



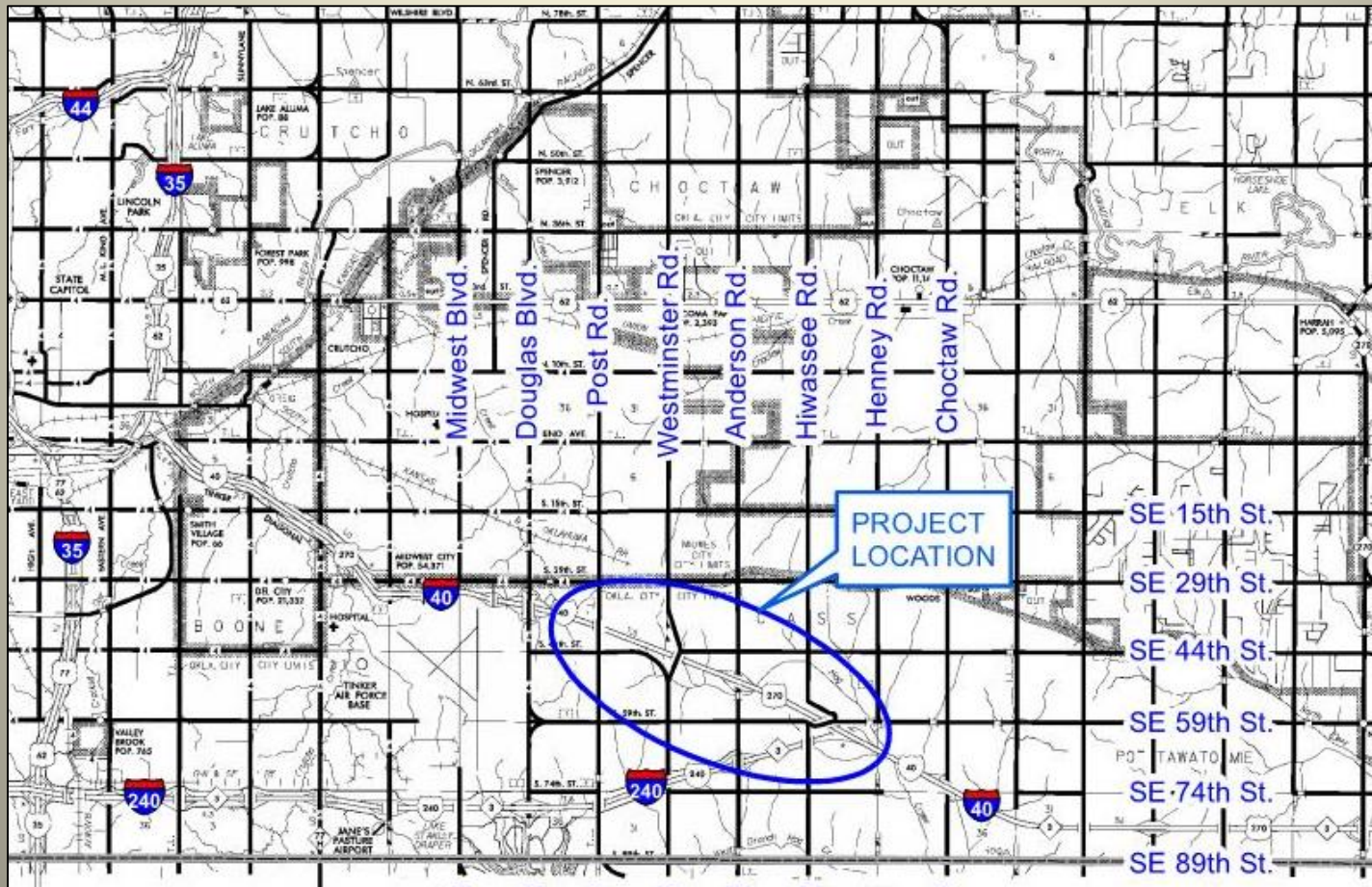
WELCOME

**Public Meeting For
I-40 From East of Douglas Boulevard to I-240
in
Oklahoma County**

February 21, 2017

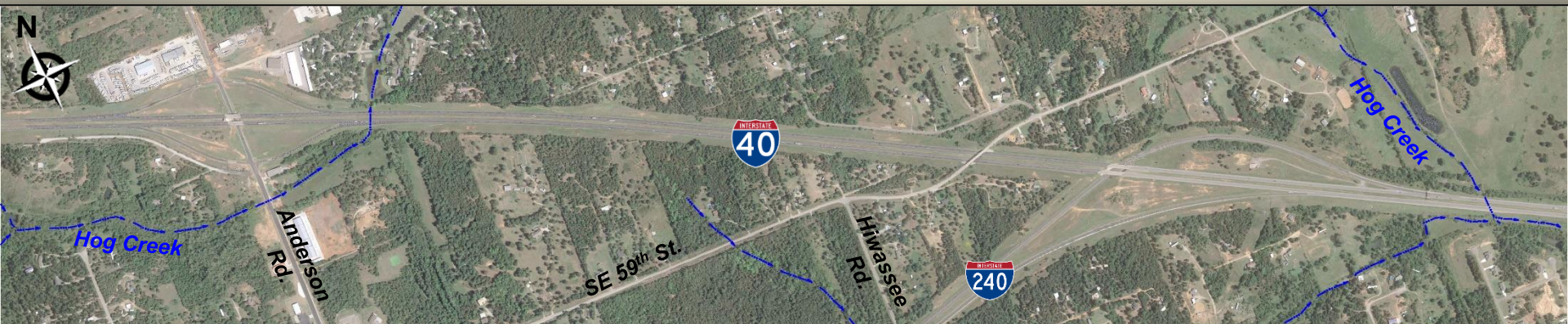
PURPOSE OF THIS MEETING

...is to Inform the Public About Proposed