



Walking the talk: Moving from scenarios to action

Lake Arrowhead Symposium, September 20, 2009

Harrison Rue

A regional action strategy



tjpd.org



Sustainability action strategy

- **Single planning process** (one conversation)
 - Long-Range metro & rural plans, state multimodal plans, transit operators and localities
- **Scenario planning** (regional & corridor)
- **Multimodal corridor planning**
 - Transit Ready Development
- **Focused investment strategy**
 - Review available funds/projects across all partners
 - Re-purpose \$\$ to 'complete the networks'
 - Target short-term action: TDM, operational, transit & walk-bike improvements, connect-the-dots

Assumptions (it's all in there):

- **Regional Sustainability Accords**
 - Green building & infrastructure, etc.
- **Hands - on public participation**
- **Interagency project teams**
- **Coordination of plans & projects**
 - **Across jurisdictions & agencies**
 - **Include multiple programs & funding**
- **Plans incorporate Action Agendas**

Bring everyone to the table





Regional Scenario Planning

Linking land use, transportation,
economy & environment



New US DOT/HUD/EPA partnership

- **Interagency task force to better coordinate federal transportation and housing investments**
- **Enhance integrated regional housing, transportation and land use planning and investment**
- **Goal to have every major metro area conduct integrated housing, transportation, and land use planning and investment in the next four years**

New US DOT/HUDEPA partnership

- **Develop federal housing affordability measures that include housing and transportation costs and other costs that affect location choices**
- **Research, evaluate and recommend measures that indicate the livability of communities**
- **Identify opportunities to better coordinate their programs**
- **Conduct joint research, data collection and outreach**

TJPCDC Sustainability Accords: Regional values as EPI model inputs

- Encourage and maintain strong ties between the region's urban and rural areas
- Strive for a size and distribute the human population in ways that preserve vital resources
- Retain the natural habitat
- Ensure water quality and quantity are sufficient to support people and ecosystems
- Optimize the use and re-use of developed land and promote clustering
- Promote appropriate scale for land uses
- Retain farm and forest land
- Develop attractive and economical transportation alternatives
- Conserve energy
- Provide educational and employment opportunities
- Increase individual participation in neighborhoods and communities

