

# **METROPOLITAN TRANSPORTATION PLANNING AND PROGRAMMING**

**ASCE Dallas Branch Meeting  
December 12, 2016**

**Michael Morris, P.E.  
Director of Transportation  
North Central Texas Council of Governments**

**<http://www.nctcog.org/trans/presentations/index.asp>**

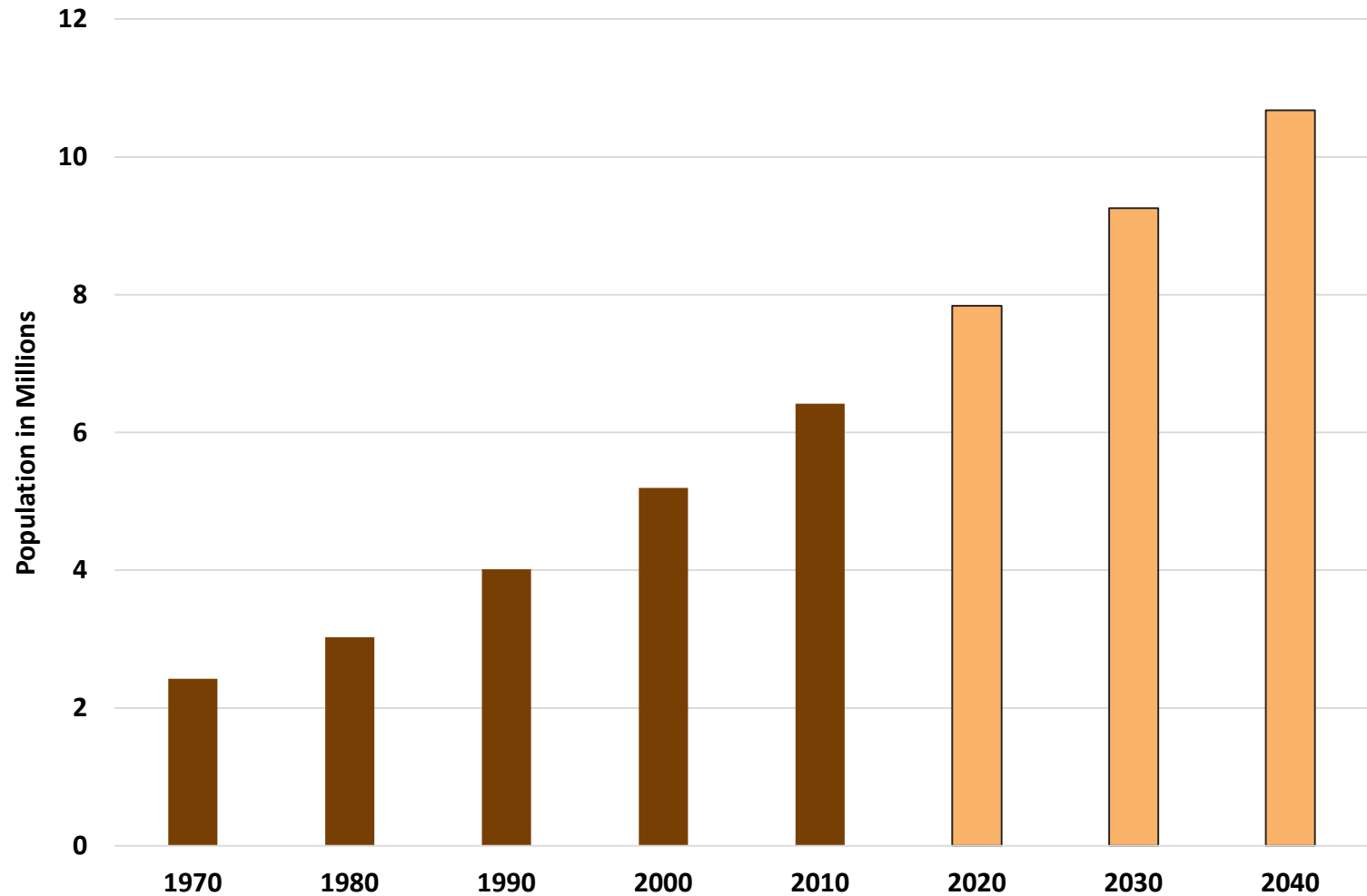
# **Presentation Outline**

**Demographics**

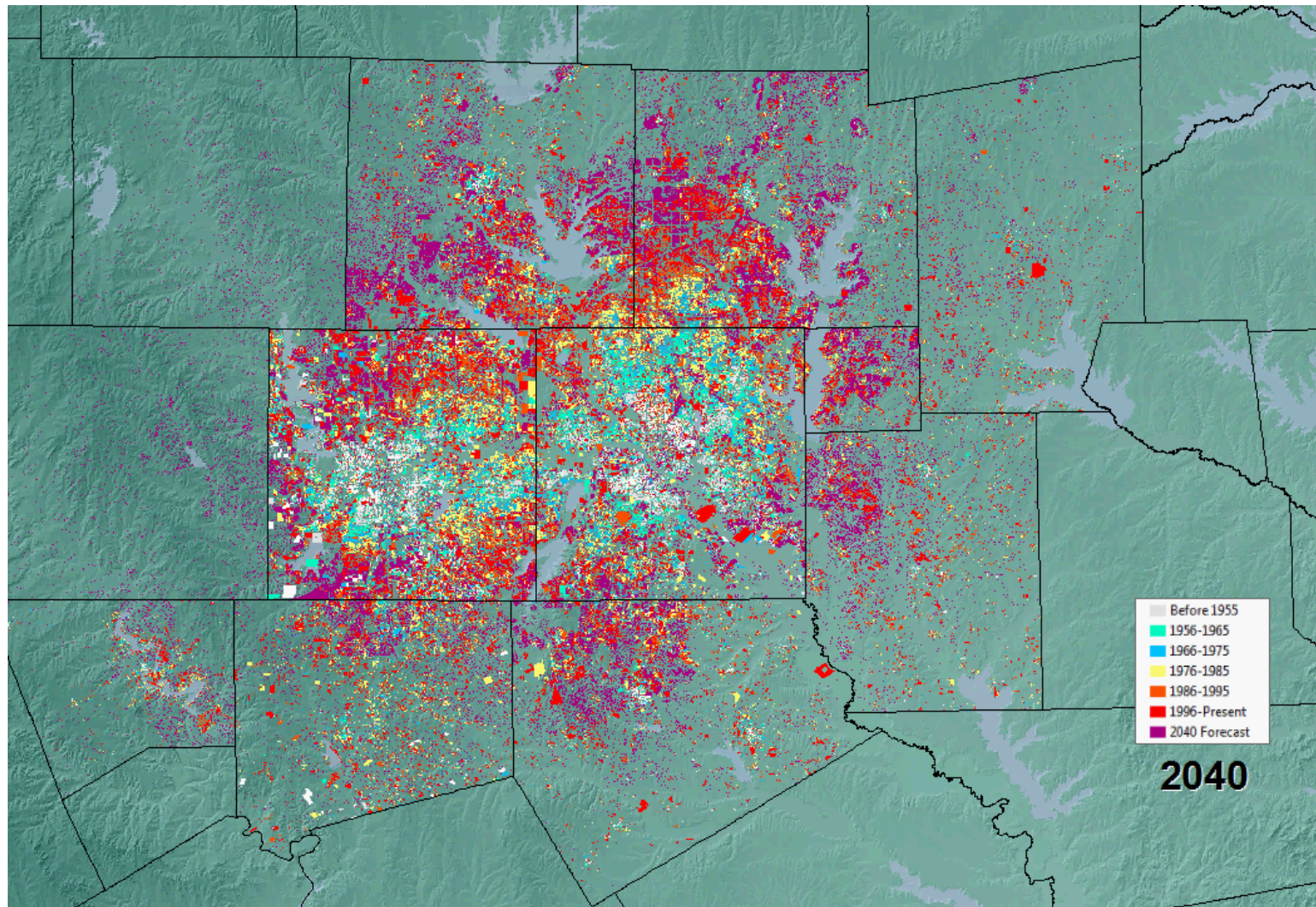
**Mobility 2040 Plan**

**10 Year Project Programming**

# Regional Population Growth



# 1950-2040 Growth Pattern





# What is the Metropolitan Transportation Plan?



Represents a blueprint for the region's multimodal transportation system



Covers at least a 20-year timeframe



Responds to Regional Transportation Council goals



Identifies policies, programs, and projects for continued development



Guides the expenditure of federal and state transportation funds