Improvements to I-40 From East of Douglas Boulevard to I-240 in Oklahoma County and Obtain Input



PURPOSE OF THE PROJECT

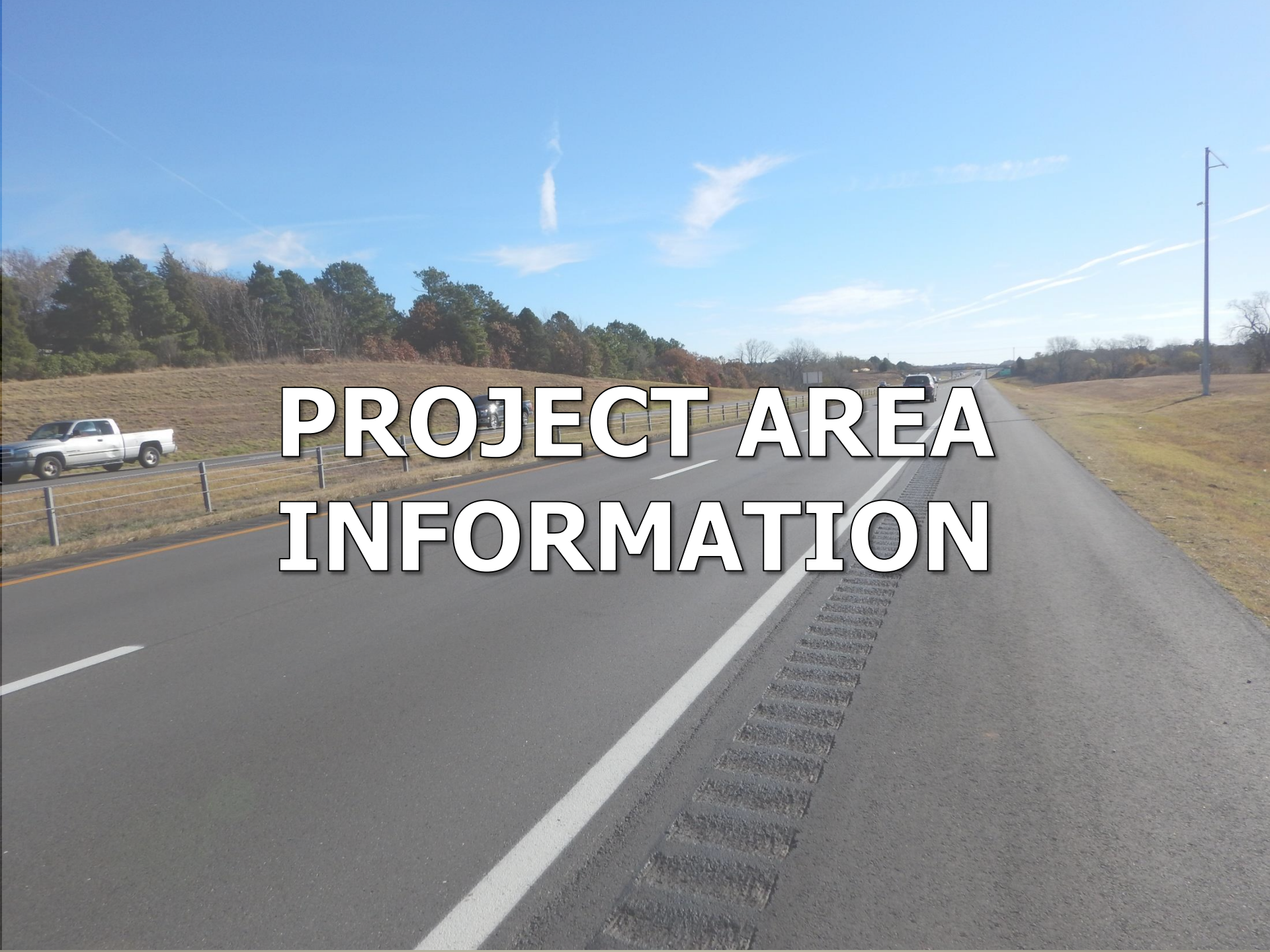
...is to Accommodate Existing and Future Traffic on I-40 and Provide Adequate Vertical Clearance Under Bridges