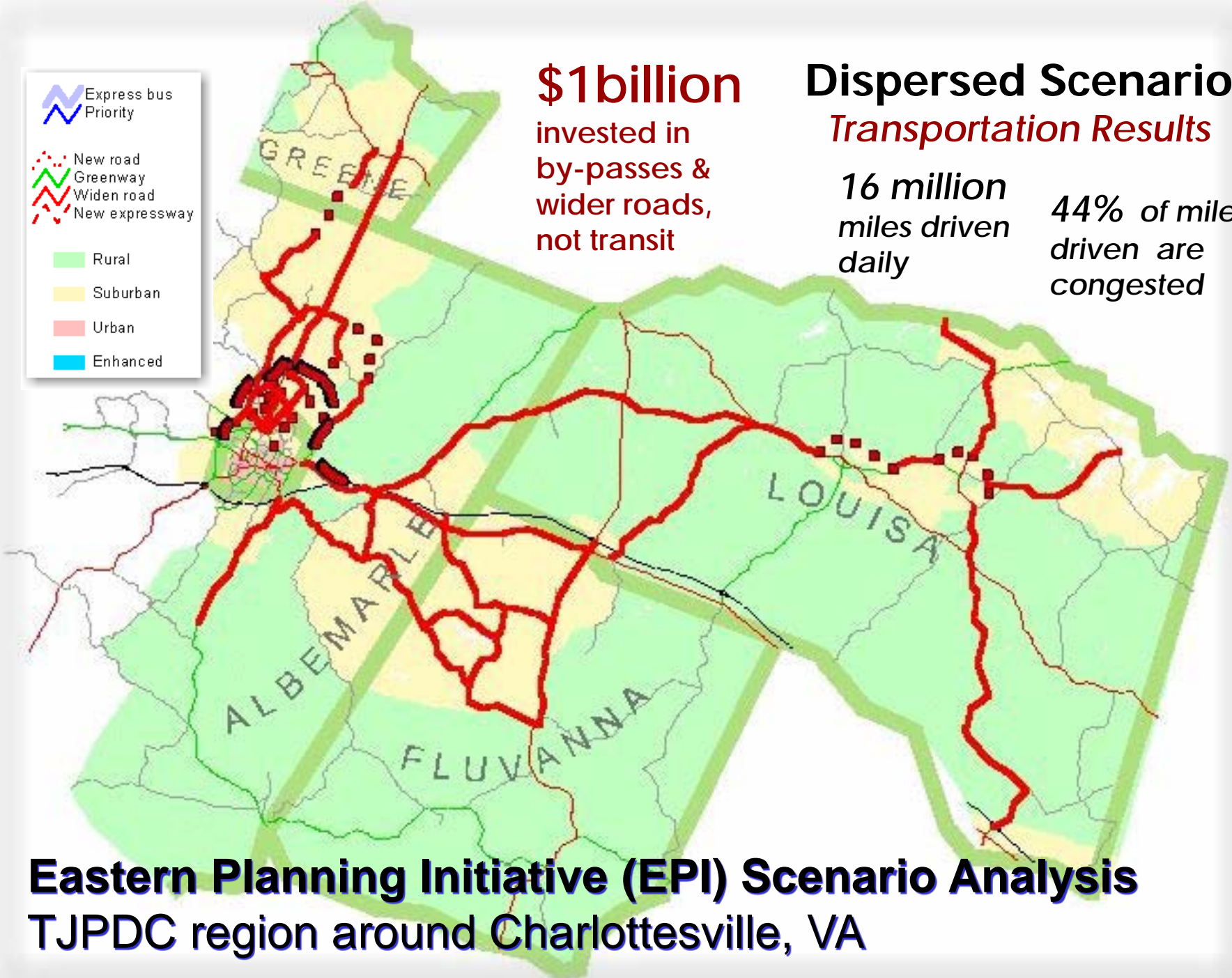


\$1 billion
 invested in
 by-passes &
 wider roads,
 not transit

Dispersed Scenario
Transportation Results

16 million
 miles driven
 daily

44% of miles
 driven are
 congested



Eastern Planning Initiative (EPI) Scenario Analysis
 TJPDC region around Charlottesville, VA

Town Centers Scenario

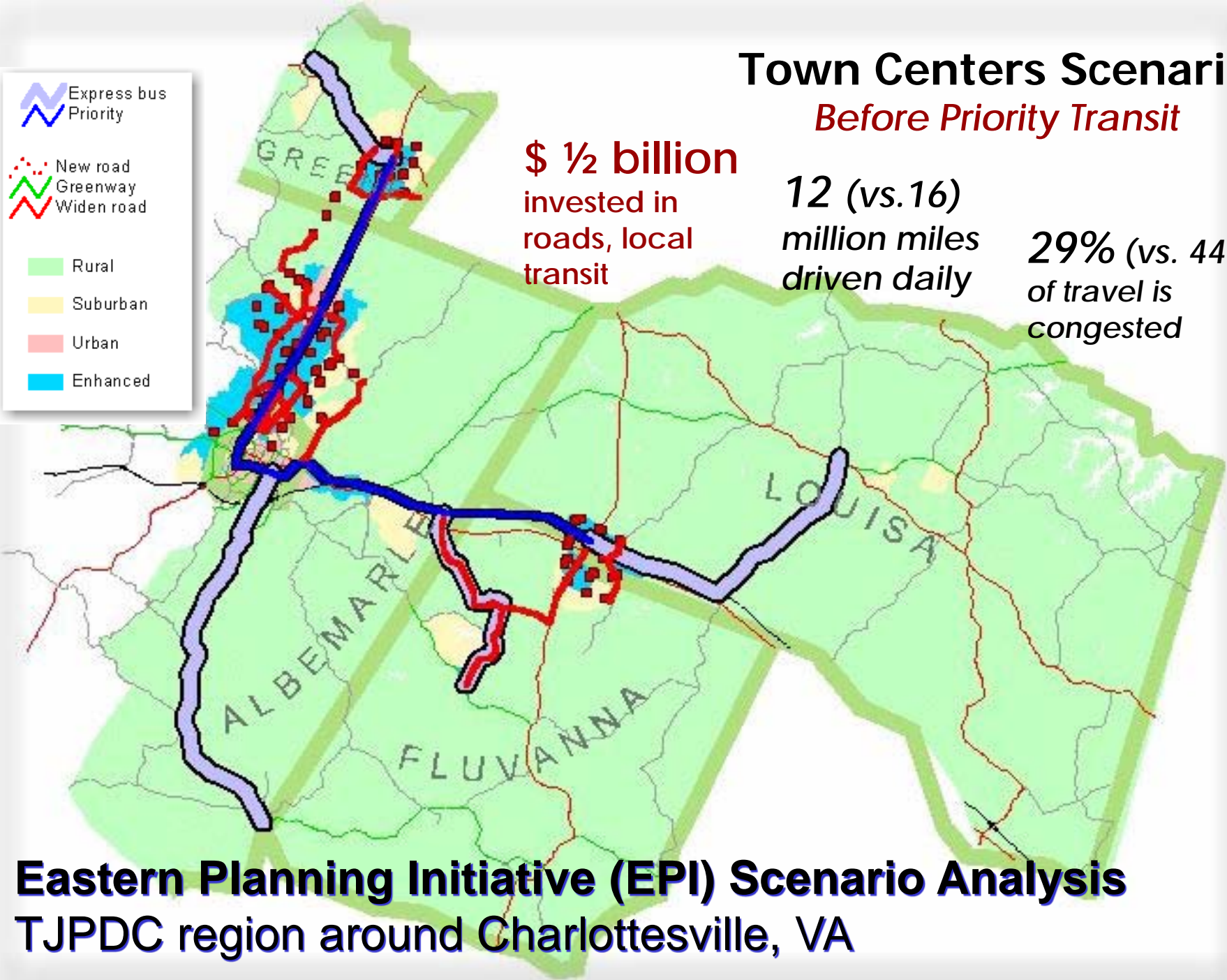
Before Priority Transit

\$ ½ billion
invested in
roads, local
transit

12 (vs.16)
million miles
driven daily

29% (vs. 44%)
of travel is
congested

- Express bus Priority (Blue wavy line)
- New road (Red dotted line)
- Greenway (Green zigzag line)
- Widen road (Red solid line)
- Rural (Light green background)
- Suburban (Yellow background)
- Urban (Red background)
- Enhanced (Blue background)



Eastern Planning Initiative (EPI) Scenario Analysis
TJPDC region around Charlottesville, VA

