ROCK HILL – FORT MILL AREA TRANSPORTATION STUDY (RFATS)

SCAPA
SUMMER CONFERENCE:
COLLECTOR ROAD PLAN
JUNE 21, 2019
PRESENTERS

David Hooper, AICP
RFATS Administrator

Roger Henderson, AICP, P.E.
Director of Planning, RKA
AGENDA

- PLANNING ENVIRONMENT OVERVIEW
- LAND USE / TRANSPORTATION
- COLLECTOR STREET PLAN
- QUESTIONS & DISCUSSION
SOCIO-ECONOMIC DATA: POPULATION

Population Percent Change 2015 - 2017

Population % Change by TAZ
- < 1%
- 1% - 15%
- 15% - 45%
- 45% - 75%
- >75%

2016 & 2017 Residential C.O.'s

0 1.5 3 6 Miles
SOCIO-ECONOMIC DATA: EMPLOYMENT

Employment Percent Change 2015 - 2017

Map showing employment changes by TAZ with color coding for percent change categories.
## Network Analysis: E+C Projects

<table>
<thead>
<tr>
<th>PROJECT</th>
<th>LIMITS</th>
<th>TYPE</th>
<th>E+C Projects</th>
<th>fund source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cel-River / Red River</td>
<td>0.1 miles north of S-645 to SC 122 (Dave Lyle Blvd)</td>
<td>Widen to 5 lanes</td>
<td>yes</td>
<td>Guidehare/P4</td>
</tr>
<tr>
<td>Fort Mill; SC 51</td>
<td>US 21 to North Carolina State Line</td>
<td>Widen to 5-lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Rock Hill; Mt. Gallant Rd S-195</td>
<td>SC 161 to Twin Lakes Rd</td>
<td>Widen to 3-lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Ft Mill; Springhill Farm Rd</td>
<td>US 21 to SC 51</td>
<td>Widen to 5-lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Fort Mill; SC 160</td>
<td>Fort Mill Northern Bypass to County Line</td>
<td>Widen to 3-lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>SC 557</td>
<td>Kingsbury to SC 49</td>
<td>Widen to 5 lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Fort Mill; US 21</td>
<td>Sutton Road to Northern Fort Mill Bypass</td>
<td>Widen to 5-lanes</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>Fort Mill; US 21</td>
<td>Northern Fort Mill Bypass to SC 51</td>
<td>Widen to 5-lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Rock Hill; Ebenezer Rd</td>
<td>SC 161 to Old Point Rd</td>
<td>Widen to 3-lanes</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>Fort Mill; Sutton Rd S-49</td>
<td>Harris Rd to SC 160</td>
<td>Widen to 3-lanes</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>S-133 (Pole Branch Rd)/SC274/279</td>
<td>SC 274 to Pole Branch Rd</td>
<td>Widen to 5-lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>SC 322 (McConnells Hwy)</td>
<td>Heckle to Falls</td>
<td>Widen to 3 lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>SC 72</td>
<td>SC 901 to Rambo Rd</td>
<td>Widen to 3 lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>SC 160</td>
<td>Gold Hill to State Line</td>
<td>Widen to 5 lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Fort Mill; Southern Bypass</td>
<td>SC 160 to Holbrook</td>
<td>Widen to 5 lane</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>Fort Mill; Sutton Rd S-49</td>
<td>Harris Rd to US 21</td>
<td>Widen to 3-lanes</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>Cel-River / Red River</td>
<td>US 21 to 0.1 miles north of S-645</td>
<td>Widen to 5 lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Tega Cay Connector</td>
<td>Gold Hill Road to Stonecrest</td>
<td>2 lanes on new location</td>
<td>yes</td>
<td>P2</td>
</tr>
<tr>
<td>Cel-River Road</td>
<td>SC 122 to US 21 (south of Dave Lyle towards Lancaster)</td>
<td>Widen to 3-lanes</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>SC 160</td>
<td>Rosemont Drive to Fort Mill N. Bypass</td>
<td>widen to 5-lanes</td>
<td>yes</td>
<td>Guidehare</td>
</tr>
<tr>
<td>SC 160 Widening</td>
<td>US 21 to Sutton Road</td>
<td>Widen to 6 lanes</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>S-133 (Pole Branch Rd)/SC274/279</td>
<td>Pole Branch Rd to NC line (NC 279 con)</td>
<td>Widen to 3-lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Fort Mill; Southern Bypass</td>
<td>Holbrook to US 21 Bus</td>
<td>Widen to 5 lane</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>Ebinport Rd</td>
<td>Cherry to India Hook</td>
<td>Widen to 3 lanes</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>Zoar Road extension</td>
<td>SC 160 to Gold Hill</td>
<td>New 2 lane</td>
<td>yes</td>
<td>P4</td>
</tr>
<tr>
<td>Riverview Road</td>
<td>Celenase to Eden Terrace</td>
<td>Widen to 3 lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
<tr>
<td>Mt Gallant Rd</td>
<td>Anderson to Dave Lyle</td>
<td>Widen to 3 lanes</td>
<td>yes</td>
<td>P3</td>
</tr>
</tbody>
</table>
MODELING PROJECTIONS

2015 Model

2045 Model
AGENDA

PLANNING ENVIRONMENT OVERVIEW

LAND USE / TRANSPORTATION

COLLECTOR STREET PLAN

QUESTIONS & DISCUSSION
Network Layers

- Arterial Roads
  - Higher Volumes
  - Longer Trip Lengths
  - Interstate Access

- Collector Roads
  - Lower Volume
  - Shorter Trips

- Local Roads
  - High Degree of Access
  - Lowest Level of Mobility
LAND USE / TRANSPORTATION

- Land Use Patterns
  - Undeveloped Parcels

- Development Review Process
  - Conditions & Priorities

- Transportation Network
  - Collector Street System

Reduce Long Term Traffic Congestion as Future Development Occurs
Meeting Multiple Goals: benefits traffic flow, bicycle and pedestrian safety, and overall network efficiency and functionality for all modes of travel.
LAND USE / TRANSPORTATION

LINK ADJACENT LAND USES

PROMOTE

Cross Access Agreements
Shared Driveways
Interconnected Parking Lots
On-Site Circulation

AVOID
COLLECTOR STREET PLAN

Developing a more complete functional network of connecting local roads to minor and major thoroughfares to reduce long term traffic congestion as additional development occurs.
Arterial (bones)

Collector (ligaments)

Local (tissue, meniscus)
COLLECTOR STREET PLAN

Plan Development

- Thorough Review of Existing Plans
- Evaluation of Regional Modeling Data & Assumptions
- Identified Environmental Features and Conflicts
- Conducted Field Visits
- Series of Public Outreach Meetings
- Prepared Network Maps reflecting
  - Existing
  - Planned
  - Potential Collector Streets

**Important to remember, illustrative links do not represent specific roadway alignments**
Reduced vehicular speeds

Altered driving behavior

Improved conditions for pedestrians and cyclists
Staff in each member agency should work in a collaborative and cooperative manner.
Use the plan as a means to preserve collector street corridors and communicate desired connectivity/local level supplements to developers as proposed development plans are submitted and reviewed.
Require developers to dedicate right-of-way for identified collector streets
Require new developments to ‘stub-out’ streets
Require new developments to ‘stub-out’ streets
Periodically review and amend the Collector Street Plan with new future collector street connections as they are identified during the development review process.
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