

RURAL LONG-RANGE TRANSPORTATION PLAN



June 2020

2040 RURAL
LRTP
2020



Acknowledgements

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SCDOT

BERKELEY County

CHARLESTON County

DORCHESTER County

Town of AWENDAW

Town of BONNEAU

Town of HARLEYVILLE

Town of HOLLYWOOD

Town of JAMESTOWN

Town of McCLELLANVILLE

Town of MEGGETT

Town of RAVENEL

Town of REEVESVILLE

Town of RIDGEVILLE

Town of ST GEORGE

Town of ST STEPHEN



Table of Contents

Chapter 1 | **INTRODUCTION** | Page 1

1.1	Purpose & Need	3
1.2	Development Process	3
1.3	Public Engagement	4
1.4	Vision Statement	5
1.5	Goals & Performance Measures	6

Chapter 2 | **PREVAILING CONDITIONS & NEEDS** | Page 9

2.1	Demographic Profile	10
2.2	Natural Environment & Socio-Economic Considerations	12
2.3	Roadway Network	21
2.4	Public Transit	22
2.5	Pedestrian & Bicycle Facilities	24
2.6	Freight Network	26
2.7	Issues by Municipality	28

Chapter 3 | **PROPOSED IMPROVEMENTS** | Page 41

3.1	Committed Projects	42
3.2	Visionary Projects	45

Chapter 4 | **PROJECT EVALUATION** | Page 53

4.1	Criteria	54
4.2	Scoring Process	55
4.3	Prioritization	58

Chapter 5 | **FUNDING & IMPLEMENTATION** | Page 64

5.1	Cost Estimation	65
5.2	Funding Sources	67
5.3	Fiscally-Constrained Projects	68

LIST OF MAPS

1.1	Chapter 1	Study Area	2
2.1	Chapter 2	Critical Sites & Parklands	14
2.2		Wetlands	16
2.3		Water Supply Resources	17
2.4		Cultural Resources	18
2.5		Environmental Justice	20
2.6		Transit System	23
2.7		Pedestrian & Bicycle Facilities	25
2.8		Freight Network	27
3.1	Chapter 3	Committed Projects	44
3.2		Visionary Projects	48
3.3		Visionary Projects in Berkeley County	49
3.4		Visionary Projects in Eastern Charleston County	50
3.5		Visionary Projects in Western Charleston County	51
3.6		Visionary Projects in Dorchester County	52
5.1	Chapter 5	Fiscally-Constrained Projects (Part I)	70
5.2		Fiscally-Constrained Projects (Part II)	71

LIST OF FIGURES

1.1	Chapter 1	Plan Development Process	3
2.1	Chapter 2	Population Profile	10
2.2		Employment Profile	11
2.3		Means of Travel to Work	11
2.4		Average Commute Time	12
2.5		Town of Awendaw Issues	29
2.6		Town of Bonneau Issues	30
2.7		Town of Harleyville Issues	31
2.8		Town of Hollywood Issues	32
2.9		Town of Jamestown Issues	33
2.10		Town of McClellanville Issues	34

2.11		Town of Meggett Issues	35
2.12		Town of Ravenel Issues	36
2.13		Town of Reevesville Issues	37
2.14		Town of Ridgeville Issues	38
2.15		Town of St. George Issues	39
2.16		Town of St. Stephen Issues	40

LIST OF TABLES

1.1	Chapter 1		National Goal Areas and Performance Measures	7
1.2			National Goal Areas and Performance Measures – Transit	8
2.1	Chapter 2		Demographic Growth	10
3.1	Chapter 3		Committed Projects	42
3.2			Visionary Projects	45
4.1	Chapter 4		Summary of Scoring Process	55
4.2			Evaluation Summary of Visionary Projects	59
4.3			Ranked Roadway Visionary Projects	61
4.4			Ranked Intersection Visionary Projects	62
4.5			Ranked Bike-Ped Visionary Projects	63
5.1	Chapter 5		Cost Estimates of Visionary Projects	65
5.2			Revenues and Distributions	68
5.3			Fiscally-Constrained Projects	69

LIST OF APPENDICES *(Separate Document)*

Appendix A-1		Public Engagement
Appendix A-2		Performance Measures
Appendix B-1		Rural Workforce Study
Appendix B-2		Bike-Ped Recommendations



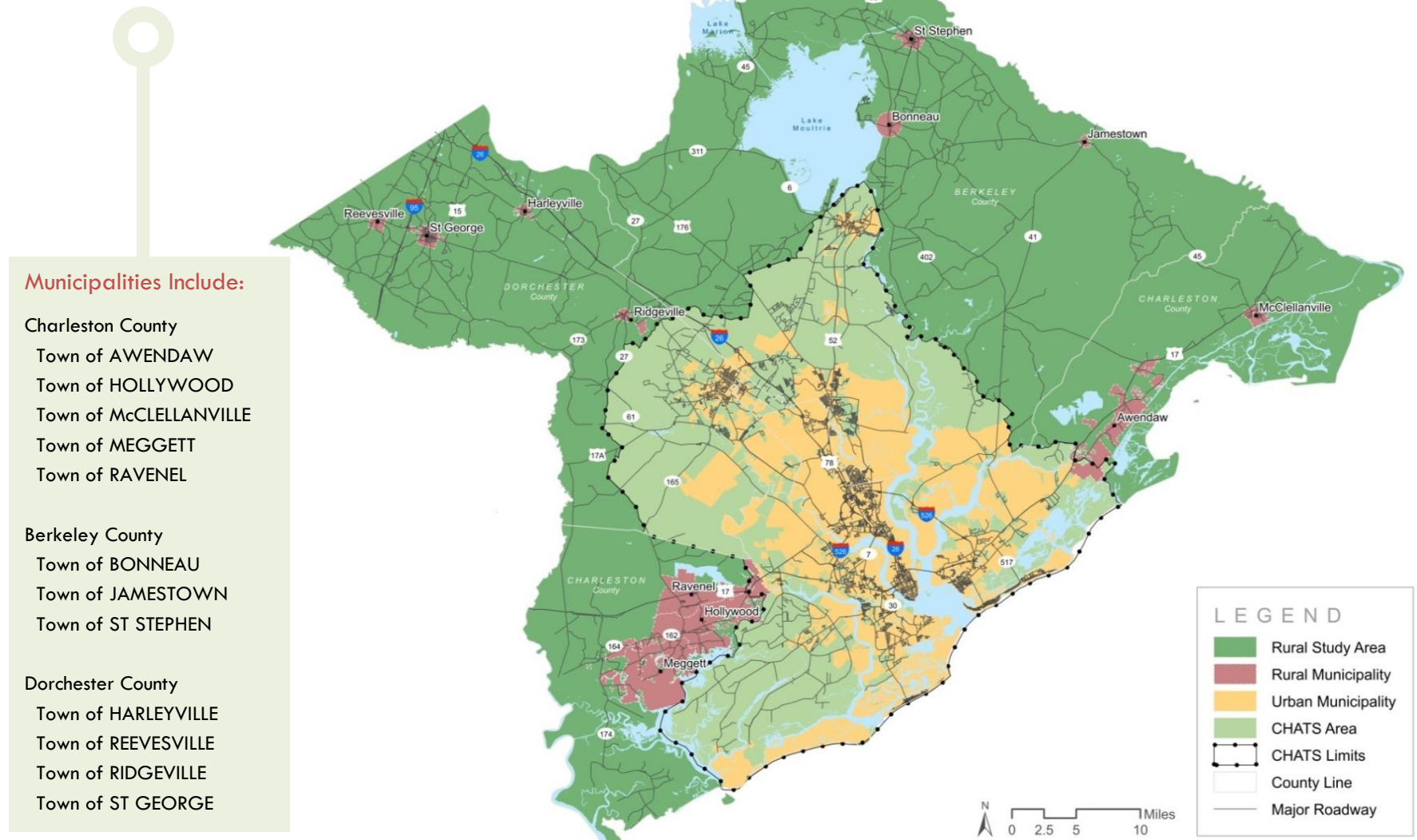
Introduction

CHAPTER 1

Purpose & Need
Development Process
Public Engagement
Vision Statement
Goals & Performance Measures

The Rural Long Range Transportation Plan (RLRTP) establishes the overarching vision of the future of transportation in the rural areas of the Berkeley-Charleston-Dorchester (BCD) region. It is a comprehensive transportation planning document that guides investment in rural transportation infrastructure by allocating projected revenue to potential improvements over at least a 20-year timeframe. This workbook summarizes the RLRTP development process and project recommendations resulting from that process. [Map 1.1](#) presents the study area of the RLRTP encompassing its 12 rural municipalities and other unincorporated rural communities.

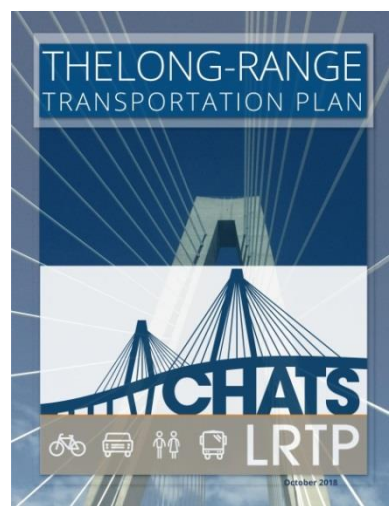
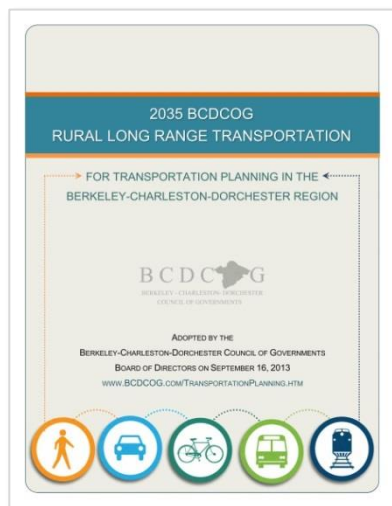
Map 1.1 – Study Area



1.1 Purpose & Need

The RL RTP (“the Plan”) is prepared to assess current transportation challenges and identify critical future needs through the development of multimodal strategies and projects. The State of South Carolina requires the Plan to be updated every five years for a specific horizon year. The Berkeley-Charleston-Dorchester Council of Governments (BCDCOG) is the designated nodal agency for preparing the Plan and is responsible for planning for forecasted conditions in the rural areas of the tri-county region between now and Year 2040.

The 2040 RL RTP is also developed to complement the urban area comprehensive transportation plan: the 2040 Charleston Area Transportation Study Long Range Transportation Plan (CHATS L RTP) adopted in January 2019. In an effort to ensure investment decisions are informed and key outcomes related to its unique goals are met, BCDCOG also has a mandate to coordinate and bring together key stakeholders during the development process of the Plan. The previous update of the RL RTP representing horizon year 2035 conditions was completed and adopted in fall 2013.



1.2 Development Process



Figure 1.1 – Development Process

To remain consistent with the previous update effort and the 2040 CHATS L RTP, the rural long range transportation planning process was modeled after a 5-step development approach (see flowchart in Figure 1.1). Public involvement/input marked the critical component of this approach. Other key players who were engaged in this process included: BCDCOG Rural Transportation Study Committee, BCDCOG Full Board, South Carolina Department of Transportation (SCDOT), member jurisdictions including rural municipalities, and local transportation professionals. Relevant transportation issues and needs were identified through this process followed by a set of directions and recommendations that ultimately shaped the final Plan.

Performance-Based Planning & Programming (PBPP): PBPP is a strategic approach that facilitates system data to inform investment and policy decisions, as well as to achieve goals prescribed for a region’s multimodal transportation system. It is a federally-mandated requirement that PBPP, as a standard state-of-the-practice be applied in the planning and programming processes including the development of the RL RTP. The goal of PBPP is to ensure efficient investment of federal

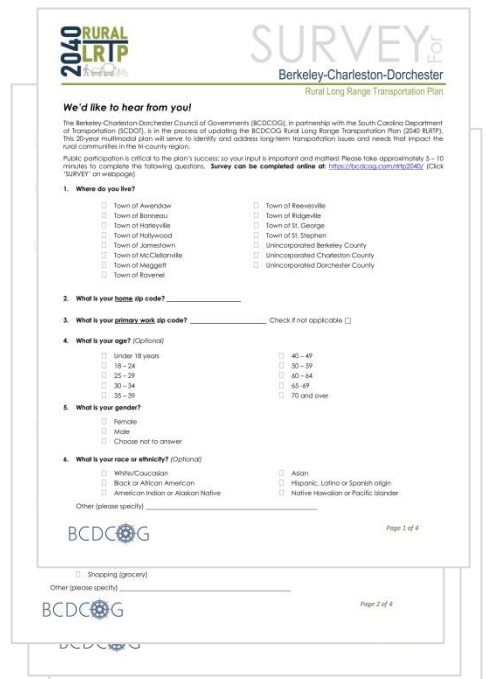
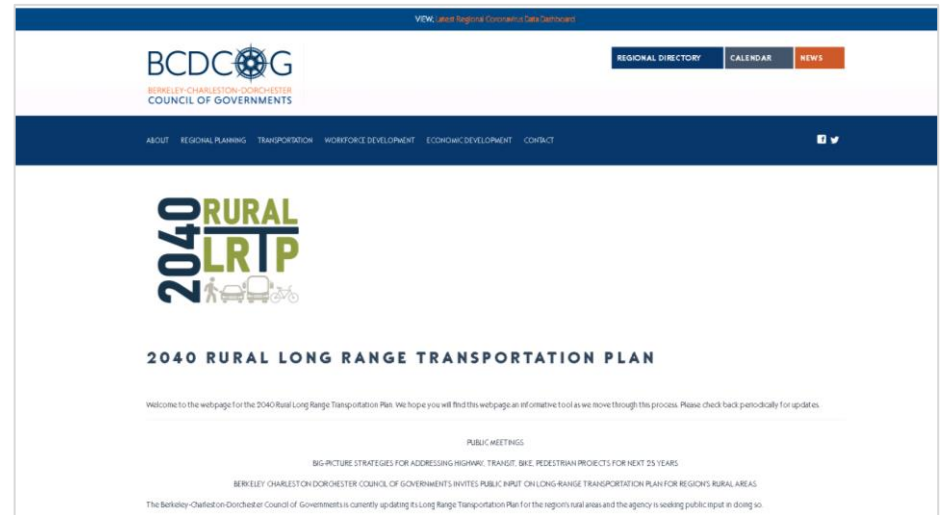
transportation funds by increasing accountability and transparency to the public, and facilitate investment decisions that focus on advancing key outcomes related to established national goals using performance measures. The Goals & Performance Measures in [Table 1.1](#) under Section 1.5 describes them by area and specific performance measure in greater detail.

1.3 Public Engagement

BCDCOG recognizes that public involvement is key to the overall success of any holistic transportation planning process. Participation efforts were guided in part by the CHATS MPO Public Participation Plan (PPP) which provides a framework to ensure early and ongoing public involvement in the development of transportation plans. It offers adequate opportunities for the public to express its views on transportation issues and become active participants in the decision-making process. BCDCOG employed diverse outreach strategies to ensure maximum participation and inputs from the general public. They included public meetings, public survey, one-on-one stakeholder interviews, and public outreach through electronic and print media.

The project team organized four open-house style public meetings at centrally-located venues spread across the three member counties with Charleston County hosting two meetings given that its rural geography is bifurcated by Charleston metropolitan area. BCDCOG advertised the meetings in close coordination with counties and local municipalities early in the Plan development process. Each 4-hour meeting comprised of visuals in the form of maps and infographics manned by a member of the BCDCOG Planning Services staff. The attendees had the opportunity to voice their mobility concerns and challenges and also offer insights in to potential remedial measures. Additional

information on public engagement efforts and public survey results are summarized in [Appendix A-1](#).



1.4 Vision Statement

The overarching vision of this Plan and its underlying premise remain consistent with the previous plan. However, it was important to acknowledge the changing conditions and preferences of the region since the last update. Accordingly, the BCDCOG Rural Transportation Study Committee recommended modifications to the verbiage of the vision statement to account for those changes.

BCDCOG and its stakeholders envision that the future of transportation in rural areas should:

“Focus on enhancing and maintaining the quality of life and economic vitality of the rural Berkeley-Charleston-Dorchester region, and accomplishing this by ensuring accessibility and mobility needs of all users and goods through providing an efficient, effective, safe, and holistic transportation system that minimizes impacts on the natural environment”



1.5 Goals & Performance Measures

As in the previous plan, inputs from the Rural Transportation Study Committee members help shape five primary goals (shown on the right side) from a broad list of general project objectives as following:

- Develop a **compatible** plan
 - Improve roadway **safety**
 - Recognize **mobility** needs
 - Provide **convenient** and efficient connections
- Enhance **efficiency** of existing system
 - Support **mixed-use** development
 - Promote a **pedestrian-friendly** environment
- Provide and plan for future **transit** service expansion
 - Protect and reserve **rights-of-way**
 - Build consensus and identify **funding** sources
 - Enhance “**quality of life**”

GOAL 1

Provide Accessibility and Mobility

GOAL 2

Facilitate Economic Vitality

GOAL 3

Protect Environment

GOAL 4

Maintain Existing Transportation Network

GOAL 5

Enhance Transportation Safety

Table 1.1 – National Goal Areas and Performance Measures

NATIONAL GOAL AREA	Performance Area	Performance Measure
<p>SAFETY To achieve a significant reduction in traffic fatalities and serious injuries on all public roads</p>	Injuries and Fatalities	Number of Fatalities Fatality rate (per 100 million VMT) Number of serious injuries Number of non-motorized fatalities and non-motorized serious injuries
<p>INFRASTRUCTURE CONDITION To maintain the highway infrastructure asset system in a state of goods repair</p>	Pavement Condition	Percent of pavements on the Interstate System in Good Condition Percent of pavements on the Interstate System in Poor Condition Percent of pavements on the non-Interstate System in Good Condition Percent of pavements on the non-Interstate System in Poor Condition
	Bridge Condition	Percent of NHS bridges classified as in Good Condition Percent of NHS bridges classified as in Poor Condition
<p>SYSTEM RELIABILITY To improve the efficiency of the surface transportation system</p>	Performance of the National Highway System	Percent of person miles traveled on the Interstate System that are reliable Percent of person miles traveled on the non-Interstate NHS that are reliable
<p>FREIGHT MOVEMENT AND ECONOMIC VITALITY To improve the National Highway Freight Network, strengthen the ability of rural communities to access national and international trade markets, and support regional economic development</p>	Freight Movement on the Interstate System	Truck Travel Time Reliability
<p>CONGESTION REDUCTION To achieve a significant reduction in congestion on the Highway System</p>	Traffic Congestion	Annual hours of peak-hour excessive delay per capita Percent of non-single-occupant vehicle traffic
<p>ENVIRONMENTAL SUSTAINABILITY To enhance the performance of the transportation system while protecting and enhancing the natural environment</p>	On-Road Mobile Source Emissions*	Total emissions reduction*

The Federal Highway Administration (FHWA) requires state DOTs and MPOs to monitor the transportation system using specific performance measures. The measures highlighted in [Table 1.1](#) are associated with the national goal areas prescribed in MAP-21 and the FAST Act, and also reflected in the State Multi-Modal Transportation Plan. BCDCOG is at liberty to adopt additional measures as long as measures outlined below are addressed at a minimum.

**This measure only applies to non-attainment or maintenance areas over a prescribed population threshold. It does not apply to the BCDCOG region since the area is an attainment area.*

Table 1.2 – National Goal Areas and Performance Measures – Transit

NATIONAL GOAL AREA	Transit Performance Area/Asset Category	Performance Measure
SAFETY	Fatalities	Total number of reportable fatalities and rate per total vehicle revenue miles by mode
	Injuries	Total number of reportable injuries and rate per total vehicle revenue miles by mode
	Safety Events	Total number of reportable events and rate per total vehicle revenue miles by mode
	System Reliability	Mean distance between major mechanical failures by mode
INFRASTRUCTURE CONDITION (State of Good Repair: Transit Asset Management)	Equipment	Percent of vehicles that have met or exceeded their Useful Life Benchmark (ULB)
	Rolling Stock	Percent of revenue vehicles within a particular asset class that have met or exceeded their ULB
	Facilities	Percent of facilities within an asset class rated below 3.0 on the FTA Transit Economic Requirement Model scale

In addition to the preceding performance measures, recipients of transit funds are required to establish performance targets for transit safety and infrastructure condition (state of good repair); to develop transit asset management and transit safety plans; and to report on their progress toward achieving targets. These recipients include public transportation operators/providers and fund administrators at the state and local level. Public transportation operators are directed to share information with the MPOs/COGs and states in an effort to coordinate plans and performance reports. [Table 1.2](#) identifies transit-specific performance measures outlined in the National Public Safety Transportation Plan, released by the Federal Transit Administration (FTA) and in the final rule for transit asset management. BCDCOG coordinates with public transit providers to set targets for these measures. [Appendix A-2](#) provides additional description on specific performance measures and targets.



Prevailing Conditions & Needs

CHAPTER 2

Demographic Profile
Natural Environment &
Socio-Economic Considerations
Roadway Network
Public Transit
Pedestrian & Bicycle Facilities
Freight Network

2.1 Demographic Profile

General Population: The rural study area accounts for 11% of the total population in the tri-county region (See Figure 2.1), and similar to its urban counterpart, the rural portion of the region is steadily growing. In Year 2018, the total rural population was nearly 81,300 persons - nearly 10% increase from eight years ago as shown in Table 2.1. The number of rural households during the same period also grew from 27,910 units to 30,802 units. Despite this correlation, the observed rates of population and household growths were uneven across several municipalities. For example, the towns of Ravenel, Hollywood, and Ridgeville exhibited significantly higher rates of household growth compared to population growth, while population growth in the towns of Reevesville and Harleyville far exceeded household growth. Although the rates varied, almost all of the municipalities exhibited at least some amount of positive growth in either or both categories. Of the 12 municipalities in the rural study area, per the US Census data, the Town of McClellanville in Charleston County was the only one to experience a population decrease of 4.2% between years 2010 and 2018.

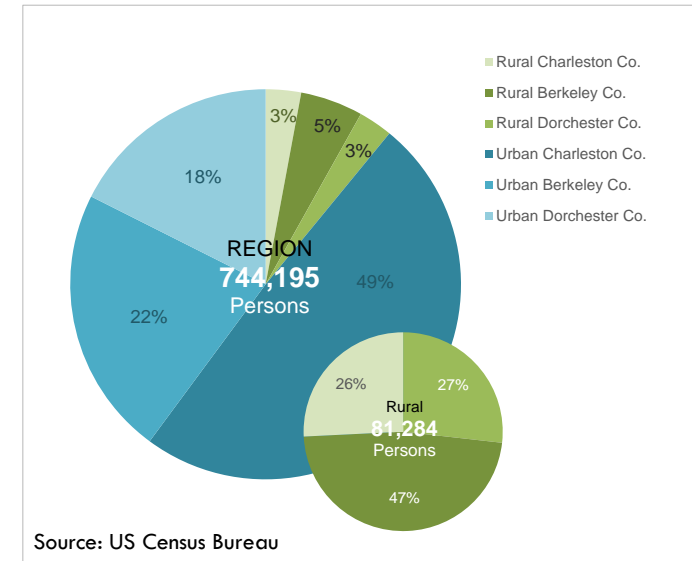


Table 2.1 – Demographic Growth

TOWN	Land Area (Sq. Mile)	YEAR 2010				YEAR 2017-18				Percent Growth	
		Population	Households	Pop Density	HH Density	Population	Households	Pop Density	HH Density	Population	Households
CHARLESTON COUNTY											
Awendaw	9.47	1,294	535	136.6	56.5	1,298	547	137.1	57.8	0.3%	2.2%
Hollywood	23.13	4,714	2,032	203.8	87.9	5,083	2,645	219.8	114.4	7.8%	30.2%
Meggett	17.85	1,226	636	68.7	35.6	1,241	656	69.5	36.8	1.2%	3.1%
Ravenel	12.64	2,465	1,006	195.0	79.6	2,620	1,214	207.3	96.0	6.3%	20.7%
McClellanville	2.24	499	318	222.8	142.0	478	278	213.4	124.1	-4.2%	-12.6%
Incorporated	65.33	10,198	4,527	156.1	69.3	10,720	5,340	164.1	81.7	5.1%	18.0%
Unincorporated	497.89	9,197	3,089	18.5	6.2	11,049	3,213	22.2	6.5	20.1%	4.0%
BERKELEY COUNTY											
Bonneau	3.01	487	215	161.8	71.4	667	296	221.6	98.3	37.0%	37.7%
Jamestown	0.61	72	48	118.0	78.7	82	57	134.4	93.4	13.9%	18.8%
St Stephen	2.39	1,697	762	710.0	318.8	1,872	784	783.3	328.0	10.3%	2.9%
Incorporated	6.01	2,256	1,025	375.4	170.5	2,621	1,137	436.1	189.2	16.2%	10.9%
Unincorporated	931.32	32,473	12,036	34.9	12.9	35,938	13,459	38.6	14.5	10.7%	11.8%
DORCHESTER COUNTY											
Harleyville	1.15	677	316	588.7	274.8	815	335	708.7	291.3	20.4%	6.0%
Reevesville	1.61	196	102	121.7	63.4	230	105	142.9	65.2	17.3%	2.9%
Ridgeville	1.8	1,979	241	1099.4	133.9	2,154	319	1196.7	177.2	8.8%	32.4%
St George	2.7	2,084	883	771.9	327.0	2,335	966	864.8	357.8	12.0%	9.4%
Incorporated	7.26	4,936	1,542	679.9	212.4	5,534	1,725	762.3	237.6	12.1%	11.9%
Unincorporated	394.54	14,948	5,691	37.9	14.4	15,422	5,928	39.1	15.0	3.2%	4.2%
RURAL Total	1,902.35	74,008	27,910	-	-	81,284	30,802	-	-	9.8%	10.4%

Figure 2.1 – Population Profile

Employment: For the purposes of this report, employment is classified in to four main types: office, retail, service, and industrial. Service and industrial jobs are the most common types of employment in rural areas (incorporated) together accounting for 68% of the rural population’s workforce.

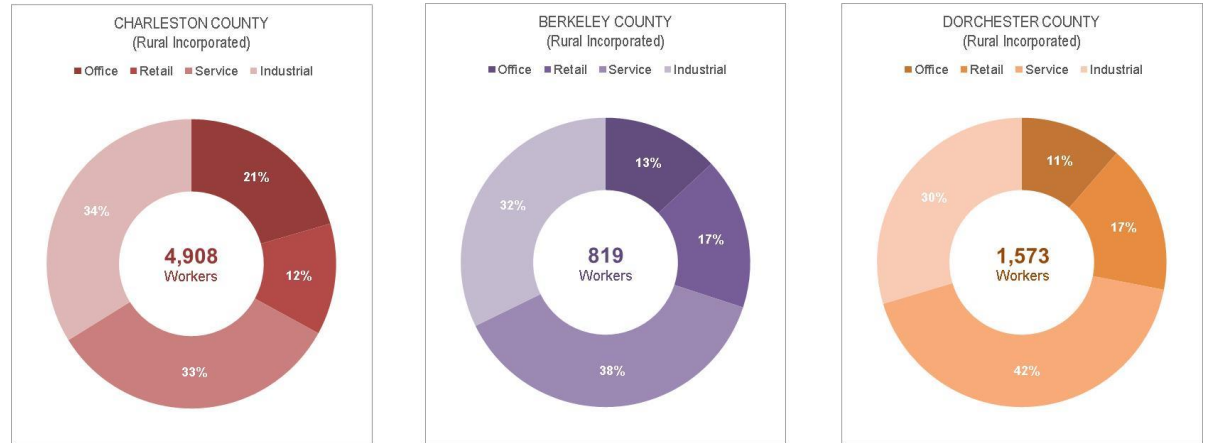


Figure 2.2 – Employment Profile

Mode of Travel: To travel to jobs, workers from the rural study area drive alone, car pool, use public transit, walk, or bike. As is the case with the CHATS urban area, the rural area is extremely car-dependent. Approximately 96% of workers either drive alone or carpool to work, making the automobile the predominant mode of transportation for commuting. Only 1% of workers walk to work, and even less (0.3%) use Tri-County Link, the rural public transit service provider.