EPI Scenario Analysis

Identified and modeled 26 place types

Urban Mixed-use



East Market Street, Charlottesville



EPI Scenario Analysis

Identified and modeled 26 place types

Suburban Mixed-use



PUD Development US 29 North

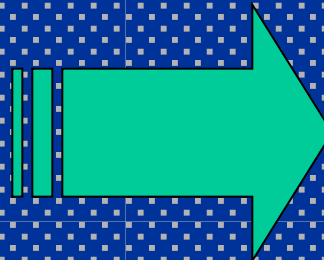


Suburban Mixed-Use

Circle reflects five minute walk

EPI Scenario Analysis

Enhanced Suburban Mixed-use



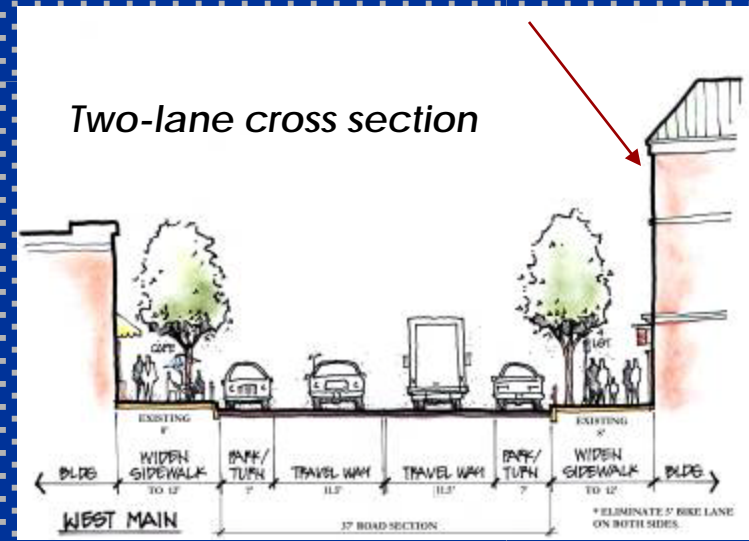
Boulevard Design Characteristics

"People Friendly Streets"