# Mobility 2040 Prioritization and Expenditures

Maximize Existing System	<b>Infrastructure Maintenance</b> <ul style="list-style-type: none"><li>• Maintain &amp; Operate Existing Facilities</li><li>• Bridge Replacements</li></ul>	<b>\$37.4</b>
	<b>Management and Operations</b> <ul style="list-style-type: none"><li>• Improve Efficiency &amp; Remove Trips from System</li><li>• Traffic Signals and Bicycle &amp; Pedestrian Improvements</li></ul>	<b>\$7.2</b>
	<b>Growth, Development, and Land Use Strategies</b> More Efficient Land Use & Transportation Balance	<b>\$3.6</b>
Strategic Infrastructure Investment	<b>Rail and Bus</b> Induce Switch to Transit	<b>\$27.2</b>
	<b>HOV/Managed Lanes</b> Increase Auto Occupancy	<b>\$43.4</b>
	<b>Freeways/Tollways and Arterials</b> Additional Vehicle Capacity	
<b>Mobility 2040 Expenditures</b>		<b>\$118.9*</b>

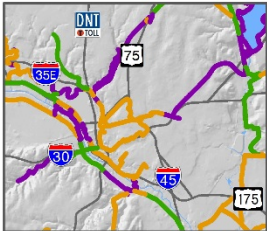
\*Actual dollars, in billions. Values may not sum due to independent rounding.

# Regional Veloweb

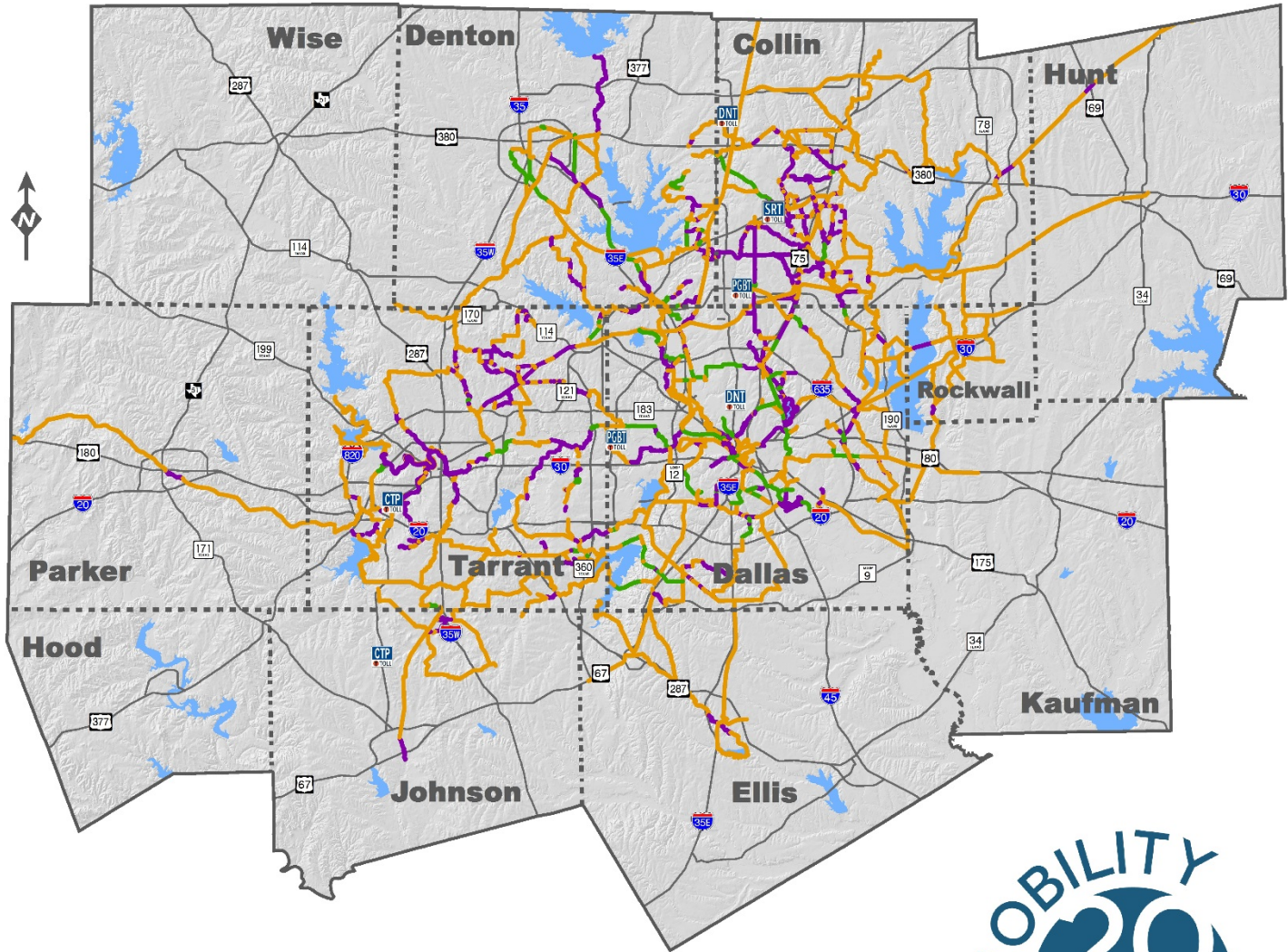
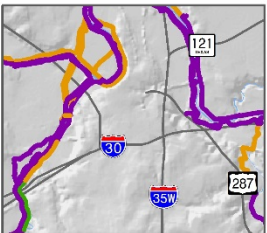
## Facility Status