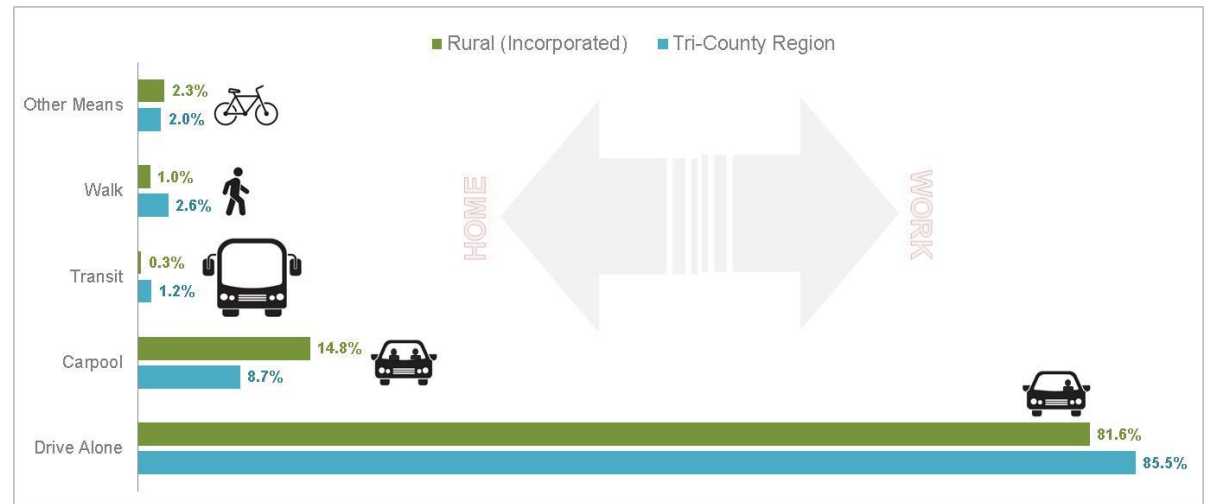


Figure 2.3 – Means of Travel to Work

Commute Time: On average, the travel time to work for individuals in the rural study area is 32.1 minutes, which is approximately six minutes longer than the average commute time for the entire tri-county region.

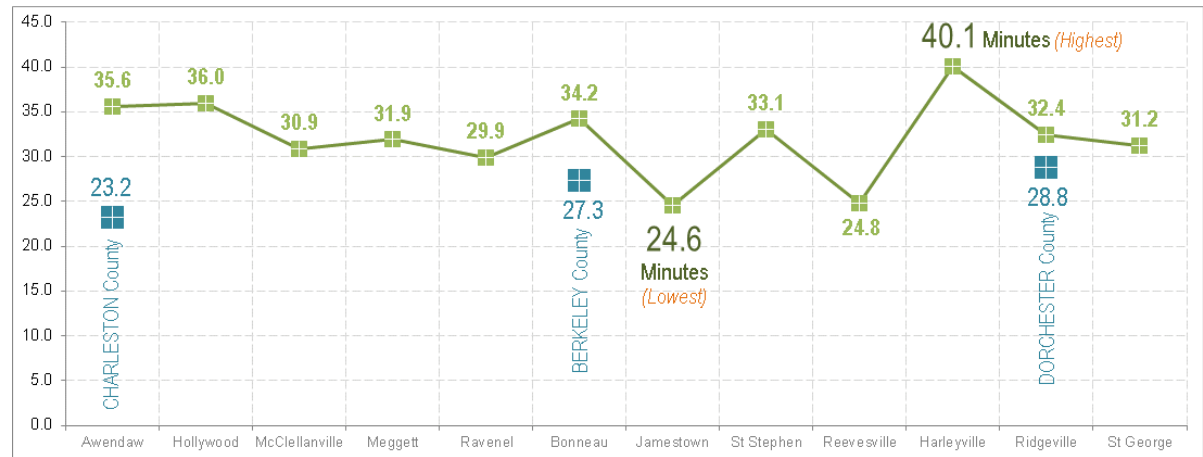


Figure 2.4 – Average Commute Time

Vulnerable Population: Typically, the rural areas have higher concentrations of vulnerable populations than urbanized areas, and this holds true in the rural tri-county area. Although the definition of vulnerable populations may carry different interpretations, this report uses the term to refer to economically disadvantaged and racial/ethnic minority populations. Census data reflects that there are significant demographic disparities between inhabitants of the rural study area and the CHATS region in terms of income, educational attainment, and minority concentrations. Recent data from the American Community Survey (ACS) shows that, on average, the rural study area population is less-educated with lower income households. In the CHATS region, 38% of the population holds a bachelor’s degree or higher compared to only 16% in the rural study area.

Similarly, the median household income in the CHATS region is \$62,966 compared to \$50,543 in the rural study area. Eighteen percent (18%) of the rural study area population is below the poverty line compared to 13% in the CHATS area. Additionally, there are more minority residents in the rural study area, altogether representing 49% of the area’s population compared to 33% in the CHATS area. These types of distinctions play an important role in evaluating the environmental justice component of potential transportation improvement projects. Given the demographics of the rural study area, transportation projects and the burdens associated with their implementation are more likely to have greater environmental justice implications than they would within the region’s urban core.

2.2 Natural Environment & Socio-Economic Considerations

Considerations for the natural, cultural and socioeconomic environment are inherently important to transportation planning. This section highlights notable natural and cultural resources, areas of environmental concern and environmental justice populations in the study area.

Natural Resources: The rural areas of the tri-county region are home to an abundance of valuable natural resources, both on land and in water. Dense forests and human habitats are marked by blackwater creeks as they flow towards tidal creeks and coastal marshes before merging in to local rivers. These ecosystems sustain a number of plant and animal species in addition to serving as major sources of drinking water for the greater Charleston area. They also provide several opportunities for recreation such as boating, fishing, hiking, and camping.

Endangered Species and Critical Habitats: The Endangered Species Act provides for the protection of species that are threatened or at risk of extinction. These protections are applicable to a plant or animal; or the ecosystem it depends on. According to the U.S. Fish and Wildlife Service (USFWS), there are currently 36 threatened or endangered species listed in South Carolina. Of those, there are several species (or their critical habitats) located in the study area. Two examples are the Frosted Flatwoods Salamander (*Ambystoma cingulatum*) and Piping Plover (*Charadrius melodus*).

In addition to the habitat protections offered by the USFWS, Department of Health & Environmental Control's (DHEC) Ocean and Coastal Resource Management has identified certain coastal habitats that are subject to additional regulatory oversight. These critical areas include coastal waters, tidelines, and beach/dune systems that provide necessary habitat for both terrestrial and aquatic species as illustrated in [Map 2.1](#).

Parks and Refuges: Lake Moultrie and the Santee National Wildlife Refuge in Berkeley County, the Frances Beidler Forest and Givhans Ferry State Park along the Edisto River in Dorchester County, the Frances Marion National Forest which spans both Berkeley and Charleston County, and the Cape Romain National Wildlife Refuge in Charleston County are a few examples of public protected lands. Considered a haven for flora and fauna,

some of these natural preserves also shown in [Map 2.1](#) also serve as hubs for various types of recreational activities during different seasons.



Frosted Flatwoods Salamander

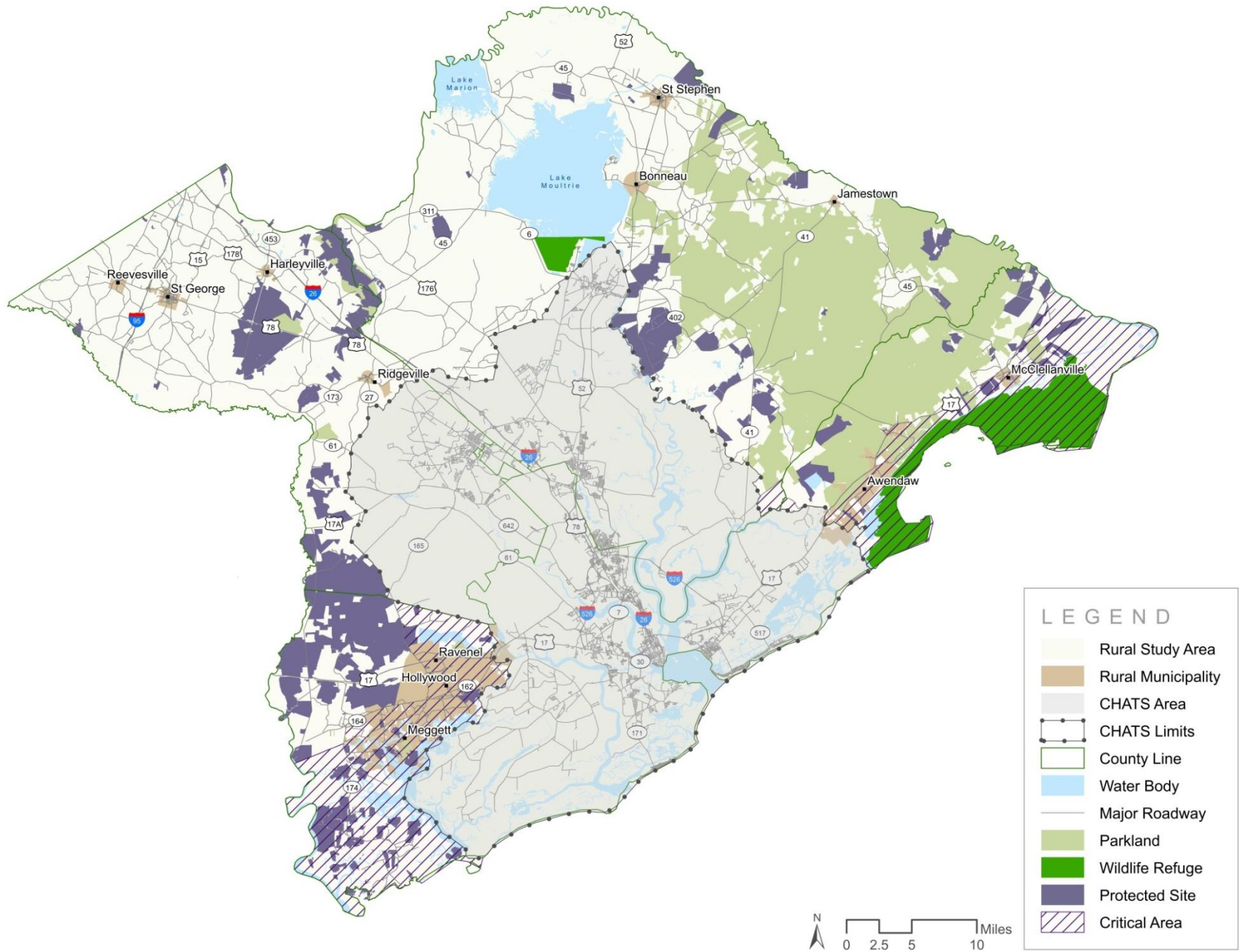
Source: South Carolina Wildlife Federation



Piping Plover

Source: National Audubon Society

Map 2.1 – Critical Sites and Parklands



Wetlands and Water Supply Resources: Wetlands, streams, and swamps are prevalent throughout the landscape of the study area as represented in [Map 2.2](#). These wetland and stream corridors provide not only important habitat for plant and wildlife species (terrestrial and aquatic), but also serve a critical role in protecting water quality by filtering out pollutants, storing, and dissipating floodwaters, and recharging groundwater sources. Salt marsh and tidal creeks provide vital habitat and shelter for shorebirds, waterfowl and wading birds, land and water-dwelling mammals, reptiles, and amphibians. Aside from the environmental value of these natural features, they are also an asset to the region in terms of recreational opportunity and tourism and economic benefit.

Local water features include the Edisto River, Lake Marion, Lake Moultrie, the upper branches of the Cooper River, the Intracoastal Waterway, and the Santee River. A portion of the Edisto River that lies within Dorchester County is designated as Source Water Protection Area by the South Carolina Department of Health and Environmental Control (DHEC). This designation results from the Safe Water Drinking Act and focuses on pollution prevention and protection for drinking water supplies.

Both the Edisto River and the Bushy Park Reservoir serve as drinking water sources for the Charleston Water System, which serves customers in all three counties. Additionally, Lake Moultrie is designated as a Source Water Protection area, and is also utilized for power generation and recreation. DHEC has mapped numerous water supply wells within the rural planning area that provide drinking water for both residential and commercial users. These critical water resources are shown in [Map 2.3](#).

Cultural Resources: The Lowcountry of South Carolina as a region, including the rural study area, is abundant in cultural and historic resources that date back hundreds of years. Archaeology sites (unrestricted), natural heritage areas, and historic properties

on the National Register illustrated in [Map 2.4](#) are all sites of interest that are evaluated during the transportation planning process. Utilizing existing resources to identify notable historic and heritage areas of interest is beneficial and special attention and emphasis must be given to these areas prior to allowing any development in the vicinity.

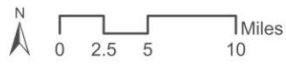
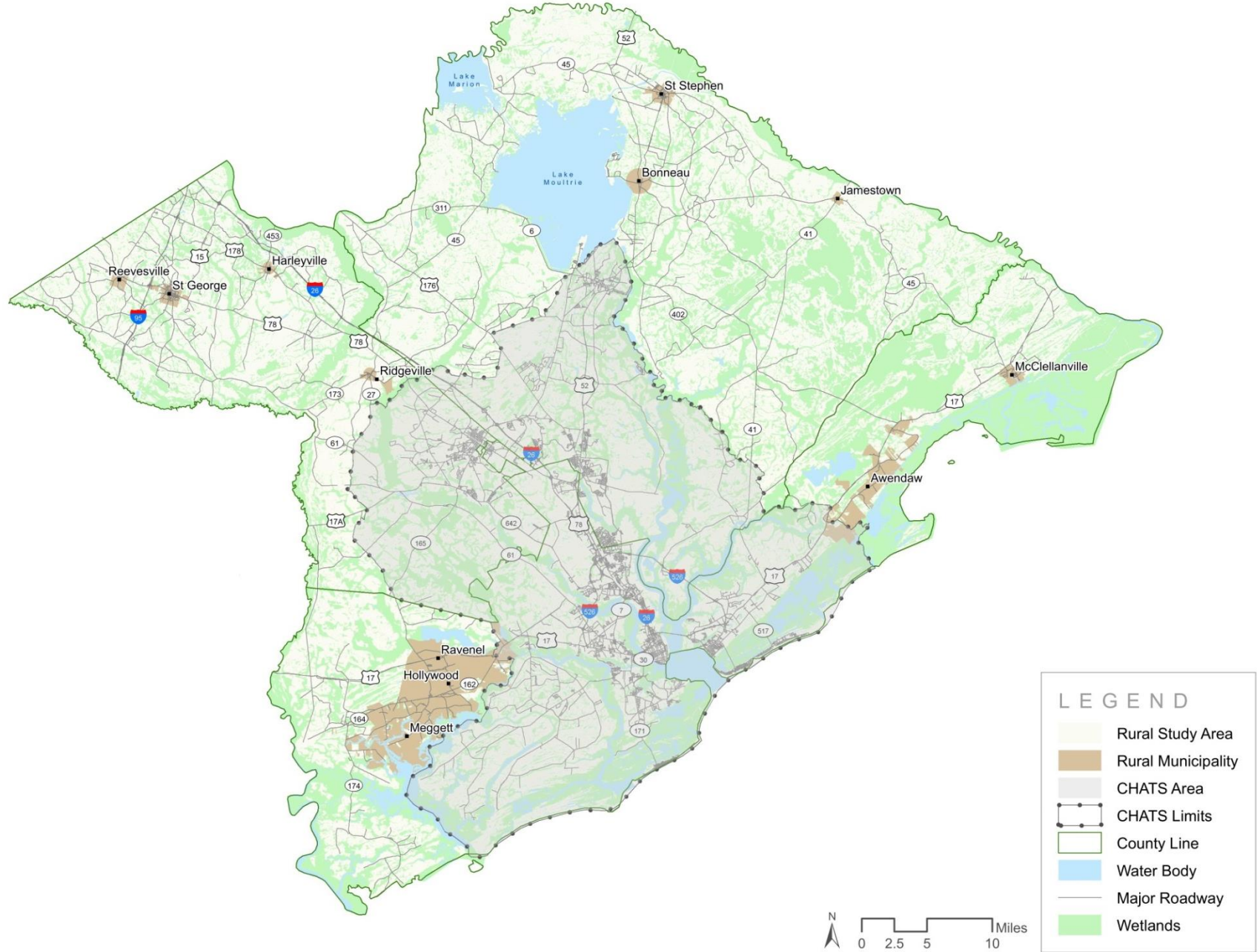


Source: South Carolina Historic Properties Record

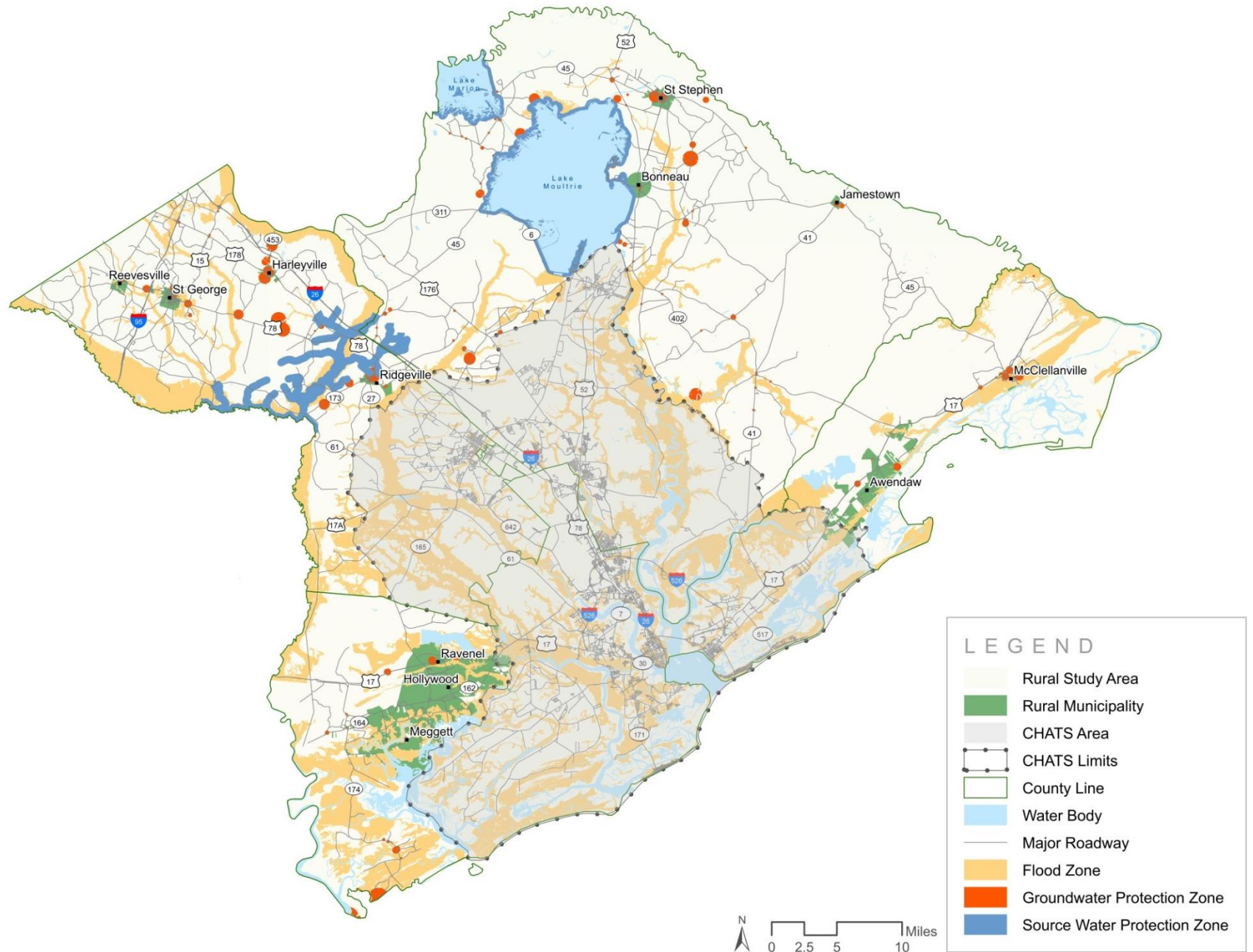


Source: College of Charleston at Stono Preserve

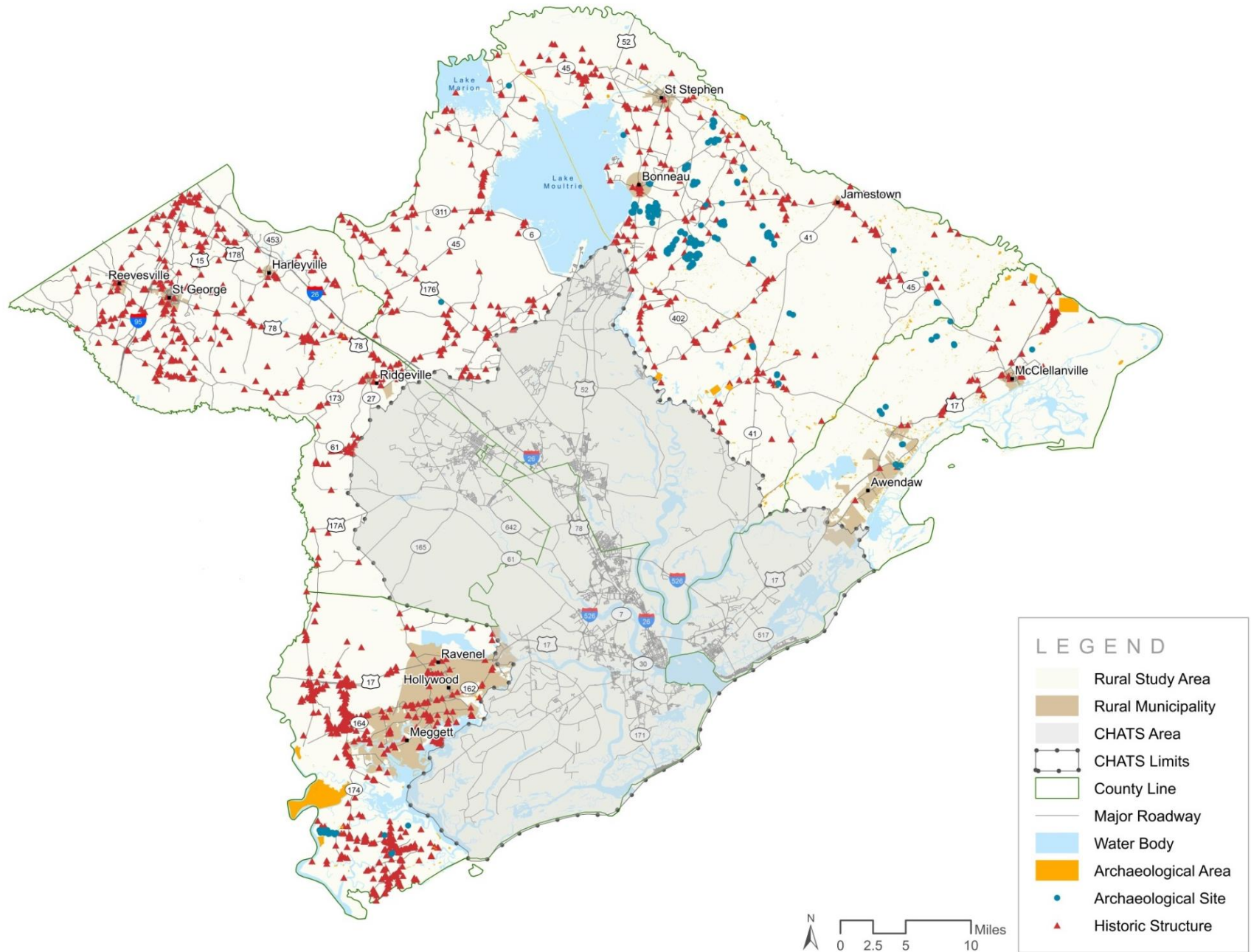
Map 2.2 – Wetlands



Map 2.3 – Water Supply Resources



Map 2.4 – Cultural Resources



Environmental Justice: Environmental justice refers to the fair treatment and meaningful involvement of all people, no matter their race, ethnicity, income or education level. Evaluating environmental justice is a federally-mandated component of developing a transportation plan (Executive Order 12898, February 11, 1994). It means that minority and low-income populations should not be forced to bear a disproportionate burden of the potential impacts, whether environmental, social or economic, resulting from transportation programs, policies and projects. It also means that those same populations should realize an equitable distribution of the benefits from transportation projects.

There are three fundamental principles at the core of environmental justice identified by the Federal Highway Administration (FHWA):

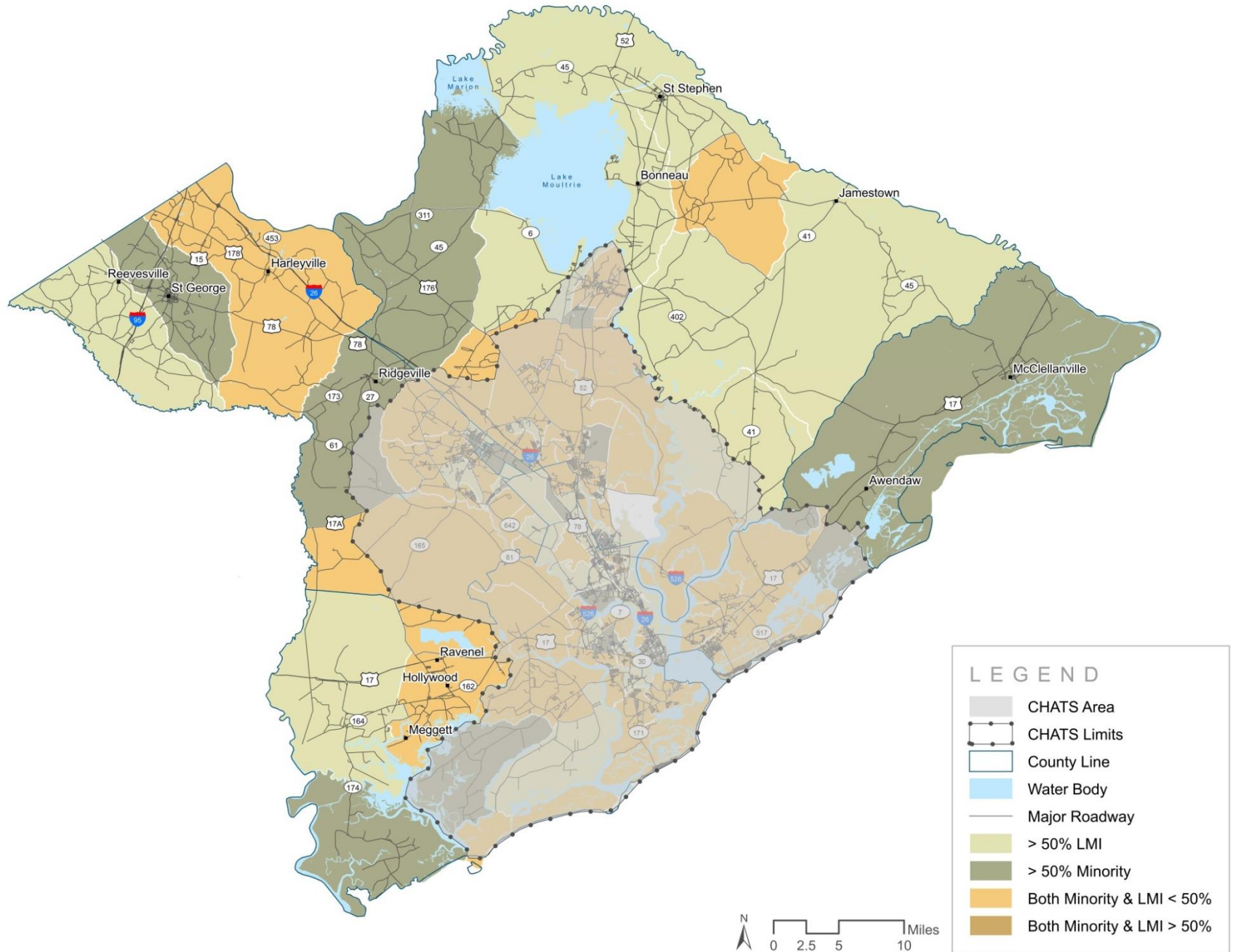
1. To avoid, minimize, or mitigate disproportionately high and adverse human health and environmental effects, including social and economic effects, on minority populations and low-income populations;
2. To ensure the full and fair participation by all potentially affected communities in the transportation decision-making process; and
3. To prevent the denial of, reduction in, or significant delay in the receipt of benefits by minority and low-income populations.