Buildings brought to street for enclosure / interest

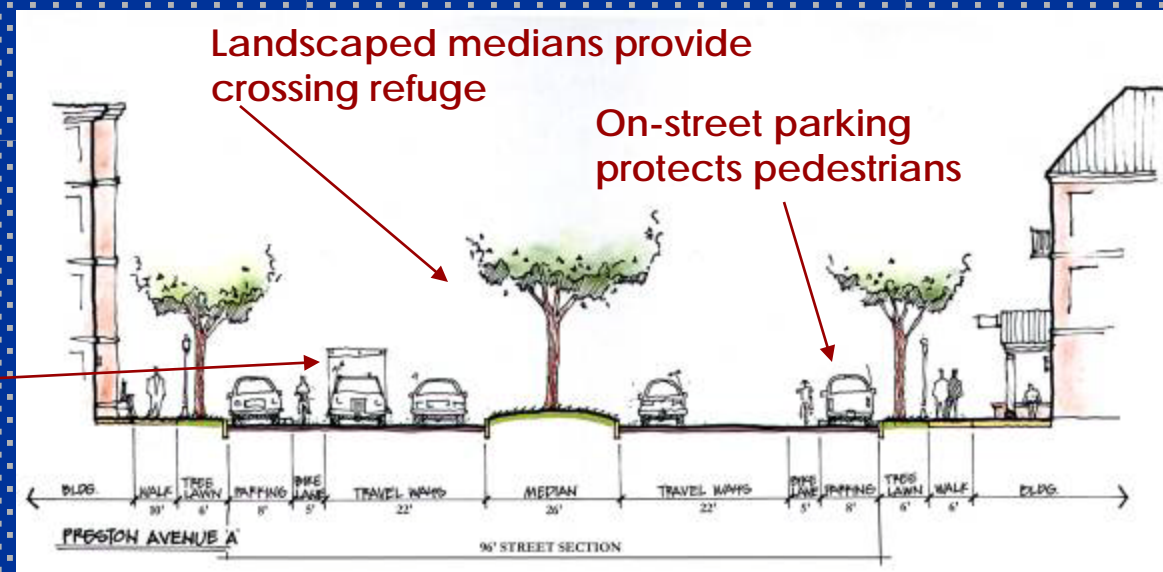


Streetscape



Two-lane cross section

Bus amenities include shelters and by-pass lanes



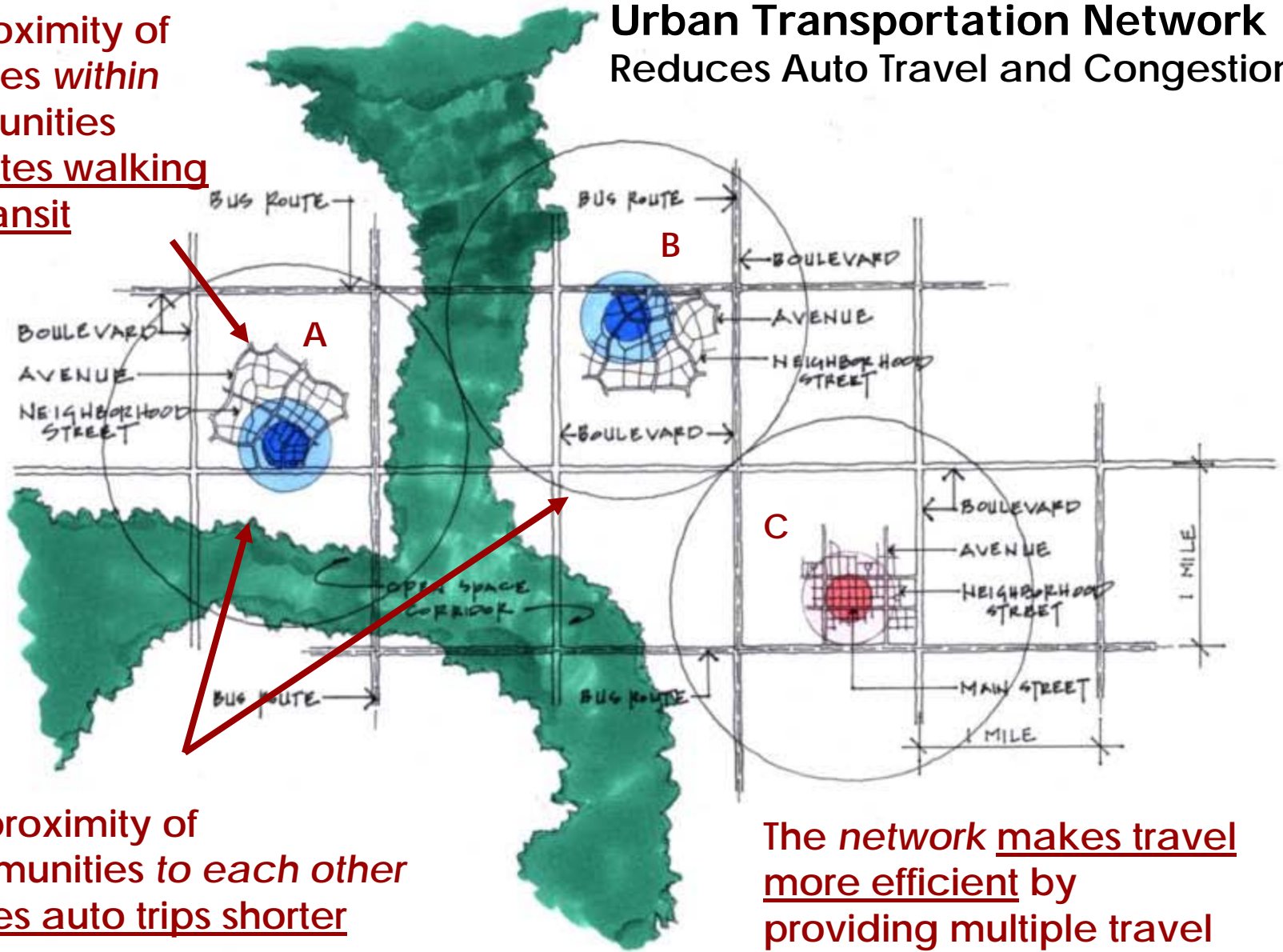
Landscaped medians provide crossing refuge

On-street parking protects pedestrians

Four-lane cross section

The proximity of activities *within* communities promotes walking and transit

Urban Transportation Network Reduces Auto Travel and Congestion



The proximity of communities *to each other* makes auto trips shorter

The network makes travel more efficient by providing multiple travel choices

How the Regional Scenarios Compare

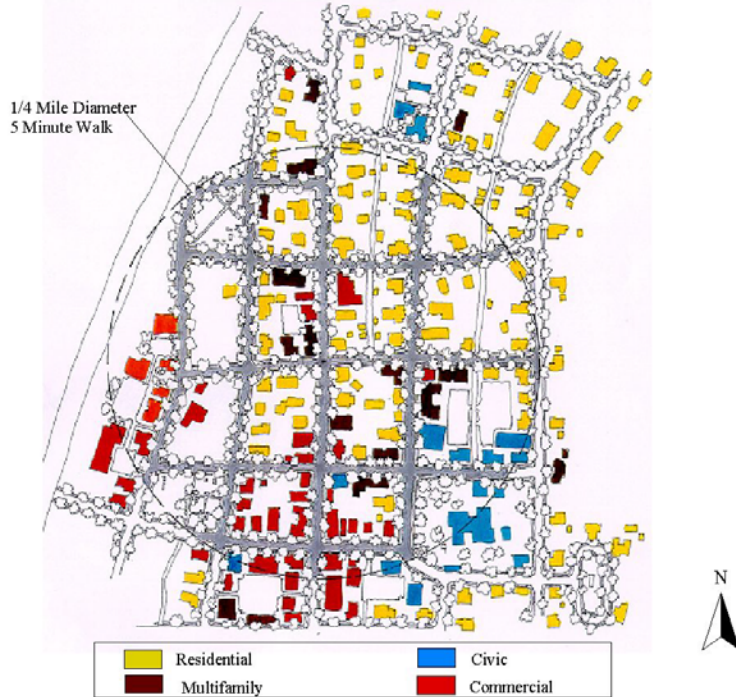
All scenarios assume @ 330,000 population and 220,000 employment

Measure / Sustainability Accord	Dispersed	Town Ctr	CoreL	CoreM
Pct. Farms and Forests Retain resources/habitat/farms/forests	<i>55</i>	64	65	65
Pct. Developed Retain resources/habitat/farms/forests	<i>45</i>	36	35	35
Pct. Living In Clustered Communities Optimize use/cluster/human scale	<i>13</i>	61	68	68
Pct. Non -auto Trips Transportation Alternatives	<i>4</i>	15	18	18
Annual Gallons Gas Consumed (billions) Conserve Energy	<i>155</i>	121	110	114
Pct. Travel Congested Employment / Education Access	<i>44</i>	27	20	21
Water Quality and Quantity Water Quality and Quantity	<i>Poor</i>	Good	Good	Good

Red/italics- Comparatively worst

Nelson County Comp Plan – rural area

Nelson County Comprehensive Plan Rural Small Town Development Model



Small Town

A well-defined center of rural activity that is surrounded by sparsely developed, or sparsely populated rural or agricultural land. The area contains at least several of the following land uses: residential, retail, office, civic, institutional, limited industrial, and park/recreation.