	Existing	442 Miles
	Funded	146 Miles
	Planned	1,288 Miles
Total		1,876 Miles
	Major Roads	

### Dallas CBD



### Fort Worth CBD

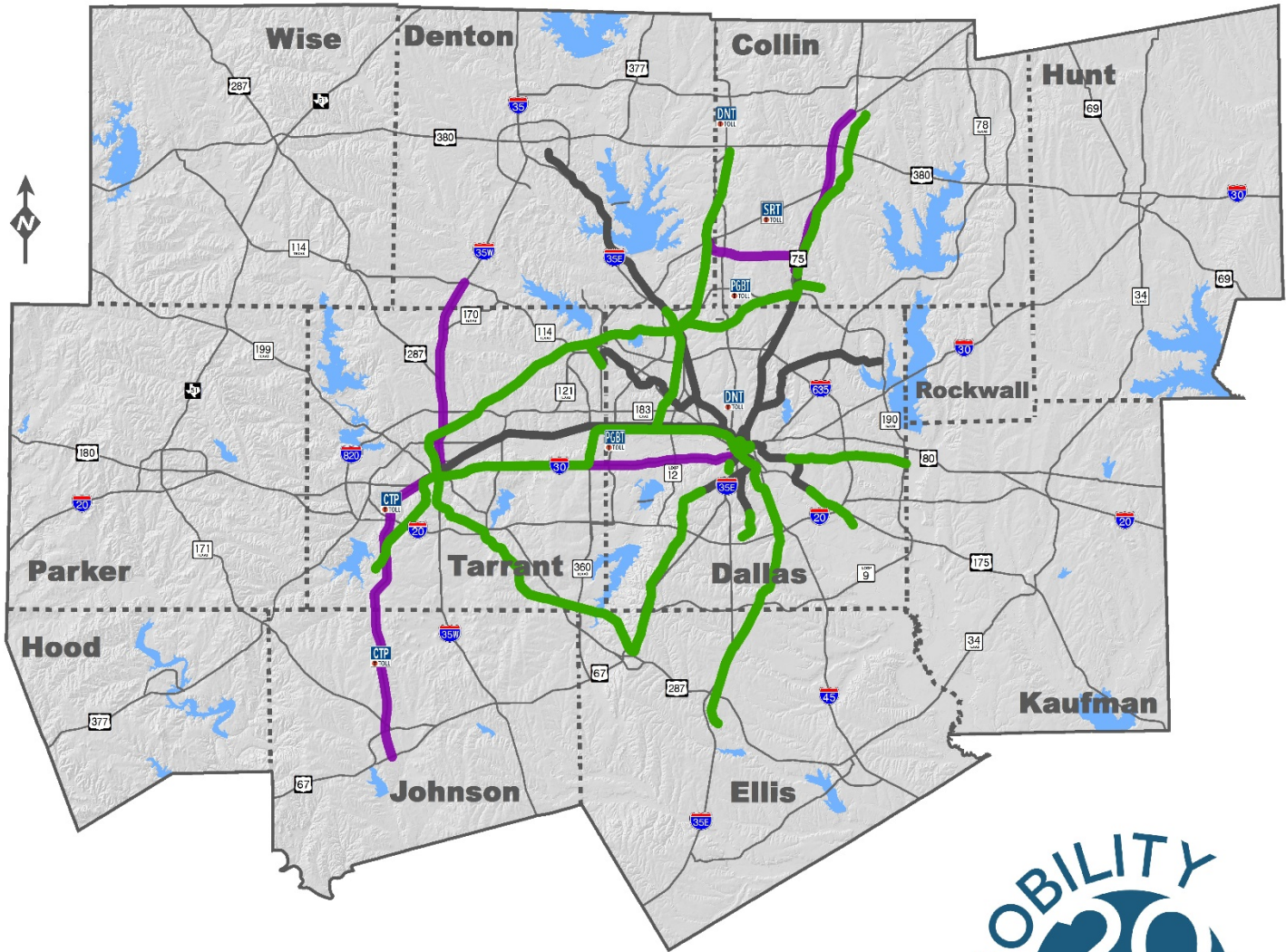


Facility recommendations indicate transportation need. Corridors specific alignment, design, and operational characteristics for the Regional Veloweb system will be determined through ongoing project development.

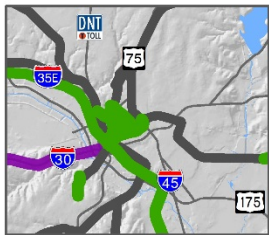


# Major Transit Corridor Recommendations

- Recommended Rail
- Existing Rail
- Recommended High-Intensity Bus
- Major Roadways