PROJECT BACKGROUND

- **ODOT is Currently Studying Improvements on I-40 From I-35 to I-240, Including**
 - Additional Driving Lanes
 - Frontage Roads (I-35 to Douglas Blvd.)
 - Bridge Improvements
- **Projects Currently Scheduled Include**
 - ◆ I-40 and Scott Street
 - ◆ I-40 and Sunnyslane Road
 - ◆ I-40 and Crutch Creek & 15th St.
 - ◆ I-40 and Sooner Road
 - ◆ I-40 and Douglas Boulevard
 - I-40 Between Douglas and I-240
 - I-40 and Choctaw Road





PROJECT AREA INFORMATION


CURRENT PROJECT AREA INFORMATION

■ General Data on I-40

- Project Length - 4.8 Miles
- Original Construction 1963
- 4 Overlays to Date (1975, 1988, 2002, 2015)
- 4-Lane Divided Freeway With
 - 10-Foot Outside Shoulders
 - 4-Foot Inside Shoulders
 - Grass Median With Cable Barrier
- Speeds – Posted 70 mph
- Current Traffic (2015):
 - 44,260 Vehicles/Day (East of Douglas)
 - 37,960 Vehicles/Day (East of Anderson)
- Projected Traffic (2045):
 - 63,240 Vehicles/Day (East of Douglas)
 - 53,080 Vehicles/Day (East of Anderson)
 - 15% Trucks



EXISTING BRIDGES

- **Bridges over I-40** 
 - Post Road – 16' 4" Vertical Clearance
 - Westminster Road – 16' 4" Vertical Clearance
 - SE 59th Street – 17' 3" Vertical Clearance



Westminster Rd. – Concrete Slab Span Bridge



SE 59th St. – Steel Beam Span Bridge



EXISTING BRIDGES

■ I-40 Bridges

- Anderson Road (2 bridges) – 14' 10" Vertical Clearance
- Hog Creek – Reinforced Concrete Box
- I-240 WB Ramp (2 bridges) – 17' 8" Vertical Clearance



Anderson Rd. – Steel Beam Span Bridge



Hog Creek – 3 Cell Reinforced Concrete Box



CURRENT PROJECT AREA INFORMATION

■ Collision Data (2006-2016)

- Total: 677 Documented Accidents
 - 448 Property Damage Only
 - 220 Involved Injury (332 People)
 - 9 Fatal (10 People)
- On Average More Than 1 Accident/Week



■ Most Common Types

1. Fixed Objects (Cable Barrier)
2. Rear Ends
3. Side Swipes Same Direction



Overall Accident Rate is 1.4 Times the State Average for Similar Highways.

Fatal Accident Rate is Nearly 2 Times the State Average

EXISTING CONDITIONS WARRANT IMPROVEMENT

■ Traffic Conditions

- Existing Traffic –
Level of Service (LOS) D
- Future Traffic –
Level of Service (LOS) F

■ Pavement Condition

■ Bridge Conditions

- Provide Adequate Vertical Clearance of 16' 9"
- Provide Adequate Bridge Width for New Lanes
- SE 59th Street Bridge Recently Replaced – No
Additional Work



PROJECT CONSTRAINTS



PROJECT CONSTRAINTS

- **Identified Key Project Features/Constraints and Collected Data**
 - Utilities
 - Developments
 - Homes
 - Businesses
 - Environmental
 - Cultural Resources
 - Threatened & Endangered Species
 - Waters and Wetlands
 - Sites Containing Potentially Hazardous Materials
 - Noise



PROJECT CONSTRAINTS

- **The Project Will Have NO IMPACTS To:**
 - Private Property (No Acquisition Required)
 - Wetlands
 - Cultural Resources
 - Historic Sites
 - Parks
 - Farmlands



