Joint Meeting of the MPO Policy Boards

September 29, 2021







Roll Call – CAMPO Executive Board

☐ City of Creedmoor	☐ Town of Angier	☐ Town of Holly Springs
☐ City of Raleigh	☐ Town of Apex	Town of Knightdale
☐ County of Franklin	☐ Town of Archer Lodge	Town of Morrisville
☐ County of Granville	☐ Town of Bunn	☐ Town of Rolesville
☐ County of Harnett	☐ Town of Cary	■ Wake County
☐ County of Johnston	☐ Town of Clayton	Town of Wake Forest
☐ County of Wake	□ Town of Franklinton	Town of Wendell
☐ GoTriangle Board of Trustees	Town of Fuquay-Varina	☐ Town of Youngsville
☐ NC Board of Transportation	☐ Town of Garner	Town of Zebulon



Roll Call – DCHC Executive Board

- ☐ City of Durham
 ☐ County of Chatham
 ☐ County of Durham
 ☐ County of Orange
 ☐ GoTriangle
- ☐ NC Board of Transportation
- ☐ Town of Carrboro
- ☐ Town of Chapel Hill
- ☐ Town of Hillsborough



Public Comments

- Speakers will be unmuted when Chair calls name; in order of sign up
- Please limit your comments to **two** (2) minutes.
- Provide your full name and any organization you are representing.

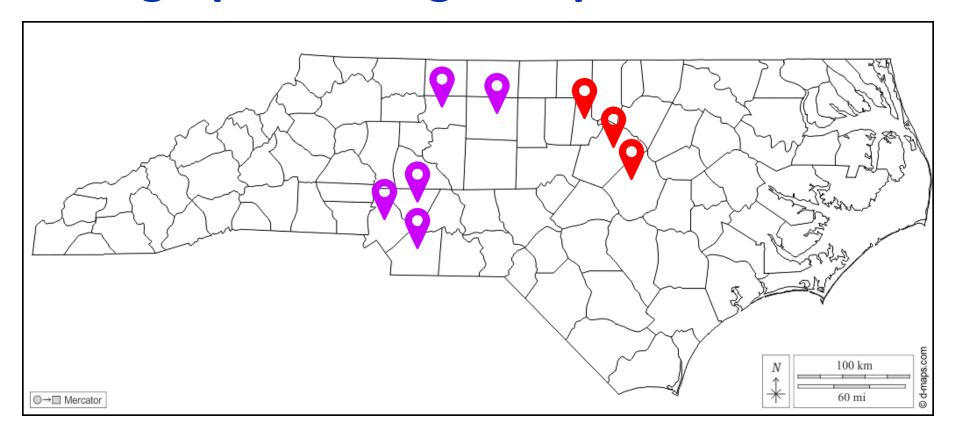
ORDER	NAME
1.	Kym Hunter
2.	Harry Johnson
3.	Mary Sell
4.	Terry Lansdell
5.	Nathan Spencer
6.	John Tallmadge
7.	Mary-Jo Gellenbeck
8.	Dwight Otwell
9.	Jasmine Washington
10.	Tina Govan
11.	Nick Neptune
12.	Heidi Perry
13.	Chad Jones



Census Snapshot/Demographic Changes



Demographic Change Snapshot -- Counties

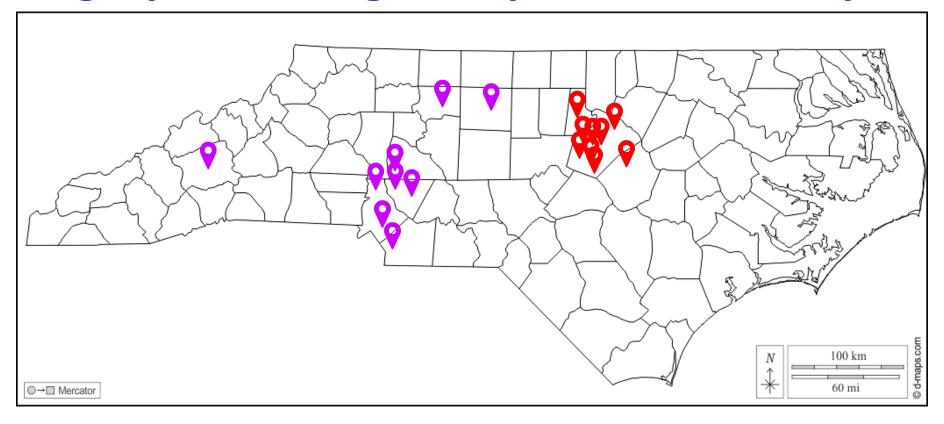


NC grew by 900,000 people between 2010 and 2020

- > 330,000 of this growth was in Wake, Durham and Johnston Counties (37%)
- > 700,000 of this growth was in 8 counties in the "Big 3" metro regions (77%)



Demographic Change Snapshot -- Municipalities



18 NC cities & towns added 10,000+ people between 2010 and 2020

- > 9 of them are in the Triangle and added a combined 250,000 residents
- > 7 of NC's 25 largest cities are in the Triangle, each with >40,000 residents





















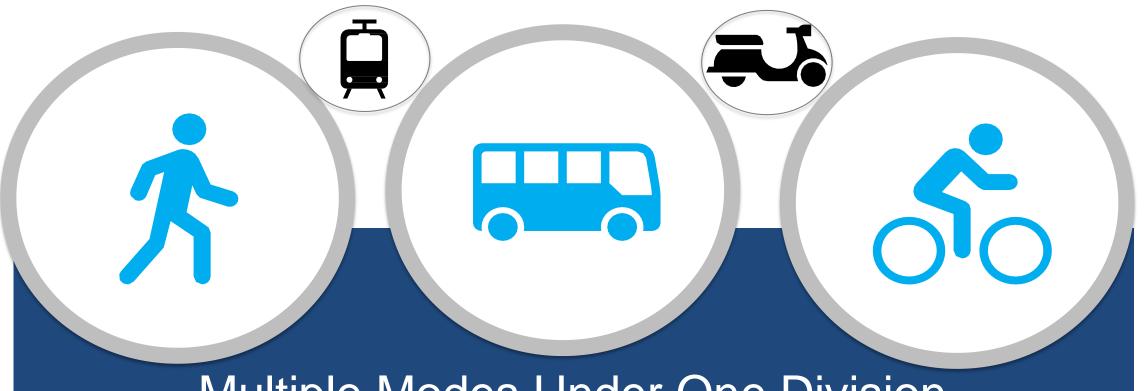


Integrated Mobility Division Strategic Initiatives

Ryan Brumfield, PE Director

September 29, 2021



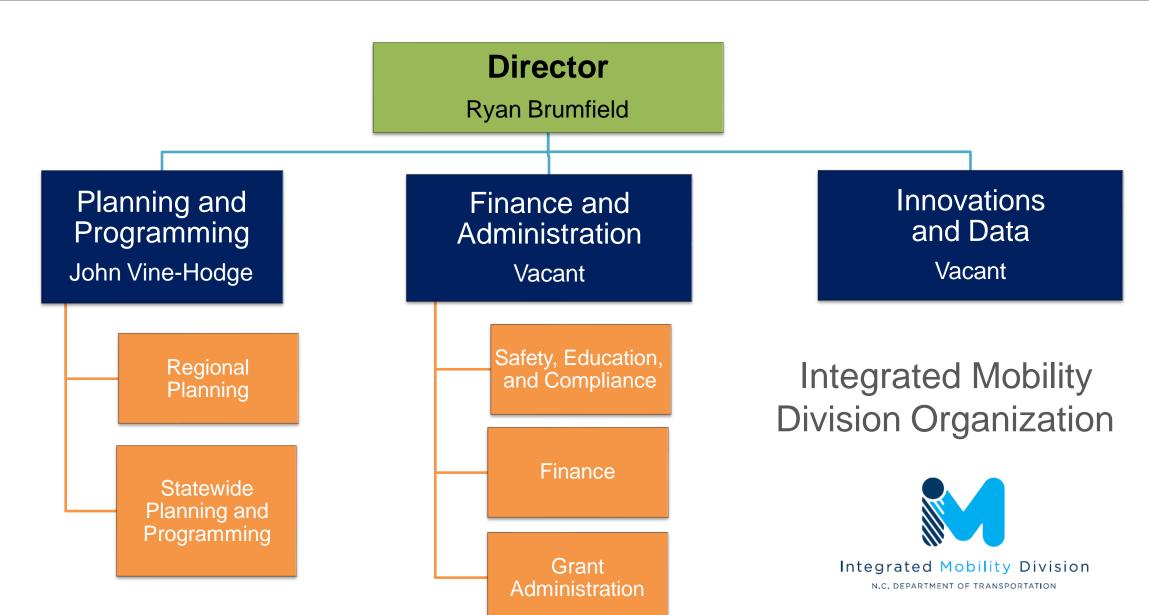


Multiple Modes Under One Division



Integrated Mobility Division

N.C. DEPARTMENT OF TRANSPORTATION





N.C. DEPARTMENT OF TRANSPORTATION

Mission

Provide leadership for safe, affordable, and innovative multimodal transportation throughout North Carolina

Core Goals:

