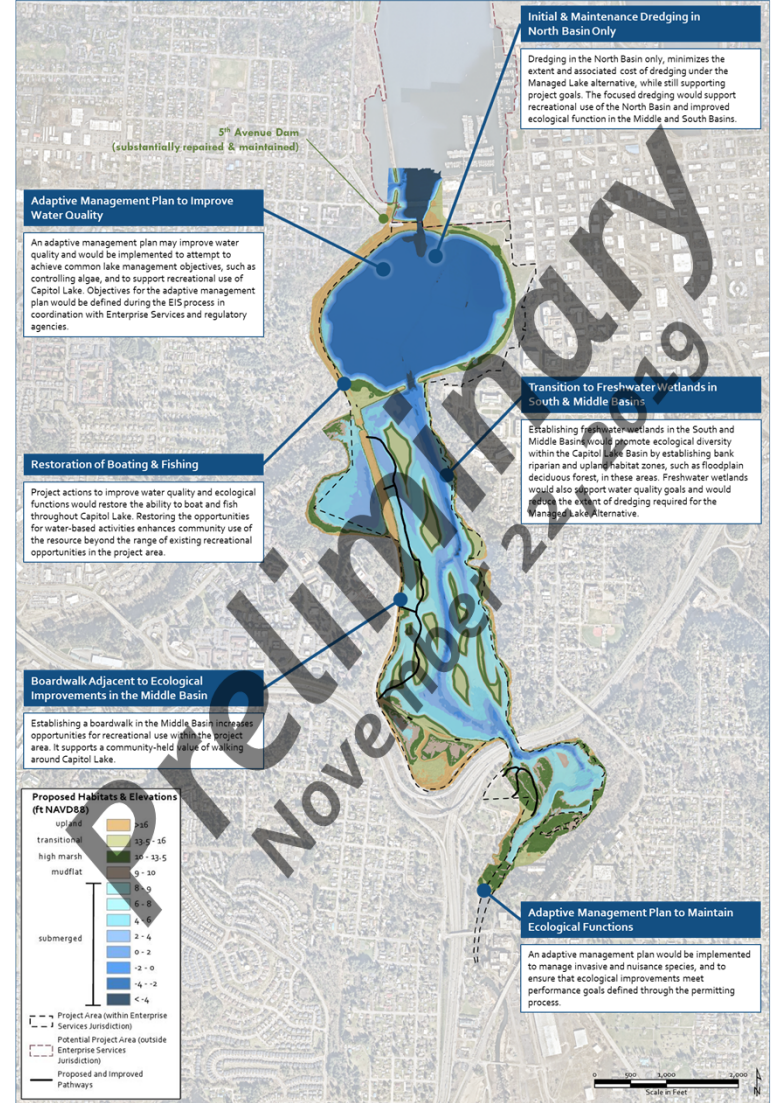
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DRAFT – Optimized Alternatives

Managed Lake Alternative

Managed Lake Alternative

The optimized alternatives were developed through a measurable evaluation process and will be evaluated in the Draft EIS. The components for each alternative are subject to change or evolve as the EIS analysis proceeds and more information is available.



Project Goals: Improve Water Quality Manage Sediment Accumulation & Future Deposition Improve Ecological Functions Enhance Community Use of the Resource **DRAFT**



