

Community Mitigation Plan

Draft 03 August 2020







Community Mitigation Plan

SC Highway 41 Corridor Improvements Project
Charleston and Berkeley Counties, South Carolina

Draft 03 August 2020

Prepared for Charleston County

Prepared by

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1.0 Introduction

Charleston County is evaluating the benefits and impacts from the proposed SC Highway 41 (SC 41) corridor improvements (hereafter, Project), in accordance with the National Environmental Policy Act (NEPA). The United States Army Corps of Engineers (USACE) will be the lead federal agency upon submittal of a Clean Water Act permit application for the Project.

This report, the community mitigation plan (CMP), recommends mitigation measures to address the adverse effects to the human communities as described in the SC 41 community impact assessment (CIA; HDR 2019a). The SC 41 community characterization report (CCR; HDR 2019b) presents the existing historical, social, cultural, economic, and environmental justice (EJ) conditions in and near the Project study area and serves as a baseline for the CIA. The CCR, CIA, and the draft environmental report (HDR 2019c) should be accessed for full Project background details, including the various alternatives evaluated, the public involvement process, the potentially affected communities, and the potential adverse effects to communities.

Avoidance, minimization, and mitigation of environmental and socioeconomic effects is a critical part of NEPA, and mitigation commitments that derive from this CMP will be summarized in the environmental report and the upcoming Record of Decision. If deemed necessary, memorandum of agreements (MOAs) based on the commitments will be developed between Charleston County and the affected communities.

1.1 Project Background

The Project study area is defined as a 4.6-mile-long mainline corridor of SC 41 from US 17 in Mount Pleasant across the new Wando River Bridge to Clements Ferry Road in Berkeley County. The Project also includes improvements to the intersection of SC 41 and US 17 and completion of the tie in of Gregory Ferry Road to SC 41 near US 17. The study area also includes US 17 from the intersection with the northern extent of Old Georgetown Road to the entrance to Lexington Drive and an expanded study area around Laurel Hill County Park and the Phillips Community between Bessemer Road and Dunes West Boulevard (Figure 1). Existing SC 41 is a two-lane highway that provides vehicular access between US 17 and Clements Ferry Road, as well as north to Huger, South Carolina.

The primary purpose of the Project is to reduce traffic congestion within the SC 41 corridor to accommodate future traffic projections. The secondary purposes of the Project are to enhance safety throughout the corridor, improve transportation system and community connections, and provide bicycle and pedestrian accommodations, while minimizing community and environmental impacts. This section of SC 41 serves as a minor arterial that has experienced an increase in traffic due to regional growth and currently sustains operations that exceed capacity and are projected to worsen over time.





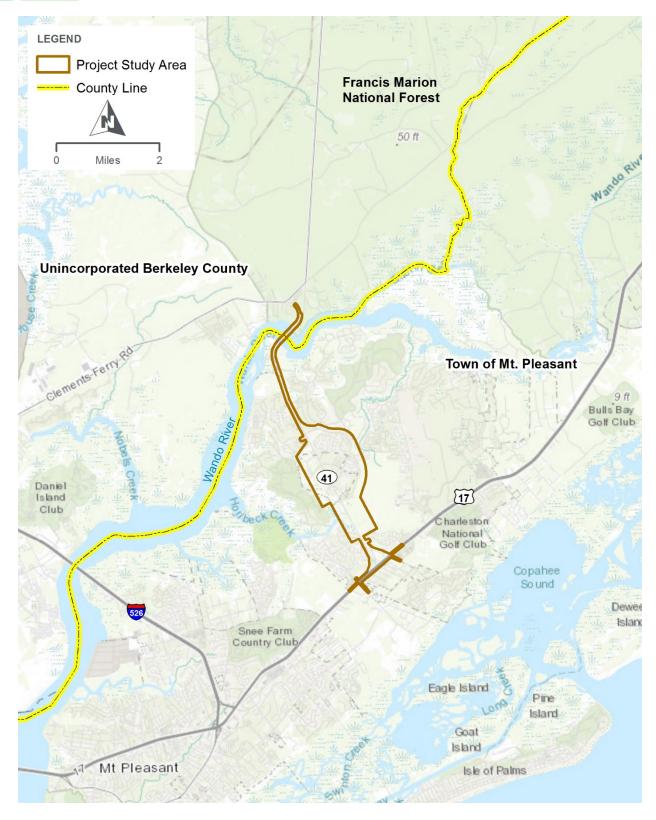


Figure 1. Project Location





1.1.1 Public Involvement

Public participation has been a critical component of the NEPA process, and the Project team made early and committed efforts to engage the public. The primary goal of public involvement efforts has been to foster open communications between a diverse public, state and federal agencies, and the Project team to gain productive input leading to better decisions that meet study area needs. Project information has been provided to the public through meetings, mailings, fliers, e-mails, newspaper ads, social media announcements, and a detailed and frequently updated Project website. The public has been encouraged to provide comment via email, the Project website, a dedicated Project hotline, and mail.

1.1.1.1 Environmental Justice Outreach

Special consideration was made during the planning and development of public outreach efforts for EJ communities within the study area. Flyers were developed and distributed to key locations and residences to notify residents of EJ communities of upcoming public meetings, and extra efforts were made to engage EJ community representatives early and throughout the NEPA process. The Project team held meetings with representatives of EJ communities, including the Phillips Community and Seven Mile, to convey Project details and gather feedback on the Project and the best ways to engage the communities. Meetings with EJ community representatives were also held in documenting the National Register of Historic Places (NRHP)-eligible Phillips Community Cultural Landscape (Phillips Cultural Landscape), located in the Phillips Community within the Project study area.