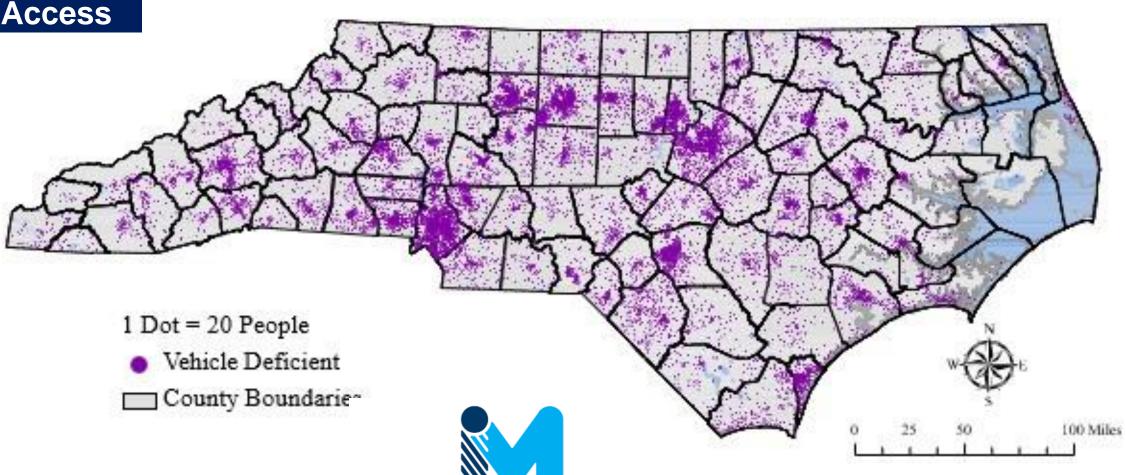
Increase Access

Enhance Quality of Life

Ensure Safety

Increase Access

Adults Without a Vehicle in NC



Integrated Mobility Division

N.C. DEPARTMENT OF TRANSPORTATION

Enhance Quality of Life



Multimodal options lead to healthier lifestyles







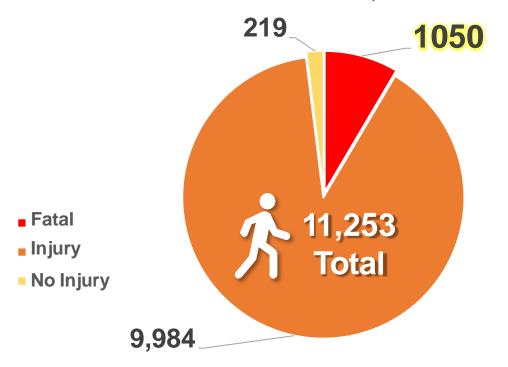
Multimodal options lead to better environmental outcomes



Ensure Safety

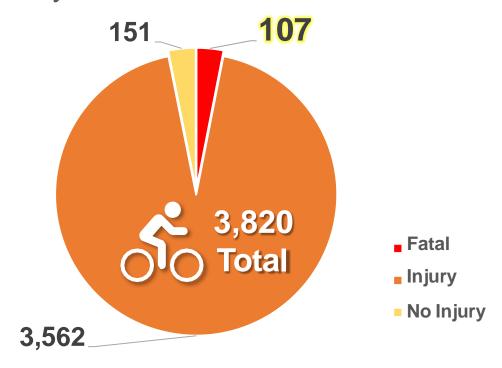
Bicycle & Pedestrian Safety Trends

Pedestrian Crashes, 2015-2019



NC 7th highest total pedestrian fatalities by state

Bicycle Crashes, 2015-2019



NC 10th highest rate of bicycle fatalities per

Envision the Future of Transportation

- Technology streamlines cross-jurisdictional trip coordination and improves safety.
- Local and regional multimodal transportation options rival driving in terms of time, convenience, and cost.
- All transportation network users are accommodated safely.
- Land use and transportation planning are intertwined.
- Residents are happier, healthier, and more likely to participate and succeed in the economy.

IMD's Innovation Process

- 1. Understand emerging mobility trends and challenges
- 2. Develop ideas
- 3. Secure grant funding
- 4. Pilot innovations
- 5. Deploy broadly and disseminate best practices

Recent Examples







HOPE Grant

AppalCart

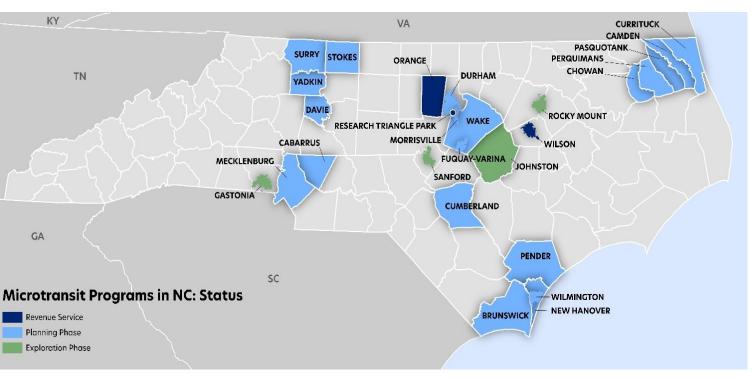
ncdot.gov



On-Demand Microtransit

- Similar to rideshare services like Uber or Lyft, but subsidized and provided as a form of public transportation.
- 15 minute average wait time after requesting a ride.
- First pilot launched in September 2020 and has been highly successful, doubling transit ridership in Wilson, even amid the pandemic.
- NCDOT is actively exploring additional deployments with communities throughout the state, including Wake and Lee Counties

Leading on Technology and Innovation to Improve Quality of Multimodal Options



State funding opportunities exists through ConCPT and other state programs to expand cross-jurisdictional, coordinated public transit services.



IMD's Transit Technology Outlook

- Residents can plan, schedule, and pay for all transportation in one place
- Truly on-demand transit (day-of or hour-of pickup) statewide with seamless cross-jurisdiction trips
- Statewide advanced scheduling software, supplemented with Transportation-as-a-Service (TaaS) in some locations, connected by Mobility-as-a-Service (MaaS)
- RFP by end of 2021 for advanced scheduling software



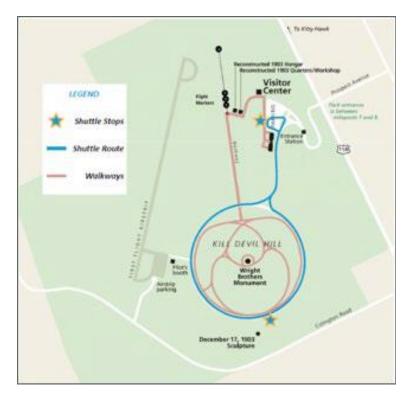
Planning for a Connected, Autonomous, Multimodal Transportation Future

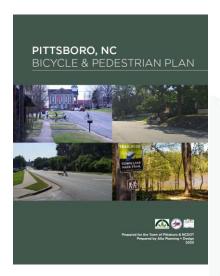
The Connected Autonomous Shuttle Supporting Innovation (CASSI) was deployed at the Wright Brothers National Memorial in 2021 – the first autonomous shuttle deployment at a National Parks site.



