Newington-Dover
Improvements to NH Rte. 16 / Spaulding Turnpike / General Sullivan Bridge

Public Information Meeting
September 5, 2018
Meeting Agenda

• Introduction and Overview
• Alternative Screening Results
• Review of Alternatives
  – Reasonable Range of Alternatives
  – Preliminary Cost Estimates
• Bike/Ped Construction Access
• GSB - Next Steps
• Contract Q Construction Update
Meeting Goals

• Obtain public feedback on range of alternatives
• Solicit public opinion on construction phase bike/ped access
• Explain SEIS next steps
• Provide Dover roadway construction status update (11238Q)
GSB - Developing and Screening Alternatives
GSB is a Historic Structure

- **Eligible** for listing on the National Register of Historic Places
- Significant at both the state and national levels
- Protection under federal law for eligible properties are:
  - **Section 106** of the National Historic Preservation Act
  - **Section 4(f)** of the USDOT Act
- Historic Preservation under NH Law:
  - **RSA 227-C:9** Directive for Cooperation in the Protection of Historic Resources
Project Purpose

“To provide access and connectivity between Newington and Dover, across Little Bay, for non-motorized use.”
Range of Evaluated Alternatives

- Alt 1: Rehabilitation of General Sullivan Bridge
- Alt 2: Superstructure Replacement – Truss Alternative
- Alt 3: Partial Rehabilitation
- Alt 4: Complete Replacement
- Alt 5: Reconfigure Southbound Little Bay Bridge
- Alt 6: Southbound Little Bay Bridge - Widened Deck on Pier Extension
- Alt 7: Southbound Little Bay Bridge - Independent Deck on Pier Extension
- Alt 9: Superstructure Replacement – Girder Alternative
Screening Criteria

- **Purpose and Need:** Alternative meets the project Purpose and Need - To provide bicycle and pedestrian access between Dover and Newington. This criterion also considers how well the alternative meets the project Purpose and Need.

- **Feasibility:** Alternative is reasonable and practical from a technical standpoint. Alternative can be implemented using existing techniques and materials, within a practical duration, and without excessive impacts on the environment or the transportation network.

- **Cost:** Alternative has construction and life cycle costs that are not excessive in comparison with other reasonable alternatives.
Screening Criteria

• **Safety - User Safety:** Alternative provides a safe and efficient crossing for vehicular and non-motorized travel across the span, minimizing deviations from the design standards for roadways and bridges.

• **Safety – Inspection and Emergency Access:** Alternative provides safe means for inspection, maintenance, and emergency vehicle access.

• **Transportation Capacity:** Alternative maintains or improves existing vehicle capacity across the Little Bay Bridge, with no decrease in the number or width of travel lanes or shoulders.

• **Cultural Resource Impacts:** Alternative preserves some or all of the GSB.
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</thead>
<tbody>
<tr>
<td>Alternative 1C: Rehabilitation – 12' Wide Path</td>
<td>●</td>
<td>○</td>
<td>$39.0M/$70.0M</td>
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<tr>
<td>Alternative 1D: Rehabilitation – 16' Wide Path</td>
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<td>$39.75M/$70.75M</td>
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<td>Alternative 2D: Superstructure Replacement - Truss Alternative – 12’ Wide Path</td>
<td>●</td>
<td>●</td>
<td>$32.0M/$38.25M</td>
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<td>●</td>
<td>$37.0M/$56.5M</td>
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<tr>
<td>Alternative 4C: Complete Replacement – 16’ Wide Path</td>
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<td>●</td>
<td>$31.0M/$31.0M</td>
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<td>Alternative 5: Reconfigure Southbound Little Bay Bridge</td>
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<td>Alternative 6A: Southbound Little Bay Bridge - Widened Deck on Pier Extension (Minimum Roadway/Minimum Path)</td>
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<td>Alternative 6B: Southbound Little Bay Bridge - Widened Deck on Pier Extension (Desirable Roadway/Minimum Path)</td>
<td>●</td>
<td>●</td>
<td>$22.5M/$25.75M</td>
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<td>●</td>
<td>N</td>
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<tr>
<td>Alternative 6C: Southbound Little Bay Bridge - Widened Deck on Pier Extension (Desirable Roadway/Desirable Path)</td>
<td>●</td>
<td>●</td>
<td>$23.0M/$26.5M</td>
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<td>●</td>
<td>●</td>
<td>Y</td>
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<td>Alternative 7B: Southbound Little Bay Bridge - Independent Deck on Pier Extension – 16’ Wide Path</td>
<td>●</td>
<td>●</td>
<td>$24.75/$27.75M</td>
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<td>Y</td>
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<td>Alternative 9B: Superstructure Replacement – Girder Alternative – 16’ Wide Path</td>
<td>●</td>
<td>●</td>
<td>$23.5M/$26.5M</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>●</td>
<td>Y</td>
</tr>
</tbody>
</table>