Map 2.5 displays population densities of minority and low-moderate income groups across the study area. The most-recent US Census estimates were used to generate the location, concentration, and geographical distribution of the two disadvantaged groups. This Plan recognizes the negative effects of potential transportation projects on these sensitive neighborhoods and care was taken to ensure accurate datasets were incorporated early in the project evaluation process.

CHALLENGES & OPPORTUNITIES: As the rural areas grow and develop, additional stress is expected on the natural environment's resources and ecosystems. Any lacunae in controlling the destruction and degradation of natural habitats as a consequence of human activities such as clearing of forests in support of development, fragmentation of habitats resulting from expansion of developments and extension of road corridors, and introduction of invasive plants and animals will lead to decline in the number of species and their biodiversity. Indirect impacts from storm-water run-off that washes pollutants from yards, roads, and parking lots, also can have unintended consequences for natural habitats and their inhabitants. In addition, developments have the potential to be detrimental to social environment, natural history, and heritage and cultural sites that dot the tri-county region.

For these reasons, coordination among appropriate agencies takes precedence during transportation planning process. Impacts from transportation projects irrespective of location, scale, and magnitude must be evaluated comprehensively in an environmental impact analysis/study. Existing resources must be leveraged to identify sensitive and vulnerable areas and seek ways to avoid, minimize or mitigate adverse effects of transportation projects.

Map 2.5 – Environmental Justice



2.3 Roadway Network

The study area is served by two Interstates (I-26 and I-95) and an extensive system of US and State highways, many of which are four-lane facilities, and local roads. Roads in the region are owned and/or maintained by one of the following: South Carolina Department of Transportation (SCDOT); Department of Public Works from Berkeley County, Charleston County, and Dorchester County; municipalities; private developers, and individuals. In addition, numerous roads are the responsibility of the federal government and the US Forest Service.

Generally, the existing roadway network across the rural study area provides adequate connectivity and regional access. However, several corridors are in need of upgrades due to lack of maintenance and/or poor design. Major roads provide regional access and serve as the backbone of the overall network; however, there are many key local roads within the rural municipalities that are just as critical to the mobility of residents within and between rural communities. Many of these smaller, less-congested roads have been neglected due to



inadequate funding and are candidates for much-needed improvements and potential design upgrades.



CHALLENGES & OPPORTUNITIES: Concerns about existing conditions of roadways and intersections as expressed by individual municipalities focused predominantly on inadequate upkeep of pavement and unsafe traffic conditions. Highways and other major arterials passing through town centers are known to experience vehicles speeding due to lack of traffic control and regular enforcement; heavy truck movements owing to the presence of cement and timber industries; and cut-through seasonal traffic destined especially towards beaches. Local intersections were highlighted to have poor design geometrics such as inadequate turning radius and line of sight, and absence of caution light or traffic signal. The RL RTP process facilitates opportunities to examine these localized problem areas and bring them to the fore for stakeholders especially counties to acknowledge and address these issues through potential low-cost and quick-to-implement measures and improvements.

2.4 Public Transit

TriCounty Link (TCL) managed by the Berkeley-Charleston-Dorchester Rural Transportation Management Association is the public transit service provider for the rural areas. It offers two types of services: deviated fixed route and commuter route. TCL's urban counterpart: the Charleston Area Regional Transportation Authority (CARTA) primarily serving the urban core of the CHATS planning area with fixed route, commuter bus, and paratransit services allows for some transfer options between the two providers at certain transit stops. [Map 2.6](#) presents the public transit system available in the tri-county area.

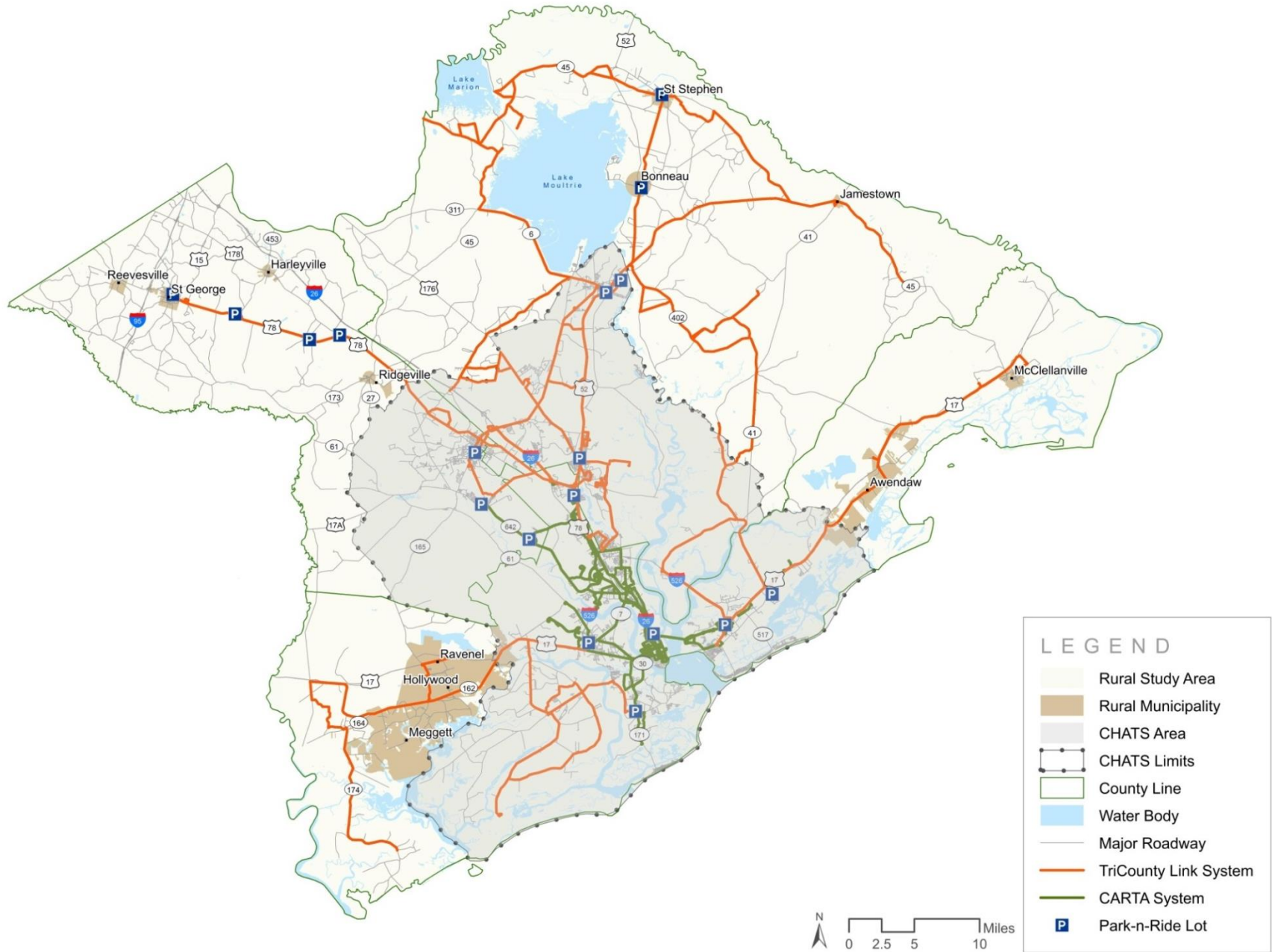


The TriCounty Link system is comprised of nine deviated fixed routes and nine commuter routes. The deviated fixed routes follow a published schedule and operate as a “flag-stop” service, picking up customers between the scheduled stops along the fixed routes. Each route also offers a route deviation option that allows the driver to go off the route up to $\frac{3}{4}$ -mile to pick up customers that cannot meet the bus at designated stop locations. This is primarily a pre-scheduled curb-to-curb service, which allows TCL to meet Americans with Disabilities Act (ADA) requirements,

although the deviation option is useful in the lower-density context of the large service area that TriCounty Link covers. Its commuter express routes operate between a network of park-and-ride lots and other key points throughout the service area and also interface with CARTA services at coordinated transfer locations. It has a transfer agreement with CARTA, with a payment required only when transferring from CARTA to TCL services. There is no fare when transferring from TCL to CARTA.

CHALLENGES & OPPORTUNITIES: It is observed that population outside the Charleston metropolitan area is not growing as densely. As a result, counties have population densities that do not readily support traditional fixed-route services consistently throughout. Although, TCL provides several municipalities with direct transit service with at least one morning and one afternoon inbound/ outbound trip, lack of options and facilities remains a major complaint among residents and town officials alike. Transit-dependent members of the community depend on friends and neighbors to meet their critical mobility needs such as visiting a health care practitioner or hospital. Rural residents also rely on health care provider's transportation options to fill medical trips to facilities in far-flung municipalities. Town of St. George in Dorchester County expressed a dire requirement for some form of localized transit option since a large proportion (nearly 60%) of the populace belongs to low-income group with low auto ownership. In an effort to improve transit service to rural municipalities such as St. George, BCDCOG and other entities have kick-started several planning initiatives pertaining to transit. These initiatives focus on the potential to consolidate CARTA and TCL in to a unified system, recommend near-term and long-term solutions for optimizing TCL service, develop a framework of transit solutions to address diverse transit environment in the region, and provide a regional strategy focused on improving access to job skills training and employment for the rural workforce in the tri-county region. (See [Appendix B-1](#) for additional information)

Map 2.6 – Transit System



2.5 Pedestrian & Bike Facilities

Map 2.7 on the following page presents existing pedestrian and bicycle networks in the rural areas. In general, facilities that support walking and bicycling are very limited in these areas. Sidewalks are concentrated within the town centers of larger municipalities while in some places, sidewalk infrastructure is reserved along major roadway thoroughfares with least coverage and connection to adjacent land uses. The limited non-motorized infrastructure and mobility choices are a consequence of a more automobile-centric approach to transportation planning. Such planning and investment decisions have resulted in communities with well-developed road systems that typically do not support alternative modes of mobility. In areas where sidewalk facilities do exist, it is apparent that the infrastructure is poorly maintained or has failed to keep pace with land use changes and growth, resulting in gaps in the network.

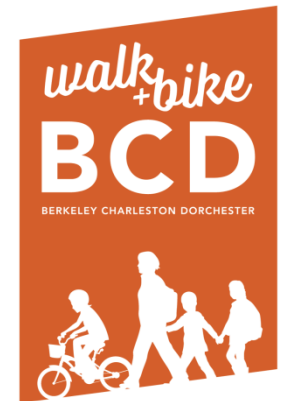


Also shown in the map, is the region's statewide bicycle routes and trails that connect some of the communities within the tri-county region, as well as to neighboring counties and other parts

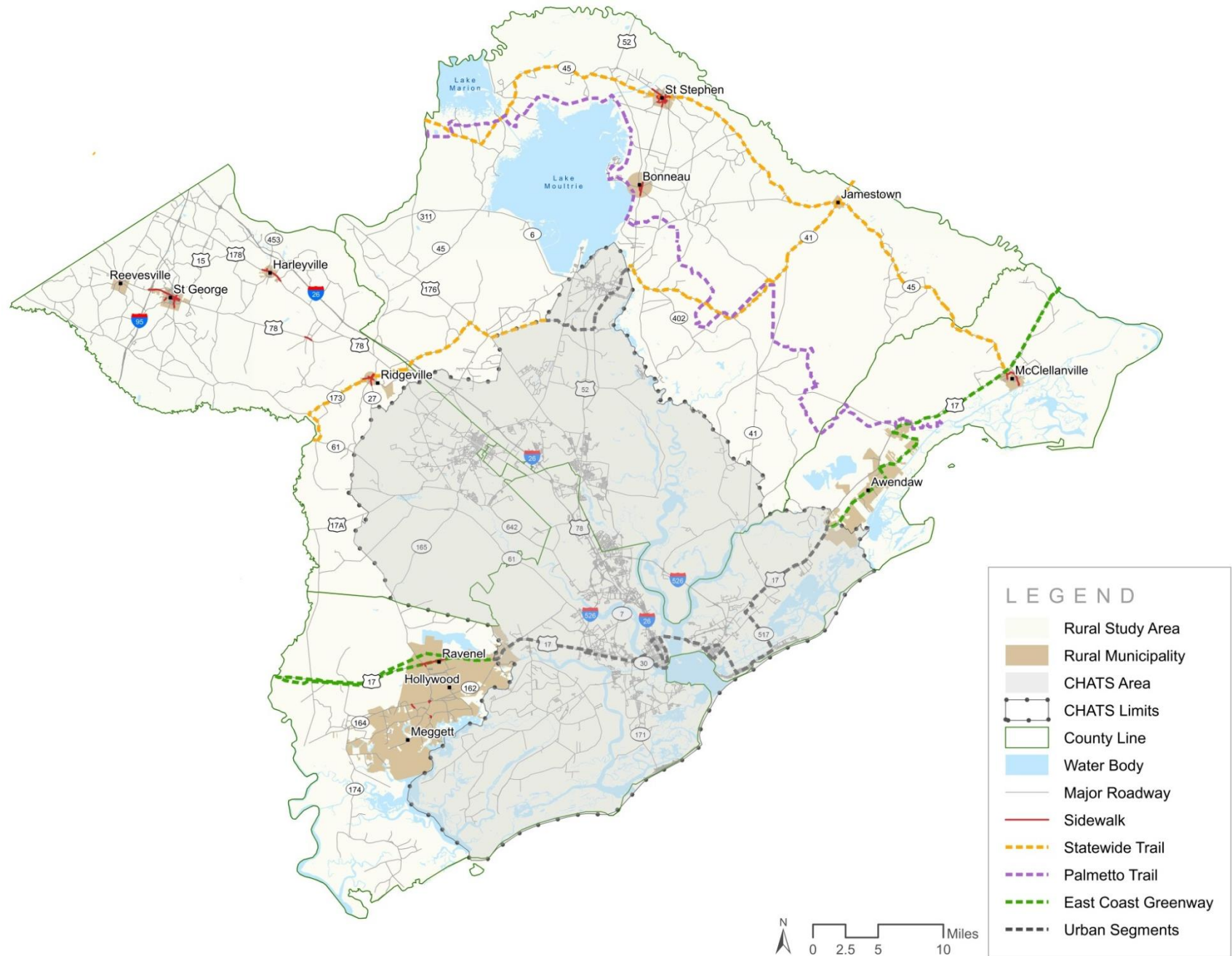
of the State. These routes and trails, which include the East Coast Greenway, the Palmetto Trail, and South Carolina State Touring Bike Routes, are a mix of on- and off-road facilities and support a number of local bicycle clubs and annual events.

CHALLENGES & OPPORTUNITIES: Most rural communities are marked by quiet streets and compact town centers that are conducive to the use of alternative modes of mobility. Characterized by inviting environs and flat terrain, the countryside allow for year-round activities, especially walking and biking. Despite the appealing conditions, the two modes of mobility are not considered viable options for many rural dwellers due to the challenges associated with lack of infrastructure within and between communities. Residents expressed general lack of pedestrian and bicycle facilities as one of the main issues afflicting their communities. A significant amount of retrofit efforts are warranted to develop a robust multi-modal infrastructure that serves all users.

BCDCOG has made strides in to delivering a more-balanced system by adopting policies, programs, and best practices that supports walking and biking projects in the region. Its recent activities include implementing Complete Streets policies and developing a vision plan known as the *Walk+Bike BCD*. The plan identifies opportunities to build and improve non-motorized infrastructure for active transportation connecting communities of all sizes across the tri-county region. (See [Appendix B-2](#) for additional information)



Map 2.7 – Pedestrian & Bicycle Facilities



2.6 Freight Network

The freight network in the region is comprised of port, air, roadway, rail, and intermodal facilities. However, major freight movement is undertaken primarily by rail and road traffic, with approximately 70% transported by truck on highways. The freight network shown in [Map 2.8](#) presents the National Highway Freight Network (NHFN) and South Carolina Statewide Freight Roadway Network in addition to other modes of freight networks and facilities. These strategic freight facilities are critical to the movement of goods and maintaining their efficiencies is key to supporting and advancing both the State and national economic goals.

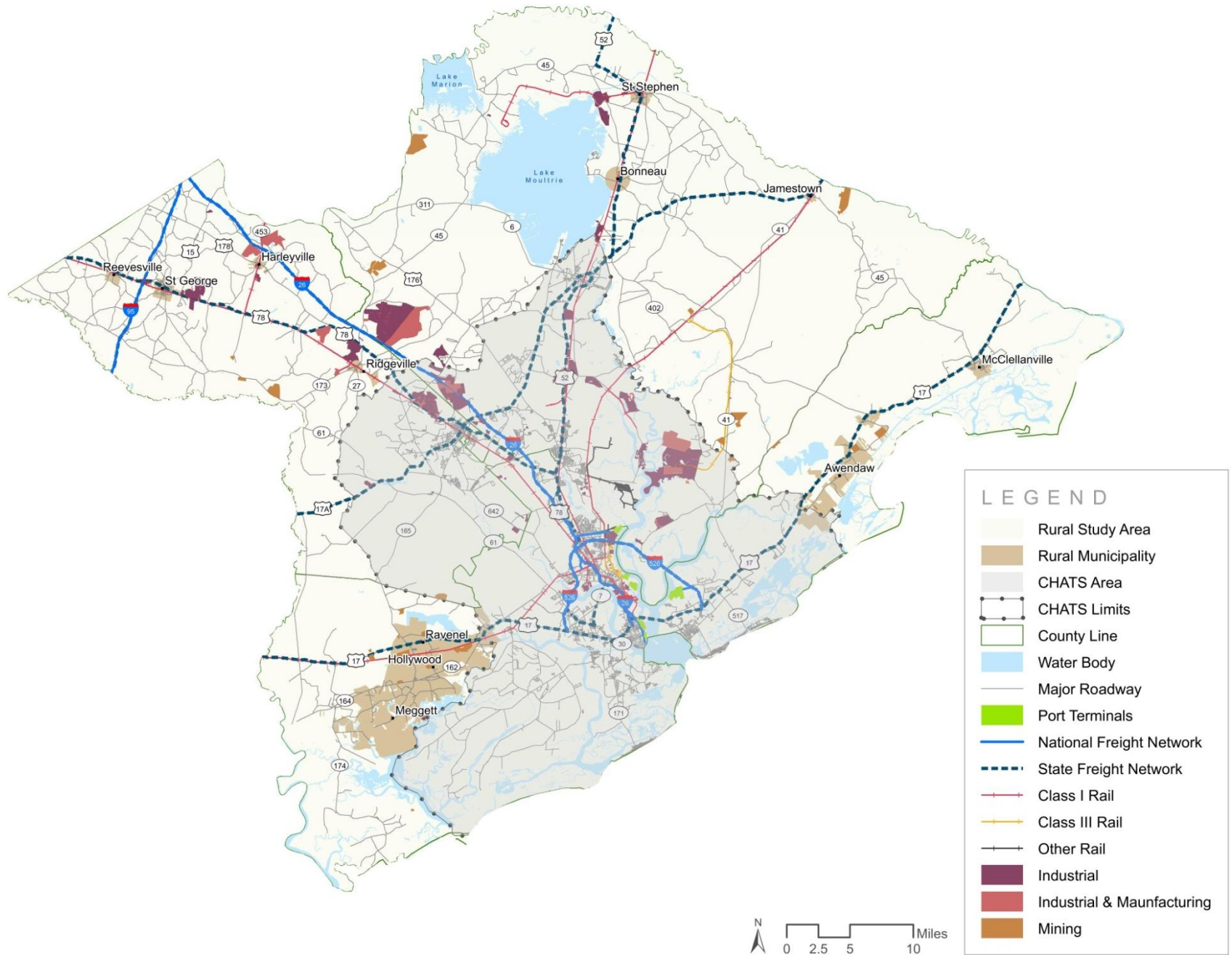
Highway: The NHFN in the study area includes segments of I-26 and I-95 in Dorchester County, and are part of the Primary Highway Freight System. The NHFN is also comprised of Critical Urban and Rural Freight Corridors (CUFCs & CRFCs). These vital freight corridors provide critical connectivity to the NHFN and are designated by States in consultation and collaboration with local MPOs/COGs on a rolling and as-needed basis. Recent designation of Critical Urban and Rural Freight Corridors by SCDOT with input from the BCDCOG has added approximately 24 miles along US-17 (South) corridor from I-526 to the Charleston County line, to the NHFN. Other significant corridors include US-17 (North), US-78, US-17A, and US-52 and are part of the Statewide Freight Roadway Network.

Rail: There are two Class-I railroad freight carriers operating in the region: CSX Transportation (CSX) and Norfolk Southern (NS). CSX is the largest railroad operator in the State comprising 56% of its rail network. It operates and maintains 1,269 route miles of track, 212 of which are within the study area. In addition to the rail mileage it owns, CSX also has trackage rights over the NS line between the City of Charleston and the State capital Columbia. Major commodities transported by CSX include

petroleum, coal, lumber, and wood products besides chemicals and allied products. NS is the second largest rail carrier in the State representing 30 percent of the rail system. It operates 679 route miles with approximately 79 miles within the study area. Major commodities transported over the NS system in the State include coal, lumber and wood products, chemicals, pulp, paper and allied products, and transportation equipment. The two freight carriers provide long-haul services across the State and country at large. Palmetto Rail, a Class-III short-line railroad operates three rail divisions: two terminal switching short-haul services to the Port of Charleston and one serving major industries. This 17-mile short-haul rail interchanges traffic with CSX at State Junction near the unincorporated community of Cordsville.

CHALLENGES & OPPORTUNITIES: Local freight traffic is generated by port terminals and manufacturing and industrial hubs located mainly in the CHATS urban area. However, overall growth in the tri-county region is changing the freight landscape as more industries locate to rural areas, especially along the I-26 corridor in Berkeley County and Dorchester County. Major sites such as Camp Hall Industrial Commerce Park and Volvo Cars plant area have spurred major investment in transportation infrastructure contributing to increased truck movements and overall traffic demand in the vicinity, directly impacting life in rural communities. Other major road, rail, and port-related improvements specifically catering to increased freight container movements have also encouraged traffic distribution throughout the region. Local municipalities and residents have voiced concern over high number of truck movements, especially from local mining and logging companies, passing through their neighborhoods. Stakeholder feedback has highlighted the need to address such challenges and identify opportunities to improve local access to freight-intensive land uses while also maintaining the quality of life of residents.

Map 2.8 – Freight Network

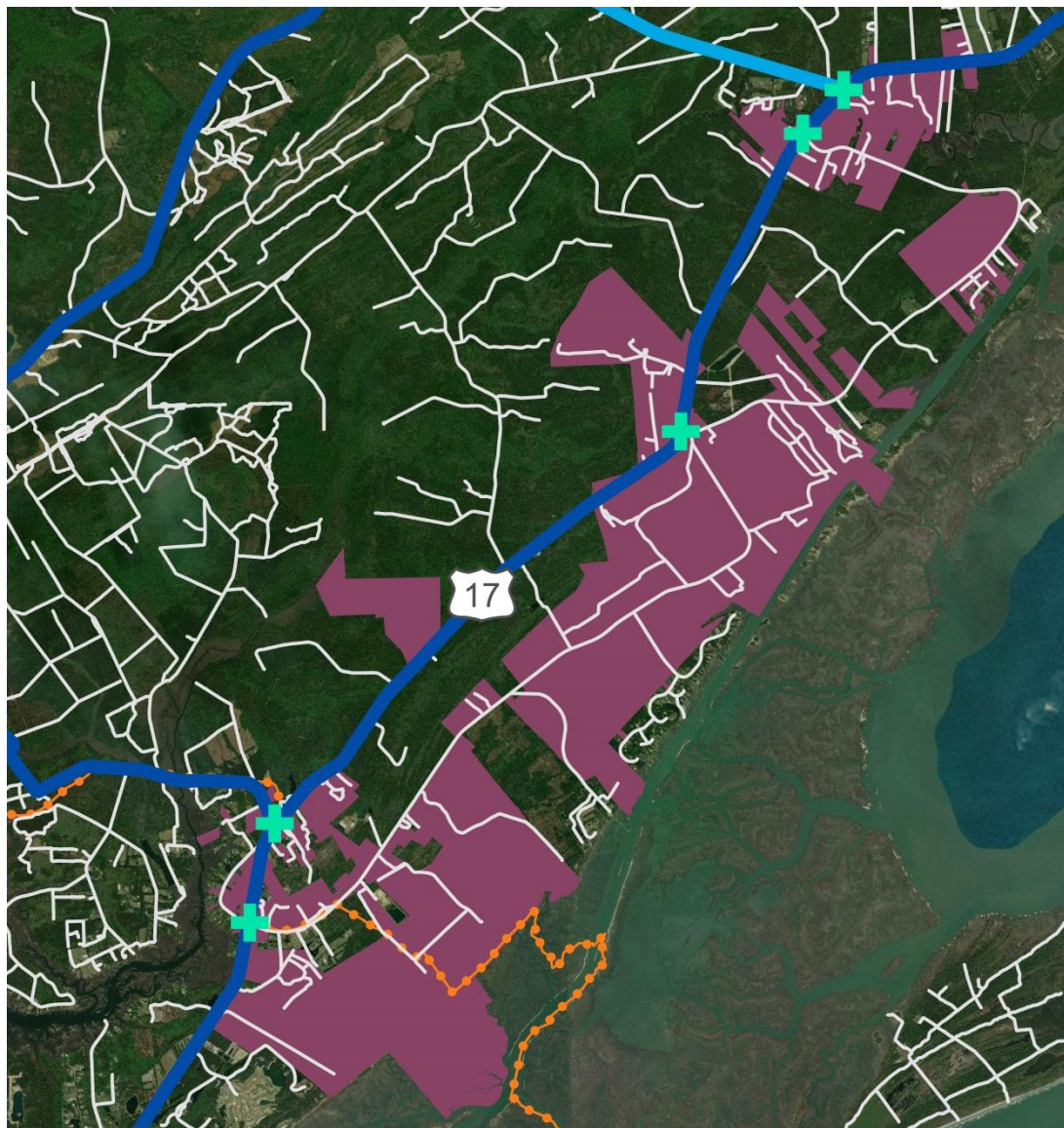


2.7 Issues by Municipality

The following pages illustrate existing transportation infrastructure issues by category as they relate specifically to each municipality in the rural study area. These issues were captured and summarized based on inputs received through public engagement efforts led by the BCDCOG staff that ultimately served as the precursor for developing potential improvement strategies.