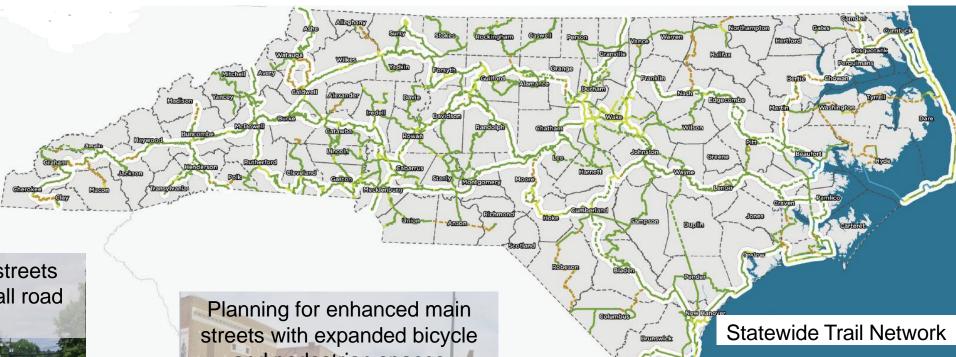








Accommodating All Modes and Providing Mobility Choices









Linking Land Use and Transportation Planning

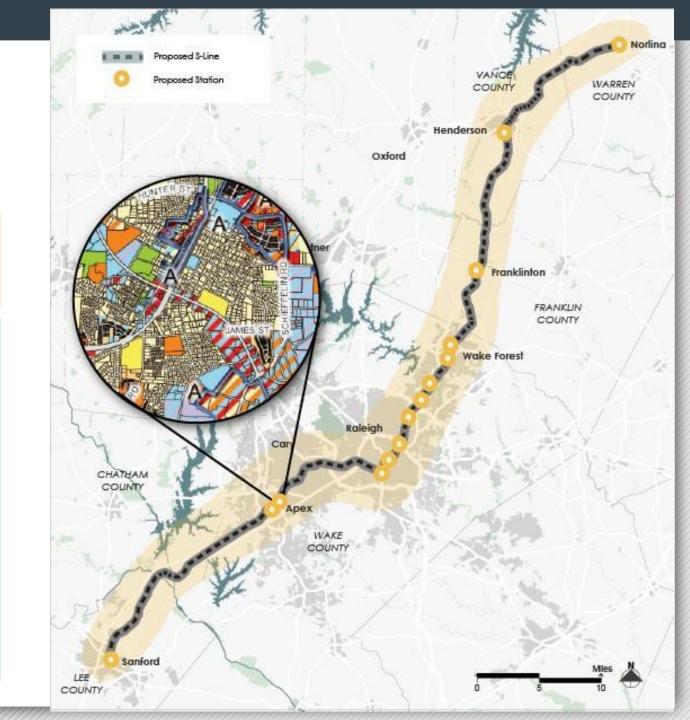
S-Line Transit Oriented Development

Corridor-wide Conversations

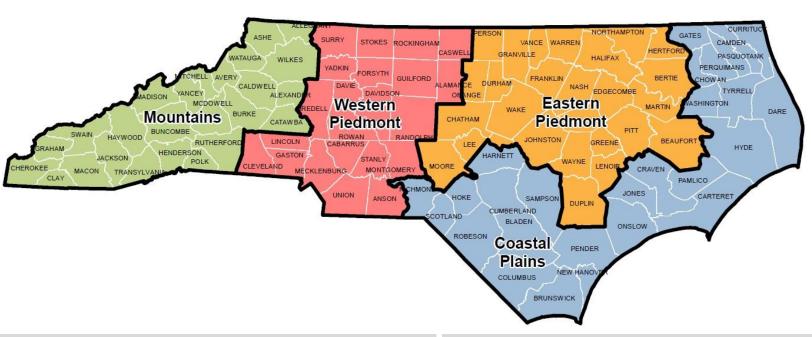
- Corridor/service vision and goals
- Station locations
- Funding / financing
- Transit operations

Local Implementation

- Land use plans
- Zoning
- Regulatory Policies
- Infrastructure investments



Building Partnerships



Eastern Piedmont		Mountains					
Section	Contact	Office Number	Email Address	Section	Contact	Office Number	Email Address
Finance	Cassandra Wilson	919-707-4671	cdwilson@ncdot.gov	Finance	Rose Hafford	919-707-2600	rlhafford@ncdot.gov
Grants Administration	Tony Sumter	919-707-4689	asumter@ncdot.gov	Grants Administration	Bernard Clark	919-707-4678	bbclark2@ncdot.gov
Planning	Bryan Lopez	919-707-2606	balopez@ncdot.gov	Planning	Bryan Lopez	919-707-2606	balopez@ncdot.gov
Safety, Education and Compliance	Eartle McNeill	919-707-4686	elmcneill1@ncdot.gov	Safety, Education and Compliance	Ross Dragon	919-707-4681	radragon@ncdot.gov
Coastal Plains			Western Piedmont				
	Coastal Plair	าร			western Plear	nont	
Section	Coastal Plair Contact	office Number	Email Address	Section	Contact	Office Number	Email Address
Section Finance			Email Address kedunn@ncdot.gov	Section Finance			Email Address imbautista@ncdot.gov
	Contact	Office Number			Contact	Office Number	
Finance	Contact Katie Dunn	Office Number 919-707-4670	kedunn@ncdot.gov	Finance	Contact Inger Bautista	Office Number 919-707-4683	imbautista@ncdot.gov
Finance Grants Administration	Contact Katie Dunn Alexius Farris	Office Number 919-707-4670 919-707-4698	kedunn@ncdot.gov aafarris@ncdot.gov	Finance Grants Administration	Contact Inger Bautista Kenetta Spence	Office Number 919-707-4683 919-707-4673	imbautista@ncdot.gov kmmclean@ncdot.gov

Funding

- Expand incorporation of multimodal components in existing highway projects when needs are identified.
- Improve effectiveness of state and federal transit and active transportation funding by better aligning investments with needs.
- Enhance and streamline underutilized or underperforming transit and active transportation programs.
- Be prepared for an increase in funding levels.
- Proactively prepare for discretionary funding opportunities.

Transit Grants in Infrastructure Bill

FTA Discretionary Grants		FY 2021 (Actual)		FY 2022 (Proposed in IIJA)	
Transit Oriented Development (Discretionary Pilot)		\$	10,000,000	\$	13,157,184
Passenger Ferry Boat Program		\$	30,000,000	\$	30,000,000
Pilot Program for Enhanced Mobility		\$	3,500,000	\$	4,605,014
Public Transportation on Indian Reservations Competitive		\$	5,000,000	\$	8,752,896
Transit Research		\$	28,000,000	\$	36,840,115
Technical Assistance and Workforce Development		\$	9,000,000	\$	11,841,465
Bus Testing Facilities		\$	3,000,000	\$	5,000,000
National Transit Database		\$	4,000,000	\$	5,262,874
Bus Facilities Comp. and Low-No Comp.	5	\$	344,044,179	\$	447,257,433
Railcar Replacement Program Competitive Grants			-	\$	300,000,000
Capital Investment Grants (estimated)	\$		2,000,000,000	\$	2,500,000,000
Transit Infrastructure Grants (estimated)	\$		516,000,000	\$	580,000,000
Total	\$		2,952,544,179	\$	3,942,716,981

Discretionary Grants in Infrastructure Bill

- INFRA \$8 Billion over 5 years proposed in IIJA
- RAISE \$7.5 Billion over 5 years proposed
- New programs include:
 - Safe Streets and Roads for All \$5 Billion
 - Strengthening Mobility and Revolutionizing Transportation Grant program – \$500 Million
 - National Infrastructure Project Assistance \$5 Billion
 - Bridge Investment Program \$9.2 Billion
 - Charging & Alternative Fueling Grants \$5 Billion



NORTH CAROLINA

Department of Transportation



















Ryan Brumfield, Director

Integrated Mobility Division rmbrumfield@ncdot.gov
919-928-3377

Connect2050 Metropolitan Transportation Plan

1. Foundations

- Joint MPO Transportation Policy Priorities
- Community Engagement Results

2. Key Drivers

- Opportunity Places Land Use
- ➤ All Together Fiscal Constraint

3. Shared Regional Investments

- Transit & Rail
- Safe, Active, Healthy Mobility
- Complete Corridors
- 4. Discussion: Exec. Board/Board Members



Connect2050 Metropolitan Transportation Plan

MTP Update Process

The overall process to develop the MTP typically takes 18 months, or more. CAMPO updates the MTP on a 4-5 year cycle and is currently developing the 2050 MTP.



Vision & Goals



Update Goals, Objectives, and Performance Measures





Analysis & Evaluation

Examine Data on Existing Conditions

Forecast Future Problems (Deficiencies)

Develop & Evaluate
Alternative Scenarios





Select Preferred Option

Analyze Fiscal Feasibility

Confirm Preferred Option

Evaluation Strategies:

Transportation, Land Use, Access, Investment and Funding



Public Engagement: Consult



Final Plan to include:

- Adopted investments, by decade
- Written report
- On-line "story map"
- Project lists & maps
- Air Quality Conformity
 Determination



Joint MPO Transportation Policy Priorities

Helpful to have for reference:

Policy Priorities Document (updated after December 2020 meeting)









Triangle Regional Transportation Policy Priorities

- Invest for success
- Make investments reliable & predictable
- Enable more cost-effective critical corridor investments
- Remove funding barriers for small towns
 & rural areas in divisions with large MPOs
- Make NC a leader in active transportation investments
- Strengthen support for demand-management and technology
- Recognize statewide projects in all modes





MTP Preferred Scenario:

- MPO "fair share" of NC First
 Commission recommended funding
 applied more flexibly than STI
- Added local funding equivalent to amount from existing ½ cent sales tax in Wake, Durham & Orange; ¼ cent equivalent in Johnston, Franklin, Granville & Harnett – local discretion on use



Invest for Success



A Triangle Metro Region Transportation Priority

 Create dedicated, recurrent state transportation funding as a match for competitive federal funds, together with state economic development funding for key multi-modal investments serving job hubs.

The BuildNC bond was a good start, but fast, flexible funding is needed for multi-modal projects not well suited to the long and constrained STI process.



Regions will do their part -- they need a handshake, not a handout from the state -- a committed state partner to match regional action with state action.

- State funding for shovel-ready and shovel-worthy projects may drive any federal stimulus funding decisions -

Opportunity comes to those who are prepared for it. North Carolina needs special transportation funds that move at the speed of business and are fast and flexible enough to dovetail with changing federal transportation funding opportunities and business expansion decisions:

- NC has a history as a "donor" state when it comes to competitive grants, especially for major transit capital investments
- Recent major economic development location decisions, such as for the Amazon HQ2, have emphasized the importance of investing in quality transit to attract jobs

Dedicated State Funding to Match Competitive Federal Funds

What success looks like: A ready-to-go pool of state matching funds that local and state applicants for competitive federal grants can count on to increase their chances for success.

Recent Success

North Carolina awarded \$47.5 million CRISI grant to purchase freight line for future passenger service

The 10-mile line is called the "missing link" for future highperformance passenger rail service between Raleigh, N.C., Richmond, Va.

Sep 214, 3031



Key Policy Considerations

- Understanding federal scoring systems and tailoring projects for maximum success
- Ensuring sufficient levels of funding to provide matches, while being able to pivot funding if applicants are not successful
- Nurturing relationships with federal agencies and local partners to ensure our ability to deliver projects on time & on budget

Project Types that Might Benefit

- BRT and passenger rail projects through the Federal Capital Investment Grants (CIG) program
- Roadway, transit and bikeped projects seeking BUILD funding
- Projects eligible for any infrastructure stimulus legislation that may occur



MTP Preferred Scenario:

- Triangle Bikeway Project in Shared Regional Investments
- Opportunity Places land use with more mixed-use, walkable areas
- Increased funding for active transportation investments due to NC First Commission funding and added local revenue source



Make NC a Leader in Active Transportation Investments



A Triangle Metro Region Transportation Priority

 Surpass peer states in funding economically beneficial and safety-focused bicycle and pedestrian projects and programs



Whether it's a critical link in NCDOT's Great Trails State Plan, an important sidewalk connection to make travel safer, or a Main Street bike and pedestrian project to serve businesses, state funding provides crucial leverage for federal funds and local contributions.