Building Sizes - Building scale should be compatible with existing buildings.

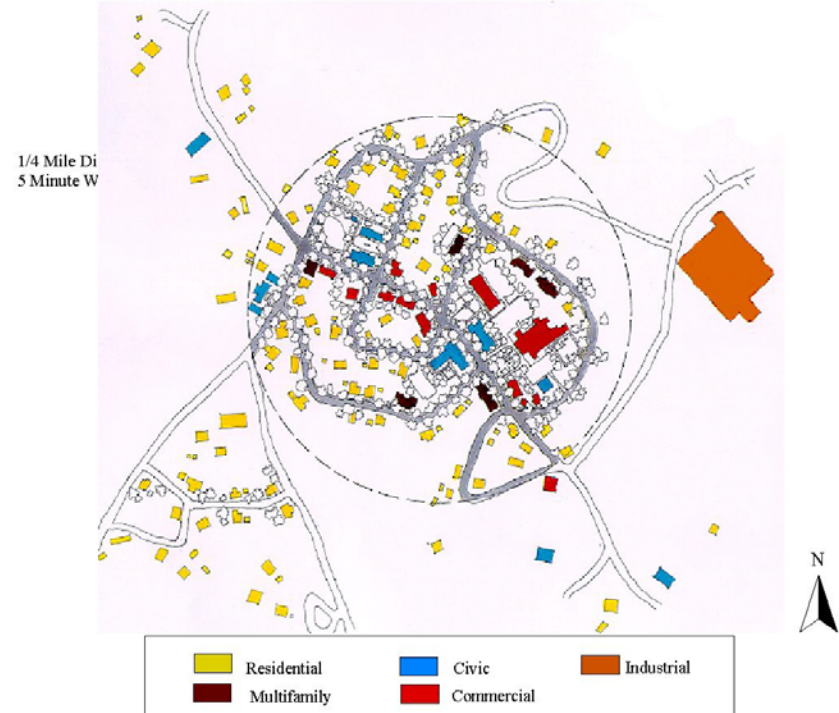
Proximity of Activities and Methods of Transportation - High proximity, balanced travel among automobile, rural transit, bicycling, and walking.

Locational Requirements - Usually at or near a crossroads; sometimes major highways.

Parking Characteristics - A mixture of on-street parking, parking lots, and driveways.

Growth/Change Potential - Relatively stable. However, some areas are facing growth pressures and suburbanization, while others are losing residents. Infill development is encouraged.

Nelson County Comprehensive Plan Rural Village Development Model



Rural Village

A center of rural activity, smaller than a small town, surrounded by sparsely developed, or sparsely populated rural or agricultural land. The area may contain residential, commercial, civic, institutional, or industrial uses.

Building Sizes - Building scale should be compatible with existing buildings.

Proximity of Activities and Methods of Transportation - Moderate proximity, balanced travel among automobile, rural transit, bicycling, and walking.

Locational Requirements - Located at or near crossroads; sometimes major highways.

Parking Characteristics - A mixture of on-street parking, parking lots, and driveways.

Growth/Change Potential - Relatively stable. However, some areas are facing growth pressures and suburbanization, while others are losing residents.



Focused investment strategy

Multimodal corridors

Completing the network

Multimodal Investment Strategy

- ❑ Integrated, multimodal T&LU planning**
 - ❑ Link cities & suburban corridors, growing rural counties, and small towns**
- ❑ All-hands-on-deck public process**
 - ❑ Include business and developers**
 - ❑ Inter-agency collaboration & tech team**
 - ❑ Focus on implementing the vision**
- ❑ Tie to local comprehensive plans & DOT project programming**

Multimodal Investment Strategy

- ❑ Use projects to demonstrate state-of-the-art practices and policy changes
- ❑ Voluntary participation using incentives, not mandates
- ❑ Target \$\$ toward strategic solutions
 - ❑ Put new \$\$ to work in support of new ideas
 - ❑ Leverage private investment
 - ❑ Use public funds to 'connect the dots'