1.1.2 Proposed Alternative

The Proposed Alternative (Alternative 1) consists of widening SC 41 to a five-lane roadway with a center raised island or two-way left-turn lane from US 17 to the Wando River Bridge (Figure 2). This alternative would be approximately 4.6 miles long and would include complementary intersection improvements at selected intersections throughout the corridor. Table 1 presents impacts to various resources expected from implementation of the Proposed Alternative.

Table 1. Summary of Impacts for the Proposed Alternative

	Expected Impact	
Real Estate Resources	Proposed Right-of-Way	30.4 ac
(Entire Project Corridor)	Residential Relocations	0
(Entire Project Corndor)	Commercial Relocations	0
	Estuarine (Tidal)	5.3 ac
Waters of the U.S.	Freshwater (Non-Tidal)	2.9 ac
	Streams	0 lf
Laurel Hill County Park		0.7 ac
Noise (impacted receivers)	60	
	NRHP Archaeological Sites	1
	NRHP-eligible Phillips Community Cultural	Potential adverse
Cultural Resources	Landscape	effect
	NRHP Sweetgrass Basket Stand Corridor	Potential adverse
	Traditional Cultural Property	effect
Phillips Community	Right-of-Way – Acres	5.2 ac
Fillips Community	Right-of-Way – Total Parcels	85
Environmental Justice		Disproportionately
Communities		high and adverse
Communices		effects





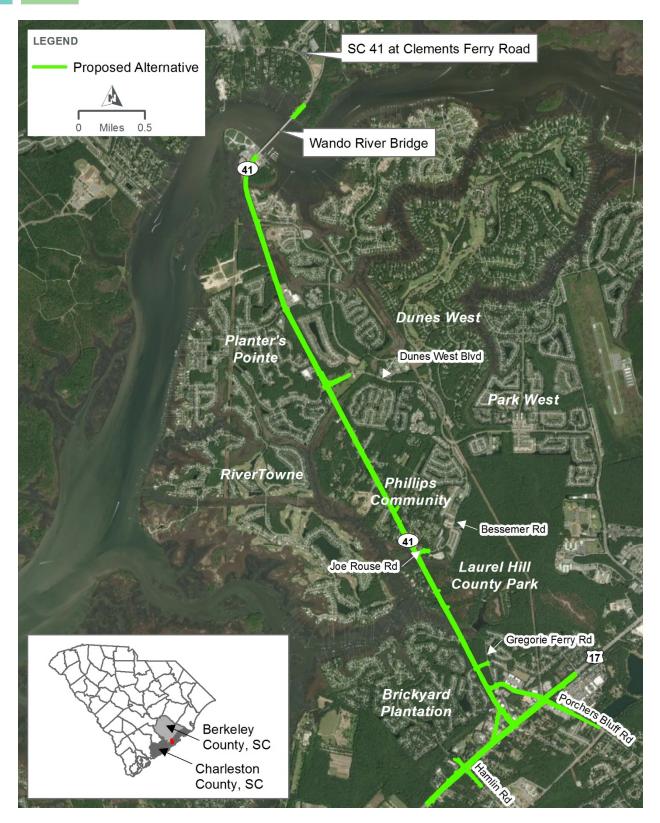


Figure 2. Proposed Alternative Associated with the Project





The Proposed Alternative best meets the Project purpose and need of reducing congestion on SC 41 while minimizing impacts to wetlands, Laurel Hill County Park, and noise receivers. The Proposed Alternative would be constructed using standard construction methods. Proposed Alternative would result in the fewest acres of right-of-way (ROW) acquisition. The Proposed Alternative has the lowest estimated cost of approximately \$125.4 million, making it within the County budget for the Project.

1.2 Purpose of Community Mitigation

Charleston County is following Federal Highway Administration (FHWA) guidance to evaluate impacts to human communities in the Project study area. The FHWA guidance document entitled *Community Impact Assessment: A Quick Reference for Transportation* (FHWA 2018; hereafter, the FHWA guidebook) recommends a process to address the adverse effects of a transportation project on communities and their quality of life.

The FHWA guidebook recommends four primary methods to consider when addressing community impacts: avoidance, minimization, mitigation, and enhancement. Throughout the NEPA process and project development, Charleston County has modified design plans and incorporated features to avoid or minimize potential impacts to the human environment. Since initiation of the Project, public involvement has served a key role in identifying issues of concern, examining avoidance options, and developing measures to minimize unavoidable impacts. This report presents measures to mitigate the impacts to human communities that could not be avoided or minimized with implementation of the Project.

This CMP also describes potential mitigation options to the NRHP-eligible Phillips Cultural Landscape and the Sweetgrass Basket Stand Corridor traditional cultural property (TCP), described in Richardson Seacat (2018) and Baluha et al. (2019), respectively. The development of mitigation measures for adversely affected historic properties is mandated by Section 106 of the National Historic Preservation Act (NHPA) and the four-step process outlined in federal regulations titled "Protection of Historic Properties" (36 CFR Part 800). Section 106 directs federal agencies to consider the effects or impacts of their undertakings on NRHP-eligible or listed cultural resources (i.e., historic properties) and take measures to avoid, minimize, or mitigate adverse effects. Minimization and mitigation measures regarding these historic properties will be further developed by USACE in coordination with the South Carolina Department of Archives and History (SCDAH), serving as the state historic preservation officer (SHPO), the affected communities, and other parties that have expressed a vested interest in the Project. These measures will be included in later drafts of this CMP.

