I-39/90/94 Corridor Study

Public Involvement Meeting #3

January 30, 2024 – Virtual

January 31, 2024 – Wisconsin Dells

February 1, 2024 – Madison

Presentation topics

1. Study overview
2. Study purpose and corridor needs
3. Remaining interstate mainline alternatives
4. Remaining interchange alternatives
5. Flooding options
6. Noise analysis
7. Study schedule and next steps
8. Contact information

Welcome

Make sure your volume is turned up.

(presenters cannot see or hear you)

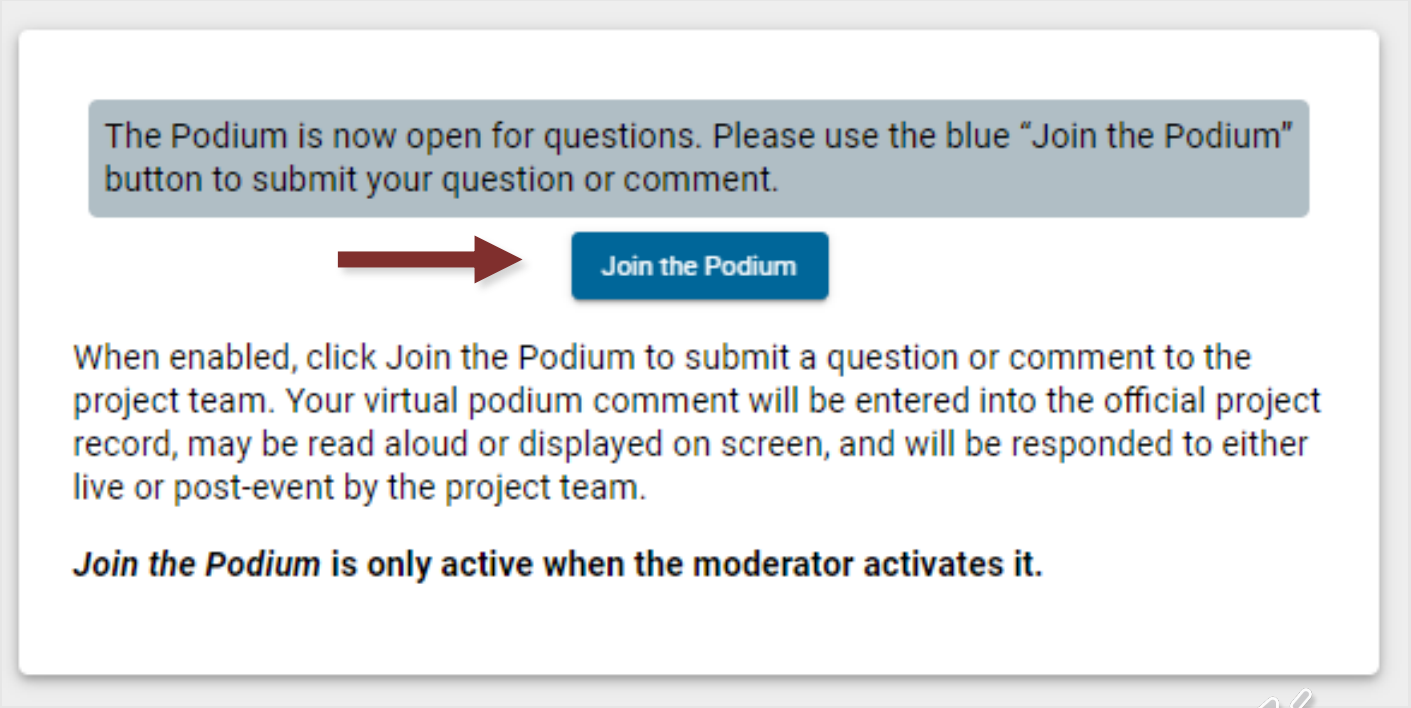
Online questions will be shared through the **Virtual Podium**

Question and answer session will follow the presentation

Hearing from you: Join the podium!

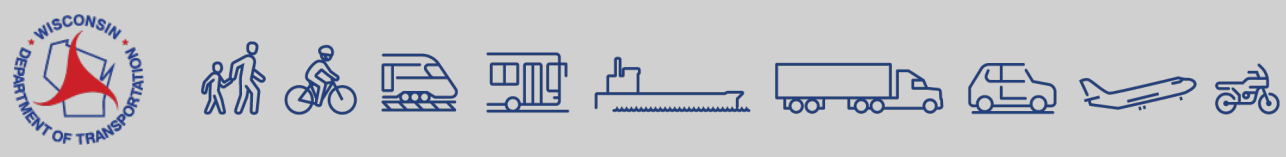
Following the presentation, the Podium will be enabled to submit questions or comments

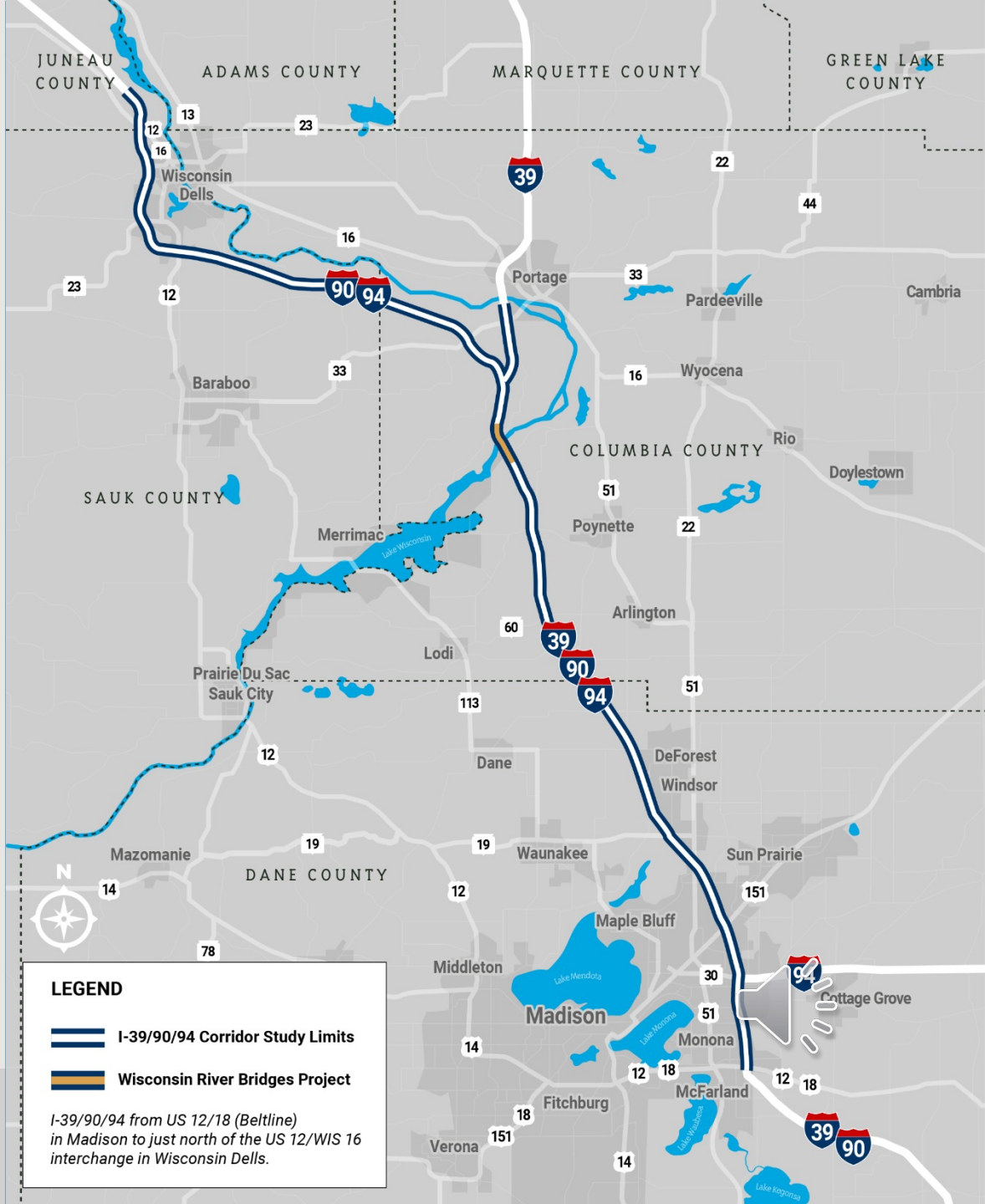
- Click the **Join the Podium** button when it turns blue
- Submit a comment or question
- A project team member will respond to your question
- If we are unable to respond, a project team member will follow up via email



Study overview

- What is an environmental study?
- 67 miles of I-39/90/94
  - From US 12/18 to US 12/WIS 16
  - Spans Dane, Columbia, Sauk and Juneau counties
- Does **not** include:
  - Wisconsin River Bridges Project
  - WIS 60 interchange reconstruction
- Separate project:
  - County V
- Limited to on- and near-alignment alternatives (no bypass)

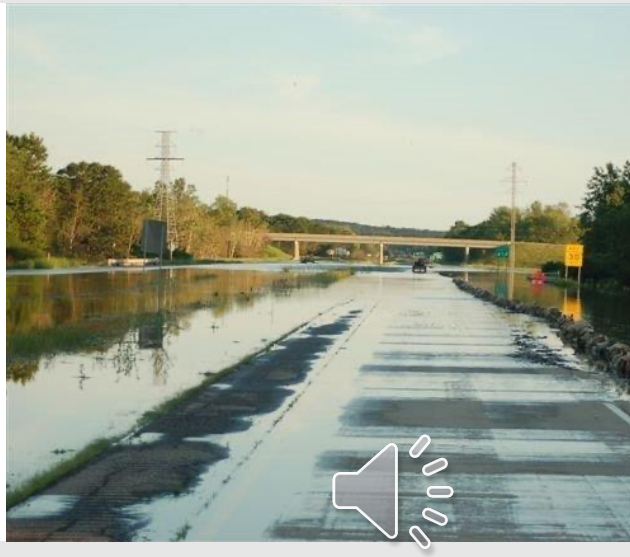




Study purpose and corridor needs

Study purpose:

Address existing and future **traffic** demands, **safety** issues, **aging** and **outdated** corridor **infrastructure,** and corridor **resiliency**.



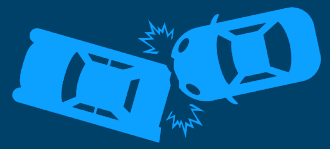
Study purpose and corridor needs

Corridor needs:

TRAFFIC

Traffic volumes along the study corridor are increasing, causing vehicle congestion and backups on the Interstate and decreasing travel time reliability

SAFETY



Crash rates along the study corridor, especially at interchanges, **exceed the statewide average crash rate**

Study purpose and corridor needs

Corridor needs:

PAVEMENT

Pavement maintenance projects are anticipated in **26 of the next 30 years** somewhere in the study corridor

BRIDGES

84 of 113 structures in the study corridor will be over 50 years old by 2030 and many bridges do not meet current design standards

FLOODING

Floods causing **Interstate closures** impact corridor resilience and disrupt vital commerce and emergency services connections

Remaining alternatives

- WisDOT carrying alternatives forward based on
  - Purpose and need factors
  - Environmental impacts
  - Public feedback
    - Public Involvement Meetings (PIMs)
    - Interchange specific meetings
    - Advisory committee meetings
    - Online comments
    - Feedback from municipalities
  - Cost
- All alternatives presented at previous PIMs available on study website

Remaining alternatives

- We want your feedback!
- Surveys available to fill out in person or online
- Feedback items:
  - Comments/preferences on remaining alternatives
  - Comments/preferences on intersection control

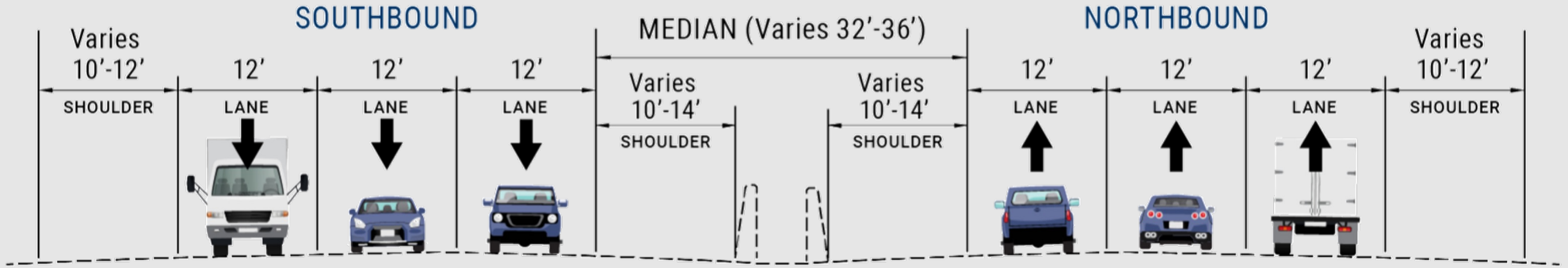
Remaining interstate mainline alternatives

- All remaining mainline alternatives are “modernization” alternatives
- What is modernization?
  - Upgrade infrastructure to meet current state and federal standards whenever possible
  - Examples include
    - Consider safety first
    - Replace deteriorating pavement, bridges and culverts
    - Move ramp movements to the right
    - Increase on- and off-ramp lengths
    - Raise bridge clearances
    - Expand road shoulder widths
    - Improve horizontal and vertical roadway curves
    - Evaluate lighting needs
    - Update roadway signage
    - Consider opportunities to add bicycle/pedestrian facilities
    - Add noise walls, where warranted and feasible
    - Expand capacity, where needed

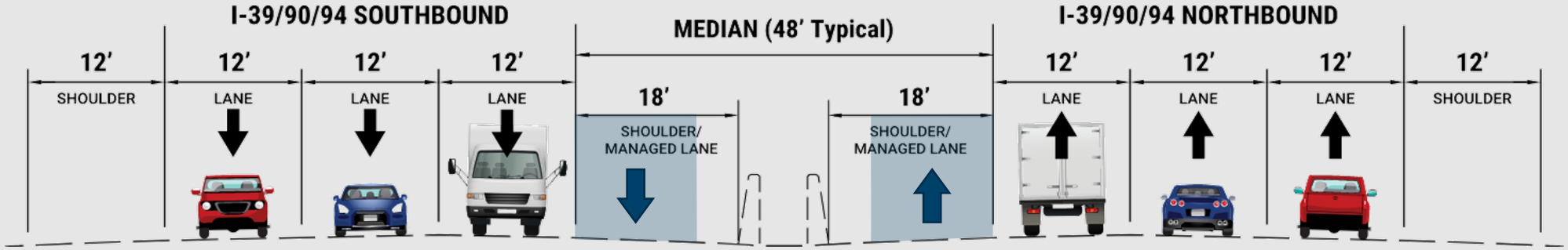
Remaining interstate mainline alternatives