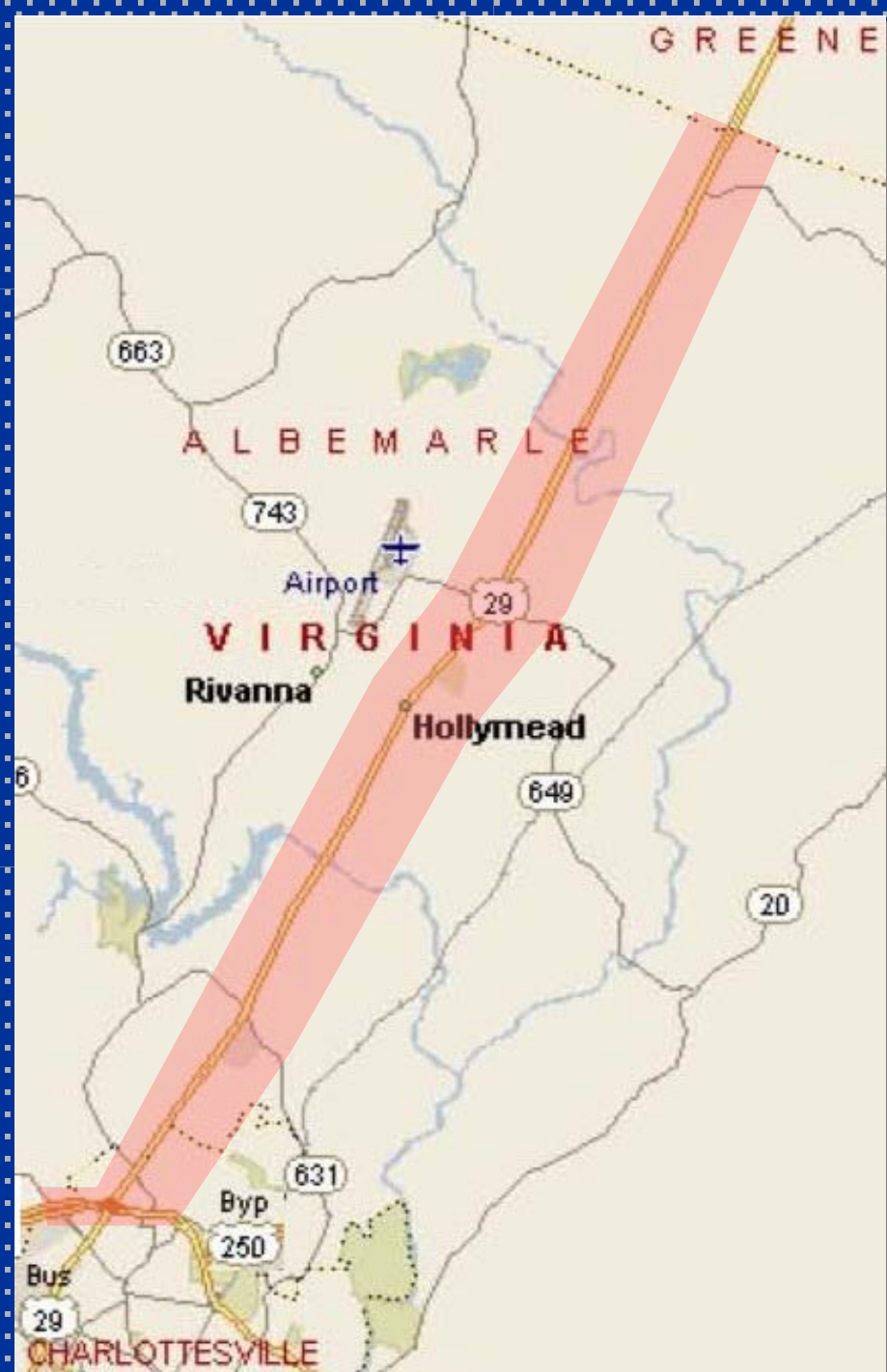
Multimodal Investment Strategy

- Couple high-level strategic direction with implementation capabilities of existing agency structure**
- Select regions for planning \$\$**
- Award implementation \$\$ based on:**
 - Feasible multimodal plans**
 - Adopted local land use plans**
 - Committed private investment & R.O.W.**
 - Complete consensus on priorities**

Places29 & 29N

Places29 combines:

- VDOT & MPO 29N Corridor study
- Albemarle County Northern Development Areas Master Plan
- 29H250 Ph 1&2 Studies-City & County
- Links land use & transportation
- Transit-Ready Development