- 16% of crash fatalities are either pedestrians or cyclists -

North Carolina and the Triangle Metro Region should prioritize active transportation investments that support healthy and safe communities. Primary focus areas are:

- Improved implementation of Complete Streets projects
- Active Routes to School, Parks, and Transit approaches that have demonstrated health, equity, and academic performance benefits.

Complete Streets

What success looks like: NCDOT Complete Streets policy implementation is based on the land use and travel characteristics of corridors, along with the needs of users, not on the type of facility that is built or the community it is in. NCDOT, MPOs, RPOs, and local communities seamlessly blend federal, state and local funds to achieve results.

A Successful Complete Street



Key State Actions

- Restore state funding for independent active transportation projects to put all modes on a level playing field.
- Make facility maintenance easier.
- Lower the local match requirements to incentivize more investments.
- Leverage all funding programs, including safety, for active transportation.
- Develop best practices for tracking success in active transportation.

Triangle Projects That Could Benefit

- NC 98 Corridor
- Triangle Bikeway
- NCDOT Great Trails State routes



MTP Preferred Scenario:

- Sustained and growing Regional Transportation Choices Program ("TDM")
- Regional Intelligent Transportation
 Systems (ITS) program involving MPOs,
 NCDOT & city staff
- Transit Signal Priority along key transit routes
- Continued traffic signal integration



Strengthen Support for Demand Management & Technology



A Triangle Metro Region Transportation Priority

Stabilize and grow state investment in Transportation Demand
Management (TDM) to match local and regional commitments. Implement =
the Regional Technology (ITS) Plan for roadways and transit.

The most cost-effective dollar spent is on efficiently managing the demand for the supply of roads we already have. Working with employers on ways to offer workers alternatives to peak-hour, drive-alone commuting and deploying technologies to maximize the roadway supply are key elements of the smart city movement.



- The Triangle TDM program has reduced vehicle miles traveled by over 300 million miles over the past 5 years -

The Triangle Metro Region is already a leader in the state in deploying emerging technologies and demand management solutions that optimize roadway and transit capital projects. Two key focus areas should be:

- Taking the already successful Regional Transportation Demand Management Partnership to the next level.
- A three-pronged approach to Smart Cities Technology Applications that optimizes how
 we travel and paves the way for automated, connected vehicles.

Regional Transportation Demand Management Partnership

What success looks like: NCDOT, the Triangle Metro's MPOs and key partners collaborate to recruit, recognize and reward employers and communities that implement different tiers of Transportation Demand Management practices.

Employer Success





Key Ingredients

- A regional collaboration between NCDOT, both MPOs and Triangle J COG with 14 competitivelyselected service providers.
- Employer-focused with emphasis on anchor institutions, city centers and the RTP
- Coordinated outreach, including virtual webinars on telecommuting during COVID.

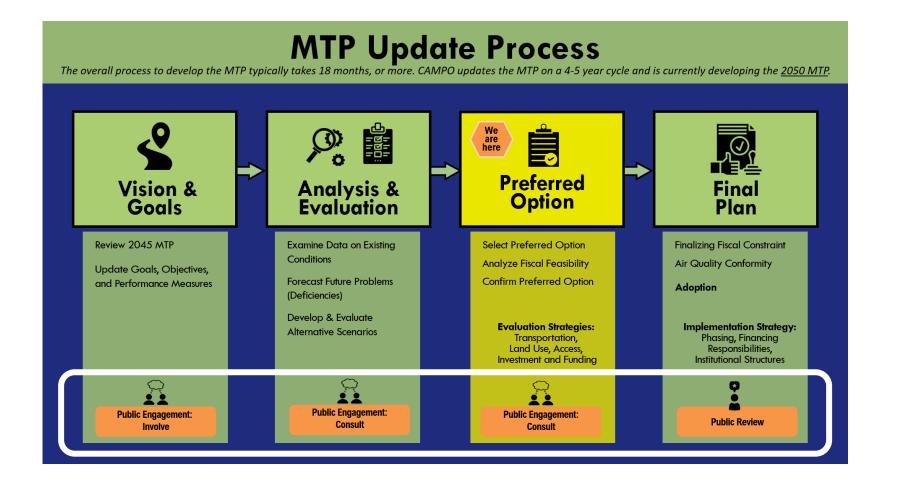
Success Metrics (FY19)

- 6.5 million vehicle trips avoided
- 70 million commute miles reduced
- 2.9 million gallons of gas saved
- 58 million pounds of carbon dioxide release prevented
- 32 designated Best Workplaces for Commuters



Community Engagement Results to Date

Multiple Touchpoints throughout MTP Development





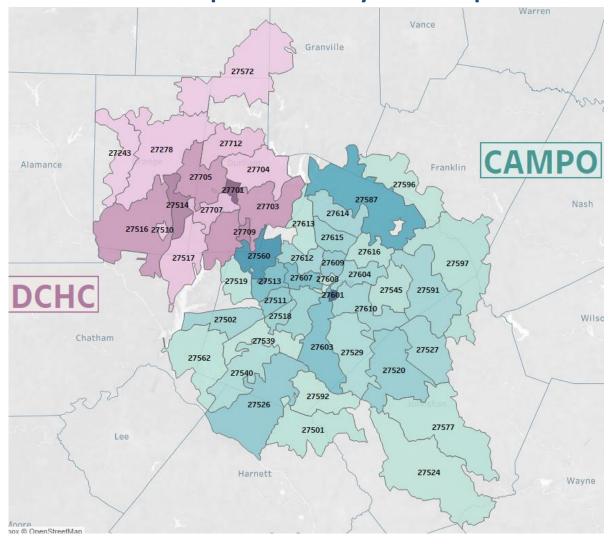
Scenarios Survey Community Engagement Results

August 2021

Response rates by HOME Zip Code

Caswell Person Alamance 27516 27510 27519 27513 27607 27608 27603 27529 Harnett Wayne lapbox @ OpenStreetMap

Response rates by WORK Zip Code



Scenarios Community Engagement Results

Minimize # of Commuters Driving Alone

CAMPO Respondents - Ranking of Measures to Improve Transportation in the Region (Cumulative Scores) n=235 (Cumulative Scores) n=381 Create Passenger Rail Service Such as Commuter Rail (CRT) Reduce Delays Caused by Congestion on Roads **Reduce Carbon and Air Pollutant Emissions** Increase Facilities + Improve Roadways for Bicyclists & Pedestrians **Increase Bus Transit Service** Increase Bus Transit Service **Reduce Delays Caused by Congestion on Roads** Reduce Carbon and Air Pollutant Emissions Create Bus Travel Advantages, eg. Bus Only Lanes Increase # of Jobs Close to Transit (Bus or Rail) **ALL** Respondents - **Ranking of Measures** to Improve Transportation Minimize # of Commuters Driving Alone (Cumulative Scores) n=613 Create Passenger Rail Service Such as Commuter Rail (CRT) Increase Facilities + Improve Roadways for Bicyclists & Pedestrians Reduce Delays Caused by Congestion on Roads **Increase Bus Transit Service Reduce Carbon and Air Pollutant Emissions** Create Bus Travel Advantages, eg. Bus Only Lanes Increase # of Jobs Close to Transit (Bus or Rail)

DCHC MPO Respondents - Ranking of Measures to Improve Transportation

Increase Facilities + Improve Roadways for Bicyclists & Pedestrians

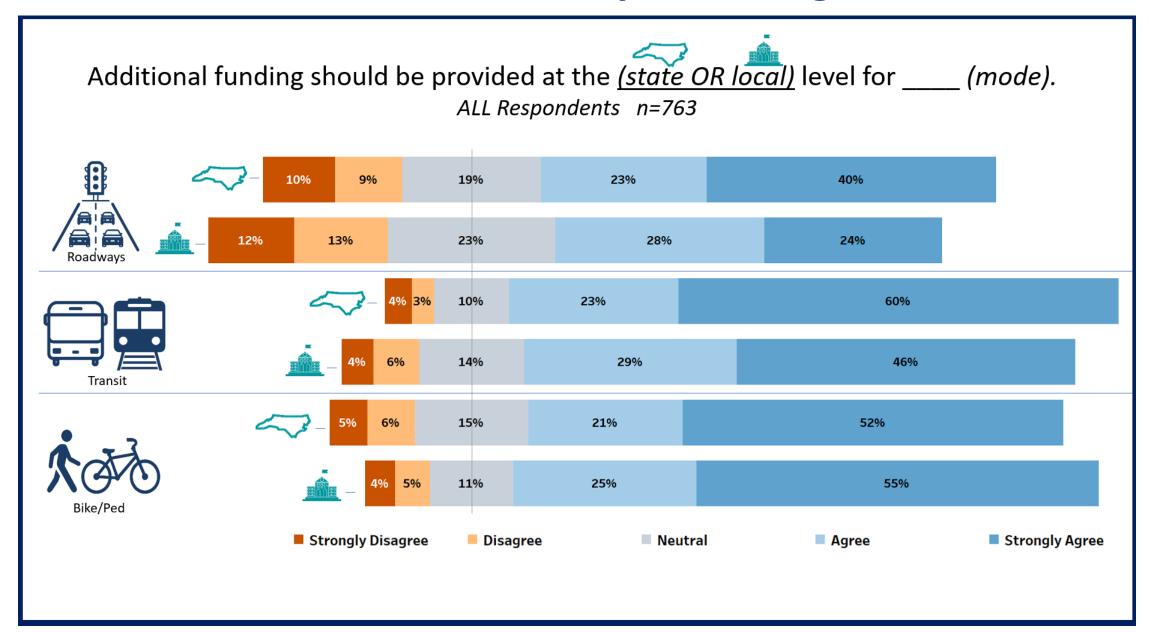
Create Passenger Rail Service Such as Commuter Rail (CRT)

