

SR 520 Program

2014 West Side Design Refinements

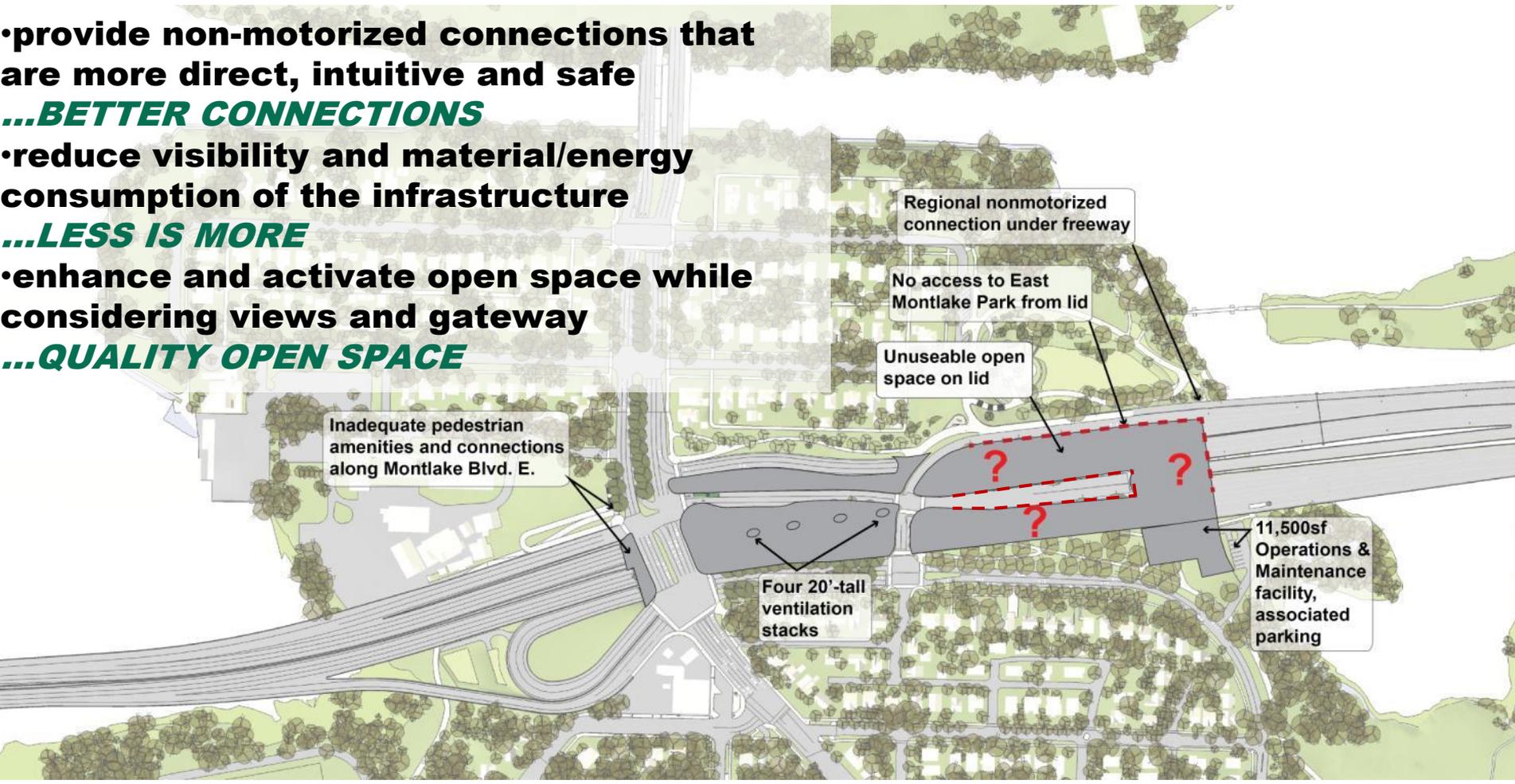
Today's Presentation

1. Mayor's Objective
2. Background and Project History
 - Council Resolution 31427
3. Seattle Design Commission Recommendations
4. Public Input and Next Steps

Montlake Lid Area – Baseline Design

Problem Statement

- provide non-motorized connections that are more direct, intuitive and safe
...BETTER CONNECTIONS
- reduce visibility and material/energy consumption of the infrastructure
...LESS IS MORE
- enhance and activate open space while considering views and gateway
...QUALITY OPEN SPACE



Seattle Design Commission

2014 SR 520 Design Review Process

Seattle Design Commission

2014 Review Process

3 Commission meetings

5 Subcommittee meetings

Commission focus and goals:

- Support Resolution 31427
- Continued support for 2012 *Seattle Community Design Process*
- Advocate for smart design
- Support WSDOT *Least Cost Planning* focus
- Interagency cooperation key to design excellence

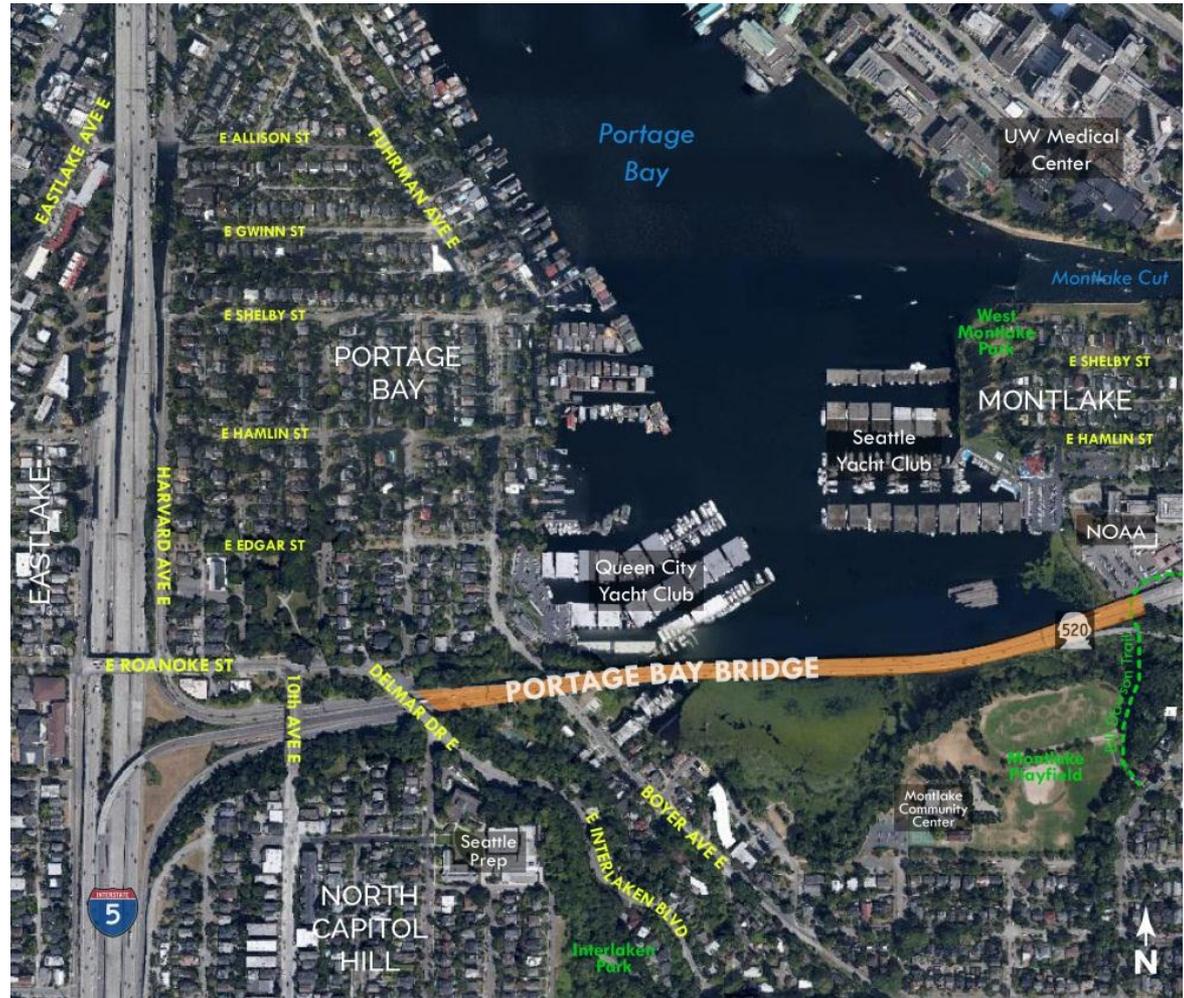


Thanks to WSDOT and City teams

Portage Bay

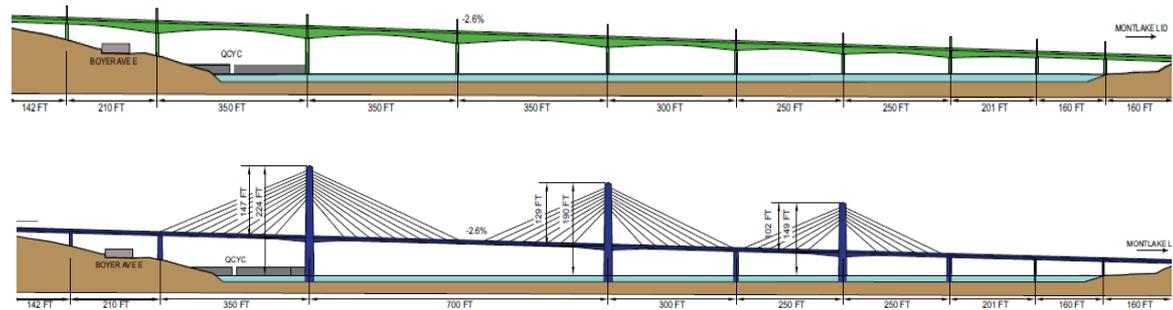
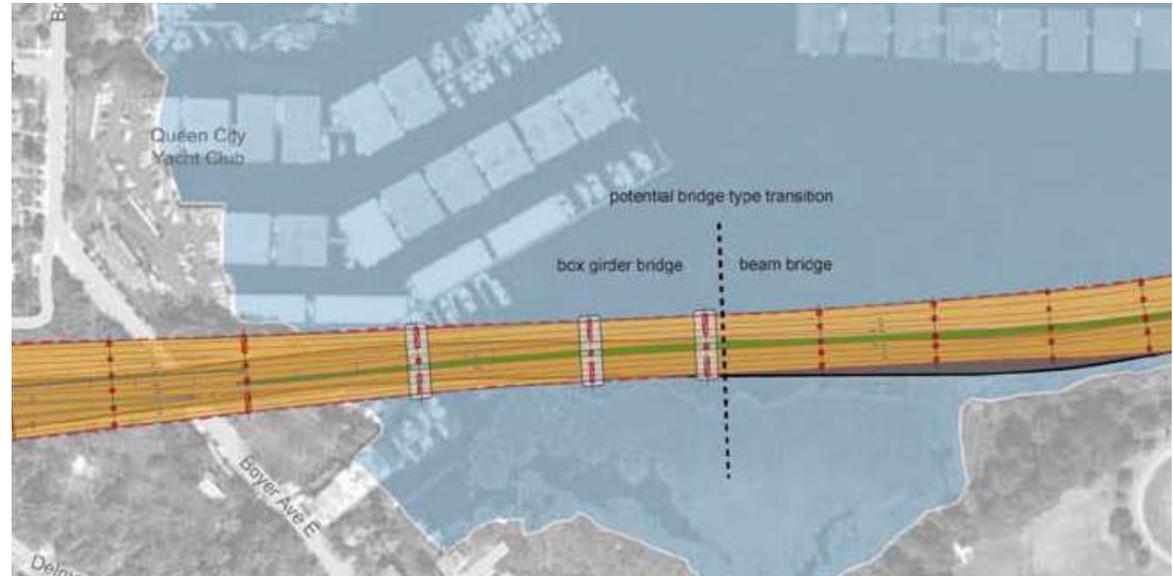
Context

- Confluence of hills, water, and wetlands
- Confluence of residential, institutional, and recreational uses
- Link between SR 520 and I-5
- Part of a network of Seattle bridges



Overall Portage Bay Bridge Recommendations

- Accommodate the needs of all users
- Fit bridge within the larger SR 520 corridor experience
- Create a timeless design
- Enhance the Portage Bay context:
 - Bridge should appear light and graceful
 - Minimize appearance of bridge deck and columns
 - Integrate bridge landings with adjacent neighborhoods
 - Retain bridge deck separation to increase natural light



Cable Stay

Analysis

Benefits

- Less structure bulk below deck
- Thinner bridge deck and refined under-bridge appearance
- Iconic vertical presence

Challenges

- Tower and cabling system overpowers Portage Bay
- Beam bridge component detracts from cable stay benefits

Recommendations

- Least appropriate for this location given context and project considerations
- Additional design investigation could result in a more appropriate solution