I-39/90/94 from US 12/18 to WIS 19

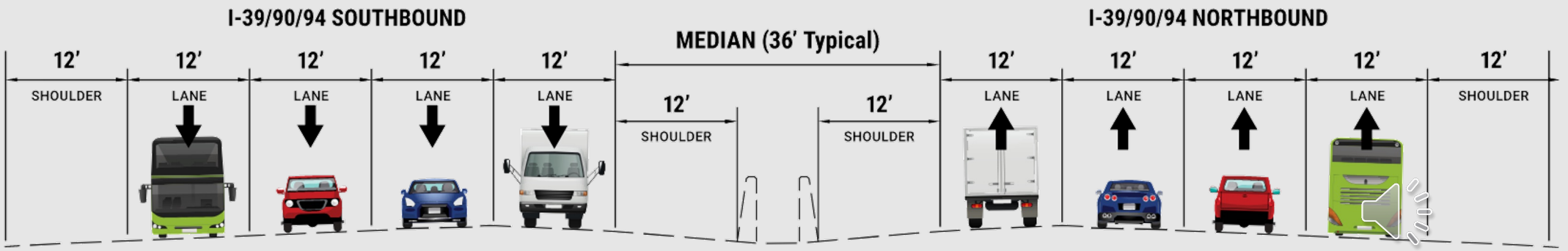
Existing



Modernization Hybrid



Modernization Plus Added General Purpose Lanes



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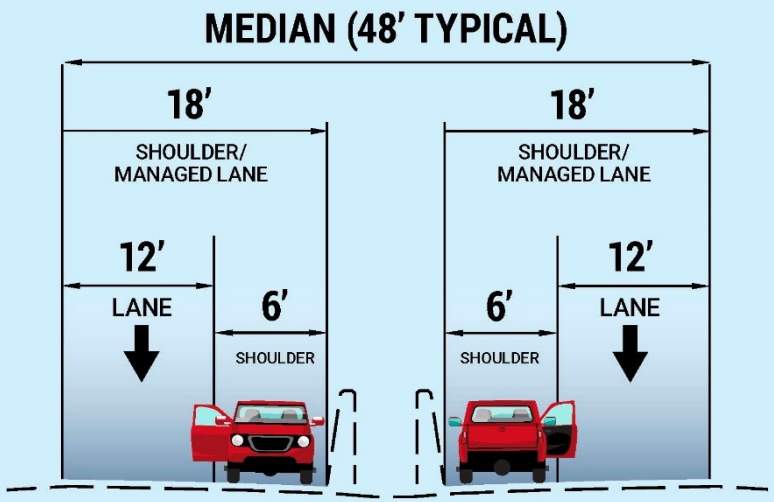
Remaining interstate mainline alternatives

Pros / Cons

- Two remaining alternatives are identical north of WIS 19
- Remaining alternatives from US 12/18 to WIS 19
  - Infrastructure width
  - Cost
  - Safety
  - Other considerations
    - Traffic demand on outside
    - Additional decision points in Modernization Hybrid
    - Managed lane availability
    - Truck percentages

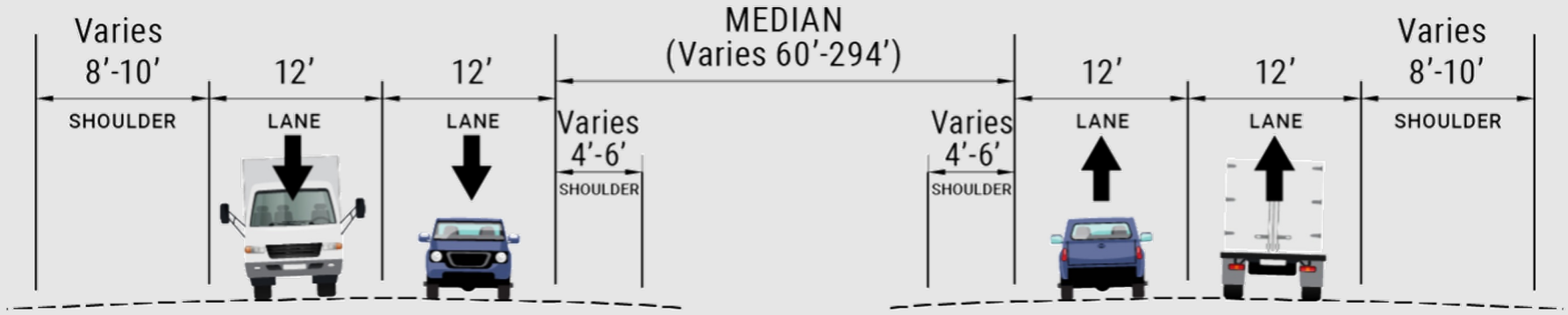


Note:
A motorist stranded in the 6' shoulder will not be able to safely exit the vehicle until the managed lane is closed.

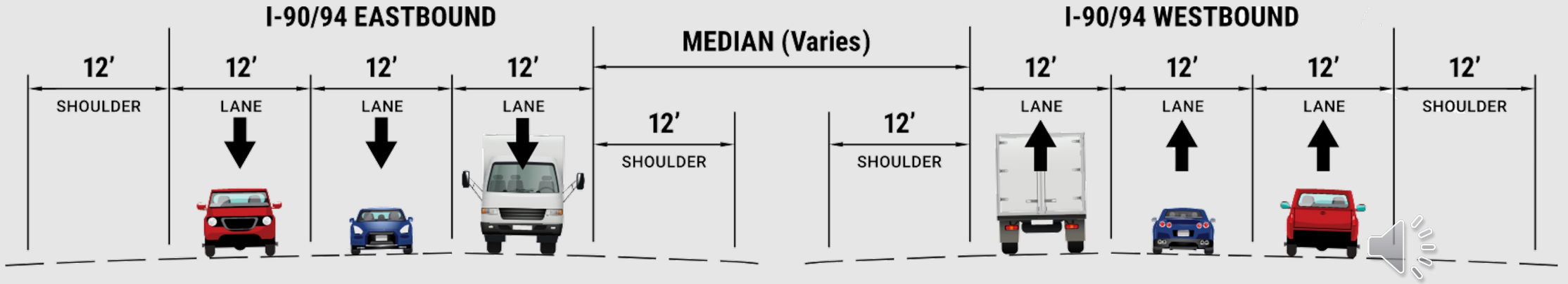
Remaining interstate mainline alternatives

I-90/94 from I-39 I-90/94 Split to US 12/WIS 16

Existing

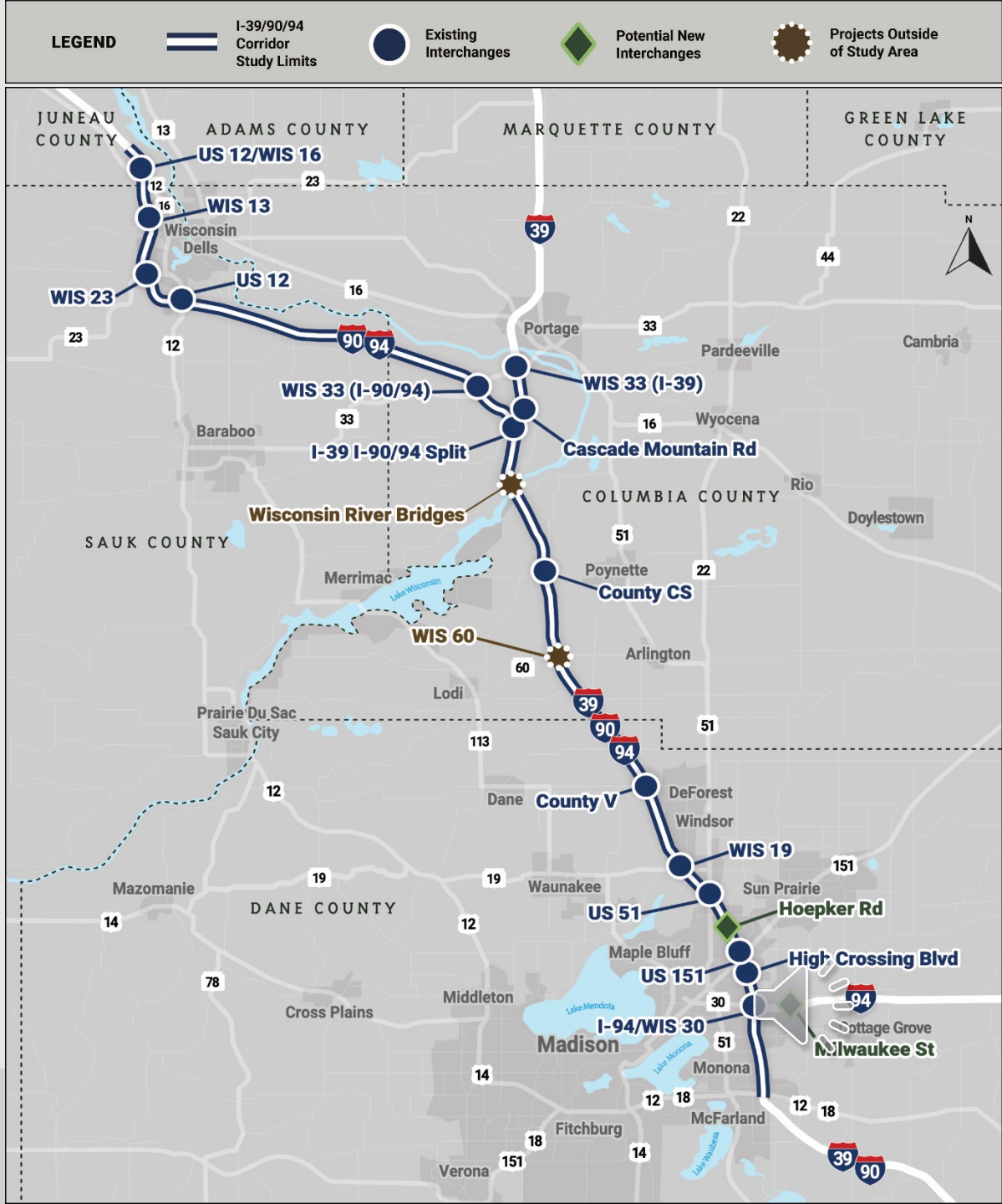


Both Remaining Alternatives



Remaining interchange alternatives

- **Existing Interchanges**
  - I-94/WIS 30
  - US 151
  - WIS 19
  - County CS
  - WIS 33 at I-39
  - WIS 33 at I-90/94
  - WIS 23
  - US 12/WIS 16
  - High Crossing Blvd
  - US 51
  - *County V*
  - *WIS 60*
  - I-39 I-90/94 Split
  - Cascade Mountain Rd
  - US 12
  - WIS 13
- **Potential New Interchanges**
  - Hoepker Rd
  - Milwaukee Street

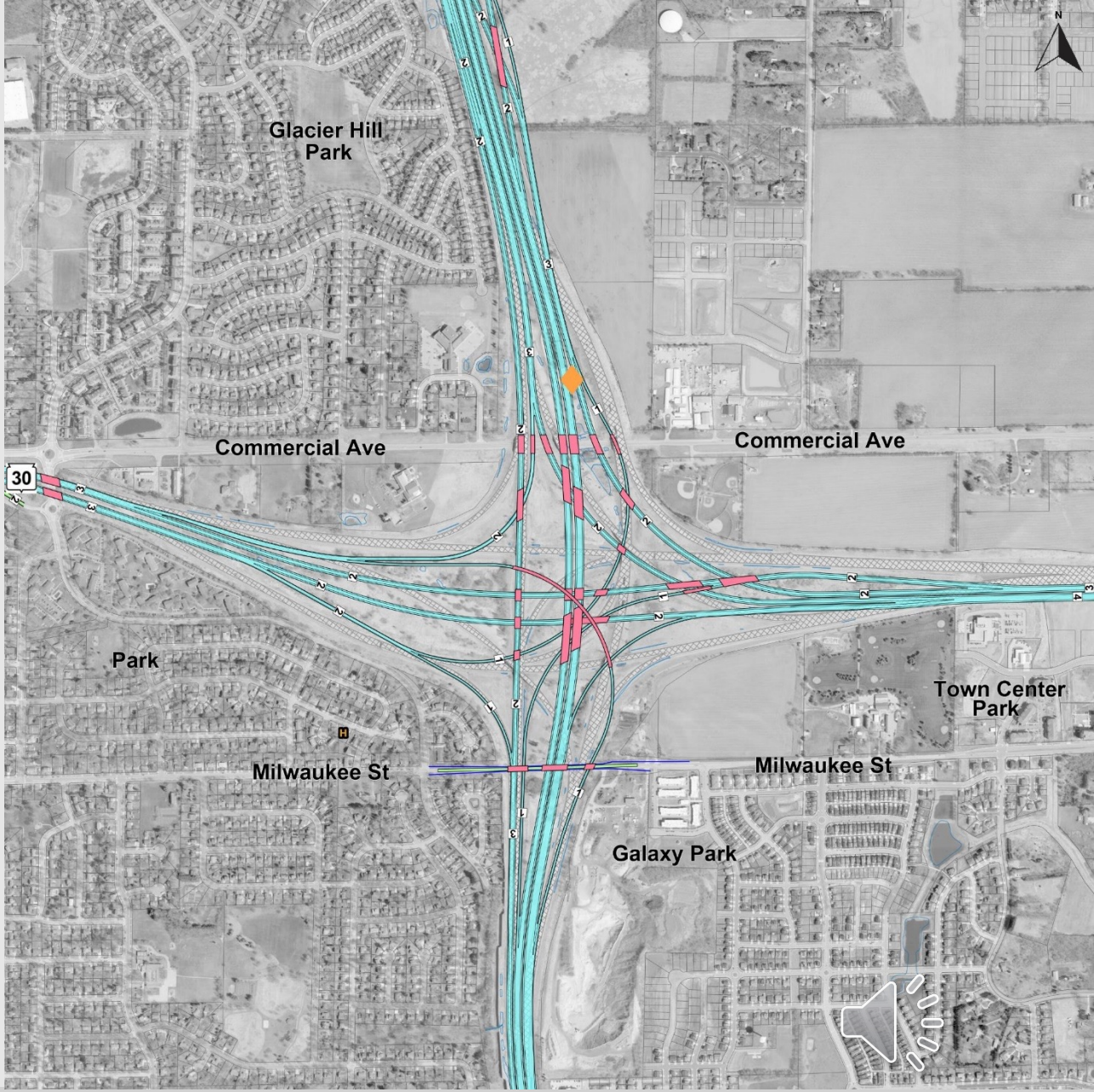


Remaining interchange alternatives

I-94/WIS 30 Interchange

Full Modernization #2

- Removes all left-hand entrance and exit ramps
- Less complicated geometry
- Weave movements are reduced
- Ramp speeds closer to freeway speeds



Remaining interchange alternatives

Milwaukee Street Interchange

Partial Cloverleaf

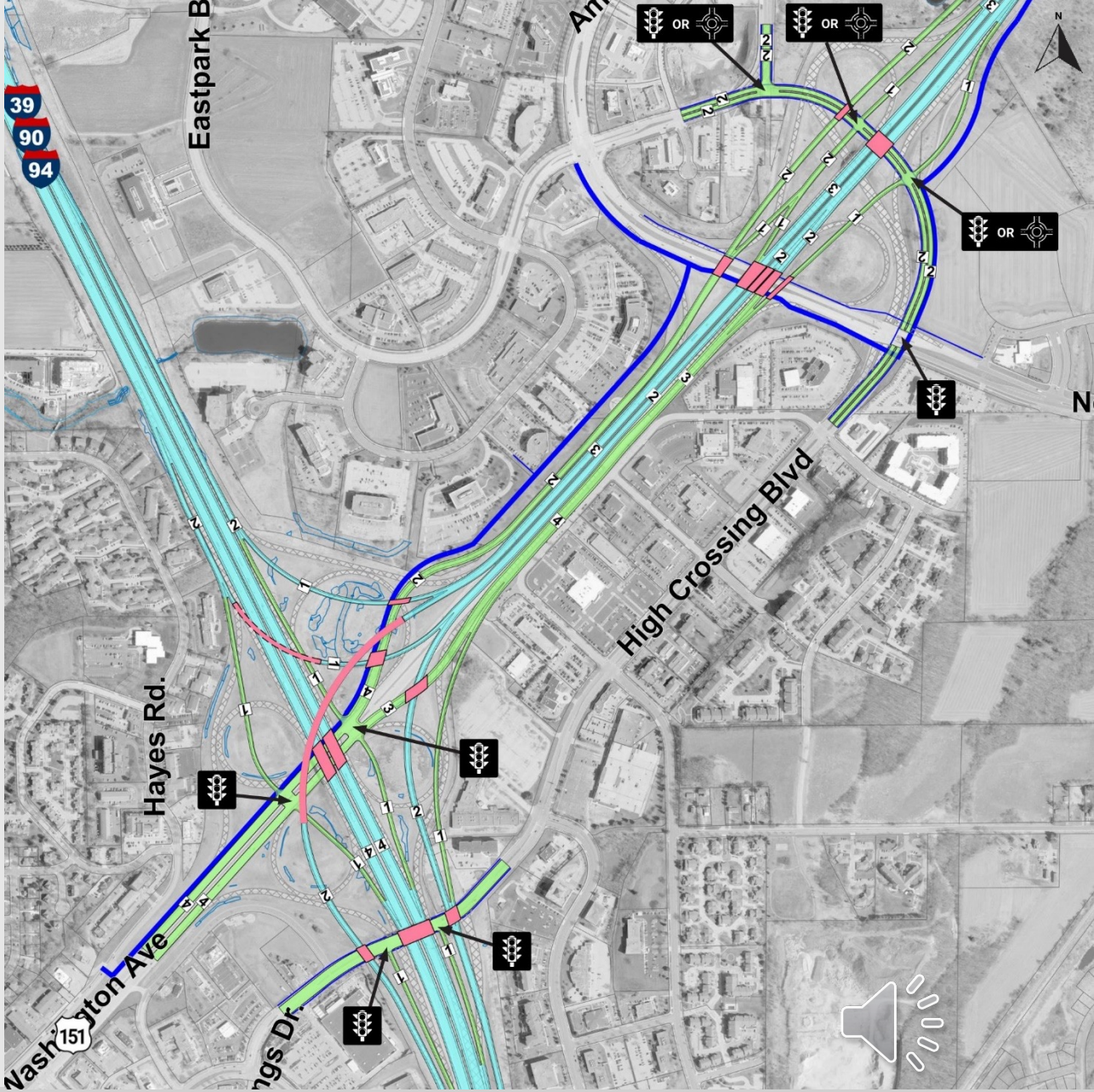
- Provides added weave length
- Dependent upon local funding
- ***Roundabout vs Signal***

