South Downtown I-405 Access Study

Stakeholder Forum #4
February 4, 2021
Panelists

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Project manager, Bellevue Transportation Department

Emil King
Study work group, Bellevue Community Development Department

Barrett Hanson
Study work group, WSDOT

Karl Westby
Study work group, WSDOT
Facilitation and support

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Public involvement manager,
Bellevue Transportation Department

Laura LaBissoniere Miller, Community engagement – forum facilitator, PRR

Nancy Thai,
Community engagement – forum support, PRR
Zoom overview

✓ Raise your hand
✓ Chat with panelists
✓ Technical issues? Email nthai@prrbiz.com
Agenda

1. Welcome and review meeting objectives
2. Recap stakeholder engagement process
3. Review stakeholder feedback from forum #3
4. Share findings from Tier 2 evaluation analysis
5. Discussion and Q&A
6. Next steps
Tonight’s objectives

• Share Tier 2 evaluation findings, including qualitative and quantitative analysis

• Discuss plan and policy considerations identified at previous stakeholder meetings

• Gather input to inform study team’s recommendation to City Council
Stakeholder engagement recap

Forum #1:
- Overview of study goals, guiding principles, process and timeline
- Shared project purpose and need

Forum #2:
- Introduced alternatives
- Shared Tier 1 fatal flaw screening results

Forum #3:
- Shared more fatal flaw screening results
- Shared staff recommendation of five alternatives for the Council's consideration

Thank you for your input during and after each forum!
Stakeholder forum #3 feedback
The study team clearly explained the findings from the conceptual design phase for each preliminary alternative.
The study team clearly explained why they recommended no longer studying some alternatives.
The study team clearly explained how they will continue to evaluate the remaining alternatives.
The study team clearly described how to share input during and after the stakeholder forum.
I am confident the city will consider the needs and concerns of all stakeholders in the study process.
Additional feedback

• Concern about advancing Northeast Second Street extension
• Interest in combining Northeast Second Street extension and Lake Hills Connector southbound on-ramp options
• Interest in traffic modeling results
• Question about why Northeast Fourth Street westbound left turn to southbound on-ramp is restricted on Lake Hills Connector southbound on-ramp alternative
• Support for study team’s transparent approach
Tier 2 evaluation findings
Alternatives evaluated in Tier 2

Lake Hills Connector southbound on-ramp

Southeast Sixth Street extension and southbound on-ramp

Southeast Sixth Street extension inside access

Northeast Second Street extension

No build (baseline)
Tier 2 – Alternatives evaluation

Qualitative Analysis and Measures

- Alignment with adopted plans and policies
- Travel time
- Access and safety
- Cost
- Impact on property development

Quantitative Analysis and Measures

- Stakeholder Input
- Community Input
Alignment with adopted plans and policies
Alignment with regional and local transportation plans

- All alternatives, except No build, align with state and regional plans
- Lake Hills Connector southbound on-ramp
  - Auto access only; no bike lanes and sidewalks, no east-west connection
- Southeast Sixth Street extension options (southbound on-ramp and inside access)
  - New access to I-405, multimodal with east-west connection
- Northeast Second Street extension
  - Multimodal with east-west connection
  - No new freeway access
- No build
  - Does not include vehicle capacity to support future growth
Alignment with land use and urban design plans and policies

• Lake Hills Connector southbound on-ramp
  o No significant policy conflict

• Southeast Sixth Street extension options (southbound on-ramp and inside access)
  o East Main transit-oriented development work did not anticipate ramps at Southeast Sixth Street

• Northeast Second Street extension
  o No new access to support growth
  o Reduces redevelopment potential

• No build
  o No new access to support growth
Alignment with existing environmental codes and policies

- **Lake Hills Connector southbound on-ramp**
  - Permanent impacts from shade, lighting, noise and water quality

- **Southeast Sixth Street extension options (southbound on-ramp and inside access)**
  - Likely temporary impacts to wetlands during construction
  - Permanent impacts from shade, lighting, noise and water quality

- **Northeast Second Street extension**
  - Permanent wetland and stream impacts
  - Permanent impacts from shade, lighting, noise and water quality
  - **No build**
    - Maintains existing conditions – no environmental impacts
East Main Transit-Oriented Development Vision

• 2019 Comprehensive Plan policies
• Southeast Sixth Street extension ramp alternatives require policy changes
Travel time
I-405 access capacity (2035)

- Southeast Sixth Street extension inside access provides highest capacity with both on- and off-ramps
**Additional intersection improvements**

- **Rechannelization**, convert westbound left turn on-ramp to westbound through
  
  - Add eastbound and westbound left-turn lanes
  
  - Rechannelize to provide an exclusive left-turn lane

Lake Hills Connector southbound on-ramp

Southeast Sixth Street extension and southbound on-ramp

Southeast Sixth Street extension inside access
City wide travel time savings

- Daily travel time for all roads in Bellevue
- Southeast Sixth Street extension inside access saves most travel time
Intersection delay reductions

Peak Hour Delay Reduction Compared to No Build
Year 2035 PM Peak Hour, Select Intersections

LHC SB On-Ramp: 6.3%
SE 6th St. SB On-Ramp: 9.6%
SE 6th St. Inside Access: 6.8%
NE 2nd St. Ext: -6.6%

Delay Savings Over No Build, All Intersections

Intersections evaluated

Legend
- New Intersection
- Existing Intersection
Access and safety
Multimodal access

- Separate bicycle lane and sidewalks make it easier for people to walk and bike
- New connection across I-405
- Lake Hills Connector and No Build do not add facilities for people walking and biking

Legend
- **Black**: New sidewalk/separate bike lane
- **Blue**: Light rail
- **Green**: Trail
- **Pink**: Study alternative
Safety

- Crash rates on local roadways are 20 percent higher than freeways. More access to freeways helps improve safety on local roadways.