Dallas CBD



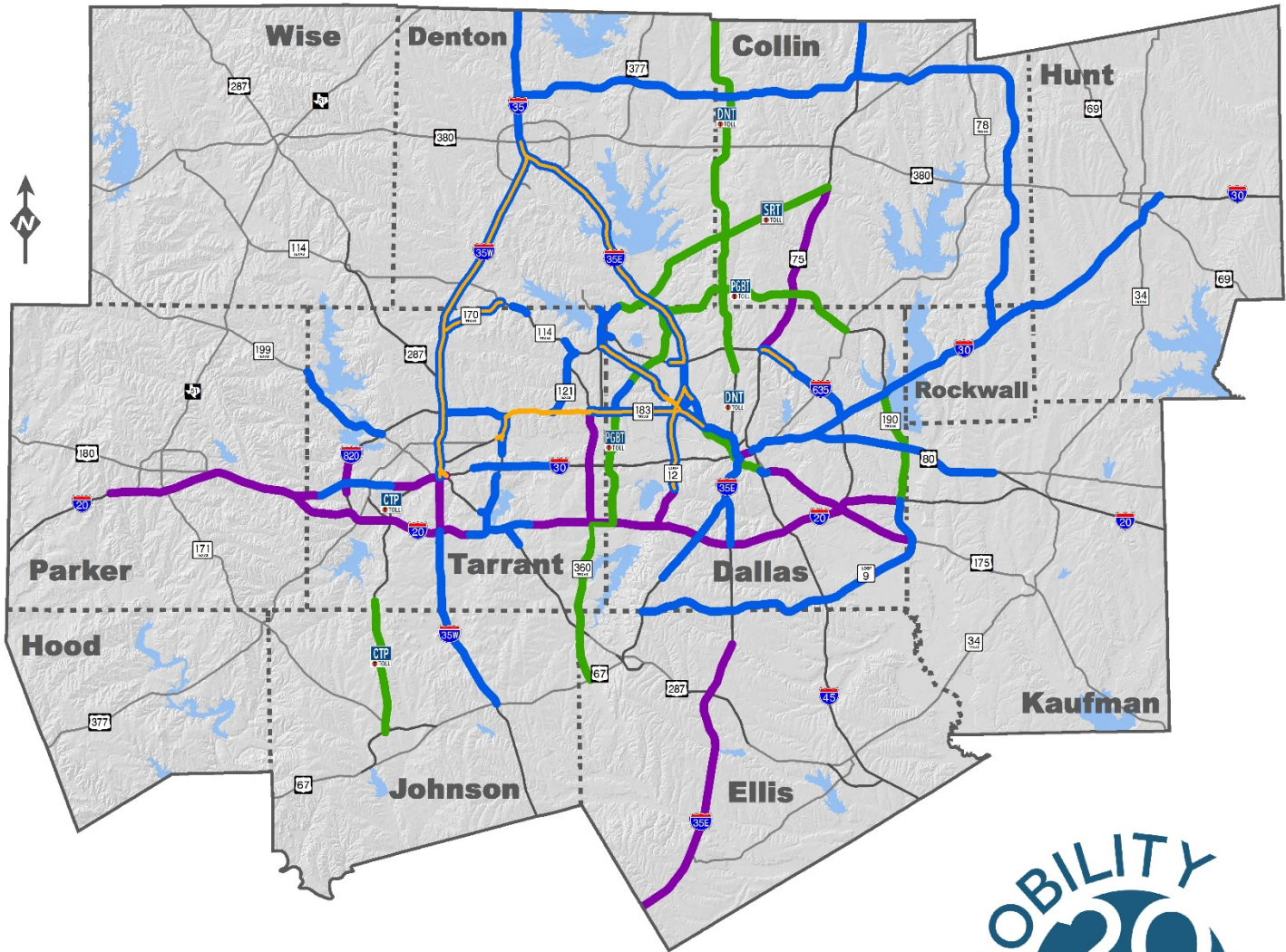
Fort Worth CBD



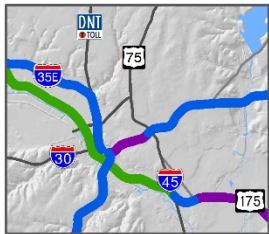


# Major Roadway Recommendations

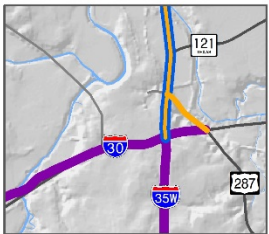
- New or Additional Freeway Capacity
- Additional Freeway Capacity and New Tolloed Managed Lanes
- New or Additional Tolloed Managed Capacity
- New or Additional Toll Road Capacity
- Capacity Maintenance
- Freeways/Tollways
- Other Major Roadways



Dallas CBD

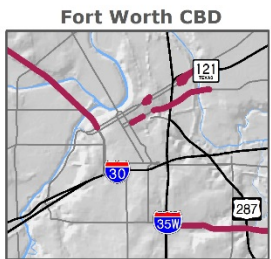
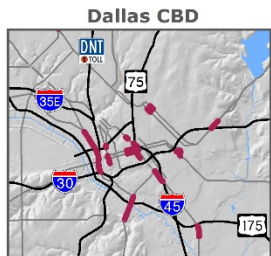
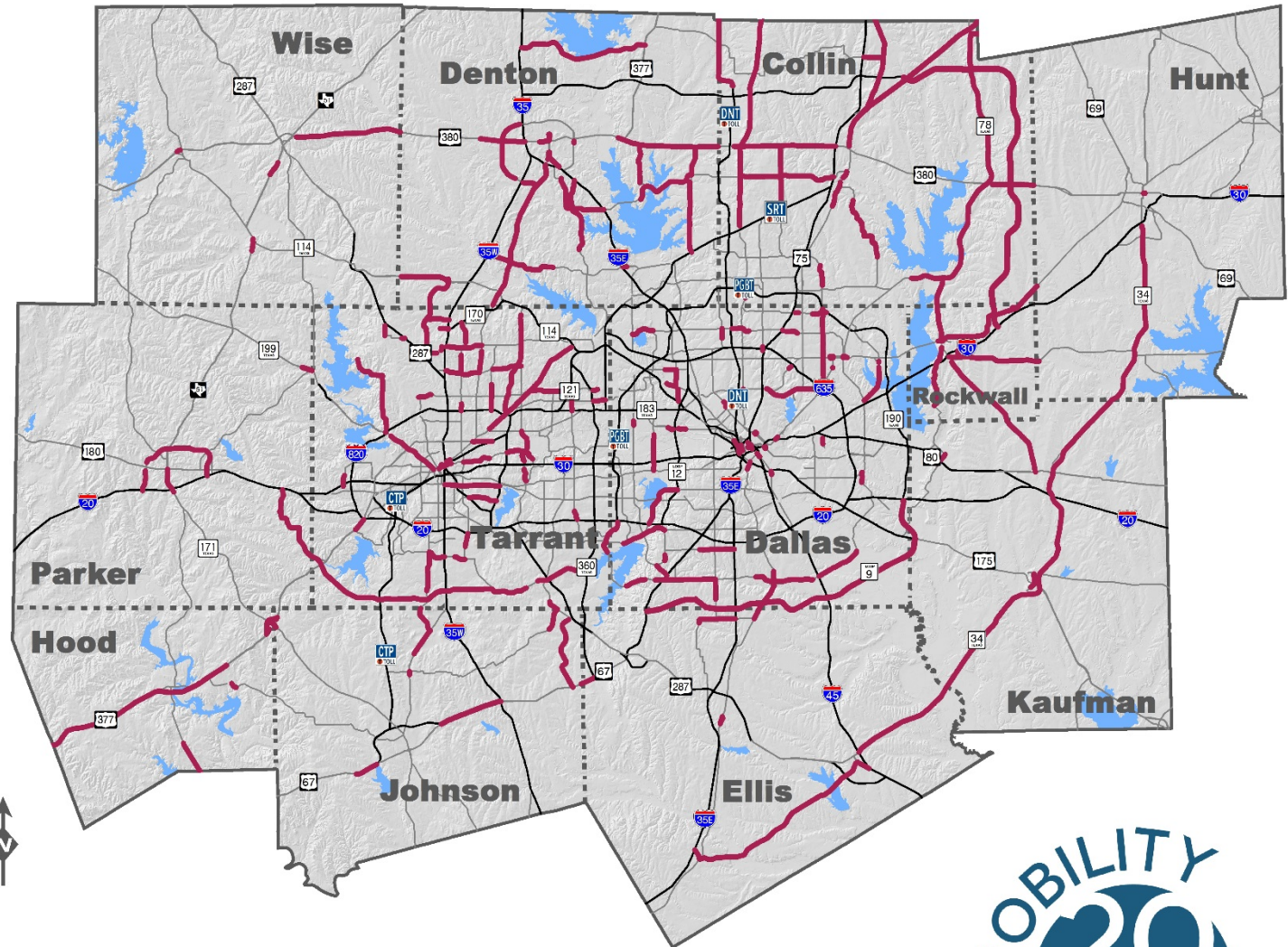
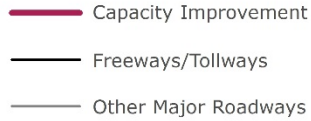