Remaining interchange alternatives

US 151/High Crossing IC

Directional

- Freeway to freeway free-flow movements
- Embedded diamond interchange at US 151
- Half-diamond interchange at High Crossing
- Moves Nelson Road/American Parkway IC
- Better addresses travel demands
- Relatively low environmental impacts
- Pedestrian and bicycle path along US 151

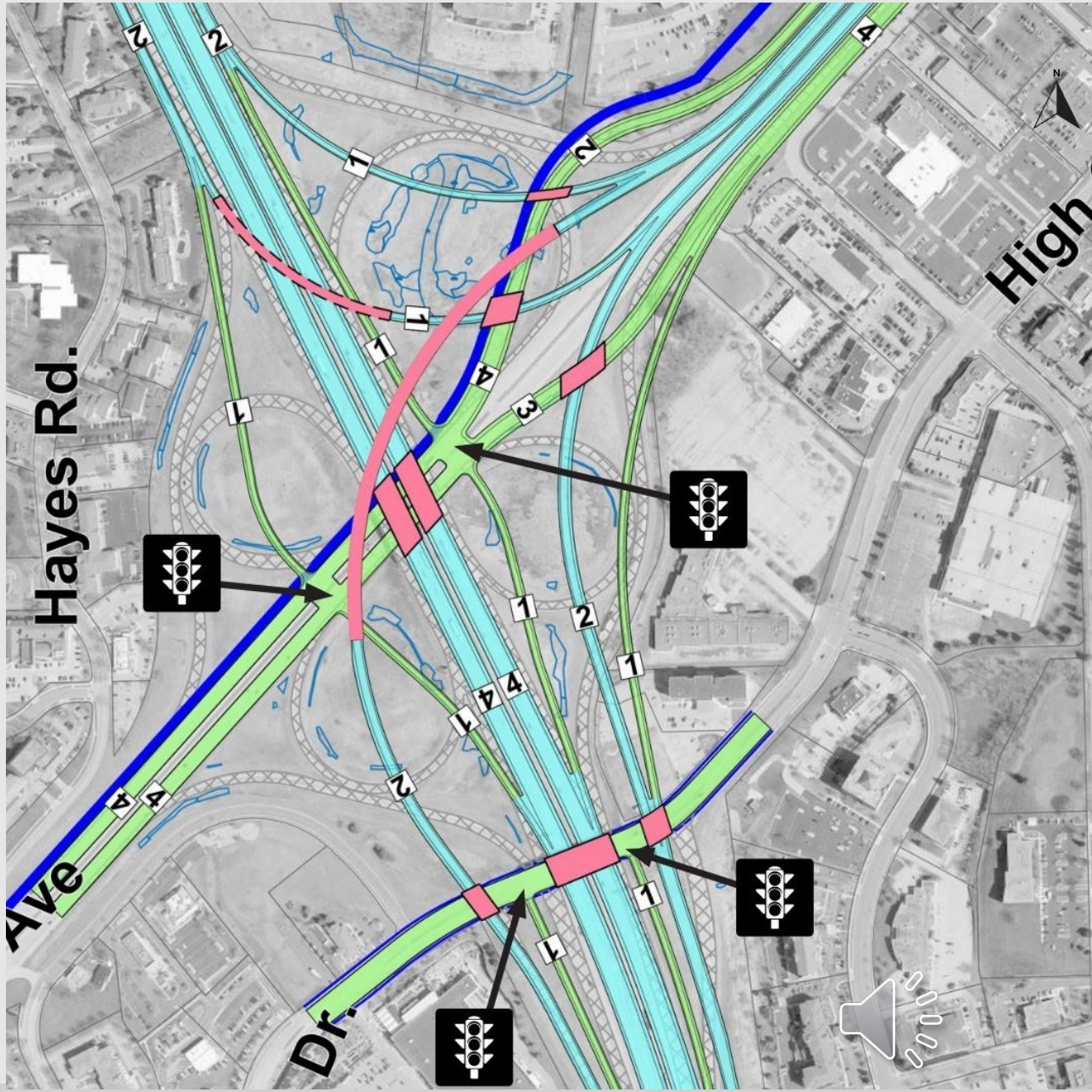


Remaining interchange alternatives

US 151/High Crossing IC

Directional

- ***Intersection Control***
  - Standard Diamond with Signals →
  - Single Point Urban Interchange (SPUI)



Remaining interchange alternatives

US 151/High Crossing IC

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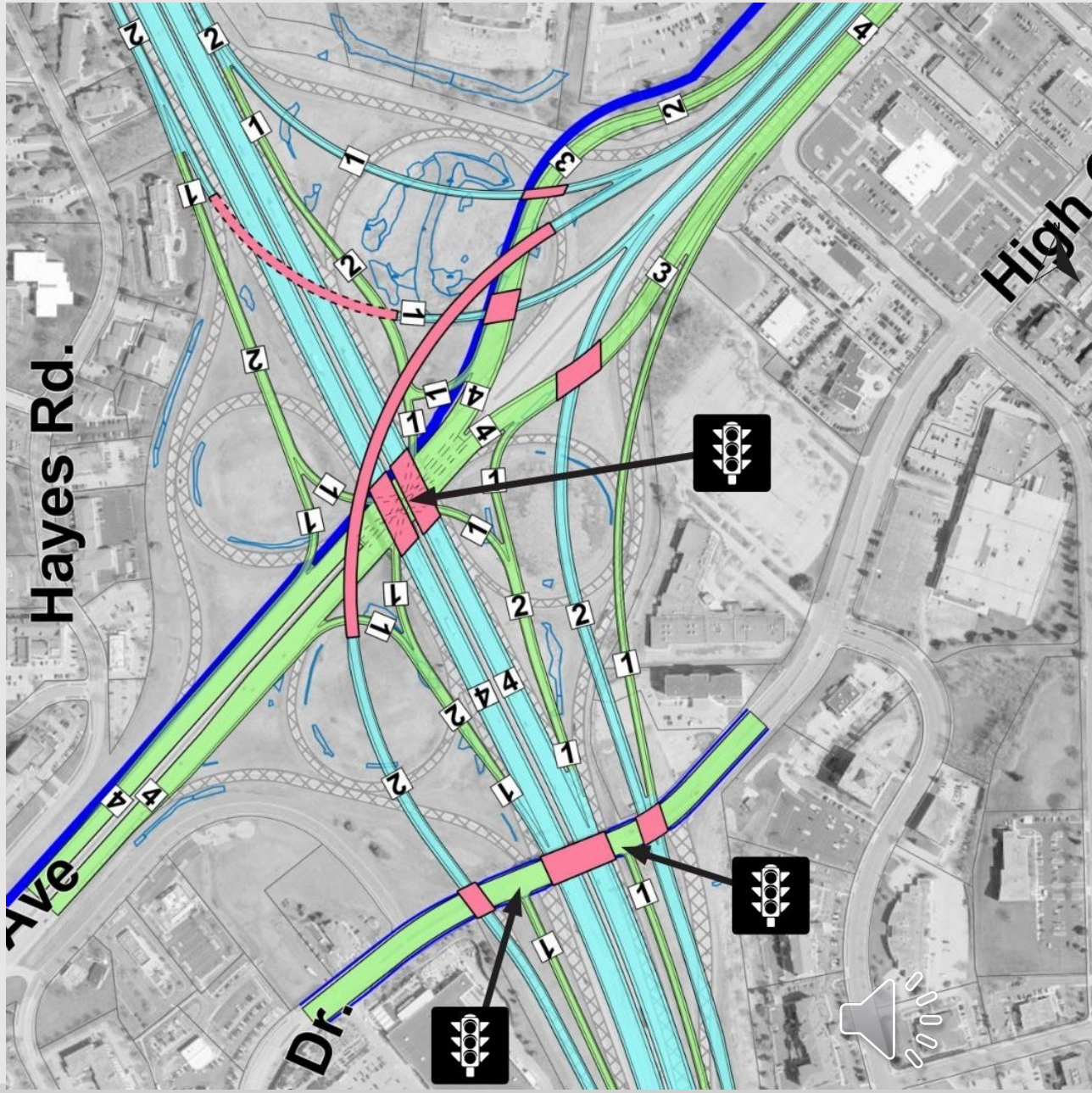
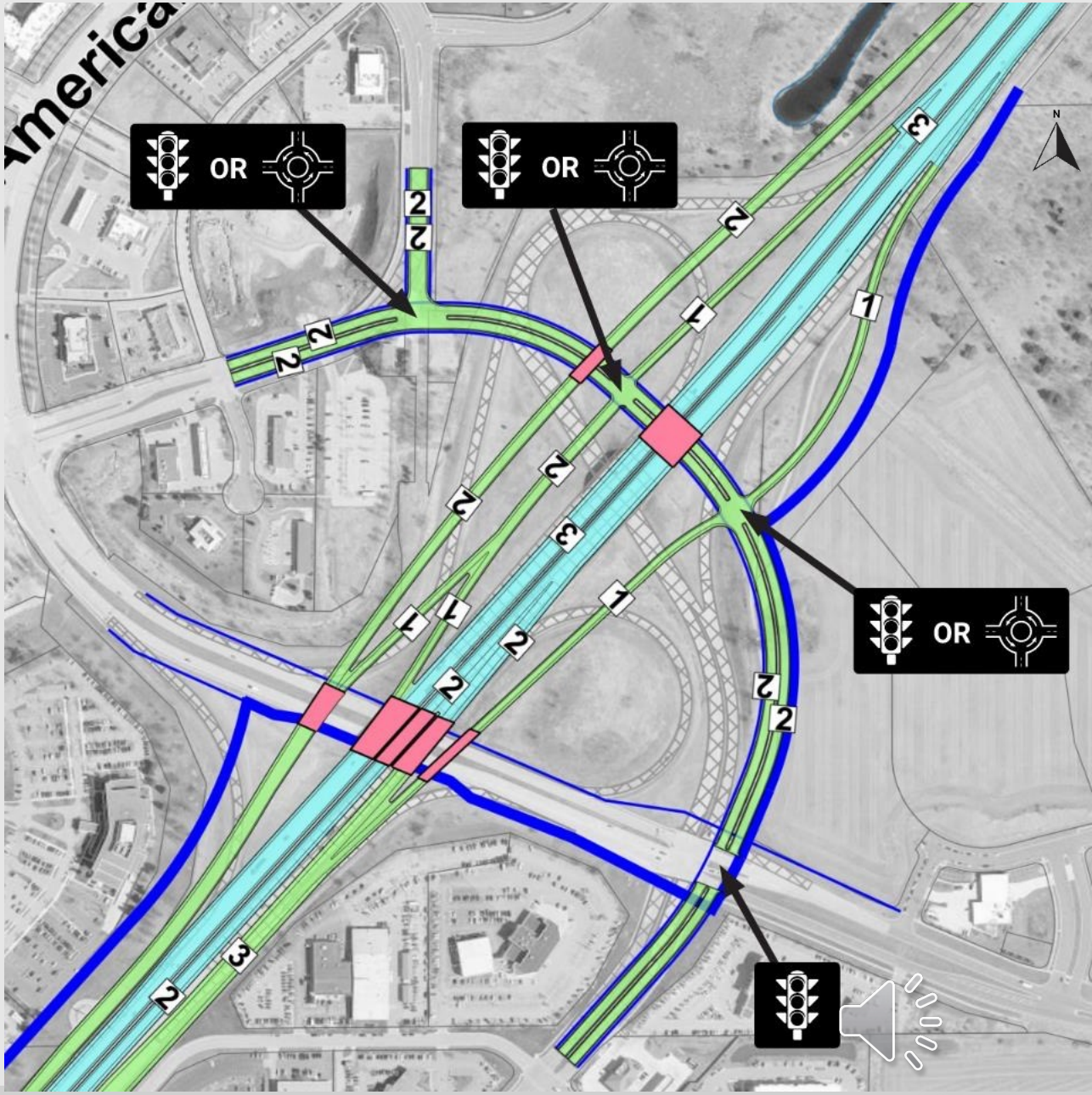


Remaining interchange alternatives

US 151/High Crossing IC

Directional

- ***Intersection Control at Eastpark Blvd***
  - Standard Diamond →
    - ***Signals vs Roundabouts***

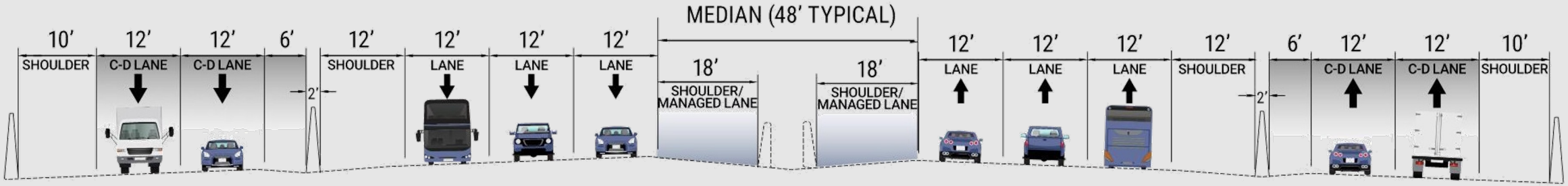


Remaining alternatives

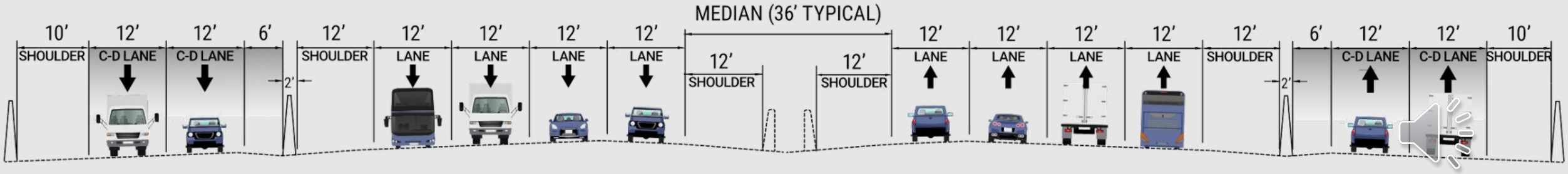
Collector-Distributor (C-D) Lanes

- I-39/90/94 from I-94/WIS 30 interchange to US 151 interchange
- US 151 from I-39/90/94 to northeast of Nelson Road/Eastpark Boulevard interchange