PROJECT CONSTRAINTS

■ Project Constraints

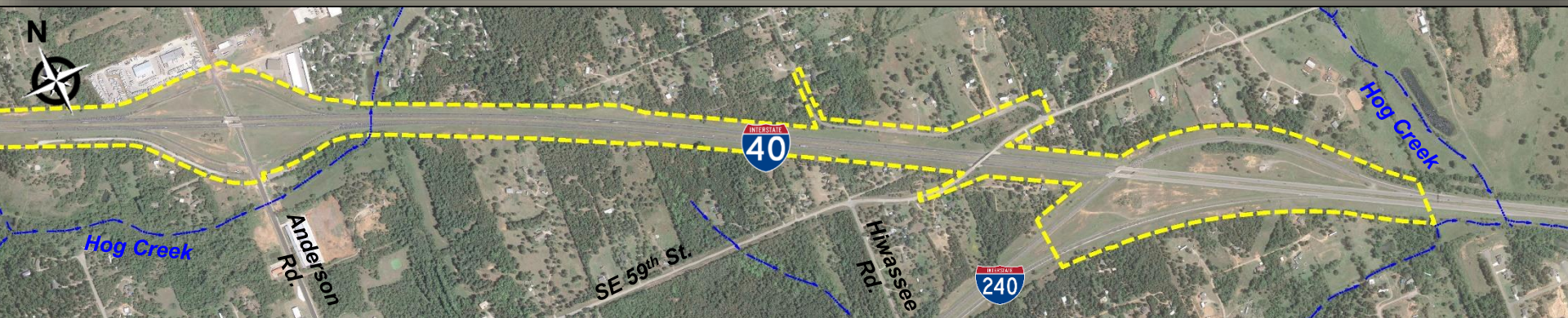
- Utilities
 - Under Ground
 - Electric, Fiber Optic (ODOT Lines)
- Utility Relocations, if Required, Will Occur Prior to Construction



PROJECT CONSTRAINTS

Streams

- Four (4) Identified Streams are Located Within the Study Area.
- Minimal Impacts May Occur if Culverts are Extended. Appropriate Permits Will be Obtained From the US Army Corps of Engineers



PROJECT CONSTRAINTS

- **Threatened & Endangered Species**

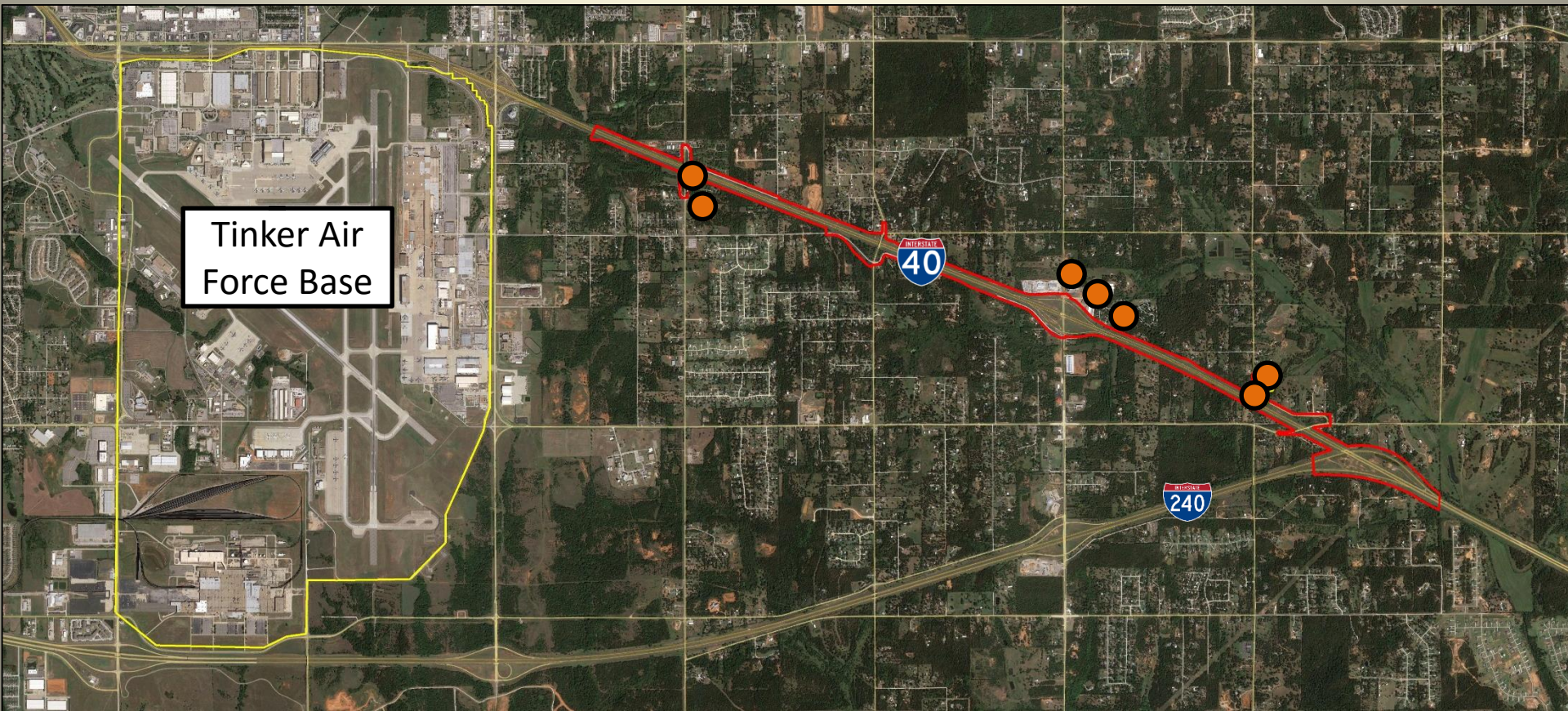
- No Suitable Habitat for Threatened and Endangered Species
- Bridges may Provide Nesting Habitat for Migratory Birds (Cliff and Barn Swallows)