Common areas of major concern included: heavy truck movements through local roadways, poorly-maintained pavement surfaces, unsafe traffic conditions, lack of bike-pedestrian facilities, and limited transit service and last-mile connectivity. Some issues that were unique to certain municipalities included speeding on light-traffic roadways in the towns of Awendaw and Reevesville and lack of street lighting in the towns of Meggett and Ravenel.

Figure 2.5 – Town of Awendaw Issues



ROADWAYS

- Excessive Speeding
- Unsafe Traffic Conditions
- Poor Pavement Maintenance
- Heavy Truck Movements
- Poor Road Connectivity
- Traffic Congestion




INTERSECTIONS

- Lack of Traffic Control
- Lack of Pedestrian Facilities
- Poor Design Geometrics




BIKE-PED

- Lack of Sidewalks
- Lack of Bike Lanes
- Lack of Signage



TRANSIT

- Lack of Transit Service
- Absence of Bus Shelters
- No Last-Mile Connectivity



OTHER

- Poorly Marked Parking
- Lack of Enforcement
- Lack of Lighting


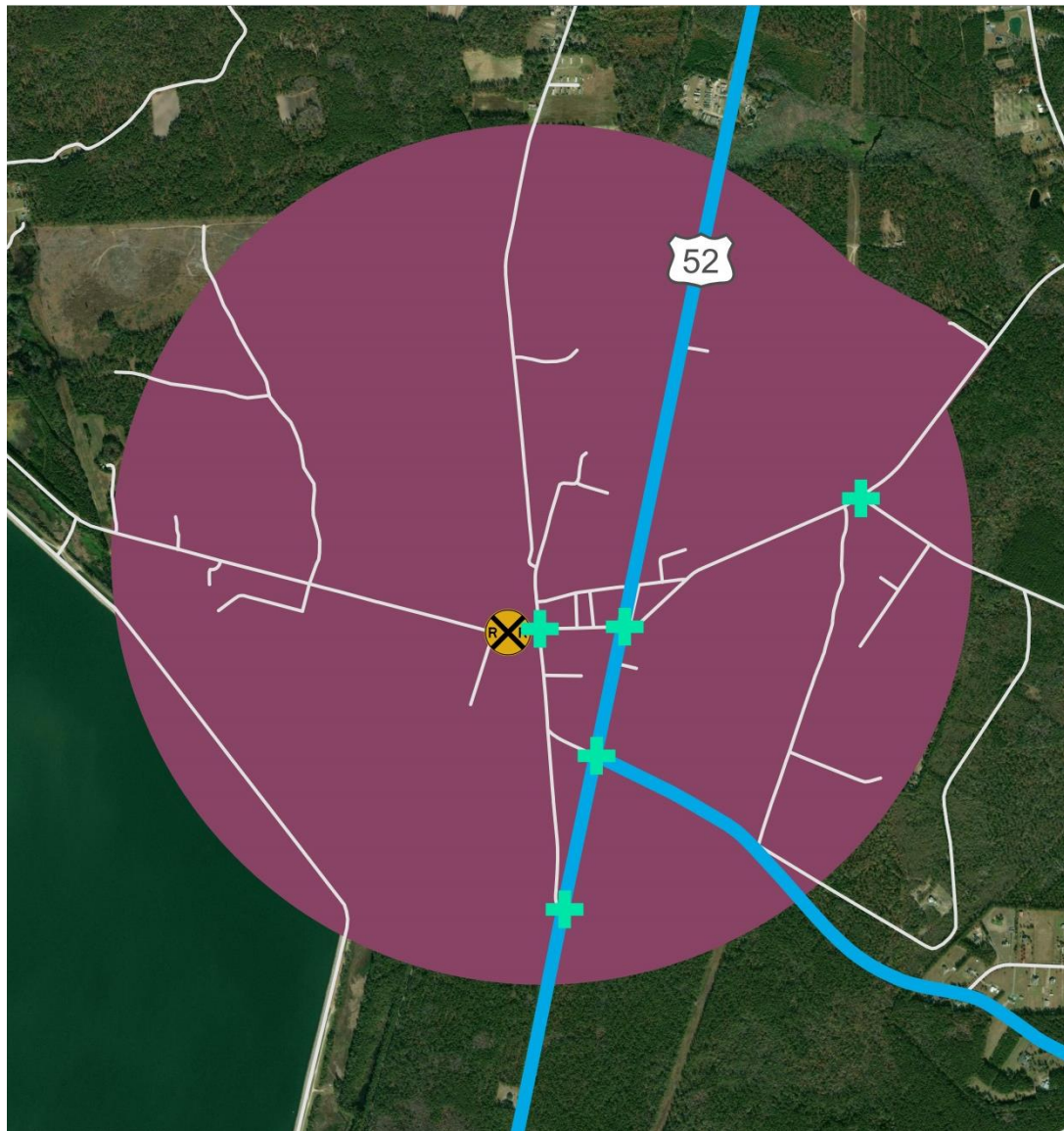



Figure 2.6 – Town of Bonneau Issues



ROADWAYS

- Excessive Speeding
- Unsafe Traffic Conditions
- Poor Pavement Maintenance
- Heavy Truck Movements
- Poor Road Connectivity
- Traffic Congestion




INTERSECTIONS

- Lack of Traffic Control
- Lack of Pedestrian Facilities
- Poor Design Geometrics




BIKE-PED

- Lack of Sidewalks
- Lack of Bike Lanes
- Lack of Signage



TRANSIT

- Lack of Transit Service
- Absence of Bus Shelters
- No Last-Mile Connectivity



OTHER

- Poorly Marked Parking
- Lack of Enforcement
- Lack of Lighting





Figure 2.7 – Town of Harleyville Issues



ROADWAYS

- Excessive Speeding
- Unsafe Traffic Conditions
- Poor Pavement Maintenance
- Heavy Truck Movements
- Poor Road Connectivity
- Traffic Congestion




INTERSECTIONS

- Lack of Traffic Control
- Lack of Pedestrian Facilities
- Poor Design Geometrics




BIKE-PED

- Lack of Sidewalks
- Lack of Bike Lanes
- Lack of Signage



TRANSIT

- Lack of Transit Service
- Absence of Bus Shelters
- No Last-Mile Connectivity



OTHER

- Poorly Marked Parking
- Lack of Enforcement
- Lack of Lighting


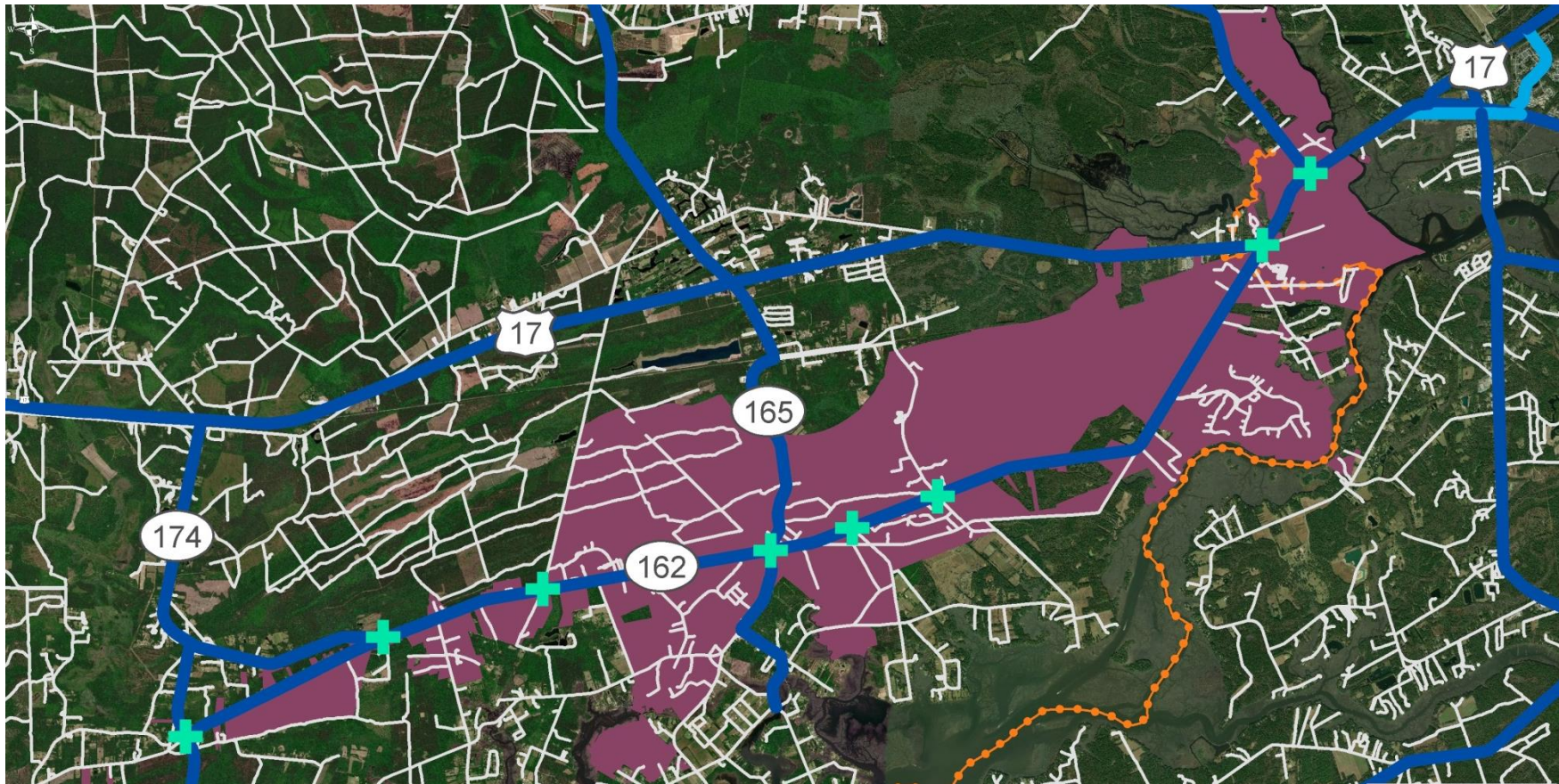
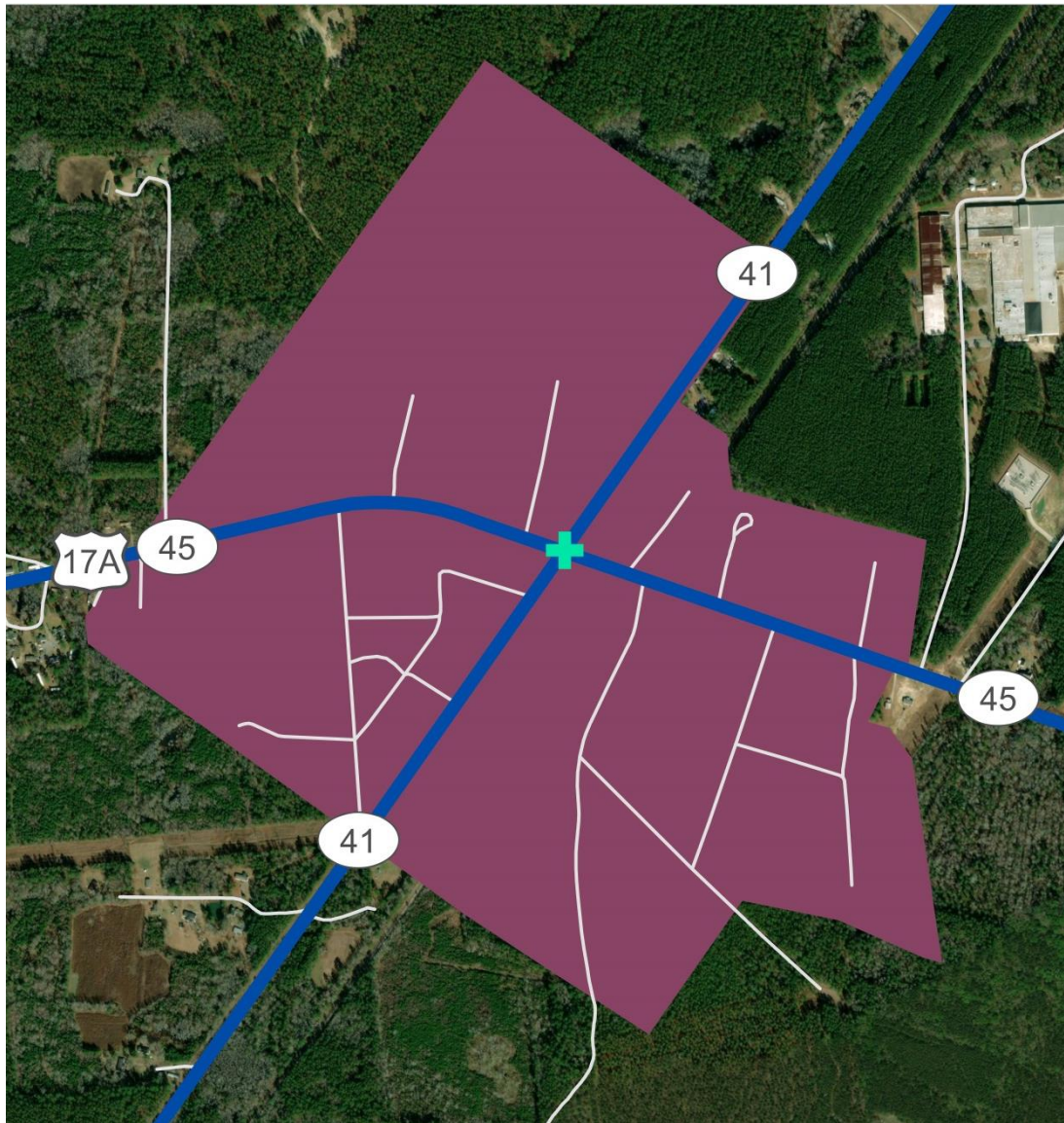


Figure 2.8 – Town of Hollywood Issues




ROADWAYS	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Excessive Speeding <input checked="" type="checkbox"/> Unsafe Traffic Conditions <input checked="" type="checkbox"/> Poor Pavement Maintenance <input checked="" type="checkbox"/> Heavy Truck Movements <input type="checkbox"/> Poor Road Connectivity <input checked="" type="checkbox"/> Traffic Congestion 	
BIKE-PED	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Lack of Sidewalks <input checked="" type="checkbox"/> Lack of Bike Lanes <input type="checkbox"/> Lack of Signage 	
INTERSECTIONS	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Lack of Traffic Control <input checked="" type="checkbox"/> Lack of Pedestrian Facilities <input checked="" type="checkbox"/> Poor Design Geometrics 	
OTHER	<ul style="list-style-type: none"> <input type="checkbox"/> Poorly Marked Parking <input type="checkbox"/> Lack of Enforcement <input type="checkbox"/> Lack of Lighting 	
TRANSIT	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Lack of Transit Service <input checked="" type="checkbox"/> Absence of Bus Shelters <input checked="" type="checkbox"/> No Last-Mile Connectivity 	

Figure 2.9 – Town of Jamestown Issues



ROADWAYS

- Excessive Speeding
- Unsafe Traffic Conditions
- Poor Pavement Maintenance
- Heavy Truck Movements
- Poor Road Connectivity
- Traffic Congestion




INTERSECTIONS

- Lack of Traffic Control
- Lack of Pedestrian Facilities
- Poor Design Geometrics




BIKE-PED

- Lack of Sidewalks
- Lack of Bike Lanes
- Lack of Signage



TRANSIT

- Lack of Transit Service
- Absence of Bus Shelters
- No Last-Mile Connectivity



OTHER

- Poorly Marked Parking
- Lack of Enforcement
- Lack of Lighting


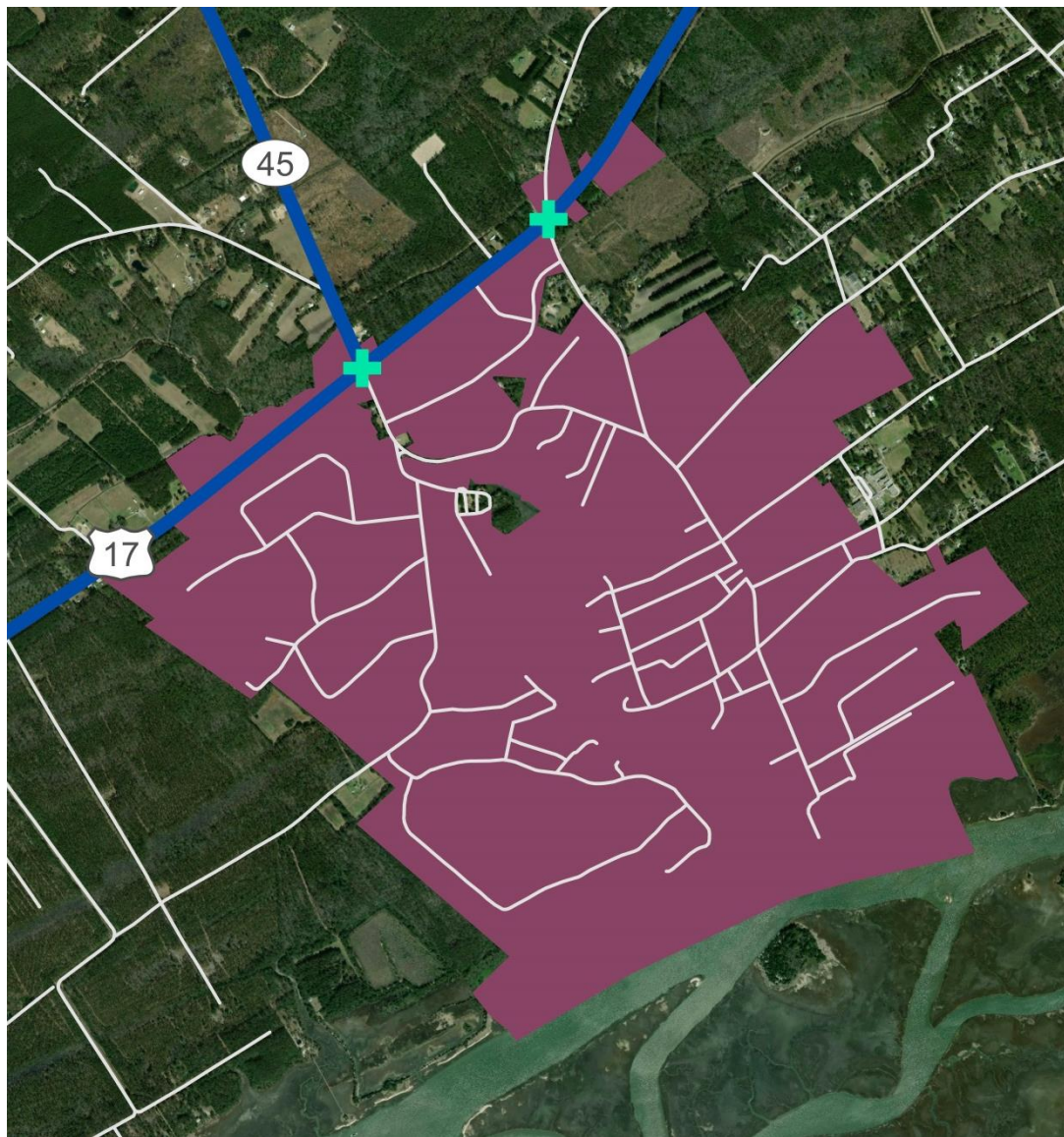



Figure 2.10 – Town of McClellanville Issues



ROADWAYS

- Excessive Speeding
- Unsafe Traffic Conditions
- Poor Pavement Maintenance
- Heavy Truck Movements
- Poor Road Connectivity
- Traffic Congestion




INTERSECTIONS

- Lack of Traffic Control
- Lack of Pedestrian Facilities
- Poor Design Geometrics




BIKE-PED

- Lack of Sidewalks
- Lack of Bike Lanes
- Lack of Signage



TRANSIT

- Lack of Transit Service
- Absence of Bus Shelters
- No Last-Mile Connectivity



OTHER

- Poorly Marked Parking
- Lack of Enforcement
- Lack of Lighting

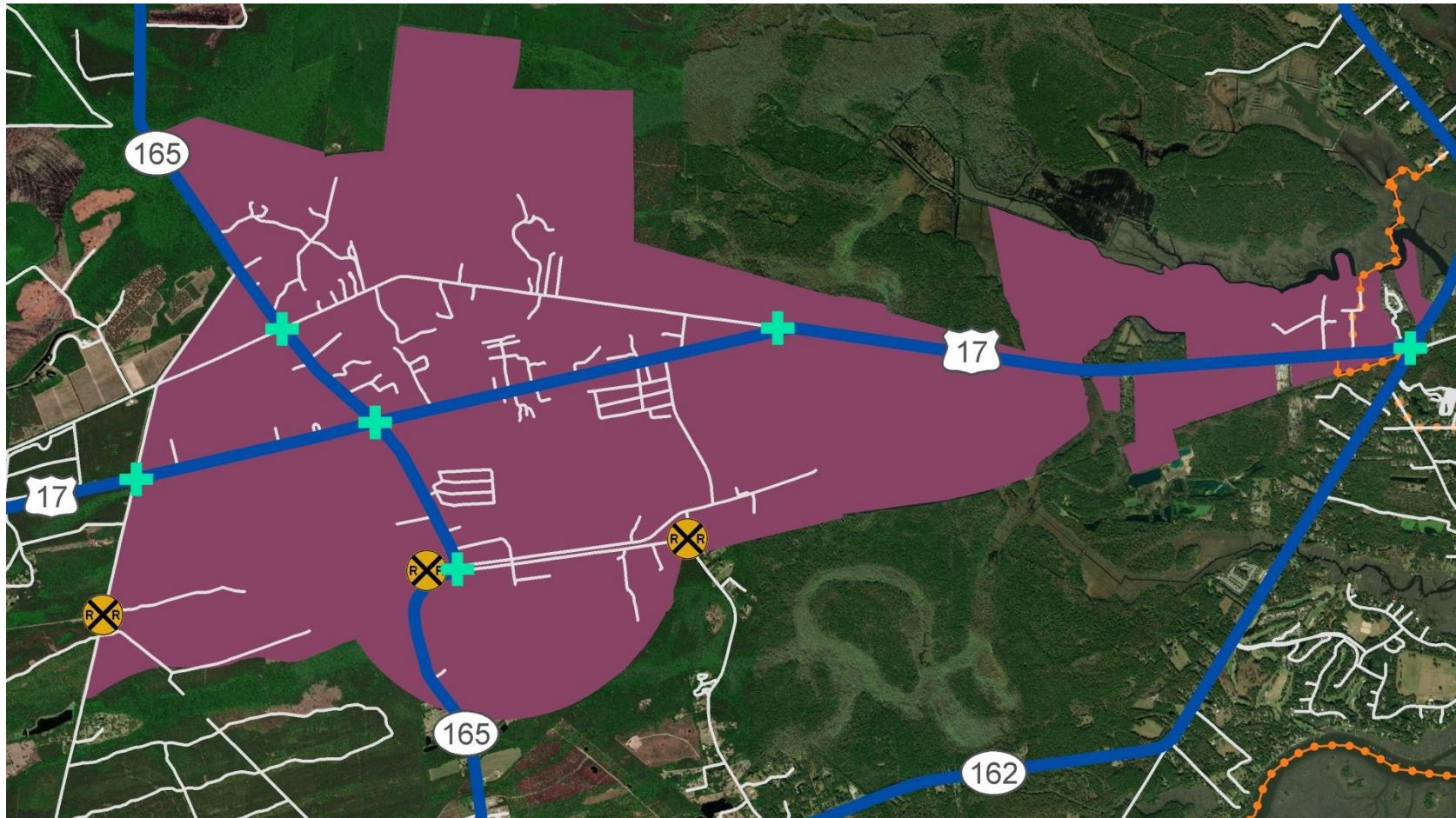


Figure 2.11 – Town of Meggett Issues



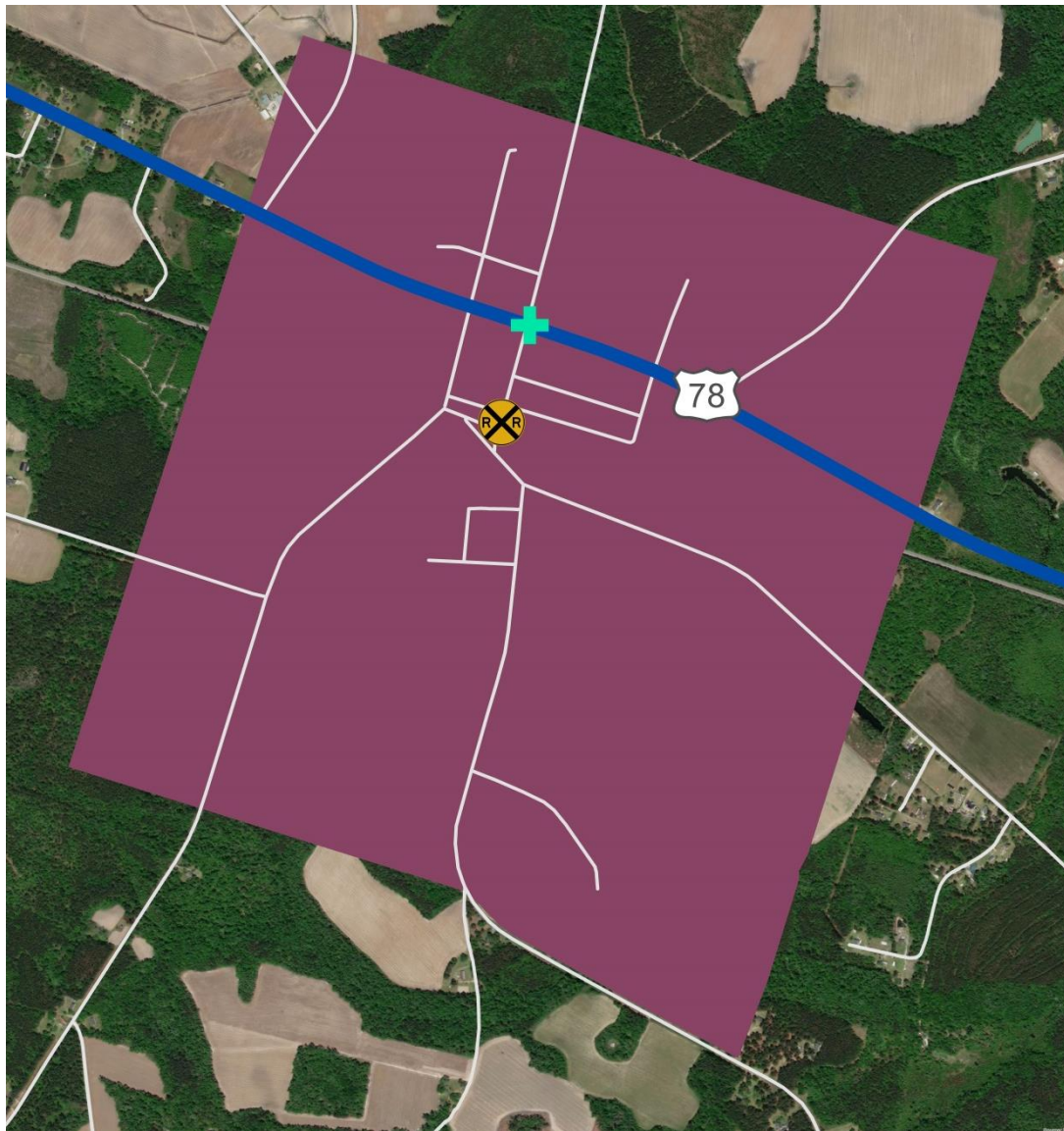
ROADWAYS	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Excessive Speeding <input checked="" type="checkbox"/> Unsafe Traffic Conditions <input checked="" type="checkbox"/> Poor Pavement Maintenance <input checked="" type="checkbox"/> Heavy Truck Movements <input type="checkbox"/> Poor Road Connectivity <input checked="" type="checkbox"/> Traffic Congestion 	
BIKE-PED	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Lack of Sidewalks <input checked="" type="checkbox"/> Lack of Bike Lanes <input type="checkbox"/> Lack of Signage 	
INTERSECTIONS	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Lack of Traffic Control <input checked="" type="checkbox"/> Lack of Pedestrian Facilities <input checked="" type="checkbox"/> Poor Design Geometrics 	
OTHER	<ul style="list-style-type: none"> <input type="checkbox"/> Poorly Marked Parking <input type="checkbox"/> Lack of Enforcement <input checked="" type="checkbox"/> Lack of Lighting 	
TRANSIT	<ul style="list-style-type: none"> <input checked="" type="checkbox"/> Lack of Transit Service <input checked="" type="checkbox"/> Absence of Bus Shelters <input checked="" type="checkbox"/> No Last-Mile Connectivity 	