Modernization Hybrid



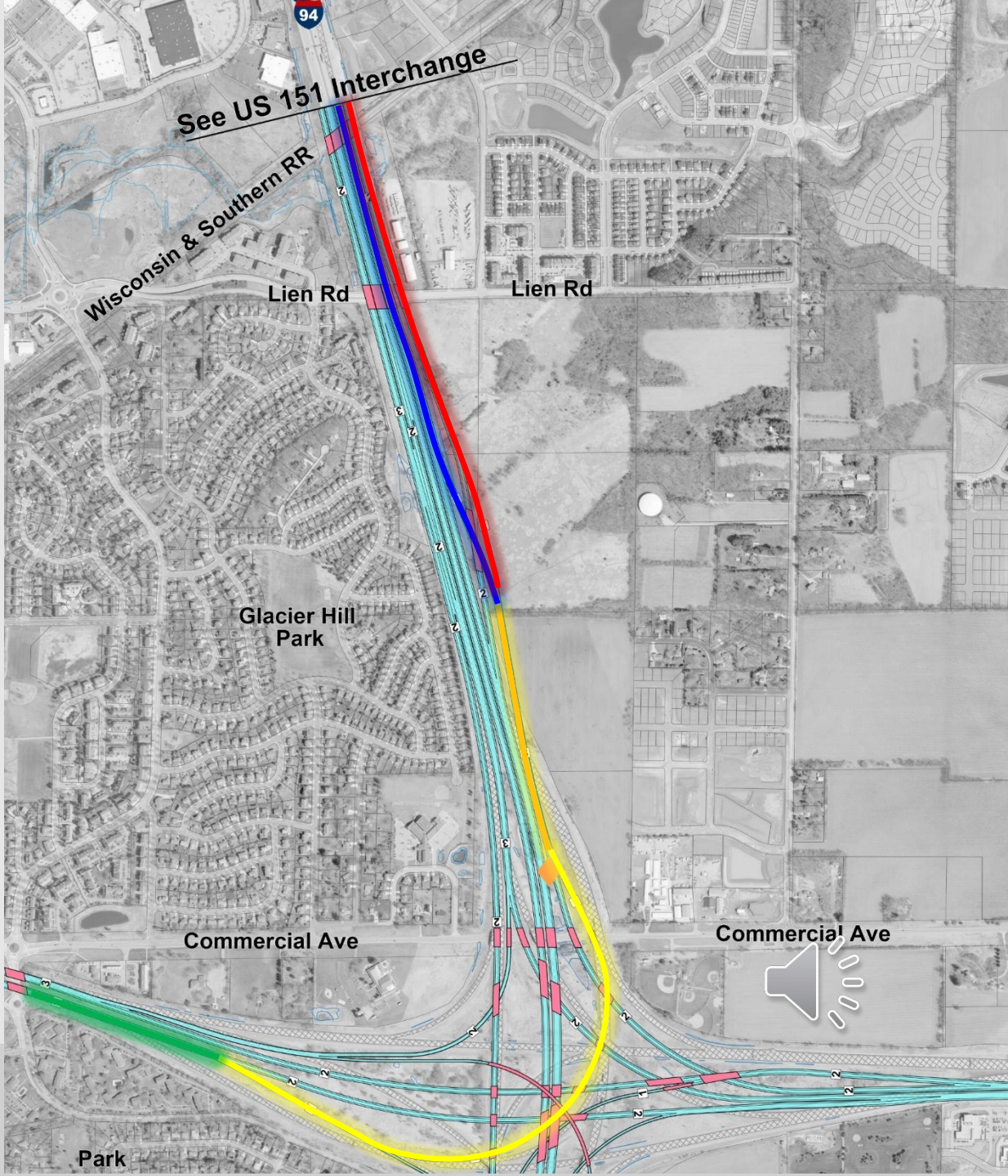
Modernization Plus Added General Purpose Lanes



Remaining alternatives

Collector-Distributor (C-D) Lanes

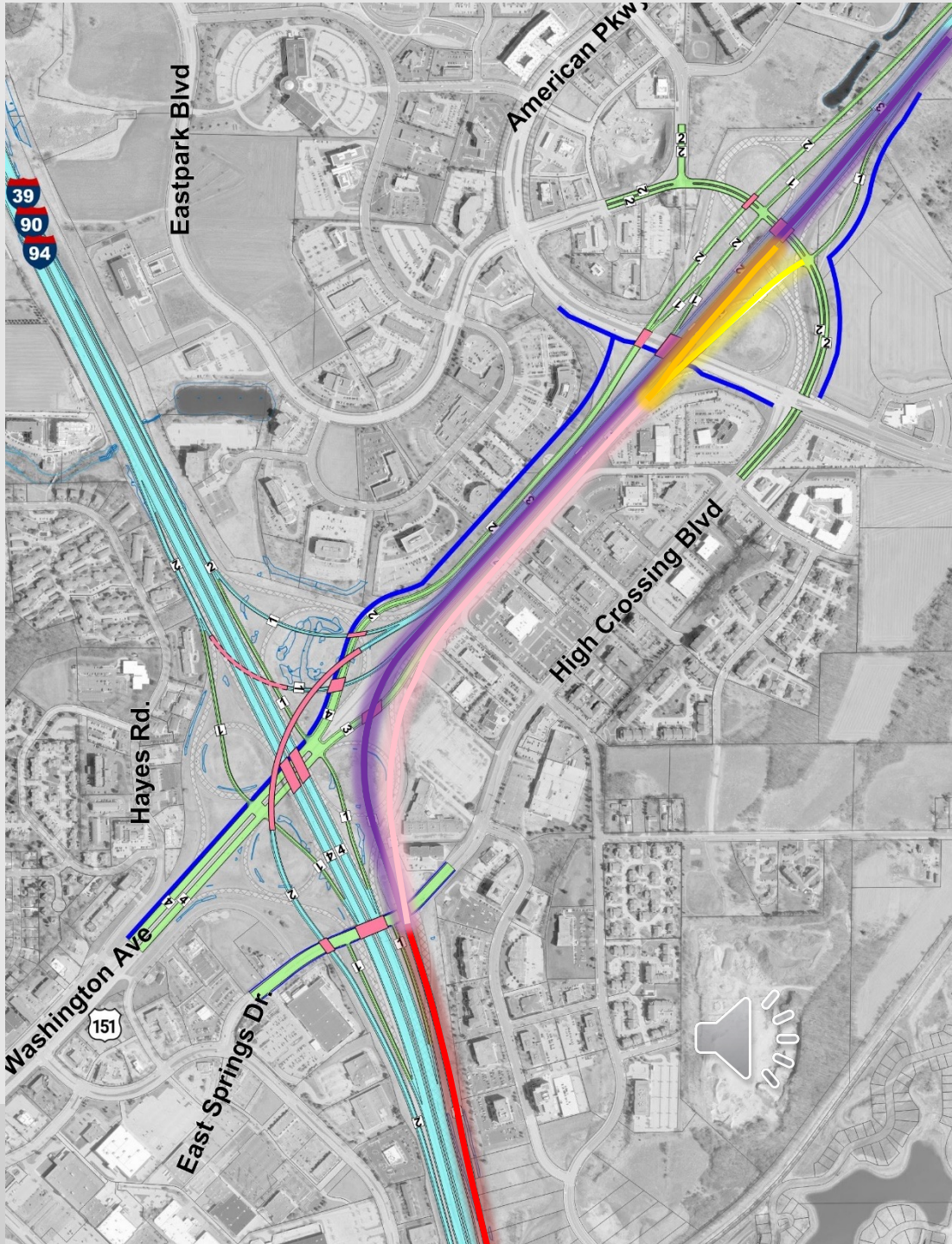
- Eastbound WIS 30 to northbound I-39/90/94 or US 151 interchange



Remaining alternatives

Collector-Distributor (C-D) Lanes

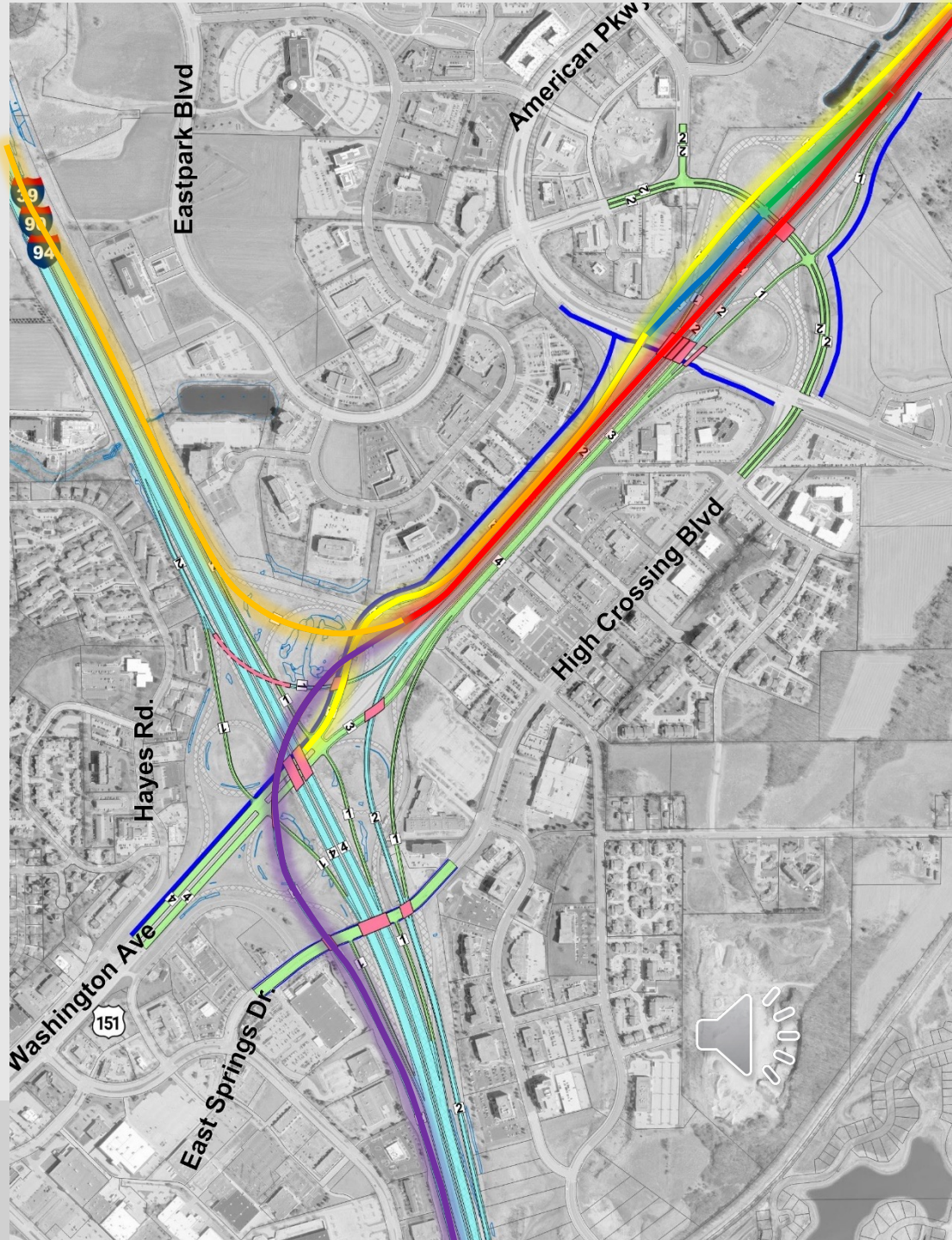
- Northbound US 151 from I-39/90/94 to Nelson Road/Eastpark Boulevard interchange



Remaining alternatives

Collector-Distributor (C-D) Lanes

- Southbound US 151 from Nelson Road/Eastpark Boulevard interchange to I-39/90/94

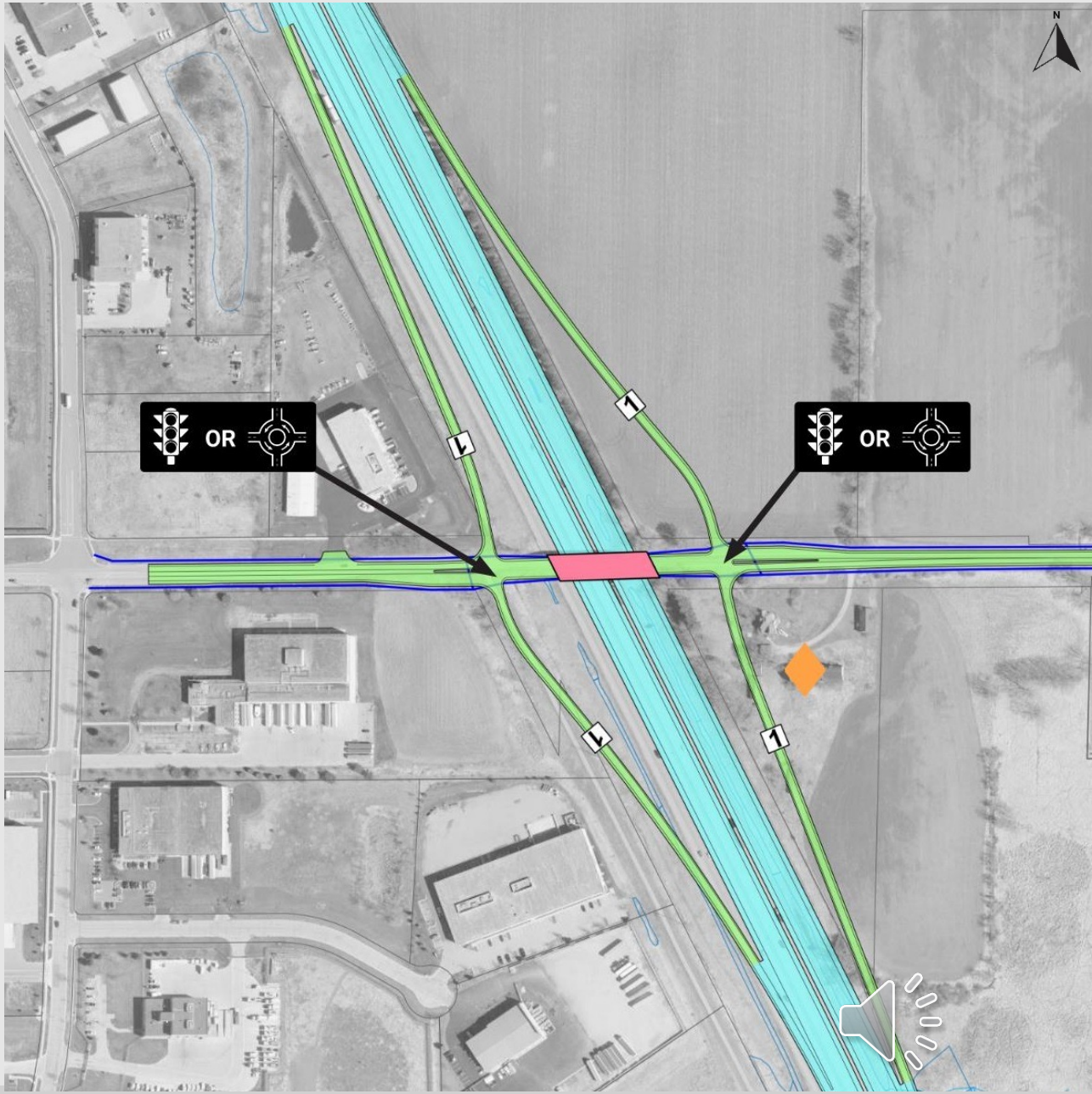


Remaining interchange alternatives

Hoepker Road Interchange

Shifted Diamond

- Freeway shifted to east to allow for ramps
- Requires significantly less real estate acquisition
- Does require a residential relocation
- Dependent upon local funding
- ***Signals vs Roundabouts***