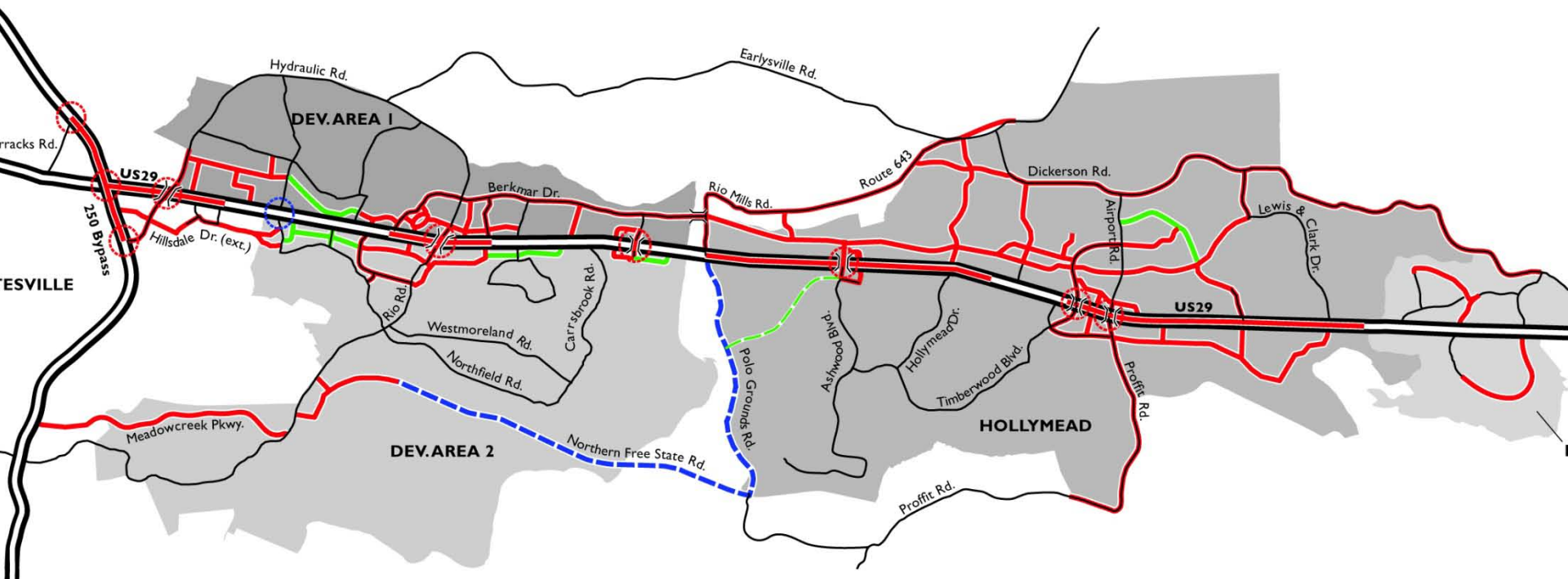


Places29 Preferred Road Network

Establish Parallel Routes that support performance of corridor

Provide Connectivity across US 29 through grade separations in key locations

Framework for bicycle and trails network



US 29 at Hydraulic Existing conditions



US 29 at Hydraulic High-Capacity Boulevard



US 29 – Urban Grade separation



Boulevard goes underneath cross-road - 3 travel lanes each direction with low-speed access ramps

Preferred Network - Transit (Expanded Stage)

Use **BRT** to connect Regional Activity Centers

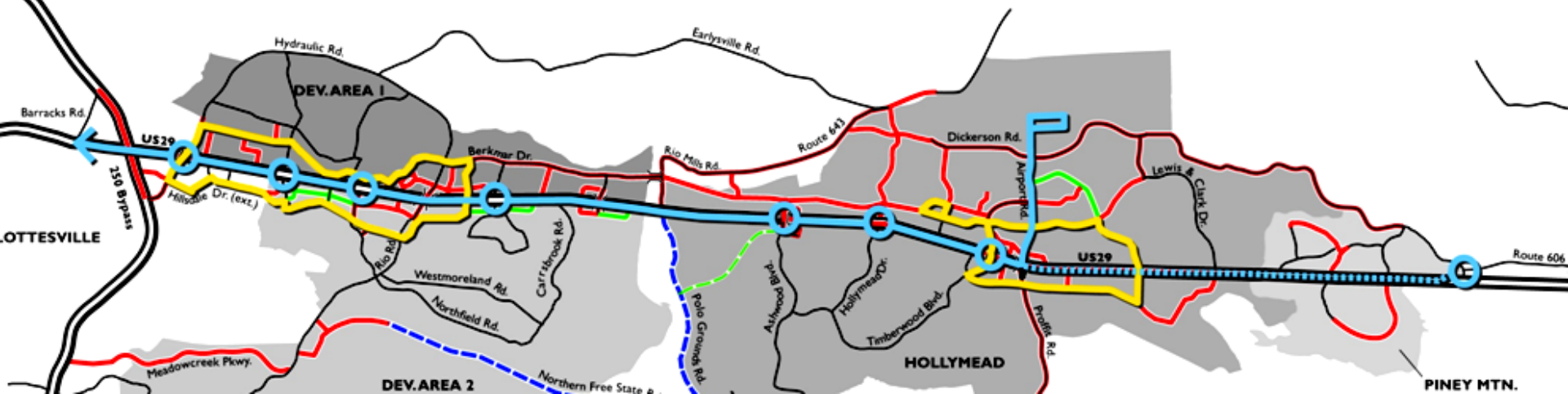
- Employment – NGIC, GE Fanuc, UREF
- Airport
- UVA
- Downtown Charlottesville

Provide **Circulators** in Uptown Area and S. of Rio Road

- Use parallel/frontage roads
- Link lifestyle/retail destinations
- Allows for wider BRT stop spacing/faster trip time
- Suitable for Modern Streetcar

 **BRT** Connects Regional Activity Centers

 Local **Circulator** Service



Bus Rapid Transit (BRT)

Multiple doors, low floors, fast boarding



Bus Rapid Transit (BRT)

Bright, comfortable interior



US29 facing south toward Rio Road



Typical suburban roadway with auto-oriented shopping

US29 facing south toward Rio Road



Urban grade separation (in distance) and multimodal boulevard – 4 lanes each direction plus turn lanes (with median islands for safety)

US29 facing south toward Rio Road



Mixed-use infill development on existing aging shopping centers

US29 facing south toward Rio Road



Additional block-by-block redevelopment provides Transit Targets and enhanced walking and wheeling choices

US29 facing south toward Rio Road



Additional block-by-block redevelopment provides Transit Targets and enhanced walking and wheeling choices

US29 facing south toward Rio Road



Additional block-by-block redevelopment provides Transit Targets and enhanced walking and wheeling choices