Create Bus Travel Advantages, eg. Bus Only Lanes

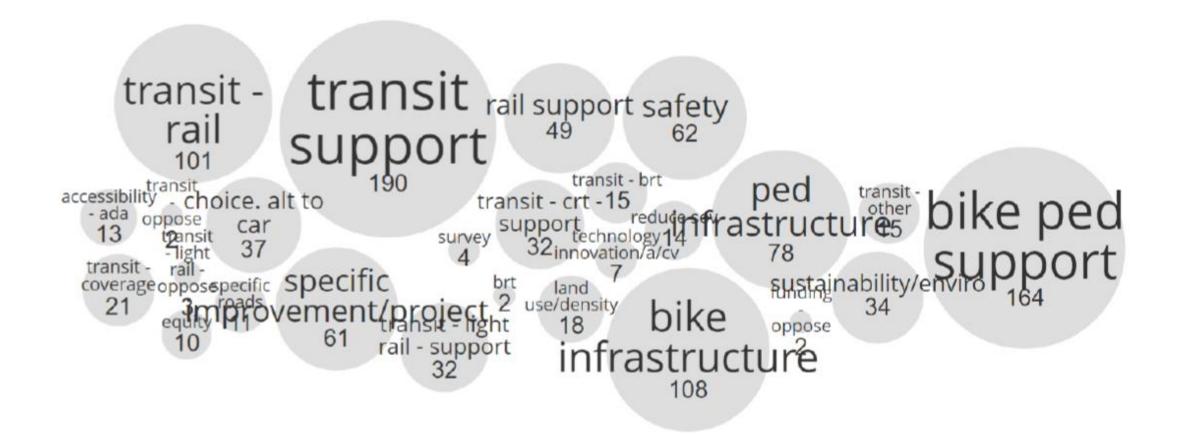
Increase # of Jobs Close to Transit (Bus or Rail)

Minimize # of Commuters Driving Alone

Scenarios Survey - Funding



Scenarios Survey – Comments Received



Other Community Engagement - Region

Commuter Rail Project – Phase 1 (late 2020)

Major Takeaways

Benefits of the CRT Project

- Reducing congestion
- Environmental benefits
- Decreasing commute times
- Bringing the Triangle up to modern metropolitan standards
- Sense of connectivity throughout the region

Concerns

- Project cost and funding allocation
- Would it be effective?
- Would it serve the community equitably?
 - Serves only commuters
 - Doesn't serve those most in need (not equitable)
 - Some geographic areas left out



Others: Recent or Ongoing Area Transit Plan Updates

Wake Transit Plan Update (Approved 2021)

RANKING OF SERVICE & INFRASTRUCTURE PRIORITIES

STAKEHOLDER RESULTS (Sept. 2020)

PUBLIC SURVEY RESULTS	(Aug.	2020)
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Rank	Service Priority				
1	Frequency				
2 (Tie)	Coverage				
2 (Tie)	Span				
4	Regional Service				
5	Local Service				

Rank	Infrastructure Priority				
1	Speed & Reliability				
2	Facilities				
3 (Tie)	Connecting Infrastructure				
3 (Tie)	Technology				
5	Vehicles				

Rank	Service Priority				
1	Coverage				
2	Frequency				
3	Regional Service				
4	Local Service				
5	Span				

Rank	Infrastructure Priority				
1	Speed & Reliability				
2	Connecting Infrastructure				
3	Technology				
4	Facilities				
5	Vehicles				

RANKING OF MODAL PRIORITIES STAKEHOLDER RESULTS (Sept. 2020)

Rank	Modal Priority				
1	Bus Rapid Transit				
2	Commuter Rail				
3	Coverage Bus Services				
4	High-Frequency Bus Services				



2050 Metropolitan Transportation Plan Key Drivers

- 1. Opportunity Places Land Use
- 2. All Together Fiscal Constraint



Connect 2050 Scenario Framework			🚊 🚘 🖵 🐠				
Frame	wo	rk	Mobility Investment Foundation				
			Existing & Committed	Trend	Mobility Corridors	Complete Communities*	Comprehensive Transport Plan
		Existing or Underway	basis for all scenarios				
	Foundation	Community Plans	Deficiency & Needs Scenario	Plans & Trends Scenario			
#	Development	Opportunity Places (Key Hubs; REINVEST Neighborhoods)			Shared Leadership Scenario	All Together Scenario	
	٥	Build-Out					If unlimited \$ & capacity growth

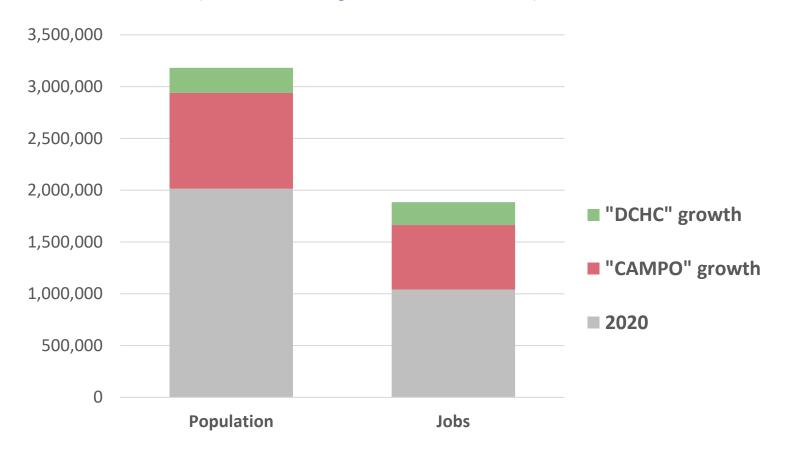
^{*} More focused investment on Complete and Safe Streets, Active Transport, and Transit

 Draft Preferred Scenario based on <u>Opportunity Places</u> land use, <u>All Together</u> revenues, and modified Compete Communities mobility investments.



2020-2050 Growth Guide Totals

(modeled area; larger than MPO boundaries)



Within "modeled area:"

□ 2020-50 added population: 1,160,000

2020-50 added jobs: 840,000

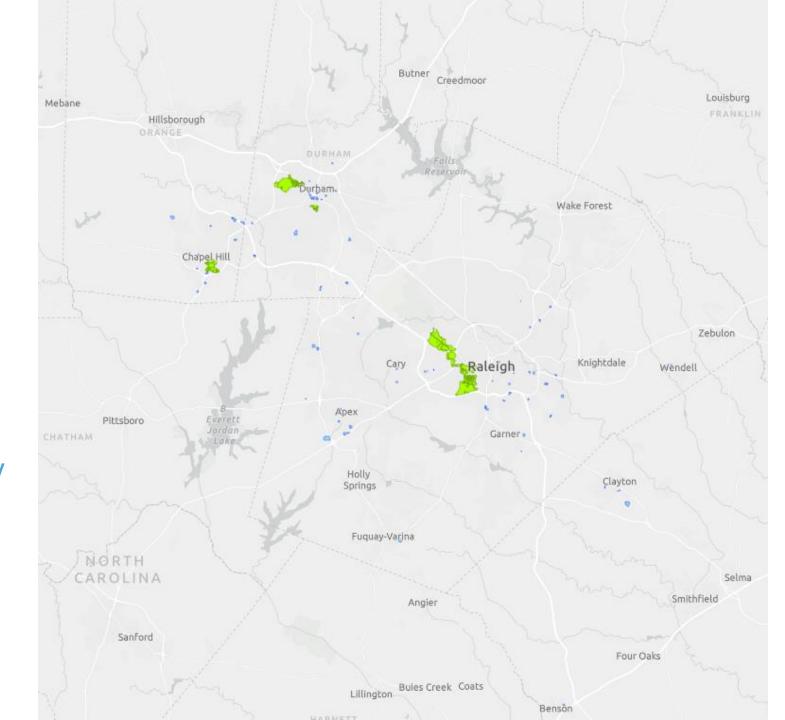


Opportunity Places Land Use

- 4 changes from Community Plans land use:
 - 20% more net growth <u>asserted</u> on Anchor Institution campuses adding 5,000 jobs combined over and above existing plans
 - Multi-family affordable housing <u>asserted</u> at publicly controlled sites that meet physical criteria: 10,000 units over 30 years
 - □ Increased <u>capacity</u> for growth at 22 activity hubs
 - □ Increased <u>capacity</u> for transit-oriented mixed-use development along frequent transit lines