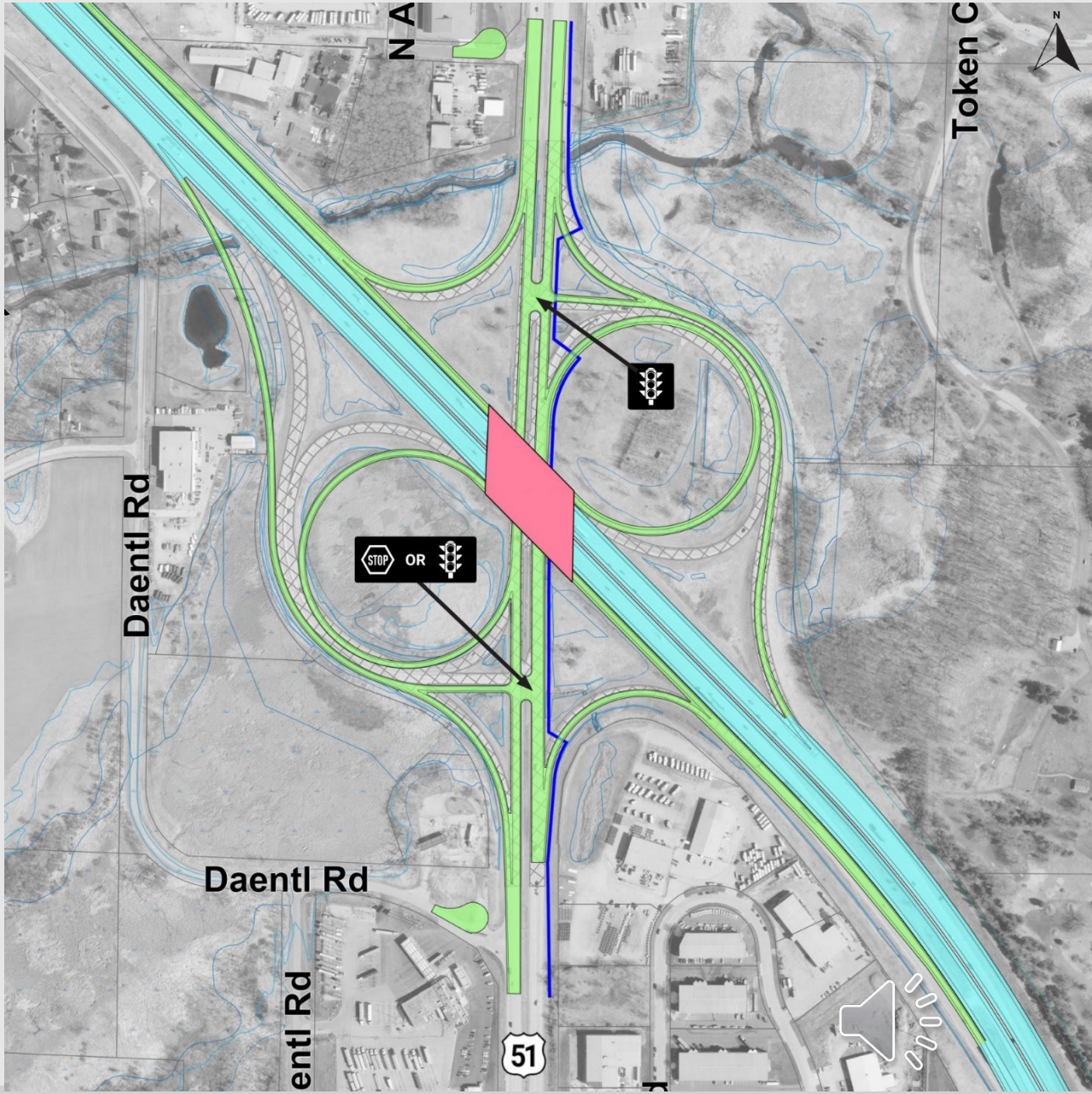


Remaining interchange alternatives

US 51 Interchange

Partial Cloverleaf

- On-ramps merge together prior to freeway
- Removes US 51 access to North American Lane and Daentl Road
- Better addresses travel demands
- Significantly less costly
- ***Stop Sign vs Signal***

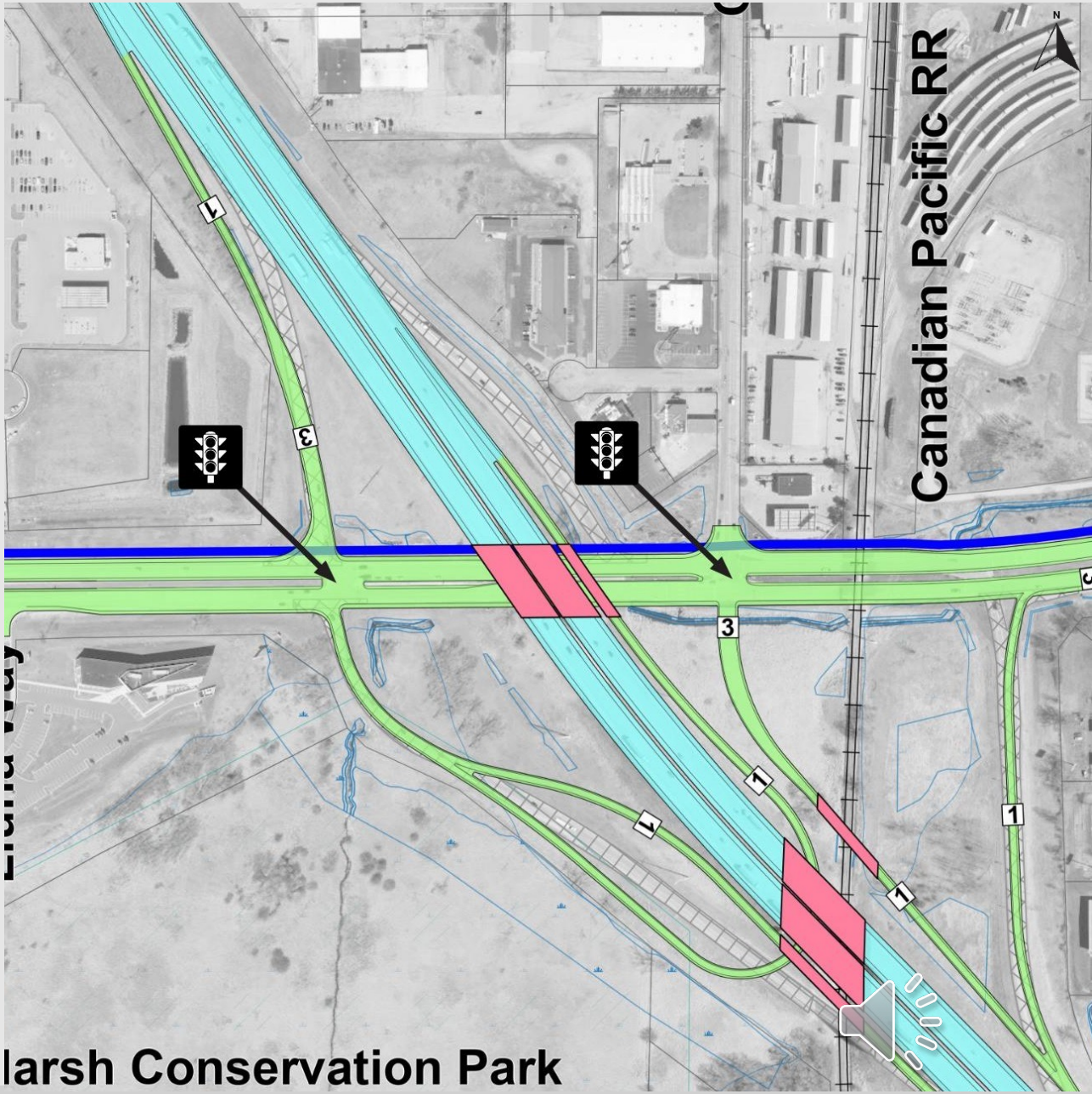


Remaining interchange alternatives

WIS 19 Interchange

U-Ramp

- Consolidates intersections
- U-Ramp
- Removes signals
- Increases capacity to six lanes
- Best addresses safety

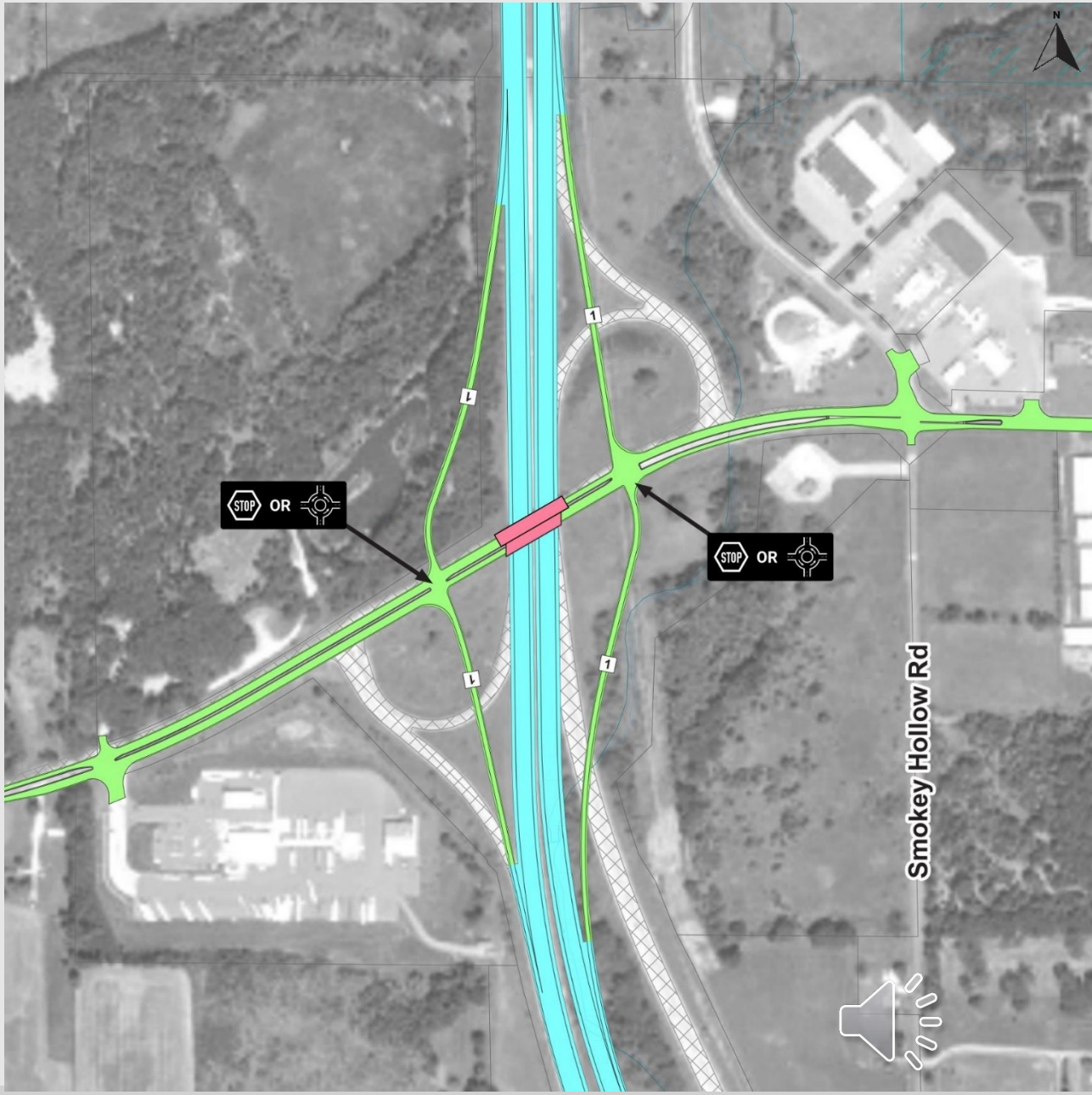


Remaining interchange alternatives

County CS Interchange

Diamond

- Increases ramp lengths
- Improves safety
- Less stream relocation than Partial Cloverleaf
- ***Stop Signs vs Roundabouts***

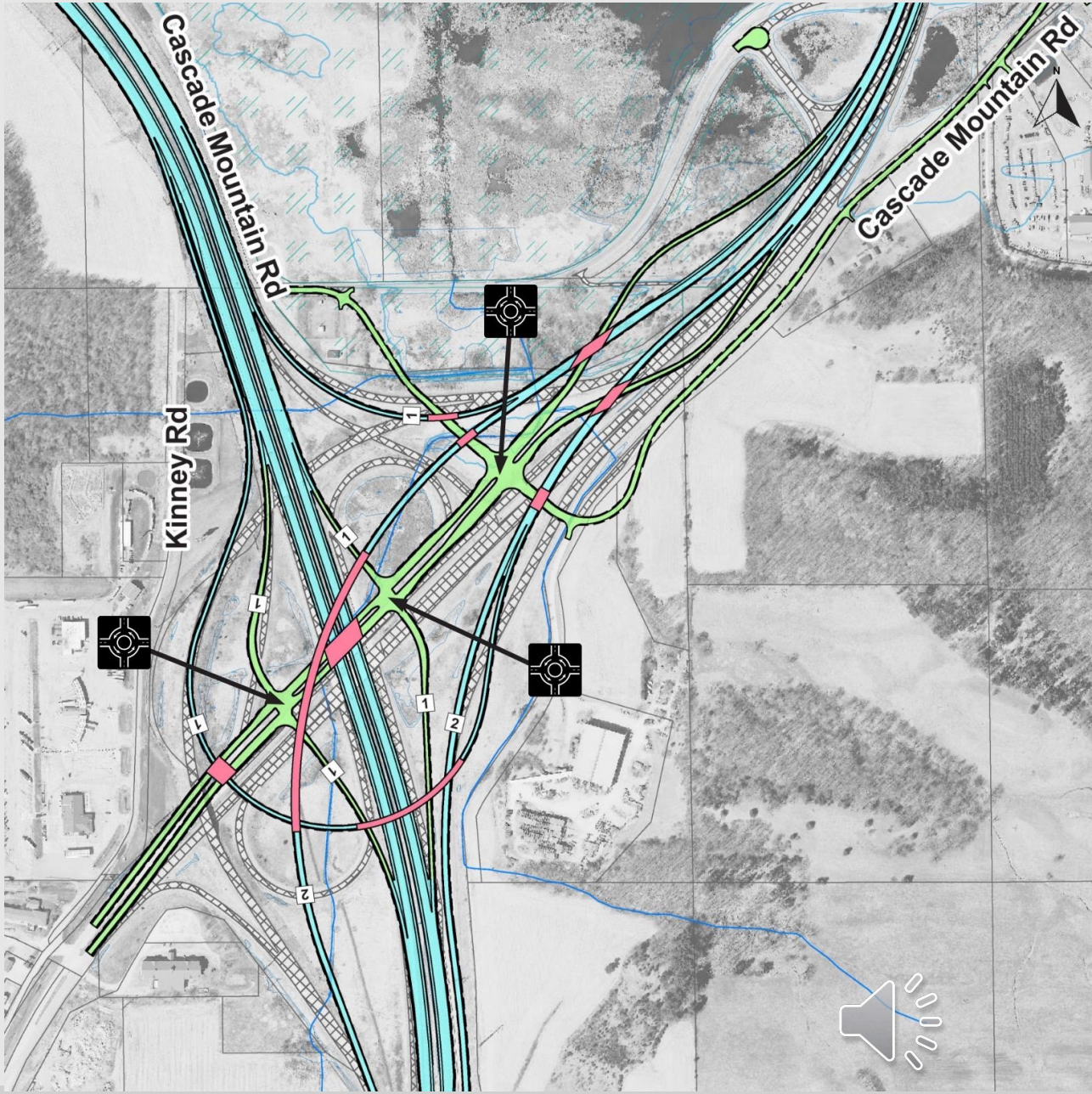


Remaining interchange alternatives

I-39 I-90/94 Split Interchange

Low Build

- Provides access to Cascade Mountain through WIS 78
- Removes Cascade Mountain interchange
- All system-to-system movements are right-hand ramps
- Not as tall or costly as other alternative