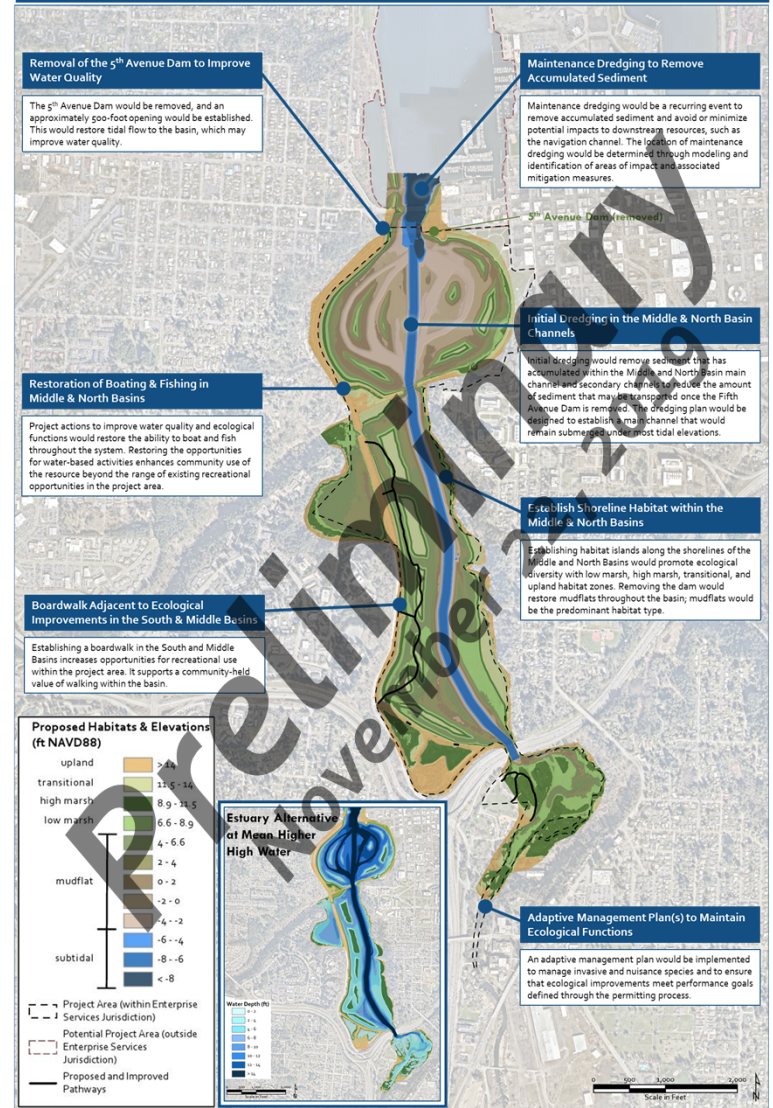
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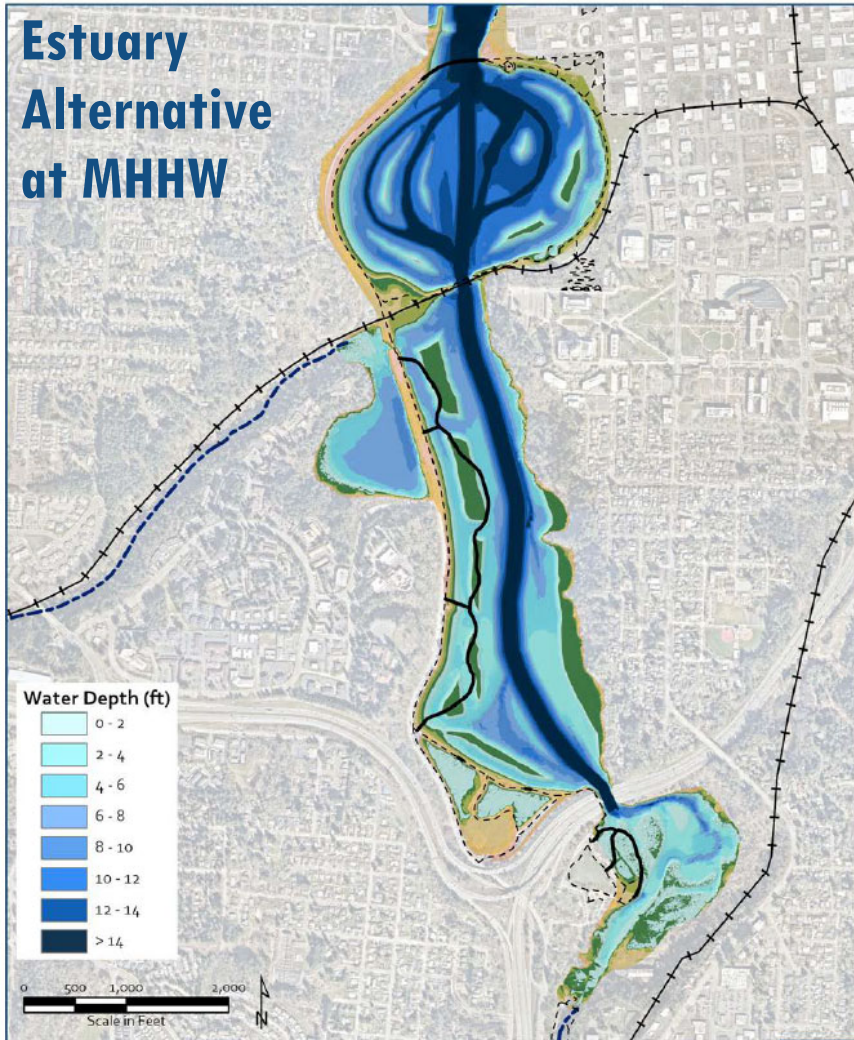
Estuary Alternative