○ Does not perform well ○ Performs adequately ● Performance exceeds other reasonable alternatives
Review of Alternatives
Alternative 1 – Rehabilitation of General Sullivan Bridge
Alternative 1 – Rehabilitation of General Sullivan Bridge
Alternative 1 – Rehabilitation of General Sullivan Bridge
Alternative 1 – Rehabilitation of General Sullivan Bridge
Alternative 6 – Southbound Little Bay Bridge
– Widened Deck on Pier Extension
Alternative 6 – Southbound Little Bay Bridge – Widened Deck on Pier Extension
Alternative 6 – Southbound Little Bay Bridge – Widened Deck on Pier Extension
Alternative 7 – Southbound Little Bay Bridge – Independent Deck on Pier Extension
Alternative 7 – Southbound Little Bay Bridge – Independent Deck on Pier Extension
Alternative 7 – Southbound Little Bay Bridge – Independent Deck on Pier Extension
Alternative 7 – Southbound Little Bay Bridge – Independent Deck on Pier Extension
Alternative 9 – Superstructure Replacement – Girder Alternative (Haunch)
Alternative 9 – Superstructure Replacement
– Girder Alternative (Haunch)
Alternative 9 – Superstructure Replacement
– Girder Alternative (Haunch)
Alternative 9 – Superstructure Replacement – Girder Alternative (Haunch)
Alternative 9 – Superstructure Replacement
– Girder Alternative (V-Frame)
Alternative 9 – Superstructure Replacement
- Girder Alternative (V-Frame)
Alternative 9 – Superstructure Replacement
– Girder Alternative (V-Frame)
Alternative 9 – Superstructure Replacement – Girder Alternative (V-Frame)
Cost Estimates
Conceptual Cost Estimating

• **Cost Estimates**
  – Initial Capital and Life Cycle maintenance costs were developed for Alternatives 1, 2, 3, 4, 6, 7 and 9.
  – Under each alternative, costs for a 12’ wide and a 16’ wide multi-use path width were developed for comparison.

• **Initial Capital Cost**
  – This is initial construction cost to bring the alternative into service.

• **Life Cycle Cost**
  – Reflects the entire capital investment required for each alternative. It is the summation of Initial Capital Cost, and cost of maintaining the structure through the assumed 75 year planning horizon.
# General Sullivan Bridge - Alternative Initial Capital and Life Cycle Cost Estimate Summary

<table>
<thead>
<tr>
<th>Alt:</th>
<th>Description:</th>
<th>Initial Capital Cost</th>
<th>Life Cycle Cost (Constant Value)</th>
<th>Width Increase</th>
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</thead>
<tbody>
<tr>
<td>1C</td>
<td>Rehabilitation of the GSB - 12’ Wide Path</td>
<td>$39,000,000</td>
<td>$70,000,000</td>
<td>1.7%</td>
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<tr>
<td>1D</td>
<td>Rehabilitation of the GSB - 16’ Wide Path</td>
<td>$39,750,000</td>
<td>$70,750,000</td>
<td>1.7%</td>
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<tr>
<td>2D</td>
<td>Superstructure Replacement – Truss Alternative - 12’ Wide Path</td>
<td>$32,000,000</td>
<td>$38,250,000</td>
<td>2.6%</td>
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<tr>
<td>2E</td>
<td>Superstructure Replacement – Truss Alternative - 16’ Wide Path</td>
<td>$32,750,000</td>
<td>$39,000,000</td>
<td>2.6%</td>
</tr>
<tr>
<td>3B</td>
<td>Partial Rehabilitation - 12’ Wide Path</td>
<td>$36,000,000</td>
<td>$55,250,000</td>
<td>2.5%</td>
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<tr>
<td>3C</td>
<td>Partial Rehabilitation - 16’ Wide Path</td>
<td>$37,000,000</td>
<td>$56,500,000</td>
<td>2.5%</td>
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<td>4B</td>
<td>Complete Replacement - 12’ Wide Path</td>
<td>$30,750,000</td>
<td>$30,750,000</td>
<td>0.8%</td>
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<tr>
<td>4C</td>
<td>Complete Replacement - 16’ Wide Path</td>
<td>$31,000,000</td>
<td>$31,000,000</td>
<td>0.8%</td>
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<tr>
<td>6B</td>
<td>Southbound LBB – Widened Deck on Pier Extension - 12’ Wide Path</td>
<td>$22,500,000</td>
<td>$25,750,000</td>
<td>2.1%</td>
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<tr>
<td>6C</td>
<td>Southbound LBB – Widened Deck on Pier Extension - 16’ Wide Path</td>
<td>$23,000,000</td>
<td>$26,500,000</td>
<td>2.1%</td>
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<tr>
<td>7A</td>
<td>Southbound LBB – Independent Deck on Pier Extension - 12’ Wide Path</td>
<td>$24,500,000</td>
<td>$27,250,000</td>
<td>1.0%</td>
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<td>7B</td>
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<td>9A</td>
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<td>$26,250,000</td>
<td>1.0%</td>
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<td>9B</td>
<td>Superstructure Replacement – Girder Alternative - 16’ Wide Path</td>
<td>$23,500,000</td>
<td>$26,500,000</td>
<td>1.0%</td>
</tr>
</tbody>
</table>