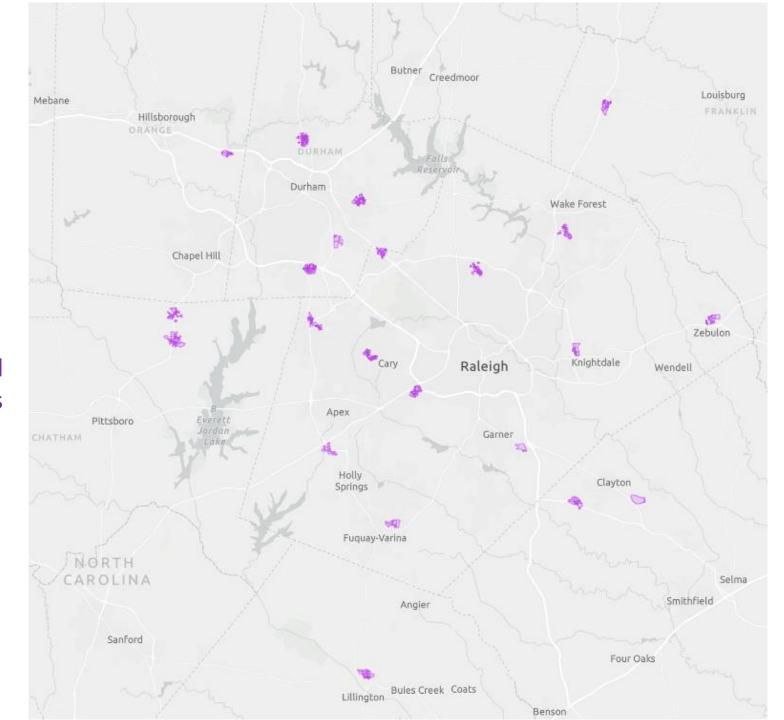


- Anchor Institutions
 - □ UNC
 - + 1,940 jobs + 100 units
 - □ NCSU
 - + 1,150 jobs + 460 units
 - Duke
 - + 1,770 jobs + 270 units
 - □ NCCU
 - + 220 jobs
- Affordable Multi-Family Housing
 - □ Wake + 5,000 units
 - □ Durham + 3,500 units
 - □ Orange + 1,000 units
 - □ Johnston + 500 units

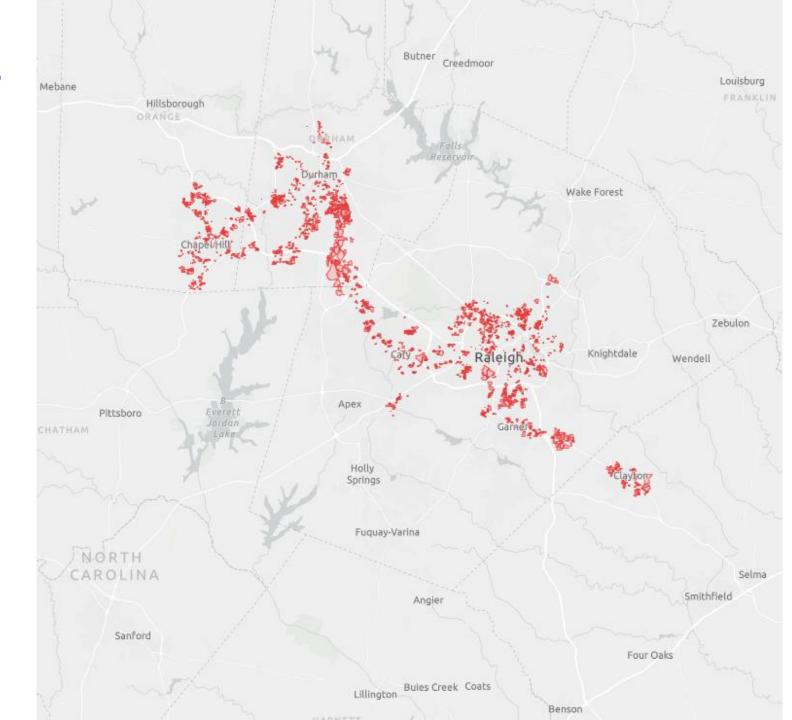


Mobility Hubs

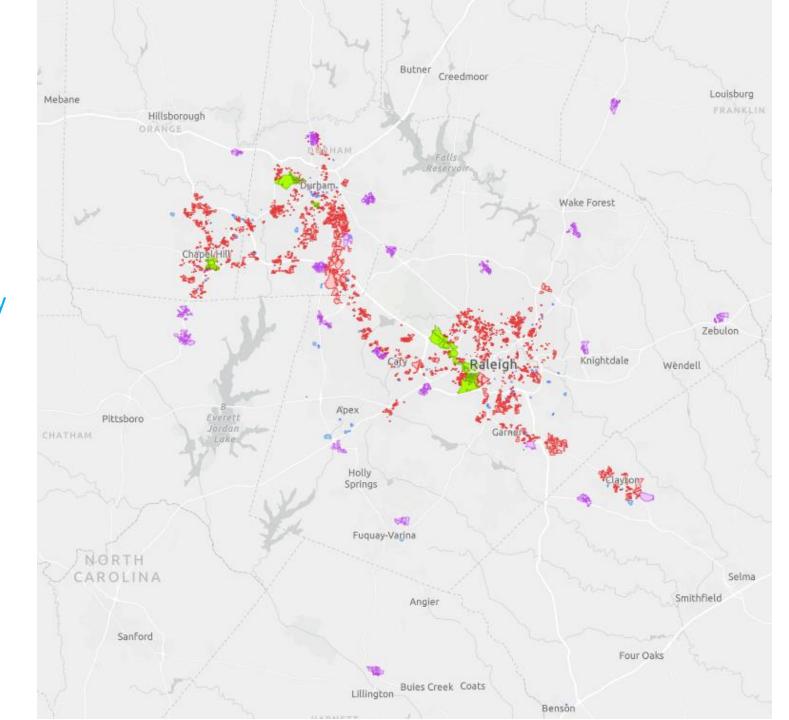
□ Based on the initial scenarios, we might expect an added 5% of allocated jobs to "land" in these hubs compared to the Community Plans Scenario



- Frequent Transit Mixed Use
 - Based on the initial scenarios, we might expect roughly 20,000 added jobs and over 30,000 added households to "land" in these TOD sites if we create them, compared to the Community Plans Scenario



- Composite Map
 - Anchor institutions
 - □ Affordable multi-family
 - Mobility hubs
 - Frequent transit TOD

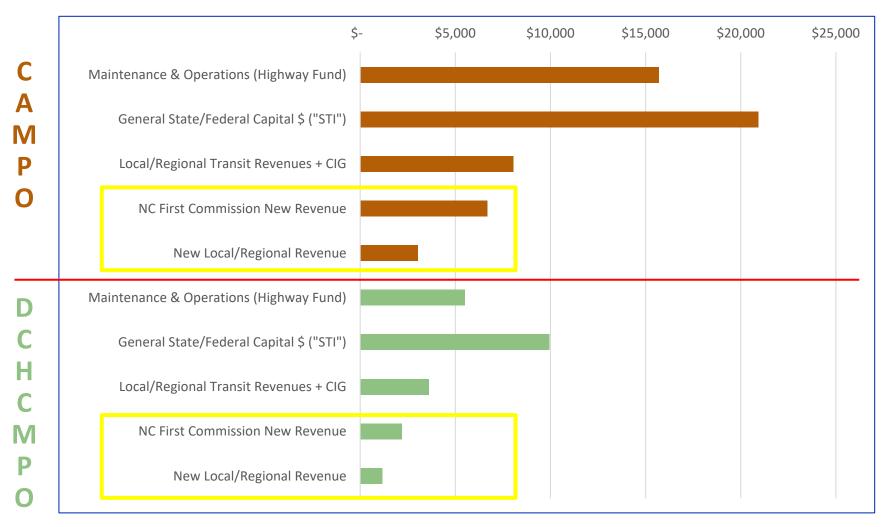


2050 Metropolitan Transportation Plan All Together Investment Revenue

- 1. "Traditional" Revenues (2021-50)
 - State & federal funds based on current STIP, NC Moves report and STI framework
 - Continuation of county-level transit sales taxes
 - Past pattern for other sources (local bonds, developer projects)
- 2. NC First Commission Additional State Revenues (2031-50)
 - MPO "fair shares" of recommended amount
- 3. Additional Local/Regional Revenues (2031-50)
 - Based on "sales tax equivalent"



Connect2050 Preliminary Financials



1st decade from "TIP" and existing sources; new sources applied in 2nd & 3rd decades



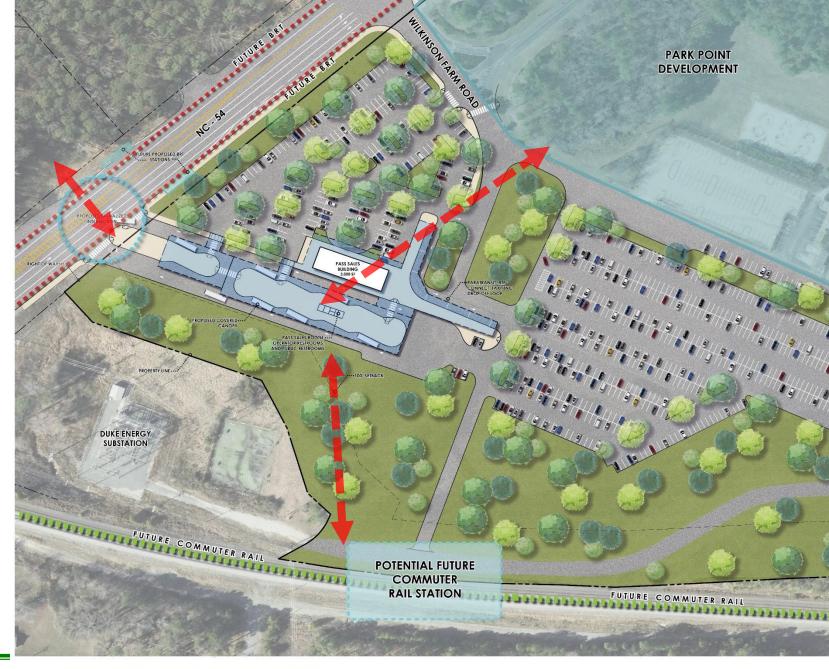
2050 Metropolitan Transportation Plan Shared Regional Investments