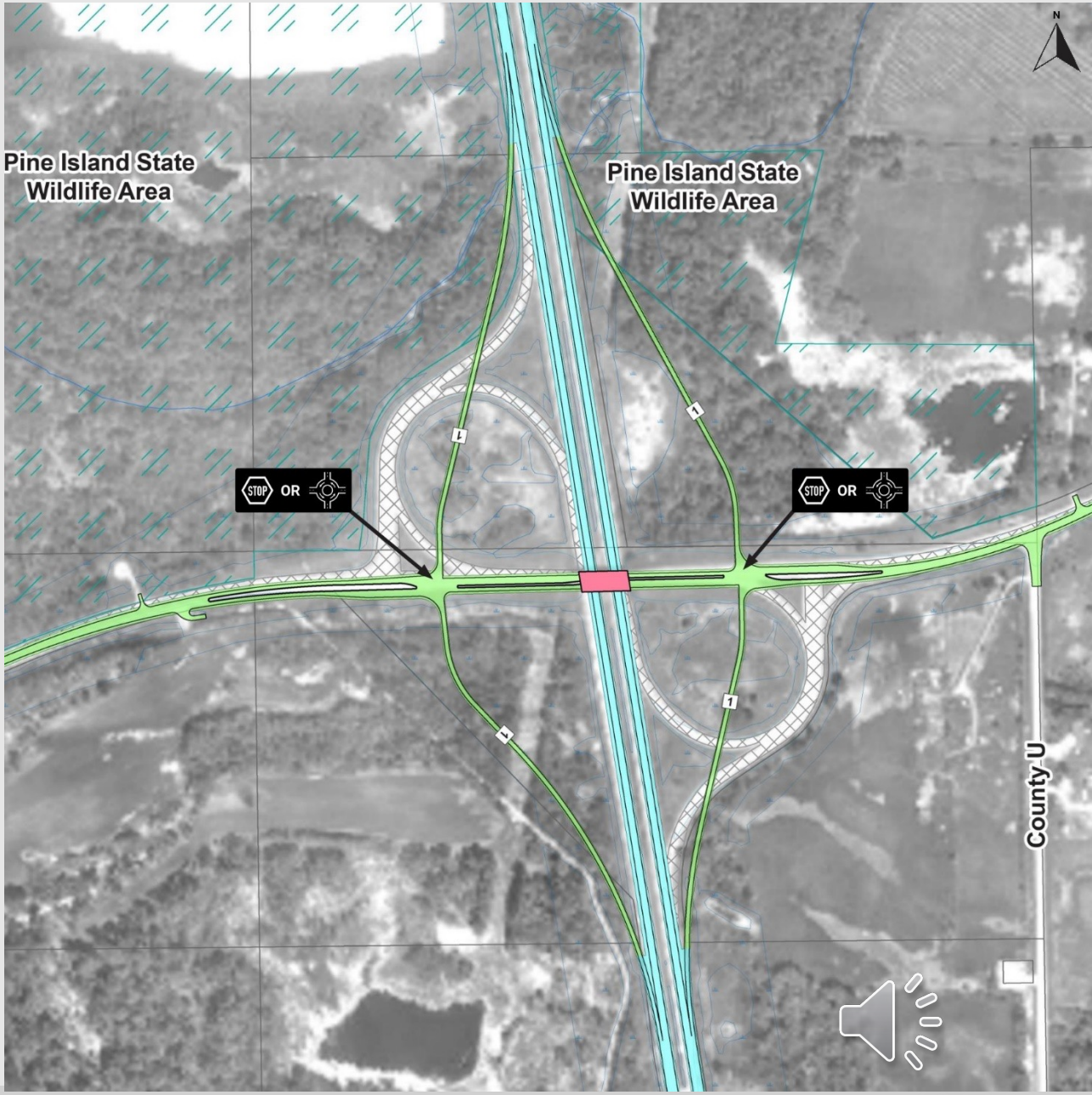


Remaining interchange alternatives

WIS 33 Interchange at I-39

Diamond

- Fewer impacts to Pine Island State Wildlife Area
- Raises the elevation of the interchange
- ***Stop Signs vs Roundabouts***



Remaining interchange alternatives

WIS 33 Interchange at I-90/94

Partial Cloverleaf

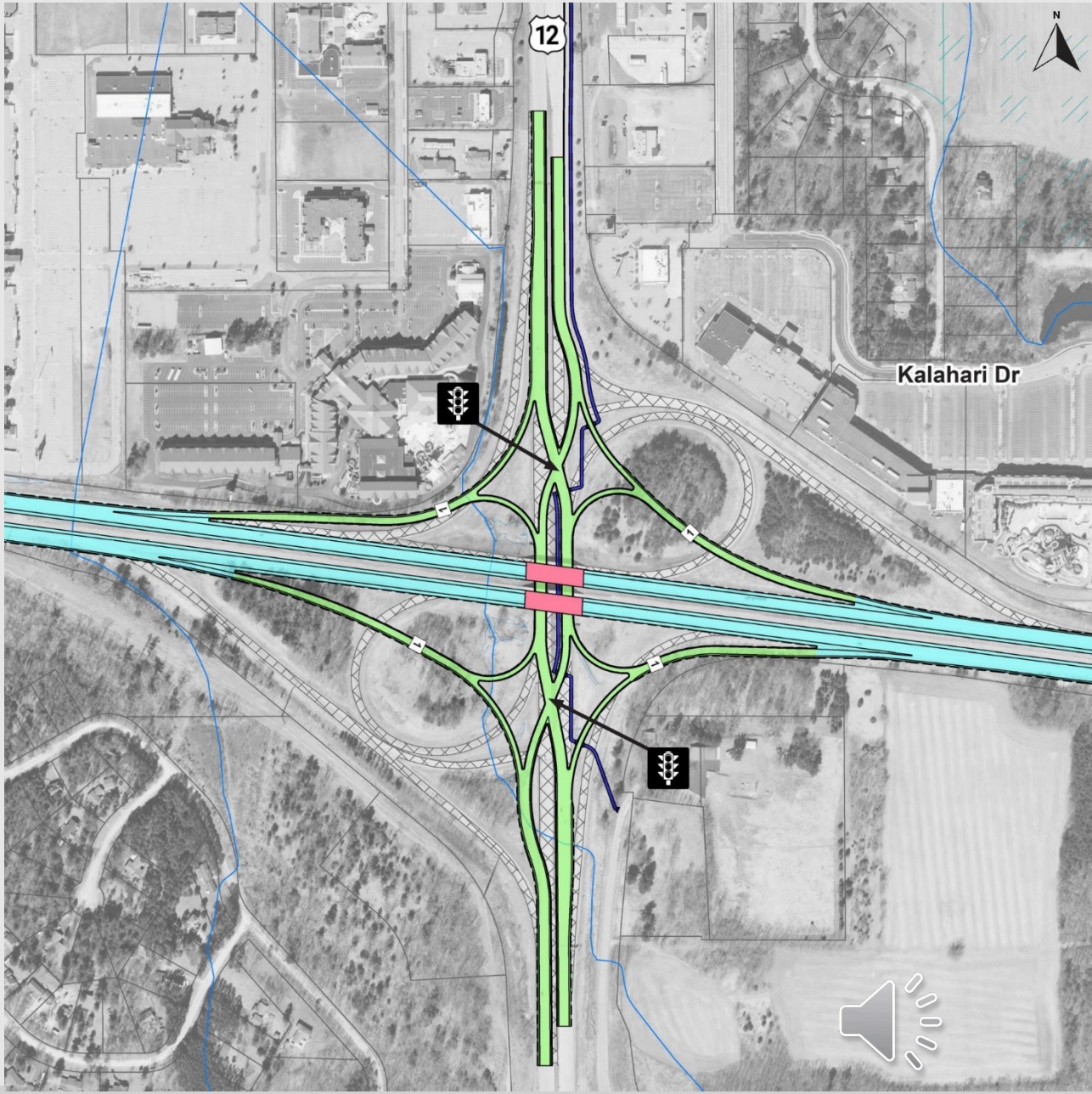
- Raises the elevation of the interchange
- Lengthened on- and off-ramps
- Fewer environmental impacts than other alternative
- ***Stop Signs vs Roundabouts***

Remaining interchange alternatives

US 12 Interchange

Diverging Diamond

- Provides free-flow left turns to entrance ramps
- Ramp alignments improve sight distances
- Addresses safety better than other alternatives
- Slightly lower environmental impact than other alternatives

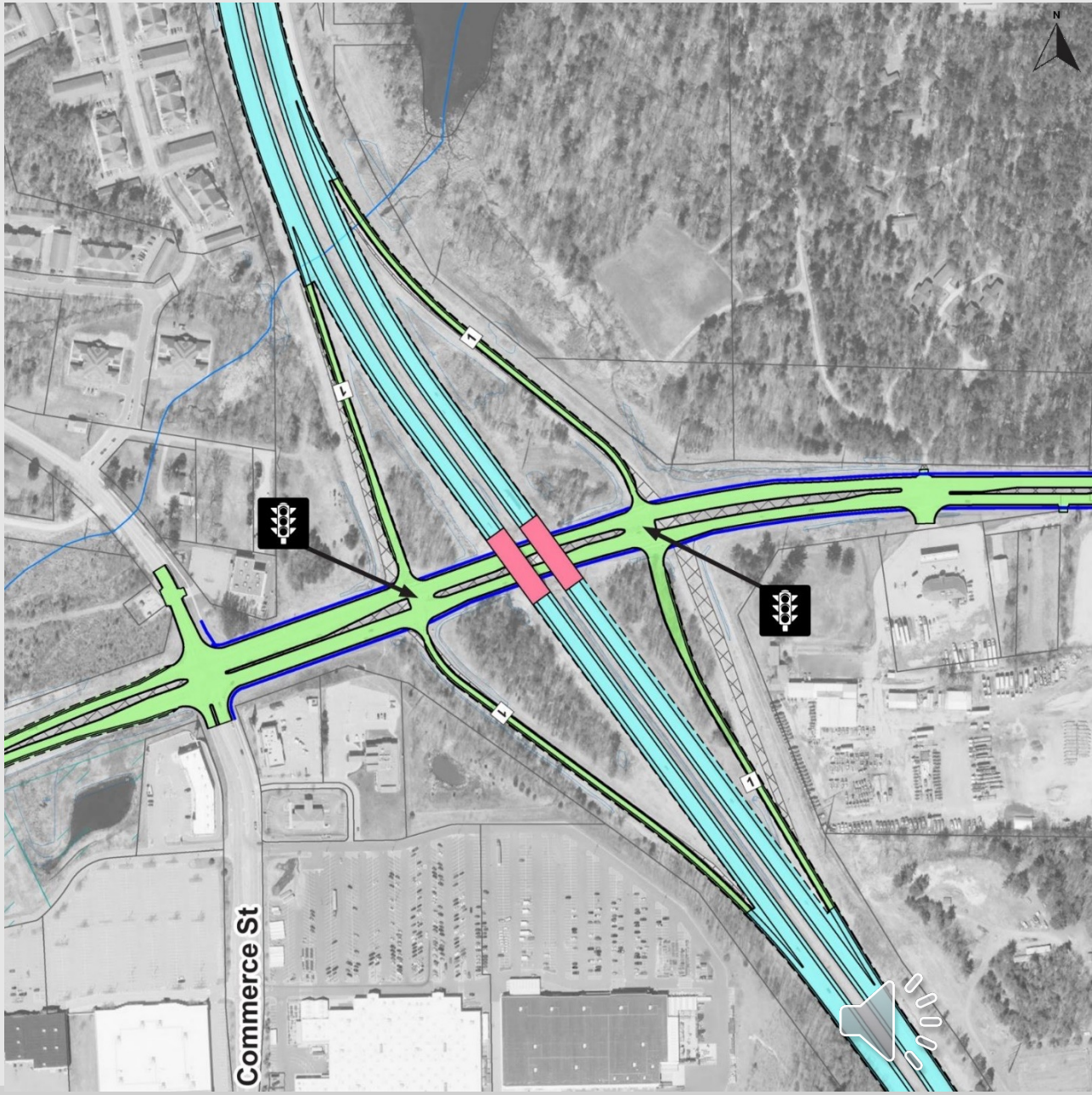


Remaining interchange alternatives

WIS 23 Interchange

Diamond

- Similar footprint to existing
- Improved ramp alignments
- Minimal environmental impacts
- Adequately manages traffic demands

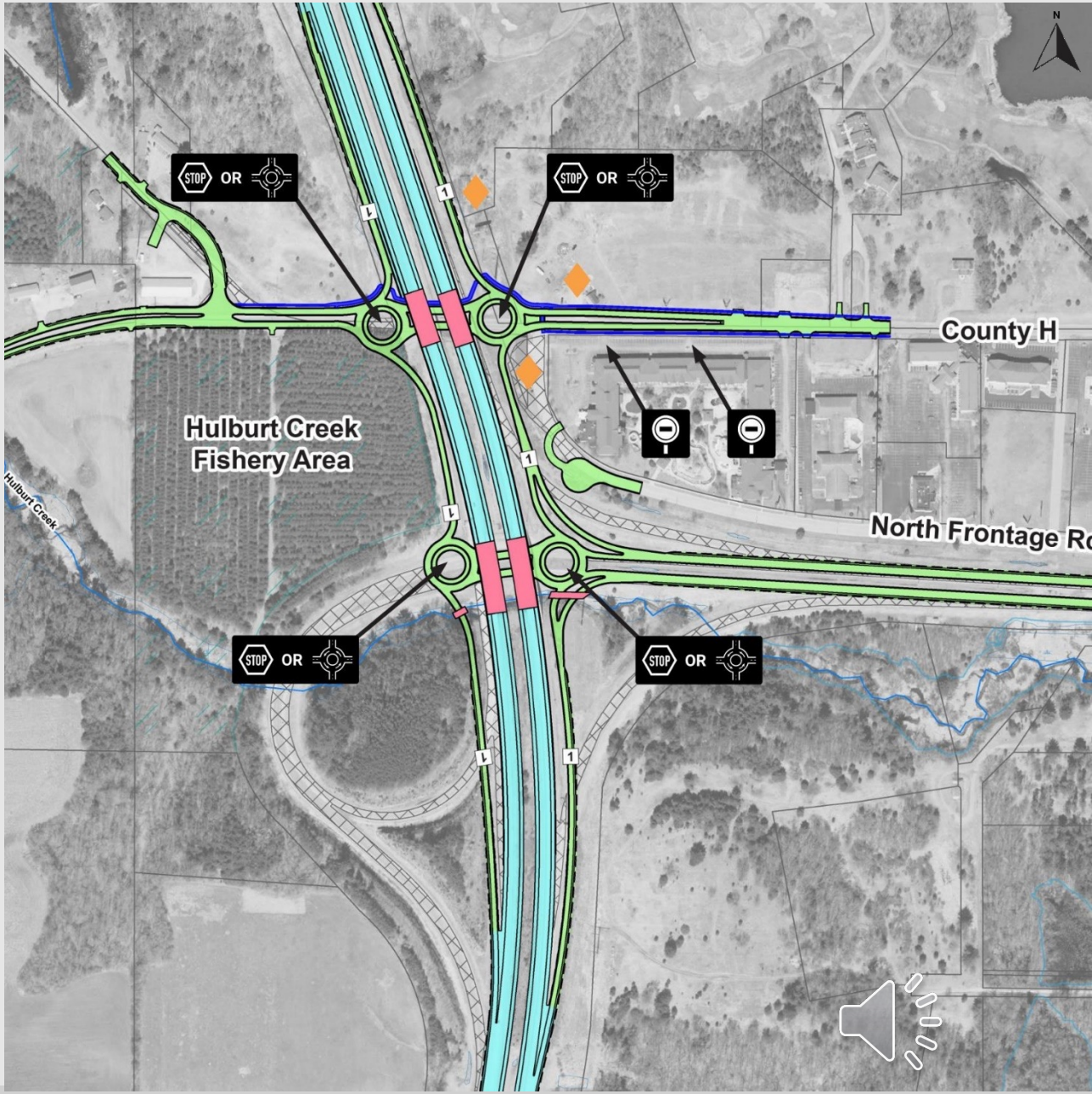


Remaining interchange alternatives

WIS 13 Interchange

Split Diamond

- Provides direct freeway access to County H
- Fewer impacts than diamond alternative
- Requires three relocations
- ***Stop Signs vs Roundabouts***