Figure 2.12 – Town of Ravenel Issues




ROADWAYS	<input checked="" type="checkbox"/> Excessive Speeding <input checked="" type="checkbox"/> Unsafe Traffic Conditions <input checked="" type="checkbox"/> Poor Pavement Maintenance <input checked="" type="checkbox"/> Heavy Truck Movements <input type="checkbox"/> Poor Road Connectivity <input checked="" type="checkbox"/> Traffic Congestion		
	INTERSECTIONS <input checked="" type="checkbox"/> Lack of Traffic Control <input checked="" type="checkbox"/> Lack of Pedestrian Facilities <input checked="" type="checkbox"/> Poor Design Geometrics		
BIKE-PED	<input checked="" type="checkbox"/> Lack of Sidewalks <input checked="" type="checkbox"/> Lack of Bike Lanes <input type="checkbox"/> Lack of Signage		
OTHER	<input type="checkbox"/> Poorly Marked Parking <input type="checkbox"/> Lack of Enforcement <input type="checkbox"/> Lack of Lighting		
	<input checked="" type="checkbox"/> Lack of Transit Service <input checked="" type="checkbox"/> Absence of Bus Shelters <input checked="" type="checkbox"/> No Last-Mile Connectivity		TRANSIT

Figure 2.13 – Town of Reevesville Issues



ROADWAYS

- Excessive Speeding
- Unsafe Traffic Conditions
- Poor Pavement Maintenance
- Heavy Truck Movements
- Poor Road Connectivity
- Traffic Congestion




INTERSECTIONS

- Lack of Traffic Control
- Lack of Pedestrian Facilities
- Poor Design Geometrics




BIKE-PED

- Lack of Sidewalks
- Lack of Bike Lanes
- Lack of Signage



TRANSIT

- Lack of Transit Service
- Absence of Bus Shelters
- No Last-Mile Connectivity



OTHER

- Poorly Marked Parking
- Lack of Enforcement
- Lack of Lighting


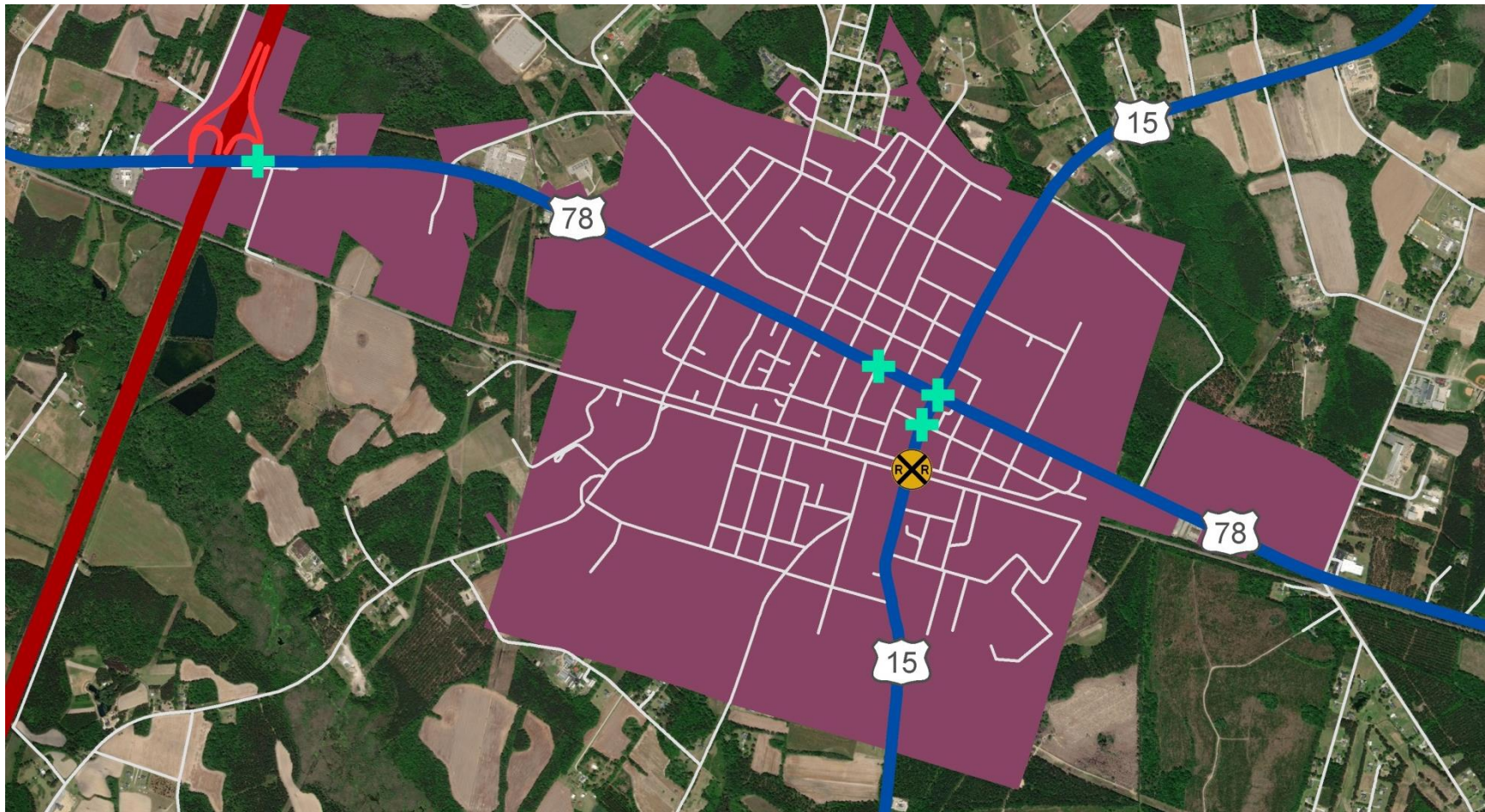


Figure 2.14 – Town of Ridgeville Issues



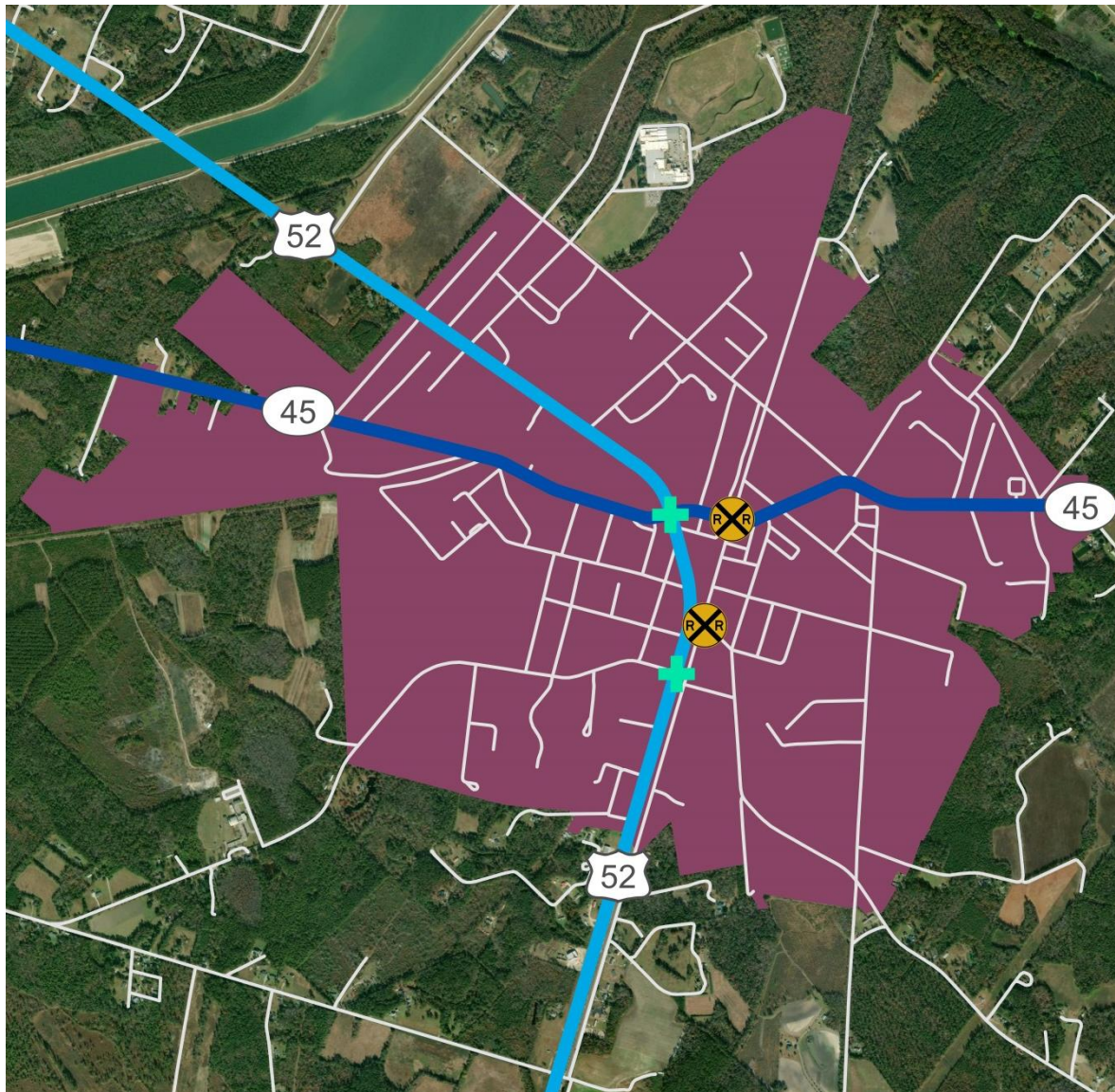
ROADWAYS	<input checked="" type="checkbox"/> Excessive Speeding	
	<input checked="" type="checkbox"/> Unsafe Traffic Conditions	
	<input checked="" type="checkbox"/> Poor Pavement Maintenance	
	<input checked="" type="checkbox"/> Heavy Truck Movements	
	<input type="checkbox"/> Poor Road Connectivity	
	<input checked="" type="checkbox"/> Traffic Congestion	
INTERSECTIONS		
<input checked="" type="checkbox"/> Lack of Traffic Control		
<input checked="" type="checkbox"/> Lack of Pedestrian Facilities		
<input checked="" type="checkbox"/> Poor Design Geometrics		
BIKE-PED	<input type="checkbox"/> Lack of Sidewalks	
	<input type="checkbox"/> Lack of Bike Lanes	
	<input type="checkbox"/> Lack of Signage	
	Lack of Transit Service <input checked="" type="checkbox"/>	TRANSIT
	Absence of Bus Shelters <input checked="" type="checkbox"/>	
	No Last-Mile Connectivity <input type="checkbox"/>	
OTHER	<input type="checkbox"/> Poorly Marked Parking	
	<input type="checkbox"/> Lack of Enforcement	
	<input type="checkbox"/> Lack of Lighting	

Figure 2.15 – Town of St. George Issues



ROADWAYS	<input type="checkbox"/> Excessive Speeding <input checked="" type="checkbox"/> Unsafe Traffic Conditions <input checked="" type="checkbox"/> Poor Pavement Maintenance <input checked="" type="checkbox"/> Heavy Truck Movements <input type="checkbox"/> Poor Road Connectivity <input type="checkbox"/> Traffic Congestion	
INTERSECTIONS		
	<input type="checkbox"/> Lack of Traffic Control <input checked="" type="checkbox"/> Lack of Pedestrian Facilities <input type="checkbox"/> Poor Design Geometrics	
BIKE-PED	<input checked="" type="checkbox"/> Lack of Sidewalks <input checked="" type="checkbox"/> Lack of Bike Lanes <input type="checkbox"/> Lack of Signage	
	<input type="checkbox"/> Lack of Transit Service <input checked="" type="checkbox"/> Absence of Bus Shelters <input checked="" type="checkbox"/> No Last-Mile Connectivity	
TRANSIT		
OTHER	<input type="checkbox"/> Poorly Marked Parking <input checked="" type="checkbox"/> Lack of Enforcement <input type="checkbox"/> Lack of Lighting	

Figure 2.16 – Town of St. Stephen Issues



ROADWAYS	<input type="checkbox"/> Excessive Speeding <input checked="" type="checkbox"/> Unsafe Traffic Conditions <input checked="" type="checkbox"/> Poor Pavement Maintenance <input checked="" type="checkbox"/> Heavy Truck Movements <input type="checkbox"/> Poor Road Connectivity <input type="checkbox"/> Traffic Congestion	
INTERSECTIONS		
	<input checked="" type="checkbox"/> Lack of Traffic Control <input checked="" type="checkbox"/> Lack of Pedestrian Facilities <input type="checkbox"/> Poor Design Geometrics	
BIKE-PED	<input checked="" type="checkbox"/> Lack of Sidewalks <input checked="" type="checkbox"/> Lack of Bike Lanes <input type="checkbox"/> Lack of Signage	
	Lack of Transit Service <input checked="" type="checkbox"/> Absence of Bus Shelters <input checked="" type="checkbox"/> No Last-Mile Connectivity <input type="checkbox"/>	TRANSIT
OTHER	<input type="checkbox"/> Poorly Marked Parking <input type="checkbox"/> Lack of Enforcement <input type="checkbox"/> Lack of Lighting	



Proposed Improvements

CHAPTER 3

Committed Projects
Visionary Projects

3.1 Committed Projects

Although this report is primarily focused on identifying transportation infrastructure gaps and developing a list of visionary projects, it is worth noting that there are currently several committed projects in the study area under different stages of development: planning, approval, programming, or construction. These projects are scheduled to be completed in the near future or already complete by the time this report was published. The list of committed projects shown in Table 3.1 was compiled from information that was made available by Berkeley County, Charleston County, and Dorchester County, as well as the SCDOT, and is up to date as of November 2019.

The projects vary in scale, type of improvement, and funding sources. Improvements include road paving, resurfacing, widening, interchange construction, and bicycle and pedestrian facility construction. The majority of the committed projects are funded by County Transportation Committees (CTCs) while several also having received state and federal funding as well as funding through the Transportation Sales Tax (TST) programs.

Table 3.1 – Committed Projects

#	Project ID	Facility	Improvement	Delimits	Location	Length (Miles)	Funding Source	Completion Year*
BERKELEY COUNTY								
1	B-01	Autonomous Road	Widening	SC-27 to Volvo Car Drive	Unincorporated	3.00	CTC	2019
2	B-02	Barnyard Road	Road Paving	Bethera Road to Eagle Ridge Court	Unincorporated	0.20	CTC	2019
3	B-03	Beulah Tabernacle Drive	Road Paving	SC-35 to US-52	Unincorporated	1.80	CTC	2019
4	B-04	Britt Drive	Road Paving	(Entire Length)	Jamestown	0.29	CTC	2019
5	B-05	Caroline Drive	Road Paving	(Entire Length)	Unincorporated	0.30	CTC	2019
6	B-06	Georgiana Drive	Road Paving	(Entire Length)	Unincorporated	0.20	CTC	2019
7	B-07	Greenleaf Drive	Road Paving	(Entire Length)	Jamestown	0.90	CTC	2019
8	B-08	Jasper Lane	Road Paving	(Entire Length)	Unincorporated	0.20	CTC	2019
9	B-09	Millwood Loop	Road Paving	(Entire Length)	Jamestown	0.60	CTC	2019
10	B-10	Mudville Road	Resurfacing	SC-176 to Ranger Drive	Unincorporated	7.20	CTC	2019
11	B-11	Old Parker Road	Road Paving	(Entire Length)	Unincorporated	1.20	CTC	2019
12	B-12	Orvin Street	Road Paving	(Entire Length)	St. Stephen	0.20	CTC	2019
13	B-13	SC-27	Resurfacing	I-26 to Autonomous Drive	Unincorporated	0.90	State	2019
14	B-14	SC-402	Resurfacing	Turnaround Court to Alligator Road	Unincorporated	7.50	Federal	2019
15	B-15	Schurknight Road	Road Paving	Greentown Road to Aiken Road	St. Stephen	2.00	CTC	2019
16	B-16	Steelshed Lane	Road Paving	(Entire Length)	Jamestown	0.24	CTC	2019
17	B-17	Uptown Avenue	Road Paving	(Entire Length)	St. Stephen	0.10	CTC	2019
18	B-18	US-176	Widening	Jedberg Road to Volvo Car Drive	Unincorporated	4.30	CTC	2019
19	B-19	Volvo Interchange	Interchange	-	Unincorporated	-	State	2019
20	B-20	Waterpointe Avenue	Road Paving	(Entire Length)	Jamestown	0.12	CTC	2019

Table 3.1 – Committed Projects (Continued)

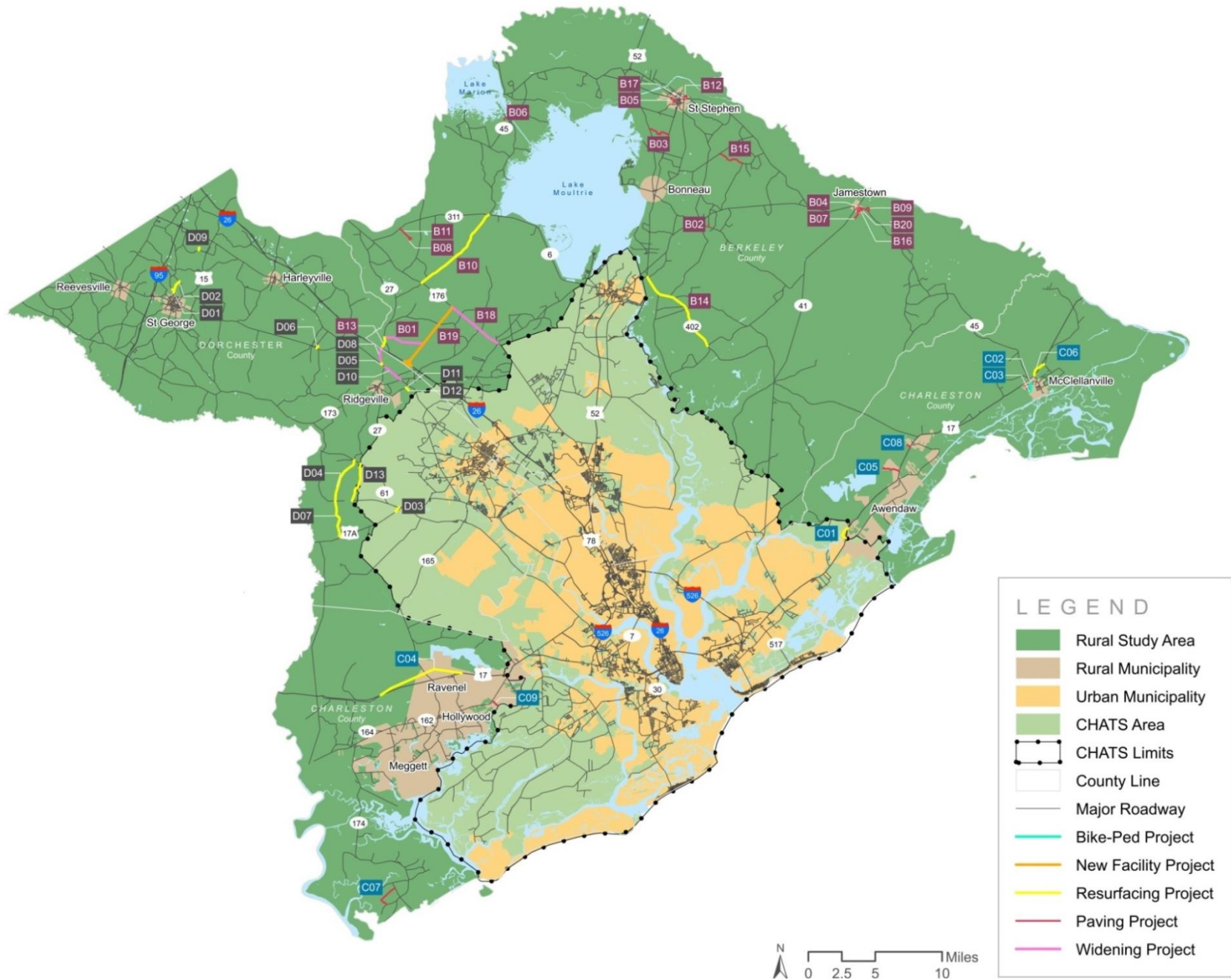
#	Project ID	Facility	Improvement	Delimits	Location	Length (Miles)	Funding Source	Completion Year*
CHARLESTON COUNTY								
21	C-01	Fifteen Mile Landing Road	Resurfacing	(Entire Length)	Awendaw	1.00	CTC	2019
22	C-02	Jeremy Creek Pedestrian Bridge	Bike-Ped Bridge	Pinckney Street to Old Cemetery Road	McClellanville	0.05	CTC+TST	2019
23	C-03	Kit Hall Road	Bike-Ped Paving	Old Cemetery Road to Romaine Road	McClellanville	0.80	TST	2019
24	C-04	Old Jacksonboro Road	Resurfacing	SC-165 to US-17	Raveland	2.80	CTC	2019
25	C-05	Porcher School Road	Road Paving	(Entire Length)	Awendaw	0.60	CTC	2019
26	C-06	River Road	Resurfacing	US-17 to Toby Road	McClellanville	0.60	CTC	2019
27	C-07	Shell House Road	Road Paving	Oyster Factory Road to Red House Road	Edisto Island	1.90	TST	2019
28	C-08	Thompson Hill Road	Road Paving	(Entire Length)	Awendaw	0.06	TST	2019
29	C-09	Trexler Avenue	Road Paving	(Entire Length)	Hollywood	0.44	TST	2019
DORCHESTER COUNTY								
30	D-01	Bishopville Road	Resurfacing	Carolina Avenue to County Road S-18-48	St. George	1.00	CTC	2019
31	D-02	Boss Road	Resurfacing	Phileremy Drive to Bishopville Road	St. George	0.16	CTC	2019
32	D-03	Canaan Road	Resurfacing	SC-61 to Walterboro Road	Ridgeville	0.44	CTC	2019
33	D-04	Hill Branch Road	Resurfacing	SC-61 to Old Beech Hill Road	Ridgeville	3.60	CTC	2019
34	D-05	Kizer Lane	Resurfacing	SC-27 to Sampson Road	Ridgeville	0.15	CTC	2019
35	D-06	Molly Road	Resurfacing	US-78 to Limestone Road	Unincorporated	0.17	CTC	2019
36	D-07	Sand Pit Road	Resurfacing	US-17 to Old Beech Hill Road	Ridgeville	3.70	CTC	2019
37	D-08	SC-27/Ridgeville Road	Widening	US-78 to I-26 Interchange	Unincorporated	1.20	State	No Info
38	D-09	Singing Pines Road	Resurfacing	Deep Woods Road to County Road S-18-175	St. George	0.18	CTC	2019
39	D-10	US-78	Widening	SC-173 to SC-27	Unincorporated	1.96	Multiple	2020
40	D-11	Wishbone Lane	Resurfacing	County Road S-18-630 to Wren Lane	Ridgeville	0.02	CTC	2019
41	D-12	Wren Road	Resurfacing	Wishbone Lane to End	Ridgeville	0.30	CTC	2019
42	D-13	Wright Road	Resurfacing	SC-61 to Old Beech Hill Road	Ridgeville	2.90	CTC	2019

CTC - County Transportation Committee; TST - Transportation Sales Tax

* Expected

Map 3.1 displays location of committed projects by type of improvement. The Project IDs labeled in the map are also indicated in the preceding table for purposes of cross-reference.

Map 3.1 – Committed Projects



3.2 Visionary Projects

The effort to holistically assess infrastructure deficiencies and identify potential improvement strategies in the study area began with the BCDCOG Planning Services staff consulting individually with member counties and local municipalities. Projects previously proposed in the 2035 RL RTP formed the general basis of these discussions so additional upgrades or newer improvement proposals were developed off those projects. Inputs received from members of the Rural Study Committee, as well as the general public through the public engagement efforts were also appropriately accounted for in developing a comprehensive list of visionary projects.

A total of 67 visionary projects compiled in [Table 3.2](#) below were identified in the 2040 RL RTP and were classified in to three broad categories: roadway, intersection, and bicycle-pedestrian projects. Based on the type of potential improvement envisioned, the project category was in turn classified in to several subcategories: pavement surface, midblock widening, traffic control device, traffic safety, and intersection capacity. [Map 3.2](#) illustrates the location of all visionary projects while [Map 3.3](#) through [Map 3.6](#) present them by County.