- 1. Transit & Rail
- 2. Healthy, Safe, Resilient Mobility
- 3. Complete Corridors/Managed Motorways



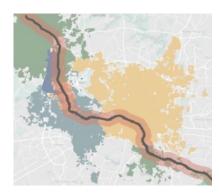
Regional Transit Center

- Near I-40 & Miami Blvd.
- Transit hub for regional services and microtransit
- Connections to planned Bus Rapid Transit, Commuter Rail, and Triangle Bikeway
- Last mile connectivity to RTP destinations
- Improved access to highway network



Greater Triangle Commuter Rail

Rail Analysis



- Stop locations and schedules
- Rail infrastructure: track, bridges, vehicles

PLANNING

Ridership and rail capacity modeling

PRE-PLANNING

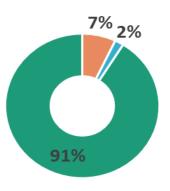
Opportunity Analysis



- Affordable housing
- Access to Jobs
- Land Use
- Job Creation Potential



Engagement



- Three rounds of public engagement
- Business + colleges
- Focus groups
- Local governments
- Railroads

FINAL DESIGN

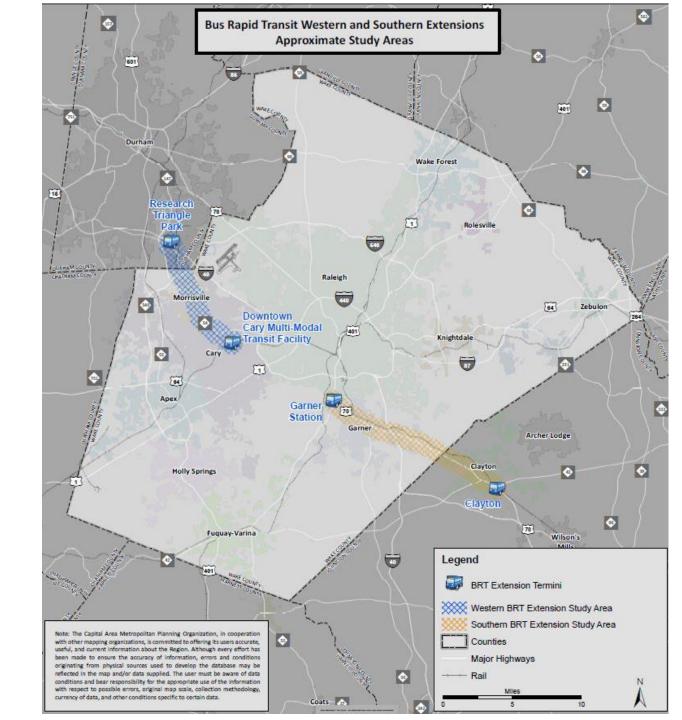
OPENING

CONSTRUCTION

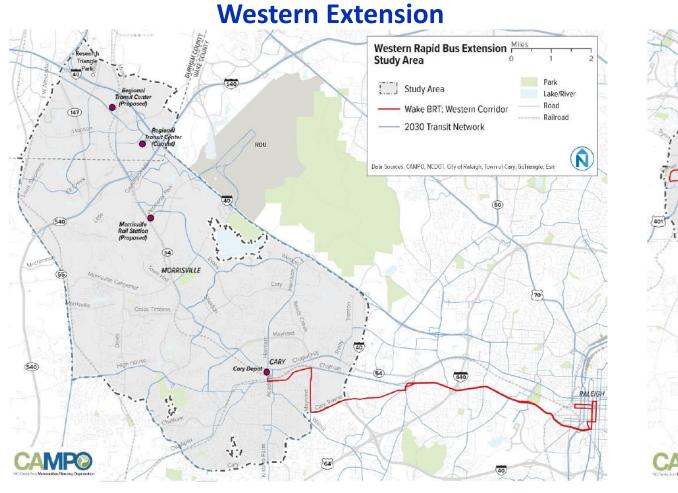


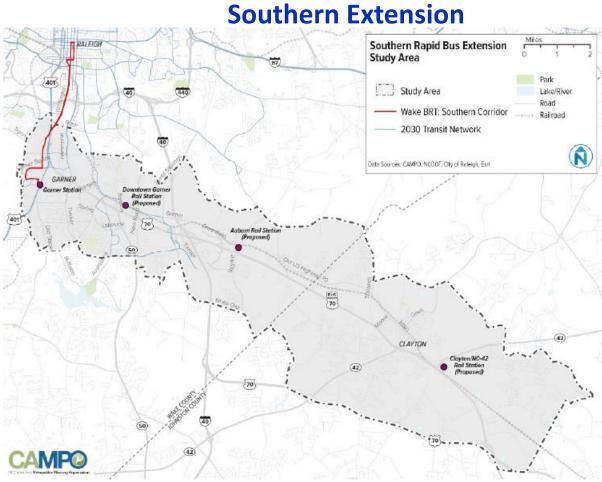
Bus Rapid Transit (BRT) Extension Regional Context

- Extensions of core BRT corridors in the Western and Southern corridors.
- Connections from Garner to Clayton and downtown Cary to RTP.
- Ensure diverse travel market is served by appropriate transit service
- Could provide 1st / last mile solutions for CRT.



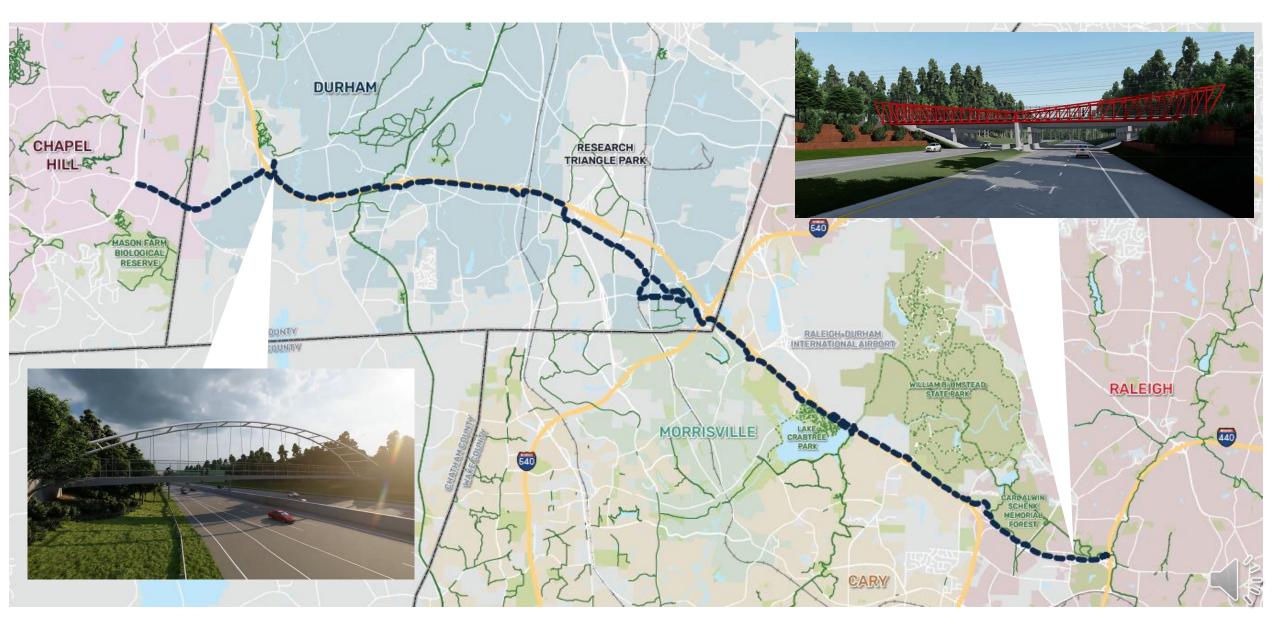
Bus Rapid Transit Extension Study Areas







Triangle Bikeway Preferred Alignment



Triangle Bikeway Typical Section





Transportation Demand Management (TDM)

IMPACTS OF TDM IN FY2020: That's nearly **89,000 days 5.1 million** vehicle not spent driving a car trips avoided It would take almost 284 2.4 million gallons of tanker trucks to hold that gas saved much gas That's roughly 20,000 58 million commute **trips** from San Francisco miles reduced to New York If all those users drove single-46,800 alternative file, the traffic jam would transportation users stretch 133 miles supported 47 million pounds of That reduction would Carbon dioxide (CO2) require 2,600 homes not release prevented using electricity for a year **Annual VMT Reductions from 2009-2020** VMT Reduction (million miles)

2009 2010 2011 2012 2013 2014 2015 2016 2017 2018 2019 2020

Actual VMT Reduction
 Target VMT Reduction

TDM is a critical element of our transportation management strategies.