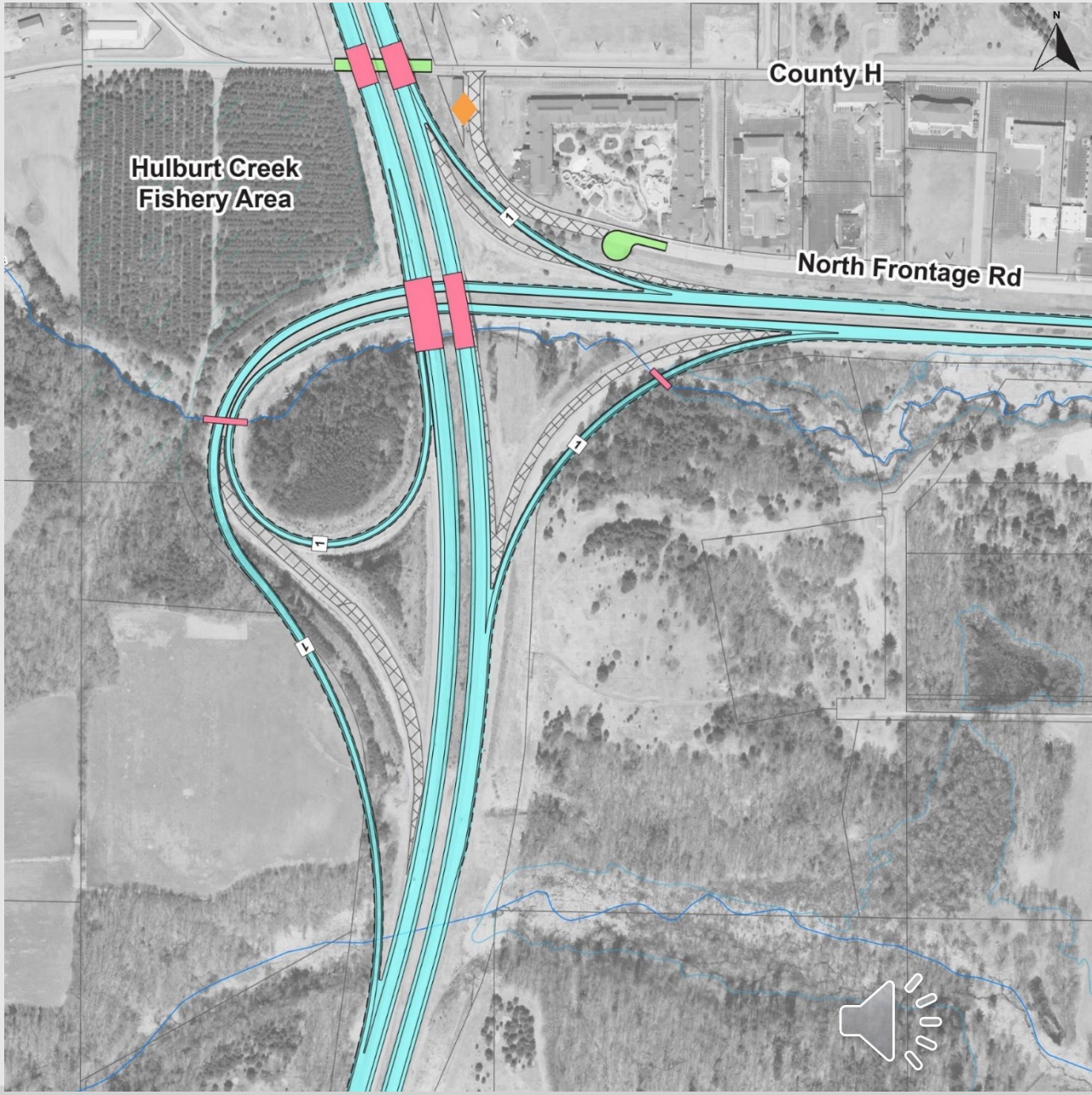


Remaining interchange alternatives

WIS 13 Interchange

Trumpet

- Similar footprint to existing interchange
- Improved ramp geometry
- No direct access to County H
- Only one relocation



Remaining interchange alternatives

US 12/WIS 16 Interchange

Diamond

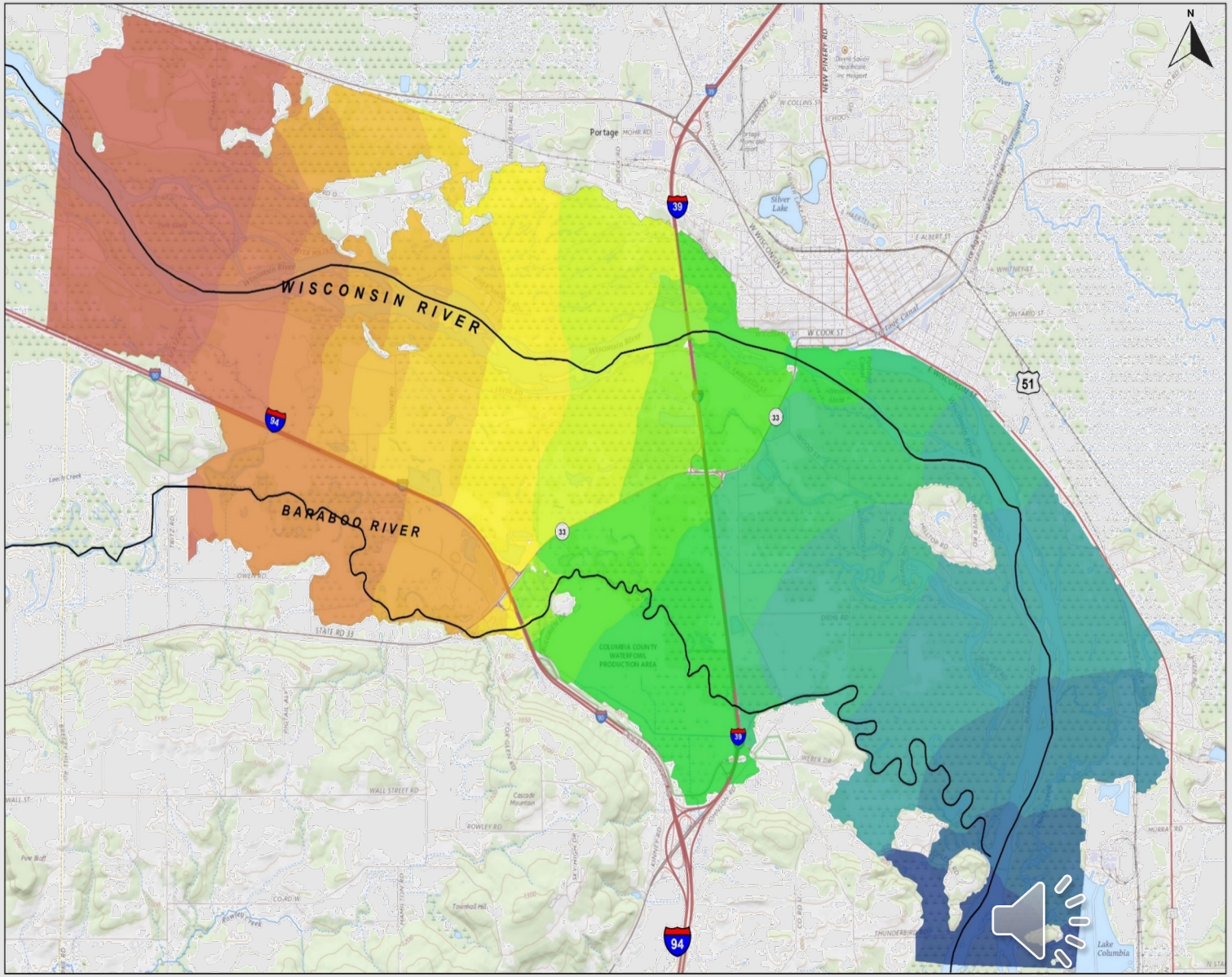
- Similar footprint to existing interchange
- Better sight distance at ramps
- Protected left-turn lanes improves safety
- Keeps 60th Street intersection & improves intersection sight distance

Flooding options

- Major flood events since 2000
  - April 2001
  - June 2004
  - August 2004
  - June 2008
  - August 2018
- Agency coordination
  - Adjacent properties
    - Wisconsin DNR
    - US Fish & Wildlife
    - FEMA
  - Opportunity to review floodplain analysis
    - US Army Corps of Engineers
    - Environmental Protection Agency

Flooding options

- Mitigation goal is to minimize and balance flood impacts to surrounding properties
- Types of mitigation
  - Raise roadway elevation
  - New and/or wider bridges on I-39