June 17, 2014: Tall single-tower bridge viewed from University Bridge



July 17, 2014: Three towers of varied heights viewed from University Bridge

Box Girder

Analysis

Benefits

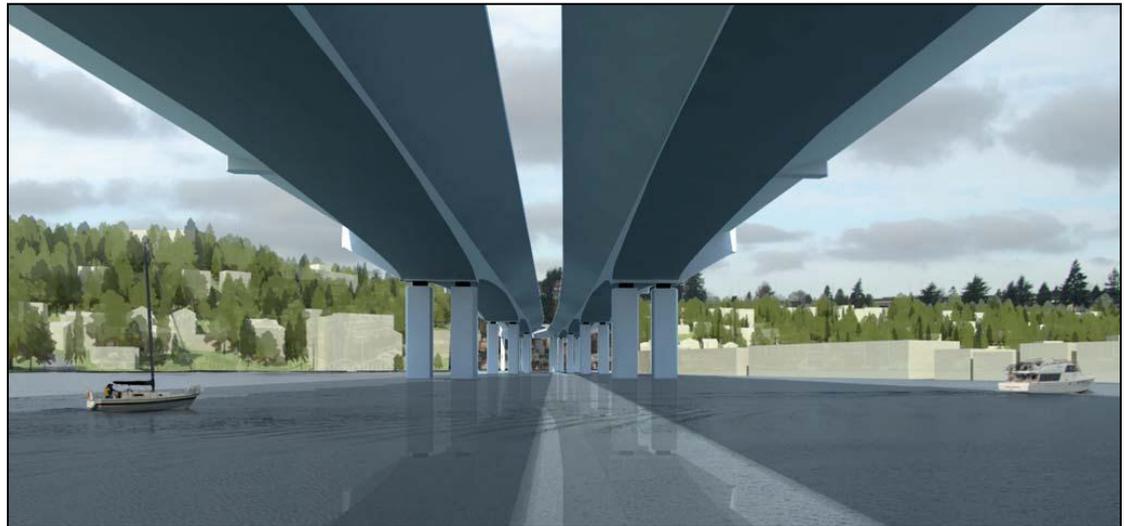
- A horizontal structure — could be designed to fit lightly on the site
- Columns reduced from EIS baseline to reduce visual clutter
- More cost effective — allows for a more contextual solution

Challenges

- Could easily become a utilitarian highway solution that dominates the context
- Increased bulk at or below deck
- Requires attention to reduce visual impact of bridge underside



View of box girder bridge looking east from Delmar Drive E



View of underside of box girder bridge from Portage Bay

Box Girder

Analysis

- Create a distinctive and contextual design
- Be contemporary and not historicist
- Best potential for success
- Requires adequate funding to prevent heavy, boxy highway appearance
- Designers and planners must play a lead role



View of box girder bridge from University Bridge

Montlake Lid

Context

SR 520 divides two neighborhoods:
Shelby-Hamlin to the north and
Montlake to the south.

- Residential neighborhood
- Gateway to the University of Washington
- Multimodal connectivity
- Freeway, transit, bikes and pedestrians
- Natural and urban landscapes



Looking southwest above Foster Island — Shelby-Hamlin to the right and Montlake in the background

Montlake Lid (2014)

A Smarter Lid

The Seattle Design Commission endorses the **smarter lid** because:

- Emphasis on quality over quantity
- Enhanced regional connectivity
- More useable open space
- Better visual and physical connections
- Improved transit, bicycle, and pedestrian experience
- Integration within the Montlake neighborhood fabric



Montlake Lid

Recommendations

- Enhance the sequential gateway experience
- Push project sustainability
- Strengthen connectivity and wayfinding
- Explore programming at confluences
- Link SR 520 improvements with City investments:
 - North–south connections
 - Montlake Blvd improvements



Looking north at landbridge connection with Husky Stadium in the background

Public Input and Next Steps

Public Input

- **Sept 11 Open House:** Montlake Community Center — 344 attended!
- **General feedback**
 - Appreciation for design work and staff availability
 - Designs show progress and respond to 2012 SCDP feedback
 - Concerns about air quality, noise and traffic around corridor
 - Concerns about lack of funding — people are ready to finish the corridor!
- **Montlake area**
 - Support for landbridge, Bill Dawson Trail improvements, boardwalk, east lid
 - Concern about bike/pedestrian connectivity (especially along Montlake Blvd E), traffic congestion, and smaller lid area
 - Continue exploring west end of lid and transit connections
- **Portage Bay Bridge**
 - No clear consensus on preferred bridge type, but refinements look great
 - Strong support for shared-use path, questions about connections
- **Multimodal connectivity**
 - Great improvement over 2012 SCDP concepts
 - Concern about Montlake Blvd E and safety at 24th Ave E

Design Components Moving Forward

- Portage Bay Bridge
- Montlake Lid refinements
- Non-motorized connections
- Montlake Cut crossing options
- Transit improvements

Next Steps

- **Fall 2014**
 - WSDOT begins cost estimation validation process (CEVP) to develop refined cost estimates for 2014 design work
- **Late 2014**
 - WSDOT publish refined cost estimates
 - City Council Resolution to support design refinements
- **Early 2015**
 - Present findings to Washington State Legislature