Securing long term commitments from NCDOT for the program is key to future success





Complete Corridors: US 70/Glenwood Ave.

Current TIP/STIP includes funded projects along the US 70 corridor between Raleigh and Durham.

Challenge will be to ensure these investments are multimodal and fit the future corridor context:

- Transit Signal Priority/BOSS
- Interregional Bicycle / Pedestrian connections
- Managed Freeways as appropriate
- Access to support future land use priorities





Complete Corridors - Managed Roadways



Image courtesy of VicRoads



- Synchronizes flow of vehicles entering a freeway to available capacity on the freeway
- Provides real time demand management to manage traffic
- Interchanges coordinate with one another to prevent excessive wait times and queuing for all interchanges, metering rates differ for each ramp
- Future infrastructure to vehicle communications
- Better coordination with transit priority

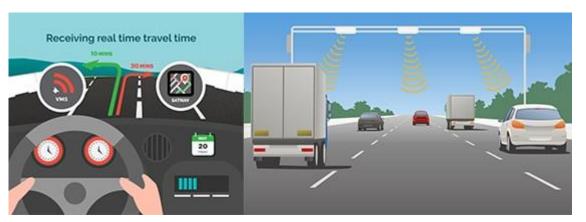
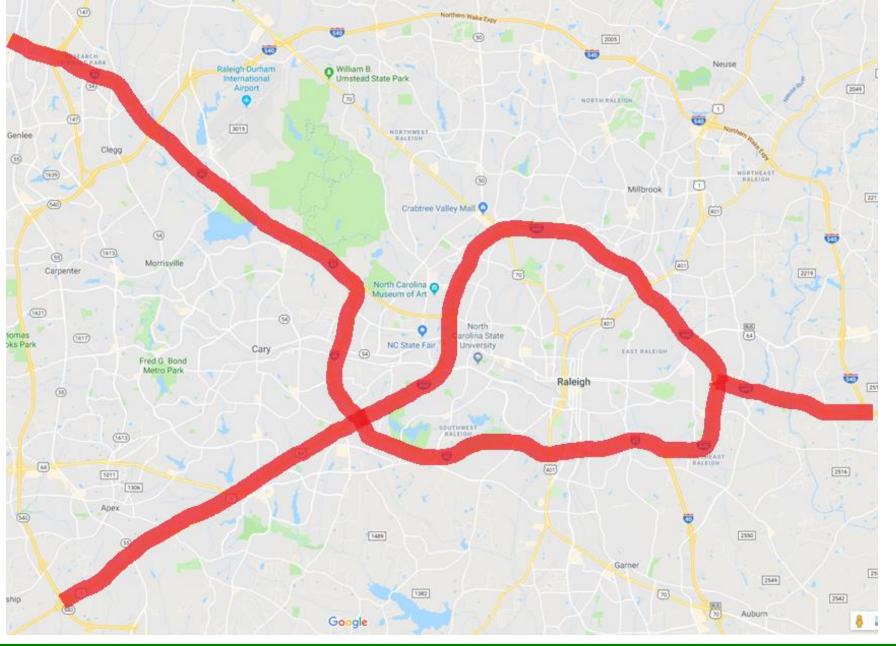


Image courtesy of VicRoads



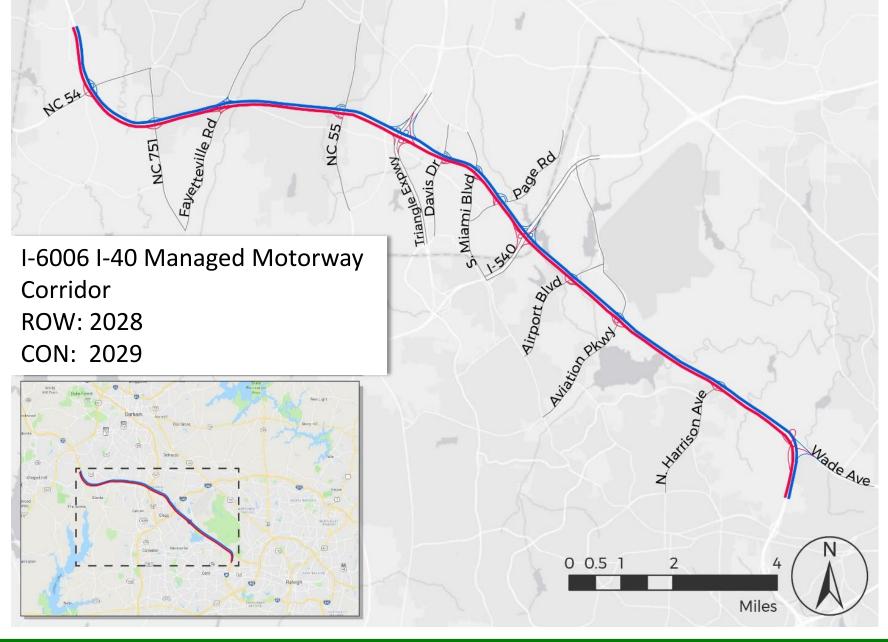
Triangle Region - Managed Roadways Phase 1 & 2

Project	ROW	CON
I-6006	2028	2029
U-6101	2029	Post- Years





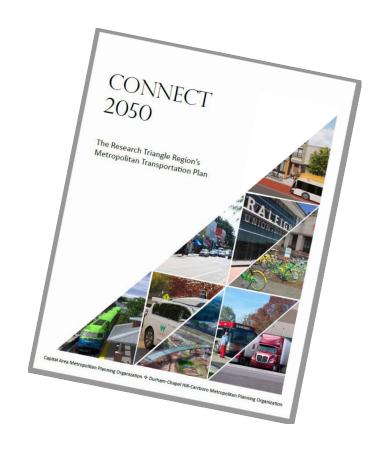
Joint Section of Triangle Managed Roadways System





Next Steps on Connect2050

- Draft preferred scenario from each MPO shared regional investments need to be consistent, but each MPO selects its own projects
 - CAMPO: September 15
 - DCHC MPO: October 13
- Public engagement on the scenario
- Adoption of projects by decade and fiscal constraint for final plan
- Air Quality Conformity Process
- Preparation of Final Report and supporting material





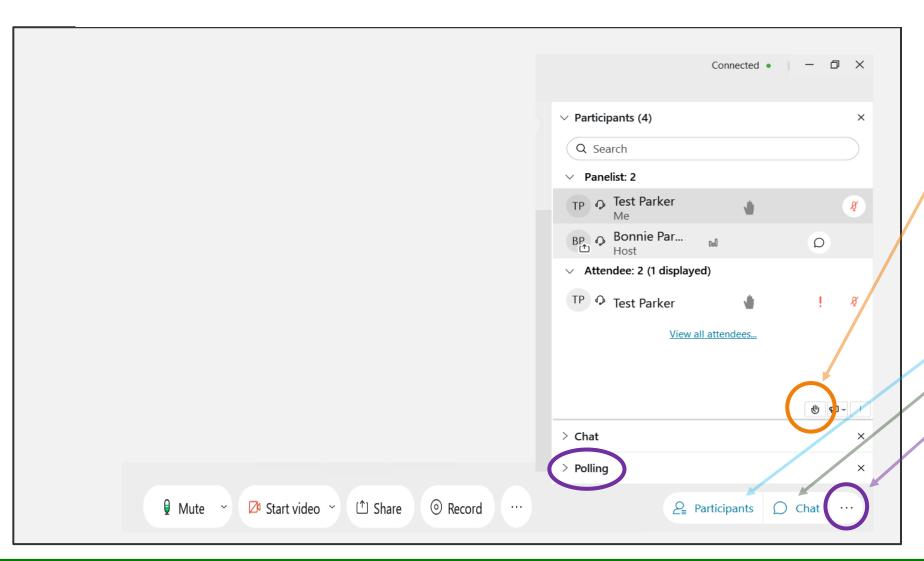
Flow of Discussion Among MPO Ex. Board/Board Members

- Begin with Clarifying Questions via Chat/Raised Hands
 - Brief questions for clarification on anything you have heard
- Poll Questions

- Discussion via Chat/Raised Hands
 - Broader conversation and discussion.



Webex Panels (typically on the right)



- ✓ How to Raise your hand
 - Bottom of the Participants Panel, Click on Hand icon

- ✓ How to Open Panels
 - 1. Participants Panel
 - 2. Chat Panel
 - 3. Polling Panel



Poll Questions For Ex. Board/Board Members

- 1. How supportive are you of the Opportunity Places land use that
 - a. Provides more affordable housing on publicly controlled land
 - b. Increases development on university campuses
 - c. Increases capacity for development in designated activity hubs
 - d. Increases capacity for mixed-use development on frequent transit lines

Remember to click "Submit"

- 2. How supportive are you of the <u>All Together</u> fiscal constraint that:
 - a. Includes MPO "fair shares" of NC First additional state revenues
 - b. Includes additional local/regional revenues dedicated to mobility
- 3. How supportive are you of the proposed package of Shared Regional Investments?



Discussion Among Ex. Board/Board Members

via Chat/Raised Hands



ADJOURN

Presentation Slides

https://campo.legistar.com/Calendar.aspx

Thank you for your Participation!