2.0 Summary of Community Impacts

Twelve human communities are described in the CCR and evaluated for Project effects in the CIA. The Charleston County portion of the study area, located to the south of the Wando River, includes 11 of the 12 identified communities: Brickyard Plantation and The Colonnade (hereafter Brickyard/Colonnade), Cardinal Hill, Dunes West, Gregorie Ferry, Horlbeck Creek, Ivy Hall, Park West, Phillips Community, Planter's Pointe, Rivertowne, and Seven Mile. The Berkeley County portion of the study area, located to the north of the Wando River, includes the remaining identified community, Cainhoy. The 12 communities within the study area are depicted in Figure 3.





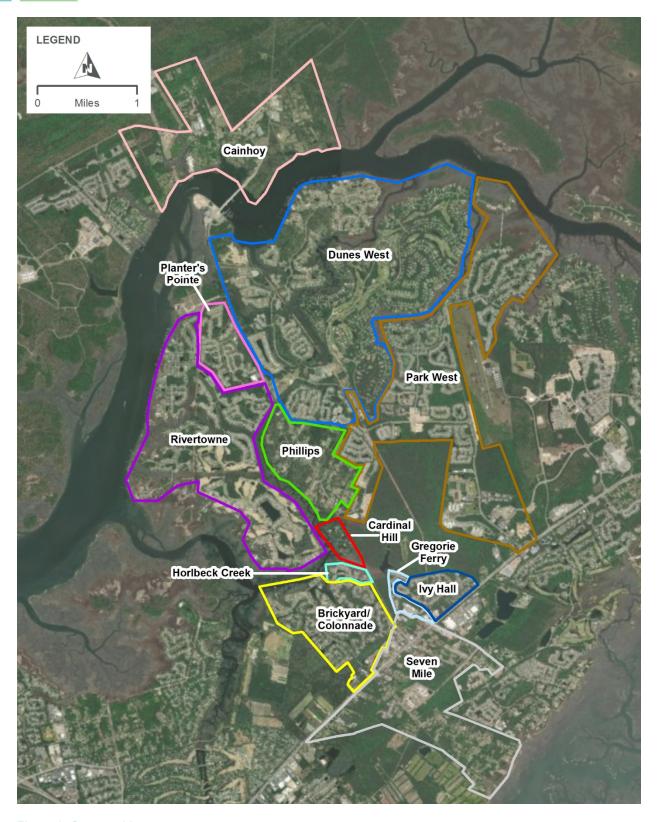


Figure 3. Communities





Table 2 provides a comparison of impact severity across all communities in the study area in relation to the Proposed Alternative. The table highlights that moderate to major impacts are expected in the Phillips Community, and minor to moderate impacts are expected in Seven Mile. All other communities except Cainhoy would experience minor effects. Cainhoy is not expected to experience any direct effects from the Project.

In the Phillips Community, the impact severity ratings range from moderate to major due to the numbers of impacted residential parcels and their wide distribution across the community, the lack of distance of many residences on affected parcels from the proposed new ROW, and depending on the legal status of affected parcels as heirs' properties. In Seven Mile, the impact severity ratings range from minor to moderate due to the numbers of impacted residential parcels and their wide distribution across the community; however, these effects are generally made more minimal in Seven Mile due to substantial setback of residences from existing roadways, the presence of some vegetative buffers, and the current existence of large roadways within the community.

Table 2. Overall Community Impacts Expected with Implementation of Proposed Alternative

0	January of Consositus
Community	Impact Severity
Brickyard / Colonnade	Minor
Cardinal Hill	Minor
Dunes West	Minor
Gregorie Ferry	Minor
Horlbeck Creek	Minor
Ivy Hall	Minor
Park West	Minor
Phillips Community	Moderate to Major
Planter's Pointe	Minor
Rivertowne	Minor
Seven Mile	Minor to Moderate
Cainhoy	No direct effects

2.1 Adverse Effects Resulting from the Proposed Alternative

As shown in Table 2, the implementation of the recommended Proposed Alternative would affect the Phillips Community and Seven Mile more intensely than it would other communities. Because these are Gullah African-American communities and because the impacts to these communities associated with the Proposed Alternative are estimated to be more severe than in non-EJ communities in the study area, the





Phillips Community and Seven Mile are expected to experience disproportionately high and adverse effects (i.e., EJ impacts) from the Project with implementation of the Proposed Alternative.

The Proposed Alternative could also contribute to cumulative impacts to the traditional culture of these communities resulting from nearby federal and nonfederal projects. Over time, compounding changes in the study area, including population growth, changing lifestyles, and a subsequent increase in new residential and commercial developments and roadway projects, such as the widening of US 17 in 2013, have affected the traditional cultures of these Gullah communities and also led to the need for the Project. Thus, implementation of the Proposed Alternative would compound adverse effects to these EJ-qualifying communities.

The Phillips Community and Seven Mile would experience a variety of other adverse impacts, as summarized below.