Table 3.2 – Visionary Projects

#	Project ID	Facility	Improvement Category	Potential Improvement(s)	Delimits	Location	Length (Miles)
ROADWAY							
1	B-01	SC-45	Pavement	Resurfacing	SC-41 to Quarry Road	Jamestown	2.87
2	B-02	Halfway Creek Road	Pavement	Resurfacing	SC-45 to Guerins Bridge Road	Unincorporated	19.01
3	C-01	Bulls Island Road Extension	New Roadway	Build 2-Lane Undivided	Seewee Road to US-17	Awendaw	0.83
4	C-02	US-17	Traffic Control	Improve Signage	Steed Creek Road to Seewee Road	Awendaw	9.63
5	C-03	Seewee Road	Traffic Control	Implement Calming	US-17 to S. Doar Road	Awendaw	7.14
6	C-04	N. Pinckney Street	Traffic Control	Install Signage	<i>(Entire Length)</i>	McClellanville	0.56
7	C-05	Pinckney Street	Traffic Control	Install Signage	<i>(Entire Length)</i>	McClellanville	1.78
8	C-06	Kit Hall Road	Traffic Control	Install Signage	<i>(Entire Length)</i>	McClellanville	0.98
9	C-07	SC-162	Pavement	Resurfacing	US-17 to SC-174	Hollywood	13.30
10	D-01	SC-453	Pavement	Resurfacing	US-178 to I-26 Eastbound Ramps	Harleyville	1.19
11	D-02	Creighton Street	Pavement	Resurfacing	Hill Street to S. Railroad Avenue	Harleyville	0.19
12	D-03	S. Railroad Avenue	Pavement	Resurfacing	US-178 to Copart Facility	Harleyville	1.00
13	D-04	US-178	Safety, Traffic Control	Upgrade Striping, Improve Signage	Pat Street (South) to North of Pioneer Gym Road	Harleyville	1.80
14	D-05	Whetsell Street/Cross Creek Road	Traffic Control	Implement Calming	Grimes Town Road to Wire Road	Reevesville	5.87
15	D-06	US-15/N. Parler Avenue	Widening	Add Median	Minus Street to Dukes Street	St. George	0.92
16	D-07	S. Metts Street	Widening	Add Lane or Shoulder	Gavin Street to Dukes Street	St. George	0.46
17	D-08	Spring Road	Pavement	Resurfacing; Paving; Add Shoulder	US-15 to Winding Wood Road	Unincorporated	1.80
18	D-09	SC-61	Pavement	Resurfacing	Givhans Ferry Road to SC-27	Unincorporated	3.06
19	D-10	Givhans Ferry Road	Pavement	Resurfacing	SC-61 to Ridge Road	Unincorporated	2.58
20	D-11	SC-27 (Ridgeville Road)	Pavement	Resurfacing	SC-61 to US-78	Unincorporated	7.83

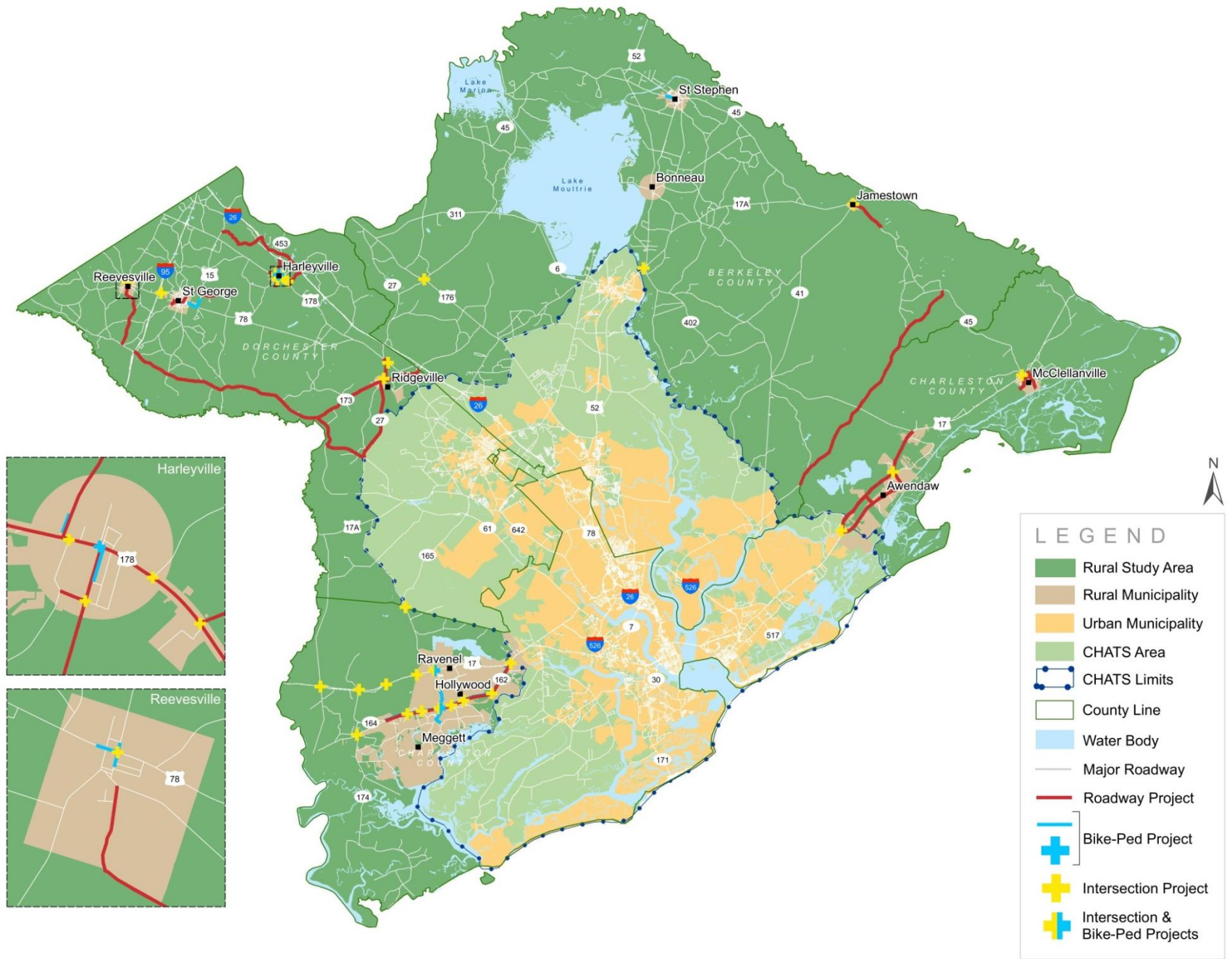
Table 3.2 – Visionary Projects (Continued)

#	Project ID	Facility	Improvement Category	Potential Improvement(s)	Delimits	Location	Length (Miles)
ROADWAY							
21	D-12	SC-173 (Myers Mayo Road)	Pavement	Resurfacing	County Line to SC-27	Unincorporated	2.93
22	D-13	Ridge Road	Pavement	Resurfacing	SC-27 to Givhans Ferry Road	Unincorporated	5.66
23	D-14	Wire Road	Pavement	Resurfacing	Givhans Ferry Road to I-95	Unincorporated	15.56
24	D-15	7-Mile Road	Pavement	Resurfacing	US-15 to First Bend Road	Unincorporated	7.45
25	D-16	Second Bend Road	Pavement	Resurfacing	Greenhill Road to US-178	Unincorporated	1.32
INTERSECTION							
26	B-03	SC-45 & SC-41	Traffic Control	Install Signal	-	Jamestown	-
27	B-04	US-176 & Mudville Road	Safety	Improve Geometry; Install Caution Light	-	Unincorporated	-
28	B-05	US-52 & SC-402	Safety; Capacity	Implement Left Phasing; Improve Line-of-Sight; Upgrade Striping; Add Right Lane	-	Unincorporated	-
29	C-08	US-17 & Seewee Road	Traffic Control	Install Traffic Signal	-	Awendaw	-
30	C-09	US-17 & S. Doar Road	Safety	Install Caution Light	-	Awendaw	-
31	C-10	US-17 & Pinckney Street	Traffic Control	Install Traffic Signal	-	McClellanville	-
32	C-11	SC-162 & Towles Road	Capacity	Add Left Turn Lanes	-	Hollywood	-
33	C-12	SC-162 & Gibson Road	Capacity	Add Left Turn Lanes	-	Hollywood	-
34	C-13	SC-162 & New Road	Capacity	Add Left Turn Lanes	-	Hollywood	-
35	C-14	SC-162 & Dixie Plantation Road/Bryan Road	Safety	Redesign	-	Hollywood	-
36	C-15	SC-162 & Baptist Hill Road	Safety	Add Left Turn Lanes	-	Hollywood	-
37	C-16	SC-165 & SC-162	Safety	Implement Left Phasing; Upgrade Striping	-	Hollywood	-
38	C-17	SC-164 & SC-174	Safety	Improve Line-of-Sight	-	Hollywood	-
39	C-18	US-17 & SC-165	Safety	Implement Left Phasing; Upgrade Striping	-	Ravenel	-
40	C-19	US-17 & SC-162	Safety	Improve Line-of-Sight	-	Ravenel	-
41	C-20	US-17 & New Road	Safety	Add Islands	-	Ravenel	-
42	C-21	US-17 & Old Jacksonboro Road	Safety	Realignment	-	Ravenel	-
43	C-22	SC-165 & County Line Road	Safety	Improve Line-of-Sight	-	Unincorporated	-
44	C-23	US-17 & Parkers Ferry Road	Safety	Improve Line-of-Sight	-	Unincorporated	-
45	C-24	US-17 & SC-174	Safety	Improve Line-of-Sight	-	Unincorporated	-
46	D-17	US-178 & First Bend Road	Safety	Increase Turning Radius	-	Harleyville	-
47	D-18	US-178 & Second Bend Road	Safety	Increase Turning Radius	-	Harleyville	-
48	D-19	US-178 & Hill Street	Safety	Increase Turning Radius	-	Harleyville	-
49	D-20	S. Railroad Avenue & Creighton Street	Safety	Increase Turning Radius	-	Harleyville	-
50	D-21	US-78 & Rigby Street	Traffic Control	Install Traffic Signal	-	Reevesville	-

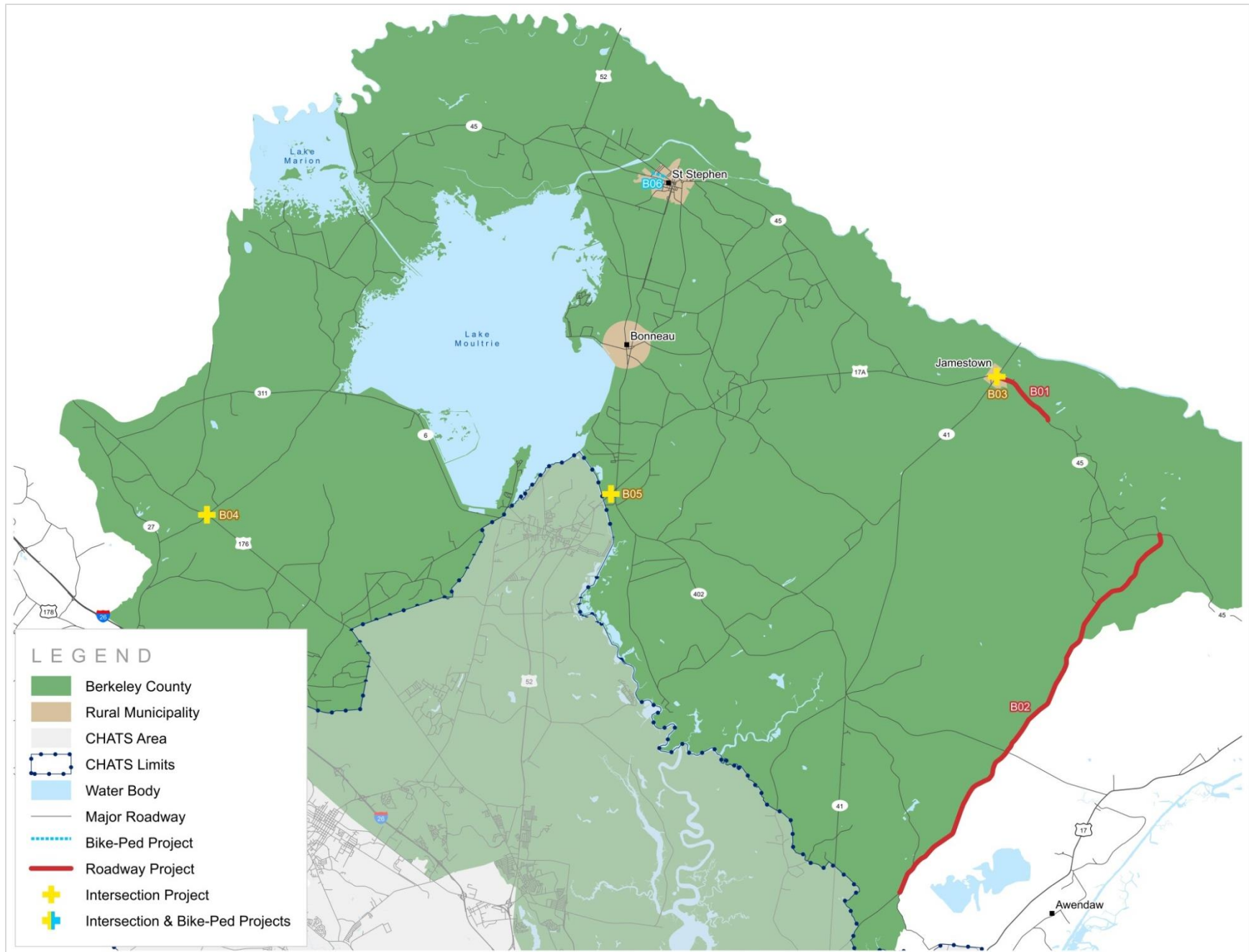
Table 3.2 – Visionary Projects (Continued)

#	Project ID	Facility	Improvement Category	Potential Improvement(s)	Delimits	Location	Length (Miles)
INTERSECTION							
51	D-22	SC-27 & S. Railroad Avenue	Safety	Increase Turning Radius	-	Ridgeville	-
52	D-23	US-78 & SC-27	Traffic Control	Install Traffic Signal	-	Ridgeville	-
53	D-24	Frontage Road & Flying J Driveway	Safety	Improve Geometry	-	St. George	-
BIKE-PED							
54	B-06	SC-45	Bike-Ped	Implement Multi-Use Path	Park Avenue to Graham Street	St. Stephen	0.62
55	C-25	SC-162	Bike-Ped	Provide Bike Lane	(Town Limits)	Hollywood	10.19
56	C-26	SC-165	Bike-Ped	Provide Bike Lane	(Town Limits)	Hollywood	1.88
57	C-27	SC-165	Bike-Ped	Implement Multi-Use Path	SC-162 to Town Council Road	Hollywood	0.30
58	C-28	SC-165 & SC-162	Bike-Ped	Provide Sidewalk Provide Crosswalk	-	Hollywood	-
59	C-29	SC-165	Bike-Ped	Implement Multi-Use Path	Town Council Road to Meggett Quail Road	Hollywood/Meggett	1.11
60	C-30	US-17 & SC-165	Bike-Ped	Provide Sidewalk Provide Crosswalk	-	Ravenel	-
61	D-25	SC-453/Judge Street	Bike-Ped	Provide Sidewalk	Winfield Apartments Driveway to US-178	Harleyville	0.14
62	D-26	S. Railroad Avenue	Bike-Ped	Provide Crosswalk	Near Community Park	Harleyville	0.24
63	D-27	US-178 & Kate Street/Railroad Avenue	Bike-Ped	Provide Crosswalk	-	Harleyville	-
64	D-28	US-78	Bike-Ped	Provide Sidewalk	Townhall to Rigby Street	Reevesville	0.17
65	D-29	Rigby Street	Bike-Ped	Extend/Provide Sidewalk	Baptist Church to Post Office	Reevesville	0.20
66	D-30	US-78	Bike-Ped	Provide Sidewalk	Arlington Street to Academy Road	St. George	0.78
67	D-31	Academy Road	Bike-Ped	Provide Sidewalk	US-78 to Britt Green Road	St. George/ Unincorporated	0.72

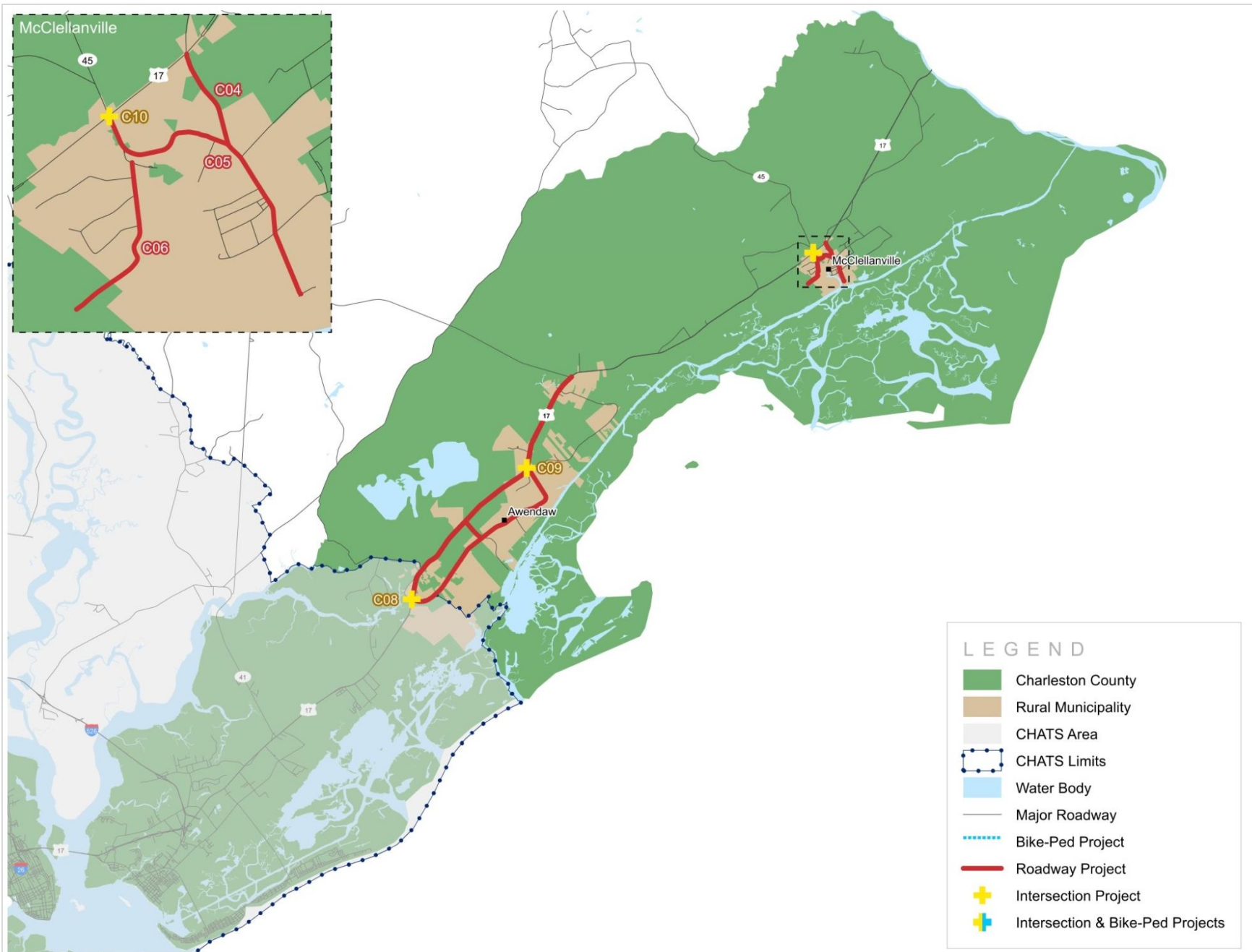
Map 3.2 – Visionary Projects



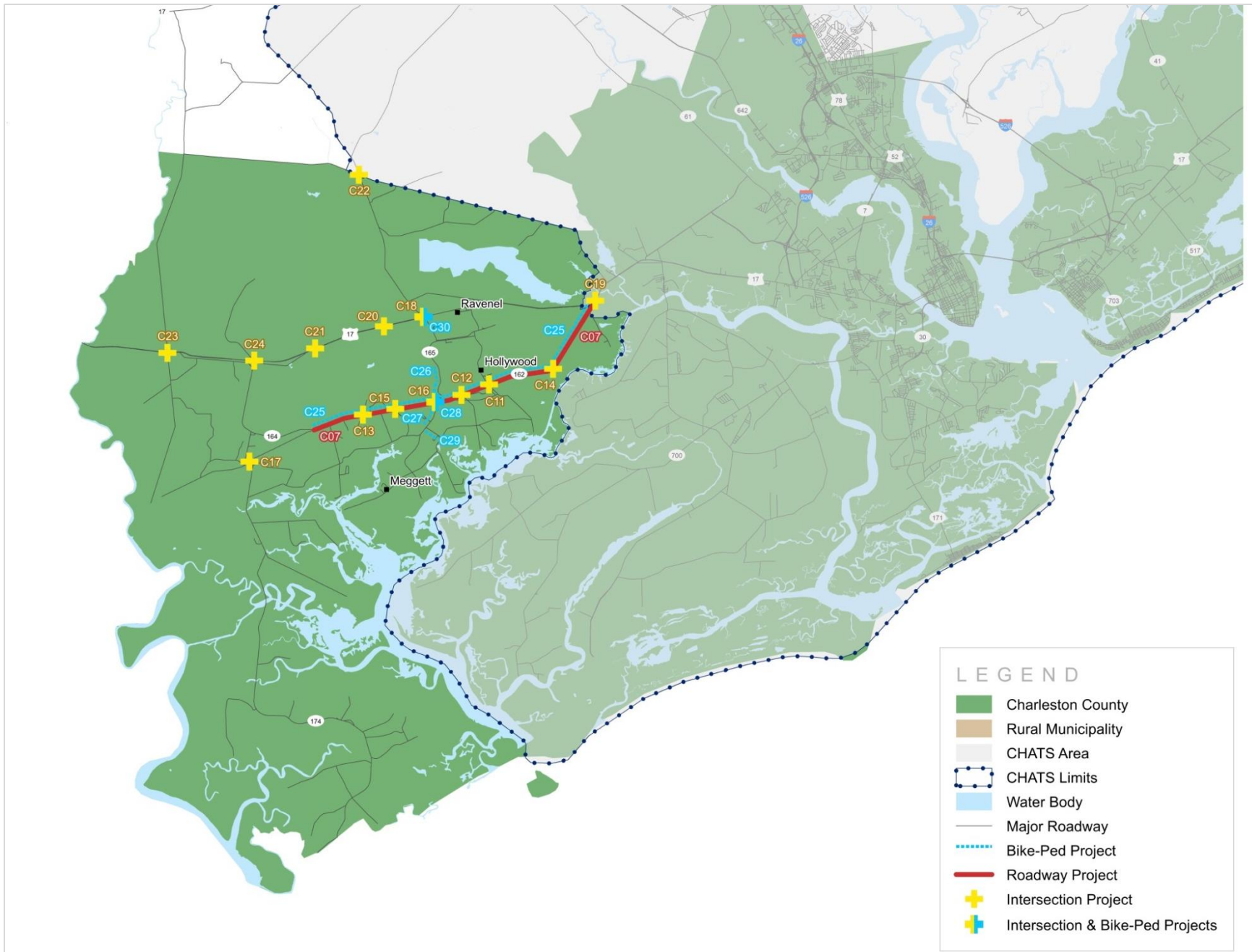
Map 3.3 – Visionary Projects in Berkeley County



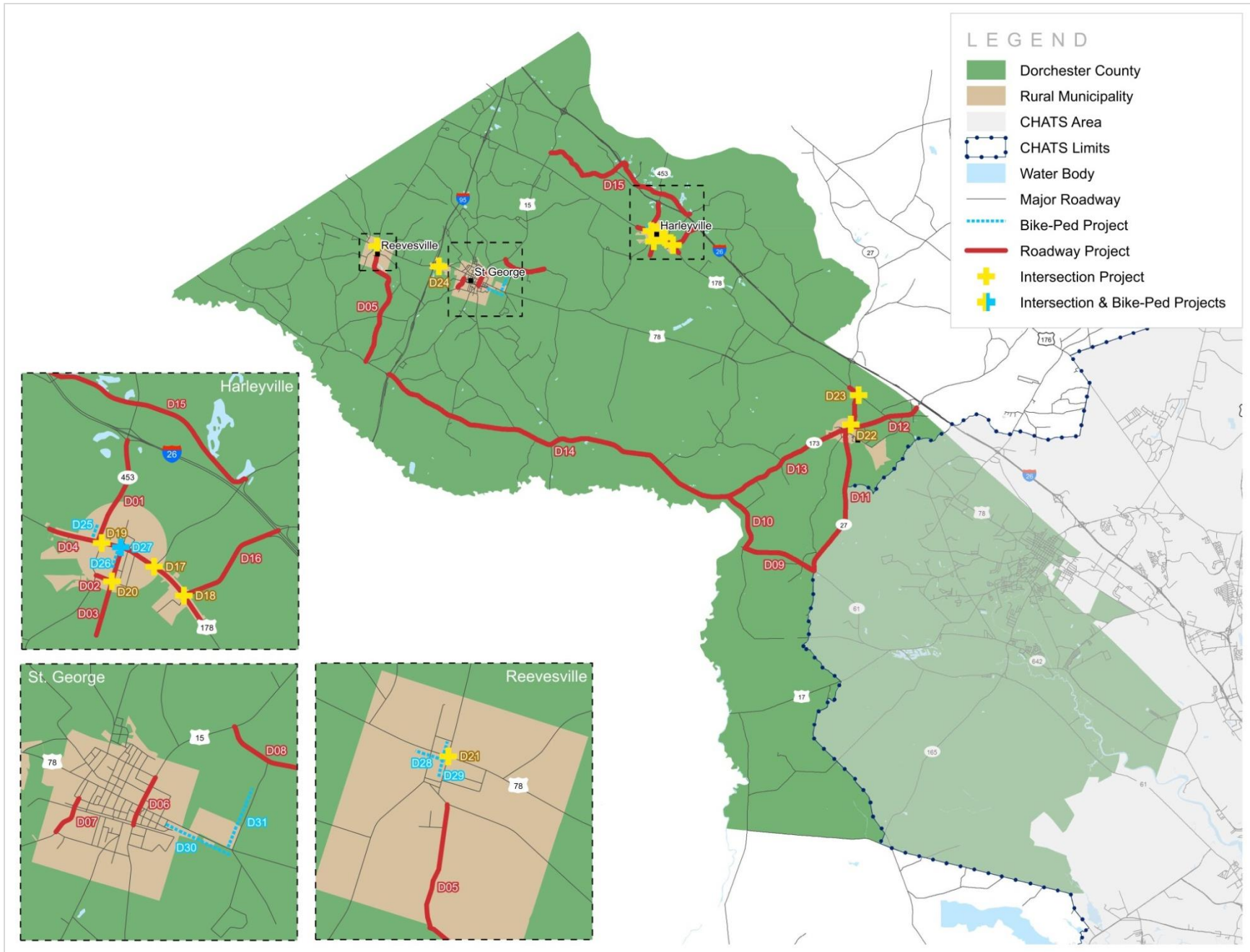
Map 3.4 – Visionary Projects in Eastern Charleston County



Map 3.5 – Visionary Projects in Western Charleston County



Map 3.6 – Visionary Projects in Dorchester County





Project Evaluation

CHAPTER 4

Criteria
Scoring Process
Prioritization

4.1 Criteria

For purposes of undertaking a seamless evaluation and prioritization process, the projects were grouped and scored against a set of shared criteria. The criteria were based on State Act 114 and in accordance with SCDOT policy and guidance. In addition, the criteria were consistent with those incorporated in the 2040 CHATS LRTP. Members of jurisdictions and the Rural Transportation Study Committee were given the opportunity to deliberate key factors governing each criterion and recommend priority levels and relative weights:

PRIORITY 1	Existing Infrastructure	20% Weight
PRIORITY 2	Traffic Congestion	15% Weight
PRIORITY 3	Safety	15% Weight
PRIORITY 4	Natural Environment & Socio-Economic Impacts	10% Weight
PRIORITY 5	Transit	10% Weight
Priority 6	Walking/Bicycling	5% Weight
Priority 7	Economic Development	5% Weight
Priority 8	Land Use	5% Weight
Priority 9	Financial Viability	5% Weight
Priority 10	Evacuation Routes	5% Weight
Priority 11	Freight Mobility	5% Weight

4.2 Scoring Process

Table 4.1 below summarizes the scoring methodology incorporated in the project evaluation process.