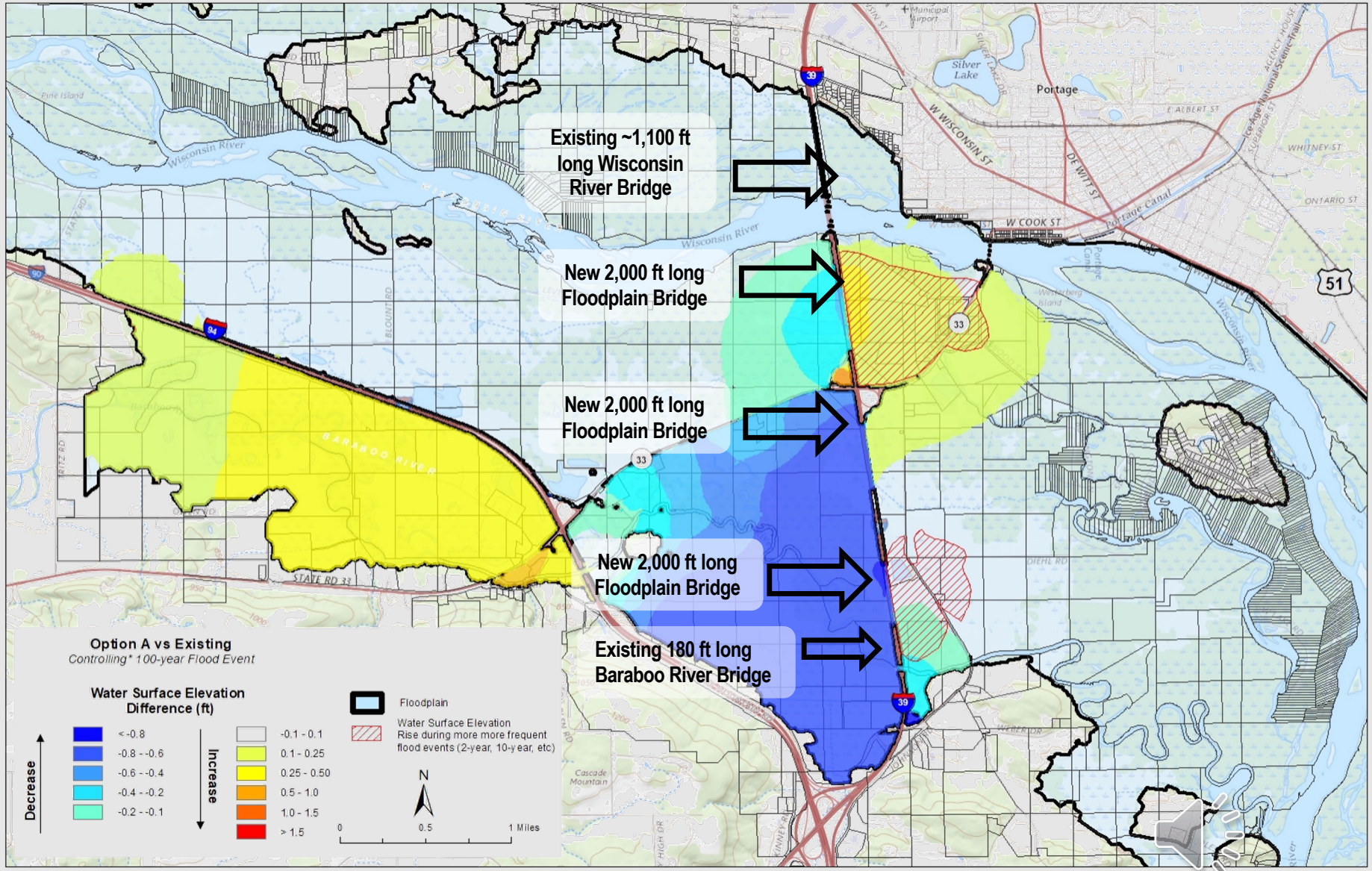


Flooding options

Option A

- Three 2,000-foot floodplain bridges on I-39
- Raise I-39 and I-90/94

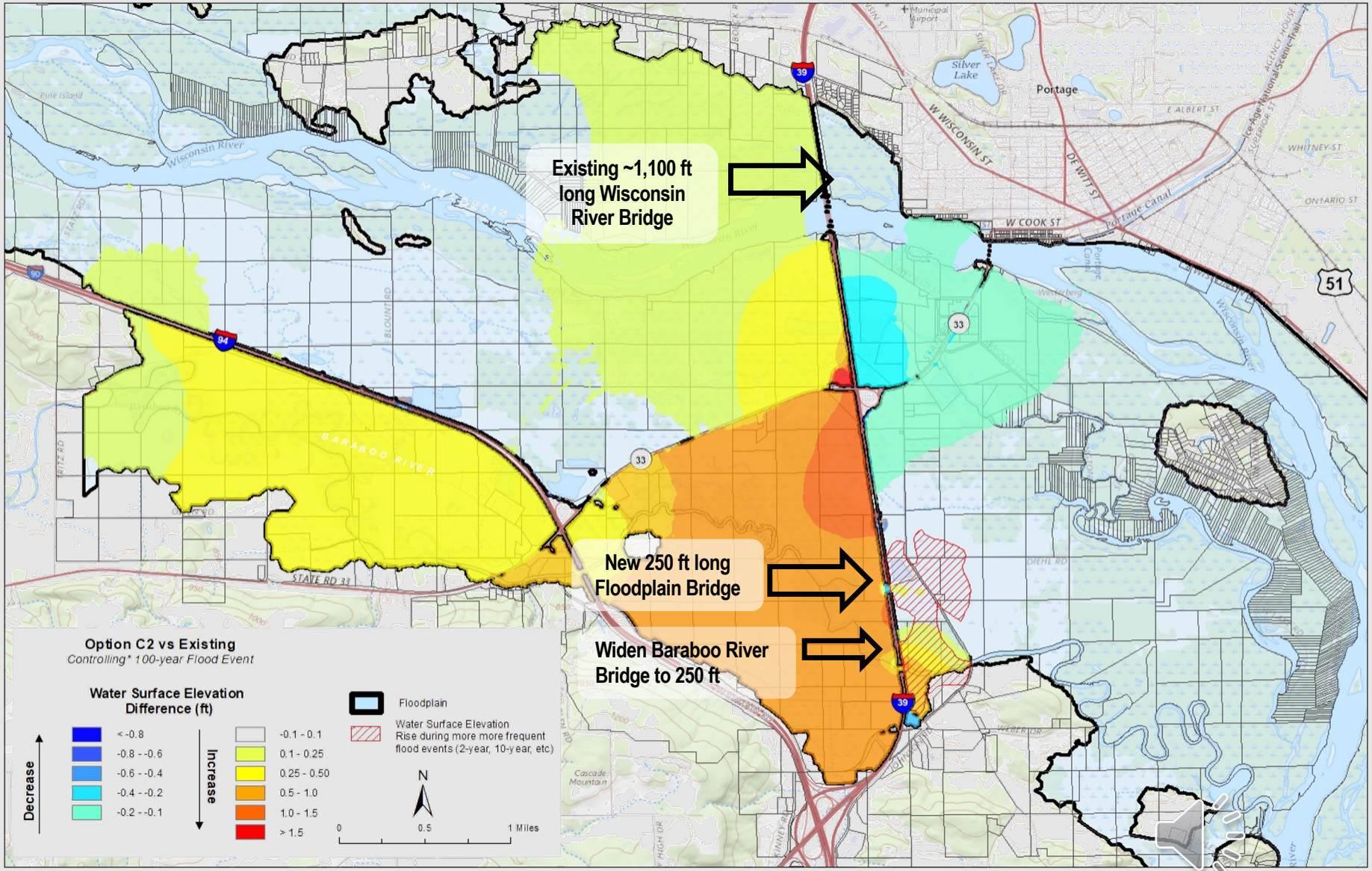
2D Water Surface Elevation Difference



Flooding options

Option C2

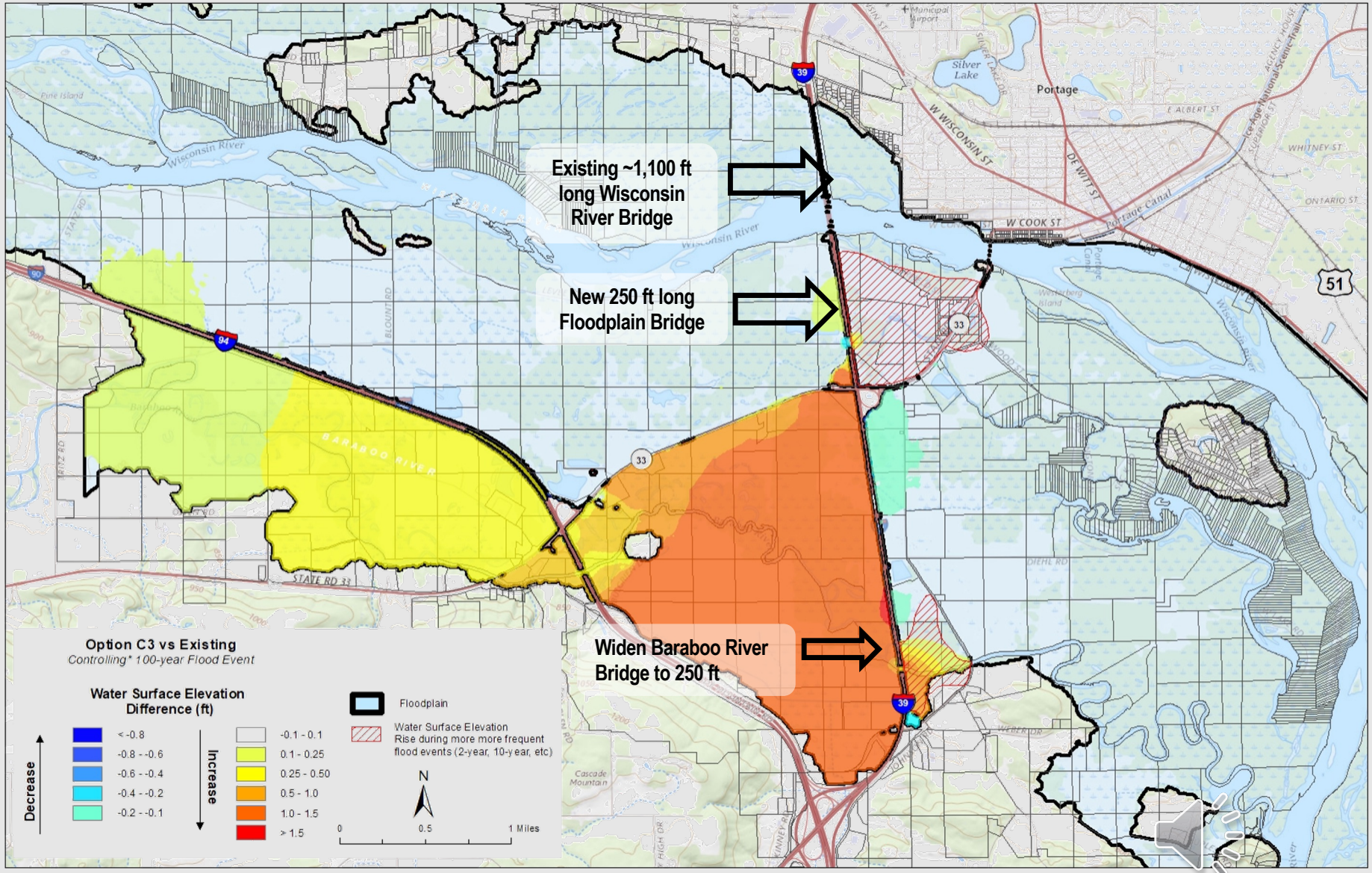
- 250-foot floodplain bridge and widen Baraboo River Bridge (250 feet) on I-39
- Raise I-39 and I-90/94



Flooding options

Option C3

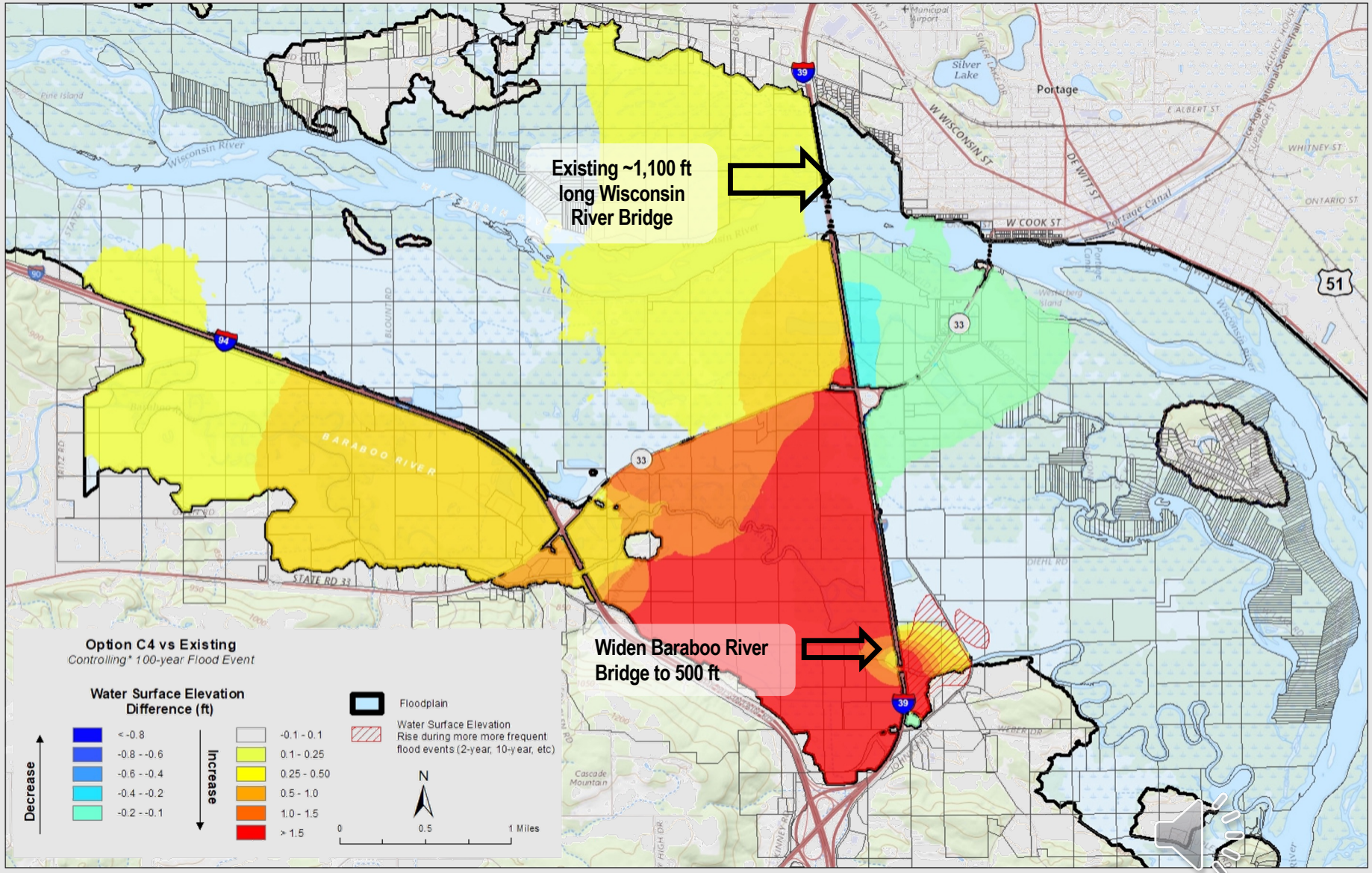
- 250-foot floodplain bridge and widen Baraboo River Bridge (250 feet) on I-39
- Raise I-39 and I-90/94



Flooding options

Option C4

- Widen Baraboo River Bridge to 500 feet on I-39
- Raise I-39 and I-90/94



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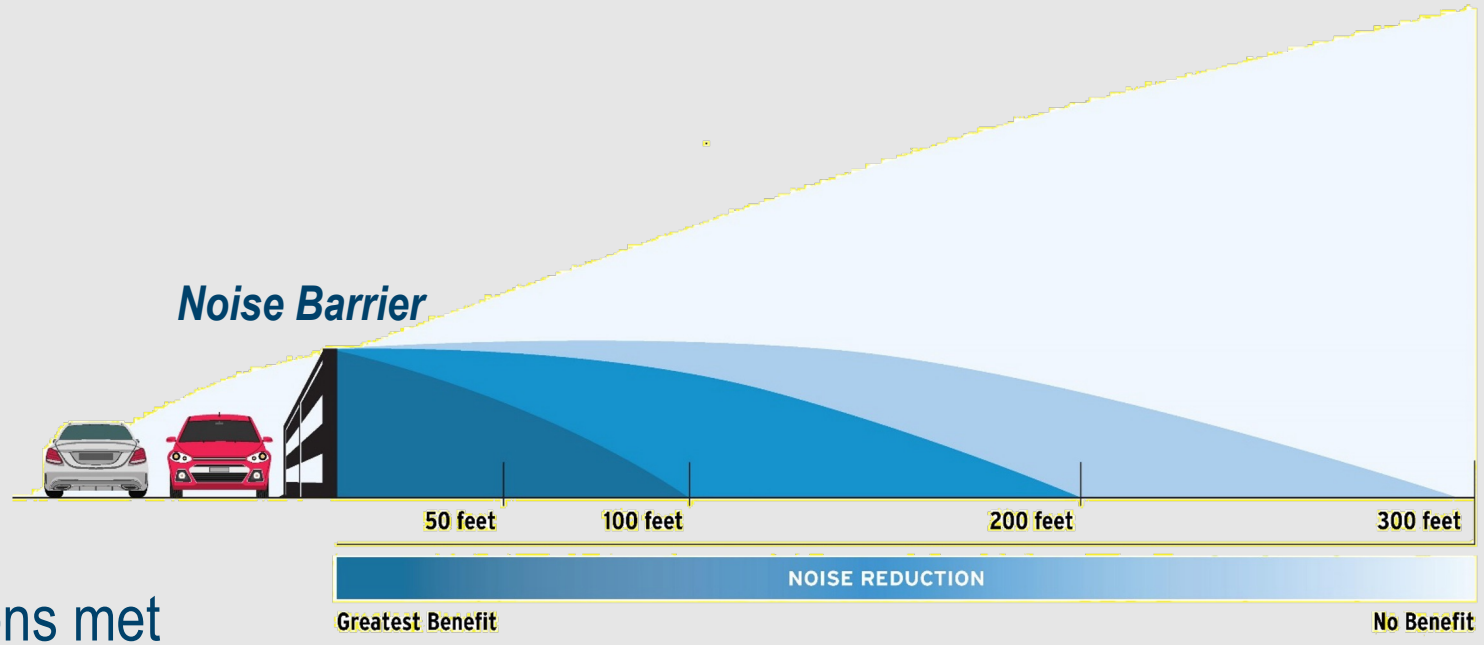
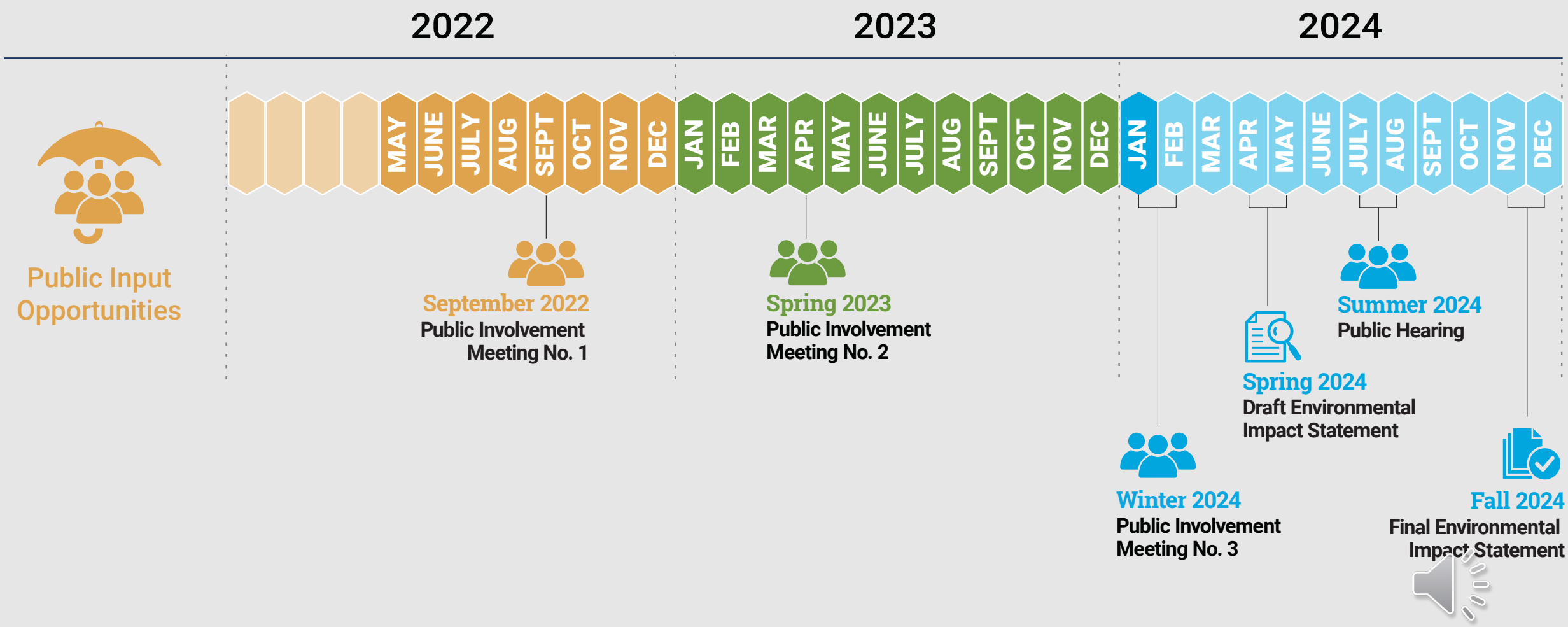
Noise analysis

- Traffic Noise Model (TNM) developed
- Impacted receptors analyzed
- Reasonable and feasible determination
- Public Hearing
- Benefited receptors vote
- Noise barriers constructed if all conditions met



Study schedule and next steps



Contact information

Study Webpage

PIM #3 Materials

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WEB
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