2.1.1 Phillips Community

In the Phillips Community, the Proposed Alternative would result in the widening of SC 41 to a five-lane roadway with a center raised island or two-way left-turn lane. The Proposed Alternative would require approximately 5.2 acres of ROW along existing SC 41 within the community. Projected population growth in the study area is expected to lead to increased traffic volume on SC 41, including through the Phillips Community, while congestion would be reduced and traffic flow would be improved. The addition of a center raised island or two-way left-turn lane would help improve the safety of community members crossing existing SC 41 as pedestrians and turning into their driveways or access roads.

Overall, the impacts to the Phillips Community associated with the Proposed Alternative would be permanent and moderate to major primarily due to the lack of distance and vegetative buffer between many residences and the proposed roadway, the large number of affected community members, and depending on the legal status of affected parcels. More specifically, Project changes would result in the following community impacts, with social, cultural, and psychological effects addressed in relation to the Phillips Cultural Landscape:

- Community Resources Minor adverse effects due to loss of portions of seven parcels associated with property owners' associations or deemed undevelopable;
- *Economic and Business Conditions* Minor adverse effects due to loss of portions of three commercial parcels and relocation of sweetgrass basket stands;
- Land Use Minor adverse effects due to potential stimulation of more planned residential and neighborhood scale commercial uses throughout the Phillips Community;
- Mobility and Access Minor adverse effects due to increased traffic volume and the addition of two lanes of opposing traffic;
- Public Health and Safety Minor adverse effects due to increased traffic volume and increased drainage flow rates related to the increase in impervious surfaces;
- Residential Aspects Moderate to major adverse effects due to impacts to 70 individual residential parcels¹ and the presence of residences on several of these parcels that would be in

¹ "Individual residential parcels" are either (1) defined as "Residential" in the Charleston County parcel data, excluding large, undeveloped residential development parcels and Property Owner Association-owned parcels, or (2) defined as "Commercial" in the Charleston county parcel data but function as residential properties, often with small businesses operating on these parcels, as well.





- close proximity to the proposed ROW combined with lack of vegetative buffers, the large number of affected community members, and the prominence of heirs' properties in the community;
- Sensory Aspects Minor to moderate adverse effects due to increased noise, vibration, dust, and vehicular smells combined with lack of vegetative buffers and the relatively short distance between proposed ROW and existing buildings; and
- Phillips Community Cultural Landscape Adverse effects to this NRHP-eligible property due to
 Project changes indirectly altering the traditional culture of the Phillips Community and the
 traditional cultural identities of community members—both of which are key aspects supported by
 the Phillips Cultural Landscape and that make this property eligible for the NRHP.

2.1.2 Seven Mile

In Seven Mile, the Project would widen existing SC 41 from a two-lane roadway to a five-lane roadway in the northeastern portion of Seven Mile and also widen US 17 from a six- to seven-lane roadway with occasional turn lanes to an eight- to ten-lane roadway with occasional turn lanes through the central portion of the community. Implementation of the Project would also warrant changes along Hamlin Road and Brickyard Parkway near their intersections with US 17. These changes would require approximately 5.6 acres of ROW in the Seven Mile community. This would result in a more expansive roadway and larger intersections than currently exist throughout the community.

The impacts to Seven Mile associated with the Project would be permanent and minor to moderate. Overall, the effects of the Project would be made more minimal due to the relative distance of residences from proposed new ROW, the presence of some vegetative buffers, and the current existence of large roadways within the community. However, the Project would contribute to cumulative effects to the traditional culture of Seven Mile. More specifically, Project changes would result in the following community impacts:

- Economic and Business Conditions Minor adverse effects due to loss of portions of 53 commercial parcels and relocation of sweetgrass basket stands;
- Land Use Minor adverse effects to land use along Winnowing Way, in the extreme northeast
 potion of Seven Mile, where the Project would alter land uses from undeveloped commercial to
 transportation, and generally along and near US 17, where more commercial land uses could be
 spurred with Project completion;
- Residential Aspects Minor to moderate adverse effects due to loss of portions of 20 individual
 residential parcels and depending on the distance of residences to the proposed ROW, presence
 of vegetative buffers, and proximity to the large roadways that currently exist throughout the
 community;
- Social, Cultural, and Psychological Aspects Moderate adverse effects due to Project changes
 indirectly altering the traditional culture of the Seven Mile community and the traditional cultural
 identities of community members; and
- Sweetgrass Basket Stand Corridor TCP Adverse effects to this NRHP-eligible property due to relocation of basket stands and the associated altering of traditional culture in Seven Mile and the traditional cultural identities of community members.

2.2 Minimization Efforts

As described above, the development of minimization efforts to lessen the unavoidable effects of Project impacts has been part of the NEPA and Project design processes since their inception. Project effects that pertain to community impacts are detailed in the SC 41 CIA and briefly summarized in this section.





Temporary Project effects to traffic and mobility and access would be minimized by development of a maintenance-of-traffic plan and by community outreach activities to educate the public on construction activities. For losses of portions of individual parcels, the property owners would be compensated for those portions based on fair market value in accordance with the Uniform Relocation and Real Property Policies Acquisition Act. Other unavoidable effects would be mitigated, as described in the remaining CMP.

3.0 Community Coordination

Just as public participation has been a critical component of the NEPA process, coordination with the affected communities will be a critical component of further development and implementation of this CMP. To facilitate this, a targeted Community Engagement and Awareness Plan is proposed below to keep the communities and associated stakeholders engaged and informed throughout the mitigation process. A key component in implementing the plan is the involvement of strategic communications staff and community specialists to facilitate community engagement and foster open communications between the communities and the Project team.