PROJECT CONSTRAINTS

- **Storage Tank Sites or Potentially Hazardous Materials**

- Seven (7) Low-Risk Sites Were Located Near the Project, but Will not be Affected by the Project





Tom Steed
Memorial
Highway

PROPOSED DESIGN

PROPOSED ROADWAY

■ I-40 Improvements

- Full Pavement Reconstruction
- Roadway Typical Sections
 - Six 12-Foot-Wide Lanes
 - 10-Foot-Wide Outside & Inside Shoulder (or as Wide as Possible)
 - Concrete Median Barrier
- Design Speed – 70 mph
- Extend Acceleration & Deceleration Lanes for Anderson Rd. Interchange
- I-40 Will Remain Open During Construction



PROPOSED ROADWAY

■ I-40 Improvements

- Full Pavement Reconstruction
- Roadway Typical Sections
 - Six 12-Foot-Wide Lanes
 - 10-Foot-Wide Outside & Inside Shoulder (or as Wide as Possible)
 - Concrete Median Barrier
- Design Speed – 70 mph
- Extend Acceleration & Deceleration Lanes for Anderson Rd. Interchange
- I-40 Will Remain Open During Construction



PROPOSED SPAN BRIDGES

Proposed Post Road Bridge

- I-40 Will be Lowered Approximately 6” for Vertical Clearance
- No Change to Post Road
- Post Road Will Remain Open During Construction



PROPOSED SPAN BRIDGES

- **Proposed Westminster Road Bridge**
 - Westminster Road Bridge Will be Raised Approximately 1' to Provide Vertical Clearance
 - Westminster Roadway Will Tie Back to Existing
 - Temporary Road Closure During Construction – Estimated at 60 Days