Table 4.1 – Summary of Scoring Process

CRITERIA	Weight	Performance Area	Performance Measure(s)	Max Points	Points Breakdown
Improves EXISTING INFRASTRUCTURE	20%	Pavement Condition	Percent of pavements on Interstate and non-Interstate systems in Good, Fair, and Poor conditions	20 Points	PQI 0.0 - 2.6 Poor = 20 PQI 2.7 - 3.3 Fair = 10 PQI 3.4 - 5.0 Good = 5
Relieves TRAFFIC CONGESTION	15%	Traffic Volume	Projected daily level-of-service (LOS) ¹	15 Points	LOS A = 0; LOS B = 0; LOS C = 5 LOS D = 5; LOS E = 10; LOS F = 15
Addresses SAFETY	15%	Injuries and Fatalities	- Number of fatalities - Number of serious injuries - Number of non-motorized user fatalities and serious injuries	15 Points	High fatal/serious injury crash location = 5 High NMU fatal/serious injury location = 5 High crash location = 5
Minimizes NATURAL ENVIRONMENT & SOCIO-ECONOMIC IMPACTS	10%	Impacts to Social, Natural, and Cultural Resources, and Vulnerable Populations	- Intersects Census Block Groups with over 50% Low-Moderate Income (LMI) population and over 50% Minority population - Proximity to endangered species, wetlands, floodplains, and protected lands - Proximity to parklands, archaeological sites, and historic sites	10 Points	LMI Population = 1.5; Minority Population = 1.5 Endangered Species = 1; Wetlands = 1; Floodplains = 1; Protected Lands = 1; Parklands = 1; Drinking Water Sources = 0.5; OCRM Critical Areas = 0.5; Historic Sites = 0.5; Archaeological Sites = 0.5
Supports TRANSIT	10%	Service Accessibility	- Align or intersect with bus routes - Bus service frequency	10 Points	No Service within 0.25 Miles = 0 At least 1 Bus/Peak Hour within 0.25 Miles = 5 At least 2 Buses/Peak Hour within 0.25 Miles = 10
Supports WALKING/BICYCLING	5%	Upgrade or expand bicycle and pedestrian networks	- Upgrade or expansion of bike/ped network - Supports regional WalkBike Plan network - Access to transit, parks, schools, disadvantaged population	5 Points	Upgrade/Gap = 1; New/Expansion = 1; WalkBike Plan = 1; Transit = 0.5; Parks = 0.5; Schools = 0.5; Disadvantaged Population = 0.5
Supports ECONOMIC DEVELOPMENT	5%	Impact to Local Economy	- Accessibility to employment centers - Directly benefits regional freight mobility	5 Points	Employment Accessibility = 2.5 Freight Mobility = 2.5
Supports LAND USE	5%	Local existing and future land use	Supports local land use or area plans	5 Points	Supports Existing/Future Land Use = 2.5 Supports Comprehensive Plans = 2.5
FINANCIAL VIABILITY	5%	Project Cost Estimate	Total capital investment (per Y2020 \$\$)	5 Points	Viability represented as a ratio of Project Cost and Total Cost of All Projects, Normalized on a scale of 1-5
Supports EVACUATION ROUTES	5%	SCDOT-recognized hurricane evacuation routes	Location supports an evacuation route	5 Points	Is an Evacuation Route = 5 Not an Evacuation Route = 0
Improves FREIGHT MOBILITY	5%	Truck Traffic	Current daily truck traffic volumes	5 Points	High Mobility = 5 Low Mobility = 0

Existing Infrastructure: The condition of existing infrastructure, specifically roadways, was evaluated for each proposed project based on Pavement Quality Index (PQI) rating provided by the SCDOT. The ratings are determined by assessing the condition of roadways against rutting, roughness, and distress (i.e. cracking and raveling) of the pavement. The PQI data is classified by Interstate, Primary, and Secondary roadway systems with the following ratings assigned to each numeric range:

- Poor (Reconstruction Range): 0.0 - 2.6 (20 points)
- Fair (Rehabilitation Range): 2.7 - 3.3 (10 points)
- Good (Preservation Range): 3.4 - 5.0 (5 points)

For projects that cover multiple segments of a roadway or multiple legs of an intersection with different PQI scores, an average score was estimated and applied to the project. For example, the Second Bend Road resurfacing project covered two segments with PQI scores of 1.78 and 2.07 so the average of 1.98 was used to evaluate the project's existing infrastructure. In instances where PQI data was unavailable, the rating of the closest street of similar facility type was applied.



Traffic Congestion: Projects were evaluated based on quantifying the degree of projected congestion under daily traffic conditions on respective roadway segments. Forecasted daily levels of service (LOS) for segments that constituted the projects were extracted from the current CHATS Travel Demand Model wherever available. In the absence of traffic forecasts for project segments not included in the model or located outside the model analysis area, model-estimated demographic growth of the local area (i.e. traffic analysis zone/TAZ) was applied to existing daily traffic counts from SCDOT to determine their LOS. Project segments with the lowest LOS rating of F received a maximum score of 15 points.

Safety: Projects were evaluated based on its potential to address or improve system safety for all road users. Using geo-located crash data provided by the South Carolina Department of Public Safety (SCDPS) for the period 2014-17, projects were awarded points for a maximum of 15 points, if the crash data recorded at least one:

- Fatal or serious injury crash at the project location (5 points)
- Non-motorized user (NMU) fatal or serious injury crash at the project location (5 points)
- Injury crash (non-fatal or non-serious) at the project location (5 points)

Intersection projects were assigned all injury crashes located within a 250 feet radius of the center of the intersection. Roadway projects were assigned all injury crashes located along the project segment.

Natural Environment and Socio-Economics: The environmental impact of each project was primarily determined based upon their proximity to the study feature identified under Performance Measures in [Table 4.1](#) corresponding to this evaluation criterion. ArcGIS software was used to determine if

any overlap existed between the environmental features and proximity buffers that were created for each project by category (i.e. roadway, intersection, and bike-ped). Roadway projects were evaluated based on 100-foot linear buffer on each side of the roadway and intersection projects were evaluated based on circular buffers with 250-foot radius. Only projects that involved significant facility upgrades or new construction were considered for scoring. Because of the burdens associated with roadway construction projects, the evaluation also had an environmental justice element in which projects were negatively scored if they intersected a Census Block with greater than 50% Low-Moderate Income (LMI) and/or minority population concentrations.



Transit: Projects were awarded points if they enabled the functioning of existing Tri-County Link and CARTA transit routes or improved accessibility to them. Quarter-mile buffers were used to evaluate both intersection and roadway projects. Projects located within one quarter-mile of a transit route were given 5 points if the route had a frequency of one bus per peak hour and

10 points if the route had a frequency of two or more buses per peak hour. Projects not in the vicinity of any transit service within a quarter-mile range were not awarded any points. Because the projects fall outside the purview of CHATS, they were mainly supportive of the Tri-County Link system although a few projects were also supportive of the CARTA system.

Walk-Bike: Existing and recommended bicycle and pedestrian networks were reviewed to determine whether the projects improve or provide access for bicyclists and pedestrians. The “Upgrade/Gap” measure represents improvements that enhance existing facilities and the “Expansion/New” measure represents improvements that expand upon existing facilities or develop entirely new facilities that augment existing bicycle and pedestrian infrastructure. Projects that constituted roadway segments included in the *Walk+Bike BCD* regional plan were awarded points. In addition, projects located in close proximity to transit routes, parks, schools, and/or disadvantaged population groups (either LMI or minority) were also awarded points.

Economic Development: The Employment Accessibility measure of the economic development evaluation was contingent on the locations of major employers (with at least 50 employees) as well as industrial sites in the study area. These locations were used to assess the potential economic impact of proposed projects, and points were awarded based on projects providing direct connectivity to such key employment centers or present in their vicinity. Per the most-recent employment forecasts available with the BCDCOG, the study area is anticipated to experience little or no growth through Year 2040 and for that reason the evaluation was based entirely on existing employment conditions. The Freight Mobility scores for this portion of the evaluation were imported directly from Freight evaluation described in the following section.

Land Use: The main objective in performing land use evaluation was to score projects proposed in areas where planned land use is anticipated to spur new economic activity. Comprehensive plans from member counties and local municipalities served as the guiding documents for governing land use evaluation. There were two ways in which projects earned points for supporting land use: by being specifically referenced in a comprehensive plan; and/or by supporting any known existing or future commercial and industrial land uses. In addition to the comprehensive plans, master development plans as well as the BCDCOG staff's local knowledge of land use were also key determinants in completing the land use evaluation.

Financial Viability: The financial viability of a project was based on the consideration of the cost of an individual project in comparison to the total or aggregate cost of all projects being evaluated (Visionary projects). The resulting project cost ratios for all projects were then normalized on a scale of 1-5 where a project with a larger cost ratio (higher comparative cost) received a lower overall criteria score and vice versa.

Evacuation Routes: Projects were awarded points if they align with or intersect, and therefore support, the SCDOT's designated hurricane evacuation routes.

Freight Mobility: Traffic data from Year 2015 was used to determine the magnitude of freight mobility on project roadways. Average daily truck traffic estimates were compared with total average daily traffic (ADT) to determine the percentage of truck flows on roadways where proposed projects were located. Any project located on a roadway where trucks accounted for at least 10% of the ADT were rated as having "High" freight mobility. The primary data source for the ADT was the CHATS Travel Demand Model; however, data from the SCDOT Statewide Travel Demand Model were also utilized for evaluating roadways that were not part of the CHATS Model.

4.3 Prioritization

Projects were prioritized and ranked based on their overall weighted score. [Table 4.2](#) on the following table presents the scoring and ranking of all projects collectively, while subsequent tables ([Table 4.3](#), [Table 4.4](#), and [Table 4.5](#)) present project rankings grouped by project category (See *Legend on Page 60*).

Table 4.2 – Evaluation Summary of Visionary Projects

#	Project ID	Facility	Improvement Category	Location	Length (Miles)	EVALUATION CRITERIA											Weighted Score	Project Ranking
						Existing Infrastructure	Traffic Congestion	Safety	Environment Impacts	Transit	Walking/Bicycling	Economic Development	Land Use	Financial Viability	Evacuation Routes	Freight Mobility		
WEIGHT →						20%	15%	15%	10%	10%	5%	5%	5%	5%	5%	5%	100%	
1	C-18	US-17 & SC-165	Safety	Ravenel	-	20	15	10	0.5	5	2.5	5	0	4	5	5	9.291	1
2	C-30	US-17 & SC-165	Bike-Ped	Ravenel	-	20	15	10	1.5	5	2.5	0	5	5	0	0	8.722	2
3	C-20	US-17 & New Road	Safety	Ravenel	-	20	15	10	1.5	0	2.5	5	0	4	5	5	8.691	3
4	C-07	SC-162	Pavement	Hollywood	13.30	20	5	15	2	10	3.5	2.5	5	2	5	0	8.676	4
5	B-05	US-52 & SC-402	Safety, Capacity	Unincorporated	-	20	5	10	2	10	1.5	5	0	5	5	5	8.115	5
6	D-12	SC-173 (Myers Mayo Road)	Pavement	Unincorporated	2.93	20	15	5	3	5	2.5	2.5	2.5	4	5	0	8.023	6
7	C-26	SC-165	Bike-Ped	Hollywood	1.88	20	5	10	3.5	10	3	2.5	5	4	0	0	7.629	7
8	C-12	SC-162 & Gibson Road	Capacity	Hollywood	-	20	5	10	0.5	5	1.5	5	0	5	0	5	7.514	8
9	C-16	SC-165 & SC-162	Safety	Hollywood	-	20	5	5	0.5	5	2	5	5	4	5	5	7.266	9
10	D-22	SC-27 & S. Railroad Avenue	Safety	Ridgeville	-	20	15	5	4	0	2.5	2.5	2.5	4	0	0	7.185	10
11	C-14	SC-162 & Dixie Plantation/Bryan Road	Safety	Hollywood	-	20	5	10	1	5	1.5	2.5	0	4	0	0	7.025	11
12	C-27	SC-165	Bike-Ped	Hollywood	0.30	20	5	5	3	10	3	2.5	5	5	0	0	6.963	12
13	C-23	US-17 & Parkers Ferry Road	Safety	Unincorporated	-	20	0	10	2.5	5	3	2.5	2.5	4	5	5	6.826	13
14	C-28	SC-165 & SC-162	Bike-Ped	Hollywood	-	20	5	5	2.5	10	1.5	0	5	5	0	0	6.822	14
15	C-29	SC-165	Bike-Ped	Hollywood/Meggett	1.11	20	5	5	4	10	3	2.5	5	3	0	0	6.794	15
16	B-04	US-176 & Mudville Road	Safety	Unincorporated	-	20	0	10	2.5	5	1.5	2.5	0	4	5	5	6.663	16
17	C-10	US-17 & Pinckney Street	Traffic Control	McClellanville	-	20	0	10	3	5	1.5	2.5	0	5	5	5	6.643	17
18	D-11	SC-27 (Ridgeville Road)	Pavement	Unincorporated	7.83	5	15	15	3	5	2	2.5	5	3	5	0	6.573	18
19	D-15	7-Mile Road	Pavement	Unincorporated	7.45	20	0	10	1.5	0	1.5	5	5	3	5	5	6.556	19
20	C-15	SC-162 & Baptist Hill Road	Safety	Hollywood	-	20	0	10	2	5	3	2.5	0	5	0	0	6.308	20
21	D-24	Frontage Road & Flying J Driveway	Safety	St. George	-	20	0	10	2.5	0	1.5	5	5	4	0	5	6.283	21
22	C-24	US-17 & SC-174	Safety	Unincorporated	-	20	0	5	3.5	5	3	2.5	0	4	5	5	5.851	22
23	D-14	Wire Road	Pavement	Unincorporated	15.56	20	0	10	3	0	1.5	5	0	1	0	5	5.825	23
24	D-19	US-178 & Hill Street	Safety	Harleyville	-	20	0	5	3.5	0	2.5	5	5	4	5	5	5.737	24
25	C-25	SC-162	Bike-Ped	Hollywood	10.19	20	5	0	5	10	3.5	2.5	2.5	1	0	0	5.725	25
26	D-31	Academy Road	Bike-Ped	St. George/Unincorporated	0.72	20	0	5	3	5	2	2.5	5	4	0	0	5.644	26
27	D-06	US-15/N. Parler Avenue	Widening	St. George	0.92	20	0	5	4	5	3.5	2.5	5	4	0	0	5.622	27
28	D-07	S. Metts Street	Widening	St. George	0.46	20	0	5	3	5	2	2.5	5	4	0	0	5.621	28
29	C-22	SC-165 & County Line Road	Safety	Unincorporated	-	10	15	10	4.5	0	1.5	0	0	4	0	0	5.589	29
30	D-16	Second Bend Road	Pavement	Unincorporated	1.32	20	0	5	3	0	2.5	5	0	5	5	5	5.555	30
31	C-19	US-17 & SC-162	Safety	Ravenel	-	10	15	0	2.5	5	1.5	5	0	4	5	5	5.541	31
32	D-30	US-78	Bike-Ped	St. George	0.78	20	0	5	5.5	5	3	2.5	5	5	0	0	5.454	32
33	D-04	US-178	Safety, Traffic Control	Harleyville	1.80	20	0	5	3	0	2.5	2.5	5	5	5	0	5.450	33
34	D-03	S. Railroad Avenue	Pavement	Harleyville	1.00	20	0	5	3	0	2.5	2.5	5	5	5	0	5.435	34
35	C-17	SC-164 & SC-174	Safety	Hollywood	-	20	0	5	4	5	1.5	0	0	4	5	0	5.391	35

Table 4.2 – Evaluation Summary of Visionary Projects (Continued)

#	Project ID	Facility	Improvement Category	Location	Length (Miles)	EVALUATION CRITERIA											Weighted Score	Project Ranking
						Existing Infrastructure	Traffic Congestion	Safety	Environment Impacts	Transit	Walking/Bicycling	Economic Development	Land Use	Financial Viability	Evacuation Routes	Freight Mobility		
WEIGHT →						20%	15%	15%	10%	10%	5%	5%	5%	5%	5%	5%	100%	
36	D-21	US-78 & Rigby Street	Traffic Control	Reevesville	-	20	0	5	1.5	0	2.5	2.5	0	5	0	5	5.343	36
37	D-05	Whetsell Street/Cross Creek Road	Traffic Control	Reevesville	5.87	20	0	5	1.5	0	1.5	2.5	0	5	0	5	5.299	37
38	D-23	US-78 & SC-27	Traffic Control	Ridgeville	-	5	10	10	3	5	2	2.5	5	5	5	0	5.170	38
39	D-08	Spring Road	Pavement	Unincorporated	1.80	20	0	5	3	0	1.5	2.5	5	4	0	0	5.122	39
40	D-26	S. Railroad Avenue	Bike-Ped	Harleyville	0.24	20	0	5	3.5	0	1.5	2.5	5	5	0	0	5.093	40
41	D-20	S. Railroad Avenue & Creighton Street	Safety	Harleyville	-	20	0	5	4	0	1.5	2.5	5	4	0	0	5.009	41
42	D-13	Ridge Road	Pavement	Unincorporated	5.66	20	0	5	3	0	3	2.5	2.5	3	0	0	4.999	42
43	D-17	US-178 & First Bend Road	Safety	Harleyville	-	20	0	0	4	0	2.5	5	5	4	5	5	4.939	43
44	C-08	US-17 & Seewee Road	Traffic Control	Awendaw	-	10	0	10	0	5	1	5	2.5	5	0	5	4.917	44
45	D-18	US-178 & Second Bend Road	Safety	Harleyville	-	20	0	0	4.5	0	2.5	5	5	4	5	5	4.887	45
46	C-21	US-17 & Old Jacksonboro Road	Safety	Ravenel	-	20	0	0	2.5	0	1.5	5	2.5	4	5	5	4.876	46
47	C-02	US-17	Traffic Control	Awendaw	9.63	10	0	10	0	5	1.5	2.5	5	5	0	0	4.698	47
48	C-03	Seewee Road	Traffic Control	Awendaw	7.14	10	0	10	0	5	3	2.5	0	5	0	0	4.524	48
49	D-02	Creighton Street	Pavement	Harleyville	0.19	20	0	0	3	0	1.5	2.5	5	5	0	0	4.398	49
50	D-27	US-178 & Kate Street/Railroad Avenue	Bike-Ped	Harleyville	-	20	0	0	3.5	0	2.5	2.5	5	5	0	0	4.393	50
51	D-09	SC-61	Pavement	Unincorporated	3.06	10	5	5	3	0	2	5	2.5	4	5	5	4.371	51
52	D-29	Rigby Street	Bike-Ped	Reevesville	0.20	20	0	0	2	0	2.5	0	0	5	0	0	4.166	52
53	B-02	Halfway Creek Road	Pavement	Unincorporated	19.01	10	0	10	3	5	2.5	0	0	1	5	0	4.125	53
54	D-28	US-78	Bike-Ped	Reevesville	0.17	20	0	0	2	0	1.5	0	0	5	0	0	4.122	54
55	C-09	US-17 & S. Doar Road	Safety	Awendaw	-	10	0	5	0	5	1	5	0	5	0	5	4.049	55
56	C-11	SC-162 & Towles Road	Capacity	Hollywood	-	10	0	5	0.5	5	1.5	5	0	5	0	5	4.014	56
57	B-01	SC-45	Pavement	Jamestown	2.87	10	0	5	3	5	2	0	2.5	4	5	0	3.624	57
58	C-13	SC-162 & New Road	Capacity	Hollywood	-	10	0	5	2	5	2	2.5	0	5	0	0	3.514	58
59	D-10	Givhans Ferry Road	Pavement	Unincorporated	2.58	5	0	10	3	0	1.5	5	0	4	0	5	2.980	59
60	C-06	Kit Hall Road	Traffic Control	McClellanville	0.98	5	0	5	1.5	5	3.5	2.5	0	5	0	0	2.650	60
61	B-03	SC-45 & SC-41	Traffic Control	Jamestown	-	5	0	5	3	5	2	0	0	5	5	0	2.548	61
62	C-05	Pinckney Street	Traffic Control	McClellanville	1.78	5	0	5	3	5	3.5	2.5	0	5	0	0	2.500	62
63	B-06	SC-45	Bike-Ped	St. Stephen	0.62	5	0	5	4.5	5	4	2.5	0	4	0	0	2.342	63
64	D-25	SC-453/Judge Street	Bike-Ped	Harleyville	0.14	5	0	5	3	0	2.5	2.5	5	5	0	0	2.194	64
65	D-01	SC-453	Pavement	Harleyville	1.19	5	0	5	3	0	1.5	2.5	5	5	0	0	2.132	65
66	C-04	N. Pinckney Street	Traffic Control	McClellanville	0.56	5	0	0	3	5	2	2.5	0	5	0	0	1.675	66
67	C-01	Bulls Island Road Extension	New Roadway	Awendaw	0.83	5	0	0	3	5	2	2.5	2.5	1	0	0	1.600	67

Project Category

- Roadway
- Intersection
- Bike-Ped

Table 4.3 – Ranked Visionary Roadway Projects

#	Project ID	Facility	Improvement Category	Location	Length (Miles)	EVALUATION CRITERIA											Weighted Score	Project Ranking
						Existing Infrastructure	Traffic Congestion	Safety	Environment Impacts	Transit	Walking/Bicycling	Economic Development	Land Use	Financial Viability	Evacuation Routes	Freight Mobility		
WEIGHT →						20%	15%	15%	10%	10%	5%	5%	5%	5%	5%	5%	100%	
1	C-07	SC-162	Pavement	Hollywood	13.30	20	5	15	2	10	3.5	2.5	5	2	5	0	8.676	4
2	D-12	SC-173 (Myers Mayo Road)	Pavement	Unincorporated	2.93	20	15	5	3	5	2.5	2.5	2.5	4	5	0	8.023	6
3	D-11	SC-27 (Ridgeville Road)	Pavement	Unincorporated	7.83	5	15	15	3	5	2	2.5	5	3	5	0	6.573	18
4	D-15	7-Mile Road	Pavement	Unincorporated	7.45	20	0	10	1.5	0	1.5	5	5	3	5	5	6.556	19
5	D-14	Wire Road	Pavement	Unincorporated	15.56	20	0	10	3	0	1.5	5	0	1	0	5	5.825	23
6	D-06	US-15/N. Parler Avenue	Widening	St. George	0.92	20	0	5	4	5	3.5	2.5	5	4	0	0	5.622	27
7	D-07	S. Metts Street	Widening	St. George	0.46	20	0	5	3	5	2	2.5	5	4	0	0	5.621	28
8	D-16	Second Bend Road	Pavement	Unincorporated	1.32	20	0	5	3	0	2.5	5	0	5	5	5	5.555	30
9	D-04	US-178	Safety, Traffic Control	Harleyville	1.80	20	0	5	3	0	2.5	2.5	5	5	5	0	5.450	33
10	D-03	S. Railroad Avenue	Pavement	Harleyville	1.00	20	0	5	3	0	2.5	2.5	5	5	5	0	5.435	34
11	D-05	Whetsell Street/Cross Creek Road	Traffic Control	Reevesville	5.87	20	0	5	1.5	0	1.5	2.5	0	5	0	5	5.299	37
12	D-08	Spring Road	Pavement	Unincorporated	1.80	20	0	5	3	0	1.5	2.5	5	4	0	0	5.122	39
13	D-13	Ridge Road	Pavement	Unincorporated	5.66	20	0	5	3	0	3	2.5	2.5	3	0	0	4.999	42
14	C-02	US-17	Traffic Control	Awendaw	9.63	10	0	10	0	5	1.5	2.5	5	5	0	0	4.698	47
15	C-03	Seewee Road	Traffic Control	Awendaw	7.14	10	0	10	0	5	3	2.5	0	5	0	0	4.524	48
16	D-02	Creighton Street	Pavement	Harleyville	0.19	20	0	0	3	0	1.5	2.5	5	5	0	0	4.398	49
17	D-09	SC-61	Pavement	Unincorporated	3.06	10	5	5	3	0	2	5	2.5	4	5	5	4.371	51
18	B-02	Halfway Creek Road	Pavement	Unincorporated	19.01	10	0	10	3	5	2.5	0	0	1	5	0	4.125	53
19	B-01	SC-45	Pavement	Jamestown	2.87	10	0	5	3	5	2	0	2.5	4	5	0	3.624	57
20	D-10	Givhans Ferry Road	Pavement	Unincorporated	2.58	5	0	10	3	0	1.5	5	0	4	0	5	2.980	59
21	C-06	Kit Hall Road	Traffic Control	McClellanville	0.98	5	0	5	1.5	5	3.5	2.5	0	5	0	0	2.650	60
22	C-05	Pinckney Street	Traffic Control	McClellanville	1.78	5	0	5	3	5	3.5	2.5	0	5	0	0	2.500	62
23	D-01	SC-453	Pavement	Harleyville	1.19	5	0	5	3	0	1.5	2.5	5	5	0	0	2.132	65
24	C-04	N. Pinckney Street	Traffic Control	McClellanville	0.56	5	0	0	3	5	2	2.5	0	5	0	0	1.675	66
25	C-01	Bulls Island Road Extension	New Roadway	Awendaw	0.83	5	0	0	3	5	2	2.5	2.5	1	0	0	1.600	67