Estuary Alternative

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Estuary Alternative at MHHW



Estuary Alternative at MLLW



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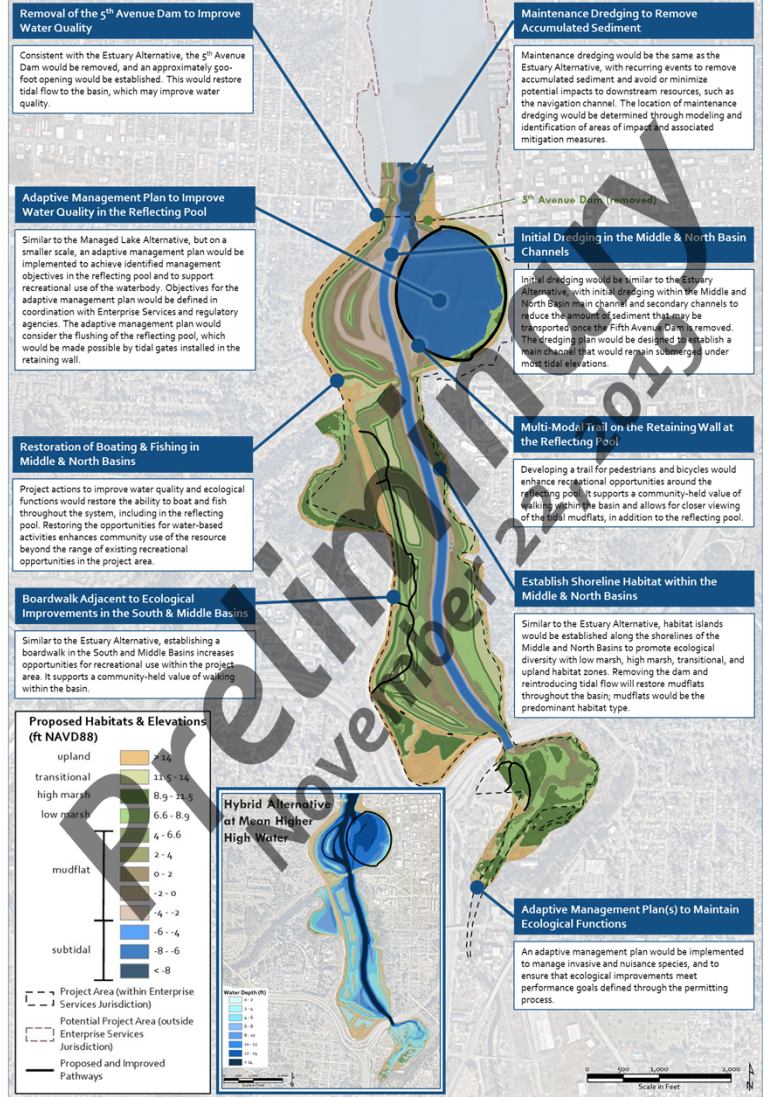
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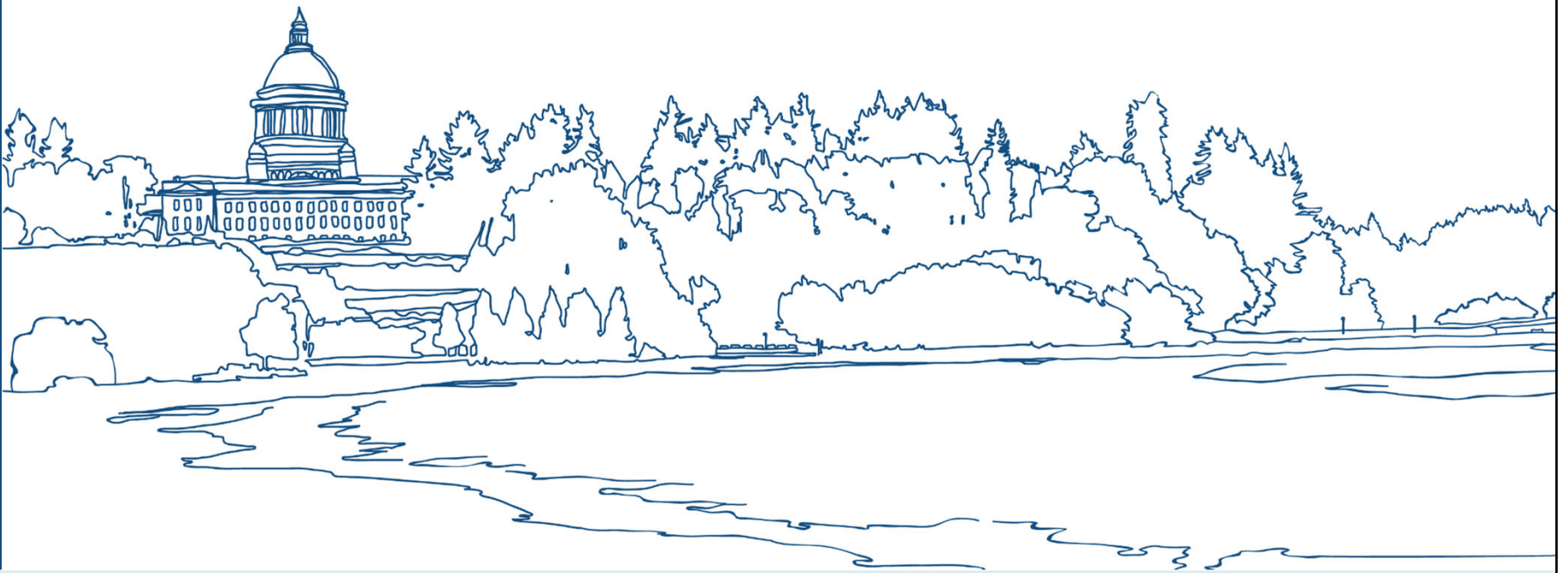
Hybrid Alternative

Hybrid Alternative

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Questions?



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