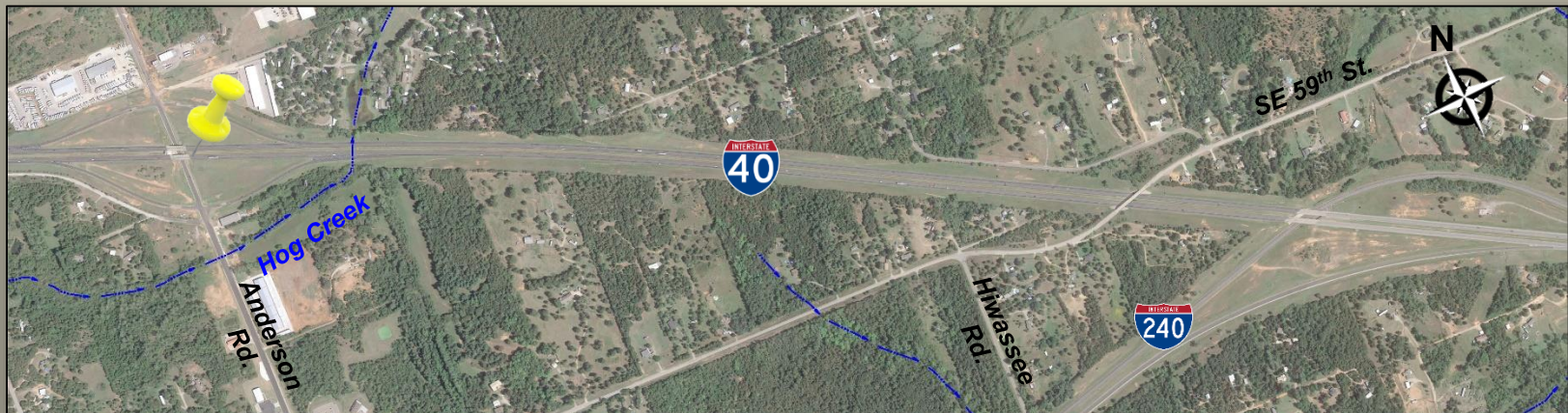
PROPOSED SPAN BRIDGES

Proposed Anderson Road Bridges

- One Bridge
 - 117 Feet Wide – 6 Lanes
 - 3 Spans – 215 Feet Long
 - Prestressed Concrete Beams
- Vertical Clearance – 16'-9"
- Horizontal Clearance for Future Improvements on Anderson Road
- Phased Construction - I-40 and Anderson Road will Remain Open



Example of a Prestressed Concrete Beam Bridge



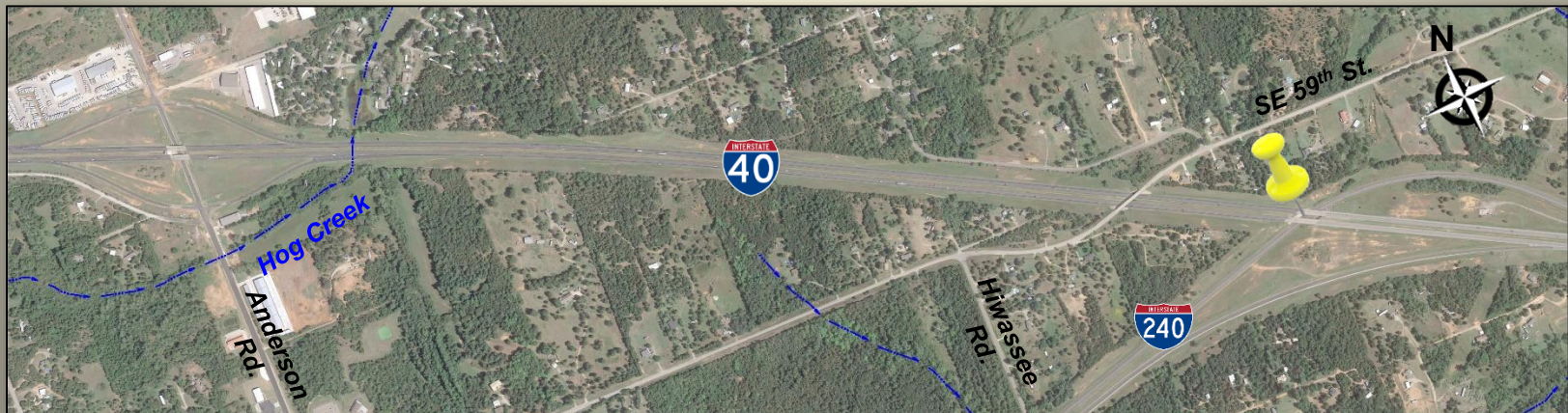
PROPOSED SPAN BRIDGES

Proposed I-240 WB Ramp Bridges

- One Bridge
 - 117 Feet Wide – 6 Lanes
 - 3 Spans – 202 Feet Long
 - Rolled Steel Beams
- I-40 and I-240 Ramp Will Remain Open



Example of a Rolled Steel Beam Bridge





PROJECT IMPACTS

NOISE STUDY

- **A Noise Study was Completed According to Federal Highway Administration (FHWA) Regulations and ODOT Noise Policy**
 - Existing (2015) and Future (2045) Noise Levels were determined by the FHWA Traffic Noise Model, factoring in roadways, traffic data, terrain and receptor site locations.
 - Validation to verify accuracy of Noise Model was completed by taking sample readings with a precision sound level meter
 - Eighty-Nine (89) Noise-Sensitive Receptors (Homes) at various distances adjacent to I-40 were evaluated.