Fort Worth CBD









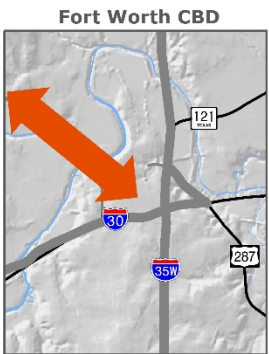
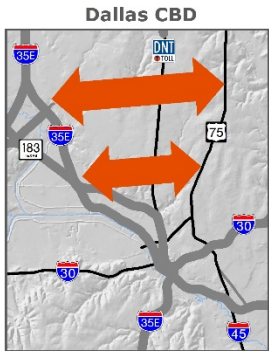
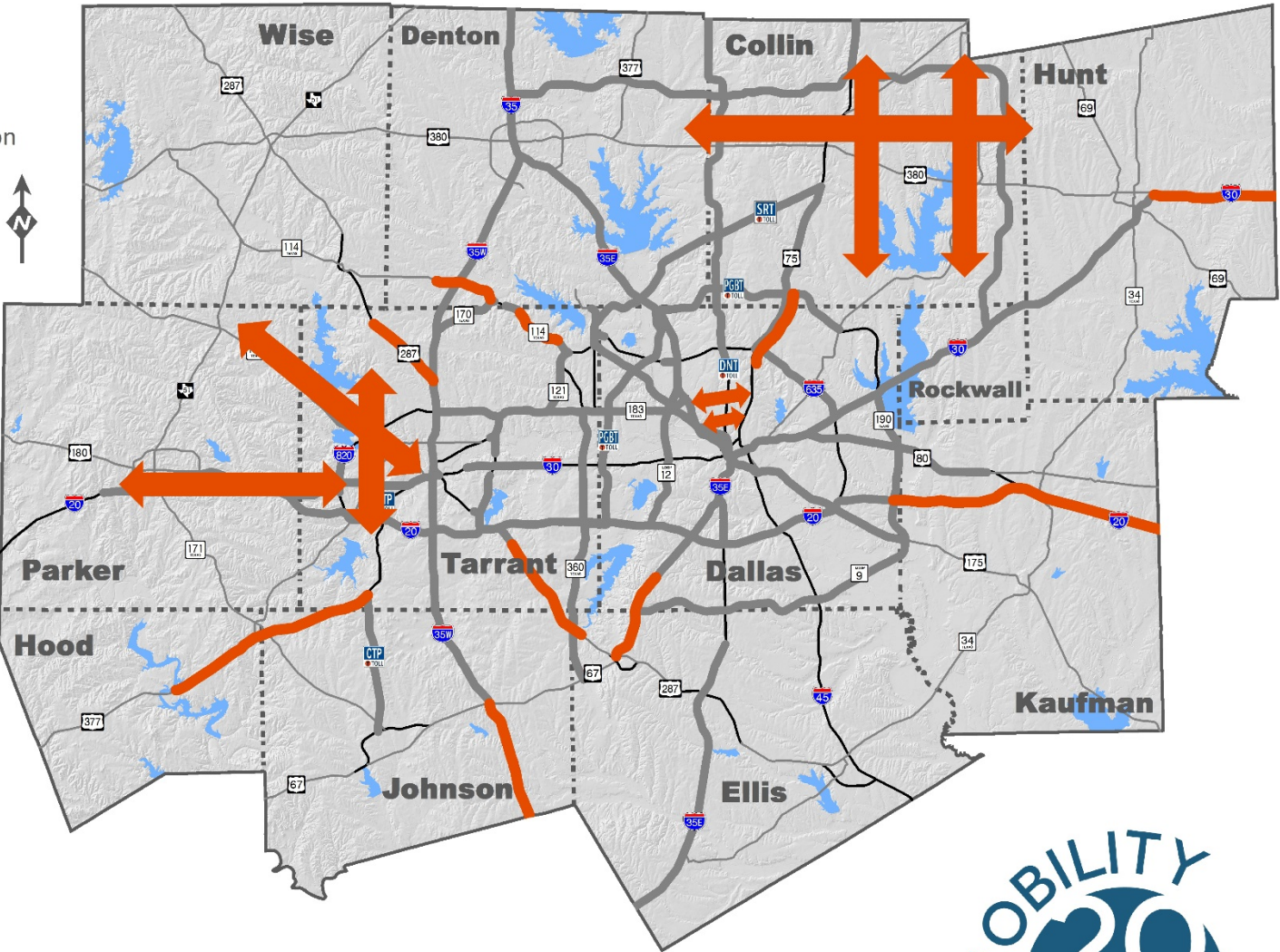
## Funded Major Arterial Improvements





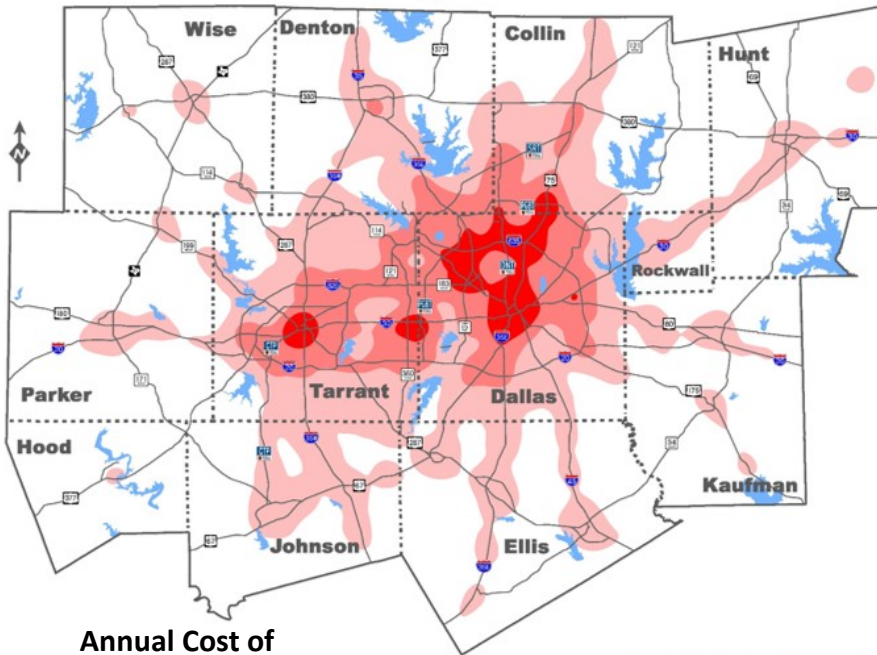
# Illustrative Major Roadway Corridors for Future Evaluation

-  Corridors for Future Evaluation
-  Mobility 2040 Corridor Recommendation
-  Freeways/Tollways
-  Other Major Roadways