US29 facing south toward Rio Road



Landscaping matures over time

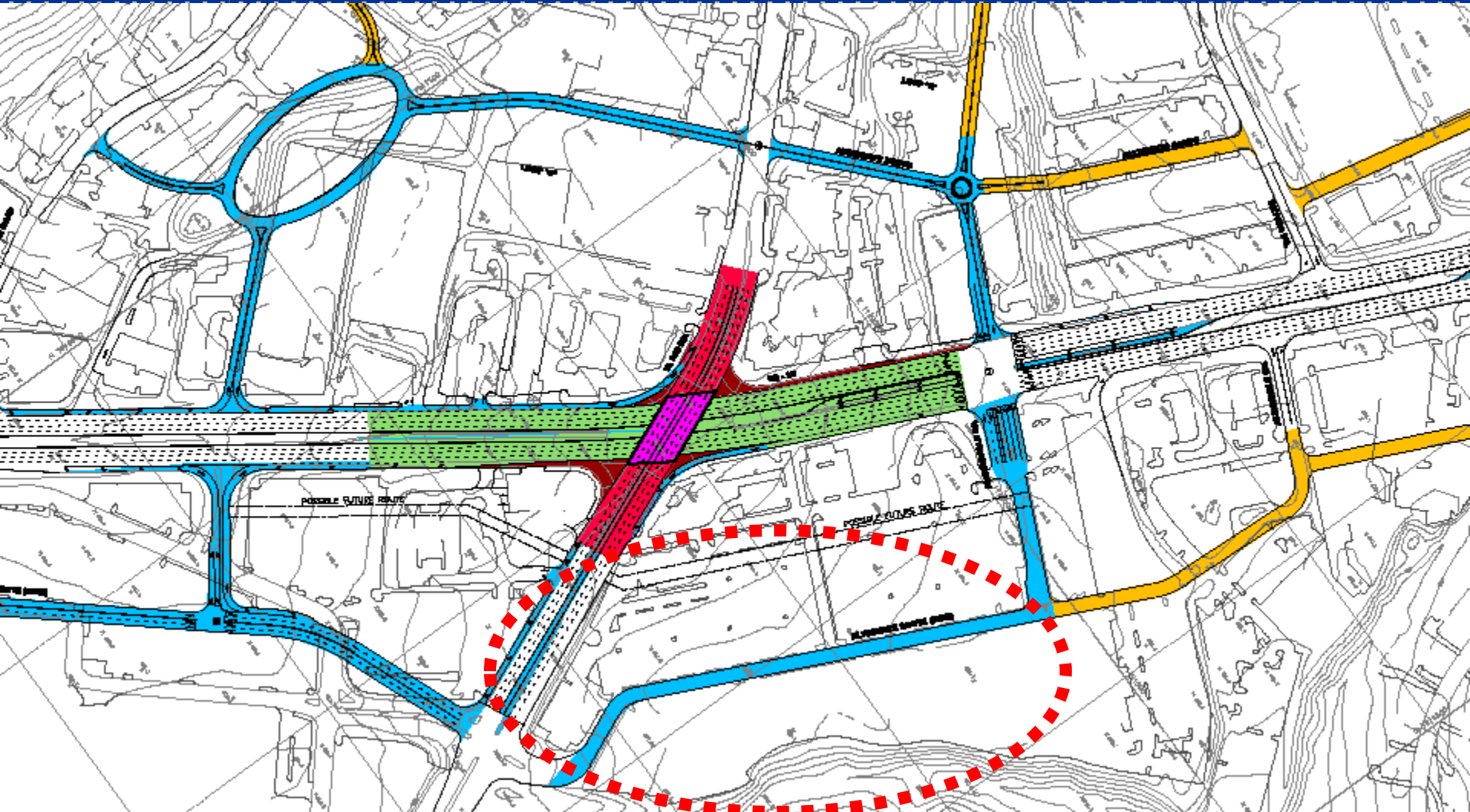
US29 facing south toward Rio Road



Zoomed in toward grade-separated intersection

Redevelopment as Transit Target

Albemarle Square – older shopping center at Rio & 29



Redevelopment as Transit Target

Albemarle Square – older shopping center in Midtown



Redevelopment as Transit Target

Mixed use/residential infill on under-used parking lot



Redevelopment as Transit Target

Redevelopment of existing buildings



Redevelopment as Transit Target

Amenities for walkability and interaction



Redevelopment as Transit Target

Expansion as market demands



Transit-Ready Development

Strategies to address how development in greenfield (or redevelopment) sites can:

- Incorporate transit-supportive strategies early on
- Grow into transit-oriented development over time

Transit-Ready Development

- Mixed land uses and diversity of housing types
- Pedestrian-friendly site plan, with generous sidewalks and comfortable transit stops
- A neighborhood street grid (plenty of connections versus cul-de-sacs)
- Transit routes and stops that are
 - incorporated into current development
 - or factored into future plans
- Public and commercial facilities designed as Transit Targets and community focal points

Transit-Ready Development

- Regional transit planning, across jurisdictions
- Developer marketing plans that take advantage of transit-supportive strategies
 - Wide range of housing products
 - One-car (or no-car) families
 - Location-efficient mortgages
- 'Early-action' transit service
 - Commuter coaches, Circulator trolleys

New development – Research Park

Typical Suburban Research Park Campus



New development – Research Park Phase & coordinate public/private infrastructure



New development – Research Park

Initial phase Transit-Ready, urban block structure



New development – Research Park

Infill on surface lots as demand increases



Transforming 'Gasoline Alley'

Becoming a Transit-Ready neighborhood center



Transforming 'Gasoline Alley'

Medians and pedestrian improvements



Transforming 'Gasoline Alley'

Continue public improvements



Transforming 'Gasoline Alley'

Mixed-use infill development on individual properties



Transforming 'Gasoline Alley'

Continue infill development



Transforming 'Gasoline Alley'

Landscape matures over time



Transforming 'Gasoline Alley'

Add transit service as market grows



Focused investment strategy

- **Review available funds/projects across all partners (inc private)**
- **Re-purpose \$\$ 'accruing' into multimodal corridor target areas**
- **Target short-term action:**
 - **TDM, operational & access, transit & walk-bike improvements, connect-the-dots links to private investment**
- **Complete the Networks!**

Getting started

It takes partners - and clear direction





Thank you

Harrison Rue
hrue@icfi.com
(919) 293-1647