NOISE IMPACTS

- **Existing Noise Condition**

- Based on Existing I-40 Roadway Features and Traffic Volumes

- **Future Noise Condition**

- Based on Additional Lanes on I-40 and Increased Traffic Volumes - Will Generate More Noise
- Traffic Will Not be any Closer to Homes than Today

- **Noise Impacts**

- An Impact Occurs When Exterior Future Noise Levels are 66 dB(A) or Above, or When Future Levels are 15-dB or More Above Existing Levels
- For Existing Condition – 38 Homes Impacted
- For Future Condition – 56 Homes Impacted
- Future Levels Range 59.9 to 77.2 dB(A)
- Future Levels over Existing Levels Range +0.9 to +5.4 dB



NOISE WALL CONSIDERATION

- **Noise Walls Were Considered for all Impacted Homes – Walls Must Meet ODOT's Feasible and Reasonable Criteria**

- A Benefitted Receptor Must Achieve at least 5 dB Reduction to be considered Feasible.
- Reasonableness Means that a Wall Must Achieve at Least a 7 dB Reduction for at Least 75% of Benefitted Receptors, and
- Noise Wall cost Must not Exceed \$30,000 per Benefitted Receptor.

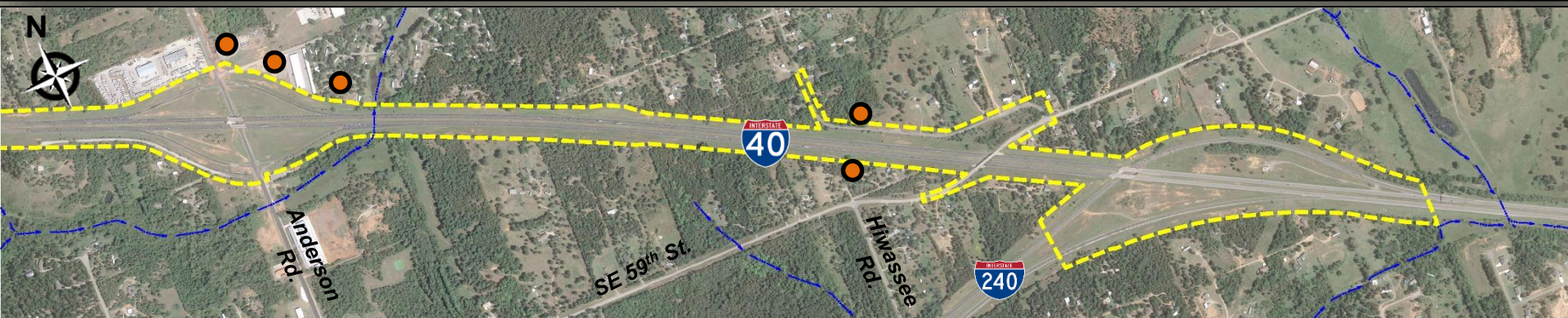
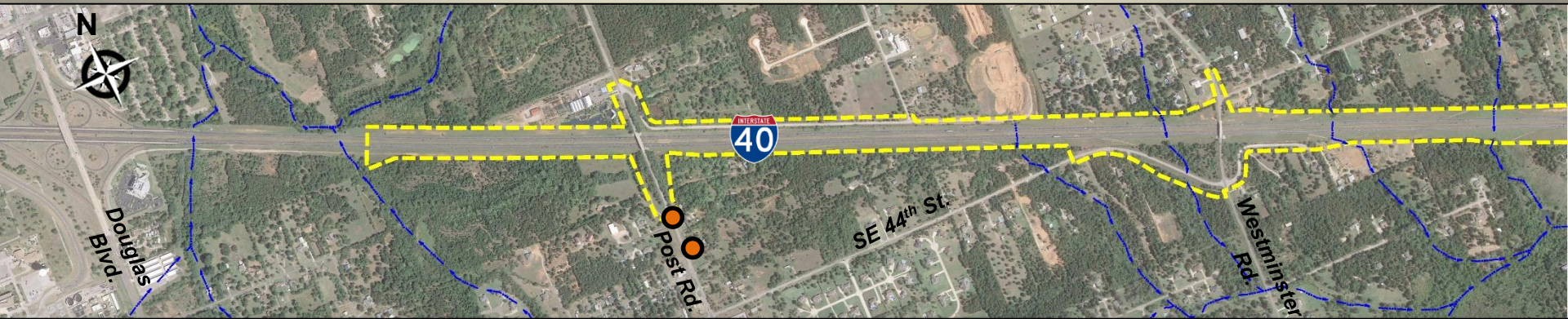


- **Modeling Determined that Noise Walls would be Ineffective due to:**

- Not Achieving a Reasonable Acoustic Reduction at a 22-foot Maximum Wall Height
- High Cost Per Benefitted Receptor - in All Cases Exceeding \$100,000
- Therefore, Noise Walls are Not Recommended for this Project.