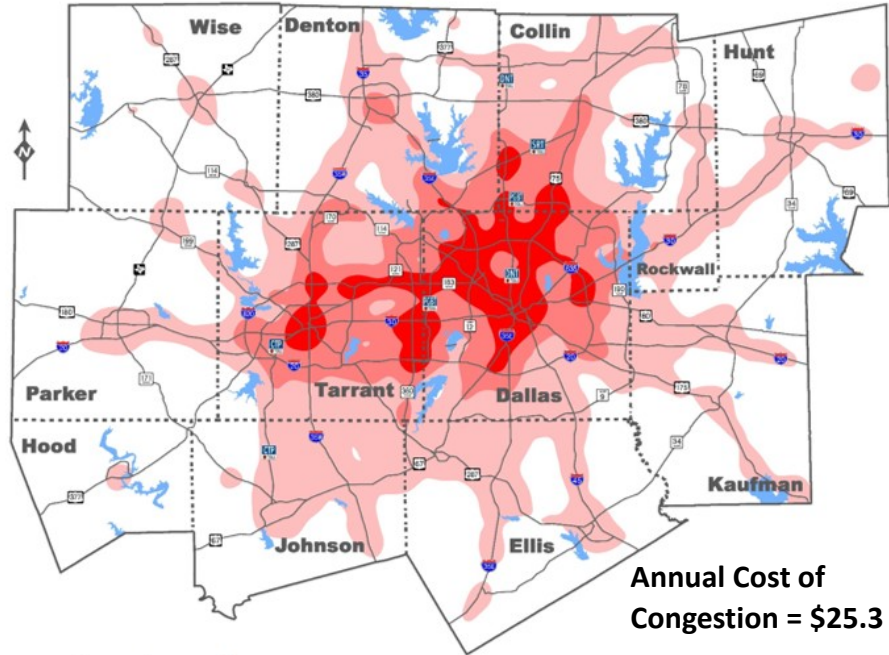


## Current Congestion Levels



Annual Cost of  
Congestion = \$10.7 B

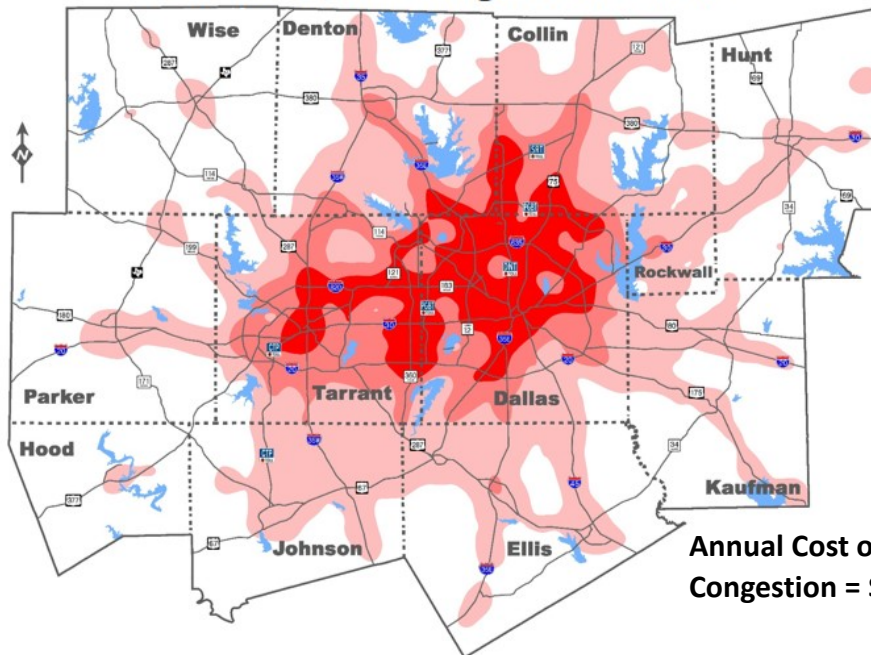
## 2040 Congestion Levels



Annual Cost of  
Congestion = \$25.3 B

## 2040 No-build Congestion Levels

### Congestion Index



Annual Cost of  
Congestion = \$43.9 B



# **Regional Funding Allocation From FY 2017 to FY 2026**

## **TIP funding categories for project selection**

**Category 2 – Urban Mobility Corridors (RTC) - \$3.42B**

**Category 4 – Statewide Connectivity (TxDOT Districts) - \$1.53B**

**Category 12 – Commission Strategic Priority (TTC) - \$2.03B**

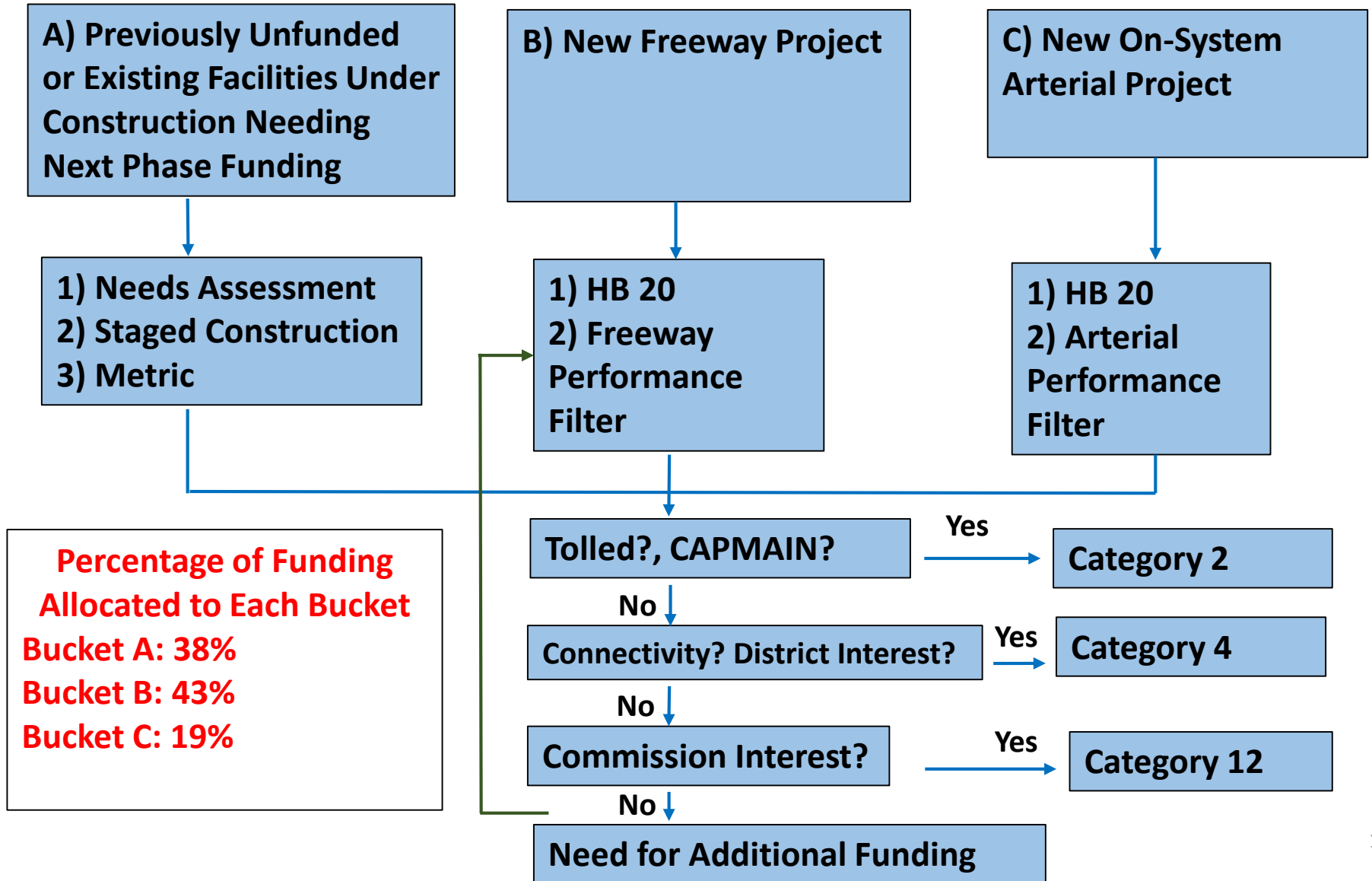
## **Projects being evaluated in “three paths”**