3.1 Community Engagement and Awareness Plan

The Project would implement the Community Engagement and Awareness Plan during the USACE permitting and NEPA process, the construction phase, and up to 1 year after completion of construction, as follows:

- Hold initial meetings with key leadership of the Phillips Community and Seven Mile, to include representatives of the Phillips Community Association (PCA) and the Seven Mile Community Action Group for Encouragement (CAGE), to inform them of the Proposed Alternative and the results of the CIA, prior to the public announcement of the Proposed Alternative;
- Provide this draft CMP to representatives of the Phillips Community and Seven Mile and key stakeholders, such as representatives of the following organizations and agencies:
 - o African American Settlement Community Historic Commission,
 - o Gullah Geechee Cultural Heritage Corridor Commission,
 - Greater Goodwill African Methodist Episcopal (AME) Church,
 - o Mount Pleasant Basket Makers Association,
 - National Park Service.
 - Original Sweetgrass Marketplace Coalition,
 - SCDAH, and
 - Sweetgrass Cultural Arts Association;
- Meet with the community representatives and interested stakeholders to which the draft CMP was provided in order to:
 - 1. Explore and further develop the mitigation options proposed in the CMP,
 - 2. Discuss additional mitigation options, as appropriate to community needs, and
 - Develop the SC 41 Community Mitigation Advisory Committee(s) composed of community representatives, interested stakeholders, and key members of the Project team;
- Hold regular meetings of the SC 41 Community Mitigation Advisory Committee(s) in order to:





- 1. Produce a draft final CMP to be approved by Charleston County,
- 2. Consider community concerns with the Project and the selected mitigation measures, and
- 3. Discuss implementation of the selected mitigation measures and make adjustment suggestions, if needed;
- Throughout this process, develop and distribute or present periodic community newsletters, enewsletters, webpages, and presentations to highlight the implementation of mitigation measures and the involvement of the SC 41 Community Mitigation Advisory Committee(s).

3.1.1 Mitigation Implementation

As mitigation is implemented, the Project team would document activities using Table 3. These data would be provided to the SC 41 Community Mitigation Advisory Committee(s) during meetings and would be one of the sources of information shared about the mitigation efforts through community newsletters, webpages, and presentations.

Table 3. Mitigation Implementation and Tracking Template Table

Mitigation No.	Community Impacted	Mitigation Commitment from ER	Timing Phase	Responsible Party	Completed (Y/N)
41-01	Phillips	(copy from ER)	(Final Design; During Construction; Post- construction, etc.)	(Consultant; Client, etc.)	

4.0 Potential Mitigation Measures

Considering the adverse effects that are expected to result from implementation of the Proposed Alternative, the Project team has developed several potential mitigation options for Charleston County and the SC 41 Community Mitigation Advisory Committee(s) to consider and/or modify for the final CMP. The proposed mitigation options were devised to address specific adverse impacts as detailed in the SC 41 CIA. These are organized below by the particular Project effects the measures are expected to mitigate. As referenced below, some of the mitigation measures are depicted in renderings included as Appendix A.

In developing the options, the Project team considered current zoning and future land use in order to ensure compatibility with local plans. Given their status as Gullah African-American communities, the Phillips Community and Seven Mile are designated Urban Suburban Cultural Community Protection areas by Charleston County (2018) and Community Conservation areas by the Town of Mount Pleasant (2019). These land use designations represent local efforts to protect and promote the culture and unique development patterns of these historically and culturally significant communities and sustain their strong sense of community. Charleston County additionally designates portions of Seven Mile as the





Sweetgrass Basket Stand Special Consideration Area, where the county has the goal of implementing cohesive land use patterns, zoning, and site design requirements.

4.1 Environmental Justice, Cultural, and Cumulative Effects

Educational activities and contributions to organizations supporting community members are proposed as mitigation options that would help address expected social, cultural, and psychological impacts as well as EJ and cumulative effects. Implementation of these mitigation measures would advance local understanding and appreciation of the historical and cultural significance of Gullah African-American communities of the Mount Pleasant vicinity and would directly support key organizations in the affected communities. The following options are proposed:

- Develop educational programs and curriculum modules regarding the Phillips Community, the Phillips Cultural Landscape, Seven Mile, and the Sweetgrass Basket Stand Corridor TCP and present these to local schools, libraries, and neighborhood associations.
- Provide support to PCA for the community's annual Family Day. The event usually occurs the
 week before school starts and serves to bring together community members and those connected
 with the community. The event also teaches children the values of gathering together and
 participating in activities that help the community. County support for the event could help PCA
 purchase backpacks, school supplies, food, and entertainment for the event.
- Provide support to CAGE for community events similar to the Phillips Community's Family Day.
- Identify, document, and evaluate Gullah African-American TCPs in the Mount Pleasant vicinity. Based on past efforts, the types of TCPs expected are ethnographic and historic vernacular cultural landscapes that consist of several natural and cultural resources in near proximity to which a community or communities ascribe traditional cultural value. Identified cultural landscapes are expected to exhibit historical significance in relation to the Reconstruction period and potentially other periods important in American history, such as the Segregation era. Identifying Gullah TCPs broadly across the Mount Pleasant area would allow for an assessment of adverse effects for the entire cultural landscape or to related cultural landscapes in federal projects. This approach would help counter the cumulative effects to Gullah African-American communities of the Mount Pleasant area resulting from population growth, changing lifestyles, increases in commercial and developer-designed residential developments, and the Project.
- Develop and install historical and cultural signage near the Phillips and Seven Mile community boundaries to emphasize the historical and cultural significance and traditional cultural practices of these communities.