PROJECT SUMMARY

- **Proposed Improvements**
 - New Lanes in the Median
 - New Pavement
 - Lower I-40 Under Post Road
 - Raise Westminster Bridge
 - New Bridges for I-40 Over Anderson Rd. and I-240
- **Proposed Improvements – All Within Existing Right-of-Way**



CONSTRUCTION SCHEDULE AND COST

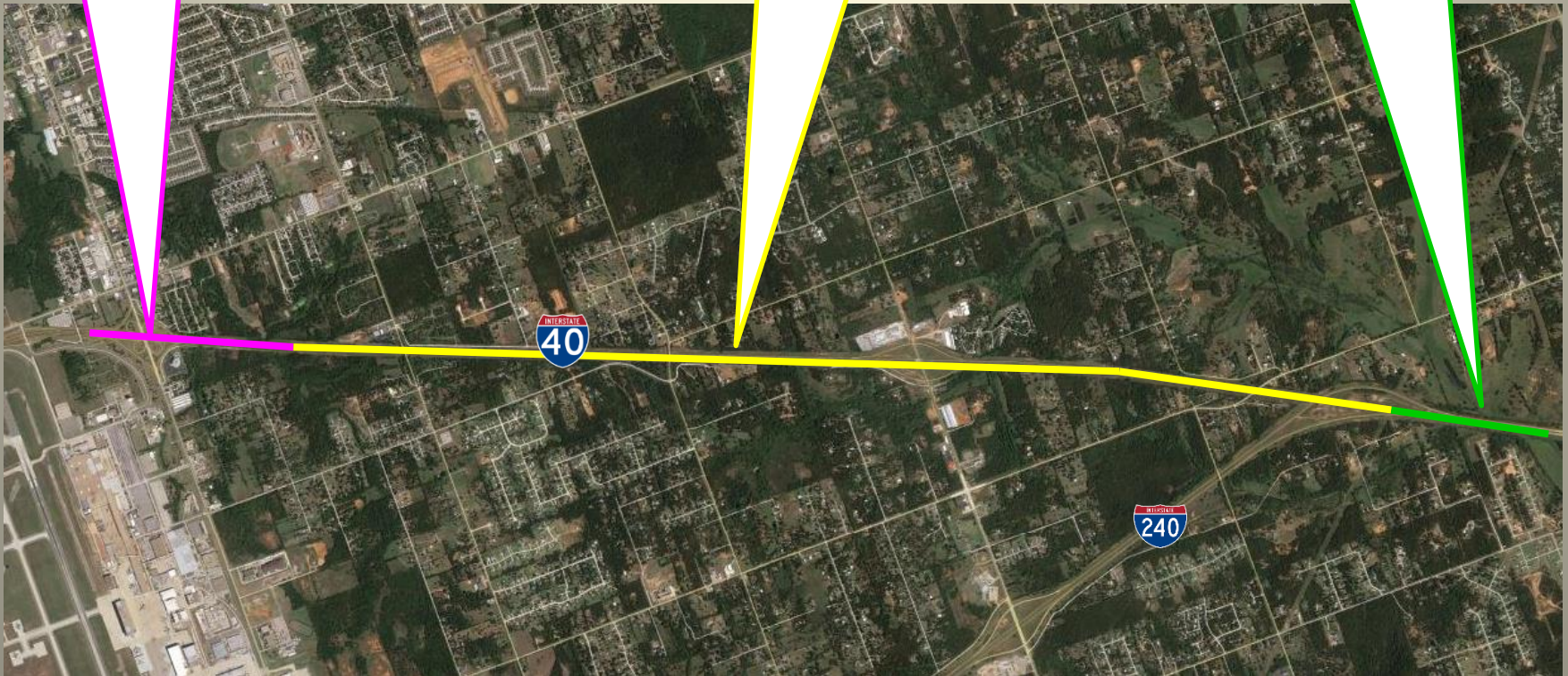


SCHEDULE

I-40 & Douglas Blvd.
Right-of-Way: 2017
Construction: 2020
Cost: Est. \$46 M

I-40, Douglas to I-240
No R/W or Utilities
Construction: 2020
Cost: Est. \$70.1 M

I-40 & Choctaw Road
Construction: 2017
Cost: Est. \$43.5M



THANK YOU!

**Please Submit Your Comments by
March 7, 2017**

- ✓ **Leave Your Comment Form Here Tonight**
- ✓ **Mail the Comment Form Back to ODOT:**
Environmental Programs Division
200 NE 21st Street
Oklahoma City, OK 73105
- ✓ **Email Your Comments to Environment@ODOT.ORG**
- ✓ **Submit via Internet at www.odot.org/publicmeetings**

QUESTIONS?