**Previously unfunded commitments or existing facilities under construction needing next phase funding**

**New freeway projects**

**New on-system arterial projects**

# Project Prioritization: Process of Filling Funding Buckets



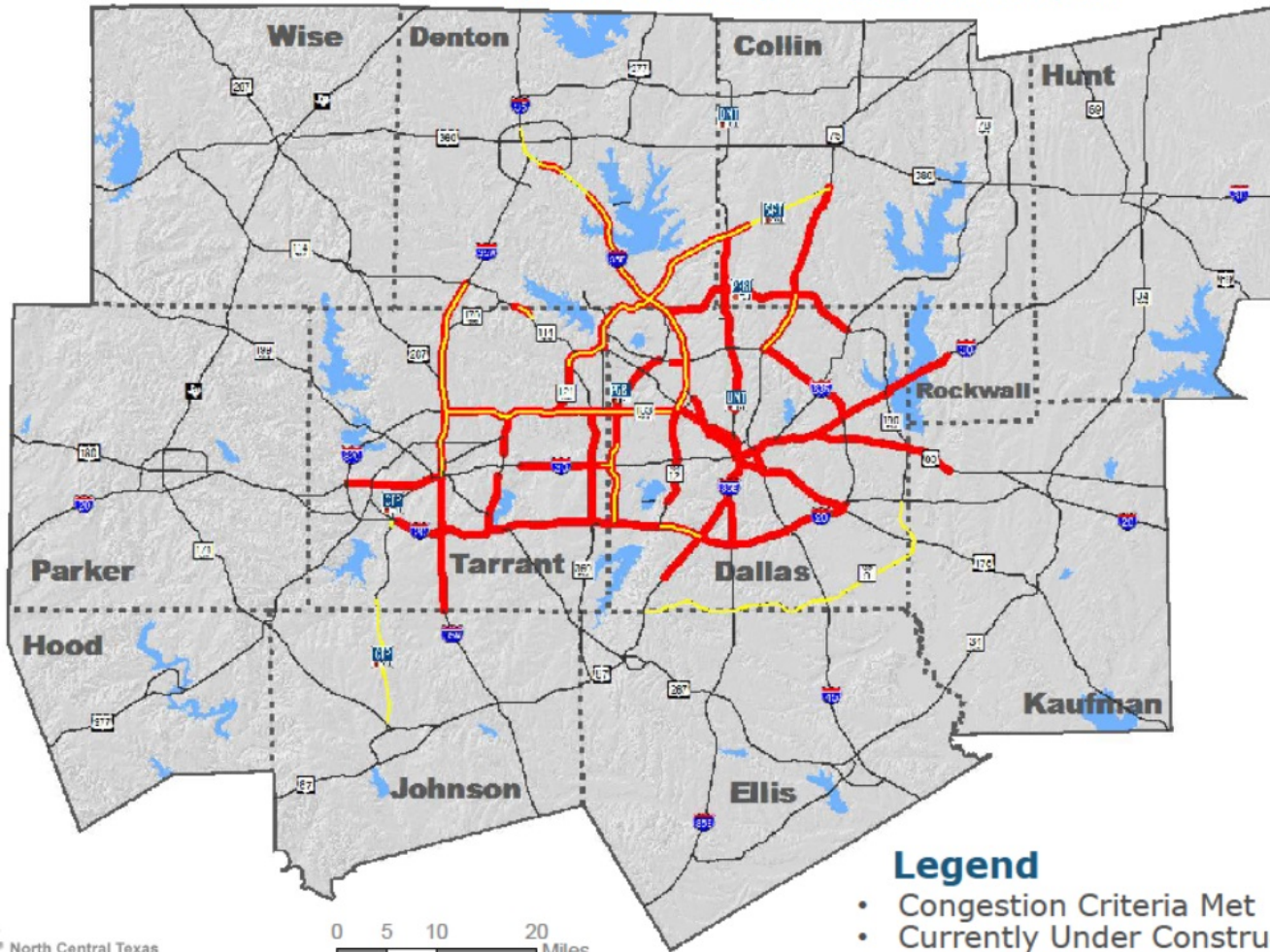


# Bucket B Project Review

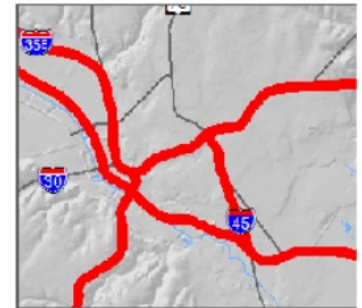
## 10 Year Plan Performance Measures Analysis