Table 4.4 – Ranked Visionary Intersection Projects

#	Project ID	Facility	Improvement Category	Location	Length (Miles)	EVALUATION CRITERIA											Weighted Score	Project Ranking	
						Existing Infrastructure	Traffic Congestion	Safety	Environment Impacts	Transit	Walking/Bicycling	Economic Development	Land Use	Financial Viability	Evacuation Routes	Freight Mobility			
WEIGHT →						20%	15%	15%	10%	10%	5%	5%	5%	5%	5%	5%	5%	100%	
26	C-18	US-17 & SC-165	Safety	Ravenel	-	20	15	10	0.5	5	2.5	5	0	4	5	5	9,291	1	
27	C-20	US-17 & New Road	Safety	Ravenel	-	20	15	10	1.5	0	2.5	5	0	4	5	5	8,691	3	
28	B-05	US-52 & SC-402	Safety, Capacity	Unincorporated	-	20	5	10	2	10	1.5	5	0	5	5	5	8,115	5	
29	C-12	SC-162 & Gibson Road	Capacity	Hollywood	-	20	5	10	0.5	5	1.5	5	0	5	0	5	7,514	8	
30	C-16	SC-165 & SC-162	Safety	Hollywood	-	20	5	5	0.5	5	2	5	5	4	5	5	7,266	9	
31	D-22	SC-27 & S. Railroad Avenue	Safety	Ridgeville	-	20	15	5	4	0	2.5	2.5	2.5	4	0	0	7,185	10	
32	C-14	SC-162 & Dixie Plantation/Bryan Road	Safety	Hollywood	-	20	5	10	1	5	1.5	2.5	0	4	0	0	7,025	11	
33	C-23	US-17 & Parkers Ferry Road	Safety	Unincorporated	-	20	0	10	2.5	5	3	2.5	2.5	4	5	5	6,826	13	
34	B-04	US-176 & Mudville Road	Safety	Unincorporated	-	20	0	10	2.5	5	1.5	2.5	0	4	5	5	6,663	16	
35	C-10	US-17 & Pinckney Street	Traffic Control	McClellanville	-	20	0	10	3	5	1.5	2.5	0	5	5	5	6,643	17	
36	C-15	SC-162 & Baptist Hill Road	Safety	Hollywood	-	20	0	10	2	5	3	2.5	0	5	0	0	6,308	20	
37	D-24	Frontage Road & Flying J Driveway	Safety	St. George	-	20	0	10	2.5	0	1.5	5	5	4	0	5	6,283	21	
38	C-24	US-17 & SC-174	Safety	Unincorporated	-	20	0	5	3.5	5	3	2.5	0	4	5	5	5,851	22	
39	D-19	US-178 & Hill Street	Safety	Harleyville	-	20	0	5	3.5	0	2.5	5	5	4	5	5	5,737	24	
40	C-22	SC-165 & County Line Road	Safety	Unincorporated	-	10	15	10	4.5	0	1.5	0	0	4	0	0	5,589	29	
41	C-19	US-17 & SC-162	Safety	Ravenel	-	10	15	0	2.5	5	1.5	5	0	4	5	5	5,541	31	
42	C-17	SC-164 & SC-174	Safety	Hollywood	-	20	0	5	4	5	1.5	0	0	4	5	0	5,391	35	
43	D-21	US-78 & Rigby Street	Traffic Control	Reevesville	-	20	0	5	1.5	0	2.5	2.5	0	5	0	5	5,343	36	
44	D-23	US-78 & SC-27	Traffic Control	Ridgeville	-	5	10	10	3	5	2	2.5	5	5	5	0	5,170	38	
45	D-20	S. Railroad Avenue & Creighton Street	Safety	Harleyville	-	20	0	5	4	0	1.5	2.5	5	4	0	0	5,009	41	
46	D-17	US-178 & First Bend Road	Safety	Harleyville	-	20	0	0	4	0	2.5	5	5	4	5	5	4,939	43	
47	C-08	US-17 & Seewee Road	Traffic Control	Awendaw	-	10	0	10	0	5	1	5	2.5	5	0	5	4,917	44	
48	D-18	US-178 & Second Bend Road	Safety	Harleyville	-	20	0	0	4.5	0	2.5	5	5	4	5	5	4,887	45	
49	C-21	US-17 & Old Jacksonboro Road	Safety	Ravenel	-	20	0	0	2.5	0	1.5	5	2.5	4	5	5	4,876	46	
50	C-09	US-17 & S. Daar Road	Safety	Awendaw	-	10	0	5	0	5	1	5	0	5	0	5	4,049	55	
51	C-11	SC-162 & Towles Road	Capacity	Hollywood	-	10	0	5	0.5	5	1.5	5	0	5	0	5	4,014	56	
52	C-13	SC-162 & New Road	Capacity	Hollywood	-	10	0	5	2	5	2	2.5	0	5	0	0	3,514	58	
53	B-03	SC-45 & SC-41	Traffic Control	Jamestown	-	5	0	5	3	5	2	0	0	5	5	0	2,548	61	

Table 4.5 – Ranked Visionary Bike-Ped Projects

#	Project ID	Facility	Improvement Category	Location	Length (Miles)	EVALUATION CRITERIA											Weighted Score	Project Ranking	
						Existing Infrastructure	Traffic Congestion	Safety	Environment Impacts	Transit	Walking/Bicycling	Economic Development	Land Use	Financial Viability	Evacuation Routes	Freight Mobility			
WEIGHT →						20%	15%	15%	10%	10%	5%	5%	5%	5%	5%	5%	5%	100%	
54	C-30	US-17 & SC-165	Bike-Ped	Ravenel	-	20	15	10	1.5	5	2.5	0	5	5	0	0	8.722	2	
55	C-26	SC-165	Bike-Ped	Hollywood	1.88	20	5	10	3.5	10	3	2.5	5	4	0	0	7.629	7	
56	C-27	SC-165	Bike-Ped	Hollywood	0.30	20	5	5	3	10	3	2.5	5	5	0	0	6.963	12	
57	C-28	SC-165 & SC-162	Bike-Ped	Hollywood	-	20	5	5	2.5	10	1.5	0	5	5	0	0	6.822	14	
58	C-29	SC-165	Bike-Ped	Hollywood/Meggett	1.11	20	5	5	4	10	3	2.5	5	3	0	0	6.794	15	
59	C-25	SC-162	Bike-Ped	Hollywood	10.19	20	5	0	5	10	3.5	2.5	2.5	1	0	0	5.725	25	
60	D-31	Academy Road	Bike-Ped	St. George/ Unincorporated	0.72	20	0	5	3	5	2	2.5	5	4	0	0	5.644	26	
61	D-30	US-78	Bike-Ped	St. George	0.78	20	0	5	5.5	5	3	2.5	5	5	0	0	5.454	32	
62	D-26	S. Railroad Avenue	Bike-Ped	Harleyville	0.24	20	0	5	3.5	0	1.5	2.5	5	5	0	0	5.093	40	
63	D-27	US-178 & Kate Street/Railroad Avenue	Bike-Ped	Harleyville	-	20	0	0	3.5	0	2.5	2.5	5	5	0	0	4.393	50	
64	D-29	Rigby Street	Bike-Ped	Reevesville	0.20	20	0	0	2	0	2.5	0	0	5	0	0	4.166	52	
65	D-28	US-78	Bike-Ped	Reevesville	0.17	20	0	0	2	0	1.5	0	0	5	0	0	4.122	54	
66	B-06	SC-45	Bike-Ped	St. Stephen	0.62	5	0	5	4.5	5	4	2.5	0	4	0	0	2.342	63	
67	D-25	SC-453/Judge Street	Bike-Ped	Harleyville	0.14	5	0	5	3	0	2.5	2.5	5	5	0	0	2.194	64	



Funding & Implementation

CHAPTER 5

Cost Estimation
Funding Sources
Fiscally-Constrained Projects

Knowledge and recognition of the available financial resources are key to the overall development and successful implementation of the 2040 RL RTP. The Plan needs to consider the amount of funding that is realistically available prior to identifying a list of candidate projects that yields the best return. It is therefore vital to develop approximate preliminary costs of proposed visionary projects and compare them against estimates of anticipated revenue in order to determine a potential list of financially-constrained projects for implementation.

5.1 Cost Estimation

Preliminary cost estimates shown in Table 5.1 were developed with guidance and input from SCDOT and reflects assumed cost to build visionary projects. Assumed costs were derived from a combination of sources including historic bids, analogous projects, and percentage estimations. Estimated project costs represent basic construction, planning and engineering (at 15% design), construction contingency (at 13% of construction cost), and right-of-way (ROW) related costs. Projects involving traffic control installation, traffic calming, and/or safety type of improvements are assumed to be contingent up on conducting comprehensive technical studies and their final outcome. Any cost estimate to implement such type of projects is assumed to include both feasibility study as well as implementation costs.

Table 5.1 – Cost Estimates of Visionary Projects

#	Project ID	Facility	Improvement Category	Potential Improvement(s)	Delimits	Location	Length (Miles)	ESTIMATED COST
ROADWAY								
1	B-01	SC-45	Pavement	Resurfacing	SC-41 to Quarry Road	Jamestown	2.87	\$1,879,880
2	B-02	Halfway Creek Road	Pavement	Resurfacing	SC-45 to Guerins Bridge Road	Unincorporated	19.01	\$9,126,112
3	C-01	Bulls Island Road Extension	New Roadway	Build 2-Lane Undivided	Seewee Road to US-17	Awendaw	0.83	\$7,409,429
4	C-02	US-17	Traffic Control	Improve Signage	Steed Creek Road to Sewee Road	Awendaw	9.63	\$97,410
5	C-03	Seewee Road	Traffic Control	Implement Calming	US-17 to S. Doar Road	Awendaw	7.14	\$79,980
6	C-04	N. Pinckney Street	Traffic Control	Install Signage	(Entire Length)	McClellanville	0.56	\$33,920
7	C-05	Pinckney Street	Traffic Control	Install Signage	(Entire Length)	McClellanville	1.78	\$42,460
8	C-06	Kit Hall Road	Traffic Control	Install Signage	(Entire Length)	McClellanville	0.98	\$36,828
9	C-07	SC-162	Pavement	Resurfacing	US-17 to SC-174	Hollywood	13.30	\$6,384,608
10	D-01	SC-453	Pavement	Resurfacing	US-178 to I-26 Eastbound Ramps	Harleyville	1.19	\$701,710
11	D-02	Creighton Street	Pavement	Resurfacing	Hill Street to S. Railroad Avenue	Harleyville	0.19	\$110,299
12	D-03	S. Railroad Avenue	Pavement	Resurfacing	US-178 to Copart Facility	Harleyville	1.00	\$591,471
13	D-04	US-178	Safety, Traffic Control	Upgrade Striping, Improve Signage	Pat Street (South) to North of Pioneer Gym Road	Harleyville	1.80	\$35,637
14	D-05	Whetsell Street/Cross Creek Road	Traffic Control	Implement Calming	Grimes Town Road to Wire Road	Reevesville	5.87	\$71,062
15	D-06	US-15/N. Parler Avenue	Widening	Add Median	Minus Street to Dukes Street	St. George	0.92	\$1,038,350
16	D-07	S. Metts Street	Widening	Add Lane or Shoulder	Gavin Street to Dukes Street	St. George	0.46	\$2,005,253
17	D-08	Spring Road	Pavement	Resurfacing; Paving; Add Shoulder	US-15 to Winding Wood Road	Unincorporated	1.80	\$1,059,840
18	D-09	SC-61	Pavement	Resurfacing	Givhans Ferry Road to SC-27	Unincorporated	3.06	\$2,006,313
19	D-10	Givhans Ferry Road	Pavement	Resurfacing	SC-61 to Ridge Road	Unincorporated	2.58	\$1,694,313
20	D-11	SC-27 (Ridgeville Road)	Pavement	Resurfacing	SC-61 to US-78	Unincorporated	7.83	\$3,756,554

Table 5.1 – Cost Estimates of Visionary Projects (Continued)

#	Project ID	Facility	Improvement Category	Potential Improvement(s)	Delimits	Location	Length (Miles)	ESTIMATED COST
ROADWAY								
21	D-12	SC-173 (Myers Mayo Road)	Pavement	Resurfacing	County Line to SC-27	Unincorporated	2.93	\$1,922,425
22	D-13	Ridge Road	Pavement	Resurfacing	SC-27 to Givhans Ferry Road	Unincorporated	5.66	\$3,712,932
23	D-14	Wire Road	Pavement	Resurfacing	Givhans Ferry Road to I-95	Unincorporated	15.56	\$9,160,452
24	D-15	7-Mile Road	Pavement	Resurfacing	US-15 to First Bend Road	Unincorporated	7.45	\$4,388,623
25	D-16	Second Bend Road	Pavement	Resurfacing	Greenhill Road to US-178	Unincorporated	1.32	\$775,387
INTERSECTION								
26	B-03	SC-45 & SC-41	Traffic Control	Install Signal	-	Jamestown	-	\$118,382
27	B-04	US-176 & Mudville Road	Safety	Improve Geometry, Install Caution Light	-	Unincorporated	-	\$1,398,382
28	B-05	US-52 & SC-402	Safety, Capacity	Implement Left Phasing, Improve Line-of-Sight, Upgrade Striping, Add Right Lane	-	Unincorporated	-	\$391,923
29	C-08	US-17 & Seewee Road	Traffic Control	Install Traffic Signal	-	Awendaw	-	\$326,374
30	C-09	US-17 & S. Doar Road	Safety	Install Caution Light	-	Awendaw	-	\$71,681
31	C-10	US-17 & Pinckney Street	Traffic Control	Install Traffic Signal	-	McClellanville	-	\$293,874
32	C-11	SC-162 & Towles Road	Capacity	Add Left Turn Lanes	-	Hollywood	-	\$427,421
33	C-12	SC-162 & Gibson Road	Capacity	Add Left Turn Lanes	-	Hollywood	-	\$427,421
34	C-13	SC-162 & New Road	Capacity	Add Left Turn Lanes	-	Hollywood	-	\$427,421
35	C-14	SC-162 & Dixie Plantation Road/Bryan Road	Safety	Redesign	-	Hollywood	-	\$2,762,500
36	C-15	SC-162 & Baptist Hill Road	Safety	Add Left Turn Lanes	-	Hollywood	-	\$656,922
37	C-16	SC-165 & SC-162	Safety	Implement Left Phasing, Upgrade Striping	-	Hollywood	-	\$1,280,000
38	C-17	SC-164 & SC-174	Safety	Improve Line-of-Sight	-	Hollywood	-	\$1,280,000
39	C-18	US-17 & SC-165	Safety	Implement Left Phasing, Upgrade Striping	-	Ravenel	-	\$1,280,000
40	C-19	US-17 & SC-162	Safety	Improve Line-of-Sight	-	Ravenel	-	\$1,280,000
41	C-20	US-17 & New Road	Safety	Add Islands	-	Ravenel	-	\$1,280,000
42	C-21	US-17 & Old Jacksonboro Road	Safety	Realignment	-	Ravenel	-	\$2,747,500
43	C-22	SC-165 & County Line Road	Safety	Improve Line-of-Sight	-	Unincorporated	-	\$1,365,000
44	C-23	US-17 & Parkers Ferry Road	Safety	Improve Line-of-Sight	-	Unincorporated	-	\$2,745,000
45	C-24	US-17 & SC-174	Safety	Improve Line-of-Sight	-	Unincorporated	-	\$2,745,000
46	D-17	US-178 & First Bend Road	Safety	Increase Turning Radius	-	Harleyville	-	\$1,365,000
47	D-18	US-178 & Second Bend Road	Safety	Increase Turning Radius	-	Harleyville	-	\$1,409,800
48	D-19	US-178 & Hill Street	Safety	Increase Turning Radius	-	Harleyville	-	\$1,434,800
49	D-20	S. Railroad Avenue & Creighton Street	Safety	Increase Turning Radius	-	Harleyville	-	\$1,540,000
50	D-21	US-78 & Rigby Street	Traffic Control	Install Traffic Signal	-	Reevesville	-	\$275,882
51	D-22	SC-27 & S. Railroad Avenue	Safety	Increase Turning Radius	-	Ridgeville	-	\$1,475,968
52	D-23	US-78 & SC-27	Traffic Control	Install Traffic Signal	-	Ridgeville	-	\$203,382
53	D-24	Frontage Road & Flying J Driveway	Safety	Improve Geometry	-	St. George	-	\$1,573,874

Table 5.1 – Cost Estimates of Visionary Projects (Continued)

#	Project ID	Facility	Improvement Category	Potential Improvement(s)	Delimits	Location	Length (Miles)	ESTIMATED COST
BIKE-PED								
54	B-06	SC-45	Bike-Ped	Implement Multi-Use Path	Park Avenue to Graham Street	St. Stephen	0.62	\$1,256,804
55	C-25	SC-162	Bike-Ped	Provide Bike Lane	(Town Limits)	Hollywood	10.19	\$9,036,046
56	C-26	SC-165	Bike-Ped	Provide Bike Lane	(Town Limits)	Hollywood	1.88	\$1,715,988
57	C-27	SC-165	Bike-Ped	Implement Multi-Use Path	SC-162 to Town Council Road	Hollywood	0.30	\$489,758
58	C-28	SC-165 & SC-162	Bike-Ped	Provide Sidewalk Provide Crosswalk	-	Hollywood	-	\$128,000
59	C-29	SC-165	Bike-Ped	Implement Multi-Use Path	Town Council Road to Meggett Quail Road	Hollywood/Meggett	1.11	\$3,008,875
60	C-30	US-17 & SC-165	Bike-Ped	Provide Sidewalk Provide Crosswalk	-	Ravenel	-	\$128,000
61	D-25	SC-453/Judge Street	Bike-Ped	Provide Sidewalk	Winfield Apartments Driveway to US-178	Harleyville	0.14	\$235,975
62	D-26	S. Railroad Avenue	Bike-Ped	Provide Crosswalk	Near Community Park	Harleyville	0.24	\$279,726
63	D-27	US-178 & Kate Street/Railroad Avenue	Bike-Ped	Provide Crosswalk	-	Harleyville	-	\$298,000
64	D-28	US-78	Bike-Ped	Provide Sidewalk	Townhall to Rigby Street	Reevesville	0.17	\$145,090
65	D-29	Rigby Street	Bike-Ped	Extend/Provide Sidewalk	Baptist Church to Post Office	Reevesville	0.20	\$346,564
66	D-30	US-78	Bike-Ped	Provide Sidewalk	Arlington Street to Academy Road	St. George	0.78	\$786,588
67	D-31	Academy Road	Bike-Ped	Provide Sidewalk	US-78 to Britt Green Road	St. George/ Unincorporated	0.72	\$1,156,563

5.2 Funding Sources

The BCDCOG currently receives its primary funding allocations for rural transportation projects from federal and State through what is known as Guideshare. Its funds are distributed from SCDOT through application of a formula that is based on the region’s specific proportion of current and projected state population. As a result, the annual funding allocations are expected to remain consistent without substantial modifications to revenue amounts for the duration of this 20-year Plan. While other sources of funds for transportation exist and allocated to projects through specific programs such as “C” funds and County Transportation Sales Tax (TST) funds, none are specifically dedicated for disbursement directly by the BCDCOG. Therefore, Guideshare funding is the only guaranteed stream of revenue that is anticipated to be available to support the fiscally-constrained rural transportation program. Federal planning regulations also require that forecasted revenues and project costs used in developing a fiscally-constrained plan are reflected in year-of-expenditure (YOE) dollars to account for inflation. The year-of-expenditure conversion is an inflated value of present dollar cost to reflect changes in purchasing power over time. Considering the current trend in the annual rural Guideshare funding for the period 2015-2020, federal revenues were assumed to be flat (0% growth rate) over the plan period through Year 2040. Based on the inflation trend indicated by the FHWA’s National Highway Construction Cost Index (NHCCI) for the period March 2010 to March 2018, an annual inflation rate of 2.1% was applied through to the mid-point of this Plan period (i.e. Year 2031). Since projects are not given a specific year of construction or completion, the midpoint inflation factor of 1.257 was applied uniformly to project cost estimates in Year 2020 dollars to produce the estimated year-of-expenditure cost conversion figures.

5.3 Fiscally-Constrained Projects

A transportation plan is considered fiscally-constrained if projected project costs do not exceed forecasted revenues. Based on the committed projects identified in the current Rural Transportation Improvement Program (RTIP), a portion of Guideshare fund will be required through FY2022-2023 to complete previously committed projects. Post-fulfilling these project commitments, a balance of \$1.3 million is expected during the same period for allocation to new projects identified in this Plan. In addition, the RL RTP assumes an annual Guideshare revenue of \$2.181 million from Year 2024 to Year 2040 totaling \$37.1 million. BCDCOG anticipates an aggregated sum of \$38.4 million is available for FY2021-2040 plan period.

At year-of-expenditure (YOE) value, approximately \$124 million is needed to fund all 67 visionary projects proposed in this Plan. However, candidate projects identified for funding is constrained to the \$38.4 million in available revenues. [Table 5.2](#) provides a summary of the total funding needed for all visionary projects, forecasted plan revenues, and proposed distribution of Guideshare funding

anticipated for the plan period 2021-2040.

Table 5.2 – Revenues and Distributions

FUNDING NEED	Estimated Project Costs (Year 2020 \$)	Estimated Project Costs (YOE \$)
All Visionary Projects	\$ 109,716,733	\$ 137,913,933
REVENUE	Estimated Projected Revenue (Year 2020 \$)	Estimated Projected Revenue (YOE \$)
Fiscal Year 2022-2023 Uncommitted Guideshare Balance	\$ 1,311,000	\$ 1,311,000
Fiscal Period 2023-2040 Guideshare Allocation	\$37,077,000	\$37,077,000
Total Guideshare Revenue	\$38,388,000	\$38,388,000
DISTRIBUTION	Estimated Project Costs (Year 2020 \$)	Estimated Project Costs (YOE \$)
Guideshare Funds (Allocated to Projects)	\$27,112,723	\$34,080,693
Guideshare Funds (Unallocated)	\$3,426,656	\$ 4,307,307
Total Guideshare Allocations	\$30,539,379	\$38,388,000

Through the SCDOT-approved prioritization process, funds were allocated to candidate projects based on the overall ranking of each project and irrespective of project category. As a result, the fiscally-constrained plan identifies funding for the top 17 projects for a total of \$34.1 million (YOE \$). An unallocated balance of \$4.3 million may be designated as reserve or contingency fund to address unforeseen cost overruns or emergencies. [Table 5.3](#) and [Map 5.1/Map 5.2](#) present the fiscally-constrained projects resulting from the allocation of funds by priority. Projects not included in the fiscally-constrained program are retained within the Plan as illustrative projects as they reflect community priorities for implementation through horizon year 2040. Although, these projects do not fit the program based on known funding sources, they may qualify for implementation in the future should additional funding become available.

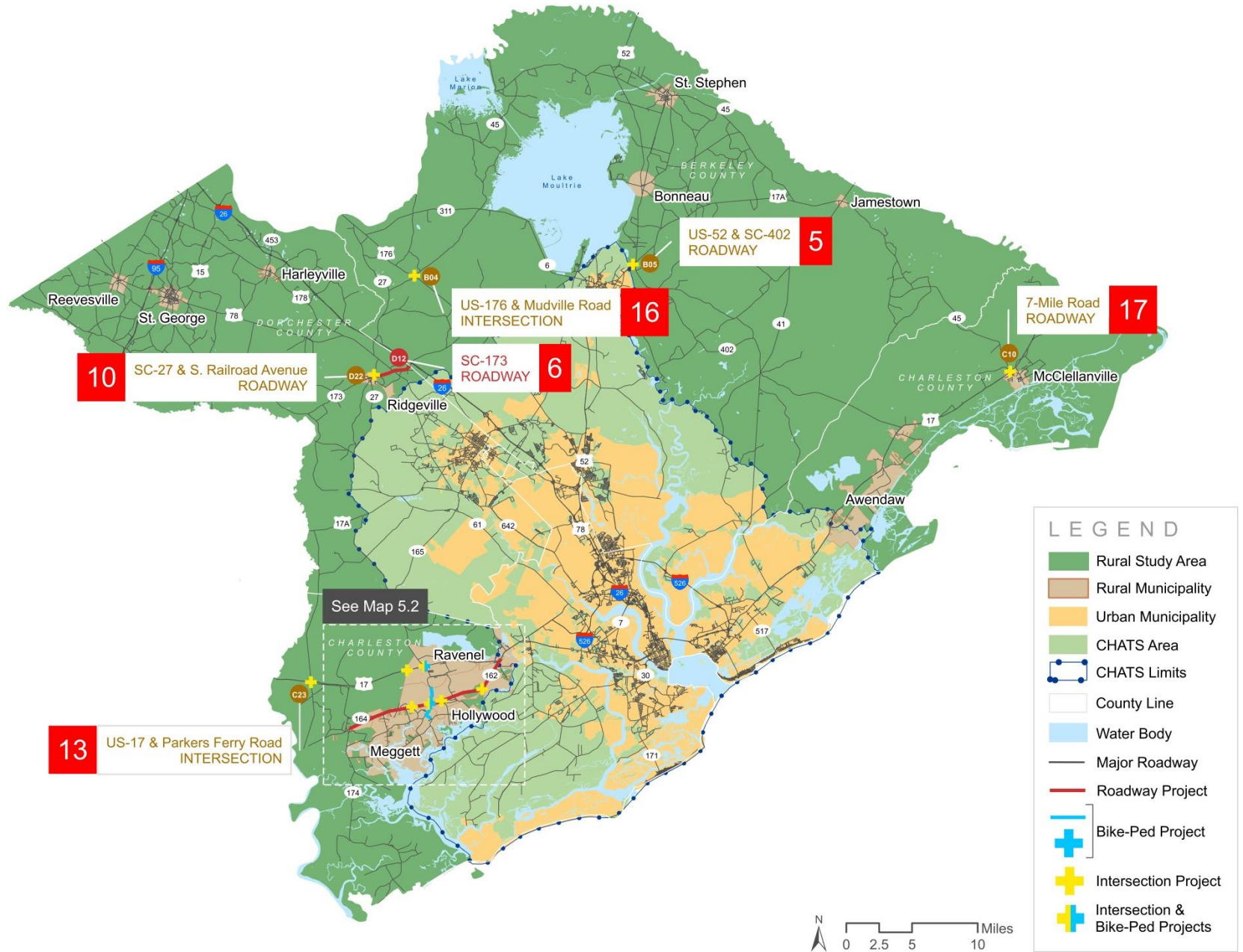
Table 5.3 – Fiscally-Constrained Projects

#	Project ID	Facility	Improvement Category	Potential Improvement(s)	Delimits	Location	Length (Miles)	Weighted Score	RANK
1	C-18	US-17 & SC-165	Safety	Implement Left Phasing; Upgrade Striping	-	Ravenel	-	9.291	1
2	C-30	US-17 & SC-165	Bike-Ped	Provide Sidewalk Provide Crosswalk	-	Ravenel	-	8.722	2
3	C-20	US-17 & New Road	Safety	Add Islands	-	Ravenel	-	8.691	3
4	C-07	SC-162	Pavement	Resurfacing	US-17 to SC-174	Hollywood	13.30	8.676	4
5	B-05	US-52 & SC-402	Safety; Capacity	Implement Left Phasing; Improve Line-of-Sight; Upgrade Striping; Add Right Lane	-	Unincorporated	-	8.115	5
6	D-12	SC-173 (Myers Mayo Road)	Pavement	Resurfacing	County Line to SC-27	Unincorporated	2.93	8.023	6
7	C-26	SC-165	Bike-Ped	Provide Bike Lane	(Town Limits)	Hollywood	1.88	7.629	7
8	C-12	SC-162 & Gibson Road	Capacity	Add Left Turn Lanes	-	Hollywood	-	7.514	8
9	C-16	SC-165 & SC-162	Safety	Implement Left Phasing; Upgrade Striping	-	Hollywood	-	7.266	9
10	D-22	SC-27 & S. Railroad Avenue	Safety	Increase Turning Radius	-	Ridgeville	-	7.185	10
11	C-14	SC-162 & Dixie Plantation Road/ Bryan Road	Safety	Redesign	-	Hollywood	-	7.025	11
12	C-27	SC-165	Bike-Ped	Implement Multi-Use Path	SC-162 to Town Council Road	Hollywood	0.30	6.963	12
13	C-23	US-17 & Parkers Ferry Road	Safety	Improve Line-of-Sight	-	Unincorporated	-	6.826	13
14	C-28	SC-165 & SC-162	Bike-Ped	Provide Sidewalk Provide Crosswalk	-	Hollywood	-	6.822	14
15	C-29	SC-165	Bike-Ped	Implement Multi-Use Path	Town Council Road to Meggett Quail Road	Hollywood/Meggett	1.11	6.794	15
16	B-04	US-176 & Mudville Road	Safety	Improve Geometry; Install Caution Light	-	Unincorporated	-	6.663	16
17	C-10	US-17 & Pinckney Street	Traffic Control	Install Traffic Signal	-	McClellanville	-	6.643	17

Project Category

- Roadway
- Intersection
- Bike-Ped

Map 5.1 – Fiscally-Constrained Projects (Part I)



Map 5.2 – Fiscally-Constrained Projects (Part II)



2040 RURAL
LRTP