- Reducing congestion helps prevent rear-end crashes, which account for 30 percent of crashes in the study area.

- Separate bicycle lanes and sidewalks improve safety for people walking and biking.
Impact on property development
Lake Hills Connector southbound on-ramp

Approximate location of future Sound Transit light rail

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<th>Right-of-way impact area (acres)</th>
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Southeast Sixth street extension and southbound on-ramp

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<td>Parcel impacts</td>
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Southeast Sixth Street extension inside access

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<td>Park and ride stalls impacted</td>
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Southeast Sixth Street extension access property impacts

• Southeast Sixth Street connects to 112th Avenue Southeast and Lake Hills Connector, no connection to 114th Avenue Southeast

• Provides property access road under the bridge for the elevated Southeast Sixth Street
## Northeast Second Street extension

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<th>Description</th>
<th>Value</th>
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<td>Wetlands (acres)</td>
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Northeast Second Street extension

- Requires elevating roadway over 114th Avenue Northeast and I-405 to connect with 116th Avenue Northeast

- Properties with access on 114th Avenue Southeast must use Southeast Sixth Street to connect to north and downtown
Northeast Second Street extension

• Requires elevating roadway over 114th Avenue Northeast and I-405 to connect with 116th Avenue Northeast

• Properties with access on 114th Avenue Southeast must use Southeast Sixth Street to connect to north and downtown
$ Cost
# Planning level cost estimates

<table>
<thead>
<tr>
<th>Alternatives</th>
<th>Cost*</th>
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<td>Lake Hills Connector southbound on-ramp</td>
<td>$150 million</td>
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<td>Southeast Sixth Street extension and southbound on-ramp</td>
<td>$175 million</td>
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<td>Southeast Sixth Street extension inside access</td>
<td>$325 million</td>
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<tr>
<td>Northeast Second Street extension</td>
<td>$125 million</td>
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*Cost estimate based on escalation to 2030 construction. Includes engineering, right-of-way, and construction costs. Right-of-way costs assume acquisition prior to redevelopment.
Putting it all together

We evaluated the five alternatives based upon:

• Alignment with adopted plans and policies
• Travel time
• Access and safety
• Property and environmental impacts
• Costs

We are looking for your feedback and input
Discussion and Q&A
## Study schedule

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<td><strong>Council briefing</strong></td>
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- **Study kickoff**: Introduce study.
- **Develop and screen alternatives**
- **Alternative evaluation**
- **Online open house**
- **Stakeholder engagement**
- **Study documentation**
- **Council briefing**
Next steps

• Stakeholder questionnaire (due Monday, Feb. 8)
• Online open house: Feb. 8-19
• City Council meeting: April 5
• For more information, visit BellevueWA.gov/access-study
Thank you!
Appendix
Additional traffic information
For trips going from City Hall to I-90 westbound, the two Southeast Sixth Street extension alternatives are expected to save one minute/vehicle in travel time while allowing more people to use the freeway.

The data were taken at the I-90/Island Crest Way Interchange.
For trips going from City Hall to I-90 eastbound, the three alternatives that provide access to I-405 are expected to save about half-a-minute/vehicle in travel time while allowing more people to use the freeway.

The data were taken at the I-90 Eastgate Interchange.
No build 2035 traffic forecast (PM Peak Hour)
Changes of less than ten trips/hour are not shown. The changes on most local streets are small and within daily volume fluctuations.
2035 Traffic Comparison: Southeast Sixth Street Extension Inside Access vs No build (PM Peak Hour)

Changes of less than 10 trips/hour are not shown. The changes on most local streets are small and within daily volume fluctuations.
2035 Traffic Comparison: Southeast Sixth Street Extension southbound on-ramp vs No build (PM Peak Hour)

Changes of less than ten trips/hour are not shown. The changes on most local streets are small and within daily volume fluctuations.
2035 Traffic Comparison Northeast Second Street Extension vs No build (PM peak hour)

Changes of less than ten trips/hour are not shown. The changes on most of local streets are small and within daily volume fluctuations.
Intersection Analysis 2035 (PM peak hour)

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<tr>
<th>Alternatives</th>
<th>Change</th>
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<tr>
<td>NE 2nd St. Ext</td>
<td>6.6%</td>
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<tr>
<td>LHC SB Ramp +improvements</td>
<td>-6.3%</td>
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<td>SE 6th Inside Access +improvements</td>
<td>-6.8%</td>
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<tr>
<td>SE 6th GP Ramp +improvements</td>
<td>-9.6%</td>
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2035 Mode Share in the study area

- Single-occupancy vehicle (SOV) mode share for work trips is expected to decrease from 57% to 52%

- SOV mode share for all trips is expected to decrease from 38% to 36%
Additional intersection improvements

Improvements added to:
• Lake Hills Connector southbound on-ramp
• Southeast Sixth Street extension and southbound on-ramp
• Southeast Sixth Street extension inside access
Additional intersection improvements

- Lake Hills Connector southbound on-ramp: Eliminating westbound left turn at Northeast Fourth Street/I-405 southbound ramp