**Notes:**
- **= Alternatives for Further SEIS Evaluation**
- **= Screened Out**

Department of Transportation
Bicycle/Pedestrian Construction Access
Bike/Ped. Access Option 1: Shuttle Bus

Potential Shuttle Bus Pick Up/Drop Off Locations

Dover Shuttle Stop

Newington Shuttle Stop
Bike/Ped. Access Option 2: NB LBB Multi-Use Path Detour

- Construct & Remove
  - 10-foot Multi-Use Path
  - Barrier/Fencing
  - Temporary Approaches
  - Signing and pavement marking modifications
12' SHOULDER & 10' PATH
Bike/Ped. Access Option 2:
NB LBB Multi-Use Path Detour
Bike/Ped. Access Option 2: NB LBB Multi-Use Path Detour
General Sullivan Bridge
Next Steps
Supplemental EIS

Notice of Intent
Federal Register
(January 18, 2018)

Define Purpose and Need

Develop Alternatives

Assess Impacts

Draft Supplemental EIS/Section 4(f) Evaluation

Public Meeting

Final Supplemental EIS/Section 4(f) Evaluation

Supplemental Record of Decision
National Historic Preservation Act
Section 106 – Consulting Parties

Interested persons or organizations may request Consulting Party status from FHWA:

Jamie Sikora
Environmental Program Manager
Federal Highway Administration
NH Division Office
53 Pleasant Street, Suite 200
Concord, NH 03301
Jamie.Sikora@fhwa.dot.gov

More Information:
https://www.nh.gov/dot/org/projectdevelopment/environment/units/program-management/cultural.htm
Supplemental EIS – Public Participation

Public Participation is critical to the NEPA (SEIS) process, and required by Section 106 and Section 4(f)

Public Meeting #1
(January 30, 2018)
• Draft Purpose and Need
• SEIS Process
• Consulting Party Invitation

Public Meeting #2
(September 5, 2018)
• Alternatives Screening
• Review Reasonable Range of Alternatives

Public Meeting #3
(Winter 2018/2019)
• Presentation of Preferred Alternative
• Public Input on Draft SEIS
Contract Q
Construction Update
Newington-Dover 11238Q

September 2018 Project Update
Work Ongoing - Northbound Spaulding Tpk. Newington

Construction of southern approach to Little Bay Bridge continues
Anticipated to be in service November 2018
Work Ongoing - Northbound
Spaulding Tpk. Dover
Surcharge Waiting Periods are complete.
This allows for permanent roadway construction
Roadway to be in service November 2018.
Work Ongoing - Exit 6 Northbound Off Ramp
The new ramp will be put into service November 2018. Existing Exit 6W Loop Ramp will close at that time.
Work Ongoing - New Route 4 Bridge at Exit 6
Bridge was put into service August 30th
Work Ongoing - Soundwalls
Work continues on the Soundwalls south of Exit 6

**Soundwall 1** –
West Side of Spaulding Turnpike.
South of Exit 6
*Completion in 2020*

**Soundwall 2** –
East Side of Spaulding Turnpike.
South of Exit 6
*Completion in 2019*

**Soundwall 3** –
West Side of Spaulding Turnpike.
North of Exit 6
*Complete*

**Soundwall 4** –
East Side of Spaulding Turnpike.
North of Exit 6
*Complete*
Work Ongoing – Dover Point Road (West) Reconstruction
Sidewalk and Driveway Work continues. Anticipated completion in fall of 2018.
Upcoming Work -

Demo of Existing Exit 6 Bridge – Requires Nighttime Work and Traffic Detours

Closure of Exit 5 Northbound On Ramp – Scheduled for Sept 11. Traffic will be detoured to Exit 4 to access Northbound

Construction of Exit 6 Northbound On Ramp – To be opened in November 2018

Thank You!
Questions/Comments?

http://www.newington-dover.com/