4.2 Land Use

Impacts to land use resulting from the Project would encourage more planned residential and commercial land uses. These effects would in turn result in adverse effects to the traditional culture of Phillips and Seven Mile. The mitigation options proposed below would assist in the maintenance of traditional cultural practices among Phillips and Seven Mile community members and help preserve their strong senses of community. If selected, the proposed community center(s) could be constructed on the communities' own properties, as described below, or, if shared, on another identified property easily accessible to each community.

• Develop and possibly expand PCA's 8-acre property known as the Park (Charleston County Property ID 583-00-00-072; see Phillips Community Park rendering in Appendix A). The following are proposed options based on community input and desktop research:





- Construct a baseball field.
- o Construct a community center that includes picnic shelters and a basketball court.
- Expand the Park to include waterfront acreage along Horlbeck Creek.
- Purchase the property associated with the Bridge, the Phillips Community's primary water access location, and rehabilitate or reconstruct the Bridge for community use (see the Bridge rendering in Appendix A). The Bridge is located at the terminus of Parker's Island Road and spans Horlbeck Creek. The Bridge once afforded Phillips community members access to Parker's Island, a marsh island adjacent to Phillips on the west, and currently serves as the community's only shared location to practice traditional subsistence activities such as fishing, shrimping, and crabbing. Along with reconstruction, the following additional mitigation options are proposed:
 - o Install seating, railings, and a sink or spigot for cleaning the seafood catch.
 - Improve access to the Bridge through development of sidewalks and/or improvement to existing pathways to access the Bridge on foot and possibly construct a parking lot adjacent to the Bridge.
 - Purchase an adjacent parcel. The Bridge and the adjacent property could become
 discontinuous portions of the Park that would allow community members permanent
 access to Horlbeck Creek, the community's main resource for subsistence practices
 throughout its history and a resource that has become less accessible for community
 members over the years.
- Develop CAGE's 4-acre property (Charleston County Property IDs 578-00-00-171 and 578-00-00-535) in Seven Mile, adjacent to Jennie Moore Elementary School, perhaps in collaboration with the East Cooper Land Trust, a local organization that gifted the property to CAGE (see CAGE Community Center rendering in Appendix A). Similar to the Phillips Community and based on desktop research, the following facilities are proposed as potential mitigation options:
 - o Construct athletic facilities such as a basketball court or a baseball field.
 - Construct a 6,000-square foot community center facility with parking and an equipment storage building. The facility and associated outdoor space could be used as the future location for the Gullah Cultural Festival, as planned by CAGE on the property (East Cooper Land Trust 2019).

4.3 Sensory Aspects

Sensory effects resulting from the Project, such as increased noise, vibration, dust, and vehicular smells, would be exacerbated in the Phillips Community and portions of Seven Mile due to the proximity of residences to the proposed roadway and the lack or relative lack of vegetative buffers to help make the effects more minimal. While no noise barriers in Phillips or Seven Mile were found to be feasible and reasonable, the following minimization and mitigation options would help buffer the communities from dust and vehicular smells:

• Plant vegetated buffers on either side of SC 41 and US 17 that represent and enhance the cultural and historic character of the Phillips and Seven Mile communities, in coordination with SCDAH in regards to their thoughts on effects to the historic properties associated with these communities (see SC 41 Vegetative Buffer renderings in Appendix A). If selected, this measure would be accomplished in coordination with SCDOT to ensure there are no safety concerns. Appropriate plantings could include fruit or nut trees, similar to the historical plantings in some yards along SC 41 in the Phillips Community. Planting plans would be coordinated and approved by the County, Town of Mount Pleasant, SCDOT, and SCDAH, as appropriate.





4.4 Residential Aspects

Loss of portions of residential properties along the selected build alternative is expected from the Project. These residential effects would be minimized through compensation at fair market value. Negative effects to residential parcels in the Phillips Community and portions of Seven Mile would be exacerbated by the prominence of heirs' property in these communities. If any of the affected parcels are legally heirs' properties, meaning that they are owned in common among the heirs of earlier owners of the properties, compensation for the loss of portions of these parcels would be shared among all the heirs. This may result in a very small portion of the overall compensation amount going to each heir. For these properties, impacts to residential properties would be exacerbated, as heirs living near the road who may prefer to relocate due to the expanded roadway may not receive enough individual compensation to be able to do so, and other portions of the properties may be occupied by other family members.

While, as a rule, the Project would provide compensation for lost property in accordance with the Uniform Relocation and Real Property Policies Acquisition Act, special considerations should be made to help mitigate the increased effects particular to heirs' property, as follows:

- Through the right-of-way process, work with directly affected property owners to enhance their
 properties, as negotiated on a case-by-case basis. This would include specific measures for the
 parcels with residences in close proximity to the proposed ROW and possibly others, per property
 owner input.
- Assist multiple owners of heirs' properties during right-of-way acquisitions to better allow for fair compensation to individuals, such as assisting affected property owners in the official "partial separation" of their properties to allow individual control of portions of the larger property.