Projects Meeting Congestion Criteria

*\*Map includes only Freeway/Tollway projects in Mobility 2040*



Dallas CBD



Fort Worth CBD



### Congestion Criteria:

1. Lanes Warranted  $\geq 12$
2. Greater of:  
(Future V/C OR Current V/C)  
 $\geq 1.25$

### Legend

- Congestion Criteria Met
- Currently Under Construction
- Year 2040 Roadways

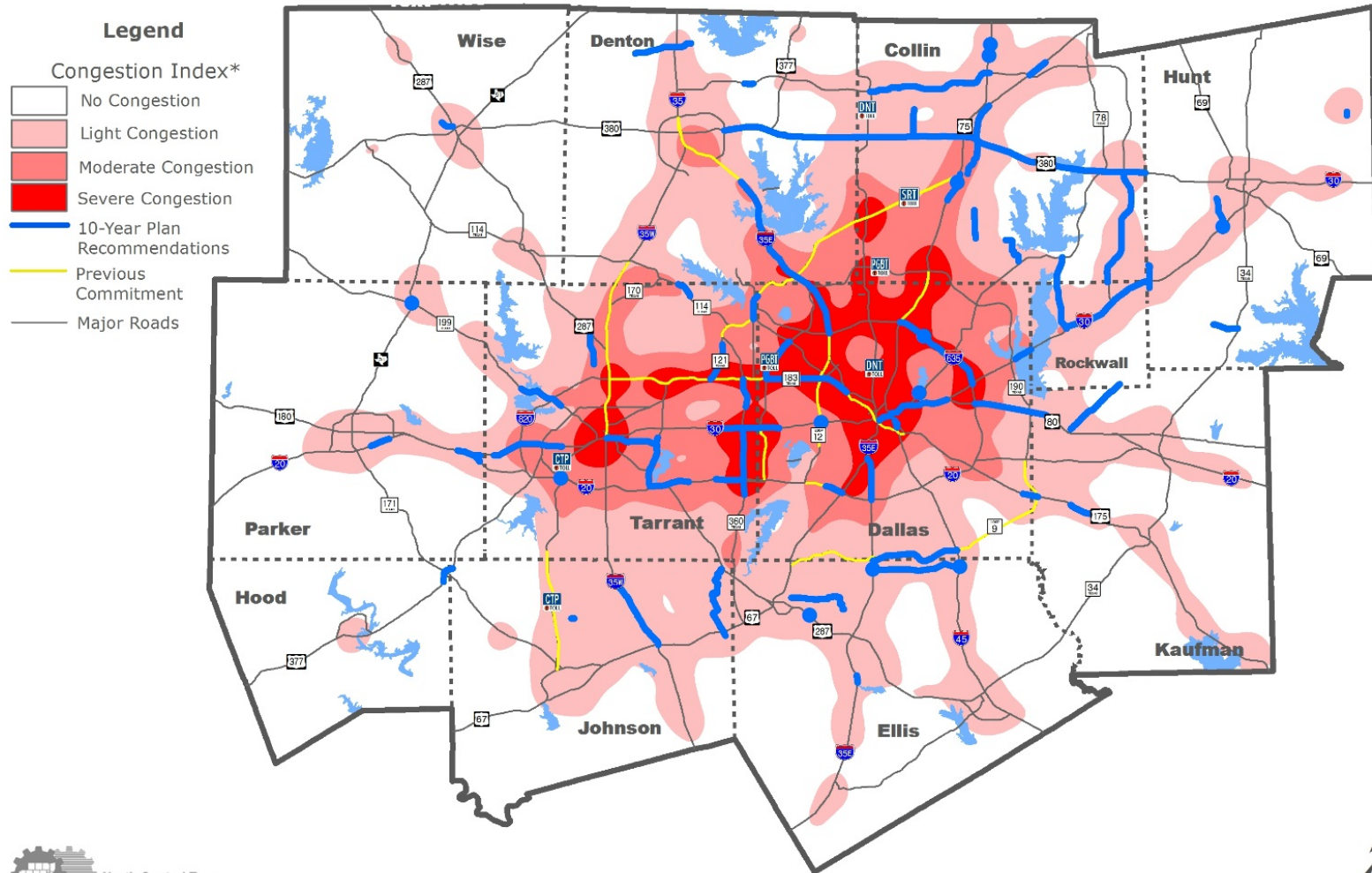


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# Bucket C Project Review

## 10-Year Plan

### 10-Year Plan Projects with 2040 Levels of Congestion/Delay

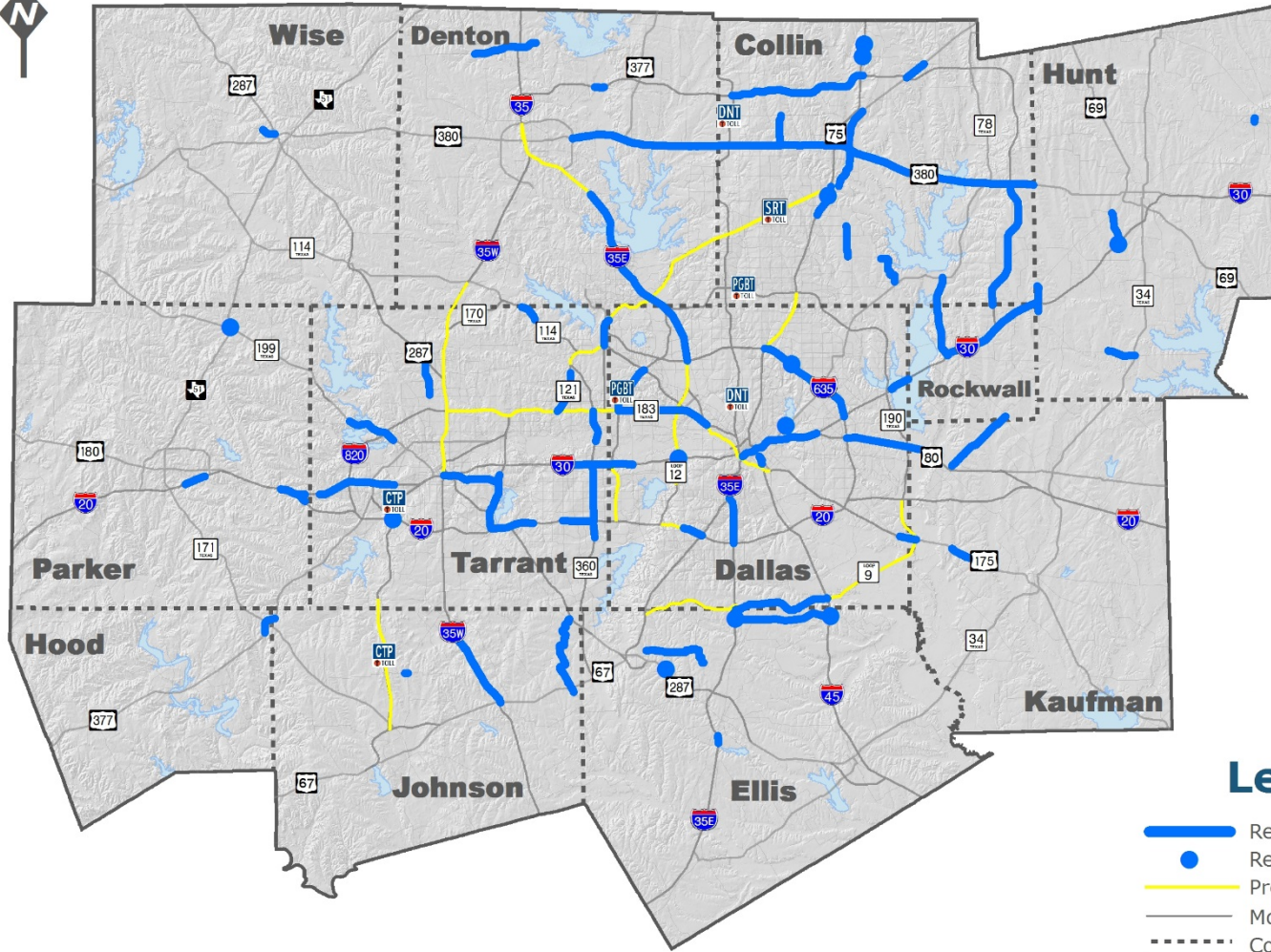




**FINAL**

# 10-Year Plan Projects

FY 2017 - FY 2026



## Legend

- Recommended Roadway Project
- Recommended Intersection Project
- Previous Commitment
- Mobility 2040 Roadways
- County Boundary
- Lakes



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