4.5 Mobility, Access, Public Health, and Safety

Increased traffic volumes are projected by 2045 as development occurs in Charleston and Berkeley counties. The Project would improve mobility, access, and safety in the Phillips Community by reducing traffic congestion on SC 41, providing a center-turn lane to improve the safety of turning into and out of driveways, and constructing sidewalks and multi-use pedestrian and bicycle paths. The location and design of signalized intersections is still being determined; all signalized intersections would have designated crosswalks that connect to the proposed sidewalks and multi-use path. However, the additional lane of opposing traffic would make pedestrian crossing at un-signalized intersections in the Phillips Community more difficult. While an additional lane of traffic is also planned on US 17 within Seven Mile, existing pedestrian crossings at signalized intersections would be maintained or improved. The following mitigation option is proposed as potential means to counter these effects:

Install Pedestrian Refuge Islands with High Intensity Activated Crosswalk signalization in Phillips, in line with the FHWA Safe Transportation for Every Pedestrian program. Pedestrian crossing warning signs may also be used in combination with Pedestrian Refuge Islands. Pedestrian Refuge Islands are raised areas along the roadway that physically separate the roadway into two sections that allow pedestrians to wait safely in the median until they can cross.

Reoccurring drainage and flooding problems have been documented by Charleston County within the Phillips Community (Thomas & Hutton 2016). The main drainage system in the approximately 250-acre drainage basin east of SC 41 consists of linear, open ditches and road and driveway culverts. Other minor drainage infrastructure in the basin generally consists of roadside swales and driveway pipes. Out-of-bank flooding and roadway overtopping has been documented along the main drainage system in the





past. The widening of SC 41 from two lanes to five lanes and the use of closed drainage systems would potentially result in increased flow rates at outfall locations. In the design process, each outfall location would be analyzed to determine if measures would be required to mitigate the impacts related to the increase in impervious surfaces related to the Project. The following option is proposed as potential mitigation if such effects are expected:

 Implementation of Charleston County's Phillips Community Drainage Improvements Project, which would include culvert and ditch improvements to handle additional drainage flow rates from the Project. The drainage improvement project is currently permitted under a Nationwide Permit issued in February 2020 under SAC-2018-01693.

4.6 NRHP Properties

Under NEPA and NHPA, federal agencies, such as USACE, acting as lead federal agency for the Project, are required to consider the effects or impacts of their undertakings on NRHP-eligible cultural resources and take measures to avoid, minimize, or mitigate adverse effects. The Project would result in adverse effects to two Gullah African-American NRHP-eligible properties, the Phillips Cultural Landscape and the Sweetgrass Basket Stand Corridor TCP, due to indirectly altering the traditional culture of the Phillips Community and Seven Mile and the traditional cultural identities of community members.

As the mitigation measures discussed in Sections 4.1 through 4.5 would implement programs and/or infrastructure that would nurture the culture of these historically and culturally significant communities and help sustain traditional cultural identities and practices, all of these measures are potential options that would also mitigate adverse effects to the NRHP-eligible properties. Additional measures will be developed by USACE in coordination with SCDAH, the Advisory Council on Historic Preservation, Charleston County, and the SC 41 Community Mitigation Advisory Committee(s).

Due to the proximity of the Project to existing sweetgrass basket stands that are considered contributing elements to the Phillips Cultural Landscape and the Sweetgrass Basket Stand Corridor TCP, several basket stands would be relocated in close coordination with stand owners to mitigate effects from the Project to these traditional Gullah economic resources. These efforts would likely be based on an MOA developed between USACE, Charleston County, the Town of Mount Pleasant, SCDAH, and affected parties, similar to the MOA created for the basket stand relocations that occurred during the 2013 US 17 widening project. Other potential mitigation measures will be included in later drafts of this CMP.

5.0 References

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Appendix A Community Mitigation Renderings

Phillips Community Park

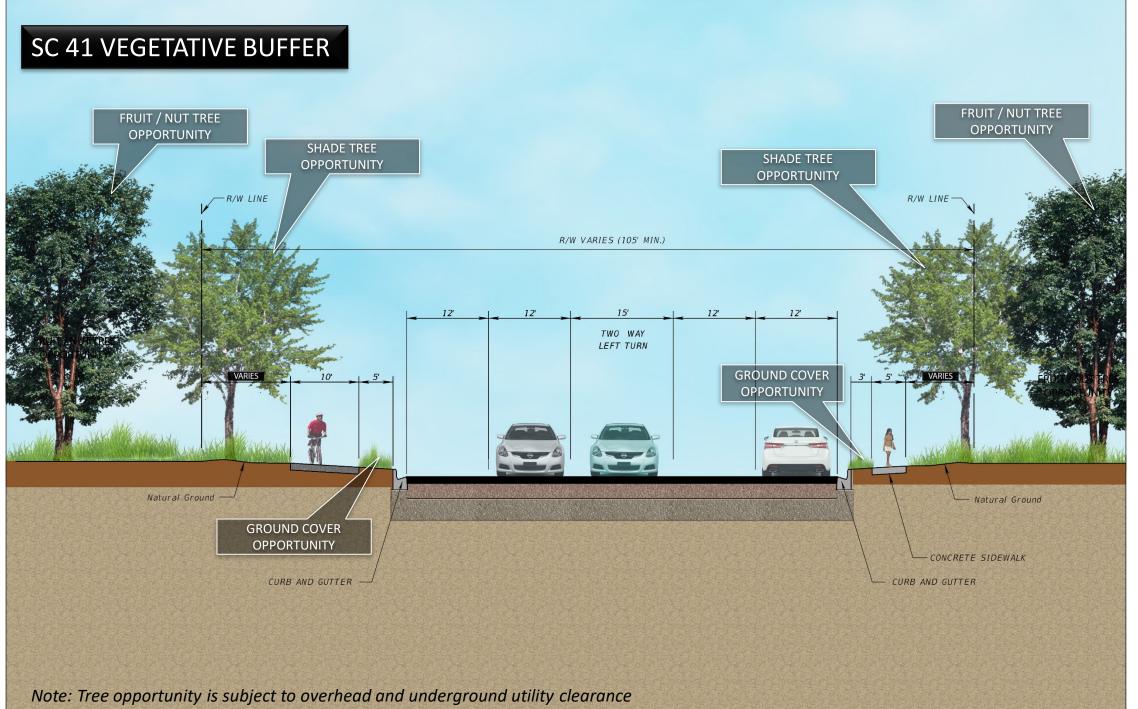


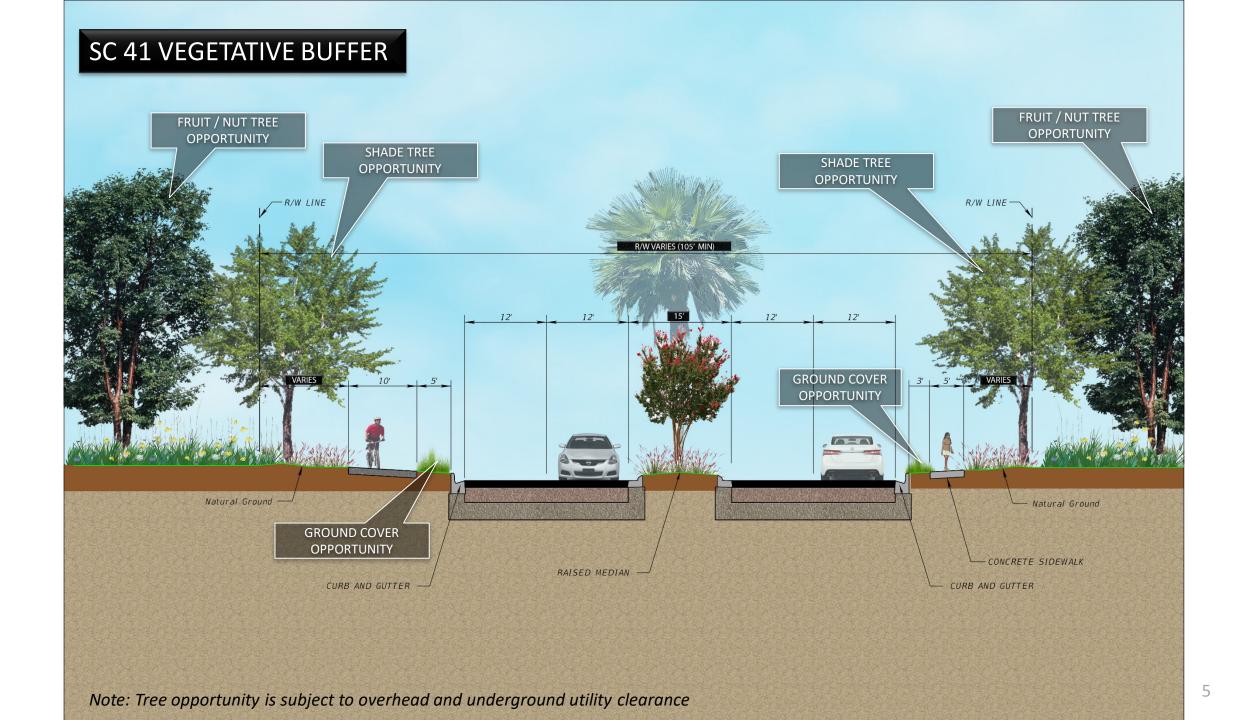
CAGE Community Center



The Bridge







SC 41 SUGGESTED PLANTING PALETTE

TREES

- Sabal Palm Sabal palmetto
- Southern Red Cedar Juniperus virginiana var. silicicola
- Live Oak Quercus virginiana
- American Holly Ilex americana
- Loquat (fruit tree) Eriobotrya japonica
- Southern Magnolia Magnolia grandifliora
- Red Buckeye Aesculus pavia
- Crape Myrtle spp. Lagerstroemia indica
- Pecan Tree (nut tree) Carya illinoinensis
- Peach and Nectarines Prunus persica
 'Junegold' /'Fantasia'
- Kieffer Pear Prunus communis 'Kieffer'

NATIVE SHRUB/GROUDCOVERS

- Swamp Lily Crinum americanum
- Joe Pye weed Eutrochium dubium
- Flat-topped Goldenrod Euthamia sps.
- Dixie Iris Iris hexagona
- Carolina Phlox Plox carolina
- Carolina Rose Rosa Carolina
- Moundlily Yucca Yucca gloriosa
- Wax Mytrle Morella cerifera (Myrica cerifera)
- Groundsel Baccharis halimifolia

PLANTS FOR THE GULLAH GEECHEE BASKETS

- Muhly Grass (aka Sweetgrass) –
 Muhlenbergia filipes
- Saw Palmetto Serenoa repens
- Black Rush Juncus roemerianus
- Longleaf Pine Pinus palustrus
- Guatemala Indigo Indigofera tinctoria



